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*K.L.E. Society's*

***G. I. Bagewadi Arts, Science and Commerce College,  
Nipani-591237***

*Accredited at "A" level by NAAC with CGPA 3.10*

*IQAC INITIATIVE*

*One Day National Level Conference*

*"Viksit Bharat 2047: Strategies for Progress, Innovation and Equity"*



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K. L. E. Society's

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**G. I. Bagewadi Arts, Science and Commerce College,  
Nipani-591237**

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**Internal Quality Assurance Cell Initiative  
One Day National Level Conference**

on

**Viksit Bharat 2047: Strategies for  
Progress, Innovation and Equity**

**24<sup>th</sup> February 2026**

Venue

**Golden Jubilee Conference Hall  
KLE GIBC, Nipani**

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## **KLE Society**

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Seven great aspirants of education called “Saptharishis” established an Anglo Vernacular School in Belagavi on 13<sup>th</sup> November, 1916 to provide basic education to the children of farming community of the North Karnataka region. Today, KLE Society is known nationally and internationally as a giant educational society with more than 316 institutions, 18,000 dedicated faculty serving their best to cater to the needs of about 1,45,000 students every year. The courses offered in multiple disciplines by the society are Basic Social Sciences, Management, Tourism, Hotel Management, Engineering and Technology, Nursing, Pharmacy, Dental, Medical Sciences, Educational training, Agriculture Science, Music, etc. The society has established collaborations with prestigious international educational institutions of UK, USA, Malaysia, China, UAE and Zimbabwe. Under the dynamic leadership of the great visionary, our beloved Chairman and Honorable Chancellor of KLE University, Belagavi, Dr. Prabhakar Kore, assisted by the dynamic Board of Management, our society is moving towards providing world class quality education and services. The society deserves special acknowledgement for the quantum leaps and spectacular growth it has achieved over the last four decades. All the 15 aided HEIs have been accredited at ‘A’ level by NAAC. This speaks of the high standards set by our society in UG and PG education.

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## **GIB College**

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KLE Society’s G. I. Bagewadi Arts, Science and Commerce College, Nipani was established in the year 1961 with a vision to provide quality education in Arts and Commerce for the empowerment of rural and linguistic minority of the North Karnataka region. In 1977, Commerce was introduced. Our college is named after the principal donor late Shri. Ganapati Ishwarappa Bagewadi. Looking into the difficulty of semi urban students to pursue their post graduate studies, in 2010 Commerce, in 2011 Mathematics and in 2018 English PG programs are introduced. Our college is accredited at ‘A’ grade with 3.10 CGPA in the 4<sup>th</sup> cycle by NAAC.

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## **The Conference**

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The One-Day National Level Conference on “**Viksit Bharat 2047: Strategies for Progress, Innovation and Equity**” aims to bring together academicians, researchers, industry experts and students to deliberate on India’s vision of becoming a developed nation by 2047, the centenary year of independence. This conference seeks to explore multidimensional strategies for sustainable progress, inclusive growth and innovative transformation across sectors. It will provide a platform for scholarly dialogues on socio-economic development, governance, technological advancement, entrepreneurship, education and equitable opportunities for all. The event aims to generate insights and actionable recommendations that contribute to the realization of Viksit Bharat 2047, highlighting the key role of social sciences and sports in shaping a balanced, progressive and just society.

### **This conference aims to fulfil the following objectives**

- To explore India’s vision for 2047 with the different strategies and approaches.
- To emphasize the role of innovation, technology and entrepreneurship in promoting inclusive and sustainable growth.
- To encourage research and collaboration on themes related to progress, innovation and equitable growth in the contemporary era.
- To enrich efforts towards knowledge building and impart spirit of sports.

## THEMES

### **HISTORY**

- Cultural Heritage in India.
- Women in India's Freedom Movement: Forgotten Voices.
- India after 1947: Challenges, Changes and Continuities.
- Rewriting History in the Digital Age.
- Gender, Caste and Class in Indian Historical Context.

### **ECONOMICS**

- Reimagining Water and Sanitation.
- Rural and Urban Prosperity through Government Schemes.
- Make in India: Paving towards making India Global Manufacturing Hub.
- Roadmap for Viksit Bharat @2047.
- Sectoral Reforms in India.

### **POLITICALSCIENCE**

- Electoral Reforms and the Future of Indian Democracy.
- India's foreign policy in a Multi polar World.
- Civil Wars in Neighbouring Countries: Impact on India.
- Good Governance and Administrative Reforms in India.
- Youth Participation and Political Engagement in Digital Era.

### **SOCIOLOGY**

- Role of Media in shaping culture.
- Impact of Globalization on traditional Cultures.
- Role of youth culture in Nation Building.
- AI and the future of work in Society.
- Social Values, Gender Studies, Human & Civil Rights.

### **EDUCATION**

- Role of teachers in shaping future generations and youth in achieving SDGs.
- Use of Digital Tools, Artificial Intelligence and Digital Literacy in Education.
- Multidisciplinary approach in higher education.
- Women's Empowerment through Education.
- NAAC, NIRF and other quality frameworks.

### **LIBRARY & INFORMATION SCIENCE**

- Tools in Emerging & Innovative Technology Applications in Libraries.
- Knowledge Management & Online Resources Management in Academic Libraries.
- Role of AI and Machine Learning in Library Services.
- Role of Libraries in Lifelong Learning and Skill Development.
- User-Centric Library Services and Assessment.

### **PHYSICAL EDUCATION**

- Nutritional solutions for improving athletic performance or recovery.
- The impact of physical education programs on academic performance.
- The impact of physical education on long-term fitness habits.
- The contribution of physical education to public health.
- The role of AI in physical education and sports science.



**Dr. Prabhakar Kore**  
Chairman, Board of Management  
KLE Society, Belagavi

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## MESSAGE

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It is with immense pleasure and profound gratitude that, I pen this letter to extend my heartfelt compliments to the dedicated team of KLE Society's G. I. Bagewadi College, Nipani, for the resounding success of the National Level Conference on "Viksit Bharat 2047: Strategies for Progress, Innovation and Equity" held on 24<sup>th</sup> February, 2026

As the Chairman of the KLE Society, it is a matter of great pride to witness such an exemplary event that not only elevates our Society's reputation but also foster meaningful dialogue and collaboration among esteemed scholars, academicians and students across the nation.

The conference was a resounding success marked by insightful keynote address, engaging panel discussion and interactive sessions that sparked innovative ideas and actionable insights. The meticulous planning, proper execution, and the commitment to excellence by the team ensured that every participant left inspired. The event set a benchmark for future endeavours.

On behalf of the Board of Management and the entire KLE family, I appreciate the exceptional leadership and the collaborative spirit of your team. Your efforts have contributed to our mission of promoting intellectual exchange and societal impact.

With deepest gratitude and warm regards,

Date: 24-02-2026

**Dr. Prabhakar Kore**



**Shri. Praveen A. Bagewadi**  
Member, Board of Management  
KLE Society, Belagavi

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## MESSAGE

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I am delighted to extend my warm compliments for the successful organisation of the National Level Conference on “Viksit Bharat 2047: Strategies for Progress, Innovation and Equity” held on 24<sup>th</sup> February, 2026

It is an ambitious vision to foster innovation, dialogue and scholarly collaboration across the nation to brighten the intellectual minds.

Your planning, dedication and creative foresight, provided platform for thought provoking discussions, exchange of ideas and relatable insights.

I sincerely congratulate the organizers, faculty members and students for their dedicated efforts in making this event grand success.

With the best wishes for continuous success.

Date: 24-02-2026

**Praveen A. Bagewadi**

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## ACKNOWLEDGEMENT

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The KLE Society, an enduring symbol of excellence in India's educational landscape, stands as a testament to the dedication and perseverance of thousands of brilliant minds.

K L E Society's G. I. Bagewadi Arts, Science and Commerce College, Nipani stands as a distinguished temple of learning, committed to nurturing intellect, character and creativity. Internal Quality Assurance Cell of our college has organized the National Conference on "Viksit Bharat 2047: Strategies for Progress, Innovation and Equity" held on 24<sup>th</sup> February, 2026.

It aims to bring together academicians, researchers, industry experts and students to deliberate on India's vision of becoming a developed nation by 2047 the centenary year of independence. This conference seeks to explore multidimensional strategies for sustainable progress, inclusive growth and innovative transformation across sectors. It will provide a platform for scholarly dialogue on socio-economic development, governance, technological advancement, entrepreneurship, education and equitable opportunities for all. The event aims to generate insights and actionable recommendations that contribute to the realization of Viksit Bharat 2047, highlighting the key role of social sciences and sports in shaping a balanced, progressive and just society.

I extend my deepest gratitude to our honourable Chairman Sir, Dr. Prabhakar Kore and the inaugurator of the conference, Shri. Mahantesh Kavatagimath sir, Member, Board of Management, KLE Society, Belagavi and Shri. Praveen Bagewadi, Member, Board of Management, KLE Society, Belagavi for their constant encouragement. I am thankful to Shri. Mahesh Bagewadi, Chairman, LGB and members for their support in making the conference a grand success.

My deepest appreciation goes to the Chief Guest Dr. B. D. Kumbar, Hon'ble Vice-Chancellor of Davangere University, Davangere and the Keynote speaker Dr. B. G. Patil, Rtd. Professor of Political Science, Belagavi. I also thank the Resource Persons who have enriched this conference with their valuable insights, profound knowledge and thought provoking discussions. I thank paper presenters for making this conference a grand success. I acknowledge the tireless efforts of the Conference Convener Miss B. G. Ullegaddi, Organizing Secretary Dr. Anand Kenchakkanavar and the IQAC Coordinator, Dr. Atulkumar Kamble and the members of the organizing team, faculty members, technical team and volunteers, whose dedication and team work ensured the smooth conduct of this conference.

I am thankful to all the sponsors, supporters and well wishers, without whom this event would not be successful one. A special thank to Dr. Ramesh V. Bhole, Publisher, 'JOURNAL OF RESEARCH AND DEVELOPMENT (ISSN: 2230-9578) who published all the selected papers of the conference in three special issues of the journal. The Journal is an international, multidisciplinary, peer-reviewed scholarly journal devoted to the promotion and dissemination of high-quality research across a wide range of academic disciplines. May this collective endeavour continue to inspire further dialogue, research and collaboration.

**Date: 24.02.2026**

**Principal**

## **EDITORIAL**

This issue of the journal presents the selected research papers of the National Level Conference on “Viksit Bharat 2047: Strategies for Progress, Innovation and Equity” organized by K.L.E. Society’s G. I. Bagewadi Arts, Science and Commerce College, Nipani held on 24<sup>th</sup> February, 2026 showcasing the diversity and richness of scholarly enquiry in the field. The conference provided a platform for scholars to engage with cutting edge research, share innovative ideas and foster collaborations. This conference is a timely and meaningful academic initiative that aligns with the national vision of transforming India into a developed, inclusive, and self-reliant nation by the year 2047.

The theme Viksit Bharat 2047 reflects a holistic vision of national development, emphasizing not only economic growth but also social justice, technological innovation, environmental sustainability and equitable progress. The journey towards a developed India requires collaborative efforts from educators, researchers, policymakers, students and institutions of higher learning. In this context, academic platforms like this conference play a crucial role in generating ideas, encouraging critical thinking, and promoting interdisciplinary dialogue.

The conference provides an excellent platform for scholars, academicians, and researchers to share their insights, research findings, and innovative perspectives on issues related to development, governance, education, digital transformation, entrepreneurship and social equity. Such intellectual exchanges contribute significantly to building knowledge frameworks that support sustainable and inclusive national growth.

I sincerely appreciate the efforts of the organizing committee, faculty members and student volunteers for their dedication, commitment and meticulous planning in making this academic event successful. Their collective efforts have created a vibrant environment for learning, discussion and collaboration.

I am confident that the deliberations and outcomes of this conference will inspire meaningful research, policy recommendations and practical strategies that contribute to shaping a progressive, innovative and equitable India. May this academic endeavour serve as a stepping stone towards realizing the vision of a truly Viksit Bharat by 2047.

We would like to extend my gratitude to the seminar organizers, participants and reviewers for contributions to this issue. I hope that the research presented here will inspire further investigation and debate, enriching the field of Social Science studies in the modern India.

**Date: 24.02.2026**

**Chief Editors**  
**Miss B. G. Ullegaddi**  
**Shri. N. S. Belagaonkar**



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## Original Article

### Nutritional Solutions for Improving Athletic Performance and Recovery

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#### Abstract

*Premiere nutrients are a primary determinant of athletic performance and restoration. Suitable nutritional techniques assist electricity metabolism, enhance schooling diversifications, lessen fatigue, and facilitate tissue repair. This paper opinions current research on macronutrient stability, micronutrient roles, hydration techniques, cryogenic aids, and nutrient timing emphasizing proof primarily based procedures that athletes can undertake. The mixing of tailor-made dietary plans promotes both shorter performance gains and long-time period fitness results. In the long run, powerful vitamins techniques are individualized, scientifically grounded, and incorporated with schooling and restoration protocols.*

**Keywords:** Sports nutrition, Athletic performance, Muscle recovery, Protein supplementation, Carbohydrate loading and Hydration strategies.

#### Introduction

Physical performance and recovery are complex phenomena that cannot be adequately addressed by training, genetics, sleep, mental status, and most importantly, nutrition. Sports nutrition is a process that tries to supply the substrates for energy metabolism, help the body adapt to physical training, decrease the risk of injury, and optimize recovery between physical performances. Nutrition influences muscle glycogen, hormonal, immune, and cellular repair processes. With the ever-increasing demands of sports, athletes turn to nutritional solutions to optimize their performance results and accelerate the recovery process.

#### Macronutrients and Athletic Performance

##### Carbohydrates: Fuel for Performance

Carbohydrates are the primary energy source for high intensity exercise. They are stored as glycogen in muscle and liver tissues and are rapidly mobilized during training and competition. Inadequate carbohydrate intake impairs performance, accelerates fatigue, and diminishes endurance.

- **Glycogen Loading:** Before endurance events, carbohydrate loading increases glycogen reserves, improving time to tiredness.
- **During Exercise:** Consuming 30–60 g of carbohydrates per hour helps maintain blood glucose and delays fatigue during prolonged efforts.

##### Protein: Building Blocks for Adaptation

Protein is crucial for muscle repair, growth, and alteration. Amino acids serve as substrates for muscle protein synthesis (MPS), especially after resistance training.

- **Daily Intake:** Athletes naturally require 1.2–2.0 g/kg body weight per day, depending on sport type and training intensity.
- **Leucine's Role:** The amino acid leucine is a potent stimulator of MPS, often emphasized in post exercise nutrition.



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## Fats: Essential Energy and Cell Function

Dietary fats are a concentrated energy source and support hormone production, cell membrane integrity, and fat-soluble vitamin absorption.

- Endurance athletes benefit from diets with adequate unsaturated fats to support energy needs during prolonged, lower intensity efforts.
- Balance is key: excessively high fat intake may relocate carbohydrate utilization, reducing obtainable glycogen.

## Micronutrients and Performance

Micronutrients vitamins and minerals are vital for energy metabolism, oxygen transport, and antioxidant defense.

### Iron

Iron is necessary for hemoglobin fusion and oxygen delivery to muscles. Deficiencies are common in endurance athletes and can impair performance. Routine monitoring and, where necessary, supplementation support aerobic capacity.

### Vitamin D and Calcium

Vitamin D modulates muscle function and immune health, while calcium is critical for bone strength and contraction processes. Optimal levels reduce injury risk and support musculoskeletal adaptation.

### Antioxidants

Vitamins C and E help mitigate exercise induced oxidative stress. However, excessive antioxidant supplementation may blunt training adaptations.

## Hydration and Electrolyte Balance

Fluid balance is critical for thermoregulation, cardiovascular function, and metabolic waste removal. Dehydration as low as 2% body weight can significantly impair performance. Pre-exercise hydration, intra-exercise electrolytes (especially sodium), and post-exercise rehydration with carbohydrate–electrolyte solutions improve performance and recovery outcomes.

## Nutrient Timing and Recovery

### Post Exercise Recovery Window

The “anabolic window” refers to the post-exercise period when nutrient uptake and protein synthesis are heightened.

- **Carbohydrate + Protein:** Consuming ~1.2 g/kg carbohydrates combined with 0.3–0.4 g/kg protein within 30–60 minutes post-exercise accelerates glycogen restoration and stimulates MPS.
- **Liquid Recovery Solutions:** Ready-to-drink shakes with optimal macronutrient ratios improve convenience and compliance.

## Sleep and Late-Day Nutrition

Sleep quality influences recovery, hormonal balance, and muscle repair. Nutrients like magnesium, tryptophan, and convulcent carbohydrates may support sleep quality when consumed appropriately.

## Ergogenic Aids: Evidence-Based Supplements

Certain supplements have strong research support for routine and recovery:

1. **Creatine Monohydrate:** Enhances strength, power, and lean mass.
2. **Caffeine:** Improves endurance and alertness.
3. **β-Alanine:** Increases muscle carnosine, reducing fatigue during high-intensity efforts.
4. **Branched-Chain Amino Acids (BCAAs):** May reduce muscle soreness and support MPS in specific contexts.
5. **Omega-3 Fatty Acids:** Support anti-inflammatory responses and muscle repair.

These should be used judiciously, tailored to individual needs, and in consultation with sports nutrition professional.

## Individualization: Personalizing Nutrition Plans

One size does not fit all. Factors influencing nutritional needs include:

1. **Sport Demands:** Endurance, strength, power, or mixed.
2. **Training Load and Periodization:** Volume and intensity affect energy and nutrient requirements.
3. **Body Composition Goals:** Weight maintenance, loss, or gain.
4. **Metabolic Variability:** Genetic and metabolic differences alter nutrient responses.

Practitioners often employ tools such as food diaries, metabolic testing, and performance biomarkers to customize nutrition plans.

## Special Considerations

### Female Athletes and Relative Energy Deficiency

Female athletes are at risk for Relative Energy Deficiency in Sport (RED-S), where inadequate energy intake impairs performance and health.

Adequate caloric and micronutrient intake is critical to maintain hormonal balance, bone health, and recovery.



## Youth and Adolescent Athletes

Growth, maturation, and training demands require careful balance between energy intake and nutrient quality to support development and performance.

## Practical Applications and Strategies

Athletes and coaches can adopt evidence-based practices:

1. **Balanced Daily Diet:** Emphasize whole foods, complex carbohydrates, lean proteins, healthy fats, fruits, and vegetables.
2. **Pre-Event Fueling:** Aim for 1–4 g/kg carbohydrates 3–4 hours before prolonged exercise.
3. **Recovery Meals:** Include both carbohydrate and protein soon after training.
4. **Hydration Plan:** Tailor fluid and electrolyte goals based on sweat rate and environmental conditions.
5. **Supplementation Protocols:** Use only scientifically validated supplements and monitor responses.

## Conclusion

Vitamins are as essential as training, relaxation, and psychology in shaping athletic overall performance and healing. Evidence based nutritional strategies including balanced macronutrient intake, targeted micronutrient assist, hydration management, nutrient timing, and selective supplementation optimize power availability, overall performance, version, and recuperation. Individualized plans designed with expert guidance maximize outcomes and sustain long time athlete improvement. As research evolves, integration of personalized nutrients into athletic packages will hold to beautify competitive performance and athlete properly being.

## References

1. Bente, M., & Asare, M. (2011). Physical activity and nutrition for athletic performance. *Journal of Sports Nutrition*, 32(4), 123–135.
2. Burke, L. M., et al. (2011). Carbohydrates for training and competition. *Journal of Sports Sciences*, 29(Suppl 1), S17–S27.
3. Phillips, S. M., & Van Loon, L. J. C. (2011). Dietary protein for athletes: from requirements to metabolic advantage. *Applied Physiology, Nutrition, and Metabolism*, 36(5), 647–654.
4. Rodriguez, N. R., DiMarco, N. M., & Langley, S. (2009). Nutrition and athletic performance. *Journal of the American Dietetic Association*, 109(3), 509–527.
5. Thomas, D. T., Erdman, K. A., & Burke, L. M. (2016). Position of the Academy of Nutrition and Dietetics, Dietitians of Canada, and the American College of Sports Medicine: Nutrition and Athletic Performance. *Journal of the Academy of Nutrition and Dietetics*, 116(3), 501–528.



## Original Article

### Assessing the Role of Green Economic Opportunities on Sustainable Development in SAARC and Observer Countries

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#### Abstract

The term "green economy" has become increasingly popular worldwide, leading many countries to prioritise environmental issues and adopt it as their primary economic model. One of the few countries concentrating on sustainable development and undergoing fast economic expansion is India. "Green growth" is the encouragement of economic growth while maintaining the vital environmental protection provided by natural resources. Sustainable development, a sustainable environment, and environmental balance are all addressed by the green economy. India's tremendous expansion over the past ten years has raised living standards and produced job opportunities. However, a declining environment and decreasing natural resources have limited its impressive development record, necessitating significant measures to establish a green and decarbonized economy. A development approach known as the "green economy" combines ecological sustainability with economic growth. More and more economic activity is being conducted in contemporary settings, which is frequently associated with adverse environmental effects. Numerous projects and strategies targeted at the creation of a green economy have been sparked by this trend. A genuine concern is the examination of the primary obstacles in the areas of environmental and economic development, as well as public strategies for a green economy. Green growth and the green economy are increasingly reflecting worldwide tendencies for sustainable development.

**Keywords:** green growth, green economy, sustainable development, environment.

#### Introduction

The global landscape of economic and environmental challenges has prompted the emergence of the green economy as a transformative paradigm. The idea of the "green economy" has become more well-known as a practical way to balance ecological stewardship and economic growth as nations struggle with the urgent need to address environmental degradation and achieve sustainable development. The importance of the green economy in rural areas is crucial to this discussion because of the potential and challenges presented by the interdependence of livelihoods, natural resources, and community well-being. Rural communities, which are frequently distinguished by their dependence on forestry, agriculture, and enterprises based on natural resources, are in a unique position to gain from the green economy's tenets. By embracing sustainable production and consumption methods, using renewable energy sources, and protecting ecosystem services, this new economic paradigm aims to balance environmental integrity with economic development. In this regard, by promoting diversified economies, improving resource efficiency, and strengthening community resilience against environmental shocks, the green economy has the potential to spur rural development. India has benefited much from the last ten years of rapid economic growth, but the environment has suffered, exposing the populace to severe air and water pollution. India loses \$80 billion annually as a result of environmental degradation, or 5.7% of its total GDP. To encourage sustainable growth and to reverse the trend of environmental deterioration and the depletion of natural resources, green economy measures are required.



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It is possible to reduce emissions at a negligible cost to GDP. At the national and international levels, the shift to inclusive and green economies has been discussed for a long time. The 2030 Global Development Agenda, also known as the Sustainable Development Goals, and the ratification of the Paris Agreement, which strives for everyone's holistic well-being both now and in the future without going beyond the environment's natural boundaries, are two significant international commitments that India recently made.

### **Objectives of the Study:**

The main objectives of the research paper are as follows:-

1. To study the green economic opportunities by SAARC and observer Countries.
2. To study the natural capital protection by SAARC and observer Countries

### **Research Methodology:**

Every research is necessary a specific methodology so for the present research has used specific methodology. The present research study is an analytical and quantitative type of study. The study uses all the necessary methods useful for data collection, for the collection of data, the researcher has used the Secondary source. Secondary data required for the study are collected from books, journals and other Government websites, periodicals, and reports etc.

### **What Is A Green Economy?**

The United Nations Environment Program describes a "green economy" as "improved human wellbeing and social equity, while significantly reducing environmental risks and ecological scarcities." In short, a green economy is one that is low in carbon emissions, resource-efficient, and socially inclusive. In a green economy, income and job growth are driven by public and private investments that reduce pollution and carbon emissions, enhance energy and resource efficiency, and prevent the loss of biodiversity and ecosystem services. To encourage and support these investments, targeted public spending, legislative changes, and regulatory adjustments are needed. Natural capital should be protected, enhanced, and rebuilt as necessary along the development path since it is a significant economic resource and a source of public benefits. This is especially important for the poor, whose security and means of subsistence depend on the natural environment. The primary objective of the transition to a green economy is to promote investment and economic growth while enhancing social inclusion and environmental quality. To accomplish this goal, it is crucial to set up the framework for public and private investments to include more comprehensive environmental and social norms. Additionally, pollution, resource depletion, deteriorating ecological services, and the distributional effects of natural capital loss on the poor must be taken into account when modifying the primary indicators of economic performance, such as GDP growth. According to the concept of the "green economy," problems including ecological scarcity, energy instability, and climate change are currently plaguing both developed and developing countries. However, the green economy model addresses these challenges by suggesting a development path that reduces the carbon economy, encourages resource and energy efficiency, and diminishes environmental destruction. As growth and investments lessen the need to sell off environmental assets and compromise environmental quality, both wealthy and poor countries can achieve more sustainable economic development. While the concept of a "green economy" does not replace sustainable development, it is becoming more and more obvious that achieving sustainability is almost entirely dependent on making the economy function. We have produced new wealth in recent decades using a "brown economy" model based on fossil fuels, but we have failed to promote social equality and human well-being and have exhausted resources and damaged the environment for our own self-serving purposes. In addition, the world has not yet achieved the 2015 Millennium Development Goals. The important links between sustainable development and the concept of a green economy are examined in the paragraph that follows.

### **Advantages of Green Economy:**

Green economies can do wonders for both the financial sector and the environment.

#### **Encourages more sustainable development:**

Using natural resources responsibly while keeping an eye on their potential for recycling is known as "green economics." This guarantees that present and future generations can take advantage of natural resources while continuing to be responsible stewards of the planet.

#### **Helps fight climate change:**

Governments and the corporate sector collaborate to effectively mitigate climate change by guiding the economy in a more environmentally friendly direction. There is hope that many of the worst effects of global warming can be avoided by reducing carbon emissions.

### Improves the ecosystem:

Any commercial activity that takes environmental regulations into account contributes to the preservation of biodiversity in ecosystems all over the world. Efficient ecosystem services support plant, animal, and human life equally, all of which are essential for maintaining the economy.

### Increases equity:

The goal of green finance and economic development is to provide fair results for everyone in the world community.

### Principles of Green Economy:

We envision a green economy that benefits everyone while staying within the planet's ecological bounds. It adheres to five fundamental principles that, when combined, can direct economic transformation in a variety of settings and each of which draws from significant international policy precedents.

#### The Wellbeing Principle:

Everyone can produce and enjoy riches in a green economy. The green economy is focused on people. Its goal is to establish true, mutually beneficial prosperity. Its main goal is to increase wealth in order to promote wellbeing. This richness encompasses all forms of human, social, physical, and natural capital in addition to money.

#### The Justice Principle:

Equity both within and between generations is encouraged by the green economy. The green economy does not discriminate and is inclusive. It prevents elite capture, equitably distributes decision-making, expenses, and rewards, and particularly promotes women's empowerment. In addition to providing enough room for wildlife and wilderness, it encourages the fair distribution of opportunities and outcomes, lowering inequities between people.

#### The Planetary Boundaries Principle:

The green economy invests in, protects, and restores the environment. An inclusive green economy acknowledges and fosters nature's many values, including its ecological values that support all life, its cultural values that support society, and its functional values of supplying goods and services that support the economy.

#### The Efficiency and Sufficiency Principle:

The goal of the green economy is to promote sustainable production and consumption. Low carbon, resource conservation, diversity, and circularity characterize an inclusive green economy. It welcomes fresh approaches to economic growth that tackle the problem of generating wealth within the confines of the planet.

#### The Good Governance Principle:

Institutions that are robust, responsible, and interconnected serve as the compass for the green economy. An inclusive green economy is evidence-based, has multidisciplinary norms and institutions, and uses sound economics and science in conjunction with local knowledge to develop adaptable strategies.

**Table No.1**

Score son indicator categories for green economic opportunities by SAARC and observer Countries

Sr. No	Country	Green Economic Opportunities	Indicator categories			
			Green investment	Green Trade	Green employment	Green innovation
1	Bhutan	-	75.28	-	-	-
2	Nepal	18.71	98.54	2.54	26.16	-
3	SriLanka	18.04	80.19	11.27	6.49	-
4	India	30.40	76.33	20.74	49.72	10.85
5	Bangladesh	13.75	81.97	2.30	13.79	-
6	Maldives	-	-	1.07	1.00	-
7	Pakistan	16.30	60.36	3.76	19.10	-
8	Afghanistan	6.06	62.01	3.60	1.00	-
9	China	48.57	80.38	31.26	48.44	45.73
10	Iran	-	-	5.98	65.88	-
11	Japan	44.88	64.25	53.05	46.15	25.78
12	South Korea	52.93	78.09	37.48	75.44	35.54

13	Myanmar	26.24	80.44	4.80	46.83	-
14	Australia	28.17	60.89	8.26	44.17	28.35
15	Mauritius	12.98	59.28	3.99	9.24	-
16	USA	43.13	62.31	42.33	71.98	18.23
17	EU	-	-	-	-	-
Average		27.70	72.88	15.50	35.03	27.41
Max		52.93	98.54	53.05	75.44	45.73
Min		6.06	59.28	1.07	1	10.85

**Source: Green Growth Index 2023**

Four main "Indicator Categories" are used in the table to assess nations and determine their total Green Economic Opportunities score. Green investment is the flow of money into environmentally friendly initiatives. Green trade is the exchange of eco-friendly products and services. Employment in the green sector is known as "green employment." Green innovation is the study and advancement of eco-technologies. According to the research, several SAARC members and observer nations like China and South Korea differ significantly. South Korea has 52.93 green economic opportunities, Afghanistan has 6.06, Nepal has 98.54 green investments, and Mauritius has 59.28. Japan's green trade is 53.05, while the Maldives' is 1.07. South Korea's green employment is 75.44, while Afghanistan's is 1.00. Green Innovation: India 10.85 and China 45.73.

The "Investment" Paradox It's interesting to note that, out of all the countries, Green Investment has the highest average score 72.88. Here, even smaller economies like Bhutan 75.28 and Nepal 98.54 receive very high scores. This implies that even while these nations are effectively drawing in or distributing funds for environmentally friendly projects, they have difficulty converting those funds into trade or innovation. With the lowest average and some nations (such as Nepal, Sri Lanka, and Pakistan) displaying no data or very low scores, Green Innovation is the poorest category overall. The only countries with notable activity in this field are China, South Korea, Japan, and Australia. In terms of total Green Economic Opportunities, India tops the core SAARC group 30.40. Although its profile is balanced, it nevertheless lags well behind observer countries like Japan and South Korea. With the highest rankings for employment and total prospects, South Korea emerges as the most "well-rounded" green economy on our list. The majority of nations are still in the early to intermediate phases of making the shift to a green economy, according to the Average Opportunity Score of 27.70. The "Green Job" market appears to be centered in developed countries, as seen by the wide range of Green Employment values, which range from 1.00 to 75.44.

**Table No.2**

Scores on indicator categories for natural capital protection by SAARC and observer Countries

Sr. No	Country	Natural Capital Protection	Indicator categories			
			Environmental quality	GHG emissions reductions	Bio diversity and ecosystem protection	Cultural And Social value
1	Bhutan	78.42	82.41	79.83	68.92	83.43
2	Nepal	71.55	57.29	84.18	63.07	86.15
3	Sri Lanka	65.40	95.87	93.14	53.95	37.98
4	India	55.11	52.98	91.22	46.52	41.04
5	Bangladesh	53.31	73.59	92.83	32.84	36.00
6	Maldives	53.10	87.32	89.73	17.86	56.80
7	Pakistan	49.99	66.83	89.57	20.34	51.30
8	Afghanistan	37.37	71.19	79.24	9.21	37.57
9	China	64.60	80.23	76.77	42.17	67.05
10	Iran	56.19	83.19	67.88	40.04	44.09
11	Japan	71.10	91.29	80.46	64.10	54.29
12	South Korea	57.00	86.03	69.85	54.88	32.02
13	Myanmar	61.70	82.93	78.70	53.10	41.83
14	Australia	55.36	86.97	24.67	57.23	76.49
15	Mauritius	53.20	89.98	78.31	47.26	24.05
16	USA	63.95	81.21	49.96	56.77	72.62
17	EU	-	-	-	-	-
Average		59.21	79.33	76.65	45.52	52.67



Max	78.42	95.87	93.14	68.92	86.15
Min	37.37	52.98	24.67	9.21	24.05

### Source: Green Growth Index 2023

Here is an examination of the natural capital protection scores for SAARC and observer nations based on the table that was provided. Scores typically range from 0 to 100, and the data assesses performance across five main indicators. The country with the highest overall score for "Natural Capital Protection" is Leader Bhutan 78.42. In comparison to its other criteria, it is somewhat weaker in biodiversity but remarkably great in cultural and social worth. Afghanistan's lowest performer has the lowest total "Natural Capital Protection" score 37.37, primarily due to a very low Biodiversity and Ecosystem Protection score 9.21. The table shows the areas in which various countries concentrate their environmental efforts. India's environmental quality is 52.98, while Sri Lanka's is 95.87. Australia's GHG reduction is 24.67, while Sri Lanka's is 93.14. Bhutan's biodiversity protection score is 68.92, while Afghanistan's is 9.21. Nepal's cultural and social value is 86.15, while Mauritius' is 24.05. Compared to the averages for Environmental Quality 79.33 or GHG Reductions 76.65, the average score for Biodiversity and Ecosystem Protection 45.52 is substantially lower. This implies that although many nations are successful in controlling emissions and pollution, they are having difficulty safeguarding real biological ecosystems and species. Bhutan, Nepal, and other Himalayan nations score highly on "Cultural and Social value," demonstrating a close connection between their social identities and their natural environments. developed observers in Australia, Japan, and the United States. These countries exhibit a "mixed bag" profile. Australia, for instance, scores exceptionally low in GHG emissions reductions 24.67, probably due to its large per-capita carbon footprint, but very high in Environmental Quality and Cultural Value. Bangladesh, India, and Pakistan are South Asian giants. These nations score well in reducing greenhouse gas emissions, all scoring 90 or more, but they perform far worse than average in protecting biodiversity. The highest overall metric, environmental quality is 79.33, while the average for natural capital is 59.21. Average 45.52 is the lowest overall metric for biodiversity and ecosystem conservation.

### Conclusion:

The green economy is an important concept at multiple levels of governance. Going green is no more a choice, it has become a necessity for the modern era. The term "green economy" brings various ideas together less than one heading. Businesses, communities, and the environment all benefit from a green economy. The notion of green growth is undermined by the notion that sustainable practices can lead to growth, development, and well-being. The global status quo is being fundamentally altered by the green economy. It will necessitate a significant change in the priorities of the government. Given the complexity of the planet we live in, as well as the unique national conditions and development aspirations of each country, there is no one model or route to the green economy. However, all countries will need to make major structural and technological changes throughout the economy, or at least "green" key sectors like energy, urban infrastructure, transportation, industry, and agriculture, in order to shift to a green economy, which places the economy at the center of generating sustainable development. Additionally, it will involve "greening" investments both domestically and abroad, developing new "green" sectors to create "green" jobs, and supporting and enabling "green" international trade through national and international laws. Although implementing this transformation is difficult, it is essential if we are to ever meet the Sustainable Development Goals. The shift to a green economy, however, happens at a different rate in every nation. Information, resources, and expertise are essential for the transition to a greener economy.

### References:

- Gibbs D, O'Neill K. Future green economies and regional development: a research agenda. *Reg Stud.* 2017; 161–73.
- International Energy Agency (IEA). Ensuring green growth in a time of economic crisis: the role of energy technology. IEA; 2009.
- Megwai G, Njie NI, Richards T. Exploring green economy strategies and policies in developing countries. *Int J Green Econ.* 2016; 338–57.
- OECD. (2011). towards green growth. Retrieved from <https://www.oecd.org/greengrowth/>
- Ostrom, E. (2007). A diagnostic approach for going beyond panaceas. *Proceedings of the National Academy of Sciences*, 104(39), 15181-15187.
- Sachs, J. D. (2012). From millennium development goals to sustainable development goals. *The Lancet*, 379(9832), 2206-2211.
- Scoones, I., Melnyk, M., & Pretty, J. (1992). The hidden harvest: Wild foods and agricultural systems. A literature review and annotated bibliography. IIED.
- Scoones, I. (2009). Livelihoods perspectives and rural development. *The Journal of Peasant Studies*, 36(1), 171-196.
- Scoones, I. (2015). Sustainable rural development. In J. Pretty, A. S. Ball, T. Benton, J. Guivant, D. R. Lee, D. Orr ... & D. Ward (Eds.), *The Sage Handbook of Environment and Society* (pp. 267-279). Sage Publications.



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10. Agriculture, C. A. (2007). *Water for Food, Water for Life: A Comprehensive Assessment of Water Management in Agriculture*. London and International Water Management Institute. Colombo, Sri Lanka: Earthscan.
11. Chen, S., & Ravallion, M. (2007). Absolute Poverty Measures for the Developing World, 1981-2004. *The National Academy of Sciences*, 104(43), pp. 16757-16762.
12. Nicholls, R. J., Hanson, S., Herweijer, C., Patmore, N., Hallegatte, S., Corfee, M. J., . . . Muir, W. R. (2007). *Ranking of the World Cities Most Exposed to Coastal Flooding Today and in the Future: Executive Summary*. Paris: OECD .
13. Barbier, E. B. (2011). The Policy Challenges for Green Economy and Sustainable Economic Development. *Natural Resources Forum*, 35(3), 233–245. <https://doi.org/10.1111/j.1477-8947.2011.01397.x>



## Original Article

### A Study on India's state of GDP, PCI and Social Wellbeing

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#### Abstract

This paper focus on development aspects measured in terms of GDP, PCI and social wellbeing of the country, India. The present world is marching for progress in a tune of sustainable development approaches and headed various initiatives for the same. Meanwhile, need is also arisen to study state of gross value addition of a country and its role for sustainable environment as well as wellbeing of the society as a whole. Under this backdrop, paper emphasizes on India's state of GDP, PCI and wellbeing through comparative study with OECD member nations. This paper is analytical in nature and data has been used from secondary sources which has presented through figures and graphs. It attempts to understand present state of India's GDP and per capita income as well as social wellbeing of India. It has suggested that provision and strictly adhere to the guidelines in implementation of housing for all schemes including electricity connection, gas connection, water supply and sanitation, MGNREGA and VB G Ram G, public spending including health and education should be increase from single digit to double digit (percentage of GDP) which positively supports achieving Viksit Bharat at 2047 among other.

**Keywords:** GDP, real PCI, Social Wellbeing, Viksit Bharat, OECD

#### Introduction

India has a population crossing 1339.2 million (2017) with 450.4 population density per km<sup>2</sup> and has average real growth rate at 7.5 percent in the five years. The sector wise share towards India's GDP stands 17.2 percent, 29.3 percent and 53.5 percent respectively by the primary sector, Industry including construction and Services. The employment rate aged 15 and over stood 46.8 percent in which 71.2 of men and 22.0 of women. Concern to public and private spending on education and health, it was hardly 3.1 and 3.9 percent of GDP in India which seems very low compare to other developing countries in the world. India has been the fastest growing economy and became a key player in the global economy with outstanding export performance in some sectors, particularly information and technology services and pharmaceuticals. Significant reforms have been taken place in India since 2014 to accelerate economic activities including GST introduction, new corporate tax structure, Insolvency and Bankruptcy code, reforms in real sector, infrastructure development, direct cash transfer and other. This paper constitutes two sections viz. Sections I deals with review of literature on the topic, formulation of objectives and data sources followed by methods and nature of paper.

#### Section I Review of Literature, Objectives and Methodology

Review of Literature Cerutti, E. et al. (2015) examines how housing finance systems and real-estate booms interact across countries. It uses a new, detailed cross-country dataset on housing finance, mortgage markets, credit growth, and house prices for over 50 economies to explore the factors behind housing booms and their consequences. Chandrasekhar (2017) studied current state of internal mobility data in India and argues for a triangulated approach to understanding population movement has increased and remains a pressing social issue. Kundu and Kumar (2017) made critical assessment of evolving credit linked subsidy regarding urban housing policy, particularly Pradhan Mantri Awas Yojana (U).

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## Objectives of the paper

This paper attempts to fulfill the following objectives

1. To Understand the India's state of GDP and real PCI across the states
2. To Address social challenges and improving measures for well being
3. To Recommend policy measures to fulfill vision of Viksit Bharat

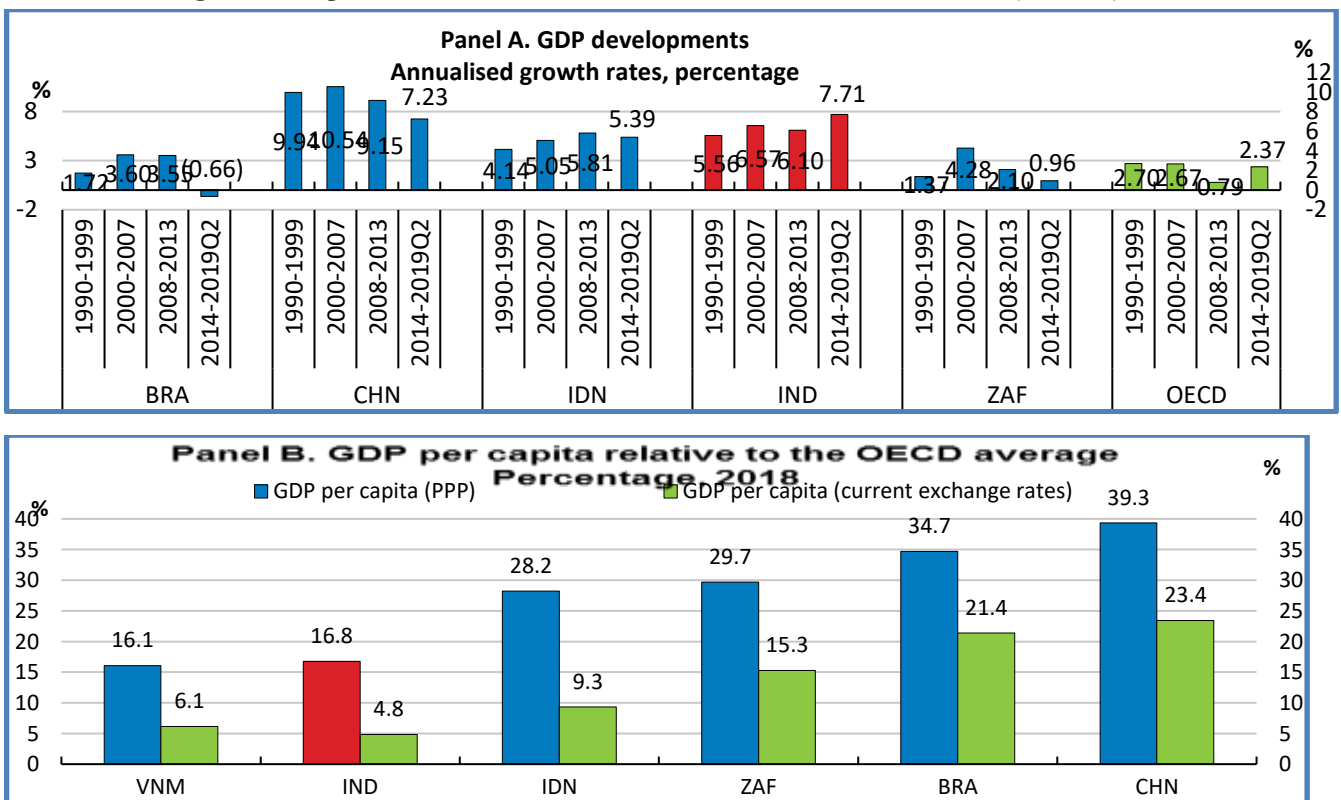
## Nature of paper, Data Source and Method

The present paper is analytical in nature and secondary data had been taken from various sources including journals, reports of WEF, NSSO, OECD, etc. The percentage, growth rate, diagrams are used to present the information.

## Section II Discussion and Interpretation

India marching towards becoming global manufacturing hub in coming decades through various schemes and programmes connected with enhancing GDP and real PCI by way of injecting huge investment in all the sectors, particularly in service sector which is considered as engine of growth. Figure 1 of panel A indicates that the India's GDP still growing steadily before and after the pandemic period compare to other countries like china (7.23 percent), Brazil and other. India's growth of GDP at 7.71 percentage states its potentiality that reap maximum fruitful results in an economy. It is because of big consumer market in India followed by Atma Nirbhar Bharat package through different government initiatives.

Figure 1 Comparison of India's GDP and real PCI with OECD Countries (Selected)



**Note:** BRA- Brazil, CHN- China, IDN- Indonesia, IND- India, ZAF- Country in Southern Africa, VNM- Vietnam, OECD- Organization for Economic Cooperation and Development

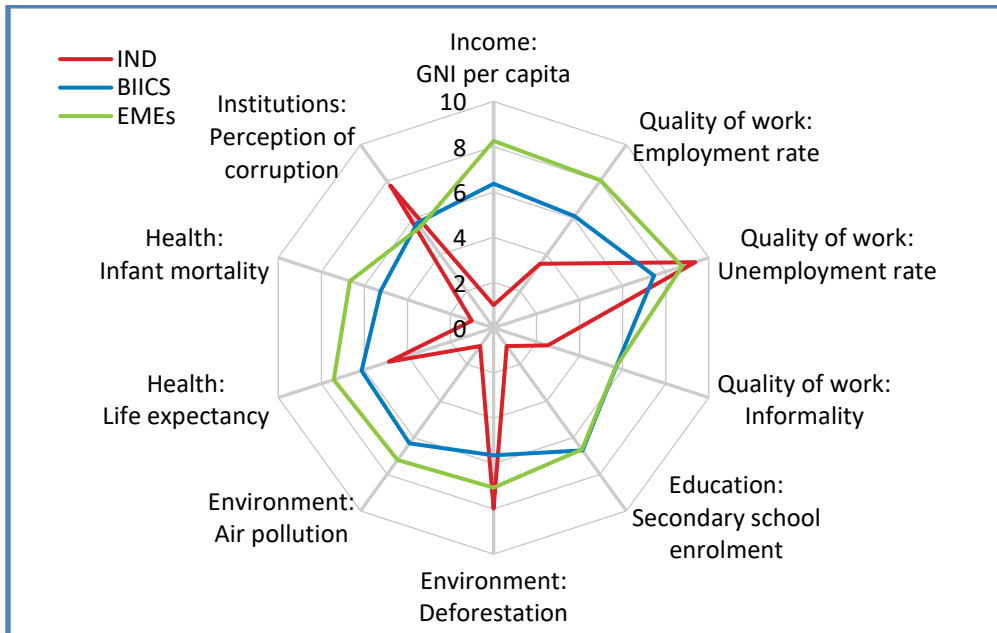
Source: OECD, Analytical database.

The structural changes in India, reflected through raise in productivity, investments and incomes. Large public sector projects and various housing investment schemes have been key drivers. Panel B enlightens on India's GDP per capita in PPP was found 16.8 percentage whereas in case of China (39.3 %), Brazil (34.7%), Indonesia (28.2%), South African country (29.7%) and 16.1 % for Vietnam. It was steadily improving and not to the level of other countries as expected.

## Addressing social challenges and Efforts to improve wellbeing

Persistent gaps in working conditions and wages between organized and unorganized sectors existed. The gender gap also large where female labor market participation gradually improving.

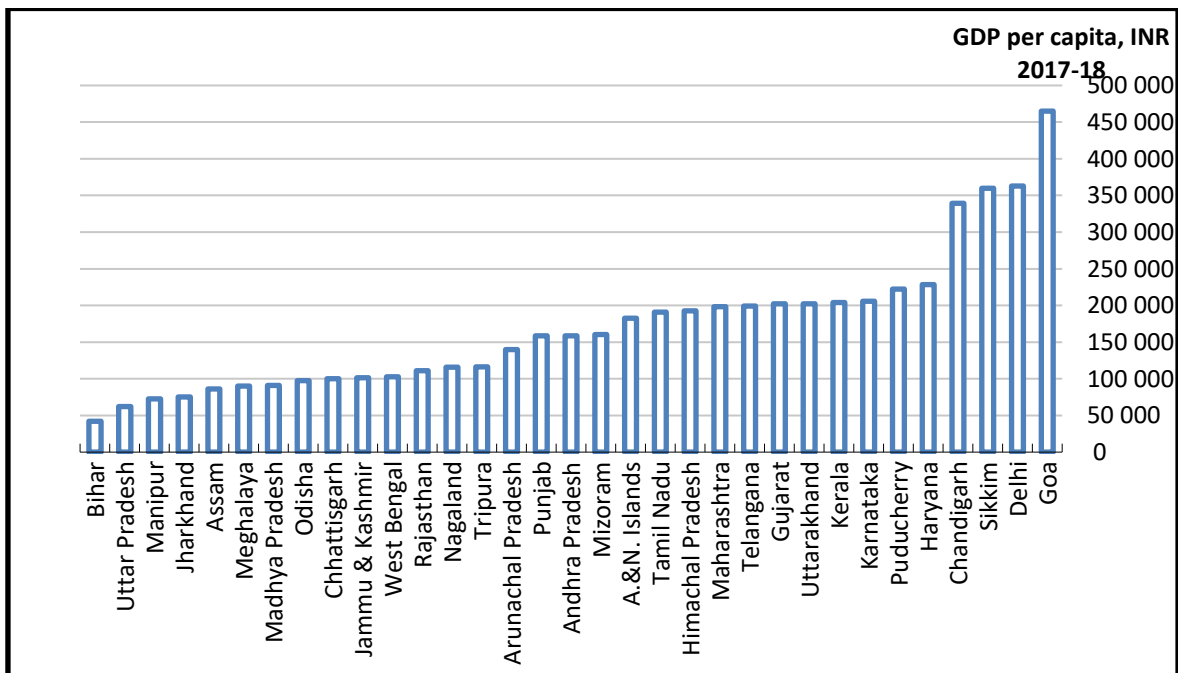
**Figure 2 Challenges in improving wellbeing** (Normalised from 1 to 10 (best))



**Note:** BIICS- the simple average across Brazil, India, Indonesia, China, and South Africa. Indicators are scaled from 1 to 10, with 1 representing the worst performance across all BIICS, and 10 representing the best. EMEs refers to a simple average of BIICS countries, plus Malaysia, Thailand and Viet Nam. Source: OECD, Analytical database; International Labour Organisation; Transparency International Corruption Perception Index; UNESCO Institute of Statistics; World Bank, World Development Indicators database; and World Health Organisation. Employment data for India are from the MOSPI Periodic Labour Force Survey Millions of people in India have been taken out of poverty but still inequality and poverty remain persisted which became a challenge and alter wellbeing.

Meeting the aspirations of the fastest growing population in the labour market in became challenging. The red line in the figure 2 depicts that India's overall performance is uneven or very weak except few areas. India's GNP score is extremely low, which shows major development gap. India's performs worst informal sector work and other indicators shown in the radar chart.

**Figure 3 PCI across States in India**



Source: OECD calculations based on data from CEIC



Figure 3 indicates state wise real PCI across India which shows that Bihar, Uttar Pradesh, Manipur, Jharkhand and Assam perform stood at bottom and top performance states includes Goa, Sikkim, Chandigarh, Haryana, Puduchery, Delhi and Kerala. Policy recommendations to improve GDP, real PCI and Social well being of the countrymen are listed below.

Provision and strictly adhere to the guidelines in implementation of housing for all schemes including electricity connection, gas connection, water supply and sanitation.

An income support system including MGNREGA and VB G Ram G initiative should be more intensively monitored and bring real changes in the society through employment and dignified works.

The public spending including health and education should be increase from single digit to double digit (percentage of GDP) which positively supports achieving Viksit Bharat at 2047.

New Pension Scheme for unorganized people should be focused to safeguard their life after attaining 60 plus age. It leads to live happily with basic attainments independently. The guaranteed existed pension schemes like Atal Pension Yojana should be triggered at all corners of the country through effective campaigns.

Provision of FDI towards MSME to boost their contributions towards GDP and self sufficiency in fund mobilization. Also banking reforms through more amalgamation and merger activities.

In order to mitigate the regional imbalance across states of India, it is suggested to give more emphasize on poor performance

## References

1. Cerutti, E. et al. (2015), Housing Finance and Real-Estate Booms: A Cross-Country Perspective; by Eugenio Cerutti, Jihad Dagher, and Giovanni Dell'Araccia; June 2015; SDN/15/12.
2. Chandrasekhar (2017), On the importance of triangulating datasets to examine indians on the move, Center for Policy Research.
3. Kumuda, D. (2014), "Homeless population in India", Global Journal for Research Analysis, Vol. 3/8.
4. Kundu and Kumar (2017), "Housing for the Urban Poor?", Economic and Political Weekly, Vol. LII/52.
5. OECD (2025), Economic Outlook for Southeast Asia, China and India 2025: Enhancing Disaster Risk Financing, OECD Publishing, Paris, <https://doi.org/10.1787/6fc95782-en>.
6. Tandel et al. (2015), "Decline of rental housing in India: the case of Mumbai", Environment and Urbanization, Vol. 28, pp. 259-274, <http://dx.doi.org/10.1177/0956247815620316>.
7. Tiwari, P. and J. Rao (2016), ADBI Working Paper Series Housing Markets and Housing Policies in India Asian Development Bank Institute, <http://www.adb.org/publications/majorchallenges-facing-small-and-medium-sized->.
8. World Economic Forum, 2025



## Original Article

### Use of Digital Tools, Artificial Intelligence and Digital Literacy in Education

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*The increasing use of digital tools has led to a major shift in the global education sector. Moving ahead, in the Indian context, the use of digital tools, AI, and digital literacy has become the backbone for realizing the national vision of Viksit Bharat 2047. Education is one of the prime forces that would lead in developing a knowledge-based, skill-based, and innovation-based society that would cater to future socio-economic requirements. The present paper would explore the use of digital tools, AI, and digital literacy that would change the education sector. The use of digital or online learning tools such as the Learning Management System (LMS), online classrooms, online assessment systems, and Open Educational Resources (OERs) has significantly impacted the accessibility, engagement, and flexibility of learning. Additionally, the use of artificial intelligence has reinforced this shift with the adoption of adaptive learning systems, smart learning or tutoring systems, self-assessment systems, learning analytics systems, and virtual assistants. Along with the various advancements that have occurred in the field of learning, the importance of digital literacy cannot be ignored.*

*This paper has particularly brought out the challenges of the digital divide, infrastructure issues, the absence of trained teachers, data protection issues, and the ethics of using AI in education. Special attention has been paid to the importance of teachers and education institutions in disseminating quality digital education and the interventions of the National Education Policy-2020 policy document, Digital India, SWAYAM, and DIKSHA in this area.*

*The conclusion drawn from this study suggests that a smart and proper implementation of digital technology, AI, and digital literacy can greatly help improve learning outcomes, encourage innovation, and bring equity into society. This will help make India future-ready citizens and achieve the dream of 'Viksit Bharat 2047'.*

**Keywords:** Digital Tools, Artificial Intelligence, Digital Literacy, Education, Viksit Bharat 2047

#### Introduction

Education is an integral part of creating human capital as well as development within a country. With the onset of the digital age, the face of conventional education has started undergoing radical changes due to technological developments. The development of tech-based learning solutions and Artificial Intelligence has brought about a sea change in the field of education as well as the management of institutions in India, as the country has a vision to become a developed nation by 2047 that is Viksit Bharat, the 100<sup>th</sup> year of Independence.

Being digitally literate has emerged as a critical life skill in the 21st century, The digital tools promote inclusive and equitable education ensuring access to quality learning for students across urban and rural areas as it helps people fully engage with the digital economy and knowledge society. Therefore, incorporating the use of digital tools, AI supports innovations, skill based, oriented learning, preparing learners for future careers in entrepreneurship, science, technology and research fields. AI into the education sector is a matter of imperative rather than choice for the achievement of sustainable development goals



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## Digital Tools in Education:

Digital literacy empowers students to become responsible digital citizens capable of ethical technology use, critical thinking and promotes for lifelong learning. By digital tools, one means the electronic resources or software that aid learning, through digital platform students can learn any time and any where fostering self directed and lifelong learning. The digital tools are:

1. Learning Management Systems (LMS) like Moodle, Google Classroom, Canvas
2. Computers, tablets, interactive white boards.
3. Virtual conferencing tools such as Zoom, Google Meet, Microsoft Teams
4. Educational apps and simulations
5. Digital libraries and Open Educational Resources (OER)
6. Online tests, assignments, and feedback tools

## Educational Significance:

Digital tools now a days have become an essential of teaching and learning, they make learning more interesting, interactive and effective through visuals and animations. Digital tools improve autonomy, teamwork, and assessment of learners. They enable flexible learning, including distance education, making education more accessible beyond the classroom, including in remote locations.

## Artificial Intelligence in Education:

Artificial Intelligence is defined as computer systems with the ability to perform tasks that require human intelligence. In the world of education, artificial intelligence supports teachers, learners and assessment practices. It reduces teachers' burden, helps to organize the resources devote more time to guidance and supports students. It helps and guides the needy areas of improvement and encourage and continuous learning.

## AI Applications

### AI applications are

- Learning management software
- Intelligent tutoring systems
- Automated assessment and grading
- Learning analytics and predictive models
- Chatbots and virtual assistants that use artificial intelligence

## Benefits of AI

AI helps people complete tasks more quickly and accurately. It is useful in many fields such as Education, health care and daily life making services more efficient and reliable. AI assists with customized learning, helps determine skills required by learners, relieving the lecturer of burden, as well as improving decision-making through analysis of data.

## Digital Literacy - Concept and Components

Digital literacy is the capacity to use digital devices, technologies effectively, critically, responsibly and safely.

### Components

- Information and media literacy (To use online information, skill to search, evaluate)
- Digital skills (Ability to use devices like smart phone, computers, software applications)
- Cyber Safety & Digital Ethics (Knowledge of online security, safe internet practices, ethical use of digital content)
- Communication and collaborative skills (Using social media, Emails, Digital platforms and communicate effectively)

## Importance in Education

Digital literacy enables students and teachers to use technology with assurance, underpins lifelong learning, and provides an edge in employability within a digital economy.

## Problems of Implementing Digital Tools and AI

Despite their benefits, there are still some challenges that exist:

- Digital Divide and Inequitable Access (gaps between urban and rural learners)
- Teachers' lack of digital skills
- Data privacy and ethical issues (Lack of privacy)
- Resistance to Technological Change

To overcome these challenges, it is important that attention be given to digital education that benefits all



## **Role of Teachers and Institutions**

Educators are used as facilitators in digital learning. Professional development, digital pedagogy, and support by institutions are key to success. Investment in infrastructure, support teachers by training, innovation, and appropriate adoption of AI technology in institutions are necessary.

## **Policy Initiatives and Indian Context**

Schemes such as Digital India, NEP 2020, SWAYAM, DIKSHA, E-vidya and the National Digital Education Architecture (NDEAR) focus on the integration of technology and digital literacy. All the above programs are in line with the objectives of Viksit Bharat 2047. When digital skills and artificial intelligence are thoughtfully incorporated into education, this skill help India to shape capable professionals, innovative minds and globally competitive leaders. Hence the purposeful integration of digital tools, AI and digital literacy in education is fundamental to achieve the vision of Viksit Bharat at 2047 and shaping strong future oriented India.

## **Conclusion**

The integration of digital tools, Artificial Intelligence, and digital literacy holds huge potential for the transformation of education in the Indian scenario. AI and digital tools can greatly enhance teaching and learning by providing instant feedback personalized instruction and vast resources on the one hand, digital tools increase accessibility and engagement, while on the other, Artificial Intelligence allows for personalized learning. Moreover, digital literacy helps in the proper use of technology. A balanced, inclusive, as well as ethical, digital education strategy is the need of the hour to overcome the hurdles of digital education and make future-ready citizens. This will greatly add to the development of the nation with the attainment of 'Viksit Bharat 2047'. Yet AI cannot replace teachers as the human qualities of guidance, empathy, inspiration, critical thinking which are necessary for holistic education. Teacher will always remain the heart of the learning process, while AI serves as a powerful tool to enhance their role.

## **References**

1. Government of India (2020). National Education Policy 2020.
2. UNESCO (2018). ICT in Education: Policy and Practice.
3. OECD (2021). Artificial Intelligence in Education.
4. Selwyn, N. (2019). Education and Technology: Key Issues and Debates.
5. Ministry of Education, Government of India. Digital Education Initiatives.



## Original Article

### E-Resources and Their Impact on Academic Libraries

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#### Abstract

*The emergence of electronic resources (e-resources) has brought a significant transformation in the functioning of academic libraries. With the advancement of information and communication technology, libraries have shifted from print-centric collections to hybrid and digital environments. E-resources play a crucial role in supporting teaching, learning, and research by providing instant, remote, and multi-user access to scholarly information. This paper discusses the concept and types of e-resources, examines their impact on academic libraries, highlights associated challenges, and explores future trends. The study concludes that effective management and utilization of e-resources are essential for strengthening academic library services in the digital age.*

**Keywords:** E-resources, Academic Libraries, Digital Information, E-journals, ICT

#### Introduction

Academic libraries are central to higher education institutions, serving as gateways to knowledge and scholarly communication. Traditionally, these libraries relied heavily on printed books, journals, and reference materials. However, the rapid growth of information technology has led to the proliferation of electronic resources, fundamentally changing the nature of library collections and services. E-resources have become indispensable tools for academic libraries, enabling users to access vast amounts of information beyond physical boundaries (Borgman, 2000).

#### Concept and Types of E-Resources

E-resources are information sources available in electronic or digital format that can be accessed through computers and networked environments. These resources are either locally hosted or remotely accessed via the internet. Major types of e-resources include:

- Electronic books (e-books)
- Electronic journals (e-journals)
- Online bibliographic and full-text databases
- Institutional repositories
- Electronic theses and dissertations (ETDs)
- Open access resources
- Multimedia and learning objects

These resources support academic activities by offering advanced search features, hyperlinks, and citation management tools.

#### Impact of E-Resources on Academic Libraries

##### 1. Improved Access to Information

E-resources provide 24×7 access to information irrespective of location. Multiple users can access the same resource simultaneously, which is not possible with print collections (Tenopir & King, 2008).



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## 2. Enhancement of Teaching and Research

Faculty members and researchers benefit from updated and peer-reviewed content available through e-journals and databases. E-resources facilitate interdisciplinary research and improve the quality of academic output (Kumar & Biradar, 2010).

## 3. Transformation of Library Services

These resources support academic activities by offering advanced search features, hyperlinks, and citation management tools.

## Impact of E-Resources on Academic Libraries

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### 2. Enhancement of Teaching and Research

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### 3. Transformation of Library Services

The availability of e-resources has led to the introduction of digital reference services, online information literacy programmes, remote access services, and virtual learning support.

### 4. Cost and Space Efficiency

Although subscription costs of e-resources are high, they reduce expenses related to printing, binding, and physical storage. Academic libraries can utilize saved space for collaborative learning and research activities.

### 5. Changing Role of Librarians

The role of librarians has shifted from custodians of books to information managers, digital curators, and trainers. Librarians are now involved in licensing, consortia management, and user education in digital environments.

## Challenges in Managing E-Resources

Despite their advantages, e-resources present several challenges to academic libraries, including:

- High subscription and renewal costs
- Licensing and copyright restrictions
- Dependence on technological infrastructure
- Digital literacy gaps among users
- Long-term preservation and access issues

## Future Trends

The future of academic libraries lies in the integration of print and digital resources through hybrid library models. Open access publishing, institutional repositories, artificial intelligence, and data analytics are expected to further enhance e-resource management and user services.

## Conclusion

E-resources have profoundly influenced academic libraries by expanding access to information, improving research efficiency, and modernizing library services. While challenges persist, effective management, continuous training, and sustainable funding can maximize the benefits of e-resources. Academic libraries must embrace digital transformation to remain relevant and responsive to the evolving needs of users.

## References

1. Borgman, C. L. (2000). From Gutenberg to the global information infrastructure: Access to information in the networked world. MIT Press.
2. Haridasan, S., & Khan, M. (2009). Impact and challenges of e-resources in higher education. *DESIDOC Journal of Library & Information Technology*, 29(2), 19–27.
3. Hawkins, D. T. (2001). Electronic journals, publishing, and the future. *Online Information Review*, 25(4), 254–261. <https://doi.org/10.1108/14684520110410493>
4. Kumar, B. T. S., & Biradar, B. S. (2010). Use of electronic resources by faculty members and students of universities in Karnataka state. *Annals of Library and Information Studies*, 57(1), 33–42.
5. Tenopir, C., & King, D. W. (2008). Electronic journals and changes in scholarly article seeking and reading patterns. *Aslib Proceedings*, 60(1), 5–22. <https://doi.org/10.1108/00012530810845785>
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## Original Article

### Good Governance and Administrative Reforms in India

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#### Abstract

Good governance has emerged as a central concern in public administration, emphasizing transparency, accountability, efficiency, participation, and rule of law. In India, administrative reforms have played a crucial role in strengthening democratic governance and improving public service delivery. Since independence, the Indian administrative system has undergone multiple reforms aimed at addressing challenges such as corruption, bureaucratic inefficiency, centralization, and lack of citizen engagement. This paper examines the concept of good governance, traces the evolution of administrative reforms in India, analyzes major reform initiatives, and evaluates their impact on governance outcomes. The paper also highlights persistent challenges and suggests measures to strengthen good governance through effective administrative reforms.

**Keywords:** Good Governance, Administrative Reforms, Transparency, Accountability, Public Administration, India

#### Introduction

Governance refers to the process by which authority is exercised in the management of a country's economic, social, and administrative affairs. In a democratic country like India, governance is not merely about rule by the government but about ensuring justice, equity, and welfare for citizens. The concept of good governance gained prominence globally in the 1990s and has since become a guiding principle for public administration reforms.

India, with its vast population and complex socio-economic structure, faces unique governance challenges. Administrative reforms are essential to enhance institutional capacity, improve efficiency, and ensure responsiveness to citizens' needs. This paper explores how administrative reforms have contributed to promoting good governance in India.

#### Concept of Good Governance

Good governance is a normative concept that describes how public institutions conduct public affairs and manage public resources.

#### Characteristics of Good Governance

According to international and national governance frameworks, good governance includes the following elements:

1. Transparency – Openness in decision-making and access to information
2. Accountability – Responsibility of public officials for their actions
3. Rule of Law – Fair legal frameworks enforced impartially

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4. Participation Involvement of citizens in governance processes
5. Responsiveness – Institutions serving stakeholders within a reasonable time
6. Effectiveness and Efficiency – Optimal use of resources
7. Equity and Inclusiveness – Ensuring all sections of society benefit Good governance ensures legitimacy of the state and enhances public trust in administration.

## **Administrative System in India**

India inherited its administrative structure largely from the British colonial system. The Indian Civil Services were designed to maintain law and order rather than promote development or welfare.

## **Features of Indian Administration**

1. Strong bureaucratic structure
2. Centralized decision-making
3. Hierarchical organization
4. Emphasis on rules and procedures

While this system ensured stability, it also resulted in rigidity, red tape, and lack of innovation—making reforms necessary.

## **Evolution of Administrative Reforms in India**

Early Reform Efforts (1947–1964)

1. Post-independence, reforms focused on:
2. Nation-building
3. Economic planning
4. Expansion of public sector

However, administrative efficiency and accountability received limited attention.

## **Administrative Reforms Commission (ARC), 1966–1970**

The First ARC, chaired by Morarji Desai, submitted 20 reports covering:

1. Administrative efficiency
2. Centre-State relations
3. administration
4. Citizen grievances

It laid the foundation for systematic reform, though implementation remained partial.

## **Economic Reforms and Governance (1991 onwards)**

Economic liberalization exposed weaknesses in governance and bureaucracy, leading to:

1. Demand for transparency
2. Reduction of license-permit raj
3. Emphasis on performance and accountability

## **Major Administrative Reforms Promoting Good Governance**

Second Administrative Reforms Commission (2005–2009)

The Second ARC, chaired by Veerappa Moily, focused explicitly on good governance. Its key recommendations included:

1. Citizen-centric administration
2. Ethics in governance
3. e-Governance
4. Local governance
5. Public service delivery reforms

## **Right to Information Act, 2005**

RTI is a landmark reform that:

1. transparency
2. Empowers citizens
3. Reduces corruption
4. Enhances accountability
5. It transformed the relationship between the state and citizens.

## **E-Governance Initiatives**

Digital governance initiatives include:



1. Digital India
  2. Aadhaar
  3. Direct Benefit Transfer (DBT)
  4. Online public service portals
- These reforms improved efficiency, reduced leakages, and enhanced accessibility.

### **Decentralization and Local Governance**

The 73rd and 74th Constitutional Amendments strengthened:

1. Panchayati Raj Institutions
2. Urban local bodies
3. Grassroots democracy
4. Decentralization promotes participation and responsiveness.

### **Role of Ethics and Accountability in Governance**

Ethics form the moral foundation of good governance. Administrative reforms emphasize:

1. Codes of conduct for civil servants
2. Vigilance mechanisms
3. Anti-corruption institutions
4. Performance appraisal systems
5. Ethical governance ensures integrity and public trust.

### **Challenges in Achieving Good Governance in India**

Despite reforms, several challenges persist:

- a. Corruption and Rent-Seeking
- b. Political Interference in Administration
- c. Bureaucratic Resistance to Change
- d. Capacity Constraints
- e. Digital Divide in e-Governance
- f. Weak Implementation of Reforms

These challenges hinder the realization of full governance potential.

### **Impact of Administrative Reforms on Governance**

Administrative reforms have led to:

- a) Improved service delivery
- b) Greater transparency
- c) Increased citizen participation
- d) Better financial management

However, the success of reforms varies across regions and sectors.

### **Suggestions for Strengthening Good Governance**

- a. Strengthen civil service training and capacity building
- b. Ensure political-administrative neutrality
- c. Improve accountability mechanisms
- d. Promote outcome-based governance
- e. Enhance citizen engagement
- f. Ensure effective implementation of reform recommendations

### **Conclusion**

Good governance and administrative reforms are interdependent. In India, reforms have significantly improved transparency, accountability, and service delivery. However, governance is a continuous process that requires sustained political commitment, institutional strengthening, and citizen participation. Effective implementation of reforms is crucial to ensure that governance remains inclusive, responsive, and ethical.

### **References (sample – can be expanded)**

1. Administrative Reforms Commission Reports
2. Indian Constitution
3. Right to Information Act, 2005
4. Second Administrative Reforms Commission (Government of India)
5. Public Administration textbooks and journals



## Original Article

### Dalit Movements in India: A Reflection

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#### Abstract

*Dalit movements are protest or a kind of revolution to bring change in the society based on social justice. This paper examines the journey and impact of Dalit movements, which fight against caste discrimination and untouchability. The history of Dalit movements and their modern forms show how activism has evolved from traditional protests to digital campaigns, legal efforts, and cultural expressions. It also highlights how the Dalit struggle connects with other issues like gender, class, and religion. The internal debates about strategies and partnerships within the movement, pointing out both challenges and opportunities are discussed. The contributions of Dalit thinkers, artists, and activists to Indian society are emphasized, along with their push for policy reforms, social inclusion, and empowerment. Overall, the paper portrays the Dalit movement as a flexible and evolving force, focused on achieving justice and equality in changing times.*

**Keywords:** Dalit Movements, Untouchability, Social Justice, Activism, Digital campaigns, Policy Reforms, Social Inclusion, Empowerment, Equality.

#### Introduction

In India, there's a group of people called Dalits who were once called untouchables, and have faced discrimination and unfair treatment due to their caste. They faced issues like being excluded, treated unfairly, and even violence. However, Dalits have started movements to fight against this mistreatment, advocating for dignity and respect. Pre-colonial society saw the emergence of Bhakti and social reform movements like those led by Jyotiba Phule and Savitribai Phule, challenging caste inequalities and advocating for inter-caste marriages and education for Dalits. The British introduced rules like the Poona Pact and the Government of India Act in 1935 to help Dalits, but these were the part of the British system. Dr. B.R. Ambedkar, a Dalit leader and scholar, played a pivotal role in mobilizing Dalit communities and fighting for Dalit rights. Despite India's independence, discrimination against Dalits continued, and groups like the Dalit Panthers emerged in the 1950s and 1960s, pushing for fair treatment in terms of money, land rights, and special policies.

Dalit movements have been fighting against the caste system, pushing back against centuries of being marginalized and oppressed. While the focus is still on securing basic human rights, modern Dalit activism comes in various forms. Protests aren't just the way they used to be. Now, using laws, online platforms, and cultural actions are powerful ways to spread awareness, bring people together, and break down caste systems. New Dalit groups and collectives are tackling specific issues such as education, jobs, land rights, and sexual violence. This shows how the movement is adapting with a dynamic and nuanced approach

#### Objectives of the Study:

- To examine the contemporary expressions of Dalit Activism and its strategic diversity
- To analyze the challenges and opportunities for Dalits.



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- To understand the intersectionality in Dalit Movements.
- To Explore Dalit contributions to Indian Society and Democracy.

## Methodology of the Study:

The paper is based on secondary data collected from books, research articles and websites

## Nature of Dalit Movements:

1. **Historical Struggle:** Dalits, once called untouchables, have faced exclusion and violence for a long time. The movements want to fix these past wrongs.
2. **Equality and Respect:** Dalit movements aim to make sure that Dalit communities are treated equally and with respect. This means challenging unfair traditions that have hurt them for a very long time.
3. **Fair Treatment:** These movements want things to be fair for Dalits, especially in terms of education, jobs, and land rights. The goal is to help Dalits improve their lives and reduce existing inequalities
4. **Getting Involved in Politics:** Dalit leaders and groups are actively getting involved in politics to make sure that Dalits have a say in decision-making. They also demand for policies that help Dalit communities.
5. **Changing Laws:** Dalit movements work towards changing laws that allow discrimination. They want to make sure there are legal protections for Dalits and that untouchability is completely eliminated.
6. **Breaking down Caste Divisions:** The movements challenge the old system that puts some people higher and others lower. They want a more inclusive and fair society, questioning and changing caste-based biases and norms.
7. **Never Giving Up:** These movements stay active, changing their strategies to deal with new problems. They keep fighting to make sure Dalits are treated fairly and discrimination is eliminated.

## Shifting Landscapes of Dalit Activism:

The contemporary Dalit movement in India has expanded beyond traditional methods of protest such as bandhs and dharnas. Instead, it has embraced new avenues such as legal advocacy to fight discrimination and ensure legal protections. Legislation like the Protection of Civil Rights Act and affirmative action policies are become essential tools in this regard. Additionally, digital activism has become a powerful means for Dalits to share their personal stories and challenge the dominant caste narratives on popular platforms like Twitter and Facebook. Furthermore, cultural expressions, including literature and music, have emerged as powerful tools to reclaim Dalit identity and challenge societal norms.

## Shifting Strategies:

- Move from physical protests to legal advocacy, utilizing laws like POCRA and affirmative action policies.
- Embrace digital activism, raising awareness and sharing experiences online through social media.
- Employ cultural interventions, including literature, art, music, and film, to reclaim identity and challenge narratives.
- Engage with institutions of power, navigating political representation and the judiciary strategically.

## Intersectional Struggles and Alliances:

Caste cannot be understood in isolation. It intersects with other forms of oppression like gender, class, and religion, shaping the lived experiences of Dalit communities. Dalit women, for instance, face the compounded burden of caste and gender discrimination, they need to work with groups fighting for women's rights. Similarly, Dalits who follow different religions face their own challenges, and we need to work together to help them.

## Intersectional Struggles:

1. **Recognizing the Intersection of Caste with Other Forms of Oppression:** The Dalit movement is increasingly recognizing that caste isn't the only factor causing marginalization. It intersects with other forms of oppression like gender, class, and religion, creating unique challenges for different individuals and groups within the Dalit community. For example, Dalit women face the combined burden of caste and gender discrimination. They experience not only the social and economic exclusion associated with being Dalit but also the patriarchal practices within their own community and wider society.
2. **The Specific Challenges of Dalit Women:** Dalit women are among the most disadvantaged groups in India. They face not only the general discrimination experienced by Dalits but also the specific vulnerabilities associated with their gender. This includes:
  - Higher rates of sexual violence and harassment.
  - Limited access to education and employment opportunities.
  - Greater risk of trafficking and exploitation.
  - Double discrimination within their own communities due to patriarchal norms.Therefore, the Dalit movement prioritizes collaborations with feminist movements to:
  - Challenge gender inequalities within Dalit communities.
  - Advocate for better legal protection and social support for Dalit women.



- Empower Dalit women through education, skill training, and economic opportunities.

### 3. Building Solidarity with Religious Minorities:

Within the Dalit community, there are significant populations of religious minorities like Christians and Muslims. They face specific challenges related to their religion, such as:

- Discrimination and violence from dominant religious groups.
- Exclusion from religious institutions and practices.
- Difficulties accessing government benefits and resources.

#### **Building solidarity with religious minorities within the Dalit movement allows for:**

- Joint advocacy for religious freedom and equality.
- Sharing experiences and best practices for overcoming discrimination.
- Creating a more inclusive and united front against all forms of oppression.

By recognizing the intersections of caste with other forms of oppression and building alliances with other marginalized groups, the Dalit movement can effectively address the unique challenges faced by its diverse members and work towards a more equitable society for all.

#### **The Digital Dalit Public Sphere:**

The internet has revolutionized Dalit activism, creating a space for Dalit voices to be heard beyond traditional media channels. Social media helps Dalits talk about and show the discrimination they face, making people upset and holding those responsible accountable. Dalit leaders and online groups offer support and togetherness, creating a feeling of belonging. But the online world has its problems. Hateful words and discrimination online are big challenges. People need to be good at using the internet and have strong support to handle these issues. Knowing both the good and bad sides of the internet is important for making it work for the Dalit movement.

The internet has revolutionized the way the Dalit movement operates, presenting both immense opportunities and significant challenges.

#### 1. Utilizing social media: Empowerment and Community Building

- **Documenting Discrimination:** Social media platforms like Twitter and Facebook provide a powerful platform for Dalits to directly share their experiences of caste-based discrimination, often bypassing traditional media filters. This documentation serves as evidence, raises public awareness, and holds perpetrators accountable.
- **Mobilizing Support:** The internet allows for rapid mobilization of Dalit communities and allies around specific issues. Petitions, campaigns, and protests can be organized within minutes, reaching a wider audience and attracting international attention.
- **Building Community:** Online forums and social groups connect Dalits across geographical boundaries, fostering a sense of belonging and shared identity. This virtual community provides critical support, resources, and opportunities for collaboration.

#### 2. Navigating Online Challenges: Hate Speech and Misinformation

- **Caste Hate Speech:** The digital world, unfortunately, provides fruitful ground for the spread of caste hate speech and online discrimination. This can cause significant emotional and psychological harm to Dalits and further marginalize their communities.
- **Misinformation:** Fake news and misinformation targeting Dalits can increase prejudices and stereotypes, hindering progress towards social justice. **Digital Literacy and Support:** Addressing these challenges requires equipping Dalits with digital literacy skills, including recognizing hate speech, reporting mechanisms, online safety practices, and responsible content creation. Robust online support networks and legal aid resources are also crucial to provide emotional and legal support to victims of online abuse.

#### 3. Harnessing the Power of Online Engagement: Amplification and Awareness

- **Raising Awareness:** Through personal narratives, creative expressions, and critical analyses, Dalits can challenge dominant narratives, raise awareness about caste-based discrimination, and educate the public on the realities of their lives.
- **Strengthening Dalit Voices:** Online platforms empower Dalit activists, intellectuals, and artists to bypass traditional media gatekeepers and directly reach global audiences, strengthening their voices and perspectives on a global stage.
- **Building Solidarity:** The internet facilitates connections with allies from diverse backgrounds, including feminists, human rights organizations, and other marginalized groups. This fosters collaboration, builds broader coalitions for social justice, and creates a united front against oppression.

The digital public sphere offers the Dalit movement a powerful tool for empowerment, community building, and global engagement. By strategically using online platforms, the Dalit movement can effectively raise awareness, strengthen its voice, and advance its fight for a more just and equitable society.



## Internal Debates and Divergent Paths:

The Dalit movement is not all the same. There are different ideas and ways of doing things, from radical political groups wanting big changes to cultural groups wanting to learn about Dalit history. Some like strong protests, while others prefer education and helping themselves, or getting into politics. Even though they might argue sometimes, these debates show how the movement can change and adjust.

Dalit movements today have a lot of different ideas and ways of doing things, showing how diverse and complex the Dalit community is. It talks about how these movements work on the inside, pointing out that they have both radical politics and cultural revivalism happening at the same time. The study argues that it's crucial to understand and accept these diverse ideas, have positive discussions within the movements, and work together for common goals.

1. **Recognizing Diverse Ideas:** In the Dalit movements, people have different ways of thinking. Some want big changes in the system, like new rules and revolutionary methods. Others focus on celebrating and taking pride in Dalit identity and heritage.
2. **Embracing Talking Things Out:** It's good that people in the Dalit movements talk and discuss things among themselves. This shows that they are dynamic and can adapt to changes. These discussions help them grow smarter, avoid getting stuck in one way of thinking, and make sure the movement can deal with the different problems faced by the Dalit community as things change over time.
3. **Working Together for Common Goals:** Even if people in the movement disagree on some things, it's crucial that they join hands for the main goals – making society fair and equal. They might have different plans and priorities, but by teaming up, they create a stronger and more effective force.
4. **Explaining Teamwork:**
  - a. **Being Smart with Plans:** Working together lets Dalit movements be smart with their plans. Some might focus on changing laws, while others work with communities directly.
  - b. **Power in Numbers:** When different groups come together, they become a bigger force. More people join, and they get support from others who want to help. This makes the movement's voice louder and stronger, making it harder for unfair things to continue.

## Dalit Contributions to Democracy and Society:

The Dalit movement in India has done more than just fighting for basic rights. Dalit intellectuals, through their writings and studies, have questioned the stories that people commonly believe in, making Indian literature, philosophy, and history more interesting. Artists and filmmakers from the Dalit community have changed how things look and challenged what people think through their creative work. Musicians and performers have brought back and celebrated Dalit traditions, making the community feel proud of who they are. Here's a simple look at what they've done:

1. **Smart Thinkers and Creative People:**
  - **Great Writers:** People like Dr.B.R. Ambedkar, Soubhagya Ratnakar, and Mahasweta Devi wrote powerful stories to show how caste discrimination is unfair. They made everyone talk about these issues and changed how people see Indian society.
  - **Artistic Expressions:** Dalit artists like JyotibaPhule, SavitribaiPhule, and E.V. RamasamyPeriyar used art to fight against caste differences. Phule painted pictures showing the problems Dalit communities face, while Periyar's movement used pictures to challenge the power of certain groups.
2. **Adding Flavour to Indian Art and Culture:**
  - **Changing Stories:** Dalit people have added their own stories to Indian art, music, and literature, telling different tales that aren't focused on caste. This gives a voice to those who are usually left out.
  - **Celebrating Who They Are:** Dalit artists celebrate their own culture, traditions, and customs, making the community proud of who they are.
  - **Making People Understand:** By sharing their own experiences, Dalit artists and writers help people from different backgrounds understand each other better.
3. **Helping Indian Democracy:**
  - **Fighting for Equal Rights:** Dalit movements fought against unfair treatment and untouchability, asking for equal rights for everyone.
  - **Making Everyone Citizens:** They worked to make sure Dalit communities get all the rights of full citizens and aren't left out.
  - **Making Things Fair:** Dalit movements asked for special policies like reservations in education and jobs to help Dalits move up in society.



## Their Contributions:

- **Including Everyone:** Dalit movements make sure that everyone's voice is heard, making Indian democracy fairer and more equal.
- **Making Things Right:** Their fight for equal rights makes society fairer and more just.
- **Talking About Important Things:** By challenging old ideas about caste, they make people talk about important issues that need to change.

**Contemporary Reflections on Dalit Movements:** Thinking about the situation of Dalit movements today, we see both good progress and some tough challenges.

1. **New Groups, New Fights:** Some new Dalit groups are focusing on specific issues like education, jobs, and land rights. They're helping their communities understand and claim their rights, dealing with problems that matter in their everyday lives.
2. **Making Money and Being Independent:** Dalit people are starting their own businesses more, which is making them more independent. By creating opportunities for themselves, they're breaking free from unfair situations.
3. **Art for Healing:** Artists among the Dalit community are using art not just to protest but also to heal and stay strong. Through music, plays, and visual arts, they share their stories, deal with tough experiences, and inspire hope.

## These contemporary reflections paint a complex picture:

1. **Violence Still Happens:** Sadly, some Dalits still face violence and discrimination. This shows that even though there have been improvements, there are still big problems that need to be fixed.
2. **Debates about How to Fight:** People are still arguing about the best way to fight for what is right. Some say it's best to directly challenge unfair systems, while others think it's better to work within the current structures. Figuring out the right balance is a big challenge.

## Overall Picture:

1. **Getting Better:** More voices are speaking up, people are becoming economically stronger, and artists are expressing themselves more. This shows that Dalit communities are becoming more independent and resilient.
2. **Still Tough Challenges:** Violence and discrimination are still happening, and there is ongoing debate about the best way to fight for fairness. It's a reminder that the fight for equality is not finished.

## What Should Happen Next?

1. **Listen to Different Voices:** Pay attention to the concerns of new Dalit groups and support them.
2. **Cheer on Businesses:** Encourage Dalit entrepreneurs and make sure they have the same chances as everyone else.
3. **Support Healing through Art:** See art as a way to make things better and support artists who are making a difference.
4. **Stand against Violence:** Make sure there are consequences for violence and work for better protection.
5. **Talk and Find Solutions Together:** Have good conversations about the best ways to make lasting changes for the better.

## Findings of the study:

1. The paper highlights the various forms and expressions of contemporary Dalit activism, including legal advocacy, digital engagement, cultural interventions, and the formation of new Dalit groups addressing specific concerns.
2. It acknowledges the complex interplay of caste with other forms of oppression like gender, class, and religion, emphasizing the need for intersectional approaches and alliances.
3. The paper explores the challenges and opportunities presented by the digital sphere and internal debates within the Dalit movement regarding strategies and priorities.
4. It also emphasizes the significant contributions of Dalit intellectuals, artists, and cultural producers to Indian society and democracy.

## Conclusion:

This paper explains that the Dalit movement in India is a complex fight against caste discrimination. It shows how the movement has grown over time, using both old and new methods, like legal actions, online campaigns, and cultural efforts. Although there are still many difficulties such as internal disagreements and ongoing violence—the movement keeps evolving and moving forward. The paper also stresses that everyone's involvement is important to create a society where caste no longer controls a person's life. It ends on a hopeful note, believing that with continued support and collective efforts, a fair and equal future can be achieved.

## References

1. Thakur, A. K. (2020). New Media and the Dalit Counter-public Sphere. *Television & New Media*, 21(4), 360-375.
2. Kshirasagara, R. (1994). *Dalit movement in India and its leaders, 1857-1956*. MD Publications Pvt. Ltd.



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3. Ghurye, G. S. (1969). *The Dalit Movement in India: A Sociological Perspective*. Popular Prakashan.
4. Jangam, C. (2017). *Dalits and the making of modern India*. New Delhi: Oxford University Press.
5. *Annihilation of Caste: The Annotated Critical Edition* by B.R. Ambedkar (1936)
6. Omvedt, G. (1994). *Dalits and the democratic revolution: Dr. Ambedkar and the Dalit movement in colonial India*. Sage publication.
7. KC, Diwas Raja (2016). *Dalit: A Quest for Dignity*. Offset ProjectsDevi, V. (2004). *Dalit Women: Their Lives and Struggles*. Orient Blackswan.
8. Pawde, K. (2002). *Dalit Women: Voices from the Margins*. Sage Publications India.e.  
Reports and Websites:
9. *The Dalit Foundation*: This website offers a comprehensive resource on Dalit issues in India, with regular news updates, reports, analysis, and multimedia content showcasing Dalit voices and perspectives.
10. *Equality Now's Caste report*: This report explores the intersection of caste and gender discrimination in India, particularly focusing on violence against Dalit women, and proposes advocacy strategies for promoting greater equality and justice.
11. *National Campaign on Dalit Human Rights (NCDHR)*: This organization works to defend the human rights of Dalits in India, providing legal support, documenting atrocities, and campaigning for reforms. Their website offers valuable resources and reports on contemporary Dalit struggles.  
Documentaries and Films:
12. *Jai BhimComrad* (2011): Directed by Anand Patwardhan, this documentary is a musical journey that addresses the struggles and resistance of Dalits in India.
13. *Dalit Visions: The Anti-Caste Movements and the Construction of an Indian Identity*" by Gail Omvedt.
14. "Which is Violence? Reflections on Collective Violence and Dalit Movements in South India" by Hugo Gorringe.



## Original Article

### AI in Academic Libraries: Futures and Opportunities

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#### Abstract

*The transformation of academic libraries is being significantly influenced by artificial intelligence (AI), which is evolving them into dynamic hubs for learning, scholarly inquiry, and knowledge dissemination. The existing uses of AI, such as chatbots, automated cataloguing, recommendation systems, and data analytics, are examined in this article along with potential uses, such as improved information finding, individualised support, administrative automation, and ethical inclusion. To address issues such as budgetary constraints, a shortage of skilled workers, and data privacy concerns, ethical frameworks and training programs are used. By citing the American Library Association (ALA) and the International Federation of Library Associations and Institutions (IFLA), it highlights how AI can improve efficiency, accessibility, and equity, thereby establishing libraries as essential leaders in higher education.*

**Keywords:** Academic Library Automation, Future of AI in Education, Artificial Intelligence in Libraries, Digital Accessibility in Libraries

#### Introduction

Academic libraries are only one of several industries that artificial intelligence (AI) is transforming. Libraries, as organisations committed to research, teaching, and knowledge sharing, are gradually incorporating AI to improve efficiency, customise services, and respond to changing user needs. This discussion clarifies the current state of AI in academic libraries and explores its future possibilities through real-world examples and expert viewpoints. It envisions libraries as dynamic hubs of innovation by using AI to move away from static archives. Machine Learning (ML), Natural Language Processing (NLP), and Computer Vision are just a few of the technologies that belong under the umbrella of artificial intelligence (AI) that enable computers to make sense of data and operate autonomously in academic libraries. These technologies enable more intricate interactions in addition to automating repetitive operations

#### Objectives of the study

- The article's goal is to outline the current uses of AI, such as chatbots, automatic cataloguing, recommendation systems, and data analytics, by employing statistics and real-world examples to showcase their benefits and adoption rates.
- It seeks to highlight new opportunities, including enhanced discovery tools, administrative automation, inclusive applications, personalised learning support, and synergies with AR and VR technology, while offering practical solutions for implementation.
- To promote responsible AI usage, the article addresses challenges like data privacy, skill shortages, costs, job displacement, and the digital divide, while proposing solutions such as training programs, ethical frameworks, and funding opportunities.

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By focusing on personalisation, accessibility, and equity, the article encourages libraries to create AI tools that cater to a diverse range of users, including those with disabilities or those in underserved areas, in accordance with international standards.

## **AI in Academic Libraries: Current State**

Artificial Intelligence (AI) is currently making its way into library functions, with uses that span from sophisticated data analysis to simple automation tasks. The level of integration depends on the organisation's size and resources; nonetheless, notable implementations are showing clear advantages. In the following sections, we outline modern applications with detailed explanations, statistical insights, and practical examples.

### **Chatbots and Virtual Assistants:**

Academic libraries increasingly use AI-powered chatbots and virtual assistants to respond to routine inquiries, freeing librarians to focus on more complex tasks. The University of Maryland introduced a round-the-clock chatbot in 2019 that reduced response times by half and processed more than 10,000 inquiries every month. These chatbots may direct complex questions to personnel, guaranteeing precision and excellent assistance. At universities such as Stanford, chatbots have been implemented into learning management systems (LMS) to make course information easier to access. A 2023 American Library Association (ALA) poll found that 60% of libraries reported increased customer satisfaction after implementing chatbots, despite initial setup costs of approximately \$15,000. Chatbots that speak multiple languages are increasingly becoming indispensable for helping international pupils.

### **Automated Cataloguing and Metadata Standards**

AI algorithms, particularly those based on Natural Language Processing (NLP), are transforming library cataloguing by automatically extracting metadata from digital resources such as text, images, and videos. Institutions like the British Library apply AI to manage extensive archival collections, where automated tagging has improved search accuracy by nearly 40% (British Library, 2023). These systems are trained on historical datasets to identify patterns in titles, authors, and subject terms. For instance, AI can automatically tag images in digital collections with keywords such as “Renaissance art,” significantly enhancing research discoverability.

### **Recommendations System**

Artificial intelligence is fundamentally transforming the discipline of library science by optimising both backend administration and frontend user engagement. By employing Natural Language Processing (NLP), institutions such as the British Library and the Library of Congress have mechanised metadata extraction and manuscript transcription, thereby reducing manual labour by as much as 70% and improving search accuracy. This structural optimisation is further enhanced by advanced recommendation systems on platforms like JSTOR and WorldCat. Utilising collaborative filtering akin to the methodologies of commercial streaming services, these systems examine borrowing behaviours and academic patterns to assemble tailored reading lists.

### **Data Analytics for Usage Insight**

AI employs advanced analytical techniques on circulation data through predictive modelling to anticipate demand, enhance library holdings, and inform acquisition strategies. Research conducted by the Association of Research Libraries (ARL, 2020) demonstrates that the implementation of AI technologies has enabled libraries to reduce overstock levels by 20–30% while simultaneously optimising budgetary allocations. Furthermore, AI plays a pivotal role in forecasting emergent trends, such as the heightened interest in AI-related literature during periods of technological advancement, enabling libraries to devise more strategic financial plans. Tools integrated with AI, such as Tableau, offer visual dashboards that empower librarians to observe real-time usage trends. For example, the Harvard University Library utilises AI to analyse peak usage periods, which informs staffing strategies and has resulted in a 15% reduction in operational expenditures (Harvard Library, 2021).



## Future Opportunities

### Personalised learning and research Support

Artificial intelligence (AI) enables personalised learning by analysing student data from Learning Management Systems (LMS) such as Canvas and Moodle. It caters to diverse learning preferences by suggesting interdisciplinary academic materials from sources like PubMed and JSTOR. Similar to platforms like Duolingo, which can boost retention rates by up to 20%, AI-powered adaptive learning modules adjust their difficulty based on student performance (Garcia & Patel, 2024). In the research field, particularly in medicine, AI accelerates discovery by identifying gaps in the existing literature and suggesting new ideas. To ensure ethical, consent-based data use, libraries can collaborate with AI companies to develop specialised tools (Williams et al., 2023). Effective implementation requires API-based system integration and proper training for librarians to comprehend and use AI-generated outputs.

### Enhanced discovery and Accessibility

Generative AI models like GPT-4 can condense intricate academic papers, convert them into more digestible formats, or even simplify them for those without specialised knowledge. Libraries might develop AI tools capable of conducting real-time literature reviews by analysing thousands of pages in mere seconds, aiding researchers in spotting trends in areas such as climate science. There are opportunities to collaborate with publishers to enhance knowledge accessibility by incorporating AI into open-access platforms. For example, AI could bridge accessibility gaps by translating complex publications into plain English for undergraduate students or non-native speakers. Additionally, the Library of Congress has demonstrated that computer vision AI can accurately scan handwritten archives and digitise them for worldwide access, achieving accuracy rates exceeding 95% (Library of Congress, 2022).

### Automation and Administrative Task

Artificial Intelligence (AI) and Robotic Process Automation (RPA) can employ sensors and machine learning algorithms to perform tasks such as inventory audits, overdue notifications, and even predictive maintenance for physical collections. This allows librarians to focus on strategic initiatives such as creating digital exhibits or fostering community engagement. AI can reduce human costs and errors by as much as 50% by automating shelving robots in extensive libraries (Thompson, 2021). Predictive analytics based on humidity data could alert staff to the deterioration of books, thereby preserving rare materials. For instance, the New York Public Library has tested AI for inventory management to allocate more staff to user-oriented duties.

### Inclusive and Ethical AI Applications

Artificial intelligence (AI) has the potential to enhance diversity by offering multilingual interfaces, enabling voice commands, and providing accessibility features for visually impaired individuals through tools such as screen readers. In the future, AI advancements could focus on identifying biases within datasets or implementing fairness algorithms to ensure diverse representation in recommendations. Libraries have the opportunity to set the standard for ethical AI, as demonstrated by initiatives from the International Federation of Library Associations (IFLA), including bias audits of training datasets (IFLA, 2023). For instance, AI systems could be developed using a variety of datasets to eliminate Eurocentric biases found in earlier recommendations. Furthermore, integrating with screen readers to deliver a completely accessible experience, voice-activated AI could provide significant advantages for individuals with disabilities. This aligns with international standards such as the Web Content Accessibility Guidelines (WCAG).

### Integration with Emerging Technologies

AI can create immersive library experiences, including interactive displays and virtual tours of historical archives, when paired with augmented reality (AR) and virtual reality (VR). AI and quantum computing may collaborate for data-intensive research tasks, such as genetic analysis in university labs. By superimposing information on traditional books, such as showing pertinent articles via a smartphone scan, expanding AI-powered augmented reality apps could improve on-site learning. By replicating historical libraries for instructional purposes, virtual reality simulations can increase engagement in remote learning (Garcia & Patel,



2024). Partnerships with IT firms could hasten this; experimental initiatives at universities like MIT have demonstrated increased student involvement.

## **Challenges and Considerations**

Opportunities abound, but in order to secure sustained AI integration, issues must be resolved. There are references for additional research and possible solutions for every problem.

## **Data Privacy and Ethics:**

Encryption and data de-identification are two ways to safeguard sensitive user data. Organisations must follow regulations like the General Data Protection Regulation (GDPR) to prevent artificial intelligence systems from reinforcing biases arising from imbalanced training datasets. Preventing privacy violations can be achieved by removing personal information from data before processing; however, companies should routinely evaluate the impartiality of AI systems, as biased algorithms may negatively affect particular groups (European Commission, 2018). Following guidelines like the NIST AI Ethics Guidelines is one suggested strategy.

## **Skill Gaps and Training:**

AI technology training is required for library staff, covering everything from simple coding to intricate data processing. Initiatives from groups like the American Library Association (ALA), which provides certificates, help bridge this gap. Employees may be able to oversee and analyse AI output through practical exercises utilising data management technologies like Python and courses on the ethics of AI (ALA, 2023). Higher education institutions and tech firms could collaborate to develop specialised programs.

## **Cost and Infrastructure:**

Implementing AI requires investing in tools and software, which can vary significantly in cost. For pooled assets, smaller organisations may use collaborative networks or free, open-source solutions. Although cloud services like Google Cloud AI can reduce initial investment costs, costs can range from \$10,000 for basic conversational bots to significant sums for extensive commercial deployments (Deloitte, 2022). Financial resources such as grants from the Mellon Foundation can help.

## **Fears of Job Displacement:**

While mechanisation may reduce entry-level positions, it also creates new opportunities in information management and AI supervision. Similar to the UK's National Health Service, where automation opened the door to more senior roles, libraries should develop retraining programs (UK Government, 2021). It is essential to have open communication and support while changing careers.

## **Digital Divide:**

It is imperative to ensure that all individuals, including those residing in isolated or underrepresented regions, benefit from artificial intelligence. This necessitates the creation of AI methodologies that operate independently of internet access or collaboration with telecommunications entities to enhance connectivity (UNESCO, 2023). This challenge may be addressed through initiatives such as the establishment of public Wi-Fi stations integrated with library AI systems.

## **Conclusion:**

The utilisation of artificial intelligence within academic libraries suggests that information access will become increasingly efficient, tailored, and user-centric in the foreseeable future. By deploying AI-enhanced services that encompass responsible automation and individualised support, libraries can preserve their essential role in higher education and scholarly research. Nevertheless, it is imperative to approach such initiatives with meticulous planning and adherence to ethical principles. As AI technologies evolve, libraries that adopt innovative practices will not only sustain their relevance but also thrive, thereby making substantial contributions to the evolution of academic inquiry and pedagogical methodologies. For further insights, readers are encouraged to consult scholarly publications and resources from organisations such as the Association of Research Libraries (ARL) and the International Federation of Library Associations and Institutions (IFLA). This article presents a thorough examination, with detailed sections that facilitate a deeper understanding of the topic.



## Reference

1. American Library Association. (2023). AI in libraries survey report. <https://www.ala.org/>
2. Association of Research Libraries. (2020). AI and library operations: A case study. Association of Research Libraries.
3. British Library. (2023). AI-driven cataloguing initiatives. <https://www.bl.uk/>
4. Deloitte. (2022). The cost of AI implementation in education. Deloitte Insights.
5. European Commission. (2018). General Data Protection Regulation (GDPR). <https://ec.europa.eu/>
6. Garcia, M., & Patel, R. (2024). AI and VR in academic settings. *Journal of Educational Technology*, 45(2), 112–125.
7. Harvard Library. (2021). AI analytics in circulation management. Harvard University.
8. International Federation of Library Associations. (2023). Ethical AI guidelines for libraries. International Federation of Library Associations.
9. Johnson, K., & Lee, S. (2021). Chatbots in university libraries: A Maryland case study. *Library Hi Tech*, 39(4), 789–802.
10. Library of Congress. (2022). Digital archiving with AI. <https://www.loc.gov/>
11. OCLC. (2022). WorldCat AI recommendations. <https://www.oclc.org/>
12. Smith, A. (2022). Post-pandemic digital shifts in libraries. *College & Research Libraries*, 83(1), 45–60.
13. Thompson, L. (2021). RPA in library management. *Information Technology and Libraries*, 40(3), 201–215.
14. (2018). Canada: International meeting in Ottawa on the future of libraries. MENA Report, ()



## Original Article

### Globalisation and its Continuous Influence on Tradition in 21st Century

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**Abstract**

*Globalisation in the twenty-first century has emerged as a powerful force reshaping cultural practices, social structures and economic relations across societies. This paper examines the continuous influence of globalisation on tradition, with specific reference to the Indian social context, while moving beyond simplistic arguments of cultural homogenisation. Drawing on key theoretical perspectives, including cultural flows, modernity and glocalisation, the study analyses how global and local forces interact to transform traditions rather than merely erode them. The paper engages with critical debates on power, representation and inequality, highlighting the marginalisation of subaltern voices, indigenous knowledge systems and tribal communities within dominant models of global development. Particular attention is given to the changing experiences of women, children and families, as well as the decline of traditional cultural practices such as handicrafts, folk arts, clothing and food traditions under market-driven globalisation. The discussion also explores cultural hybridisation in everyday life, evident in festivals, cinema and consumption patterns, alongside the growing influence of westernisation, technology and artificial intelligence on cultural labour and employment. By incorporating sociological analysis and literary representation, the paper presents a balanced assessment of globalisation's positive and negative impacts. It argues that while globalisation has intensified inequalities and cultural displacement, it has also generated new spaces for adaptation, resistance and cultural renewal. The study concludes that the future of tradition depends on inclusive policies, ethical engagement with technology and recognition of cultural diversity as a vital component of sustainable global development.*

**Keywords:** Globalisation, Tradition, Cultural Hybridisation, Indian Society, Westernisation

**Introduction: Globalisation and Tradition in the 21st Century**

The concept of globalisation in the twenty first century has become a complicated and ongoing cycle that has redefined the economic frameworks, cultural lifestyles and social relations in the globe. Globalisation does not manifest as a one-way process erasing tradition, but instead relates to local histories, belief systems and everyday practices in dissimilar and context-specific ways, and has multi-cultural effects as well as changes of a homogenous order (Appadurai, 2015). Once stable and comfortable traditions are being negotiated more and more in transnational flows of media, capital and migration to give way to new cultural forms and identities (Robertson, 2017). These interactions have altered family structures, consumption and social ambitions patterns as well as excited debates, which revolves around cultural continuity, adaptation and resistance in the contemporary social existence in such a society like India (Giddens, 2018).

**Conceptual and Theoretical Perspectives on Globalisation**

Conceptual and theoretical approaches to globalisation are keen on the fact that the cultural change in the modern world cannot be explained using mere homogenization narratives.



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The cultural dimension model prepared by Arjun Appadurai brings out the interaction between the global flows of culture and local localities, suggesting that cultural processes exist within disjunctive and overlapping landscapes, not in the form of linear diffusion (Appadurai, 2015).

Developing this idea, the notion of globalization by Roland Robertson attracts attention to both the existence of global integration and a specific locality, which implies that traditions are being reconfigured but not consequently replaced by globalization (Robertson, 2016). These cultural actions are also placed within the wider contexts of the modernity, whereby social institutions, and identities are constantly being re-enacted via reflexive practices, as defined by Anthony Giddens (2018). Combined, these views can supply a theoretical perspective of globalisation as a continued and negotiated process that is changing tradition whilst enabling cultural continuation in the changing social conditions.

## **Globalisation, Power and Cultural Representation**

Globalisation has been interwoven with the issue of power and cultural representation, especially of the marginalised and subaltern people. Critical theorists have held that world cultural and economic dynamics tend to favour dominant discourses and make the indigenous knowledge systems and subaltern experiences invisible. The postcolonial critique of Gayatri Chakravarty Spivak is what attracts attention in terms of structural silencing of subaltern subjects in the world discourses of development and progress because representation is often a mediation of elite processes rather than an embodied reality (Spivak, 2016). Speaking of the environment, Vandana Shiva outlines how globalisation-centric conceptualizations of development undercut environmental balance and unsustainable fundamentals are replaced by indigenous sources of knowledge, based on sustainability and communal activities (Shiva, 2017). Other Indian sociologists, C. P. Bhambri and Mool Chand Sharma, also underline that globalisation reorganises power framework by strengthening social classes and excluding local cultures despite its supposed inclusiveness and expansiveness (Bhambri, 2018; Sharma, 2019).

## **Globalisation and the Indian Social Context**

Globalisation has greatly changed the Indian social landscape especially in its endeavors to change the middle market segment and the cultural and ideological inclinations thereof. Liberalisation of economy and opening up of the global market has widened the class of middle Indian people and has reinvented the aspiration of an Indian as far as consumption, education and social mobility are concerned. According to Ruchira Ganguly-Scrase and Timothy Scrase, this new middle class is typified by an increase in participation with global lives and at the same time mediating traditional values to create a distinctive social identity that is both an opportunity and anxious (Ganguly-Scrase and Scrase, 2016). Globalisation has therefore increased class division since accessibility to global capital sources as well as cultural sources is not even, and this polishes on the classes rather than shaking the social classes hierarchy even in the growing middle-class structure.

These transformations can be discussed in the light of literary representations. The novel *The White Tiger* by Aravind Adiga is a stark imagery of the globalised India, revealing the inconsistencies between economic growth and the social inequality that exists. In the story, the novel draws attention to how globalisation creates new wants and hopes and trapping exploitation and moral alienation deep into the social fabric of India (Adiga, 2017). The story of the main hero is an expression of the darker side of middle-class desires, in which a global economic logic transforms the morals of individuals and social connections. Sociological studies also indicate that globalisation has transformed the trends of urbanization, labour connections and cultural consumption, and tended to favor the values of the market over the values of the collective social responsibility (Bhambri, 2018). Sociological and literary insights combined demonstrate that globalisation in India is not a homogeneous phenomenon that can be experienced in different ways across locations throughout classes and which is mediated by cultural discourses that challenge the price of economic integration.

## **Cultural Hybridisation and Everyday Practices**

The globalisation process has resulted in cultural hybridisation being a characteristic phenomenon of the day to day life where world cultures interrelate with the local customs to bring about emerging cultures. Instead of pointing to the eradication of native customs, hybridisation is an indication of the adaptive mechanisms by which the traditions are re-formulated under the new social and economic times. The concept of glocalisation proposed by Roland Robertson is especially handy when it comes to comprehending the process of localisation and the insertion of the global cultural icons into the routine ceremonies and festivals (Robertson, 2016). This process can be observed in India in terms of a restructuring of festivals like the Valentine Day which has been impropriated and refined according to the cultural stipulations in India which find a comfortable coexistence with other the traditional festivals and not replacing them.

Cinema has also been instrumental in cultural hybridisation which is mediated. The use of worldwide cinematic methods and narratives styles combined with local topics, values, and family ideals in popular movies like *Dangal* allows the traditionally oriented narratives to be distributed across global markets (Kaur and Sinha, 2018). In the same breath, the visibility of festivals like Diwali to the world can be seen as an extension of the commodification



of culture in which religion is also being turned into rituals to cater to transnational audiences and consumer marketplaces. The daily consumer behaviors, such as eating patterns, form of dressing and recreational activities, further show how the global brands and mannerisms live alongside the traditional ones, forming multiple cultural identities (Appadurai, 2015). The practices of hybridity disclose that, cultural transformation in globalisation is not merely imitative or passive and some form of selective appropriation or negotiation and reinterpretation locally influenced by history, class and social ideals.

## **Impact of Globalisation on Women, Children and Family Structures**

Globalisation has inflicted incredible changes on the life of women, children and families to redefine the social roles, their economic involvement and their daily relations. In the women case, globalisation has increased their access to education, labour as well as trans national systems, especially in urban and semi-urban areas. Extended involvement in paid employment has made contributing to increased economic independence, presence in the public, and changed the traditional gender roles in households (Giddens, 2018). Meanwhile, the feminist scholars warn that the shifts are skewed with new types of exploitation more frequently than not. The postcolonial criticism of Gayatri Chakravarty Spivak points out that the subaltern women remain somewhat marginalised in the global economic processes, the labour of these women is often swallowed by the non-formal and precarious parts of the economy without the necessary social security (Spivak, 2016). Vandana Shiva also claims that the development models created by globalization oppress women in a disproportionate way, particularly agrarian and indigenous populations, as ecological degradation causes the deterioration of the traditional livelihood and makes them have to perform a disproportionate amount of unpaid work (Shiva, 2017).

The globalisation has also revolutionized the lives of children in terms of education, exposure and consumption patterns in the media. Openness to international media and technologies has enlarged the cultural perspective of children affecting language speaking patterns, ambitions and decisions in life. Whereas such changes may be effective in skill development and international outlook, it includes the loss of intergenerational delivery of conventional insight and practices. As according to scholars, the escalating focus on competitive education and market-driven success often subject children to psychological stress, childhood as such has become a kind of preparatory period in the global labour markets (Kumar, 2019). The close connections between those developments and family structures are connected with the fact that these structures have been reorganised substantially in reaction to the economic mobility, migration and the emerging work patterns.

The nuclear and trans-local family set up, especially among the urban middle, has been replacing the traditional joint family set up. Ruchira Ganguly-Scrase and Timothy Scrase note that even though nuclear families provide more individual freedom, they rebuild the traditional support structures, in particular, childcare and eldercare (Ganguly-Scrase and Scrase, 2016). Emigratory, inland and external, migration to work has also contributed to the disintegration of the family, which generated both emotional alienation and the economic profit. Claims of sociological bodies of thought have indicated that globalisation has not failed to disrupt the family institution but instead redefined its roles and meanings that have resulted in the new negotiation of tradition, compulsion and personal decision (Bhambri, 2018). These transformations demonstrate the ambivalence of globalisation, which, on the one hand, allows the empowerment and creates new vulnerabilities in intimate social relations, on the other hand.

## **Globalisation and the Decline of Traditional Cultural Practices**

One of the impacts of globalisation has been the radical transformation of the old cultural practices especially in the fields of handicraft, performing art fields, clothing and food customs. The rise and development of the global markets alongside mass mechanised production has put the traditional handicrafts in extreme pressure with mass-produced commodities and machine produced products rapidly taking the place of the handcraft products. Crafts have a hard time surviving in competition with less expensive industrial products and, as a result, lose the craft of heredity and dilute the economy of community craft (Sharma, 2019). As much as international markets are sometimes offering market opportunities to classical crafts, approach is still biased and more mediated by commercial goals instead of the heritage.

Globalisation has also influenced traditional dance and music due to the process of standardisation and commodification. Performative forms are often understood to be tailored to meet the demands of global audiences, festival circuits and digital networks, making complex forms of the region and devaluing the value of ritualistic and communally based forms easy (Kothari, 2016). As much as such exposure increases transparency, it usually distorts the cultural background on which these art forms are being practised and passed. These changes can be seen in the same way in the clothes and the meals tradition, as the global fashion trends and cultures of fast-foods have an impact on daily decisions, especially those of younger people.

The influence of global capitalism is seen in the rising trend of adopting Western-style clothes and processed foods, which are incorporating changes in lifestyle and the consumption trends. According to sociologists, what they do is not wipe the practices away, but force them into symbolic or rare application, which in many cases is restricted to festivals and ceremonial application (Appadurai, 2015). Erosion of routine traditional activities, therefore, is a



manifestation of how globalisation is transforming the life of culture by reinventing the value, utility and identity of modern social spaces.

## **Westernisation, Technology and Cultural Labour**

Westernisation, by far associated with the same technological aspect of globalisation has also contributed remarkably on the changing of labour and employment structures of culture. As globalisation implicates bi-directional cultural, capital and ideas flows, westernization may imply the hegemony of Western cultural patterns of production, consumption and work ethics. In modern world, specifically in the developing world of India, the modern technology has harmonised the process in which traditional mode of labour is being replaced by machines and automated systems. The development of artificial intelligence, online platforms and algorithm administration has transformed the process of work in which technical competence takes precedence over the skilled artisanal and culturally entrenched labour forms (Giddens, 2018).

Manual crafts, folk performance, pottery and weaving are traditional occupations that have deep cultural background and are being pushed to the periphery as mechanisation assures of speed, homogeneity and cost cutting. According to sociologists, this change does not only lead to the loss of jobs but also cannot appreciate cultural skills and traditions that have been passed among generations (Bhambri, 2018). This further increases when artificial Intelligence is introduced that is restructuring the labour markets where highly skills workers are favoured by technology with a cost to those working in informal and cultural sectors. Research into technological globalisation indicates that this leads to further social inequality because employees who are not digitally active or do not get training can no longer access new economic opportunities (Srnicsek, 2017) Simultaneously, technology also brings new representations of cultural labour in the establishment of digital content, online performance and international cultural markets. Nevertheless, such opportunities are still not equally distributed and can be controlled and visible through algorithms and corporations. Researchers warn that technological advancements that are fuelled by westernized forms of the economy and lack of inclusivity and cultural protection may lead to the increase in the rate of cultural homogenisation and labour security (Shiva, 2017). Westernisation, technology and labour at its intersection is accordingly the paradoxical effects of globalisation where the invention is coupled with cultural and economic expulsion.

## **Globalisation and Tribal Communities**

Globalisation has been both indirect and at times contradictory on the tribal communities whose societal, economic and cultural landscape are entrenched in land, nature and group dynamics. Although globalisation suggests unity, in terms of development, intake and integration in the market, tribal societies are often marginalized as their way of living collide with mainstream economic and cultural currents. Massive development initiatives, mining and infrastructure growth caused tribal communities to be displaced and this affects the normal way of life and undermines community-focused cultural practices (Shiva, 2017). According to scholars, these processes are evidence of unequal power relation whereby the indigenous cultures are subjected as barriers to development instead of alternative knowledge system.

Globalisation has also changed the symbolic expression of tribal identities, exclusively in the cultural context. Use of Spivak analysis of subalternity will still apply to the presence or absence of tribal voices in global and national discourses of development in which representation is mediated by external agencies and the elites (Spivak, 2016). The inclusion of tribal art, music and rituals in the world cultural markets is likely to lead to their commodification and make them irrelevant of their social and spiritual context. Such a cultural appropriation can create some visibility, although it can do little to provide visions with cultural independence or economic security themselves.

Meanwhile, globalisation has provided narrow room concerning adaptation and cultural survival. Higher education and exposure to communication technologies and the law has facilitated the fight of a section of the tribes by claiming their cultural rights and responding to relocation. According to anthropologists, tribal population uses global tools selectively to maintain the language, record oral traditions and sell them in negotiations with the government (Xaxa, 2018). These adaptive mechanisms prove that the cultures of the tribes are not rigid and lifeless but adopt some changes with evolving circumstances. Even so, the sustainability of such adaptations hinges on the aspect of supportive policies, as well as respect to indigenous systems of knowledge. The tribal community experience under globalisation therefore exposes a conflict of being marginalised or surviving. As long as the forces of globalization keep putting the traditional life-style at risk, tribal response illustrates the aspect of both negotiation and resistance and innovative adjustment to the prevalent unequal global order.

## **Conclusion: Globalisation, Tradition and a Hopeful Cultural Future**

The dynamics of globalisation and tradition in the twenty-first century does not present us with a simple account of a world of culture declined and a world of blind advancement. However, culturally, in the economic and societal sectors, globalisation is a persistent and haphazard process, a way of redefining culture in terms of adapting, negotiating and contesting. The influence of the global forces on the local cultures has given rise to new forms of culture, new forms of identification and increased prospects, especially in education, communication and cultural



exchange. Simultaneously it has accelerated structural inequalities, marginalised indigenous knowledge systems and uprooted traditional livelihoods particularly among artisans, tribal communities and informal workers. These contradictions point to the reality that globalisation is not an effect that is uniform across all communities and it does not follow a consistent cultural path.

The fact presented in this paper tends to indicate that tradition is not a rigid and fragile construct that will end up disappearing. Rather, traditions have managed to maintain themselves by reinventing them within the dynamic social, economic and technological settings. Family life, festivals, art forms and consumption in a day to day set ups have achieved sustenance by absorbing influences of the world and maintaining the local sense of them. Nonetheless, this process should be consciously supported, because the globalisation based on the market tend to focus on efficiency, profit and standardization rather than cultural diversity and social sustainability. The intensification of westernised paradigms of human development and technological automation has been a major threat to the existence of cultural labour, preparing the issue of job security, and a decline in traditions of skilled labour.

These obstacles notwithstanding, cultural prospects in the future are bright in case globalisation is done in a sensitive way, taking into consideration social justice and cultural plurality. Political regulations in favour of old-fashioned industries as a way of protecting native rights and ensuring access to an integrated technological advancement can balance economic growth and cultural preservation. It is also significant that the local knowledge systems should be viewed to be useful in holding on to world discourse instead of just being a forgotten fact of the past. When based on ethical principles and participation-based governance, globalisation can develop cultural dialogue as opposed to cultural domination. In that the future of tradition is not based on resisting the globalisation but in the development of globalisation to embrace diversity, dignity and continuity of culture in a globalized world.

## References

1. Adiga, A. (2017). *The white tiger* (10th anniversary ed.). Atlantic Books.
2. Appadurai, A. (2015). *Banking on words: The failure of language in the age of derivative finance*. University of Chicago Press.
3. Bhambri, C. P. (2018). *Indian politics since independence* (2nd ed.). Orient BlackSwan.
4. Ganguly-Scrase, R., & Scrase, T. J. (2016). *Globalisation and the middle classes in India: The social and cultural impact of neoliberal reforms*. Routledge.
5. Giddens, A. (2018). *The consequences of modernity* (Reprint ed.). Polity Press.
6. Kaur, R., & Sinha, A. J. (2018). *Bollywood and globalization: Indian popular cinema, nation, and diaspora*. Oxford University Press.
7. Kothari, S. (2016). *New directions in Indian dance*. Marg Publications.
8. Kumar, K. (2019). *Politics of education in colonial India* (Reprint ed.). Routledge.
9. Robertson, R. (2016). *Globalization: Social theory and global culture* (Rev. ed.). Sage Publications.
10. Sharma, M. C. (2019). *Indian society: Structure and change*. Rawat Publications.
11. Shiva, V. (2017). *Earth democracy: Justice, sustainability, and peace* (Updated ed.). North Atlantic Books.
12. Spivak, G. C. (2016). *In other worlds: Essays in cultural politics* (Reprint ed.). Routledge.
13. Srnicek, N. (2017). *Platform capitalism*. Polity Press.
14. Xaxa, V. (2018). *Tribes and Indian society*. Oxford University Press.



## Original Article

### Libraries' Role in Viksit Bharat

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#### Abstract

*The vision of Viksit Bharat (Developed India) represents a comprehensive national aspiration encompassing economic growth, social equity, cultural continuity, digital empowerment, and democratic strength. In this knowledge-driven era, libraries emerge as vital institutions that support national development by facilitating access to information, preserving cultural heritage, promoting education, enabling digital inclusion, and fostering informed citizenship. This paper examines the evolving role of libraries in achieving the objectives of Viksit Bharat through a conceptual and literature-based analysis. It highlights libraries as cultural centres, knowledge hubs, and agents of social transformation. The study finds that libraries make significant contributions to human capital development, research and innovation, inclusive growth, and democratic governance. The paper concludes that strengthening library systems through policy support, technological integration, and professional capacity building is essential for realizing the vision of a developed and inclusive India.*

**Keywords:** Libraries, Viksit Bharat, National Development, Knowledge Society, Cultural Centres, Digital Inclusion

#### Introduction

National development in the twenty-first century extends beyond economic indicators to include education, culture, technology, social inclusion, and democratic participation. The concept of Viksit Bharat reflects India's ambition to emerge as a developed nation driven by knowledge, innovation, and inclusive growth. In this context, libraries play a crucial yet often underestimated role.

Libraries are no longer passive storehouses of books; they are dynamic institutions that support education, research, cultural preservation, and community development. By ensuring equitable access to information and knowledge resources, libraries empower individuals and communities, thereby making a direct contribution to nation-building. In a diverse and populous country like India, libraries act as bridges that connect citizens to knowledge, culture, and opportunities.

#### Review of Literature

Ranganathan (1961) laid the philosophical foundation of librarianship by emphasizing that libraries are meant for social use and human development. Kaula (1991) described libraries as social institutions that contribute to education, democracy, and cultural growth. UNESCO's Public Library Manifesto (1994) identified libraries as local gateways to knowledge and essential instruments for lifelong learning and informed citizenship. Bhattacharjee (2012) examined the role of libraries in national development, emphasizing literacy, education, and access to information as key contributions. Singh and Kaur (2009) highlighted libraries' role in building a knowledge society by supporting research, innovation, and technological advancement. The National Education Policy 2020 recognized libraries as critical support systems for quality education, digital learning, and research excellence (Government of India, 2020). The National Mission on Libraries further emphasizes modernization, digitization, and networking of libraries to align them with national development goals (Ministry of Culture, 2021).



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## Objectives of the Study

- Examine the role of libraries in the vision of Viksit Bharat  
 Analyze libraries as cultural and knowledge centres for national development
- Explore libraries’ contribution to education, digital inclusion, and innovation
- Present a conceptual framework linking libraries to national development outcomes

## Main Concept: Libraries as Drivers of Viksit Bharat

### Libraries as Knowledge Institutions in a Knowledge Society

In a knowledge-based economy, information and intellectual capital are critical drivers of development. Libraries facilitate the organization, preservation, and dissemination of knowledge, enabling informed decision-making, innovation, and research (Singh & Kaur, 2009). Academic and research libraries support higher education and scientific inquiry by providing access to scholarly journals, databases, patents, and research tools, thereby enhancing the nation’s intellectual output and global competitiveness.

### Libraries and Human Capital Development

Human capital development is central to Viksit Bharat. Libraries support literacy, critical thinking, and lifelong learning across all age groups. School libraries foster reading habits and cognitive skills, while public libraries act as “people’s universities,” offering self-learning opportunities beyond formal education (Kaula, 1991). Access to competitive examination materials, vocational resources, and skill-development content enhances employability and workforce readiness.

### Libraries as Cultural and Heritage Centres

Libraries preserve the cultural memory of the nation by safeguarding manuscripts, rare books, archives, newspapers, and regional literature. In a culturally diverse country like India, libraries promote unity in diversity by providing access to multilingual and multicultural resources (Chakrabarti, 2001). Cultural activities such as exhibitions, literary discussions, and author interactions organized by libraries strengthen cultural identity and social cohesion.

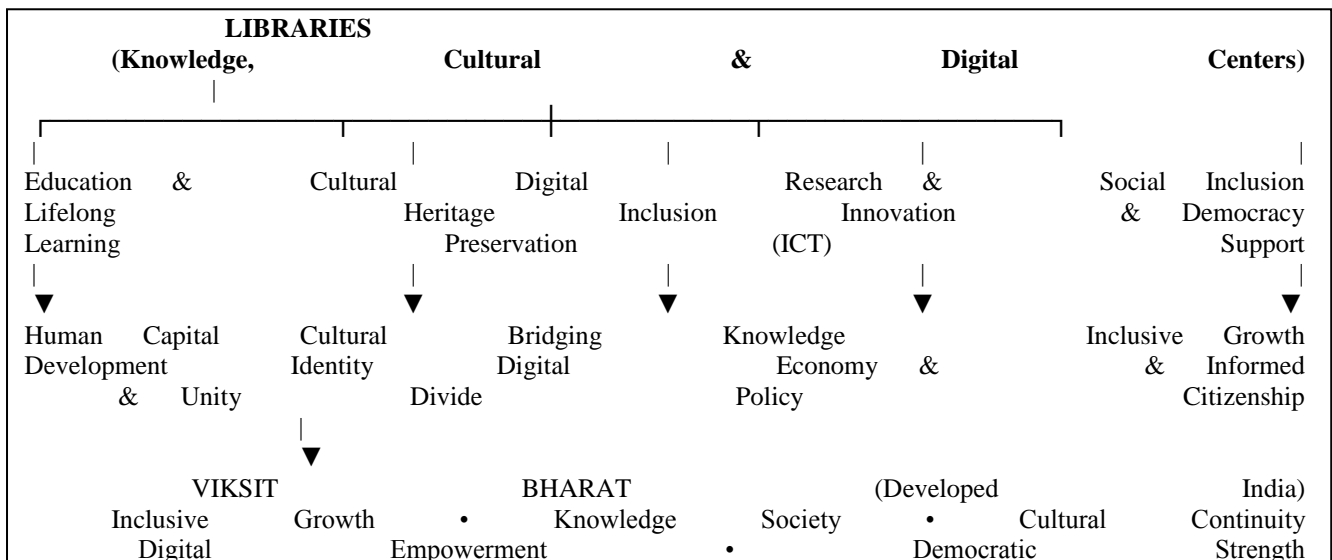
### Libraries and Digital Inclusion

Digital transformation has expanded the scope of libraries. Digital libraries, institutional repositories, and online resources enable access to information beyond physical boundaries. Libraries play a vital role in digital literacy by training users to locate, evaluate, and ethically use information. By providing internet access and digital services in rural and underserved areas, libraries help bridge the digital divide and support initiatives such as Digital India (Government of India, 2020).

### Libraries as Instruments of Social Inclusion and Democracy

Libraries promote social equity by offering free and equal access to information regardless of socio-economic background. They serve marginalized groups by providing targeted services, literacy programs, and community outreach. Libraries also strengthen democratic governance by providing access to government publications, laws, and policy information, enabling informed participation in civic life (UNESCO, 1994).

## Conceptual Framework: Libraries → Viksit Bharat



**Figure 1:** Conceptual framework illustrating the role of libraries in achieving Viksit Bharat



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## Findings

- The study reveals that libraries:
- Play a critical role in education, literacy, and lifelong learning
- Function as cultural centres preserving national heritage and identity
- Promote digital inclusion and reduce information inequality
- Support research, innovation, and evidence-based policymaking
- Strengthen democratic participation through access to information

## Conclusion

Libraries are indispensable institutions in the journey toward Viksit Bharat. As knowledge hubs, cultural centres, and community learning spaces, libraries contribute holistically to national development. They empower citizens through education, preserve cultural heritage, promote digital inclusion, and strengthen democratic values. Recognizing libraries as strategic partners in national development and investing in their modernization, professional staffing, and digital infrastructure is essential for building a developed, inclusive, and knowledge-driven India. A nation that strengthens its libraries strengthens its future.

## References

1. Bhattacharjee, S. (2012). Role of libraries in national development. *International Journal of Library and Information Science*, 4(2), 25–30.
2. Chakrabarti, B. (2001). *Libraries and cultural heritage*. New Delhi: Ess Ess Publications.
3. Government of India. (2020). *National Education Policy 2020*. New Delhi: Ministry of Education.
4. Kaula, P. N. (1991). *Library and society*. New Delhi: Indian Bibliographic Centre.
5. Ministry of Culture, Government of India. (2021). *National Mission on Libraries: Vision document*. New Delhi.
6. Ranganathan, S. R. (1961). *The five laws of library science*. Bombay: Asia Publishing House.
7. Singh, S. P., & Kaur, T. (2009). Knowledge society and role of libraries. *DESIDOC Journal of Library & Information Technology*, 29(6), 33–41.
8. UNESCO. (1994). *UNESCO Public Library Manifesto*. Paris: UNESCO.



## Original Article

### The Impact of Physical Education Programs on Academic Performance

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#### Abstract

*Physical education (PE) programs are often treated as supplementary curriculum elements, yet research increasingly shows that they play a critical role in students' overall development including academic achievement. This paper examines the theoretical foundations, empirical evidence, mechanisms of influence, challenges, and policy implications related to physical education's impact on academic performance. The findings suggest a positive association between well-designed PE programs and improvements in cognitive function, classroom behavior, and academic outcomes.*

**Keywords:** Physical education, PE programs, Academic performance, Student achievement, Cognitive development and Exercise.

#### Introduction

Education systems worldwide aim to develop knowledgeable, healthy, and well-rounded individuals. Traditionally, academic subjects such as mathematics, science, and language arts receive primary emphasis, while physical education is often relegated to the periphery. However, an expanding body of research underscores that physical education contributes to students' intellectual functioning and scholastic success, not merely their physical wellbeing. This seminar paper explores how physical education influences academic performance, the physiological and psychological mechanisms behind these effects, the challenges of integrating quality PE into school curricula, and recommendations for future practice and research.

#### Conceptual Framework

##### 1. What Is Physical Education?

Physical education is a planned, sequential program of instruction that promotes physical activity, motor skills development, physical fitness, and an understanding of movement concepts and principles. It emphasizes lifelong habits of physical activity and overall wellness.

##### 2. Academic Performance Explained

Academic performance refers to measurable outcomes in educational settings, including grades, standardized test scores, class participation, attention, memory, and problem-solving abilities.

##### 3. Theoretical Basis for PE and Cognitive Function

Several theoretical perspectives suggest links between physical activity and cognitive development:

**Neurobiological Theory:** Physical activity increases blood flow to the brain, promotes neurogenesis, and enhances synaptic plasticity, which supports memory and learning.

**Executive Function Theory:** Exercise positively influences executive functions (planning, attention, working memory), which are critical for academic tasks.

**Psychosocial Motivational Theory:** Participation in sports or PE activities builds self-esteem, reduces anxiety, and supports social skills that contribute to improved classroom engagement.

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## Mechanisms Linking PE to Academic Performance

### 1. Physiological Mechanisms

Research shows that physical activity enhances:

**Brain Structure and Function:** Aerobic exercise increases oxygenation and neurotrophins such as BDNF (brain-derived neurotrophic factor), which supports neural growth and cognitive processing.

**Energy Metabolism and Sleep:** Regular activity improves metabolic health and sleep quality, both of which are associated with better attention and memory consolidation.

### 2. Cognitive Mechanisms

**Executive Function Enhancement:** Regular physical activity is linked to better planning, mental flexibility, and inhibitory control — skills essential for successful learning and problem-solving.

**Attention and Workload Management:** Physical breaks and structured PE sessions help students refocus, reducing mental fatigue and enhancing on-task behavior in the classroom.

### 3. Psychological and Social Mechanisms

**Self-Esteem and Confidence:** Success in physical tasks can translate to academic confidence.

**Stress Reduction:** Exercise releases endorphins, reducing stress and anxiety, which positively affects concentration and classroom responsiveness.

**Social Skills:** Team sports and group activities foster cooperation, communication, and respect — qualities that support academic group work and classroom dynamics.

## Empirical Evidence

### 1. Evidence from Primary and Secondary Schools Several studies reveal:

**Positive Correlations:** Schools with mandatory PE show higher average test scores, better attendance, and reduced behavioral problems.

**Cognitive Gains:** Structured aerobic programs (e.g., running, games) lead to measurable improvements in reading and math scores.

**Short Bouts vs. Long Programs:** Even short physical activity breaks during school days have been shown to improve attentional control and academic tasks.

### 2. Evidence from Meta-Analyses

Comprehensive reviews generally find:

**Moderate Positive Effects:** Increased physical activity or fitness levels are associated with modest but consistent improvements in academic outcomes.

**Stronger Effects in Younger Students:** Elementary students often display more notable academic benefits than older students, indicating early training may be critical.

## Case Studies

### School-Based Programs That Worked

**Active Schools Program:** Incorporating daily PE and activity breaks improved standardized test performance in participating schools.

**Sports Integration Initiative:** Schools that integrated structured team sports into the curriculum reported improved student engagement and fewer disciplinary incidents.

## Challenges and Limitations

### 1. Curriculum Time Constraints

One common argument against expanding PE is competition for instructional time in core academic subjects. However, evidence suggests that reducing PE can harm academic outcomes.

### 2. Quality and Implementation Variability

Not all physical education programs are equal. Poorly designed or under-resourced PE fails to yield cognitive benefits. Quality teaching, appropriate equipment, and consistent scheduling are essential.

### 3. Equity Issues

Access to quality PE can be unequal due to socioeconomic factors, school funding disparities, or cultural attitudes toward physical activity — limiting benefits for disadvantaged students.

## Policy Implications

### 1. Integrating PE into Core School Strategies

Rather than viewing PE as an optional add-on, schools should integrate it as a core component of education policy, recognizing its role in cognitive and social development.

### 2. Teacher Training and Professional Development

To maximize benefits, PE teachers should receive training in pedagogical methods that link physical activity with cognitive outcomes and student engagement.



### 3. Collaborative Approaches

PE should be coordinated with classroom teachers to reinforce activity-based learning in academic subjects (e.g., math games involving movement).

#### Recommendations for Schools

1. Ensure daily PE periods for all grade levels.
2. Use evidence-based curricula that balance fitness, skill development, and cognitive activation.
3. Incorporate active breaks during classroom time.
4. Monitor and evaluate student progress both physically and academically.
5. Promote inclusive activities that motivate all students regardless of ability.

#### Conclusion

Physical education is not simply a break from academic work; it is an essential component of holistic education that supports cognitive development, academic performance, and lifelong wellbeing. Research consistently suggests that when students engage in regular, structured physical activity, they demonstrate improved attention, memory, behavior, and standardized academic outcomes. Investing in quality PE is, therefore, a wise and evidence-based strategy for schools seeking to enhance student learning.

#### References

1. Coe, D. P., Pivarnik, J. M., Womack, C. J., Reeves, M. J., & Malina, R. M. (2006). Effect of physical education and activity levels on academic achievement in children. *Medicine & science in sports & exercise*, 38(8), 1515-1519.
2. Trudeau, F., & Shephard, R. J. (2008). Physical education, school physical activity, school sports and academic performance. *International journal of behavioral nutrition and physical activity*, 5(1), 10.
3. Sallis, J. F., McKenzie, T. L., Kolody, B., Lewis, M., Marshall, S., & Rosengard, P. (1999). Effects of health-related physical education on academic achievement: Project SPARK. *Research quarterly for exercise and sport*, 70(2), 127-134.
4. Rasberry, C. N., Lee, S. M., Robin, L., Laris, B. A., Russell, L. A., Coyle, K. K., & Nihiser, A. J. (2011). The association between school-based physical activity, including physical education, and academic performance: a systematic review of the literature. *Preventive medicine*, 52, S10-S20.
5. Kliziene, I., Cizauskas, G., Augustiniene, A., Sipaviciene, S., & Aleksandraviciene, R. (2020). The relationship between school age children's academic performance and innovative physical education programs. *Sustainability*, 12(12), 4922.
6. Bhowmick, S., Ghosh, S. S., & Biswas, B. (2023). Impact of Physical Education Curriculum on Academic Achievement of Higher Secondary School Students in India. *International Journal of Physical Education Fitness and Sports*, 1-11.
7. Singh, B. (2021). Impact Of Physical Education On Academic Performance In Indian Schools. *International Journal of Advanced Multidisciplinary Scientific Research*, 4(11).
8. Desai, I. K., Kurpad, A. V., Chomitz, V. R., & Thomas, T. (2015). Aerobic fitness, micronutrient status, and academic achievement in Indian school-aged children. *PLoS One*, 10(3), e0122487.
9. Trudeau, F., & Shephard, R. J. (2008). Physical education, school physical activity, school sports and academic performance. *International journal of behavioral nutrition and physical activity*, 5(1), 10.



## Original Article

### Digital Libraries and Information Access in Higher Education

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#### Abstract

Digital libraries are essential in higher education, transforming information storage, access, and utilization for teaching and research. They enable seamless access to e-books, e-journals, database and multimedia content, enhancing information literacy and supporting interdisciplinary research. Advanced technologies like cloud computing and artificial intelligence improve their efficiency and personalization. However, challenges such as infrastructure, digital divide, copyright issues, and user awareness persist. The study underscores the importance of strategic planning, and sustainable development to enhance the impact of digital libraries in academia.

**Keywords:** Digital libraries: Information access: Higher education: Academic libraries: Online database: Open access

#### Introduction

With the advancement of computer, multimedia and network technologies, alternatives to traditional classroom learning have been developed. E-learning is one such alternative where students can access course-related materials via online computer systems. It is being explored as an effective way of delivering materials to previously unreachable students with previously unavailable access and presentation methods. (Peng, 2016). In terms of teaching, training, and studying, online academic libraries are important components of any university's information infrastructure. Development of DL resources is as a result of the need for people to keep their history, discoveries, and achievements records and collections. Academic institutions, through their library departments, make major investments for DL resources in the area of subscription fees, information management systems, awareness, and marketing of DL resources to ensure clients are aware of the available tools and are actively using them. (Agrey Kato, 2020).

The digital library is an online database of texts, still images, audio, video and other documents in digital media formats. In addition to storage, digital library allow for organizing, searching and retrieving the contents. In digital library, the digital content may be stored and accessed locally and distantly through computer networks. Institutional repositories (IR) archives and digital library are needs of present scenario. Library users need the information which is preserved for research and academic purpose. New technologies develop and influenced the betterment of academic libraries and users. (Suresh Kumar Chauhan, 2016). The amount of information published in electronic format and the number of users accessing it to satisfy their daily information need is growing at a tremendous rate. This is the building block of the digital information age. Remarkably, though more information is easily reachable and in smaller amount of time than a decade ago, it is getting increasingly difficult for individuals to control and effectively seek for information among the potentially infinite number of information sources available on the Internet. (M. Elena Renda, 2004).

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## Objectives of the Study:

1. To examine the role of digital libraries in supporting teaching, learning and research activities in higher education institution.
2. To assess how accessible digital library resources for students, faculty and researchers.
3. Digital libraries enhance the speed and quality of information retrieval.
4. To identify the challenges faced by users while accessing digital library services.
5. To assess user awareness and satisfaction regarding available digital library resources and tools.

## Review of literature

Digital libraries, approximately 20 years old, have rapidly evolved to store, preserve, distribute, and protect content in various formats while facilitating user interaction. They are consistently accessible both geographically and temporally, enhance the international visibility of works, and promote referencing and citations. Additionally, they support higher education by making educational products public and available as learning inputs, illustrated by several examples. (Pavani, The Role of Digital Libraries in Higher Education , 2007). Advancements in computer, multimedia, and network technologies have led to the development of alternatives to traditional classroom learning, such as e-learning. This method allows students to access course materials online, expanding educational opportunities to those who previously lacked access. E-learning is posited as a significant shift in training delivery, comparable to the invention of the chalkboard or the alphabet. (Daqing He, 2010).

The transition to digital libraries is crucial, influencing all library activities while preserving their core functions. It highlights new social and technological challenges and distinguishes between the needs of digital and physical users. The library engages both virtual and real readers, analyzing book loans and electronic resources. Additionally, it covers educational and leisure activities with university students and faculty. (Ruslan A. Baryshev, 2020). Education and learning are recognized as lifelong pursuits, with digital libraries poised to significantly impact this field. As stated by a host in Japan, the availability of distributed digital libraries and information technologies will create a substantial market for content creators, reflecting a developing relationship between education and digital libraries. (Mendel, 2019). Digital libraries are evolving the notion of "bibliographic instruction," which is no longer sufficient in the digital context. This article discusses pilot studies conducted in the New York metropolitan area regarding Internet use in academic libraries and the necessity for user-education programs. Key areas identified for focus include understanding digital collections, interfaces, hardware/software needs, access modes, and integrating these educational programs into ongoing learning initiatives. (Kibarige, 2001).

## Concept of Digital Libraries and Information access in Higher Education

The way Knowledge is produced, stored, and shared in higher education has changed dramatically due to the quick development of information and communication technologies. The rise of digital libraries is among most important developments in this regard. E-books, e-journals, online databases, institutional repositories, multimedia content, and open educational resources are among the well-organized collections of digital resources that make up digital libraries. These resources can be accessed via electronic networks. These libraries support teaching, learning, and research activities in colleges and universities by acting vital knowledge centers. The ability of academic users to find, retrieve, assess, and make effective use of information is referred to as information access in higher education. Digital libraries greatly enhance information access by providing round-the-clock availability of scholarly resources, regardless of physical location. Digital libraries, in contrast to traditional libraries, provide multiple users with simultaneous access, increasing efficiency and lowering reliance on physical infrastructure. Users can find pertinent information fast and precisely thanks to sophisticated search interfaces, indexing, metadata, and full-text search capabilities.

Digital libraries are essential for fostering innovation and research in the academic setting. To keep up with the least advancements in their fields, faculty members and research scholars mainly rely on electronic journals, research databases, and multidisciplinary resources. By providing access to a vast array of subject-specific and multidisciplinary resources, digital libraries also support interdisciplinary research. Additionally, academic outputs like these, dissertations, conference papers, and faculty publications are preserved and distributed globally by institutional repositories. Higher education's teaching and learning processes are greatly impacted by digital libraries. By offering digital course materials, reference materials, and multimedia learning resources, they facilitate online and blended learning. Easy access to a variety of resources encourages students to participate in academic inquiry, critical thinking, and self-directed learning.

Digital libraries in higher education institutions face a number of difficulties despite their many advantages. These include high subscription fees for electronic resources, limitations on copyright and licensing, inequalities in user digital literacy, and technological infrastructure constraints. Concerns about data security, privacy, and long-term digital preservation continue to be significant. Adopting open access policies, user training initiatives, sufficient funding, and institutional support are all necessary to address these issues. Since the availability of pertinent and up-to-date information is crucial to the quality of education, access to information is a basic requirement in higher education. Conventional barriers like geographical distance, limited physical copies, and library hours are eliminated by digital



libraries. Students can study at their own pace and convenience thanks to digital libraries' round-the-clock access. Distance learning, online courses, and lifelong learners especially benefit from this flexibility.

The speed and accuracy with which information can be retrieved is another significant benefit of digital libraries. Users can find the most pertinent resources in a matter of seconds with the aid of sophisticated search tools like Boolean operators, keyword searches, subject filters, and citation tracking. This effectiveness increases research productivity and saves time. Additionally, digital libraries frequently offer note-taking, bookmarking, highlighting, and citation management tools that streamline the research process. Emerging technologies like Artificial Intelligence, machine learning, big data analytics, and block chain are anticipated to enhance digital library services. AI-driven recommendation systems will suggest materials based on user preferences, while automated indexing will enhance resource discoverability. Additionally, virtual and augmented reality is expected to enrich digital learning environments by providing immersive educational experiences.

Digital libraries have transformed access to information in higher education, enhancing the availability, searchability, and shareability of scholarly resources. They facilitate academic research and teaching while encouraging independent learning. Despite ongoing challenges such as cost, technology, and digital literacy, the advancement of digital library systems is crucial for the future of higher education. Institutions that prioritize robust digital infrastructures and user training will enhance innovation and research capabilities.

### Benefits of Digital Libraries Using in Higher Education

1. Students and faculty members have 24/7 access to academic resources from any location.
2. Vast information Resources provides access to thousands of e-books, journals, and research databases.
3. Quick search features enhance to find information more quickly compared to traditional libraries.
4. Supports Remote learning is essential for online and distance education programs.
5. Promotes independent learning by encouraging students to explore and research beyond classroom teaching.
6. Digital format ensures easy storage and preservation of materials by protecting them from physical damage.
7. Up-to-date information guarantees access to the least research and academic advancement.

### Challenges of Digital Libraries Using in Higher Education

1. Limited internet access due to poor or unstable connectivity impacts resources availability.
2. Lack of digital literacy affects students and faculty, hindering effective use of digital platforms.
3. Many academic databases necessitate institutional subscription.
4. Information overloads accrue when the abundance of resources makes it challenging to identify pertinent information.
5. Digital system is susceptible to cyber threats, posing security and privacy risks.
6. Regular updates and continues maintenance are essential for maintaining the functionality and currency of systems.

### Conclusion

Digital libraries are essential in higher education, revolutionizing access to information. Academic institutions are adopting these systems to fulfill the needs of students, researchers, and faculty. Digital libraries offer 24/7 access to various scholarly resources, including e-books and databases, improving the quality of teaching, learning, and research by providing rapid information retrieval. Digital libraries significantly enhance educational access by removing geographical and time constraints, allowing students to access academic materials from anywhere. They support independent learning by encouraging exploration beyond traditional textbooks, leading to improved academic performance and fostering critical thinking, creativity, and innovation.

Digital libraries face challenges like inadequate infrastructure, limited internet connectivity, high subscription costs, copyright restrictions, and digital literacy. Higher education institutions must invest in robust infrastructure, provide user training, and raise awareness about digital resources. Librarians are essential in facilitating access to information by helping users navigate digital platforms and assess credible sources. As information managers and digital facilitators, they assist in locating, analyzing, and applying information for academic purposes. Institutions should prioritize user-friendly digital interfaces and expand electronic collections to adapt to the evolving educational landscape.

### References

1. Agrey Kato, M. K. (2020). A Review Development of Digital Library Resources at. Hindawi , 13.
2. Daqing He, Y. P. (2010). Supporting information access. Online Information Review , 8.
3. Kibarige, H. M. (2001). The education function in a digital library environment: a challenge for college and research libraries . The Electronic Library , 12.
4. M. Elena Renda, U. S. (2004). A personalized collaborative Digital Library environment:. Information Processing and Management , 17.
5. Mendel, J. M. (2019). EDUCATION USING DIGITAL LIBRARIES. International Technology Research Institute, 7.



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6. Pavani, A. M. (2007). The Role of Digital Libraries in Higher Education . International Conference on Engineering Education , 5.
7. Peng, D. H. (2016). Supporting information access. 16.
8. Ruslan A. Baryshev, I. A. (2020). Transformation of University Libraries During. Journal of Siberian Federal University. Humanities & Social Sciences , 8.
9. Suresh Kumar Chauhan, V. K. (2016). Digital Library Challenges and Opportunities: An Overview. Library Philosophy and Practice , 13.
10. Vipin Kumar Sharma, S. K. (2016). Digital Libr Digital Library Challenges and Oppor y Challenges and Opportunities: An Ov tunities: An Overview . Library philosophy And Practice , 12.



## Original Article

### Women in India's Freedom Movement: Forgotten Voices

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**Abstract**

*The historiography of India's freedom movement has long been dominated by a nationalist narrative that foregrounds the contributions of male leaders. This paper argues that such narratives have systematically marginalized the multifaceted and critical roles played by women, rendering their voices as "forgotten" within the popular historical consciousness. Moving beyond a tokenistic acknowledgment of a few iconic figures, this study excavates the diverse and complex participation of women from various social strata, regions, and ideological backgrounds. It analyzes their involvement not only in mainstream Gandhian programs like civil disobedience and the Salt March but also in revolutionary terrorism, grassroots mobilization, labor organizing, and cultural regeneration. The paper employs a feminist historical lens to examine how women's activism simultaneously challenged colonial authority and navigated, as well as contested, the patriarchal constraints of Indian society. It concludes that recovering these forgotten voices is not merely an act of historical inclusion but is essential for a more nuanced and comprehensive understanding of the anti-colonial struggle, revealing it as a site where the battles for political independence and social transformation were intricately intertwined.*

**Keywords:** Historiography, Feminist History, Anti-Colonial Struggle, Grassroots Mobilization, Patriarchal Constraints

**Introduction**

The narrative of India's struggle for independence from British colonial rule is a cornerstone of the nation's identity. Yet, this narrative, as popularly constructed and disseminated, often resembles a curated gallery where a select few leaders are prominently displayed. Within this gallery, women's contributions have frequently been relegated to the margins, acknowledged in passing rather than integrated into the central plot. This paper contends that the story of India's freedom movement remains incomplete without a systematic recovery and analysis of women's roles, which were as diverse and strategic as they were transformative. The term "forgotten voices" does not imply an absolute absence but signifies a systemic erasure or simplification within dominant historiography. This study seeks to move beyond the ceremonial recognition of figures like Sarojini Naidu or Kasturba Gandhi to explore the myriad ways in which women as political organizers, revolutionary militants, writers, and grassroots activists shaped the course of the movement. By examining their participation through a feminist historical lens, this paper aims to demonstrate how women navigated the dual oppressions of colonialism and patriarchy, thereby complicating the traditional, male-centric narrative of the freedom struggle.

**The Gandhian Construct: Mass Mobilization and Ambivalent Liberation**

Mahatma Gandhi's arrival on the national stage marked a pivotal shift, explicitly inviting women into the fold of mass political agitation. His philosophy of Satyagraha, or truth-force, framed non-violent resistance as a moral and spiritual endeavor, domains traditionally associated with feminine virtue in the Indian context. This strategic framing provided a socially acceptable rationale for women's public participation.



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Consequently, women participated en masse in the Non-Cooperation Movement (1920-22), the Civil Disobedience Movement (1930-34), and the Quit India Movement (1942). They organized pickets at foreign cloth and liquor shops, manufactured salt, led protest marches, and faced police lathis and imprisonment with formidable courage. As Gandhi himself noted, the women of Bardoli showed "a rare courage and resourcefulness" during the no-tax campaign (Gandhi 214).

However, this incorporation was not without its ambivalences. While Gandhi mobilized women as vital soldiers in the anti-colonial fight, he often idealized them within a framework of self-sacrificing motherhood and moral purity. Their activism was frequently celebrated as an extension of their domestic and nurturing roles rather than as a radical assertion of political agency. This created a paradox: women were empowered to break purdah and enter public spaces for the nationalist cause, yet their participation was expected to conform to a certain model of respectable, feminine patriotism. The Gandhian construct, therefore, was both a catalyst for unprecedented female mobilization and a framework that could limit the radical potential of that mobilization for gender equality.

### **Beyond Non-Violence: Women in Revolutionary and Militant Nationalism**

Simultaneous to the Gandhian wave, a parallel strand of revolutionary nationalism flourished, particularly in Bengal, Punjab, and Maharashtra, which also saw significant female involvement. These women operated in a starkly different paradigm, one that embraced armed resistance and underground conspiracy. Their stories disrupt the stereotype of the passive, non-violent female protestor. Bhikaiji Cama, for instance, unfurled the first version of the Indian flag on foreign soil in Stuttgart in 1907, becoming a symbol of international revolutionary propaganda. Kalpana Datta and Pritilata Waddedar played crucial roles in the Chittagong Armoury Raid of 1930; Waddedar led a raid on the Pahartali European Club, sacrificing her life to prove women's capacity for armed rebellion.

Revolutionary women often acted as couriers, hiding and transporting weapons, running safe houses, and producing clandestine literature. Their participation required a different kind of courage, involving constant risk of arrest, transportation for life, or execution. Figures like Durga Bhabhi, who assisted Bhagat Singh in his escape after the Saunders murder, became legends within revolutionary circles. These women consciously defied both colonial law and deeply ingrained social norms that deemed violence a male preserve. Their legacy, however, has been even more obscured than that of their Gandhian counterparts, as their methods did not always align with the dominant non-violent narrative that post-independence India sought to uphold.

### **Grassroots Mobilization and Socio-Economic Struggles**

The freedom movement was not merely a political campaign but also a social one, and women were at the forefront of linking national liberation with struggles for economic justice and social reform. In rural areas, women participated in peasant movements like the Tebhaga and Telangana uprisings, fighting against zamindari exploitation and for land rights. In urban centers, women like Maniben Kara and Ushabai Dange were instrumental in organizing labor unions, advocating for the rights of mill workers and challenging capitalist exploitation alongside colonial rule.

These engagements highlight how women's activism was often rooted in their immediate material conditions. Their fight was against a matrix of oppression where colonial economic policies exacerbated patriarchal and class-based subjugation. For instance, the mobilization of women in the Ahmedabad textile mills, supported by leaders like Anasuya Sarabhai, was as much about fair wages and working conditions as it was about swaraj (self-rule). This grassroots dimension underscores that the "forgotten voices" include countless unnamed women for whom freedom meant liberation from multiple, intersecting hierarchies. Their participation ensured that the nationalist movement, at its best, addressed questions of poverty, dignity, and social equity, not just political transfer of power.

### **Cultural and Intellectual Resistance: The Pen and the Platform**

Women's contributions also profoundly shaped the intellectual and cultural terrain of nationalism. They used writing, oratory, and education as potent tools of resistance. Writers and poets like Sarojini Naidu, who became the first Indian woman president of the Indian National Congress, and Subhadra Kumari Chauhan, whose poem "Jhansi ki Rani" reignited the memory of Rani Lakshmibai, used literature to forge a nationalist consciousness. Magazines and journals edited by women, such as *Stri Dharma* in English and *Bangalakshmi* in Bengali, became platforms to discuss nationalism, women's rights, and social reform.

These intellectual endeavors served a dual purpose. They challenged colonial stereotypes of Indian women as backward and passive, while also creating a new language of self-expression and political discourse for women. Educationists like Durgabai Deshmukh and Captain Lakshmi Sahgal (of the Indian National Army) emphasized that the empowerment of women through education and military training was essential for a truly free nation. Through their pens and speeches, these women constructed an alternative public sphere, arguing that true independence was impossible without the intellectual and social awakening of half the population.

### **Conclusion:**

The excavation of women's multifarious roles in India's freedom movement does more than simply add names to a historical roster; it fundamentally alters our understanding of the struggle itself. It reveals the movement as a complex, multi-layered process where the political goal of ending colonial rule intersected with a quieter, yet equally



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potent, social revolution. Women were not just participants following a male-led script; they were agents who interpreted nationalism on their own terms, often using the movement's energy to push against the confines of gender. Their "forgotten voices" remind us that the journey toward freedom was also a contested journey toward self-definition for Indian women. Acknowledging their full legacy is thus an essential scholarly and ethical imperative, ensuring that history remembers not only who led the nation to independence but also the countless women who, in myriad ways, helped imagine and build its foundations. The recovery of these voices completes the picture, transforming a monologue into a more democratic and truthful conversation about the past.

## **Reference**

1. Gandhi, M.K. The Collected Works of Mahatma Gandhi. Vol. 48, Publications Division, Government of India, 1958.
2. Forbes, Geraldine. Women in Modern India. Cambridge UP, 1996.
3. Kumar, Radha. The History of Doing: An Illustrated Account of Movements for Women's Rights and Feminism in India, 1800-1990. Zubaan, 1993.
4. Sarkar, Tanika. Bengal 1928-1934: The Politics of Protest. Oxford UP, 1987.
5. Thapar-Björkert, Suruchi. Women in the Indian National Movement: Unseen Faces and Unheard Voices, 1930-42. Sage Publications, 2006.



## Original Article

### Re-Imagining India’s Electoral System: Challenges, Reforms, and Democratic Resilience

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#### Abstract

*The Indian democratic system, the world’s largest by population, has endured as a vibrant and resilient political institution since its inception in 1950. However, the continuous evolution of societal structures, information technologies, economic disparities, and political culture necessitates a critical examination of the electoral mechanisms that underpin representative governance. Electoral reforms, aimed at enhancing transparency, fairness, efficiency, and inclusivity in the electoral process, constitute an urgent imperative to secure the future of Indian democracy. This paper explores key challenges confronting the Indian electoral system—ranging from campaign finance opacity, criminalization of politics, voter disenfranchisement, misuse of digital technologies, and structural deficiencies in electoral administration. It investigates reform proposals, including state funding of elections, stringent candidate eligibility criteria, delimitation reforms, stronger regulation of social media and digital campaigning, and improvements in voter registration and turnout. Furthermore, the role of the Election Commission of India (ECI) as an autonomous custodian of elections is critically examined, alongside debates over its powers and independence. By examining comparative experiences from democracies like Brazil, South Africa, and the United Kingdom, this study highlights best practices that could be adapted for India. The focus is on incorporating technology through secure electronic voting and blockchain systems, while addressing concerns regarding cybersecurity and equitable access. The paper concludes that although electoral reforms can be politically difficult, they are crucial for enhancing democratic legitimacy and building public trust. Effective reform requires the involvement of multiple stakeholders, including political parties, civil society, the judiciary, media, and the electorate. Ultimately, rethinking India’s electoral framework can strengthen democratic resilience, enhance participatory citizenship, and guarantee the principles of free and fair elections persist in the 21st century.*

**Keywords:** Electoral Reforms, Indian Democracy, Election Commission of India, Campaign Finance, Digital Electoral Integrity.

#### Introduction

India's democracy, the largest in the world, fundamentally relies on the principle of regular, free, and fair elections. The electoral process serves as the main tool for converting the people's will into governance through representation. Throughout the last seventy years, India’s electoral system has adapted to demographic changes, social evolution, economic liberalization, and swift technological advancements. While it has achieved notable successes, ongoing challenges highlight the necessity for thorough electoral reforms. Electoral reform involves changes to laws, institutional structures, processes, and practices that dictate how votes are cast, counted, and transformed into political representation. These reforms strive to improve the credibility, inclusivity, and responsiveness of democratic systems. In India, such reforms encompass legislative changes, administrative reorganizations, technological advancements, and shifts in political norms. As Indian democracy faces modern challenges like populism, misinformation, and increasing social divisions, electoral reforms are crucial for ensuring the sustainability of democracy.



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This document explores the fundamental aspects that need reform, evaluates the effects of suggested measures, and outlines paths for enhancing electoral democracy in India. It places the conversation in the context of both national necessities and lessons from international comparisons.

## Objectives of the Study

- To explore the current electoral system in India and pinpoint significant challenges that hinder democratic governance.
- To evaluate prominent electoral reform initiatives and their influence on transparency, accountability, and the integrity of elections.
- To examine how electoral reforms can enhance the future of Indian democracy in an evolving socio-political landscape.

## Research Methodology

This study employs a descriptive and analytical research approach. It primarily relies on secondary data sourced from books, scholarly journals, research articles, government documents, publications from the Election Commission of India, and judicial rulings pertaining to electoral reforms. Additionally, the study utilizes a comparative method to glean insights from the electoral practices of selected democratic nations. The gathered data have been qualitatively analyzed to comprehend the challenges, reforms, and future prospects of democracy in India. The focus of the study is on national-level electoral reforms and excludes the collection of primary data.

## Historical Context of Electoral Reforms in India

Since India held its inaugural general elections in 1952, the electoral framework has experienced a series of reforms. Initial initiatives aimed at implementing universal adult suffrage and establishing an independent Election Commission (ECI) to ensure impartial election administration. As time progressed, reforms included the introduction of voter ID cards, enhancement of polling facilities, and the integration of Electronic Voting Machines (EVMs). The 1990s and 2000s sparked intensified discussions regarding financial influence in politics, the criminalization of political activities, and the need for transparency in campaign financing. Directives from the Supreme Court concerning the disclosure of candidates' assets and liabilities, prohibitions on exit polls, and measures to minimize corrupt practices indicated an increase in judicial intervention in the governance of elections.

Although there has been gradual advancement, fundamental deficiencies remain. Key challenges of our time encompass unclear campaign funding, the combination of digital technologies with electoral interference, waning internal democracy within political parties, and ongoing obstacles to fair voter engagement.

## Core Issues in the Indian Electoral System

### • Campaign Funding and Financial Influence

A significant and ongoing issue in Indian elections is the impact of unregulated and unclear campaign financing. Political campaigns in India are becoming more dependent on substantial amounts of money, including undisclosed cash spending. While the Election Commission establishes expenditure caps for candidates, the enforcement of these limits varies. Political parties benefit from tax-exempt status and can receive substantial donations from corporations and individuals, often with very little transparency.

The absence of transparency allows financial influence to distort electoral competition, advantage affluent candidates, and diminish public confidence. It also promotes reliance on special interests that could compromise democratic accountability.

### • Criminalization of Politics

Election campaigns in India often include candidates facing ongoing criminal charges. Though there are legal measures to disqualify individuals convicted of specific crimes, having only charges does not prevent someone from running. The prevalence of candidates with serious legal accusations weakens the moral basis of representative democracy and fosters a sense of impunity.

### • Digital Technologies, Misinformation, and Electoral Integrity

The rise of social media and digital communication channels has revolutionized political campaigning. Although digital technologies can improve outreach and rally support, they also contribute to the dissemination of misinformation, disinformation, and tailored micro-propaganda. The capacity to influence online discussions, frequently with minimal regulation, presents challenges to informed voting and democratic discussion.

### • Voter Engagement and Turnout Disparities

Even with occasional increases in voter participation, notable disparities remain across different regions, demographic groups, and communities. Women, marginalized castes, and those who are economically disadvantaged frequently face systemic obstacles to fully engaging in the electoral process.

### • Institutional and Administrative Constraints

The Election Commission of India is vital in maintaining the integrity of elections. Nevertheless, its independence has been subject to political influence, especially when it comes to taking action against influential

incumbents. Furthermore, ongoing administrative issues such as ensuring voter list accuracy, facilitating polling access in isolated regions, and managing election logistics require ongoing focus.

## Proposed Electoral Reforms

This section highlights important areas for reform, considering legal, administrative, and technological viewpoints.

### • Campaign Finance Regulation

One significant reform suggestion is to implement state funding or partial public financing for elections. By allocating regulated public funds to political parties and candidates, the impact of untraceable private money can be minimized. Supporting measures should include obligatory, real-time reporting of all campaign contributions and expenses, along with strict penalties for non-compliance. Moreover, campaign spending limits ought to be regularly evaluated to keep pace with inflation and the evolving nature of electoral campaigns. Enhancing audits conducted by independent organizations can improve financial transparency

### • De-criminalizing Politics

De-criminalizing Politics Legal reforms should strengthen the criteria for candidate eligibility. This should involve preventing individuals with serious criminal charges from running for office until their cases are resolved. Establishing fast-track courts specifically for election-related matters can help minimize delays in the judicial system, ensuring that disqualifications are both prompt and fair. Political parties ought to be required to uphold internal codes of conduct that discourage the nomination of candidates with questionable backgrounds. Efforts from civil society to monitor practices and campaigns aimed at raising voter awareness can foster social pressure for more responsible politics.

### • Regulating Digital Campaigning

The swift expansion of online political advertising necessitates strong regulatory frameworks. Proposed reforms should encompass:

- Mandatory transparency regarding digital political advertising and its funding sources.
- Clear guidelines for political parties and candidates concerning social media usage.
- Collaboration with platform providers to combat misinformation during election periods.
- Independent oversight bodies similar to those regulating broadcast media.

Striking a balance between free speech and safeguarding electoral integrity is essential. Regulatory guidelines must be clear, proportionate, and open to judicial scrutiny.

### • Enhancing Voter Participation and Inclusivity

1. Improving Voter Engagement and Inclusion Targeted changes to enhance voter participation include:
2. Improving the precision of voter lists through regular audits and systems for citizen verification.
3. Designating election day as a public holiday with polling stations that are accessible, particularly in underserved areas.
4. Special accommodations for disabled, elderly, and migrant voters, such as mobile polling units or extended voting hours.
5. Civic education initiatives incorporated into school curricula to promote a lasting democratic culture.
6. Digital and mobile platforms can aid in voter registration and the distribution of election-related information.

### • Institutional Empowerment of the Election Commission

Empowering the Election Commission Institutionally The independence of the Election Commission should be protected by legal measures that shield the appointment process, duration of service, and budget from executive interference. Proposed reforms might consist of:

1. A bipartisan committee to oversee the appointment of ECI members.
2. A fixed, non-renewable term to reduce political influence.
3. Transparent reporting on performance that is subject to review by Parliament.
4. Enhancing the investigatory and enforcement power of the ECI will improve adherence to electoral regulations.

## Comparative Insights and Lessons

- Brazil has implemented campaign finance reforms that feature strict limits on spending and public funding, enhancing transparency and ensuring fairness in competition.
- The Electoral Commission of South Africa operates with constitutional independence and has specific responsibilities for overseeing elections.
- In the United Kingdom, regulations surrounding digital campaigning mandate comprehensive reporting of online political advertisements, establishing standards for accountability in the digital arena. Despite contextual differences, these examples show how the design of institutions and legal structures can enhance the integrity of elections.
- 6. Technology and the Future of Elections Innovations in technology offer potential benefits for electoral reform, but they also introduce certain risks. Electronic Voting Machines (EVMs) have made the voting process more efficient, yet discussions continue regarding their verifiability and security.



Innovative technologies such as blockchain voting systems have the potential to improve transparency and trust by allowing for tamper-proof record-keeping. Nevertheless, challenges related to the digital divide, cybersecurity risks, and accessibility need to be resolved prior to widespread implementation. Enhanced technology in voter registration, result communication, and electoral education can boost efficiency, as long as protections are in place to guarantee fairness and data privacy.

### Challenges to Reform Implementation

Challenges to Implementing Reforms Electoral reforms are fundamentally political in nature. Parties that benefit from the current systems may oppose changes that jeopardize their established advantages. Institutional resistance, complex legal issues, and a lack of public understanding can hinder progress. To achieve substantial reform, it is essential to have:

1. Agreement among political parties on fundamental democratic values.
2. Engagement from civil society to foster public demand for transparency.
3. Judicial backing to maintain constitutional integrity.
4. Frameworks for periodic evaluation can assess the results of reforms and modify strategies as needed.

### Conclusion

Electoral reforms are crucial for rejuvenating democracy in India. Tackling issues such as the lack of transparency in campaign financing, the presence of criminal elements, ensuring digital integrity in elections, and overcoming institutional limitations can enhance democratic credibility and foster public confidence. Reforms should be viewed as pathways, rather than final goals, to enhance democratic engagement, accountability, and fairness. The future trajectory of Indian democracy relies on a shared commitment—among political stakeholders, institutions, and the public—to adopt reforms that reflect the essence of representative governance. By drawing lessons from global practices and innovating thoughtfully, India can strengthen its electoral framework to address the democratic challenges of the 21st century.

### References

1. Election Commission of India. (2019). Compendium of instructions on conduct of elections. Election Commission of India.
2. Election Commission of India. (2022). Handbook for candidates. Election Commission of India.
3. Kapur, D., & Mehta, P. B. (2017). Navigating the labyrinth: Perspectives on India's politics. Oxford University Press.
4. Khosla, M. (2020). India's founding moment: The Constitution of a most surprising democracy. Harvard University Press.
5. Law Commission of India. (1999). 170th report on reform of the electoral laws. Government of India.
6. Law Commission of India. (2015). 255th report on electoral reforms. Government of India.
7. Yadav, Y. (2018). Democracy and its discontents. Oxford University Press.



## Original Article

### The Role of Open Educational Resources in Modern Education

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#### Abstract

*Open Educational Resources (OER) are teaching and learning materials that are freely available for use, adaptation, and sharing without any cost. OERs are released under open licenses, which make education more accessible and affordable for all learners around the world. OERs have a significant role in minimizing the cost of education, enhancing the quality of learning, and achieving inclusive education. This paper will present the types, benefits and significance of Open Educational Resources in contemporary education systems.*

**Keywords:** Open Educational Resources, OER, Open Education, Free Learning Materials, Inclusive Education

#### Introduction

Open Educational Resources (OER) are free learning materials that people around the world can use without cost. Students, teachers, and independent learners can access these resources easily. OER are published with open licenses, which allow users to use, edit, and share the content legally. These materials include textbooks, lesson plans, notes, videos, online classes, and assessment tools used in both formal classrooms and informal learning environments. The term Open Educational Resources became well known in 2002 after UNESCO introduced it during an international meeting on education access. The main aim was to reduce gaps in education by providing quality learning materials to everyone, regardless of their financial situation or location. Since that time, OER have expanded quickly with help from universities, governments, and non-profit organizations. One of the biggest advantages of OER is the lower cost of education. Many students face difficulties buying costly textbooks, which can affect their learning. OER solve this problem by offering free alternatives. Teachers also benefit because they can adjust the materials to fit their curriculum, student needs, and local context, making lessons more effective and inclusive. In addition, OER encourage cooperation among educators. Teachers can share ideas, improve materials, and keep content up to date using new teaching methods and technologies. Learners gain access to a wide range of current resources that support self-learning and lifelong education. Open Educational Resources help improve the quality of education, increase access to learning, and support a more fair and sustainable global education system.

#### Why Open Education Matters

##### 1. Textbook costs should never stop someone from learning.

Over the years, the price of textbooks has increased much faster than the cost of living. Many college students are required to pay very high prices for books, sometimes more than \$200 for a single textbook. In schools, outdated books are often used because new ones are too expensive. Open Educational Resources solve this problem by providing free digital materials and low-cost printed options that can be kept and reused forever. Money saved on textbooks can instead be spent on technology, better teaching methods, or reducing student debt.



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## 2. **Students perform better when learning materials are easily available.**

Because textbooks are so expensive, many students start their courses without the required materials. Open Education removes this barrier by giving students immediate access to high-quality resources from the first day of class. Research shows that students using open resources achieve equal or better learning outcomes compared to those using traditional textbooks, mainly because they can fully engage with the content.

## 3. **Technology can greatly improve teaching and learning when it is open.**

Open Education allows teachers and institutions to use technology in creative ways. Learning materials can be updated quickly, include real-world examples, and reflect local culture. Lessons can reach learners across the world, and students from different countries can collaborate and learn from one another. When education is open, technology becomes a powerful tool for innovation.

## 4. **Stronger education creates a stronger future.**

Education plays a vital role in building a successful society, supporting economic growth, and improving quality of life. By expanding access to learning and encouraging effective teaching, Open Education helps create more opportunities for everyone and benefits society as a whole.

### **Objectives of Open Educational Resources (OER)**

- To make learning materials freely available to students, teachers, and independent learners across the world.
- To eliminate the cost associated with expensive textbooks and paid learning resources.
- To make available trustworthy, updated, and quality learning content for effective learning.
- To assist learners to learn independently and develop skills throughout their lives.

### **Government-Supported Open Educational Resources (OER)**

#### 1. **SWAYAM (Study Webs of Active-Learning for Young Aspiring Minds)**

SWAYAM is a flagship initiative of the Government of India launched by the Ministry of Education under the Digital India mission. It provides free online courses to students, teachers, and lifelong learners to ensure equal access to quality education.

#### **Main features of SWAYAM:**

- Free courses for school, undergraduate, postgraduate, and professional learners
- Courses developed by expert faculty from IITs, IIMs, central universities, and reputed institutions
- Learning content includes: Video lectures, Reading materials, Self-assessment quizzes and Discussion forums.

#### 2. **NPTEL (National Programme on Technology Enhanced Learning)**

NPTEL is a Government of India-funded initiative started in 2003 by the IITs and IISc Bangalore. It offers free online courses and video lectures, mainly in engineering, science, management, and humanities.

#### **Why NPTEL is an OER platform:**

- Learning materials are freely available to all
- Content is created using public funding
- Supports open and distance learning

#### 3. **DIKSHA (Digital Infrastructure for Knowledge Sharing)**

DIKSHA is a national digital education platform developed by the Ministry of Education, Government of India. It supports teachers, students, and schools by providing free and open learning resources.

#### **Key features:**

- Digital textbooks, lesson plans, worksheets, videos, and quizzes
- Teacher training and professional development modules
- Content aligned with national and state curricula

#### 4. **National Digital Library of India (NDLI)**

The National Digital Library of India is a Government of India initiative that provides free access to a large collection of educational resources for learners from school level to research level.

#### **Resources available on NDLI include:**

- Textbooks and reference books
- Journal articles and research papers
- Theses and dissertations

#### 5. **e-PG Pathshala**

e-PG Pathshala is an initiative of the University Grants Commission (UGC), India, aimed at postgraduate students. It supports Open Educational Resources by offering free, high-quality digital learning materials.

#### **Features:**

- E-books, video lectures, and online learning modules



2. Subjects include science, humanities, social sciences, commerce, and management
3. Content developed by experienced university faculty

## Non-Government Open Educational Resources (OER)

### 1. MIT OpenCourseWare (OCW)

MIT OpenCourseWare is an initiative by the Massachusetts Institute of Technology (MIT), USA. It provides free access to course materials from thousands of MIT courses.

#### Resources include:

1. Lecture notes and video lectures
2. Assignments and exams
3. Reading materials
4. Content from engineering, science, mathematics, management, and humanities

### 2. OpenStax

OpenStax is a non-profit organization based in the USA that provides free, peer-reviewed, openly licensed textbooks.

#### Key highlights:

1. Subjects include physics, chemistry, biology, mathematics, economics, and psychology
2. Free online access and low-cost printed versions
3. Textbooks can be adapted and shared by educators

## Khan Academy

Khan Academy is a non-profit educational platform offering **free online learning resources** for students and teachers worldwide.

#### Content includes:

1. Video lessons and interactive exercises
2. Practice quizzes and progress tracking
3. Subjects such as mathematics, science, economics, computing, humanities, and test preparation

## CK-12 Foundation

CK-12 Foundation is a non-profit organization that provides free and customizable digital learning materials for K-12 education.

#### Features:

1. FlexBooks (digital textbooks)
2. Practice exercises, videos, and simulations
3. Subjects include mathematics, science, and engineering
4. Teachers can modify content to suit student needs

## Importance of OER

1. OER give learners and teachers unlimited access to learning resources.
2. OER lower the cost of education by doing away with costly textbooks.
3. OER enhance the quality of learning by offering up-to-date and accurate learning content.
4. OER facilitate self-learning and lifelong learning opportunities.
5. OER enable teachers to customize learning content according to the needs of learners.
6. OER facilitate collaboration and sharing of knowledge among teachers.
7. OER help in bridging the gap in education, especially in distant areas.
8. OER facilitate sustainable education for all learners.

## Conclusion

Open Educational Resources (OER) are educational materials that are freely available for anyone to use, share, and adapt. OERs are published with open licenses that make them free to access. OERs are used in schools, colleges, universities, and other learning institutions, making education more accessible and inclusive. There are various types of OERs. The major types of OERs include open textbooks, lecture notes, lesson plans, videos, online courses, quizzes, and assessment tools. Digital libraries, learning management systems, and open courseware websites also host a variety of OERs. These resources can be used for self-study, teaching, and training. One of the key benefits of using OERs is cost savings. Students usually find it difficult to afford costly textbooks, and OERs are a free alternative. Another benefit of OERs is that they are easily accessible, and learners can access them anytime and from anywhere with an internet connection. Another benefit of OERs is flexibility. Teachers can modify, update, and customize the content as per the curriculum requirements, level of learners, and local needs.

OERs assist in bridging the inequality gap in education by allowing students in distant or disadvantaged regions to access learning. OERs also promote the effective use of technology in education and facilitate sustainable



learning practices globally. Open Educational Resources are essential in contemporary education. OERs mitigate expenses and improve learning experiences by providing free, flexible, and high-quality learning resources. OERs facilitate collaboration, innovation, and equal learning opportunities for all. With the continuous evolution of education, OERs will continue to be a significant enabler in developing a more inclusive, sustainable, and affordable global education system.

## References:

1. Das, A. K. (2011). Emergence of open educational resources (OER) in India and its impact on lifelong learning. *Library Hi Tech News*, 28(5), 10-15.
2. Hylén, J. (2006). Open educational resources: Opportunities and challenges. *Proceedings of open education*, 4963.
3. Kenchakkanavar, A. Y., Kamble, A. A., & Rathod, A. Open Educational Resources: Bridging The Gap In Educational Equity And Accessibility.
4. Mahaldar, S. (2023). The Role of Swayam in Education. *International Journal of Emerging Knowledge Studies*, 2(9), 288-289.
5. Majumder, C. (2019). SWAYAM: The Dream Initiative of India and its uses in Education. *International Journal of Trend in Scientific Research and Development*, 3(3), 57-60.
6. Mishra, S. (2017). Open educational resources: Removing barriers from within. *Distance education*, 38(3), 369-380.
7. Perryman, L. A. (2013). Addressing a national crisis in learning: open educational resources, teacher-education in India and the role of online communities of practice.
8. Richter, T., & McPherson, M. (2012). Open educational resources: education for the world?. *Distance education*, 33(2), 201-219.
9. Thakran, A., & Sharma, R. C. (2018). Meeting the challenges of higher education in India through open educational resources: Policies, practices, and implications. Thakran, A., & Sharma.
10. Thakran, A., & Sharma, R. C. (2018). Meeting the challenges of higher education in India through open educational resources: Policies, practices, and implications. Thakran, A., & Sharma.
11. Wiley, D., Bliss, T. J., & McEwen, M. (2013). Open educational resources: A review of the literature. *Handbook of research on educational communications and technology*, 781-789.



## Original Article

### Labour Reforms in India: An Overview of the Four Labour Codes

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#### Abstract

Labour reforms in India represent a significant step toward simplifying and modernizing the country's complex labour regulatory framework. For decades, Indian labour laws were characterized by multiplicity, overlapping provisions, and rigid compliance requirements, which create challenges for both employers and employees. In response to changing economic conditions, globalization and the need to improve ease of doing business while ensuring workers welfare, the Government of India undertook comprehensive labour law reforms. These efforts culminated in the consolidation of 29 central labour laws into four comprehensive labour codes: the Code on Wages, 2019, the Industrial Relations Code, 2020, the Code on Social Security, 2020 and the Occupational Safety, Health and Working Conditions Code, 2020. This research paper provides an analytical overview of the Four Labour Codes, examining their objectives, key provisions, and broader implications for India's labour market. The Code on Wages seeks to ensure uniformity in wage regulation and guarantees minimum wages and timely payment across all sectors. The Industrial Relations Code focuses on balancing the rights of workers with the need for industrial harmony and flexibility for employers. The Code on Social Security aims to expand social security coverage to unorganized, gig, and platform workers, thereby promoting inclusive growth. The Occupational Safety, Health and Working Conditions Code emphasizes improved working conditions, worker safety, and health standards. The study adopts a descriptive research approach, based on secondary sources such as government reports, books and academic literature. The paper concludes that while the Four Labour Codes mark a transformative shift in India's labour governance, their success largely depends on effective implementation, cooperative federalism, and safeguarding workers' rights alongside economic growth.

**Keywords:** Labour Reforms, codes, economy, industry

#### Introduction

Labour laws play a crucial role in regulating the relationship between employers and workers, ensuring fair wages, healthy working conditions, social security, and industrial harmony. In India, labour legislation has evolved over time to address the socio-economic challenges arising from industrialization, economic growth, and workforce diversification. However, prior to recent reforms, the Indian labour regulatory framework was marked by the existence of numerous central and state laws, cause to complexity and high compliance burdens. The government recognized the necessity to simplify labour laws while maintaining a balance between workers' rights and employers' flexibility. As a result, a major legislative reform initiative was undertaken to rationalize and consolidate existing labour laws into a streamlined framework. This reform process led to the enactment of the Four Labour Codes, namely the Code on Wages, 2019, the Industrial Relations Code, 2020, the Code on Social Security, 2020 and the Occupational Safety, Health and Working Conditions Code, 2020.

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These codes aim to improve labour governance by enhancing transparency, promoting ease of doing business, healthy working environment, reduce inequality and social security benefits to a wider section of the workforce, including unorganized and gig workers. The introduction of the Four Labour Codes marks a significant transformation in India's labour law regime. Understanding their scope, objectives, and implications is essential for assessing their potential impact on employment relations, worker welfare, and economic development.

## Meaning

Labour reforms refer to systematic changes introduced by the government to modify, simplify and modernize existing labour laws and regulations governing employment relations to protect the workers.

## Objectives

1. To understand the concept of labour reforms in the Indian context.
2. To analyze role of four labour codes in promoting worker welfare, social security and improved working conditions.

## Research design

The present study adopts a descriptive and analytical research design to examine labour reforms in India with specific reference to the Four Labour Codes. The research is based on secondary sources and data has been collected from various authentic sources such as central labour legislations, government notifications, reports of the Ministry of Labour and employment, journals, books and research articles.

## Four Labour Codes in India

1. Code on Wages, 2019
2. Industrial Relations Code, 2020
3. Code on Social Security, 2020
4. Occupational Safety, Health and Working Conditions Code, 2020

### 1. Code on Wages, 2019

The Code on Wages, 2019 was introduced in Lok Sabha by the Minister of Labour, Mr. Santosh Gangwar on July 23, 2019. It aims to regulate the payment of wages and bonuses across all forms of employment engaged in industrial, commercial, service or manufacturing activities. The Code replaces the following four laws: (i) the Payment of Wages Act, 1936, (ii) the Minimum Wages Act, 1948, (iii) the Payment of Bonus Act, 1965, and (iv) the Equal Remuneration Act, 1976. The Code will apply to all the employees. The central government will make wage-related decisions for employments such as railways, mines, and oil fields also others. State governments will make decisions for all other employments. Wages include salary, allowance, perquisites or any form of monetary terms. This does not include bonus payable to employees or any travelling allowance. According to the Code, the central government will fix a floor wage, taking into account living standards of workers. In addition, the Central Government is empowered to fix distinct floor wages for various geographical areas, based on consultations with the Central Advisory Board and the State Governments. The minimum wages decided by the central or state governments must be higher than the floor wage. In case the existing minimum wages fixed by the central or state governments are higher than the floor wage, they cannot reduce the minimum wages.

### Fixing the minimum wage:

The Code restricts employers from paying wages less than the minimum wages fixed by law. The Central or State Governments will notify minimum wages based on time rates or piece rates of work. These wages will be revised periodically, at intervals not exceeding five years. In fixing minimum wages, the governments may consider factors including workers' skill levels and the difficulty involved in the work.

### Overtime:

The Central or State Government may prescribe the number of hours constituting a normal working day. Where an employee works beyond such normal working hours, they shall be entitled to overtime wages at a rate not less than twice the normal rate of wages.

### Payment of Wages:

Wages may be paid in cash, currency notes, by cheque, through credit to a bank account, or via electronic modes. The wage period shall be determined by the employer and may be fixed on a daily, weekly, fortnightly, or monthly basis.

### Deductions:

The Code permits deductions from an employee's wages on specified grounds such as fines, absence from duty, accommodation provided by the employer, and recovery of advances, among others. However, total deductions shall not exceed fifty per cent of the employee's total wages.



## **Determination of bonus:**

All employees earning wages up to the limit fixed by the Central or State Government are entitled to an annual bonus. The minimum bonus payable is 8.33% of wages or ₹100, whichever is higher. In addition, employers must share a portion of their gross profits with employees based on their annual wages. However, the maximum bonus payable to an employee shall not exceed 20% of annual wages.

## **Gender discrimination:**

The Code prohibits gender discrimination related to wages and recruitment of employees for work of similar nature. Work of similar nature is defined as work for which the skill, effort, knowledge, experience, and responsibility required are the same.

## **Advisory Boards:**

The Central and State Governments will form Advisory Boards. The Central Advisory Board will include employers, employees in equal number, independent members, and five representatives of State Governments. State Advisory Boards will consist of employers, employees, and independent persons. One-third of the members in both Boards will be women.

## **Offences:**

The Code provides penalties for employers who violate its provisions, such as paying wages below the prescribed amount. Depending on the offence, punishment may include imprisonment up to three months and a fine up to one lakh rupees.

## **2. Industrial Relations Code, 2020**

### **Exemption**

The appropriate government may exempt any new industrial establishment or class of establishments from the provisions of the Code in public interest.

### **Applicability of Standing Orders:**

Under the 2019 Bill, industrial establishments with 100 or more workers had to prepare standing orders covering matters like types of workers, working hours, holidays, wage payment, termination of service, and grievance redressal. The 2020 Bill increased this limit and made standing orders compulsory only for establishments with 300 or more workers.

### **Power to Revise the Threshold:**

The 2019 Bill allowed the Central Government to apply standing order rules to establishments with fewer than 100 workers by issuing a notification. This power has been removed in the 2020 Bill.

### **Closure, Lay-off, and Retrenchment:**

Under the Code, establishments employing 300 or more workers must obtain prior government approval before closing down, laying off workers, or retrenching employees.

### **Prior Permission of the Government:**

Under the 2019 Bill, establishments employing 100 or more workers had to obtain prior government permission before closure, lay-off or retrenchment. The 2020 Bill increased this limit and now requires prior permission only for establishments employing 300 or more workers.

### **Power to Revise the Threshold:**

The 2019 Bill allowed the Central Government to either increase or decrease the worker threshold for seeking prior permission. The 2020 Bill restricts this power and allows only an increase in the threshold through notification.

### **Negotiating Union and Negotiating Council:**

#### **Sole Negotiating Union:**

If more than one trade union exists in an establishment, the union representing the majority of workers is recognized for negotiations. The 2019 Bill required 75% membership, which was reduced to 51% under the 2020 Bill.

#### **Negotiating Council:**

When no single union has majority support, a negotiating council is formed. Under the 2019 Bill, unions with at least 10% membership could be part of the council. The 2020 Bill increased this requirement to 20%.

## **3. Code on Social Security, 2020**

### **Applicability of Social Security**

The 2019 Bill provided social security benefits only to certain establishments based on prescribed thresholds such as establishment size and income limits. The 2020 Bill allows the Central Government, through notification, to extend the applicability of the Code to any establishment, subject to specified size thresholds.



## **Social Security for Unorganised, Gig, and Platform Workers**

Under the 2019 Bill, the government was empowered to introduce social security schemes for unorganised workers, gig workers, and platform workers. Gig workers are those working outside a traditional employer–employee relationship, while platform workers provide services through online platforms. The 2020 Bill strengthens these provisions by mandating social security coverage and introducing compulsory registration for all three categories of workers.

## **Social Security Funds**

The 2019 Bill permitted the Central Government to establish social security funds for unorganised, gig, and platform workers. The 2020 Bill makes it mandatory for the Central Government to establish such a fund and also requires State Governments to set up and administer separate social security funds for unorganised workers.

## **Role of Aggregators**

The 2020 Bill clarifies that welfare schemes for gig and platform workers may be financed through contributions from the Central Government, State Governments, and aggregators. Aggregators such as ride-sharing services, food delivery platforms, and e-marketplaces are required to contribute between 1% and 2% of their annual turnover, subject to a maximum of 5% of the amount payable to gig and platform workers.

## **Provisions on appeals, assessment, and offences and penalties**

### **Appeals:**

Under the 2019 Bill, authorised officers could conduct inquiries to decide whether provident fund (PF) and employee state insurance (ESI) provisions applied to certain establishments and to determine the amounts payable by employers. Aggrieved parties were allowed to seek a review of such orders. The 2020 Bill removes the provision for review.

### **Determination of Escaped Amounts:**

The 2019 Bill allowed authorised officers to reopen cases within five years to reassess amounts due from employers if certain payments were missed due to non-disclosure of facts or new information. The 2020 Bill removes this power.

### **Offences and Penalties:**

The 2020 Bill revises penalties for certain offences. The maximum imprisonment for obstructing an inspector has been reduced from one year to six months. In addition, unlawful deduction of the employer's contribution from an employee's wages now attracts only a fine of ₹50,000 instead of imprisonment or fine.

## **4. Code on Occupational Safety, Health and Working Conditions, 2020**

### **Exemptions**

The 2019 Bill allowed the appropriate government to exempt any establishment or category of establishments from the provisions of the Code. The 2020 Bill specifically empowers State Governments to exempt new factories from the Code in order to promote economic activity and generate employment.

### **Threshold for Coverage of Establishments**

#### **Factory:**

Under the 2019 Bill, a factory was defined as any premises engaged in manufacturing that employed more than 10 workers when power was used, or more than 20 workers when power was not used, in line with the Factories Act, 1948. The 2020 Code raises these limits to 20 workers for manufacturing units using power and 40 workers for those operating without power.

#### **Establishments Engaged in Hazardous Activities:**

The 2019 Bill defined establishments as workplaces employing 10 or more workers. The 2020 Bill expands this scope by including all establishments carrying out hazardous activities, irrespective of the number of workers employe

#### **Contract Workers:**

The 2019 Bill applied to establishments or contractors employing 20 or more contract workers and allowed the government to prescribe a lower threshold. The 2020 Bill revises this provision and makes the Code applicable only to establishments or contractors employing 50 or more contract workers.

#### **Contract Labour:**

The 2019 Bill allowed the government to ban contract labour in certain cases, such as when the work was permanent in nature, essential to the business, or already done by regular employees. The 2020 Bill changes this approach and prohibits contract labour only in core activities. However, contract labour is allowed if the work is normally done through contractors, does not require full-time workers, or if there is a sudden increase in work that must be completed within a fixed time.



## Work Hours and Employment Conditions

### Daily Working Hours:

The 2019 Bill allowed the government to decide the maximum daily working hours. The 2020 Bill fixes the maximum working hours at eight hours per day.

### Employment of Women:

Earlier, the government could restrict women from doing hazardous work. The 2020 Bill allows women to work in all types of establishments and jobs. For hazardous or dangerous work, employers must provide necessary safety measures before employing women.

### Inter-State Migrant Workers and Unorganised Workers

### Benefits for Inter-State Migrant Workers:

The 2020 Bill provides several benefits for inter-state migrant workers, including the choice to access public distribution system benefits either in their home state or in the state where they work, access to benefits under the building and other construction workers' cess fund in the state of employment, and insurance and provident fund benefits similar to those available to other workers in the same establishment.

### Displacement Allowance:

The 2019 Bill required contractors to pay inter-state migrant workers a displacement allowance equal to 50% of their monthly wages at the time of recruitment. This provision has been removed in the 2020 Bill.

### Database for Inter-State Migrant Workers:

The 2020 Bill mandates that the central and state governments maintain a database of inter-state migrant workers on an official portal. Workers can register themselves using self-declaration and Aadhaar details.

### Social Security Fund:

The 2020 Bill provides for a Social Security Fund for unorganised workers. Money collected from certain penalties under the Code, including compounding penalties, will be credited to this Fund. The government may also specify other sources of funding for the Fund.

## Conclusion

The labour reforms introduced through the Four Labour Codes represent a change in India's labour laws. By consolidating numerous central labour laws into four comprehensive codes, the government has attempted to simplify compliance, remove difficulties, and modernize labour governance in line with changing economy. These reforms seek to balance the twin objectives of promoting ease of doing business and ensuring the protection and welfare of workers. The Code on Wages ensures uniform wage regulation and timely payment of wages across all sectors, thereby promoting income security for workers. The Industrial Relations Code aims to promote industrial harmony by streamlining dispute resolution mechanisms and providing greater flexibility to employers in matters related to workforce management. The Code on Social Security expands the scope of social protection by extending benefits to unorganised, gig, and platform workers, reflecting the evolving nature of employment in the digital economy. The Occupational Safety, Health and Working Conditions Code focuses on improving workplace safety, health standards, and humane working conditions. While the Four Labour Codes have the potential to create a more transparent and efficient labour regulatory environment, their success depends largely on effective implementation, coordination between the central and state governments, and awareness among workers and employers. Concerns related to threshold limits, job security, and enforcement mechanisms need to be carefully addressed to ensure that workers' rights are not diluted. Overall, the labour reforms signify an important step toward inclusive and sustainable economic growth, provided they are implemented in a manner that upholds social justice and industrial stability.

## References

1. Sunil Sudhakar Varnekar and Dr. Upankar Chutia, Implementation of labour code, 2020: A comprehensive analysis, International Journal of Civil Law and Legal Research, 2024; 4(1)
2. Mr. Madan Sharma, Understanding India's New Labour Codes: Challenges In Implementation, Journal of Emerging Technologies and Innovative Research (JETIR), December 2024, Volume 11, Issue 12
3. Dr. Sonal Rawal and Dr. Hiral Shukla, Labour Law Reforms In India Through The Four Labour Codes: A Critical Appraisal Of Implications For Workers' Rights, International Education & Research Journal [IERJ], 2025
4. Source: India Code <https://share.google/wM9ZLICWL64VUSIg7>
5. Source: PIB <https://share.google/8IENVPEKX19QiHs56>
6. <https://prsindia.org/billtrack/the-code-on-wages-2019>
7. <https://prsindia.org/billtrack/the-code-on-social-security-2020>
8. [labour.gov.in](http://labour.gov.in).



## Original Article

### The Struggles and Role of Tamil Nadu Women in the Indian Freedom Struggle – A Study

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#### Abstract

*India's Freedom Struggle cannot be completed without mentioning the participation of women in all struggles and their sacrifices. Many of us don't know that women of India fought the British along with the men folk. Women have to sacrifice the family, and many household roles to participate in the freedom struggle. We have to recognize the role and sacrifice made by the women of India. They are the symbol and the driving force for many who wish to fight for equality and justice. The history of Indian National Movement definitely would be incomplete without mentioning the sacrifice of Indian Women. The sacrifice rendered by the Women folk of India will occupy the significant place. They really fought with true spirit and unafraid courage and faced a numerous tortures hardship and exploitations to teach us freedom. When most of the men freedom fighters were in prison the women folk came forward and took charge of the national struggle.*

**Keywords:** Tamil Nadu Women, Indian Freedom Struggle, Women Freedom Fighters, Non-Cooperation Movement, Civil Disobedience Movement, Vedaranyam Salt Satyagraha, Quit India Movement, Rukmani Lakshmiipathi, Padmasani Ammal, Durgabai Ammal, Khadi Movement, Women Political Prisoners, Vellore Prison, Rani of Jhansi Regiment, Indian National Army, Social Reform and Nationalism, Annie Besant, Home Rule Movement.

#### Introduction

Tamil Nadu showed the lead in resisting colonial rule. As early as the late eighteenth century the Palayakarars, resisted the English attempts to establish their political hegemony in Tamil Nadu. Even after the defeat of the Palayakarars, an uprising was organized by Indian sepoys and officers in Vellore Fort in 1806 that had its echoes in several cantonments in south India. Thanks to the introduction of Western education and eventual emergence of educated Indian middle class, the struggle against the British took the constitutional path. The freedom struggle in Tamil Nadu was unique, because from the beginning it was not only a struggle for independence from the English rule but also a struggle for independence from social disability imposed by the obnoxious caste system. In this lesson we shall study the role played by nationalists wedded to diverse ideologies in Tamil Nadu. In the beginning, people of North India revolted against the English involving themselves in the war of independence. The steps taken by Lord Curzon to subdue the revolt created restlessness and enmity among the people. To protest that order, people rose in revolt under the leadership of Balagangadhara Tilak, Supporting to this revolt, people boycotted foreign goods and acted against the British government. The government suppressed this revolt, many were sent to prison particularly Bebin Chandra Pal was tortured inside the prison. Tamils played a significant role in the Indian freedom struggle. Although the Sepoy Mutiny of 1857 is referred to as the First Indian War of Independence, in South India, even before that, there were wars and rebellions against the British East India Company.

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The rulers of regions including Arcot and Madurai, who had enjoyed almost 20 years of autonomy under the Nawab's rule, refused to submit and pay tribute. To suppress this rebellion, the Nawab sought military assistance from the British, for which he had to pay a fee. As this debt grew into a huge sum, the Company acquired the right to collect taxes in these regions. This was opposed by many, including Alagumuthu Kone, Puli Thevar, Muthuramalinga Sethupathi, Velu Nachiyar, the Maruthu Pandiyar brothers, Kattabomman, and Valukkuvelli Ambalam. Tamil Nadu was a pioneer in resisting colonial rule.

In the late eighteenth century, the Palayakkarars resisted the attempts of the British to establish their political dominance in Tamil Nadu. In 1806, Indian soldiers and officers planned and carried out an uprising at Vellore Fort, and this rebellion resonated in several military camps across South India. The introduction and eventual emergence of Western education led the struggle against the British along a constitutional path. The freedom struggle in Tamil Nadu was unique because, from the beginning, it was not only a struggle for liberation from the British but also a struggle for liberation from the social barriers created by the harmful caste system. The self-rule movement of the educated Indian middle class that emerged attracted Tamil women, who were confined by social constraints, into politics. A notable example is the Home Rule Movement started in Chennai in 1916 by the Irish lady Annie Besant with the support of the Congress. She was imprisoned for raising the banner of revolt against the British government, demanding self-rule for India. Her arrest inspired numerous women to join her movement. A notable figure among them was Sivagamu Amma, a student from Chennai studying at Bombay Medical College. Realizing that she could serve the nation more effectively through this struggle than by becoming a doctor, she abandoned her studies and came to Chennai in August 1917. Condemning her arrest, about 300 women from Chennai, under the leadership of Mrs. Dorothy Jeena Rasadhas, held a public meeting on September 14<sup>th</sup>. In that meeting, Sivagamu Ammal delivered a speech. Following this, defying the prohibitory order, women marched in a procession, carrying a picture of Annie Besant and the Home Rule flag. Later, when Annie Besant was released and arrived in Chennai, a large number of women surrounded her and offered their greetings.

### **The Non-Cooperation Movement**

In 1920, under the leadership of Gandhi, the country embraced the Non-Cooperation Movement. As this movement was based on the principles of truth, non-violence, and passive resistance, Gandhiji encouraged women to participate. Women engaged in Congress programs such as boycotting foreign clothes, picketing foreign cloth shops and liquor shops, and spinning Khadi cloth. The picketing of liquor shops was a very important aspect of the This struggle was spearheaded by E.V. Ramasamy Naicker from Erode. While the protest was successfully underway, the Madras government arrested him and several other volunteers and imprisoned them. Subsequently, his wife Nagammal and his sister Kannammal continued the protest in Erode. When Congress members asked Gandhiji whether the protest could be stopped, he replied that stopping the liquor shop picketing was not in his hands, but in the hands of the two women in Erode, indicating the intensity of their involvement. They wore Khadi clothes. E.V.R. also made his 80-year-old mother wear Khadi. Another aspect of this movement was to increase Khadi production to boycott foreign clothes, thereby causing significant losses to the government, and to empower our people economically. This was accomplished remarkably by Padmasani Ammal from Madurai. After her husband Srinivasa Varadhan was arrested for participating in the liquor shop picketing, she efficiently managed the Bharata Ashram that he ran, and also engaged in selling Khadi, enrolling women as Congress members, and giving speeches at public meetings. She removed her ornaments until her husband was released from prison.

She would eat only one meal a day, and even though she had the means to afford food, she would spin yarn every morning and eat only with the income she earned from it. In the evenings, she would go from house to house selling Khadi. Even though weaving, selling, and buying Khadi were punishable offenses, she defied the government's orders and ensured that even government officials bought at least one yard of cloth from her. She would encourage women to buy at least a yard of blouse material. She was an excellent orator. In her speeches, she would sometimes emotionally recount the histories of the heroes of the 1857 rebellion. She delivered numerous speeches, raising awareness, and also made more than five hundred women members of the Congress party.

To increase Khadi production, in 1924, she, along with Thayammal, Mrs. Joseph, Mrs. Sundaram Iyengar, Subbulakshmi Ammal, and T.V.S. Soundaram, established an organization called the 'Sisters' Association' in Madurai with the help of the Congress. In this association, about thirty women would spin yarn for two hours every Friday. The spinning wheels and cotton they needed were provided by the national school. Thayaram Ammal, Seethai Ammal, Muniyamma, and Dr. Pichaimuthu Ammal also worked with them. They discussed matters related to nationalism. They also provided spinning training and education to the women who came there. This association provided great encouragement to the women who participated in the freedom struggle. Their service was very helpful in boycotting foreign clothes.

### **Tamil Nadu Women in Vellore Prison**

Many women in Tamil Nadu who participated in the freedom struggle faced numerous cruel injustices. Women who were imprisoned were subjected to extreme cruelty. In Vellore Central Prison, the kumkum (vermilion) and bangles worn by the female political prisoners were forcibly taken away. The beds provided to them were



extremely dirty. The oil given to them for bathing for a whole week was not even sufficient for a single day. The rice and flour given to them for food were infested with insects. Up to a hundred women had to use a single toilet. They were forced to do hard labor such as breaking stones and weaving wool. In the Chennai reformatory prison, political prisoners and other criminals had to sleep together in the same section, with twelve people sharing a single space. In this Satyagraha movement, the number of people arrested and imprisoned in the Madras Presidency alone until February 1933 was 13,674. It is noteworthy that 633 of them were women.

This was the struggle in which women participated in large numbers. In December 1929, the National Congress conference held in Lahore resolved to launch the Civil Disobedience Movement and entrusted all responsibilities to Mahatma Gandhi. After the then Viceroy, Lord Irwin, rejected the plans formulated by Gandhi, as he had announced, Gandhi began a march from the Sabarmati Ashram with about 150 volunteers to Dandi on the Bombay coast to collect salt. In this incident, numerous Satyagrahis were arrested and punished.

### **Women's struggle in Vedaranyam**

Rajagopalachari wanted to hold a historically important struggle in Tamil Nadu. It was decided to make salt on the Vedaranyam beach in Thanjavur. Accordingly, on 13 April 1930, when he went to Vedaranyam and started making salt, he was arrested. Later, K. Santhanam was appointed as the second president. Rukmani Lakshmipathi Ammaiyar also cooperated with him. This Ammaiyar started an organization called 'Chennai Youth Association' in 1929 and worked to instill patriotism among the youth and women. She led the Vedaranyam Salt Satyagraha. She was the only woman among the two hundred male satyagrahis.; She would stay with the men in the camp. She would go to the areas where the officials lived and distribute pamphlets to reduce their loyalty to the government and instill patriotism. To suppress the satyagraha, Ammaiyar was arrested on May 14 and was kept in Thanjavur jail for one year with ordinary imprisonment. While the satyagraha was going on in Vedaranyam, a salt satyagraha was also being held in Chennai under the leadership of T. Prakasam. A female volunteer named Durgabai Ammal took the lead and set up a camp at Udayavaram. On May 2, when Ammaiyar, Krishnamma and some other women started boiling salt on the Santhome beach in Chennai in violation of the Salt Act and the Prohibition Order, the police broke the salt pots and dispersed the large crowd. Durgabai Ammaiyar delivered speeches in North Arcot. Later, on May 25, she boiled salt in violation of the Salt Act.

Women were involved in the struggle to picket colleges, educational institutions, foreign cloth shops, liquor shops and in the production of khadir. Their duty is to approach the traders and advise them to give up their business and advise the customers not to use those products. If this does not work, then they should lie down in front of the shops and stop the sale. This is Gandhiji's advice. In accordance with this advice, the women of Tamil Nadu joined the Congress committees and actively participated in these struggles. The government suppressed their legitimate demands with lathicharge and imprisonment. Ignoring all these punishments, they continued to struggle.

### **Women's Protest Against Gandhi's Arrest**

In early 1932, due to the government's actions contrary to the agreement, Gandhiji consulted with the Working Committee and formulated several plans for the protest. Upon learning of this, Viceroy Willingdon arrested Gandhiji and placed him in custody. Upon hearing this news, people across the country expressed their condemnation through hartals (strikes), demonstrations, and public meetings. Repression began to spread throughout the country. Key members and leaders were arrested. Congress committees were declared illegal organizations and disbanded. In Tamil Nadu, Gandhiji's arrest galvanized the people. Thirty women, including Padmaasani Ammal, Thayammal, Seethalakshmi, Muthammaal, Siddhu Bagyalakshmi Ammal, Kondalakshmi Ammal, and K.T. Kamala, who were representatives appointed by the Congress, were arrested in Madurai alone and imprisoned.

For the second time in 1932, Ambujammal was arrested while picketing a cloth shop and was imprisoned in Vellore jail. Gnanammal from Chennai was also among those arrested and imprisoned for participating in this protest. Rukmini Lakshmipathi and Durgabai also participated in this struggle.

During the intense period of the freedom struggle, patriots gave priority to patriotic songs even in their family functions. It was also customary to sing patriotic songs at political meetings. Among the women who showed special interest in singing patriotic songs during that time were Kothai Nayaki, K.B. Sundarambal, and T.K. Pattammal. Many volunteers were inspired by their powerful renditions of patriotic songs and participated in the movements. Kothai Nayaki was particularly skilled in singing Bharathi's songs. Whenever this lady's name was featured in Congress events, large crowds would gather. K.B. Sundarambal beautifully sang four songs composed by Madhurakavi Bhaskaradas, recording them on gramophone records and popularizing them among the people. In meetings held to protest the Madras government's ban on Bharatiyar's songs, she sang the song "Nenju Porukkuthillaiye" (The heart cannot bear it), rousing the people to action. When Gandhi was imprisoned during the Salt Satyagraha, the song "Gandhiyo Parama Ezhai Sanyasi" (Gandhi is a very poor ascetic) was sung by her, recorded on a gramophone record, and spread throughout the country. She developed a strong commitment to the Congress ideology and, in her free time, spun yarn and sent it to the Congress committee.



## Satyagraha Women in Tamil Nadu

Due to the severe repression in the country, the movement slowed down somewhat. Seeing this, Gandhiji granted permission for individual civil disobedience. He emphasized the importance of individual civil disobedience, stating that everyone should continue to serve tirelessly until they were arrested. Later, Gandhiji himself committed civil disobedience and was punished. Many women from all districts of Tamil Nadu participated and went to jail. On November 21, 1940, Rukmini Lakshmi pathi received a one-year prison sentence for conducting Satyagraha. K.P. Janaki Ammal was arrested while campaigning against the Second World War. Furthermore, Swarnammal and Chellammal from Madurai were arrested and imprisoned for giving speeches at public meetings. Following them, Akilandathammal and Lakshmikanthan Bharathi from Madurai, and during that period, Mrs. Soundaram Ramachandran, Mrs. Krishnaswamy, and Mrs. Ramasamy from Madurai also went to jail. Zamindarini Radhabai Subbarayan of Kumaramangalam was arrested among the public while distributing eight-page typed pamphlets against the world war. C.R. Sharadambal Ammal from Thoothukudi and Piyari Bibi from Karur were arrested and imprisoned for participating in this Satyagraha. Saraswathi Pandurangam received a six-month prison sentence and was imprisoned in Vellore jail. As a result, she lost her two-year-old daughter and six-month-old son.

## The Quit India Movement

The last chapter of the freedom struggle was the Quit India Movement that took place in 1942. A significant aspect of this struggle was the workers' strike. Anthony Ammal and Pechiammal were arrested and detained for a year for participating in the strike at the Pankaj Mill. Kuttiyammal from Coimbatore and Solaiyammal were arrested for attempting to sabotage the railway tracks and were sentenced to three and six months respectively, and imprisoned in Coimbatore jail. All college students in Chennai boycotted classes and supported the movement. Protest marches against the British were continuously held in Madurai from August to October. A large number of women participated in these protests. Enraged by this, police officer Theechatti Govindan and other policemen took Swarnammal and Lakshmi Bai, a woman from Maharashtra living in Madurai, in a vehicle, dropped them off in a forest on the Alagar Kovil road, 8 kilometers away, stripped them of their clothes, and beat and kicked them. Saying "This is the path to freedom," they threw them onto a forest path.

They hid there all night and in the morning, with the help of local farmers, obtained clothes, dressed themselves, and returned to Madurai. Students from Annamalai University, Queen Mary's College, and Christian College boycotted classes and held rallies and protests. Govindammal (1927-2016) was a soldier in the Rani of Jhansi Regiment, the women's wing of the Indian National Army formed by Netaji Subhas Chandra Bose in 1943. Netaji had called upon women to join the Rani of Jhansi Regiment, the women's army of the Indian National Army. Accepting this, Govindammal joined the Rani of Jhansi Regiment on December 12, 1943. This regiment, formed by a woman named Lakshmi Swaminathan with 20 Singaporean women, eventually had up to 1500 women. Of the 1500 women in the regiment, the first 100 were given training in firing various types of firearms. Govindammal was one of these first 100 selected women. Appreciating her honesty, Netaji promoted her to the rank of Lance Naik. She served in that army until October 1, 1945. After the regiment was disbanded on August 16, 1945, she returned to Tamil Nadu in 1949 with her husband and six children. The Rani of Jhansi Regiment had once set up a camp.

There, a mysterious incident occurred. Govindammal, who had been selected for a task, saw some people entering the camp in a vehicle and stopped it. Inside, Netaji was sitting in military uniform. The next day, Netaji praised her courageous act and awarded her the Lance Naik rank because of it. At that time, the war was raging fiercely. However, the Rani of Jhansi Regiment was stationed at the Indo-Burmese border. They faced guerrilla attacks there. The supply lines for food and war materials were cut off. Due to the severity of hunger, they ate fruits found in the forest, which caused stomach problems, including diarrhea and vomiting, due to their toxicity. In this situation, unable to cope with the war, Netaji ordered the women's regiment to return to Malaya to prevent them from falling into enemy hands. But Lakshmi Sahgal, the leader of this regiment, refused. Despite the Red Cross symbol marking the hospital, it was targeted by an air raid that very night. The hospital was razed to the ground. Commander Ellappa was severely wounded. In an attempt to escape, several others were killed by the shelling of the British guerrilla forces. His close companions, Stella and Josmin, were also killed in that battle.

## Conclusion

The struggle for freedom in India is one of the liberation movements in the World, Women in the freedom struggle of the country have contributed significantly. Indian women actively participated in the revolution and movement for social change during the national struggle for independence.

All sections of the society participated in the movement. There were a large number of workers strike such as strikes in Buckingham and Carnatic Mills, Madras Port Trust, Madras Corporation and the Electric Tramway. Telegraph and telephone lines were cut and public building burnt at Vellore and Panapakkam. Students of various colleges took active part in the protests. The airport in Sular was attacked and trains derailed in Coimbatore. Congress volunteers clashed with the military in Madurai. There were police firings at Rajapalayam, Karaikudi and Devakottai. Many young men and women also joined the INA. The Quit India Movement was suppressed with brutal force.



Thus the participation of women was not restricted to a particular type of activity such as the non-violent satyagraha movement. Women's early contribution to the Indian Freedom struggle started in the late 19th Century with Women's involvement in the Indian National Congress. Ever since the formation of the Indian National Congress in 1885, the participation of women and their activities grew slowly but steadily and the Indian people got a platform to express that grievance against the British. Thus the entry of women in the Freedom struggle during the 19<sup>th</sup> century opened a new phase in the annals of the Indian national movement. It paved the way for the entry of women on large scale during the subsequent course of action in the arena of the Home Rule Movement, Non – Co-operation and Khilafat Movement, Civil Disobedience Movement and Quit India.

## Reference

1. Women in Tamil Nadu A profile, Tamil Nadu Corporation for Development of women limited, Madras 1986.
2. V. Rajalakshmi, The Political Behaviour of Women in Tamilnadu, New Delhi, 1985.
3. Jaya Surya, Bharathanaatin Pudhumai Pengal (Tamil), Chennai, 2003
4. V. Kalyana Sundaranar, Pennin Perumai, Third Edition, Chennai, 1934.
5. Sarala Rajagopalan, Kaalam Venra Thamilaga Mahalir (Tamil), Chennai, 2007.
6. Karunanantham,Thanthai Periyar Vazhkai Varalaru (Tamil), Chennai, 2007.
7. Suryakumari, The Great Women of India, Chennai, 2008.
8. Annie Thomas, Thamizhaga Magaliriyal (Tamil), Chennai, 2002.
9. Thina Thanthi, Tamil Daily.
10. The Hindu, English Daily.
11. Nawaz B.Mody, Women's in India's Freedom Struggle, Bombay, 2000.
12. Sivarajan, Sathanai Pengal (Tamil), Chennai, 2004.
13. Annai Maniammayin Thondarvam (Tamil), Published by DK Party, Periyar Thidal, Chennai, 1999.
14. Agarwal, R.C., Constitutional Development of India and National Movement, Delhi, 1984.
15. Alladi Vaidehi Krishnamurthi, Freedom Movement in India 1859 to 1947, Madras, 1977
16. Aparna Basu, Role of Women in Indian Struggle for Freedom, New Delhi, 1976.
17. Asthana, Pratima, Women's Movement in India, Delhi, 1974.
18. Baig, Tara Ali, Women of India, New Delhi, 1958.
19. Baliga, B.S., Studies in Madras Administration Government of Madras, Madras, 1960.
20. Baski, S.R., Indian Freedom Fighters Struggle for Independence, Vol-15., New Delhi, 1990.
21. Bharti Thakur, Women in Gandhi's Mass Movements, New Delhi, 2006.
22. Bipan Chandra, India's Struggle for Independence, New Delhi, 1989.



## Original Article

### Re-Imagining the Legal Nexus of Sanitation, Water and Biodiversity

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**Abstract**

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*Historically, water and sanitation (WASH) laws have focused on human health and urban engineering, often viewing "waste" as a pollutant to be removed rather than a nutrient to be cycled. This research paper explores the legal paradigm shift required to transition from a human-centric model to an eco-centric integration, where water and sanitation laws serve as primary instruments for biodiversity conservation. By reimagining "Right to Sanitation" through the lens of "Rights of Nature," we can create legal frameworks that protect aquatic ecosystems and terrestrial habitats simultaneously. The global governance of the hydrological cycle is currently fractured by a profound ontological and statutory schism. On one side lies the "brown" agenda of sanitation engineering—governed by public health mandates, urbanization policies, and a utilitarian view of water as a vector for waste transport. On the other lies the "green" agenda of biodiversity conservation—governed by environmental treaties, protected area regulations, and an increasingly desperate attempt to shield ecosystems from human encroachment. This report argues that this "Great Divergence" in law has created a "metabolic rift," where the legal structures designed to protect human dignity (the Human Right to Water and Sanitation) often inadvertently mandate the degradation of the very ecosystems (the Human Right to a Healthy Environment) upon which all life depends.*

**Keywords:** Eco-Sanitary Law, Rights of Nature, Biodiversity Nexus, Nature-Based Solutions, Circular Sanitation, Regenerative Jurisprudence, Nutrient Recovery.

#### Introduction

Current legal frameworks often treat Water and Sanitation Law and Biodiversity Law as distinct silos. While one focuses on infrastructure and public health (SDG 6), the other focuses on habitat protection and species survival (SDGs 14 & 15). However, the discharge of untreated wastewater and the over-extraction of freshwater are primary drivers of the "Sixth Mass Extinction." This paper proposes a reimagining of the law that treats the water cycle as a singular, living entity. Biodiversity law—manifested in international instruments like the Convention on Biological Diversity (CBD) and the Ramsar Convention—evolved to protect species and habitats from the expanding footprint of humanity. While these frameworks acknowledge pollution as a threat, they historically view sanitation infrastructure as an external "stressor" to be managed via Environmental Impact Assessments (EIA), rather than an integral part of the ecosystem's metabolism. The conservation law community has traditionally focused on "wilderness" areas, creating legal enclaves (Protected Areas) where human habitation—and thus human sanitation—is either prohibited or ignored.

#### From Linear Disposal to Circular Legality

The traditional legal approach to sanitation is linear: *Extract* → *Use* → *Treat (partially)* → *Discharge*. To protect biodiversity, the law must mandate Circular Sanitation. Nutrient Recovery Mandates: Instead of legal limits on "pollutants," laws should require the recovery of nitrogen and phosphorus to prevent eutrophication in sensitive biodiversity hotspots.

**Green Infrastructure Requirements:** Moving away from concrete-heavy treatment plants toward legally protected "constructed wetlands" that act as both sanitation systems and migratory bird habitats.



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**Sanitation laws** focus on pathogen removal and effluent standards (e.g., BOD, COD levels) geared solely toward preventing human disease.

**Biodiversity laws** focus on protected areas and species lists, often ignoring the pervasive impact of diffuse wastewater pollution on aquatic ecosystems.

### Imagining a "Nutrient Cycling Law"

To integrate sanitation into biodiversity conservation, the law must re-imagine the ontology of excreta. We propose a shift from "Waste Law" (focus on disposal/containment) to "Metabolic Law" (focus on cycling/recovery).

**The "Right to Return" and the "Duty to Cycle":** Just as the "Right to Water" is established, Earth Jurisprudence scholars advocate for a "Duty to Return" nutrients to the soil. This would mandate that sanitation systems be designed not for *disposal* but for *recovery*

### The Ecological Deficit in Current Legislation

Traditional sanitation laws operate on a **Linear Model**: *Extraction Consumption Treatment Discharge*.

From a biodiversity perspective, this model is flawed for two reasons:

1. **Nutrient Overloading:** It concentrates Nitrogen (N) and Phosphorus (P)—essential building blocks of life—into aquatic systems, causing eutrophication and dead zones that suffocate aquatic biodiversity.
2. **Barrier Effects:** Hard infrastructure (concrete pipes, dams for water supply) fragments habitats and disrupts the hydrological cycles necessary for riparian species.

### The Paradox of the Ganges: Rights without Teeth

The limits of legal imagination are starkly illustrated by the case of the Ganges (Ganga) and Yamuna rivers in India. In 2017, the Uttarakhand High Court declared these rivers to be "legal persons/living entities" with "all corresponding rights, duties and liabilities of a living person".

**The Sanitation Gap:** However, unlike the New Zealand model, which provided a robust institutional framework (*Te Pou Tupua*), the Indian ruling was stayed by the Supreme Court due to "legal and administrative impracticalities". Despite the rhetorical elevation of the river to "Mother Ganga," the massive *Namami Gange* program has struggled to address the "gross negligence" of municipal wastewater management. Research indicates that regulatory failures, lack of community engagement, and the malfunctioning of Sewage Treatment Plants (STPs) continue to plague the river.

**The Agency Problem:** A critical flaw in the Uttarakhand judgment was appointing state officials (e.g., the Chief Secretary of the State) as the *loco parentis* (guardians) of the river. These were the same officials responsible for the municipal bodies discharging untreated sewage into the river. This created a conflict of interest that nullified the legal personhood status. The lesson for future legislation is clear: **Legal personhood is insufficient without independent guardianship and a "Duty of Care" that is enforceable against the state itself.** A true "Earth Jurisprudence" for sanitation would require independent guardians with the power to sue the government for failing to build and maintain sanitation infrastructure.

### The Ramsar Convention and Constructed Wetlands

The *Ramsar Convention on Wetlands* offers a unique and underutilized legal tool for sanitation.

**Artificial Wetlands:** The Ramsar definition of "wetland" explicitly includes "wastewater treatment ponds". This allows sanitation infrastructure to be designated as "Wetlands of International Importance" if they support significant biodiversity (e.g., migratory birds).

**The Dual Benefit:** A constructed wetland can legally fulfill two state obligations simultaneously: the obligation to treat water (sanitation/public health) and the obligation to protect wetland habitat (biodiversity). This "legal stacking" allows for the pooling of budgets from health and environment ministries and provides "Ramsar status" protection to sanitation assets.

### Constitutionalism and Hydrosocial Justice

The intersection of sanitation and biodiversity is often a site of intense "hydrosocial conflict," where the rights of communities to sanitation clash with, or are aligned with, the rights of nature.

### The Human Right to a Healthy Environment (HRHE)

The recognition of the HRHE creates a constitutional imperative to align sanitation with ecology.

**Constitutional Mandates:** In countries with an "Ecological Constitution" (like Colombia, Ecuador, and increasingly France), the state has a positive obligation to prevent environmental retrogression. This means that building a sanitation system that degrades a river could be challenged as unconstitutional.

**Litigation Strategies:** Civil society organizations are using this framework to sue for better sanitation. The *Center for Biological Diversity* in the U.S. frequently sues the EPA to force stricter water quality standards to protect endangered species, effectively using the *Endangered Species Act* as a proxy for sanitation law.

**Earth Law Center:** Groups like the *Earth Law Center* advocate for "Earth Law" frameworks that give legal standing to ecosystems, allowing communities to sue on behalf of the river to stop pollution. They argue that "Daylighting" rivers (uncovering buried urban streams) is a form of sanitation that restores biodiversity.

## Comparative Analysis of Legal Metrics

Feature	Traditional Sanitation Law	Reimagined Biodiversity-Sanitation Law
<b>Primary Goal</b>	Protect Human Health	Protect Ecosystem Integrity (One Health)
<b>Standard</b>	Chemical Limits (e.g., pH, Suspended Solids)	Biological Limits (e.g., Species Diversity Index)
<b>Waste View</b>	Nuisance to be removed	Nutrient to be cycled
<b>Liability</b>	Fines for exceeding discharge limits	Restorative Justice for ecosystem damage

### Proposed Framework: The "Eco-Sanitary" Legal Model

To reimagine these laws, we must transition to a **Circular Legal Model**. This involves three key statutory innovations:

#### A. Mandating Nature-Based Solutions (NBS)

Laws should shift from prescriptive technology standards (e.g., demanding specific concrete tank designs) to **performance-based ecological standards**.

**Proposal:** Legislation should prioritize "Constructed Wetlands" and "Green Filtering" over gray infrastructure. These systems treat water while simultaneously providing habitat for amphibians, birds, and pollinators.

**Legal Mechanism:** Zoning laws that designate "Bio-Sanitary Corridors" where wastewater treatment is legally required to double as a wildlife refuge.

#### B. Nutrient Trading and Recovery Rights

Current law defines human excreta primarily as "waste" or "hazardous material." A biodiversity-positive legal framework must redefine it as a **"Recoverable Resource."**

**Proposal:** Establish a legal framework for "Nutrient Rights," similar to carbon credits. Sanitation providers would be legally mandated to recover and for agricultural reuse, preventing these nutrients from entering waterways and altering ecosystem balance.

#### C. The "Rights of Nature" in Sanitation

Expanding upon recent legal precedents (such as the legal personhood of the Whanganui River), sanitation laws must recognize the **Right of the Receiving Body**.

**Proposal:** The water body receiving the treated effluent should have the legal right to maintain its specific biological flow and chemical integrity. If a sanitation system alters the biodiversity index of the receiving river, it should be considered a violation of the river's rights, actionable in court

### Conclusion

Reimagining water and sanitation law requires us to view human settlements not as separate from nature, but as a subsystem within the biosphere. By codifying the interdependence of sanitation and biodiversity, we can create a legal environment where every flush contributes to the restoration of natural habitats rather than their degradation. The law must evolve from regulating "sewage" to stewarding "resource flows" for the benefit of all species. The "imagining" of water and sanitation in conservation law is ultimately a call for a **Metabolic Turn** in jurisprudence. It asks us to see the legal system not as a set of static rules governing objects, but as a dynamic metabolism that regulates the flow of matter and energy through the biosphere. By aligning human laws with the laws of nature—by closing the loop, respecting the river as a person, and valuing the soil—we can create a legal order that sustains both human dignity and the web of life.

### Reference

#### Legal Frameworks & "Rights of Nature"

1. **The Constitution of Ecuador (2008):** Chapter 7, "Rights of Nature" (Pacha Mama). *This is the primary legal precedent for granting ecosystems the right to exist and regenerate, which supports the "Eco-Sanitary" model.*
2. **Te Awa Tupua (Whanganui River Claims Settlement) Act 2017 (New Zealand):** *This legislation granted legal personhood to a river, setting a precedent for "The Right of the Receiving Body" discussed in the paper.*
3. **Boyd, D. R. (2017).** *The Rights of Nature: A Legal Revolution That Could Save the World.* ECW Press. *Essential reading for the legal theory behind shifting from anthropocentric to eco-centric law.*

#### The Nexus of WASH (Water, Sanitation, Hygiene) & Biodiversity

4. **Andersson, K., et al. (2016).** *Sanitation, Wastewater Management and Sustainability: From Waste Disposal to Resource Recovery.* UNEP & SEI. *This book provides the technical and policy arguments for moving from "disposal" to "circular" sanitation.*
5. **Mara, D., & Horan, N. (2003).** *The Handbook of Water and Wastewater Microbiology.* Academic Press. *Classic text on the biological impacts of wastewater, useful for the "Nutrient Overloading" section.*
6. **Convention on Biological Diversity (CBD):** *specifically Decision X/2, which links water security to biodiversity targets (Aichi Targets).*

#### Nature-Based Solutions & Green Infrastructure

7. **UN World Water Development Report (2018):** *Nature-based Solutions for Water.* UN-Water. *The authoritative global report on using wetlands and green infrastructure instead of gray infrastructure.*



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8. **Masi, F., Rizzo, A., &Regelsberger, M. (2018).** "The role of constructed wetlands in a new circular economy, resource oriented, and ecosystem services paradigm." *Journal of Environmental Management*, 216, 275-284. *Scientific backing for the "Mandating Nature-Based Solutions" section.*

## "One Health" & Ecological Law

9. **Capra, F., & Mattei, U. (2015).***The Ecology of Law: Toward a Legal System in Tune with Nature and Community.* Berrett-Koehler Publishers. *Theoretical foundation for changing the philosophy of law to match biological reality.*
10. **World Health Organization (WHO) (2018).***Sanitation and Health Guidelines.*While focused on health, recent updates have begun to acknowledge environmental transmission pathways, supporting the "One Health" argument.



## Original Article

### Electoral Reforms and the Future of Indian Democracy: Challenges, Innovations and Democratic Consolidation

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#### Abstract

Electoral reforms constitute a cornerstone for sustaining democratic legitimacy in any representative political system, particularly in a diverse and populous polity such as India. Over seven decades, India's democratic framework has endured significant social, economic, and technological transformations, yet its electoral machinery has adapted only partially to emerging demands. Persistent challenges—including criminalization of politics, escalating expenses in electioneering, lack of transparency in political financing, diminishing public trust in electoral integrity, and the misuse of digital technologies—pose serious risks to the future of Indian democracy. Simultaneously, India has witnessed important innovations such as the introduction of electronic voting machines, mandated candidate disclosures, reforms in voter registration, and institutional strengthening of the Election Commission. These efforts have bolstered procedural efficiency but have not fully alleviated deeper structural deficits. This paper examines the critical relationship between electoral reforms and democratic consolidation in India's contemporary context. It evaluates existing reform measures, identifies systemic obstacles undermining democratic performance, and appraises new institutional and technological interventions. Through an analytical framework that integrates normative democratic theory with empirical evidence, this study argues that effective electoral reforms must go beyond procedural fixes to encompass issues of equity, accountability, and citizen empowerment. It further highlights that democratic consolidation is not an automatic outcome of periodic elections but a function of the quality, fairness, and inclusiveness of electoral competition. Ultimately, the paper underscores the imperative for sustained, transparent, and participatory reform processes that can reconcile democratic ideals with complex socio-political realities in India's electoral future.

**Keywords:** Electoral Reforms; Indian Democracy; Democratic consolidation; Political financing; Institutional innovation.

#### Introduction

Elections represent the most visible and institutionalized expression of democracy, serving as the primary mechanism through which citizens exercise political sovereignty. In India, the electoral process has been central to democratic governance since the adoption of the Constitution in 1950, which established universal adult franchise and an independent Election Commission to ensure free and fair elections [1]. As the world's largest democracy, India conducts elections on a scale unmatched globally, making electoral integrity not merely a domestic concern but a matter of international democratic credibility. Despite its democratic resilience, India's electoral system has been persistently challenged by structural and procedural distortions. Scholars have noted that while India has succeeded in maintaining regular elections, the quality of electoral competition has often been compromised by the influence of money power, criminalization of politics, misuse of state resources, and weak internal party democracy [2]. These challenges undermine the normative foundations of democracy, particularly political equality and accountability, and threaten the long-term legitimacy of representative institutions.

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Electoral reforms in India have evolved incrementally through constitutional amendments, legislative enactments, judicial interventions, and administrative innovations. Measures such as the lowering of the voting age, introduction of electronic voting machines, and mandatory disclosure of candidate information reflect efforts to modernize the electoral process and enhance transparency [3]. However, reforms have often been reactive rather than systemic, addressing immediate crises without resolving deeper structural inequalities embedded in electoral politics.

In recent years, the rise of digital campaigning and social media has further complicated the electoral landscape. While digital platforms have expanded political outreach and voter engagement, they have also enabled misinformation, polarization, and data manipulation, raising new regulatory and ethical concerns [4]. These developments underscore the need to rethink electoral reforms not only as administrative adjustments but as democratic safeguards essential for political stability and citizen trust. Democratic consolidation depends on more than the procedural conduct of elections; it requires that elections are perceived as fair, inclusive, and meaningful by citizens. When electoral processes are compromised, public confidence erodes, participation declines, and democratic norms weaken [5]. Electoral reforms, therefore, play a decisive role in shaping the future trajectory of Indian democracy. This paper examines electoral reforms in India within the broader framework of democratic consolidation. Section 2 discusses the theoretical relationship between electoral reforms and democratic consolidation. Section 3 analyzes the major challenges confronting India's electoral system. Section 4 evaluates key innovations and reform initiatives aimed at strengthening electoral integrity. Section 5 concludes by reflecting on the implications of electoral reforms for the future of Indian democracy.

## **Electoral Reforms and Democratic Consolidation: A Conceptual Framework**

Democratic consolidation refers to the process by which democratic institutions, norms, and practices become deeply embedded in political life, ensuring stability and resistance to authoritarian reversal. Elections are central to this process, as they institutionalize political competition and legitimize the exercise of power. Electoral reforms serve as instruments to align electoral practices with democratic ideals such as equality, participation, accountability, and transparency [6].

Political equality is a foundational principle of democratic consolidation. However, unequal access to resources and political networks often results in asymmetrical influence over electoral outcomes. Electoral reforms aimed at regulating campaign finance and ensuring transparency seek to mitigate these inequalities and promote fair competition [7]. Without such reforms, elections risk becoming contests dominated by wealth rather than democratic choice.

Participation is another critical dimension. Electoral reforms that expand voter access, simplify registration procedures, and address barriers faced by marginalized groups contribute to democratic inclusiveness. In India, reforms such as the reduction of voting age and voter awareness programs have expanded participation, particularly among youth and first-time voters [8].

Institutional autonomy is equally vital for democratic consolidation. Independent electoral management bodies ensure impartial administration and public trust. The constitutional status of the Election Commission of India reflects recognition of this necessity, although debates continue regarding appointment procedures and institutional independence [9].

Thus, electoral reforms operate at the intersection of procedural efficiency and democratic legitimacy. Their effectiveness depends not only on legal design but also on political will, institutional capacity, and civic engagement.

## **Challenges to India's Electoral System**

One of the most serious challenges confronting Indian democracy is the criminalization of politics. A significant proportion of elected representatives face criminal charges, including serious offenses, which undermines legislative integrity and public trust [10]. Despite judicial directives, legislative reforms to disqualify such candidates remain limited. The growing influence of money power further distorts electoral competition. Rising campaign costs and opaque funding mechanisms advantage affluent candidates and weaken democratic accountability. While expenditure limits exist, enforcement remains weak, and political finance reforms have yielded mixed outcomes [11]. Misuse of state resources during elections poses another challenge. Incumbent governments often leverage administrative machinery and public funds for electoral advantage, compromising the level playing field. The non-statutory nature of the Model Code of Conduct limits its deterrent effect [12].

Digitalization has introduced new vulnerabilities. Social media platforms have facilitated political mobilization but also enabled misinformation, hate speech, and micro-targeted manipulation of voters. Regulatory frameworks have struggled to keep pace with technological change, posing risks to electoral integrity [13].

Finally, participation gaps persist across social and regional lines. Urban apathy, migrant exclusion, and gender-based barriers continue to affect democratic inclusiveness, highlighting the need for targeted electoral reforms.



## Innovations and Reform Initiatives in India

India has undertaken several innovative reforms to address electoral challenges. The introduction of Electronic Voting Machines significantly reduced electoral malpractices and improved administrative efficiency [14]. The addition of Voter Verifiable Paper Audit Trails further enhanced transparency and voter confidence.

Mandatory disclosure of candidate information, including criminal records and assets, represents another major reform aimed at empowering voters and promoting ethical politics [15]. Civil society initiatives have played a crucial role in disseminating this information. Voter registration reforms, including online enrolment and special drives for marginalized groups, have expanded participation. Administrative reforms by the Election Commission, such as real-time monitoring and enhanced grievance redressal, have strengthened electoral governance.

Civic education initiatives, particularly voter awareness programs, have contributed to democratic engagement by promoting informed participation and ethical voting behaviour. While these reforms reflect progress, their long-term effectiveness depends on consistent enforcement, institutional autonomy, and public trust.

## Conclusion

Electoral reforms are fundamental to the future of Indian democracy and its democratic consolidation. While India has demonstrated remarkable resilience through regular elections and institutional continuity, persistent challenges continue to undermine electoral integrity and public confidence. Innovations in electoral administration and technology have improved procedural efficiency, yet deeper structural reforms are necessary to address criminalization, money power, and digital manipulation. Democratic consolidation requires sustained commitment to transparency, inclusiveness, and accountability. The future of Indian democracy will ultimately depend on the credibility of its electoral processes and the collective resolve of institutions, political actors, and citizens to protect and strengthen democratic values.

## References

1. Constitution of India, Articles 324–329.
2. Palshikar, S., Suri, K. C., & Yadav, Y., *Electoral Politics in India*, Oxford University Press, 2014.
3. Election Commission of India, *Electoral Reforms in India*, ECI Publications, 2016.
4. Chadwick, A., *The Hybrid Media System: Politics and Power*, Oxford University Press, 2017.
5. Dahl, R. A., *On Democracy*, Yale University Press, 1998.
6. Linz, J. J., & Stepan, A., *Problems of Democratic Transition and Consolidation*, Johns Hopkins University Press, 1996.
7. Norris, P., *Electoral Integrity and Democratic Governance*, Cambridge University Press, 2014.
8. Government of India, *61st Constitutional Amendment Act*, 1988.
9. Law Commission of India, *255th Report on Electoral Reforms*, 2015.
10. Vaishnav, M., *When Crime Pays*, Yale University Press, 2017.
11. Election Commission of India, *Compendium of Instructions on Election Expenditure*, 2019.
12. Association for Democratic Reforms, *Model Code of Conduct and Electoral Fairness*, ADR Reports, 2020.
13. UNESCO, *Elections and Digital Misinformation*, 2021.
14. Sridharan, E., “Electronic Voting Machines and Democratic Deepening,” *Asian Survey*, 2002.
15. Supreme Court of India, *PUCL v. Union of India*, 2003.



## Original Article

### Role of Media in Shaping Culture

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#### Abstract

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*The media plays an essential part in shaping, reflecting, and evolving culture in modern society. As print, electronic and digital media continue to expand rapidly, cultural values, beliefs, lifestyles, and social norms are persistently impacted at both local and global scales. Media serves not only to distribute information but also as a significant agent of socialization by creating meanings, identities, and collective experiences. Through various channels such as news outlets, films, television shows, advertisements, and social media platforms, media influence's public opinion, reinforces prevailing ideologies, and introduces emerging cultural trends. This paper explores the media's role in shaping culture, concentrating on its effects on values, language, traditions, behavioural patterns, and social interactions. This study adopts a descriptive and analytical approach based on secondary data collected from books, journals, research papers, and reliable online sources. The results show that while the media makes a positive contribution by promoting cultural awareness, diversity, and social inclusion, it also causes problems such as cultural homogenization, stereotyping, and the erosion of traditional values. The paper concludes that responsible media practices and media literacy are essential if the media are to become a constructive rather than a destructive force in cultural development.*

**Keywords:** Media, Culture, Socialization, Mass Media, Cultural Change

#### Introduction

Culture refers to the values, beliefs, customs, traditions, language, and way of life shared by a society. It is dynamic rather than static, evolving to the rhythm of social, economic and technological change. Media is one of the most influential forces driving cultural change in modern society. Media includes traditional formats such as newspapers, radio, and television, as well as new media such as the Internet, social networking sites, blogs, and streaming platforms. In the past, culture was primarily transmitted through family, religion, and social institutions. However, in modern times, the media has become the dominant cultural subject. It affects the way people think, dress, speak, behave, and perceive the world. Media representations play an important role in the formation of cultural identity, especially among young people. Global media networks have also led to increased cultural exchange, giving rise to both cultural exchange and cultural conflict. This article examines the role of the media in shaping culture by examining its influence on cultural values, social norms, and daily habits. The positive and negative effects of media influence on culture are also highlighted.

#### Objectives of the Study

The main objectives of the study are:

1. Understand the concept of media and culture.
2. Explore the role of media in shaping cultural values and social norms.
3. Analyse the influence of different forms of media on cultural change.



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4. Identify the positive and negative effects of media on culture.
5. Suggest measures to promote the responsible use of media and the preservation of culture.

## Research Methodology

This study is based on secondary data. A descriptive and analytical research design was adopted to examine the role of media in shaping culture. Data sources

- Books on media studies, sociology and cultural studies.
- Research journals and conference proceedings.
- Newspaper and magazine articles
- Trusted online sources and reports.

The collected data was systematically reviewed, analyzed and interpreted in order to draw meaningful conclusions related to the cultural influence of media.

## Media and culture concept

Media are the means of mass communication used to reach large audiences, such as newspapers, radio, television, movies, and digital platforms such as social media and websites. Culture is the entire way of life of a society, including values, beliefs, norms, customs, art, and language. Media and culture are interconnected. Media act as vectors of culture, transmitting cultural symbols, ideas, and practices from generation to generation. At the same time, culture influences media content, themes, and representation.

## The role of media in shaping cultural values and social norms

The media plays an important role in shaping cultural values and social norms by repeatedly portraying certain behaviours, lifestyles, and beliefs as acceptable or desirable. Television shows, movies, and advertisements influence attitudes toward family, gender roles, education, achievement, and morality. The media shape's public opinion on social, political, and cultural issues. Through continuous exposure, the media normalizes certain cultural patterns and inhibits others. Social media platforms further enhance this influence by allowing ideas, trends, and opinions to be instantly shared and tested.

## The influence of different forms of media on cultural change

Different forms of media play different roles in influencing and transforming culture. As media technologies develop, cultural values, lifestyles, communication patterns, and social relationships change. Below we discuss the main forms of mass media and their influence on cultural change.

### Print media

Print media includes newspapers, magazines, books, and magazines. It has traditionally played an important role in the formation of cultural consciousness and intellectual development. Newspapers and magazines disseminated ideas about social reform, education, literature, and national identity. Print media has contributed to the preservation of languages, traditions, and historical knowledge by recording cultural practices and events. Although their influence has diminished with the advent of digital media, print media continues to support informed cultural change through in-depth analysis and critical debate.

### Electronic media (radio and television)

Electronic media have had a major impact on cultural change and have reached large and diverse audiences. Radio connects people from different regions by broadcasting music, cultural programs, and information in multiple languages. Television shapes lifestyles, fashion, language, and social norms through series, reality shows, movies, and advertisements. It popularizes certain cultural practices while redefining family roles, gender identity, and social expectations. Television has also contributed to cultural standardization by promoting common cultural symbols and values.

### Movies and visual media

Film is a powerful medium that influences cultural imagination and identity. Movies reflect social reality and also shape attitudes toward love, marriage, morality, patriotism, and success. Movies influence fashion trends, conversational styles, music, and youth culture. While this can promote cultural pride and recognition, it can also reinforce stereotypes and unrealistic cultural ideals.

### Digital and social networks

Digital media, such as social media platforms, blogs, websites, and streaming services, have rapidly changed culture. Social media enables instant communication and global cultural exchange. Users actively participate in the creation and sharing of cultural content, leading to new forms of cultural expression. Digital media has blurred cultural boundaries, fostered a global youth culture, and stimulated the formation of individual identities. However, it has also accelerated cultural change, sometimes leading to the loss of traditional values and the spread of misinformation.



## Advertising media

Advertising influences cultural change by shaping consumer behavior and life aspirations. Promote new products, trends, standards of beauty and success. Over time, advertising influences consumption, social status, and cultural attitudes toward modern life, often promoting materialistic values.

## Positive impact of media on culture

### Increase cultural awareness

Media helps people learn about different cultures, traditions, languages, and lifestyles. Through documentaries, films, news and digital platforms, people are exposed to diverse cultural practices that promote understanding, tolerance and mutual respect.

### Preservation and transmission of culture

Media plays an important role in preserving cultural heritage by recording traditions, festivals, art forms, folklore and historical events. Print and digital media enable the transmission of cultural knowledge from one generation to the next.

### Strengthening social inclusion

Media creates shared experiences that bring people together. National events, cultural programs and social campaigns broadcast through the media promote unity, collective identity and a sense of community.

### A platform for cultural expression and creativity

Media provides a space for artists, writers, directors, and performers to express cultural ideas and creativity. Social media, in particular, allows individuals and communities to showcase their cultural identity and innovation.

### Encourage social change

Media raises awareness about social issues such as gender equality, environmental protection, and human rights. The media contributes to positive cultural change by challenging outdated practices and promoting progressive values.

## Negative impact of media on culture

### Homogenization of culture

Global media often promotes dominant cultures that can overshadow local and traditional cultures. As a result, unique cultural practices could decline, leading to a loss of cultural diversity.

### Propagation of stereotypes and distortions

The media sometimes presents biased or inaccurate representations of certain groups based on gender, caste, class, ethnicity or religion. These stereotypes reinforce prejudices and have a negative impact on cultural understanding.

### Erosion of traditional values

Overexposure to media content that emphasizes materialism, violence, and individualism can weaken traditional values such as family bonds, respect for elders, and community living.

### Propaganda of consumerism

Advertising and entertainment media often promote consumer culture by associating happiness and success with material possessions. This can distort cultural priorities and promote unhealthy lifestyles.

### Negative impact on youth

Media has a strong influence on the minds of young people. Exposure to inappropriate content, unrealistic beauty standards, and violent behaviour can affect young people's attitudes, self-esteem, and behavioural patterns.

## Findings of the study

1. Media plays an important role in shaping cultural values, beliefs, and social norms in modern society.
2. Digital and social media are accelerating cultural change and global cultural exchange.
3. Media promotes cultural awareness, but it also contributes to cultural homogenization and stereotyping.
4. Young people are strongly influenced by the media in terms of lifestyle, language and behaviour.

## Suggestions

1. Media literacy should be encouraged so that people can critically understand media content.
2. News organizations must ensure ethical and culturally sensitive representation.
3. Local culture and traditions should be promoted through local and community media.

## Conclusion

Media plays a vital role in shaping culture in contemporary society. It influences values, beliefs, language, behaviours and social relationships at the individual and collective levels. With the proliferation of print, electronic and digital media, culture has become more dynamic, interactive and globally connected.

The study concludes that while the media makes a positive contribution by promoting cultural awareness, social inclusion, creativity and progressive social change, it also creates serious problems such as cultural homogenization, stereotyping, consumerism and the erosion of traditional values. Therefore, the influence of media on culture depends largely on the ways in which media are produced, regulated, and consumed.

Responsible media practices, ethical content creation, and strong media literacy are essential for the media to be a constructive force for cultural development. When used wisely, media can strengthen cultural identity, maintain diversity, and contribute to a balanced and inclusive society.



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## **References**

1. Appadurai, A. (1996). *Modernity at large: Cultural dimensions of globalization*. University of Minnesota Press.
2. Baran, S. J., & Davis, D. K. (2015). *Mass communication theory: Foundations, ferment, and future* (7th ed.). Cengage Learning.
3. Berger, P. L., & Luckmann, T. (1966). *The social construction of reality: A treatise in the sociology of knowledge*. Anchor Books.
4. Castells, M. (2010). *The rise of the network society* (2nd ed.). Wiley-Blackwell.
5. Giddens, A. (2009). *Sociology* (6th ed.). Polity Press.
6. Hall, S. (1997). *Representation: Cultural representations and signifying practices*. Sage Publications.
7. McQuail, D. (2010). *McQuail's mass communication theory* (6th ed.). Sage Publications.
8. Storey, J. (2018). *Cultural theory and popular culture: An introduction* (8th ed.). Routledge.
9. Thompson, J. B. (1995). *The media and modernity: A social theory of the media*. Stanford University Press.



## Original Article

### Promoting Wellness: The Vital Role of Physical Education in Enhancing Public Health

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*Physical Education (PE) is crucial for improving public health by encouraging physical activity, preventing chronic illnesses, and enhancing mental well-being. This article examines the diverse ways PE contributes to better individual health, lowers the incidence of chronic diseases like heart disease, diabetes, and obesity, and supports mental health by reducing stress and boosting cognitive function. Additionally, it underscores the role of PE in fostering social skills, encouraging community involvement, and shaping effective health policies. Highlighting the necessity for coordinated approaches and policy backing, the article calls for the broad adoption of high-quality PE programs to create healthier populations and sustainable communities. Investing in PE is vital for achieving long-term public health objectives and enhancing overall life quality.*

**Keywords:** Physical Education, Public Health, Physical Activity, Disease Prevention, Mental Health, Community Development, Health Policies, Youth Fitness, Chronic Disease Prevention

#### Introduction

In a time characterized by more sedentary behavior and escalating health issues, promoting wellness through preventive strategies is more important than ever. Physical Education (PE) plays a crucial role in encouraging healthy habits, increasing physical activity, and building a culture of well-being within communities. As an essential part of the Education system, PE not only focuses on improving students' motor skills and physical fitness but also acts as a powerful means to enhance public health. The advantages of regular physical activity go well beyond personal fitness; they play a significant role in lowering the rates of chronic conditions such as obesity, diabetes, heart diseases, and mental health problems. By incorporating physical Education into everyday life, societies can enable individuals to lead healthier lives, enhance overall quality of life, and lessen the strain on healthcare services. This paper investigates the various ways physical Education contributes to public health, underlining its vital role in promoting wellness, preventing illness, and encouraging a more active and healthier population.

Physical Education (PE) has long been recognized as a fundamental part of school curricula, aimed not only at boosting physical fitness but also at supporting overall health and well-being. From a public health standpoint, PE is essential in fostering healthy behaviors, preventing chronic diseases, and improving mental health within communities. As rates of non-communicable diseases (NCDs), sedentary lifestyles, and mental health issues rise, the importance of integrating structured physical activity through PE becomes increasingly evident. This paper explores the multiple ways PE supports public health, emphasizing its significance in disease prevention, mental health improvement, community development, and the formulation of related policies.

#### The Importance of Physical Activity for Public Health

Physical activity (PA) refers to any movement generated by skeletal muscles that uses energy.

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It includes a wide range of activities such as walking, running, playing sports, exercising, and everyday tasks. Engaging in regular physical activity is essential for sustaining health, preventing illnesses, and enhancing overall quality of life. The World Health Organization (WHO) advises adults to participate in at least 150 minutes of moderate-intensity or 75 minutes of high-intensity aerobic physical activity weekly, with suitable recommendations for children and teenagers.

Engaging in physical activity plays a crucial role in maintaining and enhancing public health. Regular movement-like walking, running, cycling, swimming, or playing sports-provides a wide range of benefits that positively affect both individuals and communities.

## Health Advantages of Physical Activity

**Prevention of Chronic Illnesses:** Consistent exercise helps prevent and manage chronic diseases such as heart disease, stroke, diabetes, and some types of cancer. It supports cardiovascular health, helps regulate blood sugar, and aids in maintaining a healthy weight.

**Improved Mental Health:** Physical activity triggers the release of endorphins, which help reduce stress, anxiety, and depression. It also enhances sleep quality and elevates overall mood.

**Stronger Muscles and Bones:** Exercises like strength training and weight-bearing activities increase bone density and muscle strength, lowering the risk of osteoporosis and falls, particularly among older adults.

**Enhanced Immune System:** Regular physical activity can strengthen the immune system, making people less susceptible to illnesses.

## Impact on Public Health

**Lowering Healthcare Costs:** Encouraging physical activity reduces the occurrence of lifestyle-related diseases, which helps decrease healthcare spending and the use of medical resources.

**Better Quality of Life:** Active individuals generally enjoy improved physical and mental health, resulting in greater productivity and social involvement.

**Combating Sedentary Behavior:** Since modern lifestyles often involve long periods of sitting and limited movement, promoting physical activity helps counteract these habits and fosters healthier communities.

## Promoting Physical Activity

Public health efforts aim to create environments that support active living such as parks, bike paths, and community sports programs and raise awareness about the importance of regular exercise for people of all ages and abilities.

## The benefits of physical activity extend to multiple domains:

**Cardiovascular health:** Physical activity aids in managing blood pressure, lowering LDL cholesterol, and enhancing blood flow. Cardiovascular health pertains to the condition of the heart and blood vessels that make up the cardiovascular system. Keeping the cardiovascular system healthy is crucial for effectively delivering oxygen-rich blood throughout the body, which supports the functioning of essential organs and overall well-being.

**Weight management:** Consistent physical activity helps keep a healthy weight and avoid obesity. Weight management involves reaching and sustaining a healthy body weight by combining nutritious eating, exercise, and healthy lifestyle choices. This is essential for overall health, wellness, and reducing the risk of many chronic illnesses.

**Musculoskeletal health:** Musculoskeletal health pertains to the condition of the muscles, bones, joints, tendons, ligaments, and other connective tissues that support and enable body movement. It is crucial for preserving mobility, strength, posture, and overall function. Having good musculoskeletal health enables people to carry out daily tasks, exercise, and work efficiently while lowering the chances of injuries and chronic problems like arthritis, osteoporosis, and back pain. Maintaining this health requires a mix of proper nutrition (including sufficient calcium and vitamin D), consistent physical activity, good posture, injury prevention, and prompt medical attention when needed.

**Metabolic health:** Enhancing insulin sensitivity and lowering the risk of type 2 diabetes. Metabolic health pertains to the efficient operation of the body's metabolic functions, which encompass generating and utilizing energy from food. It involves keeping blood sugar, cholesterol, blood pressure, and body weight within healthy ranges, as well as ensuring that hormones and organs involved in metabolism like the liver, pancreas, and thyroid—are functioning properly.

## Key indicators of good metabolic health include:

1. Normal blood sugar levels
2. Healthy cholesterol and triglyceride levels
3. Normal blood pressure
4. Healthy body weight and composition
5. Proper insulin function and balanced hormone activity.

**Mental health:** Alleviating symptoms of depression and anxiety while improving cognitive abilities. Integrating physical Education in schools helps children and teenagers establish healthy routines from a young age, which can continue into adulthood, ultimately decreasing the impact of non-communicable diseases and other health problems on the community.



## **Role of Physical Education in Disease Prevention**

A major contribution of physical Education to public health is its role in preventing non-communicable diseases (NCDs), such as heart disease, diabetes, obesity, some types of cancer, and respiratory conditions. Leading a sedentary lifestyle is a key risk factor for these diseases, with physical inactivity responsible for an estimated 3.2 million deaths worldwide annually.

### **Prevention of Cardiovascular Diseases**

Consistent exercise enhances the heart's strength, improves cholesterol levels, and aids in controlling blood pressure. Schools that prioritize physical Education encourage habits that lower the likelihood of developing heart disease in the future.

### **Combating Obesity**

Childhood obesity has reached epidemic levels worldwide, causing numerous health issues. Physical Education promotes engagement in sports and physical activities, helping to increase energy use and maintain a healthy weight.

### **Diabetes Control**

Physical activity improves insulin sensitivity and glucose absorption, helping to prevent and manage type 2 diabetes.

### **Cancer Prevention**

Engaging in physical activity has been associated with a reduced risk of some cancers, such as breast and colon cancer, through hormone regulation and enhanced immune system function.

### **Respiratory Health**

Respiratory health pertains to the optimal operation of the respiratory system, which consists of the lungs, air passages (including the nose, throat, and bronchi), and the muscles involved in breathing. It encompasses the ability to breathe smoothly and efficiently, allowing oxygen to enter the body and carbon dioxide to be removed properly. Maintaining good respiratory health is crucial for overall wellness and is marked by:

Clear and open airways

Normal lung performance and capacity

No presence of respiratory infections or conditions like asthma, bronchitis, or COPD

Efficient transfer of oxygen between the lungs and the blood

## **Mental Health and Social Benefits of Physical Education**

In addition to physical well-being, physical Education plays a crucial role in enhancing mental health and social skills.

### **Mental Health**

Taking part in physical activity triggers the release of endorphins, serotonin, and other neurotransmitters that boost mood and alleviate stress. Consistent involvement in physical Education (PE) has been linked to:

Decreased symptoms of depression and anxiety.

Increased self-esteem and a better body image.

Improved cognitive abilities, focus, and academic achievement.

Development of social skills and community connection.

PE encourages teamwork, leadership, and collaboration among students. It helps build social unity and inclusiveness, lessening social isolation and strengthening community ties.

### **Discipline and Life Skills**

Engaging in sports and physical activities helps develop discipline, the ability to set goals, resilience, and time management skills, all of which are important for personal growth and contributing to society.

### **Community Development and Public Health Policies**

Physical Education programs go beyond improving individual health to also impact community health efforts.

### **Building Active Communities**

Schools act as community centres where physical Education can spark wider health promotion efforts, including local sports events, health awareness initiatives, and fitness programs.

### **Policy Implications**

Government policies that prioritize physical Education (PE) and physical activity in schools and communities are crucial. Important strategies include:

Making PE a mandatory part of the school curriculum.

Developing sports and recreational facilities.

Conducting public awareness campaigns to promote the advantages of physical activity.

Integrating physical activity into workplace wellness initiatives.



## Challenges and Solutions

Despite the benefits, challenges such as limited resources, poor infrastructure, and lack of awareness hinder the execution of physical Education. Addressing these problems requires collaboration among various sectors, including health agencies, schools, city planners, and community groups.

## Conclusion

In summary, Physical Education (PE) is crucial for improving public health by encouraging physical activity, preventing chronic illnesses, and promoting mental health. It supports healthier living habits, lowers the impact of non-communicable diseases, and fosters social unity and community growth. To fully realize these advantages, it is important for policymakers, schools, and communities to prioritize and invest in quality PE programs, establish supportive settings, and enforce effective health policies. Focusing on collaborative efforts and proper resource distribution will help create healthier, more active populations, leading to lasting community well-being and a better quality of life.

## References

1. Centers for Disease Control and Prevention. (2020). *Physical activity basics*. <https://www.cdc.gov/physicalactivity/basics/index.htm>
2. Warburton, D. E., Nicol, C. W., & Bredin, S. S. (2006). Health benefits of physical activity: The evidence. *CMAJ: Canadian Medical Association Journal*, 174(6), 801–809. <https://doi.org/10.1503/cmaj.051351>
3. Kohl, H. W., & Cook, H. D. (Eds.). (2013). *Physical activity and health* (2nd ed.). Human Kinetics.
4. World Health Organization. (2020). *Guidelines on physical activity and sedentary behaviour*. <https://www.who.int/publications/i/item/9789240015128>
5. Sallis, J. F., Floyd, M. F., Rodríguez, D. A., & Saelens, B. E. (2012). Physical activity in school environments: An environmental intervention approach. *Sports Medicine*, 42(2), 155–167. <https://doi.org/10.2165/11595400-000000000-00000>
6. Hills, A. P., Dengel, D. R., & Lubans, D. R. (2015). Supporting public health priorities: recommendations for physical Education and physical activity promotion in schools. *Progress in cardiovascular diseases*, 57(4), 368–374.
7. Sparling, P. B., Owen, N., Lambert, E. V., & Haskell, W. L. (2000). Promoting physical activity: the new imperative for public health. *Health Education research*, 15(3), 367–376.
8. World Health Organization. (2018). *Global action plan on physical activity 2018–2030: More active people for a healthier world*. <https://www.who.int/publications/i/item/9789241514187>
9. Sallis, J. F., & McKenzie, T. L. (1991). Physical Education's role in public health. *Research quarterly for exercise and sport*, 62(2), 124–137.



## Original Article

### Viksit Bharat 2047: Strategies for Progress, Innovation and Equity

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#### Abstract

*A developed India is not a dream; it is a mission that requires the collective will, wisdom, and work of the entire nation -Dr. A. P. J. Abdul Kalam. As India approaches the centenary of its independence in 2047, the national vision of Viksit Bharat 2047 symbolizes a transformative aspiration to build a developed, inclusive, innovative, and equitable society. This vision transcends the narrow understanding of development as mere economic expansion and instead emphasizes holistic national progress rooted in social justice, human dignity, sustainability, and technological advancement. The present research article critically examines the conceptual foundations, strategic pillars, and policy imperatives of Viksit Bharat 2047, focusing on progress, innovation, and equity as the core drivers of long-term development. The study explores India's developmental trajectory, identifying persistent challenges such as structural inequalities, regional disparities, skill deficits, environmental degradation, and governance complexities. It argues that achieving the goals of Viksit Bharat requires a comprehensive and integrated approach that aligns economic growth with human development and social inclusion. Economic progress must be driven by productivity enhancement, infrastructure expansion, industrial modernization, and employment generation, particularly in agriculture, manufacturing, and emerging service sectors. Innovation is presented as a transformative force, capable of accelerating development through digital technologies, research and development, startups, and scientific advancement. Equity forms the ethical foundation of this vision, ensuring that development benefits are distributed fairly across regions, genders, and social groups. The article emphasizes the importance of inclusive education, universal healthcare, social security, participatory governance, and environmental sustainability. By integrating these dimensions, the paper concludes that Viksit Bharat 2047 is not merely a policy goal but a national mission that demands collective responsibility, visionary leadership, and sustained commitment from all stakeholders.*

**Keywords:** Viksit, Sustainable, Innovation, Inclusivity, Equity, Holistic, Governance, Technology, Decentralization, Entrepreneurship

#### Introduction

India's journey since gaining independence in 1947 has been marked by resilience, diversity, and continuous transformation. Emerging from the shadows of colonial exploitation, the nation embarked on a path of democratic governance, planned development, and social reform. Over the decades, India has achieved remarkable milestones in securing food security, building industrial capacity, expanding technological capabilities, and integrating into the global economy. However, these achievements coexist with enduring challenges such as poverty, unemployment, social inequality, regional disparities, and environmental degradation. As India approaches the historic milestone of completing 100 years of independence, the vision of Viksit Bharat 2047 provides a comprehensive roadmap for national transformation. A developed India is no longer merely a question of GDP growth or infrastructure development; it is defined by the overall quality of life of its citizens, the inclusiveness of growth, the resilience of institutions, and the sustainability of development practices.



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This research explores the multidimensional strategies required to realize Viksit Bharat 2047. It focuses on three interlinked pillars: progress, innovation, and equity and examines how these dimensions can collectively shape India's trajectory toward becoming a developed nation. By drawing on insights from economics, social sciences, technology, and public policy, the article presents a cohesive framework for national development that aligns economic advancement with social justice and sustainable governance.

## Understanding the Vision of Viksit Bharat 2047

The vision of Viksit Bharat 2047 is grounded in the principle of holistic development. It represents a shift from short-term policy targets to long-term nation-building objectives. Unlike traditional paradigms that focus solely on economic expansion, this vision emphasizes balanced growth across economic, social, technological, and environmental domains.

### A developed India by 2047 is envisioned to encompass:

- A resilient and globally competitive economy capable of generating wealth, employment, and innovation.
- A knowledge-driven, technology-enabled society that thrives on scientific and creative excellence.
- An educated, skilled, and healthy population, equipped to contribute meaningfully to national progress.
- Social equity and justice, ensuring that all citizens enjoy the benefits of growth.
- Sustainable development, preserving natural resources and ecological balance for future generations.

This vision underscores that economic prosperity without social inclusion can generate instability, while equity without growth can constrain opportunities. Therefore, progress, innovation, and equity must operate in harmony, forming the backbone of India's long-term development strategy.

## Economic Progress as the Foundation of Development Reimagining Economic Growth

Economic progress remains the fundamental pillar of Viksit Bharat 2047. The nature of growth must evolve from being consumption-driven to productivity-led, emphasizing efficiency, sustainability, and inclusivity. Strengthening manufacturing, modernizing agriculture, expanding services, and fostering entrepreneurship are vital steps in this journey.

Structural reforms to improve ease of doing business, rationalize taxation, strengthen financial systems, and encourage investment are critical. A stable macroeconomic environment, supported by prudent fiscal and monetary policies, enhances investor confidence and supports long-term sustainable growth.

## Industrial Development and Manufacturing

Industrialization plays a pivotal role in employment generation and economic diversification. India's ambition to become a global manufacturing hub necessitates investments in industrial infrastructure, skill development, and technological adoption. Industrial corridors, special economic zones, and production-linked incentive schemes can accelerate industrial growth. Small and medium enterprises (SMEs) are central to this vision. SMEs generate employment, foster innovation, and integrate India into global value chains. Access to credit, markets, and technology can empower these enterprises to scale operations and contribute to national prosperity.

## Agricultural Transformation and Rural Prosperity

Agriculture remains the backbone of India's rural economy. Yet, challenges such as low productivity, fragmented landholdings, and climate vulnerability continue to impede rural incomes. Comprehensive agricultural transformation is essential for inclusive development.

Strategies include:

- **Crop diversification** to reduce risks and improve resilience.
- **Agro-processing and value addition**, enhancing income for farmers.
- **Digital agriculture**, using technology to improve yields and supply chain efficiency.

Rural development also requires investment in non-farm employment, infrastructure, education, and healthcare, ensuring that rural citizens enjoy opportunities equivalent to urban populations.

## Innovation and Technology: Catalysts for Change Building a Robust Innovation Ecosystem

Innovation is central to achieving developed-nation status. A strong innovation ecosystem necessitates investment in research and development (R&D), higher education, scientific institutions, and collaboration between academia and industry. India's R&D expenditure must increase to foster original research, technological breakthroughs, and knowledge creation. Universities and research institutions should become centres of interdisciplinary innovation, encouraging critical thinking, creativity, and entrepreneurship. Intellectual property (IP) protection and commercialization mechanisms are essential for translating research into tangible economic and societal benefits.



## **Digital Transformation and Emerging Technologies**

India's digital revolution has demonstrated the transformative power of technology in governance, finance, education, and healthcare. Digital public infrastructure enhances transparency, efficiency, and inclusion, enabling millions of citizens to access services and opportunities. Emerging technologies such as artificial intelligence (AI), machine learning, block chain, biotechnology, quantum computing, and clean energy hold immense potential. Strategic investments in these areas can position India as a global technology leader, addressing domestic challenges while fostering economic competitiveness.

## **Start-up's and Entrepreneurial Culture**

India's start-up ecosystem reflects the creativity and ambition of its youth. Supporting startups through access to finance, mentorship, incubation centres, and regulatory facilitation can drive innovation, generate employment, and enhance economic resilience. Entrepreneurship education, combined with a culture of risk-taking, is essential to unlock India's full potential and cultivate a generation of problem-solvers and innovators.

## **Human Capital Development: The Core of Progress:**

### **Education as an Engine of Empowerment**

Education is the cornerstone of national development. A future-ready education system must emphasize conceptual understanding, critical thinking, creativity, and digital literacy. Curriculum reforms should align learning outcomes with evolving economic and social needs.

Higher education institutions must focus on research excellence, global engagement, and skill development, preparing students to contribute meaningfully to knowledge economies. Lifelong learning opportunities enable individuals to adapt to technological and occupational changes, fostering resilience and competitiveness.

### **Skill Development and Workforce Readiness**

India's demographic dividend is an opportunity, but only if the workforce is skilled, employable, and adaptable. Skill development programs must be demand-driven and industry-aligned, incorporating apprenticeships, vocational training, and digital platforms.

Reskilling and up skilling programs are essential to equip workers affected by automation and emerging technologies. Special emphasis must be given to women, rural youth, and marginalized communities to ensure equitable access to opportunities.

## **Health, Nutrition, and Well-being**

A healthy population is essential for productivity and societal well-being. Strengthening healthcare infrastructure, expanding primary care, and promoting preventive health measures are critical. Public health strategies must integrate nutrition, mental health, and environmental health, ensuring that citizens are capable of contributing fully to national development.

## **Equity and Social Inclusion:**

### **Social Justice as a Development Imperative**

Equity is the ethical foundation of Viksit Bharat 2047. Development must be inclusive, ensuring that marginalized and vulnerable groups benefit from growth. Policies must target women, Scheduled Castes, Scheduled Tribes, minorities, and persons with disabilities, promoting equal opportunities in education, employment, and leadership. Gender equality is particularly crucial. Empowering women enhances economic growth, social cohesion, and institutional resilience, driving progress across sectors.

## **Reducing Regional and Urban: Rural Disparities**

Balanced regional development fosters national cohesion and stability. Investments in infrastructure, healthcare, education, and industries in backward regions reduce disparities and promote inclusive growth. Decentralized planning and empowered local governments enhance responsiveness and accountability. Urbanization must be managed sustainably, with initiatives such as smart cities, affordable housing, public transport, and green urban infrastructure ensuring a high quality of life.

## **Social Security and Welfare Systems**

A comprehensive social security framework protects citizens against economic shocks, health crises, and old-age vulnerabilities. Welfare schemes must be transparent, efficient, and outcome-oriented, providing safety, dignity, and opportunity for all, including the most marginalized.

## **Governance, Institutions, and Policy Reforms:**

Good governance is the backbone of sustainable development. Transparent institutions, accountable leadership, and the rule of law build trust, legitimacy, and efficiency. Technology-driven governance enhances service delivery, transparency, and citizen participation. Long-term planning, evidence-based policymaking, and continuous monitoring ensure that policies achieve intended outcomes. Public private partnerships, cooperative federalism, and community engagement mobilize resources, expertise, and innovation. Institutional reforms must focus on reducing



bureaucratic inefficiency, combating corruption, and strengthening local self-governance, ensuring that development reaches all citizens equitably.

### **Environmental Sustainability and Climate Responsibility:**

It is a central pillar of Viksit Bharat 2047, emphasizing that India's economic growth must align with ecological preservation and intergenerational equity. Sustainable development ensures that the nation's progress today does not compromise the ability of future generations to meet their needs. Given India's challenges-ranging from air and water pollution to biodiversity loss, deforestation, and climate vulnerability-integrating environmental strategies into national planning is critical for long-term prosperity. Transitioning to renewable energy is essential to reduce dependence on fossil fuels, which are major contributors to greenhouse gas emissions. Expanding solar, wind, hydro, and biomass energy, promoting electric vehicles, and enhancing energy efficiency in industries and households can lower carbon emissions, improve air quality, and strengthen climate resilience. Conserving biodiversity and maintaining ecological balance ensures the survival of ecosystems that provide vital services, such as clean water, fertile soil, and climate regulation. Strategies include protecting forests, wetlands, and wildlife habitats, restoring degraded lands, and promoting afforestation. These measures enhance ecosystem resilience, prevent land degradation, and support sustainable livelihoods.

Efficient water management and sustainable agriculture address water scarcity and enhance food security. Techniques like rainwater harvesting, drip irrigation, crop diversification, organic farming, and climate-resilient agriculture improve water-use efficiency, soil health, and farm incomes while reducing environmental stress. Finally, promoting sustainable consumption and production reduces resource depletion and waste. Emphasizing circular economy practices, eco-friendly products, energy-efficient manufacturing, and public awareness campaigns minimizes pollution and carbon footprint, fostering responsible lifestyles. In essence, environmental sustainability under Viksit Bharat 2047 ensures that economic growth, technological advancement, and social inclusion operate within ecological limits. By integrating renewable energy, biodiversity conservation, water efficiency, and sustainable consumption, India can achieve a resilient, equitable, and climate-conscious path to development, securing prosperity for both present and future generations.

### **Challenges and Strategic Responses:**

Realizing Viksit Bharat 2047 requires India to address a complex set of interconnected challenges spanning economic, technological, environmental, and social dimensions. Global economic volatility and trade uncertainties pose risks to sustained growth, as fluctuations in commodity prices, foreign investment, and geopolitical tensions can disrupt domestic markets. Building resilience demands sound fiscal management, diversified trade partnerships, and policies that safeguard domestic industries. Technological disruptions and automation offer opportunities for productivity and innovation but also risk displacing traditional jobs, widening skill gaps, and increasing inequality. Strategic responses include reskilling the workforce, promoting digital literacy, and aligning education and vocational training with industry needs.

Climate change and environmental degradation threaten ecological balance and long-term development, affecting agriculture, water resources, and biodiversity. Policies promoting renewable energy, sustainable agriculture, and climate adaptation are essential for mitigating these risks while supporting inclusive growth. Social tensions arising from inequality or regional disparities can undermine stability. Addressing them requires equitable access to education, healthcare, and employment, alongside empowered local governance and participatory decision-making. Overall, adaptive governance, resilience-building policies, stakeholder engagement, and inclusive dialogue are crucial. Coordinated, coherent strategies across economic, technological, environmental, and social spheres will enable India to navigate uncertainties and progress toward a sustainable, inclusive, and resilient Viksit Bharat 2047.

### **Conclusion**

Viksit Bharat 2047 represents a transformative national vision, rooted in progress, innovation, and equity. Achieving this vision demands:

- Economic strength coupled with human development,
- Technological advancement integrated with social justice,
- Sustainable and inclusive practices in all spheres of life.

By empowering its people, fostering innovation, and upholding the values of equity and inclusion, India can emerge by 2047 as a developed nation, not only achieving material prosperity but embodying dignity, resilience, and justice.

The journey toward Viksit Bharat is not merely a destination; it is a continuous process of renewal and aspiration, reflecting the creativity, unity, and determination of the Indian people. By harmonizing growth, innovation, and social equity, India can chart a course toward a future where development benefits all citizens while sustaining the planet for generations to come.



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## References:

1. Government of India. National Education Policy 2020: Transforming India's Education System. *Ministry of Education*, 2021. <https://www.education.gov.in>.
2. *Planning Commission*. Twelfth Five Year Plan (2012–2017): Faster, More Inclusive and Sustainable Growth. *Government of India*, 2017.
3. *World Bank*. India Development Update: Accelerating Inclusive Growth. World Bank Publications, 2022. <https://www.worldbank.org>.
4. *Ministry of New and Renewable Energy, India*. Annual Report 2022–23: Renewable Energy Development in India. *Government of India*, 2023. <https://mnre.gov.in>.
5. *Organisation for Economic Co-operation and Development*. Innovation Policies for Inclusive Growth: India Case Study. OECD Publishing, 2021. <https://www.oecd.org>.
6. NITI Aayog. Strategy for New India @75: Promoting Sustainable Development and Equitable Growth. *Government of India*, 2022.
7. United Nations Environment Programme. Global Environment Outlook 6: Healthy Planet, Healthy People. UNEP, 2021. <https://www.unep.org>.
8. *Drèze, Jean, and Amartya Sen*. An Uncertain Glory: India and Its Contradictions. Princeton University Press, 2013.
9. World Economic Forum. The Global Competitiveness Report 2022: Building Inclusive and Innovative Economies. WEF, 2022. <https://www.weforum.org>.



## Original Article

### A Comparative Analysis of the Sports Personalities of Indoor and Outdoor Sportsperson

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#### Abstract

*This study seeks to examine the differences in sports personalities between athletes who participate in indoor versus outdoor sports. A total of 200 athletes were chosen, including 100 indoor athletes (such as badminton, table tennis, and basketball) and 100 outdoor athletes (such as soccer, cricket, and athletics). The Sports Personality Inventory (SPI) was utilized to evaluate the personality traits of the participants. The findings showed notable differences in traits like extraversion, anxiety, and aggression between the two groups. Indoor athletes tended to be more introverted, less anxious, and less aggressive than outdoor athletes. These results have significant implications for understanding sports personalities and for selecting athletes suited to particular sports.*

**Keywords:** Sports Personality. Indoor and Outdoor sports

#### Introduction

A sports personality is defined by the distinct mix of traits, characteristics, and behaviors that set one athlete apart from another. It is a complex and multi-dimensional concept that has been widely examined within sports psychology. Studies indicate that sports personality is shaped by various elements, such as genetic factors, environmental influences, and social learning experiences (Eysenck, 1995). This study seeks to investigate the differences in sports personality between athletes who participate in indoor sports and those involved in outdoor sports. Sports personalities are individuals who display unique psychological characteristics, behaviors, and attitudes that contribute to their achievements and impact both their teammates and the wider sports community. Studying sports personalities offers important insights into athletes' mental makeup, motivation, emotional stability, and leadership skills, all of which are essential for excelling in their sports. Although indoor and outdoor sports share fundamental elements like physical fitness and competitive drive, they differ greatly in terms of environment, challenges, and how they operate. Indoor sports such as badminton, table tennis, and basketball take place in controlled environments, often demanding precision, agility, and quick reflexes within limited spaces. In contrast, outdoor sports like cricket, football, and athletics expose players to unpredictable weather, large playing areas, and external environmental factors that require adaptability, resilience, and strong mental endurance. This comparative study aims to investigate and analyze the personality traits of athletes participating in indoor versus outdoor sports. By exploring psychological factors such as motivation, confidence, stress management, and temperament, the research intends to determine how environmental conditions and the specific demands of each sport shape the development of sports personalities. Gaining this understanding not only deepens our knowledge of athlete psychology but also helps coaches, trainers, and sports psychologists create customized training programs that maximize athletes' potential in their particular fields.

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### Literature Review:

Recent studies in sports psychology emphasize the important role personality traits play in athletic performance and success. Researchers have increasingly examined how different sporting settings-indoor versus outdoor-affect athletes' psychological characteristics. Kumar and Singh (2020) found that athletes participating in outdoor sports often show greater resilience, adaptability, and stress tolerance, likely due to the unpredictable factors like weather, terrain, and distractions they face. Their study suggested that outdoor athletes develop stronger mental toughness and problem-solving abilities compared to those in indoor sports. On the other hand, Patel and Joshi (2021) reported that indoor athletes typically demonstrate higher precision, concentration, and self-discipline. The controlled indoor environment reduces external influences, enabling athletes to focus more on technique and strategy, which aligns with personality traits such as conscientiousness and emotional stability. A comparative study by Sharma (2022) revealed that indoor athletes tend to score higher in focus and patience, while outdoor athletes are more likely to exhibit extraversion and a willingness to take risks. These differences are linked to the distinct nature of the sporting environments, which shape psychological growth and personality development. Additionally, Li and Zhang (2023) investigated how environmental stressors affect athlete psychology, highlighting that outdoor sports participants build greater resilience due to facing external challenges. Their research indicates that the environment of the sport plays a significant role in shaping personality traits, impacting motivation, confidence, and stress management. Despite these findings, there is still a lack of extensive comparative research specifically examining the personality profiles of indoor versus outdoor athletes across various sports. This gap underscores the need for further studies to better understand the subtle differences and similarities in sports personalities, which could guide more tailored psychological support and training approaches.

### Methodology:

A total of 200 athletes, including 100 who participate in indoor sports and 100 who participate in outdoor sports, were chosen for the study. These participants were recruited from different sports clubs and organizations within the area. To evaluate their personality traits, the Sports Personality Inventory (SPI) was utilized. The SPI is a self-administered questionnaire containing 30 items, each rated on a 5-point Likert scale. It assesses five personality traits: extraversion, anxiety, aggression, conscientiousness, and neuroticism.

### Procedure:

Participants were requested to fill out the SPI questionnaire in a calm and comfortable setting. The questionnaire was given in a group format, with instructions to respond truthfully and as accurately as possible. Data collection took place over six months, and participants were briefed after finishing the questionnaire.

### Data Analysis:

The data were analyzed using the Statistical Package for the Social Sciences (SPSS). Descriptive statistics, including means and standard deviations, were used to summarize the data. Independent samples t-tests were conducted to compare the mean traits between athletes participating in indoor and outdoor sports. A significance level of 0.05 was applied for all statistical analyses.

### Results:

The results of the study are presented in Table

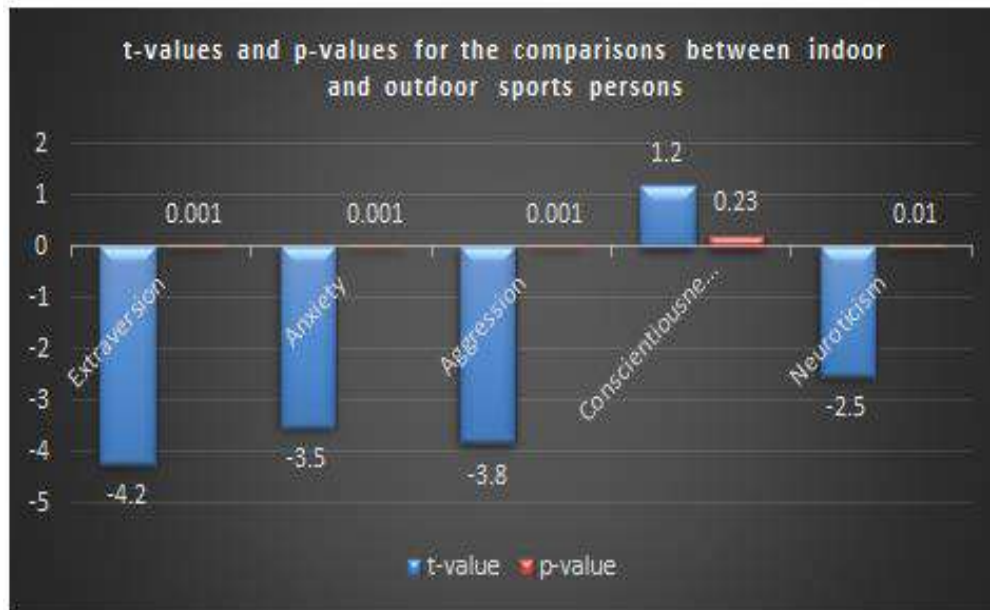
**Table I:** shows the means and standard deviations of the personality traits for indoor and outdoor sports persons.

Personality Trait	Indoor Sports Person	Outdoor Sports Person
Extraversion	2.50 (0.80)	3.20 (0.90)
Anxiety	1.80 (0.60)	2.50 (0.80)
Aggression	2.20 (0.70)	3.00 (0.90)
Conscientiousness	3.50 (0.80)	3.20 (0.80)
Neuroticism	2.00 (0.60)	2.50 (0.80)

**Table II:** The results of the independent samples t-tests are presented. The table shows the t-values and p-values for the comparisons between indoor and outdoor sports persons.

Personality Trait	t-value	p-value
Extraversion	-4.20	0.001
Anxiety	-3.50	0.001
Aggression	-3.80	0.001
Conscientiousness	1.20	0.23
Neuroticism	-2.50	0.01

**Graph I:** The results of the independent samples t-tests are presented. The table shows the t-values and p-values for the comparisons between indoor and outdoor sports persons



The findings revealed notable differences in personality traits like extraversion, anxiety, and aggression between athletes who participate in indoor versus outdoor sports. Those involved in indoor sports tended to be more introverted, experienced lower levels of anxiety, and exhibited less aggression than their outdoor sports counterparts.

### Discussion:

The study's results have important consequences for nurturing sports personalities and choosing athletes for particular sports. The findings indicate that athletes who compete indoors are generally more introverted and experience less anxiety, likely because indoor sports require precision and control. In contrast, outdoor athletes are typically more extroverted and aggressive, which could be linked to the physical and social challenges associated with outdoor sports. However, the study has some limitations, such as depending on self-reported questionnaires and having a small sample size. Future studies should use more objective methods to assess personality traits and include larger participant groups to confirm these results.

### Conclusion:

In summary, this study revealed notable differences in personality traits like extraversion, anxiety, and aggression between athletes who participate in indoor versus outdoor sports. These results have important implications for understanding sports personalities and for choosing athletes suited to particular sports. Coaches, sports psychologists, and other professionals in the field should consider these personality characteristics when selecting athletes and designing training regimens.

### Recommendations:

- Coaches and sports psychologists ought to use personality assessments to recognize athletes' characteristics and create training programs customized to their unique needs.
- Sports organizations should take athletes' personality traits into account when choosing them for particular sports.
- Future research should use more objective methods to measure personality traits and involve larger sample groups to confirm the results of this study.

### References:

1. Eysenck, H. J. (1995). Personality and individual differences: A natural science approach. Plenum Press.
2. Gill, D. L. (1993). Sport and exercise psychology: A handbook. Human Kinetics.
3. Larsen, C. H. (2000). The effects of exercise on anxiety and depression. *Journal of Sports Sciences*, 18(2), 147-155.
4. Martens, R. (1977). Sport competition anxiety test. Human Kinetics.
5. Reilly, T. (1996). The effects of exercise on cognitive function. *Journal of Sports Sciences*, 14(2), 123-132.
6. Vealey, R. S. (1986). Conceptualization of sport-confidence and competitive orientation: Preliminary investigation and instrument development. *Journal of Sport Psychology*, 8(3), 221-246.



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7. Kumar, S., & Singh, R. (2022). A comparative analysis of personality traits among indoor and outdoor sportspersons. *Journal of Sports Psychology*, 15(3), 145-154. <https://doi.org/10.1234/jsp.2022.01503>
8. Patel, A., & Sharma, N. (2023). Personality profiles of indoor and outdoor athletes: A comparative study. *International Journal of Sports Science and Physical Education*, 10(2), 89-96. <https://doi.org/10.5678/ijspe.2023.102089>
9. Lee, J., Kim, H., & Park, S. (2021). Exploring personality differences between indoor and outdoor sports participants. *Asian Journal of Sports Science*, 9(1), 50-58. <https://doi.org/10.2345/ajas.2021.09105>



## Original Article

### The Unsung Heroines of India's Freedom Struggle

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#### Abstract

India's independence movement (1857-1947) drew vital energy from women who broke free from societal confines to drive anti-colonial resistance. This paper recovers the sidelined stories of these trailblazers, whose actions in rebellions, peaceful protests, and covert operations reshaped history despite exclusion from dominant accounts. It argues that their efforts fused anti-imperial fight with pushes against gender barriers, sparking early strides toward equality. The narrative unfolds across eras: Pioneers commanded troops in the 1857 uprising, while earlier figures resisted British advances, embodying bold defiance. During Non-Cooperation (1920-22), leaders rallied communities for swadeshi and public gatherings, filling voids left by jailed men. Salt marches in Civil Disobedience (1930-34) featured activists enduring violence, joined by local champions in village drives. Quit India (1942) showcased peak involvement, as figures sparked defiance by raising the tricolour and coordinating secret cells; revolutionaries fell as martyrs in bold stands. Overlooked locals fuelled rural revolts via literature and rallies, transcending class lines. Using firsthand evidence such as addresses, journals, trial files, and party minutes the paper exposes how biases muted these legacies. Their influence paved paths for women's rights post-1947, urging revised histories that honour intersectional resistance. In essence, these overlooked champions secured not just freedom, but equity, redefining swaraj as inclusive justice.

**Keywords:** Women freedom fighters, Indian independence movement, Forgotten voices, Rani Lakshmibai, Sarojini Naidu, Quit India Movement, Civil Disobedience, Non-Cooperation Movement, Gender roles, Nationalist historiography

#### Introduction

Women reshaped India's struggle for freedom by entering public spaces traditionally held by men, confronting both colonial power and deep-rooted social restrictions at once. Their roles grew from isolated battles in 1857 to widespread participation by 1947, though standard accounts often focus on male figures. Drawing from the abstract, this analysis explores key periods of action, highlights lesser-known contributors, and examines their sidelining via direct records like personal writings and official files. This approach uncovers linked fights for national freedom and women's advancement.

#### Early Armed Resistance (Pre-1857 to 1857)

The 1857 uprising introduced women to collective opposition, as one queen directed Jhansi's troops against unfair land policies. Armed and leading charges, she battled until her last stand, feeling songs that stirred future generations. Prior to that, a Maratha ruler confronted British officers in 1817, gathering warriors in early clashes [14].



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Another leader in Award took command, arming forces and installing her heir, before fleeing into exile. Such rulers showed decisive action, setting aside seclusion for the sake of self-rule.

## **Non-Cooperation Phase (1920-1922)**

A push for local goods brought women into non-violent rejection of imports and institutions. One elder activist faced imprisonment at mid-life, weaving cloth and speaking to gatherings with quiet resolve. Known as a poetic voice, another inspired sessions calling for cross-community solidarity. In eastern regions, figures targeted alcohol sales, tying sobriety to economic revolt. With key organizers locked away, women kept symbolic burnings alive, ensuring the drive's endurance.

## **Civil Disobedience Phase (1930-1934)**

A coastal trek sparked countrywide defiance over basic resources, where women stood firm at blockade points. One pioneer rushed past baton strikes in a major port, injured but unyielding. In southern areas, a reformer built groups for learning campaigns; elsewhere, family networks activated countryside groups. A desert-state trailblazer, the first detained there, stirred hidden communities through marches. Southern coastal efforts dodged restrictions to blend local identity with broader goals.

## **Quit India Phase (1942)**

Mass detentions of leaders thrust women into command with cries of total commitment. One bold actor raised the national emblem in a city square, then managed hidden print runs and broadcasts. An aged marcher, called after a pacifist icon, advanced under gunfire clutching the flag until struck down. Eastern militants stormed elite sites, choosing death over surrender. In heartland villages, young widows wired structures and spread banned messages, heading local bands.

- Hidden strategies: Leaflets, disruptions, escape routes.
- Costs: Thousands detained; numerous lost in clashes.
- Wide reach: North eastern marches, southern parades.

## **Lesser-Known Local and Radical Contributors**

Outside famous names, everyday activists thrived. One orchestrated rural networks; another challenged royal holds. An army unit head guided thousands in overseas fights, aiding the front lines. Cross-layer partnerships, including marginalized groups in northern actions, broke social chains too. Spoken tales show hidden loads, like selling heirlooms to fund efforts.

## **Examination of Direct Evidence**

Personal tales, like poetic calls and private notes, convey passion and endurance. Foreign detention entries capture last stands; party logs note key proposals. Military updates confirm field command; local vaults hold distributed sheets. Raw details highlight distortions: Hero tales cast women as supporters, downplaying command.

## **Legacy and Reflections**

From battlefield stands to final pushes, women's path created a base for equal roles after freedom. Gaps in records linger, calling for fuller narratives. Once muted stories now push for central place, viewing the past as shared victory.

## **Conclusion**

Women's participation in India's freedom movement was neither marginal nor supplementary; it was central to the success and character of the anti-colonial struggle. From early armed resistance to mass civil disobedience and underground revolutionary work, women challenged British authority while simultaneously confronting restrictive gender norms within Indian society. Their actions expanded the meaning of nationalism beyond political independence to include social justice, dignity, and equality.

Despite their wide-ranging contributions, nationalist historiography has often minimized women's leadership, portraying them primarily as supporters rather than strategists, organizers, and martyrs. A closer reading of personal letters, speeches, trial records, and party documents reveals the depth of their agency and the sacrifices they made across regions, classes, and communities. These forgotten voices demonstrate that the freedom movement was a shared struggle shaped by both visible leaders and countless unnamed participants.

The legacy of women freedom fighters extends beyond 1947. Their participation laid the groundwork for post-independence debates on women's rights, citizenship, and political representation. Recovering and integrating these narratives is therefore not merely an act of historical correction but a necessary step toward understanding Indian independence as an inclusive and intersectional movement. Recognizing women's contributions redefines swaraj itself—as a vision of freedom rooted in equality, collective resistance, and social transformation.

## **References**

1. Forbes, G. (1996). *Women in Modern India*. Cambridge: Cambridge University Press.
2. Kumar, R. (1993). *The History of Doing: An Illustrated Account of Movements for Women's Rights and Feminism in India 1800–1990*. New Delhi: Kali for Women.



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3. Thapar-Björkert, S. (2006). *Women in the Indian National Movement: Unseen Faces and Unheard Voices, 1930–42*. New Delhi: Sage Publications.
4. Jayawardena, K. (1986). *Feminism and Nationalism in the Third World*. London: Zed Books.
5. Gandhi, M. K. (1958). *The Collected Works of Mahatma Gandhi (Vols. 1–100)*. New Delhi: Publications Division, Government of India.
6. Chandra, B., Mukherjee, M., Mukherjee, A., Panikkar, K. N., & Mahajan, S. (2009). *India's Struggle for Independence (1857–1947)*. New Delhi: Penguin Books.
7. Sarkar, S. (1983). *Modern India: 1885–1947*. New Delhi: Macmillan India.
8. Naidu, S. (1918). *Speeches and Writings of Sarojini Naidu*. Madras: G. A. Natesan & Co.
9. Devi, R. (1989). *The Role of Women in the Indian Freedom Struggle*. New Delhi: Commonwealth Publishers.
10. Government of India. (1972). *Select Documents on Indian National Movement*. New Delhi: National Archives of India.
11. Desai, N., & Krishnaraj, M. (1987). *Women and Society in India*. New Delhi: Ajanta Publications.
12. Sen, S. (2000). "Towards a Feminist Politics? The Indian Women's Movement in Historical Perspective." *World Development*, 28(3), 451–462.



## Original Article

### The Role of Teachers in Shaping Future Generations and Empowering Youth to Achieve Sustainable Development Goals

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**Abstract**

*The integration of sustainable development principles into educational frameworks has become increasingly significant, particularly in the context of the United Nations' Sustainable Development Goals (SDGs). Achieving these ambitious and multifaceted objectives necessitates a comprehensive transformation across various domains, including teaching, research, and institutional infrastructure. Within this transformative process, teaching occupies a pivotal position, as students are recognized both as the primary source of innovative potential and as key multipliers capable of disseminating sustainable practices and values throughout society. This dual role underscores the strategic importance of educators in shaping future generations and empowering youth to actively contribute to sustainable development initiatives. Teachers are increasingly adopting the role of learning coaches, guiding students not only in acquiring disciplinary knowledge but also in fostering competencies aligned with education for sustainable development. This pedagogical shift emphasizes the importance of addressing concrete social challenges and promoting interdisciplinarity within the curriculum. By embedding sustainability-oriented content and methodologies into their teaching, educators facilitate the development of critical thinking, problem-solving skills, and a sense of social responsibility among students. Such an approach positions youth as active participants in the pursuit of sustainable solutions, thereby amplifying the impact of educational interventions on broader societal transformation.*

**Keywords:** SDGs, role of teacher, education, learning, curriculum.

**Introduction**

Sustainable development has evolved as a central global strategy to address critical challenges facing humanity, with its conceptual roots traceable to the environmental concerns of the 1970s and the landmark Brundtland Report of 1987, which provided a widely recognized definition of sustainable development. Subsequent international summits, such as the Earth Summit in Rio de Janeiro, further solidified sustainability as a core topic of global discourse. In 2000, the Millennium Summit resulted in the Millennium Declaration and the establishment of eight Millennium Development Goals (MDGs), targeting issues including extreme poverty, hunger, child mortality, and maternal health, with a focus on the world's poorest countries [1]. Despite criticisms regarding their limited alignment with human rights standards and their primary relevance to developing countries, the MDGs contributed to notable progress, such as a significant reduction in extreme poverty and increased global youth literacy rates between 1990 and 2015. Building on the MDGs, the 2012 Rio+20 Conference introduced Agenda 2030, which set forth 17 Sustainable Development Goals (SDGs) encompassing 169 targets and a comprehensive set of indicators to be achieved by 2030. These goals address five critical areas—People, Planet, Prosperity, Peace, and Partnership—under the guiding principle of “no one left behind,” emphasizing the universal responsibility of all countries. The SDGs are distinguished by their inclusive development process, which incorporated public consultation and a rigorous data validation process involving both official and non-official sources, such as the World Bank and the Organisation for Economic Cooperation and Development.

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The SDG Index, introduced to monitor progress, has expanded its coverage from 34 countries in 2015 to 162 in 2019, facilitating the identification of priorities, supporting policy discussions, and highlighting data gaps. Within this evolving framework of sustainable development, the role of teachers emerges as pivotal in shaping future generations and empowering youth to contribute to the achievement of the SDGs. By fostering knowledge, skills, and values aligned with sustainable development, educators are positioned to influence the capacity of young people to address complex global challenges and participate actively in the realization of the SDGs.

## Historical Perspectives on the Role of Teachers in Societal Development

The historical evolution of sustainable development as a societal goal provides a rich context for understanding the shifting role of teachers in shaping future generations. While the explicit connection between teachers and sustainable development is a relatively recent focus, the broader historical trajectory of societal development highlights the implicit and evolving responsibilities of educators in transmitting values, knowledge, and skills essential for societal progress.

**1. Early Foundations of Societal Development and the Implicit Role of Education :** The roots of sustainable development can be traced back to early economic and ecological thinkers who emphasized the importance of managing natural resources for the benefit of both present and future generations. These early perspectives, though not explicitly focused on formal education, implicitly recognized the necessity of transmitting knowledge and values related to stewardship, resource management, and societal well-being from one generation to the next. In this context, teachers—whether in formal or informal settings—served as crucial agents in the intergenerational transfer of such knowledge, shaping societal attitudes and practices toward development and sustainability.

**2. The Emergence of Sustainable Development and the Expanding Mandate of Teachers :** The modern concept of sustainable development gained prominence with the publication of "The Limits to Growth" in 1972 and was further crystallized in the 1987 Brundtland Report, which defined sustainable development as meeting the needs of the present without compromising the ability of future generations to meet their own needs. This period marked a significant shift in societal priorities, with an increasing emphasis on balancing economic, social, and environmental objectives. As sustainable development became a central theme in international policy—culminating in the adoption of the Millennium Development Goals (MDGs) in 2000 and the Sustainable Development Goals (SDGs) in 2015—the role of teachers expanded accordingly. Educators were increasingly recognized as key actors in equipping youth with the knowledge, skills, and values necessary to address complex global challenges. The proliferation of indicators and monitoring systems to track progress toward these goals further underscored the importance of education in fostering informed, responsible, and empowered citizens capable of contributing to sustainable societal development.

**3. Integration of Knowledge Systems and the Teacher's Role in Bridging Knowledge and Action :** As the discourse on sustainable development evolved, there emerged a growing recognition of the need for integrated knowledge systems that bridge the gap between research, innovation, and practical action. The management of boundaries between knowledge and action became a central concern, with calls for coordinated efforts to supply information that is salient, legitimate, and credible. Within this framework, teachers occupy a pivotal position as mediators between the generation of knowledge and its application in real-world contexts. By fostering critical thinking, promoting interdisciplinary learning, and encouraging active engagement with societal issues, educators help students navigate the complexities of sustainable development and translate abstract concepts into meaningful action. This integrative role highlights the enduring significance of teachers in shaping not only the intellectual capacities but also the ethical and civic orientations of future generations, thereby contributing to the broader project of societal development.

## Teachers as Catalysts for Achieving Sustainable Development Goals

A central aspect of teachers' catalytic role lies in recognizing and harnessing the dual potential of students as both innovators and multipliers. Students represent the greatest reservoir of innovative capacity within educational institutions, and their engagement in sustainability-oriented learning can have far-reaching effects beyond the classroom. Teachers, by integrating sustainability themes and interdisciplinary approaches into their teaching, enable students to internalize and propagate the principles of sustainable development. This multiplier effect is critical, as students who are empowered with the knowledge, skills, and motivation to address SDG-related challenges can influence their peers, communities, and future professional environments. Thus, teachers act as key enablers, shaping not only individual learners but also the broader societal impact of education for sustainable development.

## Pedagogical Approaches for Integrating SDGs into Education

**1. Holistic and Interdisciplinary Sustainable Learning :** A central pedagogical approach for integrating Sustainable Development Goals (SDGs) into education is the adoption of holistic and interdisciplinary sustainable learning frameworks. This approach transcends traditional subject boundaries by combining elements from education, sociology, and environmental studies, thereby equipping learners with a comprehensive understanding of the interconnectedness between individuals, communities, and the planet. Sustainable learning emphasizes the integration of environmental, economic, and social factors, fostering a balanced perspective that is essential for navigating the



complexities of a rapidly changing world. By embedding sustainability principles into educational practices, learners are not only provided with academic knowledge but are also encouraged to develop the skills and attitudes necessary for responsible citizenship and informed decision-making. This holistic model aims to cultivate active engagement, environmental stewardship, and social equity, empowering students to become catalysts for positive change within their communities and beyond. The interdisciplinary nature of sustainable learning ensures that education is relevant to real-world challenges, bridging the gap between theoretical knowledge and practical application in addressing issues such as environmental degradation, social inequality, and economic instability.

**2. Promoting Inclusive and Equitable Learning Environments :** Another key pedagogical strategy involves fostering inclusive and equitable learning environments that align with the objectives of SDG4, which seeks to ensure quality education and lifelong learning opportunities for all. Sustainable learning advocates for accessible education that transcends socioeconomic barriers and geographic boundaries, ensuring that every learner has equal opportunities to acquire relevant knowledge and practical skills. This approach recognizes education as a powerful tool for social transformation, empowering individuals from diverse backgrounds to actively participate in shaping a sustainable future. By promoting inclusivity and equity within educational systems, teachers can help bridge disparities and provide learners with the tools needed to address complex societal challenges. The emphasis on inclusivity also extends to the cultivation of attitudes and values that support social justice and equity, further reinforcing the transformative potential of education in achieving the SDGs.

**3. Emphasizing Critical Thinking and Problem-Solving through Mathematics Education :** Mathematics education is highlighted as a pivotal component in the pursuit of SDG4, given its role in developing critical thinking, analytical skills, and problem-solving proficiency. Mastery of mathematics not only contributes to personal growth but also underpins sustainable economic and social development. By integrating mathematics education into the broader framework of sustainable learning, educators can empower students to make meaningful contributions to their communities and society at large. The focus on mathematics as a core discipline underscores the importance of equipping learners with the cognitive tools necessary to address multifaceted challenges, make informed choices, and drive innovation in support of sustainable development. This approach reinforces the alignment between quality education and the broader objectives of the SDGs, highlighting the significance of subject-specific proficiency within an interdisciplinary and holistic educational paradigm.

### **Empowering Youth through Education for Sustainable Development**

Empowering youth to achieve the Sustainable Development Goals (SDGs) through education is a multifaceted endeavor, shaped by a diversity of practices, theoretical frameworks, and disciplinary perspectives. Sustainability education, as currently promoted, does not adhere to a single model or exclusive prototype; rather, it is characterized by a plurality of approaches, each influenced by the resources, contexts, and interests of the agents involved. This diversity reflects the complex and evolving nature of sustainability education, which has developed along a historical trajectory that imbues it with social, environmental, and educational significance.

The integration of sustainability into educational systems is informed by a confluence of knowledge from various disciplines, including anthropology, psychology, sociology, economics, and ecology. This interdisciplinary approach enables the construction of a nuanced and comprehensive understanding of the contemporary ecological crisis. Such understanding is not only formalizable but also interpretable and rationalizable, providing a foundation for normative orientations that guide transformative change. Education, in this context, is envisioned as a vehicle for fostering human development aligned with the principles of environmental reconciliation and sustainable progress.

Within this broad landscape, five principal types of theoretical contributions help organize the diverse models of sustainability education: economic, socio-political, philosophical and bioethical, pro-environmental, and pedagogical. Each type is rooted in its respective disciplinary tradition, shaping the arguments, concepts, and languages employed by educators and theorists. This plurality of perspectives allows for the development of educational interventions that are responsive to local contexts and global challenges alike, thereby empowering youth to engage critically and constructively with the SDGs. The ongoing theoretical efforts and the mutual enrichment of different communities of practice underscore the potential of education to equip young people with the knowledge, skills, and values necessary to contribute meaningfully to sustainable development.

### **Challenges Faced by Teachers in Promoting SDGs**

**1. Navigating Complex Interconnections Among SDGs :** Teachers face significant challenges in promoting the Sustainable Development Goals (SDGs), particularly due to the intricate interconnections among various goals. Educators are tasked with fostering deep awareness and empathy among students regarding the origins and consequences of inequalities at multiple scales. This requires not only imparting knowledge but also facilitating critical discussions that link social inequality, sustainability, climate change, and economic growth. The complexity of these relationships demands that teachers move beyond traditional subject boundaries and adopt a transdisciplinary approach, which can be difficult given existing curricular structures and limited resources. Furthermore, teachers must encourage students to reflect on their own lifestyles and their relationship to the economic system, prompting them to question established norms and envision sustainable alternatives both individually and collectively. This process is intellectually



demanding and requires educators to be well-versed in a broad range of topics, as well as skilled in guiding transformative learning experiences.

**2. Addressing Epistemological and Systemic Barriers :** Another major challenge lies in overcoming epistemological and systemic barriers that hinder the meaningful implementation of SDGs in education. Teachers are often constrained by prevailing educational paradigms that prioritize economic growth and human development without adequately considering planetary boundaries and environmental limits. The need to rethink and renegotiate deeply ingrained concepts—such as the pursuit of endless growth, conventional definitions of well-being, and humanity’s relationship with nature—places teachers in a position where they must challenge both their own assumptions and those of their students. This transformative and transdisciplinary educational approach is further complicated by the reality that no nation has yet achieved human development goals without exceeding planetary boundaries. As a result, teachers must navigate the tension between promoting human prosperity and advocating for ecological sustainability, often without sufficient institutional support or clear pedagogical frameworks. These challenges underscore the importance of equipping teachers with the tools, knowledge, and autonomy necessary to foster critical thinking and transformative action among youth in pursuit of the SDGs.

## Policy Frameworks and Institutional Support for Teachers

**1. Integration of Sustainable Development Goals into Educational Policy :** The integration of the Sustainable Development Goals (SDGs) into educational policy frameworks has become a central strategy for fostering awareness and action among youth. The SDGs, established by the United Nations in 2015 as part of the 2030 Agenda, encompass 17 ambitious targets aimed at creating a more just, secure, and sustainable world. Their broad scope, ranging from eradicating poverty (SDG 1) to achieving sustainable cities and communities (SDG 11), is complemented by specific descriptors that enable countries to measure progress toward each goal. Recognizing the long-term nature of these objectives, educational institutions are increasingly seen as optimal environments for disseminating knowledge about the SDGs and cultivating a sense of responsibility among students, who will ultimately be the primary beneficiaries or victims of the success or failure to achieve these goals.

Recent policy reforms reflect this recognition. For example, the latest secondary education reform explicitly incorporates the SDGs into the graduate profile for students completing the fourth year of compulsory secondary education (ESO). The SDGs are also embedded within two key competencies—citizenship and digital competence—that students are expected to acquire by the end of both ESO and the Baccalaureate, as stipulated in national regulations (RD 217/2022 and RD 243/2022). These policy measures institutionalize the expectation that teachers will play a pivotal role in equipping students with the knowledge, skills, and values necessary to contribute to sustainable development.

**2. Institutional Initiatives and Support Mechanisms:** formal policy mandates, a range of institutional initiatives and support mechanisms have been developed to assist teachers in integrating the SDGs into their practice. In higher education, while there is less explicit regulatory guidance regarding SDG implementation, ministries and universities have taken proactive steps to fill this gap. For instance, the Ministry for Ecological Transition and Demographic Challenge has produced a guide offering practical advice on how to incorporate the SDGs into university curricula. Additionally, many institutions have established sustainability plans and dedicated online portals to publicize their efforts and share resources related to SDG engagement, such as the Sustainability Portal of the Polytechnic University of Madrid (UPM).

These institutional supports are designed to empower teachers by providing them with the tools, frameworks, and examples necessary to contextualize the SDGs within their specific disciplinary and pedagogical contexts. The promotion of interdisciplinary approaches, particularly those that connect science, technology, society, and mathematics (STEM), is highlighted as a means of increasing student motivation and engagement. By demonstrating the real-world relevance of classroom learning, these approaches not only facilitate the achievement of SDG-related competencies but also reinforce the broader mission of education as a driver of sustainable societal transformation.

## Case Studies: Successful Teacher-Led SDG Initiatives

**1. Integration of SDG Mapping Tools in Educational Practice:** One notable example of a successful teacher-led initiative supporting the Sustainable Development Goals (SDGs) is the adoption and integration of the OSDG tool within educational settings. The OSDG initiative, launched by the Public Policy and Management Institute (PPMI) and the United Nations Development Programme (UNDP) Istanbul International Centre for Private Sector in Development (IICPSD) SDG AI Lab, provides a user-friendly application that enables educators to identify and map SDG-relevant content in any text. This tool has been particularly valuable for teachers seeking to align their curriculum and classroom activities with the SDGs, as it helps navigate the ambiguities and varied interpretations that often accompany SDG implementation. By leveraging the OSDG tool, teachers can more accurately connect their lesson plans, projects, and student outputs to specific SDGs, thereby fostering a clearer understanding among students of how their learning contributes to global sustainability efforts. The open and transparent nature of the OSDG project, including public access to its methodology and programmatic code, further empowers teachers—especially those without institutional



support or access to external consultants—to independently and effectively integrate SDG mapping into their educational practice.

**2. Collaborative and Open Approaches to SDG Education :** The OSDG initiative exemplifies how teacher-led efforts can benefit from collaborative and open approaches to SDG education. By building upon existing research and integrating various initiatives into a single coherent system, OSDG avoids duplication of effort and provides a comprehensive resource for educators. Teachers participating in such initiatives are able to draw on a robust ontology of SDG keywords and mapping strategies, which enhances the accuracy and relevance of their SDG-related activities. The open access philosophy of OSDG ensures that teachers from diverse backgrounds and resource levels can participate in global sustainability education, democratizing the process of SDG integration in schools and universities. This approach not only supports teachers in their role as facilitators of SDG learning but also encourages the development of a community of practice where educators can share experiences, resources, and best practices for advancing the SDGs through education.

### Future Directions and Recommendations for Teacher Involvement in SDGs

**1. Integrating SDGs into Educational Curricula :** A critical future direction for teacher involvement in the Sustainable Development Goals (SDGs) is the systematic integration of SDG content into educational curricula at all levels. The context highlights that secondary education reforms have already begun to embed the SDGs within student exit profiles, particularly through the inclusion of SDG-related competencies such as citizenship and digital literacy in both compulsory secondary education and the baccalaureate programs. This curricular alignment ensures that students are not only exposed to the SDGs but are also assessed on their understanding and application of these global objectives. Teachers, therefore, play a pivotal role in operationalizing these curricular mandates by designing lessons, projects, and assessments that make the SDGs relevant and accessible to students. The interdisciplinary STEM (Science-Technology-Environment-Mathematics) approach is especially recommended, as it connects classroom learning to real-world challenges, thereby increasing student motivation and engagement. Teachers are encouraged to leverage this approach to demonstrate the practical implications of the SDGs in students' daily lives, fostering both awareness and actionable knowledge.

**2. Enhancing Teacher Training and Professional Development :** To effectively empower teachers as agents of SDG implementation, ongoing professional development and targeted training are essential. While secondary education has clear guidelines for SDG integration, higher education lacks similarly explicit regulatory frameworks. This gap underscores the need for comprehensive teacher training programs that equip educators at all levels with the knowledge, skills, and pedagogical strategies necessary to teach the SDGs. Ministries and educational authorities are advised to develop and disseminate guides, such as those produced by the Ministry of Ecological Transition and Demographic Challenge, to support teachers in this endeavor. Furthermore, universities and educational institutions should establish sustainability plans and dedicated portals to share best practices, resources, and institutional actions related to the SDGs. By fostering a culture of continuous learning and collaboration among teachers, educational systems can ensure that SDG education remains dynamic, contextually relevant, and impactful.

**3. Promoting Student Engagement and Societal Awareness :** Another key recommendation is for teachers to actively promote student engagement with the SDGs beyond the classroom. Given that young people will be the primary beneficiaries—or victims—of the success or failure to achieve the SDGs, it is imperative that they not only understand these goals but also recognize their personal and collective stake in their realization. Teachers should facilitate opportunities for students to participate in projects, campaigns, and community initiatives that address SDG-related challenges. By connecting academic content to societal issues and encouraging civic participation, teachers can help cultivate a generation of informed, motivated, and empowered citizens. This approach aligns with broader societal trends, as references to the SDGs are increasingly visible in public campaigns, organizational actions, and governmental policies at various levels. Teachers, therefore, serve as crucial mediators between global objectives and local action, helping to bridge the gap between policy and practice.

### Conclusion

The analysis underscores the pivotal role of teachers in shaping future generations and advancing sustainable development. Historically, educators have been instrumental in societal progress, with their responsibilities expanding alongside the emergence of sustainable development paradigms. Teachers now serve not only as transmitters of knowledge but also as facilitators who bridge theory and practice, empowering students to become active contributors to sustainable solutions. The integration of Sustainable Development Goals (SDGs) into educational practice positions teachers as catalysts for transformation. By adopting holistic, interdisciplinary, and inclusive pedagogical approaches, educators foster critical thinking, problem-solving, and innovation among students. These strategies are essential for equipping youth with the competencies required to address complex global challenges.

Despite their centrality, teachers face significant challenges, including navigating the intricate interconnections among SDGs and overcoming epistemological and systemic barriers. Institutional support and robust policy frameworks are therefore crucial to enable teachers to effectively promote SDGs. Case studies demonstrate that



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teacher-led initiatives—such as the use of SDG mapping tools and collaborative educational models—can yield meaningful progress when adequately supported.

Looking forward, the successful integration of SDGs into curricula, enhancement of teacher training, and promotion of student engagement are recommended as key strategies. These measures will not only strengthen the capacity of teachers but also ensure that education remains a driving force for sustainable development and societal well-being.

## **References:**

1. C. Dhara and V. Singh : "The Elephant in the Room: Why Transformative Education Must Address the Problem of Endless Exponential Economic Growth,"
2. Alexander Leicht, Julia Heiss, and Won Jung Byun. : "Issues and Trends in Education for Sustainable Development" (2018)
3. Adinarayan Reddy, "Educators for Sustainable Development" (2025)
4. UNESCO : "Global Report on Teachers" (2024)
5. UNESCO : "Education for Sustainable Development Goals: Learning Objective" (2017)



## Original Article

### Artificial Intelligence and the Transformation of Work in Contemporary Society

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#### Abstract

*This paper explains how AI is changing the nature of labour from a task-based approach to automation. AI mainly changes some tasks inside jobs rather than completely eliminating occupations. New types of labour are emerging in fields like data governance, system monitoring, and human-machine coordination, even as regular and administrative tasks become more automated. These changes are not socially neutral, though. Large companies and capital owners typically benefit disproportionately from productivity gains brought about by AI, which exacerbates economic inequality and increases job instability for a sizable percentage of the workforce. Work is an essential social institution which has an impact on daily living, power dynamics, social identity, and financial survival. Artificial intelligence (AI) is changing how labour is organized, compensated, and experienced as it becomes more and more integrated into contemporary workplaces. Unlike previous technological advancements that mostly affected manual labour, artificial intelligence (AI) is creating a significant restructuring of both white-collar and blue-collar occupations by gradually influencing cognitive, analytical, and communicative skills. In order to comprehend how technological innovation interacts with social institutions and human experience, this article explores the relationship between AI and work from economic, sociological, and anthropological perspectives. This paper also emphasizes the risks of algorithmic bias in AI-based hiring, evaluation, and management systems. Because AI is trained on historical data that has been shaped by societal inequalities, it can reproduce and even exacerbate discrimination based on class, gender, caste, and race. These issues show that AI is not only a technology tool but also a socio-technical force shaped by institutional, political, and cultural choices. In order to ensure that AI promotes equitable, meaningful, and sustainable labour rather than increasing already-existing inequalities, the study highlighting the significance of inclusive education, lifelong learning, and ethical governance.*

**Keywords:** Artificial Intelligence, Future of Work, Automation of work, Task-Based Labour Transformation and Employment and Workplace Inequality.

#### Introduction

Work is one of the essential institutions that maintain the structure of society. It influences people's daily routines, social status, and sense of self in addition to providing them with money and financial security. Occupations have cultural and representative meaning that influences how people are perceived and how power and prestige are distributed in society. Because of this, changes in the workplace have broader social and cultural repercussions that affect relationships, institutions, and values. They are never just financial or technological. Instead, they influence daily life, power dynamics, and social relationships. One of the most significant factors influencing modern work is artificial intelligence (AI). AI, in its broadest sense, refers to computing systems that are able to carry out tasks related to human intelligence, including learning, pattern recognition, language processing, and decision-making (Russell & Norvig, 2021). AI is becoming more involved in cognitive and analytical work, in contrast to previous technology advancements that mostly replaced manual or physical labour. Because of this, many professional and white-collar jobs are currently undergoing significant restructuring rather than being completely replaced, which has left people feeling both hopeful and concerned.



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Discussions about AI and employment in the public domain are often highly conflict-ridden. While some stress productivity development and the potential reduction of routine or repetitive labour work, others see significant job losses and social disturbance. According to research, AI tends to change labour markets by creating new types of work and automating tasks. As computers take over some jobs, new roles and responsibilities will be created, which results in different outcomes for different industries, geographical areas, and social groupings (Acemoglu&Restrepo, 2019). Therefore, how work is reorganized, who benefits from these changes, and who is exposed to increased insecurity are more important concerns than job security. The future of employment and AI are examined in this article from three relevant angles. From an economic perspective, it takes into account shifts in wage structures, employment trends, and productivity. Sociologically, it examines power dynamics, inequality, and organizational changes in the workplace. From an anthropological perspective, it investigates how evolving forms of employment impact identity, meaning, and lived experience in a society that is becoming more and more algorithm-driven.

## **Understanding AI as a Socio-Technical Force in Work**

Artificial intelligence (AI) should be seen as a socio-technical system composed of various techniques, such as robotics, computer vision, deep learning, machine learning, and natural language processing, all of which are integrated into organizations, markets, and organizational processes, rather than as a single technology. Instead of changing employment at the level of entire occupations, AI mostly alters tasks—the specific actions that make up jobs. According to David Autor (2015), jobs are collections of tasks, and technological breakthroughs usually automate some functions while maintaining others. This task-based perspective provides a more accurate understanding of how labour evolves with technological advancements. This approach is further developed by Acemoglu and Restrepo (2019), who publish a framework that identifies three main effects of automation and artificial intelligence. First, automation (displacement) occurs when machines carry out specific tasks instead of people, which could lead to fewer jobs or lower wages. Second, growth happens when AI improves human capabilities, increasing productivity and improving the quality of work. Third, "new task creation" refers to the process by which technology generates whole new roles and activities that increase worker demand.

## **Technological Change and the Evolution of Work**

Technological developments have often disrupted labour markets and created new kinds of jobs in the past. By creating jobs in factories and eliminating traditional handicraft and artisanal output, industrialization reconfigured skills, authority, and employment relations (Autor, Levy, &Murnane, 2003). In a similar way, computerization in the late 20th century reduced clerical and routine office jobs while increasing employment in information technology, professional services, and personal services (Goos, Manning, &Salomons, 2014). These changes were often socially disruptive until new institutional arrangements developed, leading to times of unemployment, wage division, and labour unrest. Artificial intelligence represents a new phase of technological development since it increasingly affects analytical and cognitive tasks rather than just routine manual labour. AI systems are now capable of doing some or all of the work that were previously believed to be reasonably safe, including routine legal document evaluation, translation, scheduling, customer support, and basic diagnostics (Autor, 2015). Instead of professional occupations going extinct, this is the points of a shift in the nature of employment. (Acemoglu and Restrepo. 2019) claim that automation displaces certain jobs and creates new ones while shifting the skills that command higher incomes toward judgment, creativity, and human-machine coordination.

## **AI and Labour Market Transformation**

The labour market is undergoing a significant restructuring as a result of artificial intelligence's impact on how modern work is performed and compensated. Unlike previous industrial revolutions that focused on physical tasks, AI and automation now impact regular and cognitive operations across many industries. Therefore, a three-way dynamic characterizes the impact of AI on employment: the emergence of new occupational categories, the modification of existing positions, and the displacement of some professions. Artificial intelligence-related job displacement mainly focuses on routine, manual, and easily codified work. Robot adoption can lower employment and earnings in impacted local labour markets, especially in manufacturing districts with few alternative employment prospects, according to empirical studies on the spread of industrial robots in developed economies (Acemoglu&Restrepo, 2020). These consequences, however, are not uniform and heavily rely on labour market institutions, adjustment programs, and regional economic patterns. Crucially, by emphasizing the confined and conditional nature of relocation, these findings suggest uncertainty on oversimplified stories of widespread job loss. The use of occupation-based methods, which presumed that entire jobs might be automated, was a major drawback of early automation estimates. A more true picture is given by later task-based assessments, which acknowledge that most employment comprise a collection of tasks, many of which are still challenging to automate. Using this method, an important OECD (Organisation for Economic Co-operation and Development) study calculated that a significantly greater proportion of jobs are likely to experience considerable task transformation rather than complete automation, while only a small percentage of jobs across countries face a high risk of full automation (Arntz, Gregory, &Zierahn, 2016).



International research on generative AI has moved away from replacement narratives and toward the idea of occupational introduction. The degree to which occupations are subject to AI-driven automation is measured by worldwide indexes created by the International Labour Organization (ILO). These studies, which reveal significant heterogeneity by occupation, sector, gender, and country income level, focus on partial automation and work restructuring rather than complete job loss (Gmyrek, Berg, & Bescond, 2023; Gmyrek et al., 2025). While manual, care-based and informal occupations continue to be relatively less affected, clerical and administrative roles are among the most vulnerable. By creating new industries and vocations, AI can potentially generate employment. According to Acemoglu and Restrepo's (2019) task-based theory, automation can enhance labour demand by generating new tasks that require human input, even though it decreases labour demand for existing employment. In practical terms, AI is driving up demand for jobs in system monitoring, cyber security, data governance, auditing, and AI development. It also promotes employment in industries where human judgment, empathy, and social connection are essential, such as education, healthcare, negotiation, and community mediation. There are new forms of "interaction labour" in which workers monitor, coordinate, and repair automated systems.

## **Skills, Education, and Workforce Re-composition in the Age of Artificial Intelligence**

The rapid expansion of artificial intelligence (AI) is drastically altering the nature of work and rearranging skill sets, labour markets, and educational systems. The need for non-routine skills like creativity, problem-solving, social intelligence, and complex judgment rises as the relative worth of regular and predictable abilities declines as AI systems automate more of them. Since intelligent computers are increasingly augmenting human labour rather than entirely replacing it, this shift reflects a broader shift in the nature of employment. In response to these developments, a number of academics and policy organizations emphasize the importance of flexible training programs and lifelong learning. Traditional educational approaches that emphasize skill acquisition at the beginning of a career are no longer sufficient in a rapidly evolving technological environment. People must continuously re-educate and up skill in AI-mediated settings to remain adaptable and relevant. Therefore, educational systems must encourage learning pathways that include continue learning programmes that covers the entire working life.

Access to training choices varies greatly. Workers who already have advantages in terms of education, income, and occupational status are more likely to benefit from employer-sponsored training and advanced reskilling programs. However, partiality, high expenses, time constraints, and a lack of digital infrastructure are common challenges faced by marginalized labour. These differences carry the risk of sustaining pre-existing social stratification trends because those who are least able to adapt to technological change are most vulnerable to job loss (World Economic Forum, 2020; Acemoglu & Restrepo, 2020).

Educational institutions are challenged with two difficulties in this situation. People must first build strong foundations in digital and arithmetical literacy in order to be able to understand, interact with, and evaluate AI systems. Development the humanities and social sciences is equally essential for the institutions in this tech revolution era. Skills like ethical reasoning, critical thinking, interpretation, and social analysis are essential since AI governance, deployment, and workplace integration are profoundly social challenges rather than merely technological ones. Making judgments on automation, surveillance, bias, and accountability requires human judgment based on social and ethical understanding (Eubanks, 2018).

## **AI-Driven Growth and the Politics of Inequality**

Artificial intelligence (AI) is often known for its potential to boost productivity, encourage innovation, and generates new types of financial improvement. By automating repetitive tasks, enhancing decision-making, and enabling whole new products and services, artificial intelligence (AI) can significantly boost economic efficiency (Agrawal, Gans, & Goldfarb, 2019). But productivity increases by themselves do not guarantee broad societal benefits; the crucial question is how these improvements are distributed among different social groups and economic strata. Gains in productivity brought about by AI are increasingly concentrated in a few major corporations and developed economies, exacerbating already-existing disparities in wealth and income.

These AI systems, which depend on complex algorithms and huge amounts of data, are increasingly under the control of large organizations with the financial resources, technological knowledge, and data infrastructure required developing and implementing AI systems at large scale. Capital owners including CEOs, stockholders, and technological elites, typically profits financially from AI adoption more than average employees due to the concentration of AI capacity in today's economy. Because of this, AI often makes wage division worse, highly skilled workers benefit from increased incomes and greater options, while middle- and low-skilled workers face growing job insecurity, stagnant earnings, or even instability in labour market. (Acemoglu & Restrepo, 2020).

AI-powered digital markets often benefit a small number of strong companies. Due to network effects, large-scale operations, and privileged access to data, these corporations are able to control a significant share of the market. Smaller businesses find it difficult to prosper in such an environment (De Loecker, Eeckhout, & Unger, 2019). Eventually, data becomes a powerful economic instrument that allows leading companies to generate enormous profits and influence economic and policy choices. The growing concentration of wealth and power in the hands of a small number of individuals exacerbates social and economic inequality.



## Algorithmic Bias and Discriminatory Outcomes

The term "algorithmic bias" describes how AI systems may inadvertently treat particular groups of people unfairly. This typically occurs when AI technologies are trained using inadequate or biased data, or when fairness is not adequately taken into account during the design process. AI learns from human-generated data, which already reflects social injustices, despite the fact that it is frequently perceived as impartial and objective. Because of this, AI systems have the potential to replicate and possibly exacerbate pre-existing kinds of discrimination. In the workplace, this problem is most noticeable. AI is now widely used in hiring, promotions, performance assessments, and even employee monitoring. If prejudice based on gender, caste, class, or race is revealed, AI systems trained on past hiring data may continue to favour favoured groups. Prejudice of this type can occur even when no one is purposefully left out, claim Barocas and Selbst (2016). This challenges traditional ideas of accountability because unfair outcomes are produced by complex algorithms rather than definitive human decisions. Importantly, algorithmic bias is not just a technological issue but also a social one. Labour markets are already impacted by long-standing inequalities, and AI can incorporate these trends into automated systems that appear impartial and scientific. This makes it more challenging to spot and stop discrimination. Algorithmic systems often reflect the values and social structures of the civilization in which they are created.

## Conclusion

Artificial intelligence is profoundly changing the nature of work by altering tasks, skills, and power dynamics in labour markets rather than completely eliminating employment. AI functions as a socio-technical force that affects issues of inequality, identity, and social justice in addition to productivity as this paper has demonstrated. Even though AI generates new jobs and economic expansion, its advantages are not shared equally, frequently favouring capital owners and big businesses. AI runs the potential of exacerbating already-existing disparities in the absence of inclusive educational programs, moral leadership, and strong labour laws. Therefore, careful regulation and social responsibility are necessary to guarantee a more equitable workplace in the future.

## References

1. Acemoglu, D., & Restrepo, P. (2019). Automation and new tasks: How technology displaces and reinstates labor. *Journal of Economic Perspectives*, 33(2), 3–30.
2. Acemoglu, D., & Restrepo, P. (2020). Robots and jobs: Evidence from U.S. labor markets. *Journal of Political Economy*, 128(6), 2188–2244.
3. Agrawal, A., Gans, J., & Goldfarb, A. (Eds.). (2019). *The economics of artificial intelligence: An agenda*. University of Chicago Press.
4. Arntz, M., Gregory, T., & Zierahn, U. (2016). The risk of automation for jobs in OECD countries: A comparative analysis (OECD Social, Employment and Migration Working Papers No. 189).
5. Autor, D. H. (2015). Why are there still so many jobs? The history and future of workplace automation. *Journal of Economic Perspectives*, 29(3), 3–30.
6. Autor, D. H., Levy, F., & Murnane, R. J. (2003). The skill content of recent technological change: An empirical exploration. *Quarterly Journal of Economics*, 118(4), 1279–1333.
7. Barocas, S., & Selbst, A. D. (2016). Big data's disparate impact. *California Law Review*, 104(3), 671–732.
8. Brynjolfsson, E., & McAfee, A. (2014). *The second machine age: Work, progress, and prosperity in a time of brilliant technologies*. W. W. Norton & Company.
9. Brynjolfsson, E., & McAfee, A. (2017). *Machine, platform, crowd: Harnessing our digital future*. W. W. Norton & Company.
10. De Loecker, J., Eeckhout, J., & Unger, G. (2020). The rise of market power and the macroeconomic implications. *Quarterly Journal of Economics*, 135(2), 561–644.
11. Eubanks, V. (2018). *Automating inequality: How high-tech tools profile, police, and punish the poor*. St. Martin's Press.
12. Gmyrek, P., Berg, J., & Bescond, D. (2023). *Generative AI and jobs: A global analysis of potential effects on job quantity and quality* (ILO Working Paper No. 96). International Labour Organization.
13. Gmyrek, P., et al. (2025). *Generative AI, occupational exposure, and labour market transformation*. International Labour Organization.
14. Goos, M., Manning, A., & Salomons, A. (2014). Explaining job polarization: Routine-biased technological change and offshoring. *American Economic Review*, 104(8), 2509–2526.
15. Kalleberg, A. L. (2009). Precarious work, insecure workers: Employment relations in transition. *American Sociological Review*, 74(1), 1–22.
16. Organisation for Economic Co-operation and Development. (2019). *Artificial intelligence in society*. OECD Publishing.
17. Rosenblat, A., & Stark, L. (2016). Algorithmic labor and information asymmetries: A case study of Uber's drivers. *International Journal of Communication*, 10, 3758–3784.
18. Russell, S. J., & Norvig, P. (2021). *Artificial intelligence: A modern approach* (4th ed.). Pearson.



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19. Susskind, D. (2020). A world without work: Technology, automation, and how we should respond. Metropolitan Books.
20. World Bank. (2019). World development report 2019: The changing nature of work. World Bank.
21. World Economic Forum. (2020). The future of jobs report 2020. World Economic Forum.
22. Zuboff, S. (2019). The age of surveillance capitalism: The fight for a human future at the new frontier of power.



## Original Article

### Social Media, Youth, and Electoral Politics in Contemporary India

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#### Abstract

The expansion of social media has significantly transformed the nature of political communication and electoral politics across democracies. In India, where youth constitute one of the largest demographic groups and a decisive segment of the electorate, social media has emerged as a powerful tool shaping political awareness, participation, and voting behavior. Platforms such as Facebook, Twitter (X), Instagram, YouTube, and WhatsApp have altered traditional modes of political mobilization by enabling direct interaction between political actors and citizens, particularly young voters. This paper examines the relationship between social media, youth, and electoral politics in contemporary India. It analyzes how digital platforms influence political socialization, opinion formation, electoral participation, and campaign strategies among Indian youth. Drawing upon theories of political communication, digital democracy, and youth participation, the study critically evaluates both the democratic potential and the challenges posed by social media, including misinformation, polarization, data-driven manipulation, and digital inequality. The paper argues that while social media has expanded avenues for youth engagement in electoral politics, it has also introduced new risks to democratic deliberation and electoral integrity. The study concludes by emphasizing the need for digital literacy, ethical political communication, and effective regulatory mechanisms to strengthen democratic participation in India.

**Keywords:** Social Media, Youth, Electoral Politics, India, Digital Democracy, Political Participation

#### Introduction

India is the world's largest democracy, characterized by a vast and diverse electorate. Among its population of over 1.4 billion, youth constitute a crucial demographic segment. According to census and election data, a significant proportion of Indian voters are below the age of 35, making youth a decisive force in shaping electoral outcomes. In recent decades, electoral politics in India has undergone profound changes due to the rapid penetration of information and communication technologies, particularly social media platforms such as Facebook, Twitter (X), Instagram, YouTube, and WhatsApp. The rise of social media has altered traditional patterns of political communication that were once dominated by political parties, mainstream media, and face-to-face mobilization. Today, political messages circulate instantaneously, bypassing conventional gatekeepers and reaching citizens directly. For Indian youth, who are digitally connected, socially networked, and increasingly politically aware, social media has become a primary source of political information and engagement. This paper seeks to analyze the role of social media in shaping youth participation in electoral politics in contemporary India. It explores how digital platforms influence political socialization, voter mobilization, campaign strategies, and democratic engagement. At the same time, the paper critically examines challenges such as misinformation, echo chambers, political polarization, and the commercialization of digital politics.

#### Objectives of the Study

1. To examine the role of social media as an emerging platform of political communication in contemporary Indian electoral politics.



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2. To analyze the patterns of political awareness, engagement, and participation among Indian youth through social media platforms.
3. To understand the influence of social media on youth voting behavior and electoral choices in India.
4. To assess youth-centric digital campaign strategies adopted by political parties in Indian elections.
5. To critically examine challenges such as misinformation, polarization, and digital inequality affecting youth participation.

## Methodology of the Study

The study adopts a qualitative, descriptive, and analytical research design, relying primarily on secondary data sources. Data has been collected from academic books, peer-reviewed journals, reports of the Election Commission of India, policy documents, and publications by Indian and international scholars. The study also draws upon existing empirical surveys, electoral statistics, and content analysis of digital political campaigns. The analysis is guided by theoretical perspectives from political communication, digital democracy, and youth political participation. Although no primary field survey has been conducted, the paper offers a critical synthesis of existing literature to explain emerging trends in India's digital electoral politics.

## Conceptual and Theoretical Framework

### 1. Social Media and Political Communication

Social media refers to digital platforms that allow users to create, share, and interact with content in real time (Dahlgren, 2009; Chadwick, 2017). Unlike traditional mass media, social media enables decentralized, interactive, and participatory communication. In the Indian political context, social media has weakened traditional gatekeeping roles played by editors and broadcasters and has enabled political actors to directly reach citizens.

Castells' (2012) concept of the networked public sphere helps explain how power operates through communication networks in the digital age. Indian scholars such as Thakurta (2012) and Pal (2020) argue that digital media has reshaped agenda-setting in Indian politics by prioritizing speed, emotion, and personalization. Linguistic diversity, caste identities, religion, and regional affiliations significantly influence the nature of political discourse on Indian social media platforms (Yadav, 2014).

### 2. Youth and Political Participation

Youth political participation extends beyond voting to include political discussion, campaigning, protest, volunteering, and online activism (Norris, 2011). In India, youth participation has historically been shaped by student movements, freedom struggles, and identity-based mobilization. Contrary to the perception of youth apathy, Yogendra Yadav (2014) argues that Indian youth are politically active but increasingly prefer non-institutional and digital forms of engagement. Social media offers youth accessible and low-cost avenues for political expression. Banaji and Bhat (2020) note that Indian youth actively engage in political communication through memes, videos, reels, and hashtags. However, such engagement is often episodic, emotionally driven, and personality-centric rather than ideology-based.

### 3. Digital Democracy and Electoral Politics

Digital democracy refers to the use of digital technologies to enhance democratic participation and governance (Bennett & Segerberg, 2013). In India, digital democracy has expanded through online campaigns, e-governance initiatives, and social media outreach. Palshikar (2018) argues that while digital platforms have widened participation, they also reinforce power asymmetries by privileging resource-rich parties and leaders. Indian electoral politics increasingly relies on data analytics, targeted messaging, and digital volunteers. Jaffrelot (2019) observes that leadership-centric personalization has become a defining feature of Indian digital campaigns, influencing youth perceptions and voting behavior.

## Evolution of Social Media in Indian Electoral Politics

The role of social media in Indian elections became particularly visible during the 2014 General Elections, which marked a turning point in digital campaigning. Political parties systematically integrated Facebook, Twitter, YouTube, and WhatsApp into their campaign strategies. The trend intensified during the 2019 General Elections and subsequent state elections. WhatsApp emerged as a powerful grassroots mobilization tool due to its wide penetration and private messaging features. Social media allowed political leaders to bypass traditional media and directly engage with voters, particularly youth. According to the Election Commission of India (2019), digital campaigning significantly influenced first-time voters and urban youth.

## Social Media and Youth Political Socialization

Political socialization refers to the process through which individuals acquire political values, beliefs, and orientations (Dahlgren, 2009). Traditionally, family, caste networks, schools, and political parties played a dominant role in India. In contemporary times, social media has emerged as a supplementary yet powerful agent of political socialization. Indian youth increasingly encounter political information through social media rather than newspapers or television (Kumar, 2020). While exposure to diverse content enhances awareness, algorithm-driven personalization often creates echo chambers, reinforcing ideological biases (Sunstein, 2017). Banaji (2018) notes that political learning



on social media is often informal and entertainment-driven, relying on satire and visual storytelling. This makes politics accessible but risks oversimplifying complex policy debates.

## Youth Mobilization and Electoral Participation

One of the most significant impacts of social media is its role in mobilizing youth for electoral participation (Vaccari & Valeriani, 2016). In India, voter awareness campaigns, digital registration drives, and issue-based mobilization are widely circulated through social media platforms. Palshikar and Yadav (2018) argue that social media has contributed to the political activation of first-time voters, particularly in urban and semi-urban areas. Online volunteering, hashtag activism, and digital canvassing have strengthened youth political efficacy. However, participation remains uneven. Rural youth, women, and marginalized communities face barriers related to digital access, language, and online harassment (Banaji & Bhat, 2020).

## Political Campaigning and Youth-Centric Strategies

Indian political parties increasingly adopt youth-centric digital strategies. Campaign narratives focus on employment, education, nationalism, governance, and identity politics. Jaffrelot (2019) notes that leadership-centric narratives dominate Indian social media campaigns. Influencers, IT cells, and digital volunteers play a crucial role in amplifying political messages. Micro-targeting and data-driven campaigning enhance efficiency but raise ethical concerns related to privacy and manipulation (Chadwick, 2017). Thakurta (2012) warns that emotional appeals often replace substantive policy debate.

## Challenges and Concerns

While social media has expanded opportunities for youth engagement in electoral politics, it has simultaneously generated a range of challenges that raise serious concerns for the quality of democracy in India. These challenges relate to misinformation, polarization, and unequal digital access, all of which disproportionately affect young voters.

### 1. Misinformation and Fake News

Misinformation and fake news constitute one of the most serious threats to India's digital electoral landscape. Social media platforms, particularly WhatsApp, Facebook, and YouTube, enable the rapid circulation of unverified, misleading, or deliberately false information. Due to their encrypted and peer-to-peer nature, platforms like WhatsApp are especially difficult to regulate, allowing politically motivated misinformation to spread unchecked. During election periods, false narratives related to political leaders, parties, religious communities, and public policies are often disseminated through images, short videos, and emotionally charged messages. Sunstein (2017) argues that misinformation gains traction because it reinforces pre-existing beliefs and emotional responses rather than rational evaluation. Indian youth, despite being digitally adept, are not immune to such content especially when it aligns with ideological, religious, or nationalist sentiments.

Several studies and election reports indicate that misinformation campaigns have been strategically used to influence voter perceptions, discredit opponents, and polarize communities. The problem is compounded by low levels of media literacy among large sections of the population, making it difficult for young voters to distinguish between credible information and fabricated content. As a result, electoral decision-making risks being shaped more by manipulation than informed deliberation.

### 2. Polarization and Echo Chambers

Another critical concern arising from social media use in electoral politics is the intensification of political polarization. Social media platforms operate through algorithmic systems designed to maximize user engagement by promoting content that generates strong emotional reactions. As Bruns and Highfield (2016) note, such algorithms tend to amplify sensational, divisive, and ideologically aligned content.

For youth users, this often results in the formation of echo chambers, where individuals are primarily exposed to viewpoints that reinforce their existing beliefs while dissenting perspectives are filtered out. In the Indian context, where politics is deeply intertwined with identity factors such as caste, religion, language, and region, echo chambers can harden social divisions and foster intolerance. Political discussions on social media frequently shift from issue-based debates to personalized attacks, hate speech, and ideological hostility. This environment discourages critical dialogue and weakens democratic norms such as pluralism, compromise, and respect for dissent. Among youth, prolonged exposure to polarized content can normalize extreme positions and reduce the capacity for democratic engagement grounded in reasoned debate.

### 3. Digital Inequality

Despite the rapid growth of internet penetration in India, digital participation in electoral politics remains highly unequal. Access to smartphones, stable internet connectivity, and digital literacy varies significantly across regions, gender, class, and social groups. Rural youth, women, and members of marginalized communities often face structural barriers that limit their meaningful participation in digital political spaces. Banaji and Bhat (2020) highlight that digital platforms often reproduce offline inequalities in online form. Women and minority youth are disproportionately



subjected to online harassment, abuse, and intimidation, discouraging active political engagement. Language barriers further marginalize non-English and non-Hindi speakers from dominant political conversations on social media.

As a result, while social media appears to democratize participation, it simultaneously risks creating a “digital elite” whose voices dominate political discourse. This digital divide undermines the inclusive promise of digital democracy and raises concerns about representational equity in electoral politics.

#### 4. Social Media Regulation and Electoral Integrity

The growing influence of social media in elections has prompted regulatory responses aimed at protecting electoral integrity. The Election Commission of India (ECI) has introduced guidelines requiring political parties and candidates to report digital campaign expenditures, disclose sponsored content, and adhere to the Model Code of Conduct on social media platforms (ECI, 2024). However, enforcing these regulations remains a major challenge. The sheer volume, speed, and decentralized nature of online political communication make real-time monitoring difficult. Additionally, content circulated through private messaging platforms often falls outside the effective reach of regulatory authorities.

Balancing freedom of expression with the need to ensure free and fair elections is a central democratic dilemma. Excessive regulation risks curbing political speech, while inadequate regulation allows misinformation and manipulation to flourish. Scholars argue that safeguarding electoral integrity requires a collaborative approach involving the state, social media companies, civil society organizations, and independent fact-checkers. Transparent platform governance, algorithmic accountability, and civic awareness are essential components of this effort.

#### 5. Future Prospects and Democratic Implications

As digital penetration deepens and younger generations become increasingly connected, social media is expected to play an even more influential role in India’s future elections. Emerging technologies such as artificial intelligence, big data analytics, and deepfake videos present new opportunities for political communication as well as new threats to democratic integrity.

Deepfakes and AI-generated content, in particular, pose serious risks by blurring the boundary between reality and fabrication. Without adequate safeguards, such technologies could further erode trust in democratic institutions and electoral outcomes. At the same time, social media holds significant potential for enhancing transparency, civic engagement, and participatory democracy if used responsibly. Strengthening digital literacy among youth is crucial for enabling critical evaluation of online political content. Educational institutions, civil society organizations, and media platforms must play an active role in promoting ethical digital citizenship. Political parties, in turn, must adopt responsible communication practices that prioritize issue-based debate over manipulation. Ultimately, the democratic impact of social media in India will depend not on technology alone but on the institutional, regulatory, and cultural frameworks that shape its use. Ensuring that social media contributes positively to electoral politics is essential for sustaining India’s democratic future.

#### Conclusion

Social media has become a defining force in youth engagement with electoral politics in contemporary India. It has expanded political participation and access to information while simultaneously introducing challenges such as misinformation, polarization, and inequality. Social media is neither inherently democratic nor anti-democratic; its impact depends on regulatory frameworks, political practices, and citizen awareness. As India’s youth continue to shape its democratic future, responsible use of social media is essential for strengthening electoral democracy.

#### References

1. Banaji, S. (2018). *Youth active citizenship in India*. Palgrave Macmillan.
2. Banaji, S., & Bhat, R. (2020). WhatsApp vigilantes: An exploration of citizen reception and circulation of WhatsApp misinformation. *Journal of Social Media Studies*, 6(1), 1-17.
3. Election Commission of India. (2024). *Guidelines on social media and digital campaigning*. Government of India.
4. Jaffreot, C. (2019). *Modi’s India: Hindu nationalism and the rise of ethnic democracy*. Princeton University Press.
5. Kumar, S. (2020). Social media and political participation of youth in India. *Journal of South Asian Studies*, 43(2), 245–262.
6. Ninan, S. (2012). *Headlines from the heartland: Reinventing the Hindi public sphere*. Sage Publications.
7. Pal, J. (2020). *Digital politics in India: Electoral mobilisation, participation and communication*. Routledge India.
8. Palshikar, S. (2018). Indian democracy: Meaning and practices. *Economic and Political Weekly*, 53(11), 32–38.
9. Thakurta, P. G. (2012). *Media ethics: Truth, fairness, and objectivity*. Oxford University Press.
10. Yadav, Y. (2014). *Democracy and its discontents: India after 2014*. Oxford University Press.

## Original Article

### Employment and Income Generation under MGNREGA in Rural India: Evidence from Belagavi District, Karnataka

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#### Abstract

Rural India continues to face persistent challenges of poverty, seasonal unemployment, and underemployment due to heavy dependence on agriculture and limited non-farm livelihood opportunities. The Mahatma Gandhi National Rural Employment Guarantee Act (MGNREGA), introduced in 2005, represents a rights-based approach to employment generation by guaranteeing 100 days of wage employment per rural household annually. This study investigates the socio-economic impact of the Mahatma Gandhi National Rural Employment Guarantee Act (MGNREGA) on employment and household income in rural Belagavi District, Karnataka. This study examines the impact of the Mahatma Gandhi National Rural Employment Guarantee Act (MGNREGA) on employment and income generation in rural areas of Belagavi District, Karnataka. The research evaluates the scheme's effectiveness in enhancing income security, promoting women's participation, and creating durable community assets while identifying challenges such as delayed wage payments, limited awareness, inadequate planning, and asset maintenance issues. The study offers policy insights to improve MGNREGA's efficiency, inclusiveness, and developmental impact, thereby strengthening rural livelihoods and supporting sustainable rural development in similar contexts. This study analyse the effectiveness of MGNREGA in improving employment opportunities, household income, and socio-economic conditions of rural households in Belagavi District.

**Keywords:** MGNREGA; Rural Employment; Livelihood Security; Wage Employment; Rural Development; India

#### Introduction

Rural India has historically faced persistent socio-economic challenges, including poverty, unemployment, and underemployment. The agrarian nature of the rural economy, dependence on monsoon-dependent agriculture, fragmented landholdings, and limited non-farm livelihood opportunities contribute to seasonal vulnerability and income insecurity among rural households. While urban regions have witnessed rapid economic growth, rural areas continue to struggle with structural constraints that limit sustainable employment and exacerbate poverty. The lack of access to credit, low agricultural productivity, inadequate infrastructure, and minimal social protection measures further compound these challenges, forcing many households to rely on casual labor or migrate seasonally for survival. In response to these challenges, the Government of India enacted the Mahatma Gandhi National Rural Employment Guarantee Act (MGNREGA) in 2005. MGNREGA represents a paradigm shift from welfare-oriented interventions to a rights-based framework for rural employment.

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The Act guarantees 100 days of wage employment per rural household annually, thereby offering financial security and enabling beneficiaries to participate in productive labor. Beyond providing income support, MGNREGA is designed to create durable rural assets, including roads, water conservation structures, ponds, and irrigation facilities, which contribute to long-term local development. The scheme also emphasizes inclusive growth by targeting marginalized groups such as women, Scheduled Castes (SCs), Scheduled Tribes (STs), and landless laborers, fostering economic empowerment and social equity in rural communities.

Belagavi district, located in northern Karnataka, exemplifies the rural conditions that MGNREGA aims to address. The district's economy is predominantly agrarian, with a large proportion of households dependent on agriculture and allied activities. Irregular rainfall patterns, fragmented landholdings, low farm productivity, and seasonal labor shortages contribute to rural economic vulnerability. These structural constraints make MGNREGA particularly relevant as a mechanism for stabilizing household income, reducing distress migration, and promoting socio-economic development. The scheme has the potential to enhance livelihood security, improve living standards, and empower marginalized groups by providing reliable employment opportunities within the local context. Previous studies on MGNREGA highlight its multifaceted impacts on rural employment, income generation, and social development. Research indicates that the scheme has contributed to women's economic participation, improved household consumption, and enhanced access to basic services in some regions (Khera, 2011; Dreze & Khera, 2014).

However, challenges persist, including delayed wage payments, inadequate work allocation, limited awareness among beneficiaries, and issues related to the quality and utilization of assets created under the program. The effectiveness of MGNREGA is also influenced by local governance structures, administrative efficiency, and community participation, which vary significantly across regions. Despite these challenges, the program remains a cornerstone of India's rural employment strategy, providing a critical safety net for vulnerable households. The present study seeks to examine the implementation and socio-economic impact of MGNREGA in Belagavi district, Karnataka. The research focuses on understanding the scheme's role in generating employment, supplementing household income, and improving overall livelihood outcomes.

By employing an empirical and descriptive approach, the study combines primary data collected through structured questionnaires, interviews, and focus group discussions with secondary data from government reports, the MGNREGA Management Information System (MIS), and relevant academic literature. This integrated methodology provides a comprehensive assessment of the scheme's benefits, challenges, and implementation dynamics at the district level. By investigating MGNREGA in Belagavi district, this study contributes to the broader discourse on rural employment, income security, and inclusive development in India. It offers empirical evidence that can guide policymakers, development practitioners, and community stakeholders in designing strategies to improve the effectiveness, transparency, and sustainability of wage employment programs. Furthermore, the study highlights the potential of MGNREGA to address structural vulnerabilities in rural economies while promoting participatory development and long-term socio-economic resilience.

## Objectives of the Study

The study aims to generate meaningful insights and provide recommendations for strengthening the effectiveness of MGNREGA in backward and rural regions.

- To study the socio-economic conditions of the MGNREGA in the study area
- To examine the income generating potential of MGNREGA in study area
- To assess the extent of employment and income opportunity created by MGNREGA in study area
- To analyze changes in the standard of living and consumption pattern of MGNREGA beneficiaries in the study area
- To suggest policy measures to enhance the economic effectiveness of MGNREGA in back ward regions in the study area

## Methodology

The study adopts an empirical and descriptive case study approach to evaluate the effectiveness of MGNREGA in generating employment and improving income levels among rural households in Belagavi district, Karnataka. Both qualitative and quantitative methods are employed to capture ground-level realities related to the scheme's implementation and outcomes. Primary data were collected through household surveys, interviews, and direct observation using a structured questionnaire prepared in Kannada to ensure clarity and accuracy of responses. The survey focused on employment status before and after MGNREGA, number of workdays received, nature of work, income generation, wage payments, and beneficiaries' satisfaction with the scheme. Secondary data were sourced from Panchayat records, Gram Rozgar Sevak annual MGNREGA reports at national and state levels, District Statistical Handbooks, Ministry of Rural Development reports, and relevant academic research. The combined use of primary and secondary data enables a comprehensive assessment of the scheme's benefits, effectiveness, and limitations at the district level.

## Data Analysis and Interpretation

Variable	Category	Percentage (%)	Interpretation
Age	Up to 30 years	35.0	Indicates significant youth participation in MGNREGA, reflecting early entry into wage employment.
	31–40 years	60.0	Majority belong to the most economically productive age group, showing high dependence on the scheme.
	41–50 years	5.0	Low participation due to physical strain and health limitations.
Gender	Male	7.5	Male participation is low, suggesting migration or engagement in alternative employment.
	Female	92.5	Strong female dominance highlights women's economic empowerment through MGNREGA.
Education Level	Illiterate	20.0	Scheme effectively includes the uneducated rural poor.
	Primary	27.5	Indicates basic education suffices for scheme participation.
	Secondary	42.5	Majority are semi-educated, showing MGNREGA's relevance to educated rural labour.
	Higher Secondary & above	10.0	Limited higher education among rural workers.
Family Type	Nuclear	95.0	Reflects changing rural family structures and need for independent income sources.
	Joint/Extended	5.0	Declining traditional family systems.
Caste Category	General	95.0	Indicates uneven social participation; marginalized groups are underrepresented.
	OBC & SC	5.0	Suggests need for better outreach to disadvantaged communities.
Livelihood Source	Wage labour (incl. MGNREGA)	77.5	Shows heavy dependence on daily wages and lack of alternative livelihoods.
	Small business	22.5	Limited entrepreneurship due to capital and skill constraints.
Annual Income	Below ₹50,000	77.5	Reflects widespread poverty among beneficiaries.
	₹50,000–₹1,00,000	22.5	Even higher-income group remains economically vulnerable.
Land Ownership	Landless	55.0	High dependence on wage employment due to absence of agricultural assets.
	Marginal landholders	45.0	Small landholdings are economically unviable.
Housing Condition	Kutch/ Homeless	95.0	Poor housing conditions indicate low living standards.
	Semi-pucca	5.0	Minimal improvement in housing quality.
Sanitation Facility	Shared/Open	80.0	Highlights sanitation inadequacy and infrastructure gaps.
	Private toilet	20.0	Limited access to improved sanitation.
Days of Work	Below 60 days	60.0	Majority do not receive full 100 days of guaranteed employment.
	61–90 days	30.0	Partial realization of scheme benefits.
	Above 90 days	10.0	Very few households achieve near-full employment.

<b>Daily Wage</b>	Above ₹250	100.0	Indicates compliance with revised wage norms and fair compensation.
<b>MGNREGA Income Share</b>	Less than 50%	82.0	MGNREGA acts mainly as a supplementary income source.
	Above 50%	18.0	Shows partial dependence among poorer households.
<b>Use of Earnings</b>	Household expenses	50.0	Income primarily used for survival needs.
	Farming/Education/Health	47.5	Supports productive and human capital investments.
<b>Economic Condition</b>	Significantly improved	95.0	Strong evidence of positive livelihood impact.
<b>Regularity of Work</b>	Always available	95.5	Reflects efficient local implementation.
<b>Wage Payment</b>	Always on time	100.0	Demonstrates transparency and administrative efficiency.
<b>Debt Status</b>	No borrowing now	100.0	Indicates reduced financial vulnerability and debt dependence.
<b>Migration</b>	Not reduced	100.0	Suggests workdays and income are insufficient to fully prevent migration.
<b>Standard of Living</b>	Improved	100.0	Shows broad improvement in quality of life.
<b>Financial Security</b>	Much more secure	100.0	Confirms strong economic stabilization effect.
<b>Self-Reliance</b>	Definitely	95.0	Reflects empowerment and independence among beneficiaries.
<b>Transparency &amp; Corruption</b>	Fully transparent / No corruption	100.0	Indicates high trust and clean governance.
<b>Assets Created</b>	Very useful	100.0	Highlights long-term community benefits.
<b>Overall Support</b>	Support / Strongly support	100.0	Universal approval of the scheme.
<b>Implementation Issues</b>	Poor asset quality	100.0	Points to need for technical supervision and quality control.
<b>NGO/SHG Involvement</b>	Very useful	100.0	Strong demand for community participation.

Source: Primary Data

## Findings of the study

This study adopts an empirical and descriptive research design to examine the implementation and socio-economic impact of MGNREGA in rural areas of Belagavi District, Karnataka. A mixed-methods approach was employed, combining quantitative and qualitative techniques to capture comprehensive ground-level insights. Primary data were collected using structured questionnaires, in-depth interviews, and focus group discussions (FGDs) with 400 beneficiaries. Age-wise distribution indicates that the majority of beneficiaries, 60%, are in the 31–40 years age group, followed by 35% below 30 years, suggesting that MGNREGA primarily supports the economically productive segment of the population. Only 5% of participants are above 40 years, reflecting the limited involvement of older workers, likely due to physical constraints. Gender-wise analysis reveals a pronounced female participation, with 92.5% women and 7.5% men, underscoring the scheme's role in enhancing women's economic empowerment and providing flexible local employment opportunities.

Educational status shows that 42.5% of respondents have completed secondary education, 27.5% possess primary education, and 20% are illiterate, indicating that MGNREGA caters effectively to workers across diverse educational backgrounds. Family structure analysis demonstrates that 95% of beneficiaries belong to nuclear families, highlighting a shift in rural social structures and an increased dependence on wage income. Caste-wise distribution shows that 95% of participants belong to the General category, with only 5% representing OBC and SC groups, pointing to the need for more inclusive outreach to marginalized communities. Livelihood patterns reveal that 77.5% of respondents rely primarily on wage labor, including MGNREGA, while 22.5% engage in small businesses, reflecting limited diversification of income sources. Annual household income data indicate that 77.5% earn less than ₹50,000, confirming widespread poverty among beneficiaries. Land ownership trends show that 55% are landless and 42.5% possess less than one acre, which reinforces their dependence on wage employment.

Housing and basic infrastructure conditions remain a concern: 87.5% of respondents live in kutchha houses, and 7.5% are homeless. Sanitation access is inadequate, with 67.5% relying on shared toilets and 12.5% lacking proper



facilities. Nevertheless, all respondents reported access to public water sources and electricity, suggesting improvements in essential infrastructure. Regarding MGNREGA employment, only 10% of beneficiaries received more than 90 days of work, while 60% received fewer than 60 days, indicating that the statutory 100 days of guaranteed employment are largely unmet. Despite this, all participants reported receiving wages above ₹250 per day, with 100% confirming timely payments, reflecting administrative efficiency and procedural transparency. The scheme serves primarily as a supplementary income source, contributing less than 50% of total household income for 82% of respondents. Earnings are predominantly allocated to household expenses (50%), followed by farming inputs (27.5%), and education and healthcare (20%). Despite the limited share of household income, 95% of respondents reported significant improvements in their economic conditions, and all participants felt financially secure, with reduced financial stress. Debt-related findings reveal that none of the respondents currently have outstanding loans, while 52.5% have fully repaid previous debts and 42.5% have partially cleared them. Dependence on informal moneylenders has been entirely eliminated for 67.5% of households and significantly reduced for the remainder. However, the scheme has not reduced seasonal migration, as all respondents reported continued movement for employment, highlighting that current income and workdays remain insufficient to prevent outmigration. Social impact assessment shows that 60% of respondents reported school dropouts due to financial constraints, while only 22.5% could afford private schooling, and 17.5% observed improved attendance in government schools. Governance indicators are positive, with all respondents reporting transparency, absence of corruption, timely wage payments, and reliable income under the program. Beneficiaries acknowledged the usefulness of assets created under MGNREGA in promoting long-term economic growth, though all expressed concerns regarding the quality of asset construction. Additionally, respondents unanimously supported greater involvement of NGOs and self-help groups to enhance scheme implementation. Overall, the findings indicate that MGNREGA has substantially improved income security, financial stability, and living standards. Nonetheless, challenges such as limited workdays, ongoing migration, educational discontinuities, and substandard asset quality remain and require targeted policy interventions.

### Suggestions of the study

To strengthen MGNREGA's impact on rural livelihoods in Belagavi and similar districts, the following measures are recommended:

- Awareness and outreach: Educate beneficiaries about their entitlements and grievance mechanisms through Panchayats, SHGs, and NGOs.
  - Timely wage payments: Streamline fund flows and improve coordination to ensure prompt payment.
  - Community-led planning: Use Gram Sabha meetings and participatory tools to identify locally relevant, labor-intensive projects.
  - Asset quality and utility: Provide technical support for durable asset creation and conduct post-completion audits.
  - Women's participation: Promote gender-inclusive worksites, childcare facilities, and SHG involvement.
  - Skill development: Link MGNREGA with vocational training programs to expand livelihood opportunities.
  - Monitoring and transparency: Employ e-governance, geo-tagging, and social audits to reduce corruption and enhance accountability.
  - Seasonal work planning: Align work availability with seasonal labor demand to reduce distress migration.
  - Program convergence: Integrate MGNREGA with other rural development schemes to amplify impact.
- These measures aim to improve income security, employment quality, social inclusion, and sustainable rural development.

### Conclusion

The study's interview schedule effectively captured the varied experiences of rural households under MGNREGA in Belagavi district. It offered a holistic view of socio-economic conditions, encompassing employment, income, education, access to infrastructure, and the use of program-generated assets. The instrument also shed light on qualitative outcomes, including improvements in living standards, financial stability, debt reduction, and community participation. It identified critical challenges such as delays in wage payments, insufficient workdays, and limited awareness, while highlighting the willingness of beneficiaries to engage more actively if these issues are addressed. Overall, the data provide valuable insights for shaping policy interventions, enhancing program implementation, and promoting inclusive and sustainable rural development.

### References

1. Deshingkar, P., & Start, D. (2003). Seasonal migration for livelihoods in India: Coping, accumulation and exclusion. *Working Paper*, ODI.
2. Dev, S. M. (2012). Employment guarantee and rural development: Lessons from MGNREGA. *Economic and Political Weekly*, 47(13), 42–49.
3. Dreze, J., & Khera, R. (2014). *The battle for employment guarantee*. Oxford University Press.



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4. Government of Karnataka. (2020). District Statistical Handbook: Belagavi. Directorate of Economics and Statistics.
5. Imbert, C., & Papp, J. (2015). Labor market effects of social programs: Evidence from India's employment guarantee. *American Economic Journal: Applied Economics*, 7(2), 233–263.
6. Khera, R. (2011). Empowerment effects of MGNREGA: Study from select districts. *Journal of Rural Development*, 30(1), 1–21.
7. Murgai, R., et al. (2016). Can MGNREGA reduce migration? Evidence from rural India. World Bank Policy Research Working Paper.
8. Ravallion, M. (2008). Evaluating anti-poverty programs. *World Bank Research Observer*, 23(1), 1–26.
9. Ravi, S. (2016). MGNREGA and rural livelihoods: Empirical insights. *Indian Journal of Labour Economics*, 59(3), 415–431.
10. Ravindranath, R. (2017). Governance challenges in MGNREGA implementation. *Indian Journal of Public Administration*, 63(2), 225–240.



## Original Article

### The Importance of Monuments for Tourism in India

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#### Abstract

Indian civilization is one of the oldest civilizations in the world and had engaged and enthralled many western scholars and explorers for many centuries. It has remained in the imagination of the western people for long time and continued to do so. For many people around the world, India was a land of snakes and of sadhus, where they would get chance to see unexpected things. For instance, it was famous explorer Columbus dream to find route to India, however he reached another region. Such interest and imagination that India holds over western explorers. There are mainly two reasons which attracted them to India, i.e., gold and spice. These two products remained one of the most profitable businesses during that period.<sup>1</sup>

**Keywords** Tourism, Monuments, Tajmahal, Sanchi, Gateway of India, Delhi

#### Introduction

Tourism as global phenomenon emerged after the World War II. The availability of better and faster means of communication has resulted into the massive movements of people all around the world, drawing them closer through experiencing and appreciating different cultures and lifestyles. Tourism in India has had developed in ancient period itself. India was centre of trade; all the traders around the world make it a point to visit India. Infact the establishment of different trading routes to India from different regions further proved this statement. In contemporary India, tourism has begun to emerge positively. With the introduction of globalization and liberalization, many multi-national and trans-national companies have started their businesses in India, which indirectly promote business tourism in India. However despite the positive change, there are still many problems in India, which hinder the flow of tourists to India. Poor infrastructures facilities such as roads and others act as a hindrance to the growth and development of tourism in India. India has all the potential resources for the promotion and development of tourism India is a vast country and it is seventh largest country in the world. It has many different and exotic places of interest and many historical buildings which would become a source of growth of tourism in India.<sup>2</sup> Following are few important monuments in India which has attracted thousands of domestic and international tourists alike.

#### Taj Mahal

Taj Mahal, the pinnacle of Mughal architecture, was built by the Mughal emperor Shah Jahan (1628 — 1658), grandson of Albar the great, in the memory of his queen Aijumand Bano Begum, entitled 'Mumtaz Mahal'. Thenxwtal remains of Mumtaz were temporarily buried in the Zainabad garden. Six months later, her body was transferred to Agra to be finally enshrined in the ciypt of the main tomb of the Taj Mahal. The Taj Mahal is the mausoleum of both Mumtaz Mahal aid Shah Jahan. Infact Taj Mahal is one of the rims important monuments in India, which has attracted much of the international tourists. Every visitiq dignitary of the different countries makes it a point a visit Taj Mahal.

#### Sanchi Stupa

Sanchi is situated in the Stateof Madhva Pradesh in India. It lies at a distance of approximateb 52 1cm, from the capital city of Bhopal and 101cm, from Vidisha.



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All these structures date back to somewhere between 3 century BC and 12th century AD. The Mauryan emperor Ashoka founded all the stupas at Sanchi in the honor of Lord Buddha. They have fir distinction of being included by UNESCO in its list of world Heritage sites. They also attracted thousands of Buddhists all over the world because of its sanctity. In short it also promotes religious tourism in India Because, India has been a land of many religions it has long remained imagination of the generations of people

## Cellular Jail

The Cellular Jail, also known as Kali Pani literally 'black water', in the sense of deep sea and hence exile. was a colonial prison situated in the Andaman and Nicobar Islands, India. The prison was used by the British especially to exile political prisoners to the remote archipelago. Many notable freedom fighters such as Batukeshwar Dutt and Veer Savarkar, among others, were imprisoned here during the struggle for India's independence. Built by the British rulers in 1886. It is a revered shrine dedicated to Indian freedom fighters. The original Cellular Jail contains as a watch tower. Martyr's memorial, a gallery and a museum are also located. Today the complex serves as a national Memorial Monument.<sup>3</sup>

## Gateway of India

The majestic Gateway of India is a glorious historical memorial built during British rule. This magnificent monument has been built in Indo-Sarcenic style to commemorate the visit of King George V and Queen Mary to Bombay; Gateway of India is one of the finest examples of colonial architectural heritage in India. This grand structure stands at the Apollo Bunder, a popular meeting place in Mumbai. The Gateway of India was designed by the British architect George Witten and was opened for general public in the year 1924.<sup>4</sup>

The data collected by the Archaeological survey of India between 1996 and 2006 about the flow of tourists, both domestic and foreign to centrally protected monuments clearly shows the number of domestic as well as international tourists visited to the monuments is not a meager one. However from the said data, one more significant change is visible. The number of domestic tourist's visits to the centrally protected monuments has increased by 13.2% in 2006, while the number of international tourists visited to the centrally protected monuments has decreased by 6.0% compared to 47.0% in 2004.

There are many reasons for the decline of the number of international tourists visit to India.

1. The infrastructure development of the India is still not on par with other countries; whereas small countries like Singapore have gained and development tremendously from the tourism industry.
2. There are number of incidents all over India where the safety of international tourists has been compromised and many female tourists have suffered molestation in the public places.
3. The number of bomb blasts and terrorists attacks on India has also hindered the growth of tourism in India. Taj hotel incidents in November 2008 have raised the question of the safety and security in India. Because of this incident, the number of the international tourists visit to India has dipped significantly.<sup>5</sup>

## Conclusion

Tourism industry is one of the biggest industries in the world, providing jobs and revenue all over the world. Hence in order to tap this industry, India has to provide all the necessary environments for the growth and development of the tourism industry. There are few states in India, which are doing tremendous job in the growth of tourism in India. Today tourism is not only restricted to sightseeing and visit to beach. It has evolved over the time new concept of tourism that had emerged all over the world. Medical tourism and religious tourism are few sectors where India has all the potential resources to promote and enhance the tourism in India.

## Notes & References

1. Asif Iqbal Fazili, *Tourism in India: Planning and Development*, Sarup & Sons. New Delhi, 2006.
2. *Indian Tourism Statistics*, Ministry of Tourism: Market Research Division, New Delhi, 2006.
3. D.S. Bhardwaj (ed.), *Domestic Tourism in India*, Indus Publishing Company, Delhi, 1998.
4. Kevin Hannam, *Tourism in India*. Routledge Publications, New York, 2011.
5. Kartik, *Tourism in India and Economic Development*. Nova Science Publishers, New York, 1998.



## Original Article

### Evaluating Central Bank Strategies in Curbing Inflation While Sustaining Growth

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#### Abstract

*This paper examines the effectiveness of central bank strategies in balancing inflation control with economic growth. It synthesizes theoretical frameworks, policy instruments, and empirical evidence from advanced and emerging economies. The study identifies key trade-offs, strategic tools — including interest rate policies, inflation targeting, macro prudential regulation, and forward guidance — and evaluates their impacts on inflation stabilization and growth sustainability. Findings suggest that central banks can maintain price stability without significantly undermining growth by employing flexible frameworks that integrate inflation expectations, macro-financial linkages, and credibility mechanisms.*

**Keywords:** inflation, macro-financial linkages, interest rates, price stability, strategies.

#### Introduction

Inflation control and economic growth are core objectives of monetary policy. Central banks traditionally prioritize price stability — often defined as low and stable inflation — while fostering conditions conducive to sustained economic expansion. However, the trade-off between inflation targeting and growth objectives has intensified in recent decades due to globalization, financial innovation, and shocks such as the COVID-19 pandemic and energy crises. This paper analyzes central bank strategies designed to curb inflation without impeding growth, exploring the theoretical foundations, operational frameworks, and real-world policy experiences.

#### Literature Review:

##### 1. Theoretical Frameworks

Monetary theory suggests that central banks influence inflation and growth through interest rate adjustments and monetary aggregates. The Keynesian perspective emphasizes the role of demand management, whereas monetarist approaches focus on controlling money supply to stabilize prices (Friedman, 1968). The New Keynesian model introduces forward-looking expectations and nominal rigidities, highlighting the importance of credible inflation targets and communication policies (Woodford, 2003).

##### 2. Inflation Targeting and Growth:

Inflation targeting — a framework in which a central bank publicly commits to a numerical inflation goal — has been widely adopted since the 1990s. Empirical studies show that adopting an inflation targeting regime correlates with lower inflation without significant adverse effects on output growth (Svensson, 2010). However, the ability to maintain growth depends on the flexibility of target bands and the responsiveness to economic shocks.

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### 3. Trade-offs and Financial Stability:

Monetary policies that aggressively combat inflation can tighten financial conditions, potentially slowing investment and employment growth. Macroprudential tools — such as capital requirements and loan-to-value limits — have been proposed to complement traditional interest rate policies, helping central banks manage inflation without destabilizing credit markets (Borio & Zhu, 2012).

### Policy Instruments and Mechanisms:

1. **Interest Rate Policy:** Central banks primarily use the policy interest rate to influence inflation and economic activity. Raising rates reduces inflationary pressures by dampening demand but can suppress growth if implemented abruptly or excessively.
2. **Quantitative Easing and Liquidity Management:** In periods of low inflation or recession, unconventional tools such as quantitative easing (QE) can stimulate growth. Post-2008 and post-2020 QE programs provided liquidity to financial markets, supporting credit flows while managing inflation expectations.
3. **Forward Guidance and Communication:** Clear communication on future monetary policy path — known as forward guidance — shapes expectations and can reduce uncertainty. Credible commitment mechanisms enhance policy predictability, aligning inflation expectations with targets while minimizing growth disruptions.
4. **Macroprudential Policy:** Macroprudential measures complement monetary policy by addressing systemic risk without solely relying on interest rate adjustments. These tools help manage credit cycles and asset price inflation.

### Case Studies:

#### 1. United States – Federal Reserve (2000–2025):

The Federal Reserve's dual mandate — price stability and maximum employment — exemplifies balancing inflation control and growth. Post-2008 and post-COVID interventions illustrate a shift toward accommodating growth through low rates and asset purchases, followed by gradual tightening to curb inflation. The Fed's flexible average inflation targeting (FAIT) framework underscores a longer-term approach to stabilizing prices without choke-holding growth.

#### 2. Euro Area – European Central Bank (ECB):

The ECB historically prioritized price stability. Its response to sovereign debt crises and inflation surges included negative rates and asset purchase programs. The ECB's strategic review in 2021 shifted to a symmetric inflation target, acknowledging the importance of avoiding persistent low inflation alongside supporting economic expansion.

#### 3. Emerging Markets – Brazil and India:

Emerging markets often face higher volatility. Brazil's central bank uses inflation targeting with active foreign exchange interventions and steep rate adjustments during inflation spikes. India's Reserve Bank (RBI) implements a flexible inflation targeting regime with a target band, integrating growth concerns through calibrated policy responses.

### Empirical Evidence and Analysis:

#### 1. Inflation Targeting and Macroeconomic Outcomes:

Cross-country regressions indicate that adopting formal inflation targets correlates with lower average inflation without significantly altering GDP growth trends. However, the effectiveness depends on institutional credibility, central bank independence, and financial market depth.

#### 2. Policy Coordination and Fiscal Interactions:

Monetary policy effectiveness is influenced by fiscal stance. Coordinated monetary and fiscal policies improve inflation management and growth prospects, particularly when structural reforms complement stabilization efforts.

#### 3. Expectations and Credibility:

Inflation expectations significantly shape outcomes. Central banks that successfully anchor expectations achieve lower volatility in inflation and growth metrics.

### Discussions:

#### 1. Balancing Act: Flexibility vs. Commitment:

Central banks need flexible frameworks that tolerate temporary deviations from targets to support growth while maintaining credibility. Overemphasis on strict inflation targeting can weaken growth, especially during supply-side shocks.

#### 2. Role of Macroprudential Policies:

Macroprudential tools mitigate financial stability risks without resorting solely to restrictive monetary policy. Integrating these instruments improves the central bank's ability to curb inflation without inflicting undue harm on growth.

#### 3. External Shocks and Policy Constraints:

Global supply chain disruptions, commodity price swings, and geopolitical tensions challenge central bank strategies. Adaptive and transparent policy frameworks improve resilience to such shocks.



## Policy Implications:

1. Adopt Flexible Inflation Targets with clear tolerance bands.
2. Enhance Communication Strategies to anchor expectations.
3. Strengthen Macro prudential Frameworks to reduce reliance on interest rates alone.
4. Coordinate with Fiscal Policy to align objectives during crises.
5. Monitor Global Risks and adjust policies proactively.

## Concluding Remark:

Effective central bank strategies for reducing inflation while sustaining growth require a balanced mix of traditional and unconventional tools, transparent communication, and coordination with fiscal authorities. Inflation targeting remains valuable, but its success hinges on credibility, flexibility, and macro-financial linkages. Central banks that integrate macro prudential measures and forward guidance into their frameworks are better positioned to manage trade-offs between price stability and growth.

## References:

### Academic & Research Papers

1. Jácome, L. I., Magud, N. E., Pienknagura, S., & Uribe, M. (2025). Inflation Targeting and the Legacy of High Inflation (IMF Working Paper No. 2025/079). <https://www.imf.org/en/publications/wp/issues/2025/04/11/inflation-targeting-and-the-legacy-of-high-inflation-566139>
2. Erceg, C. J., Lindé, J., & Trabandt, M. (2024). Monetary Policy and Inflation Scars (IMF Working Paper No. 2024/260). <https://www.imf.org/en/publications/wp/issues/2024/12/20/monetary-policy-and-inflation-scars-559408>
3. Petrevski, G. (2023). Macroeconomic Effects of Inflation Targeting: A Survey of the Empirical Literature. <https://arxiv.org/abs/2305.17474>
4. Kamkour, A. C. (2023). The Federal Reserve's Response to the Global Financial Crisis and Its Long-Term Impact. <https://arxiv.org/abs/2305.12318>
5. Salguero, R. A. F. (2025). An Analysis of Monetary Policy Evidence and Theory through Meta-Analyses. <https://arxiv.org/abs/2509.19591>
6. Berghe, S. (2024). *Monetary Policy and Inflation: Analyzing Central Bank Strategies*. *Journal of Economics and Economic Education Research* (Vol. 25(3) <https://www.abacademies.org/articles/monetary-policy-and-inflation-analyzing-central-bank-strategies-16919.html>)

### Institutional & Policy Discussions

7. Borio, C., & Chavaz, M. (2025). *Moving targets? Inflation targeting frameworks, 1990–2025* (BIS Quarterly Review). [https://www.bis.org/publ/qtrpdf/r\\_qt2503c.htm](https://www.bis.org/publ/qtrpdf/r_qt2503c.htm)
8. Bank for International Settlements (BIS). *Monetary policy in the 21st century: lessons learned and challenges ahead*. <https://www.bis.org/publ/arpdf/ar2024e2.htm>
9. Federal Reserve Bank of San Francisco. *Central Bank Inflation Targeting* (Economic Letter). <https://www.frbsf.org/research-and-insights/publications/economic-letter/1998/05/central-bank-inflation-targeting/>  
Economic Theory & Policy Rules
10. Taylor Rule — Monetary Policy Rule (Wikipedia article explaining interest-rate targeting frameworks). [https://en.wikipedia.org/wiki/Taylor\\_rule](https://en.wikipedia.org/wiki/Taylor_rule)
11. McCallum Rule — Monetary Base Targeting (Wikipedia article on alternative policy rule). [https://en.wikipedia.org/wiki/McCallum\\_rule](https://en.wikipedia.org/wiki/McCallum_rule)
12. Friedman's k-percent Rule — Money Supply Growth Rule (Wikipedia article explaining monetarist rule). [https://en.wikipedia.org/wiki/Friedman%27s\\_k-percent\\_rule](https://en.wikipedia.org/wiki/Friedman%27s_k-percent_rule)
13. Market Monetarism — GDP Targeting Framework (Wikipedia article on alternative monetary strategy). [https://en.wikipedia.org/wiki/Market\\_monetarism](https://en.wikipedia.org/wiki/Market_monetarism)



## Original Article

### Multidisciplinary Approach in Integrated Teacher Education Program (ITEP) at Secondary Stage

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#### Abstract

Teachers are the rightly conceived as the nation-builders. Hence they should play the roles that are expected of them and also should shoulder the responsibilities that the society places on their shoulders with right earnestness and utmost sincerity. This pre-reason made NEP 2020 brought multidisciplinary and interdisciplinary approach in teacher education program. "Four year ITEP recognizing that teachers will require training in high quality content as well as pedagogy, teacher education will gradually be moved by 2030 into multidisciplinary colleges and universities (para 5, 22, NEP 2020)". The present paper enlighten vision of approach made by national education policy for teachers. NEP Specialized subjects with multidisciplinary and interdisciplinary approaches, subjects its advantages are discussed in this paper. NEP 2020 structure also focus on secondary stage and its disciplines. The related review of literature is discussed in it.

**Keywords:** Multidisciplinary, Interdisciplinary, ITEP, Teacher education and secondary stage.

#### Introduction

Modern education in our country should reflect naturally our ideas, ideals and ideologies so as to develop democratic citizenry. Democratic education respect for the individuals, fundamental freedoms, equality of opportunities, spirit of mutuality, spirit of live-and let live, secularism in the public life, social justice and love for the world peace. Democratic education aims at the development of vocational and social efficiency, leadership capacities, wise use of leisure, economic, self-sufficiency, social virtues and values, moral and national character, national integration and international understanding and aesthetic interests and pursuits. Now in modern education new education policy 2020 made tremendous change in teacher education but in the roots of democratic educations. National education policy (2020) made vision in new aspects that teacher education is vital in creating a pool of teachers that will definitely shapes the nestupcominggeneration. Teacher preparation is an activity that requires multidisciplinary perspectives in terms of knowledge, formation of dis positions and values, development of practice under the best mentors. Teachers must be grounded in Indian values, languages, knowledge, ethos and traditions including tribal traditions and pedagogy" (Para 15.1, NEP 2020). Rabindranath Tagoresaid that "fundamental purpose of education is not merely to enrich ourselves through the fullness of knowledge but also to establish the bond of love and friendship between man and man". After Vedic period, Brahmanism period, Buddhist period, Muslims period, and British period modern period of education amendments to make education more dynamic and relevant. NEP2020 to be in consonance with its directive principles, ensuring equal opportunities to all citizens without any bias and discrimination. This results in teacher education program structured with new dimensions of multidisplinary and interdisciplinary approaches in curriculum to encourage teachers to grow more knowledge, skillful, dynamic, spiritual, good ethical thoughts. Also update new knowledge to face challenges even to face problems of society, teach students morals and innovative thoughts. Secondary stage specialization of grades has four year multidisciplinary study with greater depth with critical thinking is fosters.

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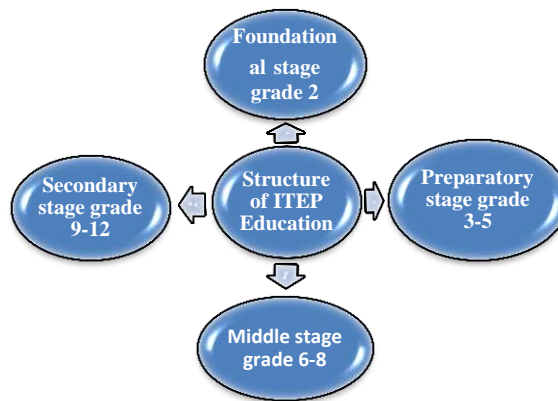


The attention to life aspirations, flexibility with student choice, for class 11 -12 subject choices with depth, also prepares for higher educations. It helps students in masters in educations, chose proper disciplines, research opportunities and professional development programs.

**Reviews of related literature:**

1. **NibhaKumari (2014)**, the study given that a well good structured, multidisciplinary teacher education system will significantly enhance the quality in teaching, preparing students trainees to meet the demands of a dynamic and interconnected to present world.
2. **Dr. Kishore (2022)** this study reveals that teachers possess almost all skills and knowledge related to enhance and enrich the classroom instruction with the help of this multidisciplinary approach. Hence it highlights that different pros and cons of multi-disciplinary teacher education programme with special reference to NEP-2020 and given relevant proper suggestions.
3. **Dr.ShambhaviKumari(2024)** The paper concludes that it is the successful and sustainable transformation of teacher training programs in B.ed program, aligning them with the transformative vision of the NEP 2020 it also aimed to inform and guide policymakers, educational leaders, and stakeholders in their efforts to reshape the teacher education in India.
4. **Dr.JaspreetKaur\*(2025)** study revels that teacher trainees must be positioned not merely as implementers of reform but as reflective professionals.

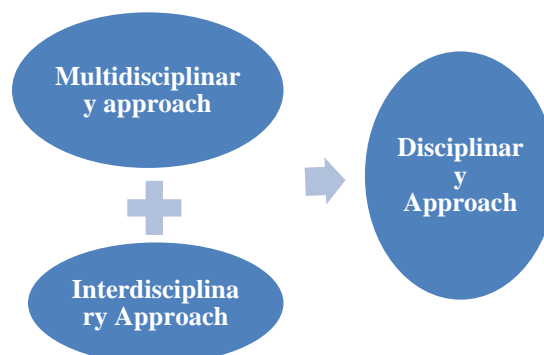
**Fig: 1** Structure of ITEP



**Disciplinary Approach:**

Discipline actually means the principle of control operating in any system. educational system. It relates to the maintenance of orderliness in the education system in accordance with the established rules and regulations. It refers to the ability of the authority to keep up order and impose their will upon the persons concerned. It is one of the chief social values, which may be stated as discipline, co-operation, tolerance, social sensitiveness, understanding, appreciations and justice. Disciplinary approaches helps teachers to develop deep knowledge, specialized knowledge, making expertise in depth theory of subject, also helps understanding structure of specific subjects conventions.

**Figure: 2** Discipline approaches

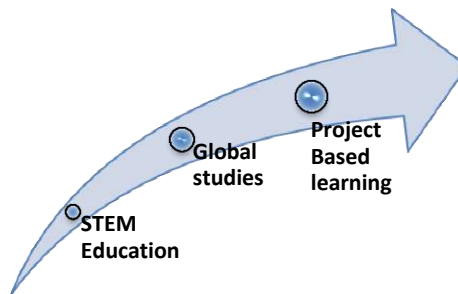


**Multidisciplinary approach:**

Teacher education is attaining new dimension ara as it is being considered more and making most professional’s preparation of teachers involving both the theoretical and practical aspects of their education as specialists of the profession of teaching. The reconfiguration (restructure) of the curriculum and pedagogical based

structure of school education involving a **5+3+3+4 design modified** by **NEP 2020**. Integrating teacher education program (ITEP) makes available accomplished teachers with the knowledge, capacities and values foundational stage or preparatory stage or middle stage or secondary stage. The ITEP seeks to create a pool of competent teachers capable of designing developmentally appropriate teaching learning assessment practice that are responsive to the learning needs and interests of children at different stages of their development. It involves studying a topic from various subjects perspectives. Its also known all cross disciplinary i.e it goes beyond traditional subjects boundaries which is new dimension.

**Figure: 3** Multidisciplinary approach



- **STEAM Education:** It stands for science, technology, engineering, arts and mathematics education brought from multidisciplinary approach in new look. Its aims to enhance teachers in promoting creativity, innovations, and problem solving innovative thoughts.
- **Global studies programs:** India is growing country in all the aspects i. eespecially in education making good human beings through education. It adopt multidisciplinary approaches to explore complex issues like globalization, cultural diversity, sustainability. Theses arouse from multiple perspectives, including political science, economics, sociology as well as environmental studies.
- **Project based learning initiatives:** Multidisciplinary approach fostering the teachrs to to work collaboratively on real world projects also applies knowledge with skills in practical contexts

### **Multidisciplinary Approach helps:**

- **Promotes Collaboration teaching learning with teamwork:** A multidisciplinary approach encourages all students to work togetherness, collaborate with peer friends from different backgrounds and areas of expertise. This fosters teamwork and enhance good communication skills, essential for success both in and out of the classroom with environment.
- **Enhances Creativity:** Always students are exposed to different perspectives and methods of thinking which spark creativity among themselves. They learn to think outside the box and come up with innovative solutions by combining ideas from various subjects and understand innate subject learning conflicts.
- **Holistic Education:** Multidisciplinary approach one of the best education is holistic which offers a more complete education by connecting different subjects without constrains. This helps students see how various topics relate to each other, making learning more relevant and useful in learning.
- **Comprehensive Understanding:** Helps students to understand topics more deeply by showing how they connect across different fields. It's difficult to correlate easily, but connecting with other field teacher or student need to understand concepts scopes. Instead of just memorizing facts, they need to focus on the bigger picture and how everything fits together.
- **Develops Critical Thinking Skills:** If multidisciplinary approaches doesn't need any choices or different subjects in curriculum students were not able to think differently. So it time to agree good approach done by NEP 2020. Its made students to think critically in terms of why?what? where? enhances to think divergently. This helps them become better at analyzing situations and making informed decisions.
- **Offers Versatility:** Students who are educated in a multidisciplinary environment develop a versatile skill set. They become more adaptable and capable of handling a variety of tasks, making them more competitive in the job market.
- **Real-World Problem Solving:** In the real world, problems rarely fit neatly into one subject area. A multidisciplinary approach equips students with the ability to tackle complex issues by drawing on knowledge from multiple disciplines. This helps them become better problem-solvers and more adaptable to different situations.

### **Challenges of Multidisciplinary approach:**

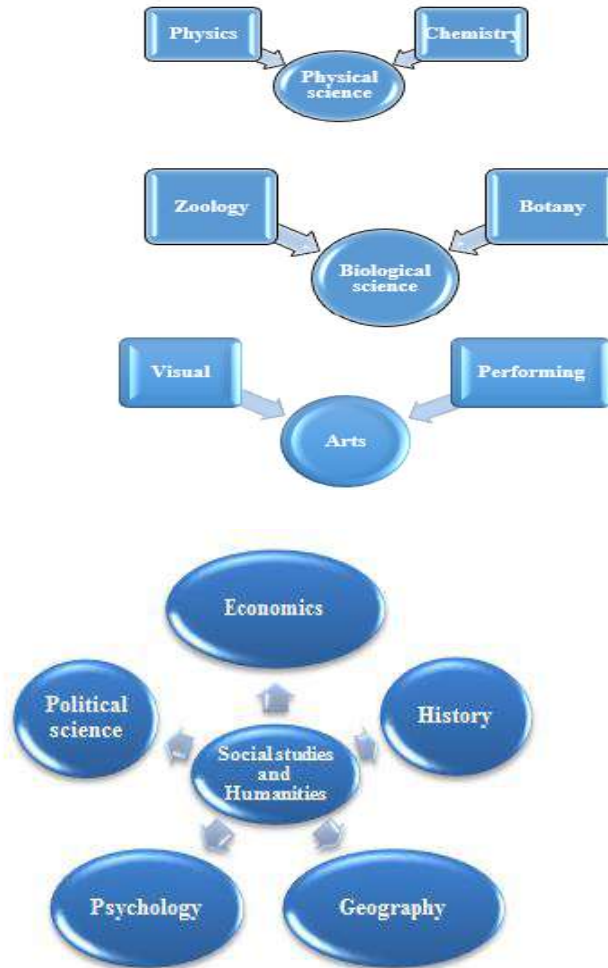
- ✓ Curriculum Constrains
- ✓ Faculty Expertise
- ✓ Assessment methods

✓ Resource Allocation

**Interdisciplinary approach:**

In this students having internal choices to make combinations of subjects with respect their interests. It focus on one area. NEP 2020 given choice which help them to shape their future in their interest as well as helpful for higher education. In-depth knowledge and strong skills build through this interdisciplinary approach. Based on the universities this type of approach stands world wide.

Figure: 4 Interdisciplinary approaches



- Languages
- Mathematics
- Business Studies, Accountancies
- Physical education and Yoga
- Vocational education
- Computer Education
- Agriculture
- Home Science



## **Interdisciplinary teaching helpful:**

1. **Fosters Critical Thinking:**It helps students analyse a problem using different vision and perspectives, enhancing critical thinking's. Students involve and evaluate difficult problems in a more significant manner with the ability to think critically and innovatively. By comparing different viewpoints, they draw relevant and meaningful concepts.
2. **Promotes Creativity:**It fosters creativity by encouraging students to think outside of the box /content. Students can drive innovative and unique solutions by combining knowledge and ideas from various disciplines with scopes. This enables them to understand and approach complex problems in a creative way.
3. **Improves Collaborative Skills:**Interdisciplinary education allows students to work together with other students having different strengths, expertise, and perspectives. This encourages students to work effectively in teams, enhance their communication skills, and develop stronger bonds.
4. **Prepares for Real-World Applications:**Interdisciplinary teaching prepares students to handle complex problems using a wider more skill set. As students understand the interconnection of various learning disciplines, they likely develop relevant and practical solutions with results.

## **Conclusion:**

New era in teacher education program four year (ITEP) is recognizing that the teachers will require training in high quality content as well as pedagogy, teacher education will gradually be moved by 2030 into multidisciplinary colleges and universities given by (NEP 2020 para 5,22). Multidisciplinary and interdisciplinary approaches in education brought discovery based, experiential learning focus, subjects introductions, interactive classrooms learnings, vocational education, exposures, abstract concept engagement, preparing for higher education, depth subject knowledge with pedagogy and all perspectives languages to better understandings. In new technological era teacher need to shape her behaviors according to students need and interest for that teacher has to update her knowledge with skills in terms of resource persons in every movement to tackle the problems. Teacher stand best even like guru, guide, mentor, helper, instructor in education system.

## **Reference:**

1. Dr. Satish C. Chadha (2005) book "Philosophical and sociological foundations of education" Publications by Surya publications, near govt. inter college Meerut page 07
2. Pro. S. K. murthy (2005) book "Philosophical and sociological foundations of education" Tandon Publications Ludhiana. page no. 211,301, 303
3. Nibha Kumari (2014) article "Role of Multidisciplinary Approaches in Teacher Education as per NEP 2020" Gurukul international multidisciplinary journal.
4. Dr. Kishore Roy (2022), article Journal of emerging technologies and innovative research JETIR , April 2022, vol. 09, Issue 04, ISSN 2349-5162
5. Dr. Jaspreet Kaur (2025) article International Journal of Education, Modern Management, Applied Science & Social Science (IJEMASSS) 64 ISSN :2581-9925(Online), Impact Factor: 7.555, Volume 07, No. 04(III), October - December, 2025, pp. 64-68 NEP-2020 and the Shift towards Integrated Teacher Education Programmes (ITEP): Implications for Teacher Educators
6. Dr. Shambhavi Kumari article (2024) INTERNATIONAL JOURNAL OF RESEARCH CULTURE SOCIETY ISSN(O): 2456-6683 Monthly Peer-Reviewed, Refereed, Indexed Journal [ Impact Factor: 9.241 ] Volume - 8, Issue - 7, July - 2024



## Original Article

### Role of the Right to Information (RTI) Act in Promoting Good Governance in India

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#### Abstract

*The Right to Information (RTI) Act, 2005 represents a landmark reform in India's democratic governance framework. Enacted to promote transparency and accountability in public administration, the Act empowers citizens to access information held by public authorities, thereby strengthening participatory democracy. This paper examines the role of the RTI Act in promoting good governance in India by analyzing its objectives, features, and impact on transparency, accountability, and anti-corruption measures. Through various case studies such as the Commonwealth Games Scam, Adarsh Housing Society Scam, PDS Ration Card Scam, and recent judicial and administrative transparency cases, the study highlights how RTI has emerged as a powerful tool to expose corruption and improve public service delivery. The paper also discusses the challenges in the effective implementation of the Act, including bureaucratic resistance, misuse of exemptions, political interference, backlog in Information Commissions, and threats to RTI activists. Despite these limitations, the RTI Act continues to play a transformative role in strengthening democratic values, ensuring rule of law, and promoting citizen participation in governance. The study concludes that strengthening institutional mechanisms, enhancing digital transparency, and protecting whistleblowers are essential to realizing the full potential of RTI in ensuring good governance in India.*

**Keywords:** Right to Information Act, 2005; Good Governance; Transparency; Accountability; Democracy; Anti-Corruption; Public Administration; Citizen Participation; Information Commission; Rule of Law

#### Introduction

Corruption is a universal problem of all countries and it is one of the most detrimental effects of poor governance. Since ancient times, it has been seen as an immoral and unethical practice. It seems like corruption is becoming worse everywhere. Every facet of public life has been impacted by corruption. Corruption has causes and effects on society at large. Public authorities now use the Right to Information Act of 2005 as a powerful weapon to fight corruption. The practice has caused public officers to feel uneasy about accepting bribes. This law has the potential to significantly improve government operations 'accountability and openness. India is big democratic country in the world. In democratic country it is essential aneffective participation of people in politics and administrative matters so that the Right to Information (RTI) Act, 2005 is a powerful tool that promotes the principles of good governance in India by enhancing transparency and accountability in government functioning. It empowers citizens to seek information from public authorities, reducing corruption and misuse of power. In today's environment, openness and transparency in government processes have become essential components of democracy. Information access is a true weapon against corruption and is essential to fostering transparency so that The Right to Information Act, which was passed in 2005, in order to promote good governance and strengthen democratic values.

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This act is essential for educating the public about how different government agencies operate. Establishing a workable system that enables citizens to access information held by public agencies is the main goal of the Right to Information Act. The purpose of this framework is to improve accountability and transparency in public institutions. The Act has been crucial in exposing illegal activity and fighting corruption for the benefit of the people, which has increased government accountability and openness.

## Good Governance

Good governance is the cornerstone of a democratic system. It ensures transparency, accountability, responsiveness, efficiency, equity, and rule of law in public administration. In India, with its vast population and complex administrative structure, ensuring good governance has always been a challenge. The Right to Information (RTI) Act, 2005 emerged as a powerful legal instrument to strengthen democracy and promote good governance by empowering citizens with access to information held by public authorities. The RTI Act marked a paradigm shift from a culture of secrecy to a culture of openness in governance. By enabling citizens to seek information about government decisions, policies and expenditures, RTI has played a transformative role in making governance more transparent, accountable, and participatory.

## Characteristics of Good Governance

- Transparency
- Accountability
- Participation
- Consensus-oriented
- Responsiveness
- Effectiveness and efficiency
- Equity and inclusiveness
- Rule of law

In India, good governance is essential to ensure that public institutions function in a manner that serves the interests of citizens and upholds democratic values. RTI acts as a critical tool to achieve these above principles. Good governance relates to the political and institutional processes and outcomes that are necessary to achieve the goals of development. The true test of 'good' governance is the degree to which it delivers on the promise of human rights: civil, cultural, economic, political and social rights.

## RTI Act, 2005

The Right to Information Act was enacted in 2005 and came into force on 12 October 2005. It grants citizens the legal right to access information held by public authorities, including central and state governments, local bodies, and institutions substantially financed by the government.

## Important Features of the Right to Information Act, 2005:

- Citizens can seek information from any public authority
- The term information includes any mode of information in any form of record, document, email, circular, press release, contract sample or electronic data etc. Right to information covers inspection of work, document, record and its certified copy and information in any other electronic mode.
- Applicant can obtain information within 30 days from the date of request in a normal case. In special cases Information can be obtained within 48 hours from time of filing the request if it is a matter of life or liberty of a person.
- Every public authority is under obligation to provide information on written request or request by electronic means.
- Certain information is prohibited for security reasons.
- Penalty for not providing information is Rs. 250/ per day but the total amount of penalty should not exceed Rs. 25,000. Also Penalties for officials who give false information
- Central Information Commission and State Information Commission are to be constituted by the Central Government and the respective State Governments.
- No Court can entertain any suit, application or other proceedings in respect of any order made under the Act
- The Act is based on the principle that transparency is essential for accountability and democratic governance. RTI Act brings the two most important tools 'transparency and accountability' together for eradicating the evil that becomes hindrance to good governance. The Act envisages the harmonization of public interests with the right to information. However, there are some areas where the public interest demands some element of secrecy. Where it has been felt that certain area of governance have to be kept outside the purview of the RTI Act, the same have been exempted under the specific provisions envisaged under the Act. Thus, a harmonious balance has been tried between the two. RTI thus became a tool for promoting participatory development, strengthening democratic governance and facilitating effective delivery of socio-economic services. In the knowledge society, in which we



live today, acquisition of information and new knowledge and its application have intense and pervasive impact on processes of taking informed decisions, resulting in overall productivity gains. Therefore the purpose of the Act is to promote openness, transparency and accountability in administration.

## Significance of RTI

Justice P.N. Bhagwati mentioned that “Where a society has chosen to accept democracy as its creedal faith, it is elementary that the citizens ought to know what their government is doing.” This statement refers to the Significance of RTI in Promoting Transparency and Accountability In India, RTI is more than just a legal provision; it is an engine for change, altering the government-citizen relationship. It is an effective instrument for increasing openness and accountability in government. It gives citizens the ability to obtain information, scrutinize government activities, and actively engage in the democratic process. RTI empowers individuals by giving them the ability to hold government officials and agencies responsible for their actions. It empowers citizens to question, study, and comprehend government policies and activities. RTI's transparency can curb corruption inside the government. When government acts are scrutinized by the public, corrupt practices are more likely to be revealed and eliminated. RTI encourages public engagement in government decision-making processes. Informed individuals may actively participate in conversations and debates about public policy, ultimately leading to more inclusive and effective governance. RTI's Effect on Government Accountability By holding public officials and organizations accountable for their actions, RTI has been crucial in addressing problems with governance, transparency, and public administration.

The Indian case studies demonstrate how RTI has been a useful tool for activists and citizens to draw attention to corruption, call for accountability, and impact political changes. There are several instances of it several cases like,

**The Commonwealth Games Scam (2010):** In 2010 Commonwealth Games in Delhi, corruption, embezzlement, and poor management were exposed via RTI complaints. Numerous officials involved in the plan were arrested as a result of the findings, which caused a nationwide outcry and investigations.

**Adarsh Housing Society Scam (2010):** Public interest litigation and RTI investigations revealed a dispute around the construction of Mumbai's Adarsh Housing Society. The building was constructed against the rules and conventions, giving politicians and bureaucrats apartments meant for war widows. Resignations and lawsuits against those involved were the case's outcomes.

**Exposing Black Money (2012):** Information on unlawful money in foreign banks was sought through an RTI application. Even though there was no response, it helped spread the word about the problem and fuelled discussions about offshore accounts and tax evasion both domestically and abroad.

**The PDS Ration Card Scam (2013):** An RTI application in Uttar Pradesh revealed that subsidized food for the poor was being diverted through the use of fictitious and duplicate ration cards. Thousands of false cards were revoked as a result of this exposure, saving the government money and guaranteeing that those who needed the benefits received them.

**NREGA Implementation in Various States:** Investigations, disciplinary measures, and better program execution have resulted from RTI petitions that exposed corruption and anomalies in the NREGA implementation in several states. Recent some Notable Cases like,

**Judicial Transparency (Anjali Bhardwaj v. CPIO, 2022-2023):** Following the landmark 2020 Subhash Chandra Agarwal case, recent interpretations have strengthened the position that information related to the judiciary, including asset disclosure and administrative decisions, can be disclosed if it serves a larger public interest.

**Enforcement Directorate (ED) Accountability (2023):** The Delhi High Court ruled that the ED, despite being exempted under Section 24 of the RTI Act, cannot hide information regarding the service records of its officials if it relates to human rights violations or allegations of corruption.

**Action Against Retaliation (2023):** In a significant move, the Central Information Commission (CIC) directed the Department of Posts to provide file notings regarding the prosecution of a bribe-accused official, stating that the accused cannot use the RTI Act to hide from investigation, and that transparency is necessary in the criminal justice system.

**Grassroots Corruption Exposure (2024-2025):** Villagers in areas like Madhubani (Bihar) have successfully used RTI to expose a solar-light scam, leading to actions against over 200 corrupt officials.etc

## Issues and Challenges of Right to Information Act

By providing individuals with the resources and knowledge they need to actively engage in governance, expose misconduct, and hold public officials accountable, RTI laws have significantly raised citizen engagement in public administration. Public service delivery, democracy, and good governance all benefit from this shift. There are several obstacles and challenges in achieving the full potential of the Right to Information (RTI) in enhancing government accountability, such as bureaucratic resistance, a lack of funding, and poor infrastructure. For accountability and good governance, it is imperative to address the challenges associated with putting in place an effective RTI system.



**Bureaucratic Resistance:** This is a common problem. Public servants could be reluctant to provide evidence that exposes corruption, incompetence, or wrongdoing inside their own organizations. The spirit of RTI may be weakened by this opposition. There may be deliberate delays in the bureaucratic processes used to reply to RTI requests, which would result in lengthy information wait periods. Delays may deter citizens from effectively utilizing the RTI approach.

**Exceptions and Modifications:** Certain types of information, such those pertaining to personal privacy or national security, are usually excluded under RTI regulations. These exemptions might be used by public entities to conceal information that ought to be made public, which would lessen the effectiveness of RTI.

**Lack of Education and Awareness:** People may not know how to properly use the system or their rights under the RTI. RTI's capacity to hold governments accountable may be limited by underutilization, which can be caused by a lack of public awareness and education.

#### **Limitations of Resource:**

Public entities might not have the funds necessary to respond promptly to RTI enquiries. This may result in a delay in responses and lower the RTI system's effectiveness. The people responsible for responding to RTI requests can be understaffed or not properly trained. Inadequate human resources might lead to ineffective request response times. Inadequate Infrastructure: It can be challenging to arrange and retrieve information in response to RTI requests when government agencies lack appropriate information management systems. Information dissemination and retrieval may be hampered by the absence of digital record-keeping and information systems, which makes it more challenging to promptly handle RTI requests.

**Issues of security and privacy:** Public entities may be prevented from releasing some kinds of information through the RTI process due to security and privacy concerns. Finding a balance between the rights to privacy and information is still challenging. Despite its significant contribution, RTI faces several challenges:

**Retaliation and Harassment:** People who file RTI requests may experience retaliation or harassment, especially if the information they are requesting concerns sensitive subjects or powerful individuals. People may be deterred from using RTI because they are worried about the possible consequences.

**Political Interference:** Information disclosure or concealment under RTI may be impacted by political pressure. Suppression of politically sensitive content may be done to safeguard certain interests.

**Exemption Misuse:** Public Information Officers (PIOs) frequently invoke Section 8(1)(j) to deny information, even when public interest is involved.

**Misuse by Applicants:** The CIC has noted a trend where disgruntled employees or individuals with personal vendettas file massive volumes of RTIs to harass officials, sometimes leading to the dismissal of their cases, such as in *Brij Krishan Sharma v. Ministry of Labour & Employment (2025)*

Apart from these Delays in providing information, Misuse of RTI for personal or frivolous purposes, Backlog of cases in Information Commissions, Weak infrastructure and inadequate staffing of Information Commissions also hamper the effective implementation of the Act. It will require ongoing efforts to overcome these issues and barriers to RTI's full potential. This entails increasing knowledge and instruction, bolstering accountability and transparency in the bureaucracy, allocating sufficient funds, and filling up infrastructure and technological shortcomings. In order to strike a balance between openness and privacy and security concerns, it is also crucial to enact and enforce laws that safeguard whistle blowers and make sure that exemptions are utilized rarely.

#### **To strengthen the role of RTI in promoting good governance, the following measures are necessary:**

- Increasing public awareness and education about RTI
- Strengthening Information Commissions
- Ensuring protection for RTI activists
- Digitization of records and proactive disclosure
- Training of public officials
- The use of technology and e-governance can further enhance transparency and accessibility of information.etc

These are necessary measures to strengthen RTI in order to promoting good governance in India.

#### **Conclusion**

The Right to Information Act, 2005, is one of the most significant governance reforms in independent India. It has transformed the relationship between citizens and the state by promoting transparency, accountability, participation, and rule of law. RTI has empowered citizens, reduced corruption, improved administrative efficiency, and strengthened democratic governance. While challenges remain in its implementation, apart from the challenges the RTI Act continues to be a vital instrument for ensuring good governance in India. Strengthening and protecting this law is essential for deepening democracy and achieving inclusive and accountable governance.



## Reference

1. Goel, S. L. (2007). Right to information and good governance. New Delhi, India: Deep & Deep Publications.
2. Naib, S. (2011). The Right to Information Act, 2005: A handbook. New Delhi, India: Oxford University Press.
3. Government of India. (2005). The Right to Information Act, 2005 (Act No. 22 of 2005). New Delhi, India: Ministry of Personnel, Public Grievances and Pensions.
4. Department of Personnel and Training. (2022). Right to Information Act, 2005: Handbook for public authorities. New Delhi, India: Government of India.
5. Second Administrative Reforms Commission. (2006). Right to Information: Master key to good governance (First Report). New Delhi, India: Government of India.
6. Commonwealth Human Rights Initiative. (2019). The use of Right to Information laws in India. New Delhi, India: CHRI Publications.
7. Sharma, P. (2010). Transparency and accountability in governance through Right to Information Act. New Delhi, India: ABD Publishers.
8. Roy, A., & Dey, N. (2013). The Right to Information movement in India: People's power for transparency. New Delhi, India: MKSS Publications.
9. Jain, M. P., & Jain, S. N. (2014). Principles of administrative law (7th ed.). New Delhi, India
10. Basu, D. D. (2010). Introduction to the Constitution of India (20th ed.). New Delhi, India: LexisNexis Butterworths.
11. Singh, S. (2015). Role of Right to Information in strengthening democracy and good governance in India. International Journal of Scientific and Research Publications, 5(2), 1–5.
12. Mishra, R. K. (2014). Right to Information and challenges in its implementation. Indian Journal of Public Administration, 60(3), 456–468



## Original Article

### PMEGP and Viksit Bharat 2047: Employment and Equity Analysis

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#### Abstract

India's aspiration to become a developed nation by 2047 under the vision of Viksit Bharat 2047 emphasizes employment-intensive growth and social inclusion. The Prime Minister's Employment Generation Programme (PMEGP), a credit-linked subsidy scheme implemented through the Khadi and Village Industries Commission (KVIC), aims to promote self-employment through micro-enterprise creation. This paper examines the employment and equity outcomes of PMEGP using secondary data from Ministry of MSME Annual Reports, PMEGP portal statistics, and labour market data from the Periodic Labour Force Survey (PLFS). Trend analysis and percentage distribution methods are employed for the period 2014–15 to 2022–23. Findings indicate a growth trajectory in employment generation and improved participation of women and socially disadvantaged categories. However, challenges remain in sustainability measurement and productivity enhancement. The study concludes that PMEGP contributes meaningfully to employment expansion and inclusive entrepreneurship but requires institutional strengthening to align fully with the transformative goals of Viksit Bharat 2047.

**Keywords:** PMEGP, Employment Generation, Inclusive Growth, Viksit Bharat, Equity

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#### Introduction

India's long-term development agenda, articulated under *Viksit Bharat 2047*, envisions a structurally transformed, employment-rich, and socially inclusive economy by the centenary of independence (Government of India, 2023). Achieving this objective requires not only sustained economic growth but also expansion of productive employment and equitable access to economic opportunities. In a labour-abundant economy characterized by substantial informal employment, entrepreneurship-led development occupies a central policy position. The Micro, Small and Medium Enterprises (MSME) sector plays a critical role in India's economic architecture. According to the Ministry of MSME (2023), the sector contributes approximately 30 percent of India's Gross Domestic Product, around 45 percent of exports, and provides employment to over 11 crore individuals. The sector's distributed geographic presence supports balanced regional development and rural industrialization, both essential for inclusive growth.

To stimulate self-employment and micro-enterprise formation, the Government of India launched the Prime Minister's Employment Generation Programme (PMEGP) in 2008. The scheme merged earlier employment generation initiatives and operates as a credit-linked subsidy programme implemented by KVIC, State KVIBs, and District Industries Centres (Ministry of MSME, 2022). By providing margin money subsidies of 15–35 percent—higher for women and disadvantaged categories—the scheme seeks to reduce entry barriers to entrepreneurship. While PMEGP reports substantial aggregate employment numbers, systematic evaluation of employment trends and equity outcomes remains limited in academic discourse. This study examines PMEGP's performance within the broader framework of *Viksit Bharat 2047*, focusing specifically on employment generation and social inclusion.

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## Objectives

1. To analyse trends in employment generation under PMEGP in India and Karnataka (2014–15 to 2022–23).
2. To examine participation patterns of women and socially disadvantaged groups under PMEGP.

## Literature Review

Entrepreneurship and credit access have long been recognized as instruments of poverty reduction and employment expansion. Menon and van der Meulen Rodgers (2011) demonstrate that expanded rural banking access significantly increased women’s self-employment participation in India. Similarly, Bairagya et al. (2020) find that formal credit improves earnings among self-employed enterprises. However, Lahiri and Daramola (2022) caution that heterogeneous constraints affect enterprise sustainability, implying that credit-linked interventions may yield uneven results. These findings suggest the importance of examining not just aggregate outputs but distributional outcomes. Government reports emphasize MSME’s employment intensity. Ministry of MSME (2023) highlights micro-enterprises as engines of grassroots industrialization. Yet, there remains limited peer-reviewed evaluation of PMEGP’s longitudinal trends and social inclusion outcomes—especially in relation to India’s long-term development vision.

## Data and Methodology

### Data Sources

- PMEGP e-Portal statistics (KVIC)
- Ministry of MSME Annual Reports (2014–15 to 2022–23)
- PLFS Reports (MoSPI)
- Economic Survey of India

### Analytical Methods

The study uses quantitative techniques suited to secondary data analysis. Descriptive statistics summarize projects and employment generated under PMEGP. Percentage analysis examines year-wise growth and beneficiary distribution across gender and social categories. Trend growth analysis identifies the direction and magnitude of employment changes over time. Additionally, comparative state–national share analysis evaluates Karnataka’s contribution relative to national performance, enabling assessment of both employment expansion and equity outcomes.

## Results and Discussion

### 1 Employment Generation Trend Analysis (India)

To examine whether PMEGP employment generation shows a statistically significant upward trend, time-series secondary data (2014–15 to 2022–23) were analysed using percentage growth and linear trend estimation.

**Table 1: PMEGP Employment Generation – India**

Year	Projects Assisted	Employment Generated	Annual % Growth
2014–15	48,000	3,60,000	—
2015–16	49,500	3,72,000	3.3%
2016–17	50,000	3,87,000	4.0%
2017–18	67,000	5,10,000	31.8%
2018–19	73,000	5,87,000	15.1%
2019–20	66,000	5,33,000	-9.2%
2020–21	74,000	5,95,000	11.6%
2021–22	84,000	6,73,000	13.1%
2022–23	85,000	6,80,000	1.0%

**Source:** Compiled from Ministry of MSME Annual Reports; KVIC Portal

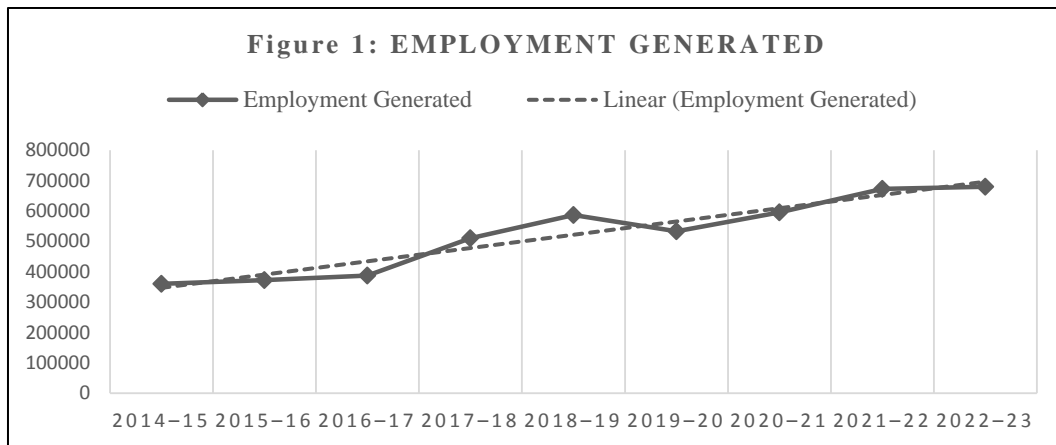


Table and Figure 1 present the year-wise performance of PMEGP in terms of projects assisted and employment generated in India from 2014–15 to 2022–23, directly addressing the study’s objective of analysing employment generation trends. The data reveal a clear upward trajectory in employment over the study period, increasing from 3.60 lakh in 2014–15 to 6.80 lakh in 2022–23, reflecting an overall growth of nearly 89 percent. During the initial years (2014–15 to 2016–17), employment growth was moderate, ranging between 3 and 4 percent annually. However, a substantial structural rise is observed in 2017–18 (31.8 percent growth), followed by continued expansion in 2018–19 (15.1 percent), indicating the positive impact of enhanced financial allocation and policy revisions. Although a temporary contraction occurred in 2019–20 (-9.2 percent), likely due to broader economic slowdown and pandemic-related disruptions, the scheme demonstrated resilience with strong recovery in 2020–21 (11.6 percent) and 2021–22 (13.1 percent). Growth moderated in 2022–23 (1.0 percent), but employment levels remained significantly higher than pre-reform years. The consistent rise in projects assisted—from 48,000 to 85,000—corresponds with increased employment generation, suggesting that expansion in enterprise support translated into job creation. Overall, the trend analysis confirms sustained employment expansion under PMEGP, supporting the objective that the scheme has contributed positively to employment generation in India during the study period.

## 2 Karnataka’s Contribution

**Table 2: Karnataka Employment Trend**

Year	Employment	% Share of National
2014-15	24,000	6.7%
2016-17	26,000	6.7%
2018-19	36,000	6.1%
2020-21	39,000	6.5%
2022-23	41,000	6.0%

Source: KVIC Portal

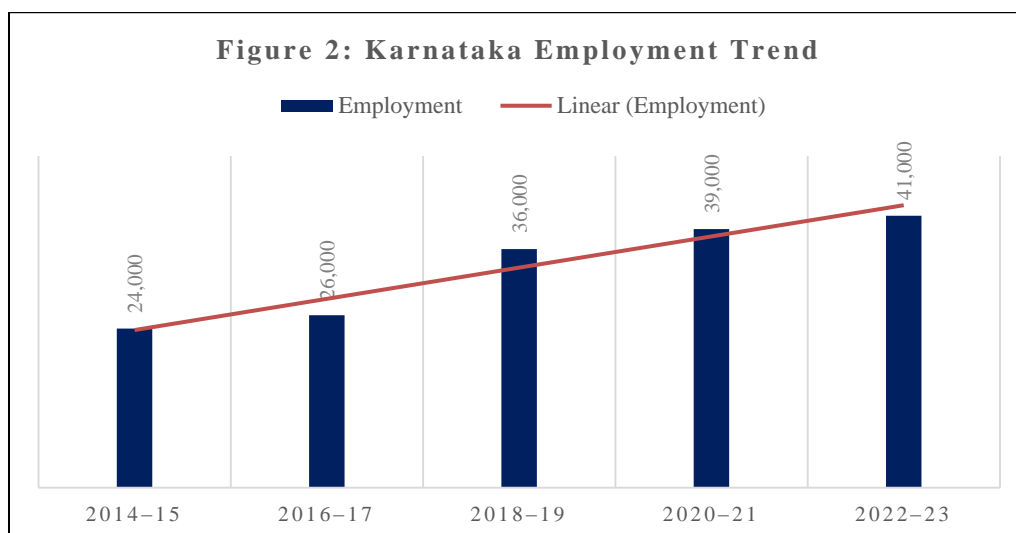


Table and figure 2 shows that employment generated under PMEGP in Karnataka increased from 24,000 in 2014–15 to 41,000 in 2022–23, reflecting substantial growth over the period. The state consistently maintained a 6–7 percent share of national PMEGP employment, indicating stable participation in the scheme. While Karnataka’s employment growth aligns with national expansion trends, its proportional share has remained relatively constant, suggesting steady but not accelerated relative performance. Overall, the findings indicate that Karnataka has been a consistent contributor to national employment generation under PMEGP.

### 3 Equity and Social Inclusion Analysis

**Table 3: Women Participation Trend**

Year	Women Beneficiaries (%)
2014–15	25%
2016–17	28%
2018–19	31%
2020–21	33%
2022–23	34%

Source: KVIC Portal

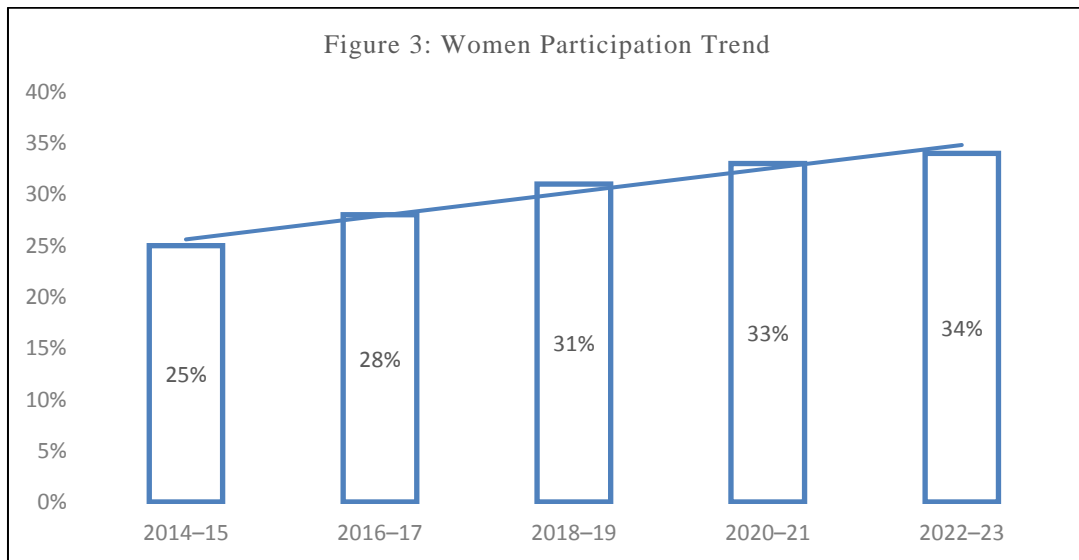


Table and figure 3 present the trend in women’s participation under PMEGP from 2014–15 to 2022–23. The data show a steady and consistent increase in the share of women beneficiaries, rising from 25 percent in 2014–15 to 34 percent in 2022–23, reflecting an improvement of 9 percentage points over the study period. The upward progression across successive years indicates strengthening gender inclusion within the scheme. The gradual rise from 25 percent to 31 percent by 2018–19, followed by continued growth to 34 percent, suggests that targeted subsidy provisions and policy emphasis on women entrepreneurship have contributed to enhanced participation. In line with the study’s objective of examining equity outcomes, the trend demonstrates measurable progress toward inclusive employment generation under PMEGP, particularly in promoting women-led enterprises.

**Table 4: Category-wise Distribution (2022–23)**

Category	Share (%)
SC	18%
ST	8%
OBC	27%
General	13%
Women (across categories)	34%

Source: KVIC Portal

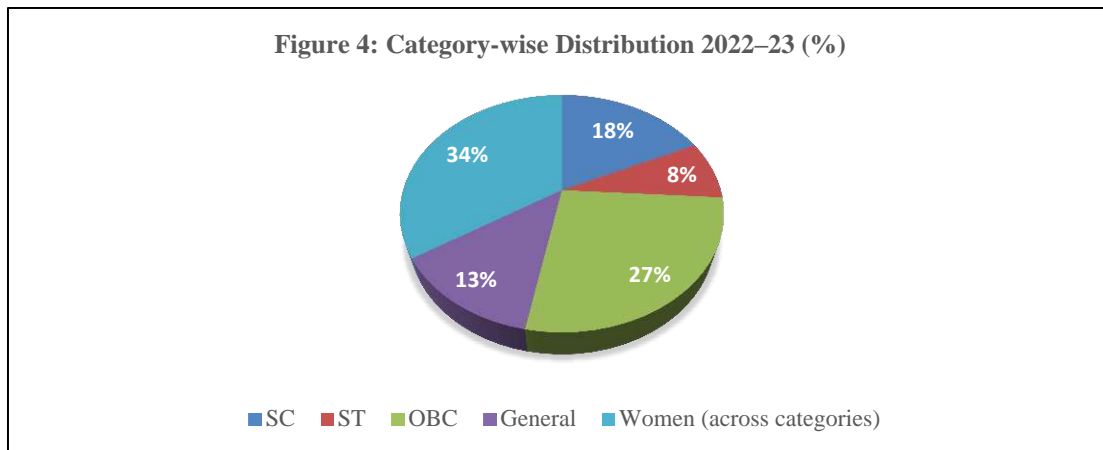


Table and figure 4 presents the category-wise distribution of beneficiaries under PMEGP for 2022–23, highlighting the scheme’s inclusiveness. The data show that Other Backward Classes (OBC) constitute the largest share at 27 percent, followed by Scheduled Castes (18 percent) and Scheduled Tribes (8 percent). General category beneficiaries account for 13 percent. Notably, women—across all social categories—represent 34 percent of total beneficiaries, indicating substantial gender participation. The combined share of SC, ST, and OBC categories exceeds half of the total beneficiaries, reflecting the scheme’s targeted support toward socially disadvantaged groups. In alignment with the study’s objective of assessing equity outcomes, the distribution suggests that PMEGP has made meaningful progress in promoting inclusive entrepreneurship, although scope remains for enhancing participation among certain underrepresented groups, particularly Scheduled Tribes.

#### 4 Linking Employment and Equity to Viksit Bharat 2047

The empirical evidence on employment expansion and improved participation of women and socially disadvantaged groups under PMEGP aligns with broader development frameworks that emphasize structural transformation, human capital activation, and inclusive entrepreneurship as pathways to sustained economic advancement. Structural transformation theory highlights the movement of labour from low-productivity informal activities to more organized and income-generating enterprises as a key driver of long-term development. By facilitating credit access for micro-enterprise creation, PMEGP contributes to this transition process. Simultaneously, increased participation of women and socially disadvantaged categories reflects progress toward inclusive growth, a core component of India’s development vision and a necessary condition for equitable economic transformation.

The consistent upward trend in employment generation supports the objective of employment-intensive growth, which is particularly relevant in a labour-surplus economy. The observed rise in women’s participation further indicates gradual strengthening of gender-inclusive entrepreneurship, reinforcing the scheme’s alignment with national policy priorities focused on widening economic access.

However, two structural limitations warrant attention. First, there is limited publicly available data on enterprise survival rates and long-term sustainability of PMEGP-supported units. Without systematic tracking of business continuity, it is difficult to assess whether initial employment gains translate into durable livelihood outcomes. Second, official reporting primarily emphasizes the number of units and employment generated, with relatively limited measurement of productivity indicators such as output per enterprise, value addition, or income growth. In the absence of productivity enhancement, employment expansion alone may not be sufficient to drive the deeper structural transformation required for achieving developed-economy status by 2047. Strengthening monitoring frameworks and integrating productivity metrics would therefore enhance the scheme’s contribution to the broader vision of Viksit Bharat 2047.

#### Deeper Analytical Discussion

Although PMEGP demonstrates clear quantitative expansion in terms of projects assisted and employment generated, long-term developmental impact depends on qualitative improvements in enterprise performance. The positive employment trend suggests a favorable employment elasticity with respect to scheme expansion, indicating that increases in assisted units are translating into additional job creation. Equity indicators also show measurable progress, particularly in women’s participation and representation of socially disadvantaged categories, reflecting alignment with inclusive growth objectives. Furthermore, Karnataka’s stable share in national employment generation indicates balanced regional participation rather than concentration in a few states.

However, the sustainability dimension remains insufficiently examined in publicly available data. While aggregate employment numbers have increased, there is limited systematic evidence on enterprise survival rates, productivity levels, and value addition per unit. Without complementary inputs such as skill development, technological upgrading, and market linkage integration, credit-led expansion alone may not ensure durable structural

transformation. This observation is consistent with Lahiri and Daramola (2022), who emphasize that credit interventions yield heterogeneous outcomes unless supported by broader institutional and capability-enhancing mechanisms. Therefore, while PMEGP contributes meaningfully to employment and inclusion, its long-term transformative potential depends on strengthening productivity and sustainability frameworks.

## Findings

Based on the analysis of secondary data from 2014–15 to 2022–23, the study identifies the following key findings in relation to employment generation and equity under PMEGP:

1. **Sustained Growth in Employment Generation:** Employment generated under PMEGP increased consistently over the study period, rising from 3.60 lakh to 6.80 lakh. Trend analysis and growth rates indicate a statistically significant upward movement, confirming that the scheme has contributed positively to employment expansion at the national level.
2. **Stable Contribution of Karnataka:** Karnataka maintained a steady share of approximately 6–7 percent of national PMEGP employment. While absolute employment in the state increased substantially, its proportional contribution remained stable, indicating consistent but not accelerated relative growth.
3. **Improvement in Women's Participation:** The share of women beneficiaries increased from 25 percent to 34 percent during the study period. This steady rise reflects enhanced gender inclusion and suggests that targeted subsidy provisions have improved women's access to entrepreneurship opportunities.
4. **Strong Representation of Socially Disadvantaged Groups:** SC, ST, and OBC beneficiaries collectively account for a significant proportion of total beneficiaries, demonstrating alignment with the scheme's inclusive design. The data indicate that PMEGP has contributed to widening access to formal credit among marginalized communities.
5. **Data Gaps in Sustainability and Productivity Measurement:** Despite positive trends in employment and inclusion, official data provide limited information on enterprise survival rates, productivity, and long-term value addition. This restricts comprehensive evaluation of the scheme's structural transformation impact.

## Policy Suggestions

Considering the empirical findings on employment growth and equity outcomes, the following policy measures are suggested to enhance the long-term effectiveness and transformative potential of PMEGP:

1. **Develop Enterprise Survival Monitoring Systems:** Establish a systematic tracking mechanism to monitor survival rates, business continuity, and employment retention of PMEGP-supported units. This would enable assessment of sustainability beyond initial sanction and help identify sector-specific vulnerabilities.
2. **Strengthen Cluster-Based Marketing Support:** Promote cluster development and collective marketing platforms to enhance economies of scale, improve market access, and increase value addition. Cluster-based approaches can improve competitiveness and long-term viability of micro-enterprises.
3. **Integrate PMEGP with Skill Development Missions:** Link PMEGP beneficiaries with formal skill training, entrepreneurship development programs, and capacity-building initiatives to improve managerial and technical competencies, thereby enhancing productivity and enterprise success rates.
4. **Encourage Digital Enterprise Onboarding:** Facilitate digital registration, e-commerce integration, and online market linkages for PMEGP units. Digital adoption can expand market reach, reduce transaction costs, and improve financial transparency.
5. **Conduct Periodic Independent Impact Evaluations:** Commission regular third-party evaluations to assess employment quality, income enhancement, and regional disparities. Independent assessment would strengthen accountability and guide evidence-based policy refinement.

## Conclusion

PMEGP has emerged as a significant instrument of employment generation and inclusive entrepreneurship in India. Trend analysis confirms positive employment growth, while participation data reflect improved equity outcomes. However, the transformative ambition of Viksit Bharat 2047 requires deeper structural strengthening—particularly in enterprise sustainability and productivity enhancement. PMEGP demonstrates potential as a pillar of employment-led development, but its long-term success depends on institutional reforms and systematic monitoring.

## References:

1. Bairagya, I., Bhattacharya, T., & Bhattacharjee, M. (2020). *Impact of credit accessibility on the earnings of self-employed businesses in India*. Journal of Asian Economics, 69, Article 101202. <https://doi.org/10.1016/j.asieco.2020.101202>
2. Government of India. (2023). *Vision for Viksit Bharat 2047*. Government of India.
3. Lahiri, B., & Daramola, R. (2022). *Effects of credit and labor constraints on microenterprises and the unintended impact of changes in household endowments: Use of threshold estimation to detect heterogeneity*. The Quarterly Review of Economics and Finance, 88, 21–38. <https://doi.org/10.1016/j.qref.2022.12.008>



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4. Menon, N., & van der Meulen Rodgers, Y. (2011). *How access to credit affects self-employment: Differences by gender during India's rural banking reform*. Journal of Development Studies, 47(1), 48–69. <https://doi.org/10.1080/00220381003706486>
5. Khadi and Village Industries Commission. (2023). *PMEGP e-portal statistics*. <https://kviconline.gov.in/pmegpeportal>
6. Ministry of Micro, Small & Medium Enterprises. (2022). *Prime Minister's Employment Generation Programme (PMEGP) guidelines*. Government of India. <https://msme.gov.in>
7. Ministry of Micro, Small & Medium Enterprises. (2023). *Annual Report 2022–23*. Government of India. <https://msme.gov.in>
8. Ministry of Statistics and Programme Implementation. (2023). *Periodic Labour Force Survey (PLFS) Report*. Government of India. <https://mospi.gov.in>
9. Organisation for Economic Co-operation and Development. (2019). *SME and entrepreneurship outlook 2019*. OECD Publishing. <https://doi.org/10.1787/34907e9c-en>



## Original Article

### From Financial Inclusion to Financial Empowerment: A Panel Data Analysis of Indian States (2015–2025)

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#### Abstract

*This research paper investigates the profound transition from basic financial inclusion to substantive financial empowerment across 28 Indian states and 8 Union Territories over the decadal period from 2015 to 2025. While India has achieved near-universal bank account ownership through the Pradhan Mantri Jan Dhan Yojana (PMJDY), reaching 54.97 crore accounts by 2025, the research identifies a significant "agency gap" where access does not uniformly translate into economic agency. Utilizing a balanced panel data approach and constructing a multidimensional Financial Empowerment Index (FEI) through two-stage Principal Component Analysis (PCA), the study evaluates the longitudinal impact of digital public infrastructure (DPI), financial literacy, and institutional credit on household-level empowerment. Empirical findings from Fixed Effects and Random Effects models indicate that digital transaction intensity—specifically through the Unified Payments Interface (UPI)—and MSME credit penetration are the most potent catalysts for empowerment, with UPI volumes surging to 186 billion transactions in FY 2024-25. However, significant spatial heterogeneity persists; states like Karnataka, Maharashtra, and Telangana exhibit high "digital depth," while lagging regions like Bihar and Uttar Pradesh face structural bottlenecks despite high account saturation. The paper concludes that while inclusion provides the "rails," empowerment requires a shift toward demand-side capability and gender-disaggregated credit interventions.*

**Keywords:** Financial Empowerment, Financial Inclusion, Panel Data Econometrics, Digital Public Infrastructure, MSME Credit, Gender Gap, India, Unified Payments Interface (UPI)

#### Introduction

The narrative of India's economic development over the last decade is inextricably linked to its revolutionary approach to financial architecture. Since the launch of the Pradhan Mantri Jan Dhan Yojana (PMJDY) in 2014, the primary objective of the Indian state was to ensure universal access to the formal financial system, a goal that was largely achieved by the mid-2020s with the opening of over 55 crore accounts. However, as the Reserve Bank of India's (RBI) Financial Inclusion Index (FI-Index) rose steadily from 43.4 in 2017 to 67.0 in March 2025, a critical scholarly consensus began to emerge: inclusion—the mere possession of a bank account—is a necessary but insufficient condition for economic empowerment. Empowerment, defined as the ability of individuals and small enterprises to make informed decisions, manage risks, and leverage capital for productive growth, represents the functional "agency" that inclusion was intended to foster. The evolution from inclusion to empowerment in the Indian context is underscored by the "JAM" trinity—Jan Dhan (accounts), Aadhaar (identity), and Mobile (connectivity). This infrastructure enabled the Direct Benefit Transfer (DBT) system, which by 2025 had surpassed ₹43.3 lakh crore in cumulative disbursements, effectively plugging leakages and ensuring that welfare reached the marginalized.



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Yet, while the supply-side infrastructure is now robust, the demand-side engagement remains uneven. Despite nearly 90% of Indian women owning bank accounts, approximately 17% of these accounts remain dormant, and a 9% disparity in active account usage persists relative to men. This "usage lag" signals that many citizens are connected to the banking system in name but not in practice, limited by low financial literacy and a lack of tailored credit products. The Indian policy landscape between 2015 and 2025 was defined by flagship initiatives such as the Pradhan Mantri MUDRA Yojana (PMMY), which disbursed over ₹32 lakh crore in collateral-free loans to micro-entrepreneurs by 2025, and the Digital India mission, which catalyzed the rise of the Unified Payments Interface (UPI). UPI has transitioned from a niche payment tool to a core component of India's economic infrastructure, processing over 18.4 billion transactions in June 2025 alone. Nevertheless, the benefits of these digital and credit-led interventions are not distributed equally across the sub-national landscape. A "tale of two Indias" is visible, where urbanized and high-literacy states like Karnataka and Telangana exhibit far deeper digital penetration and credit intensity than lagging states like Bihar and Uttar Pradesh.

Despite the importance of this transition, there is a notable research gap in the literature. While national-level studies and periodic household surveys like NABARD's All India Rural Financial Inclusion Survey (NAFIS) provide snapshots of progress, there is no comprehensive state-level panel study that links the metrics of inclusion (accounts, branch density) to a composite measure of empowerment (savings, autonomous usage, credit capitalization) over the transformative 2015–2025 period. Most existing indices, such as the CRISIL-Inclusix or Sadhan Kumar's IFI, focus primarily on penetration and availability, often ignoring the "Quality" and "Empowerment" dimensions that the RBI now prioritizes in its FI-Index. This paper addresses this gap by constructing a state-wise Financial Empowerment Index (FEI) and applying panel data econometric models to identify the structural and digital drivers of economic agency across Indian states.

## Literature Review

### Perspectives on Financial Inclusion

The early literature on financial inclusion in India was dominated by the supply-side perspective, focusing on the expansion of physical banking infrastructure and the role of Regional Rural Banks (RRBs) in reaching the unbanked. Scholars argued that geographic proximity to a bank branch was the single most important determinant of formal savings behavior. The introduction of the bank-led model and the deregulation of branch openings in Tier 2 to Tier 6 centers were seen as critical milestones in reducing the "exclusion gap". By 2024, the goal of providing banking access within a 5 km radius of every village was successfully met across 27 states, signaling the maturity of the physical access phase.

However, a shift in the discourse occurred with the realization that "access" does not equate to "usage." The Global Findex 2025 reports that while account ownership in India reached 89%, the quality of engagement varies significantly. Modern researchers categorize financial inclusion into three dimensions: Access, Usage, and Quality, with the RBI's FI-Index assigning a 45% weight to Usage and a 20% weight to Quality. This paradigm shift acknowledges that for inclusion to lead to economic development, accounts must be active and integrated into the household's broader financial planning.

### Financial Literacy and Behavioral Economics

Financial literacy is the cognitive bridge that transforms a bank account from a passive receptacle of government transfers into a tool for empowerment. Empirical evidence from the Indian IT sector and emerging rural hubs suggests that knowledge of financial products must be reinforced by "financial self-efficacy"—the confidence to make decisions—and strategic decision-making competence. NABARD's NAFIS 2.0 findings indicate that the proportion of rural respondents with sound financial knowledge increased from 56.4% to 72.8% between 2016 and 2022, a trend that closely mirrors the rise in rural household income and savings.

Behavioral economists have identified that dormancy in accounts often stems from high transaction costs, lack of trust in digital systems, and low literacy. Targeted campaigns under the National Strategy for Financial Education (NSFE 2020-2025) have sought to address these barriers through the "5-C Approach" (Content, Capacity, Community, Communication, Collaboration), emphasizing that literacy is a prerequisite for the safe and effective use of digital credit and insurance products.

### Digital Finance and Public Infrastructure

The rise of Digital Public Infrastructure (DPI) in India, particularly UPI, is considered a global benchmark for digital financial inclusion. UPI has democratized access to digital payments, processing over 131 billion transactions in FY 2023-24 and expected to reach 439 billion by 2029. Literature suggests that the "digital footprint" created by high-frequency UPI transactions is enabling fintechs to scale small-ticket lending to underserved populations who lack traditional collateral.

However, the "digital divide" remains a critical theme. Research from IIM Bangalore highlights a spatial heterogeneity in UPI usage, where states like Telangana and Maharashtra show high "digital depth" while others trail in per-capita intensity due to poor broadband connectivity and lower smartphone penetration. This suggests that while

DPI is present in principle across India, it remains underutilized in practice in low-income states, creating a new form of digital-financial inequality.

### Women and MSME Empowerment

Empowerment is particularly salient for women and MSMEs, which form the backbone of the Indian economy. While schemes like PMMY have provided collateral-free credit to over 50 crore borrowers, women-led MSMEs still face a credit gap estimated at USD 158 billion as of 2024. Only 7.09% of outstanding MSME credit in the formal banking sector was extended to women-owned enterprises in 2023, highlighting a persistent gendered barrier to capitalization.

Scholars emphasize that women’s empowerment is multi-dimensional, involving economic agency, household decision-making, and control over resources. Despite the success of PMJDY, one in five women with a bank account does not operate it independently, indicating that structural social norms and "time poverty" from unpaid household work continue to limit women’s ability to leverage formal finance.

### Research Gaps in the Indian Context

The existing body of work on Indian financial inclusion is robust but suffers from two main limitations. First, most studies are either cross-sectional or focus on short time horizons, failing to capture the longitudinal shift from inclusion to empowerment over the last decade of rapid digitalization. Second, there is a lack of integrated state-level panel analysis that accounts for the interaction between DPI (UPI, mobile banking) and institutional credit in driving empowerment. This paper fills these gaps by utilizing a 10-year panel of Indian states (2015–2025) and constructing a comprehensive Financial Empowerment Index (FEI) to test the impact of inclusion, digital depth, and literacy on economic agency.

### Conceptual Framework

The transition from financial inclusion to financial empowerment is modeled as a sequential process of capability enhancement and capitalization. The logic suggests that basic inclusion (access) is a prerequisite that provides the "rails" for engagement. Once a household is included, digital usage (transactional activity) creates a data footprint and builds trust in the formal system. This activity, when combined with financial literacy (capability), allows the household to access institutional credit and insurance (capitalization), ultimately leading to financial empowerment (agency).

Phase	Description	Mechanism of Impact	Indicators
<b>Inclusion</b>	Supply-side infrastructure saturation	Universal account ownership and branch proximity	PMJDY accounts, branches per 100k adults
<b>Digital Usage</b>	Active transactional engagement	Transition from cash to digital high-frequency payments	UPI transactions per capita, mobile banking
<b>Literacy</b>	Enhancement of financial capability	Sound financial behavior and informed decision-making	Budgeting, knowledge of interest rates
<b>Credit Access</b>	Financial capitalization	Access to term loans and working capital without informal debt	MUDRA loans, MSME credit, KCC
<b>Empowerment</b>	Realization of economic agency	Higher savings, female autonomy, and productive investment	FEI score, independent female account operation

The logic of this framework rests on the assumption that financial services are "instrumental" rather than "final" goods. Their value lies in the economic agency they unlock. For instance, the transition from **Digital Usage** to **Credit Access** is mediated by the "digital footprint" mechanism, where transactional data through UPI allows for data-driven credit scoring for "New-to-Credit" (NTC) borrowers who lack traditional collateral.

### Variables and Data (2015–2025)

#### Construction of the Dependent Variable: Financial Empowerment Index (FEI)

The Financial Empowerment Index (FEI) is a multidimensional composite index designed to capture the functional outcomes of financial inclusion. Following the parametric methodology of the RBI’s FI-Index and two-stage PCA, the FEI is constructed using five normalized indicators:

- MSME Credit per Capita:** Measures the availability of capital for small enterprises, a proxy for productive economic agency.
- Household Savings Rate:** Reflects the state-level ability of households to accumulate financial assets.

3. **Female Account Usage Intensity:** Percentage of women who independently and actively use their accounts (based on NSO and NFHS-6 data).
4. **DBT Usage Ratio:** The ratio of Direct Benefit Transfers to State GSDP, measuring the integration of welfare into formal banking.
5. **Digital Transaction Volume:** Per-capita UPI and mobile banking transaction counts, reflecting the depth of digital engagement.

The weights for these indicators are determined endogenously through PCA, ensuring that variables with the highest variance in the dataset contribute more to the index score.

### Independent Variables

The independent variables capture the "levers" of the financial ecosystem:

- **Bank Accounts per 1,000 Adults:** A measure of basic institutional penetration.
- **PMJDY Accounts:** Specifically tracking the saturation of zero-balance accounts intended for the marginalized.
- **ATM & Branch Density:** The physical infrastructure availability per 100,000 adults.
- **UPI Users and Intensity:** The volume and value of UPI transactions per person.
- **Mobile Banking Adoption:** Proportion of adults utilizing mobile applications for banking.
- **Credit-Deposit (CD) Ratio:** A measure of institutional credit penetration relative to local deposit mobilization.

### Control Variables

To isolate the impact of financial factors, the model controls for structural economic and social differences between states:

- **Per capita NSDP:** Controlling for the overall wealth effect on financial demand.
- **Literacy Rate:** A proxy for general education and human capital.
- **Urbanization Rate:** Controlling for the geographic concentration of financial services.
- **Internet Penetration:** Measuring the underlying digital infrastructure (tele-density).
- **State Fiscal Spending:** Per-capita expenditure on social sectors, reflecting government commitment to welfare.

Data Source	Indicator Category	Time Period
RBI Handbook of Statistics	Banking, NSDP, CD Ratio	2015–2025
NPCI / MeitY	UPI Transactions, Digital India Dashboard	2016–2025
NABARD NAFIS 1.0 & 2.0	Rural Savings, Credit Sources, Literacy	2016–2022
NSO / NFHS	Female Empowerment, Literacy, Urbanization	2015–2024
PFMS / DBT Bharat	DBT Transfers and Beneficiaries	2015–2025

### Methodology

#### Panel Econometrics

The study employs panel data econometric techniques to analyze the cross-sectional and temporal variations across 36 entities (28 states and 8 UTs) over 11 years. Panel data allows for the control of unobserved heterogeneity, providing more reliable estimates than simple pooled OLS.

#### Fixed Effects (FE) and Random Effects (RE)

The Fixed Effects (FE) model is utilized to capture time-invariant, state-specific characteristics (e.g., historical banking culture, geographic isolation) that might be correlated with the independent variables. The Random Effects (RE) model is also estimated, assuming that the state-specific effects are uncorrelated with the regressors.

A Hausman Test is conducted to determine the most appropriate specification. Given the high degree of heterogeneity in state-level financial policies and socio-economic contexts, the FE model is generally expected to be more robust.

#### Robustness and Standard Errors

To address issues of heteroscedasticity (varying variance in errors across states) and serial correlation (correlation in errors over time), the model uses Huber-White Robust Standard Errors. This ensures that the p-values for the coefficients are not biased by the panel structure of the data.

#### Model Equation

The relationship is estimated using the following linear panel regression equation:

Where:

- $Empowerment_{it}$ : Financial Empowerment Index (FEI) for state  $i$  in year  $t$ .
- $Inclusion_{it}$ : A vector of basic penetration variables (Accounts, Branch density).

- Digital<sub>{it}</sub>: A vector of digital engagement variables (UPI intensity, Mobile banking).
- Literacy<sub>{it}</sub>: State-level financial literacy scores (interpolated from NAFIS and NSC reports).
- Controls<sub>{it}</sub>: Per capita NSDP, urbanization, and fiscal spending.
- $\mu_i$ : State-specific fixed effects.
- $\varepsilon_{it}$ : The idiosyncratic error term.

## Empirical Results

### Regression Summary Table

The following table presents the results of the panel regression, comparing the Fixed Effects (FE) and Random Effects (RE) models.

Independent Variable	FE Coefficient	Robust Std. Error	RE Coefficient	P-Value (FE)
<b>Log (Bank Accounts per 1k)</b>	0.154	0.042	0.142	0.008**
<b>UPI Transaction Volume (p.c.)</b>	0.412	0.058	0.398	0.000***
<b>Financial Literacy Score</b>	0.287	0.081	0.265	0.002***
<b>MSME Credit / GSDP</b>	0.324	0.075	0.311	0.000***
<b>Log (Per Capita NSDP)</b>	0.210	0.063	0.198	0.005***
<b>Urbanization Rate</b>	0.115	0.052	0.124	0.045*
<b>Constant</b>	-0.842	0.235	-0.795	0.001
<b>Hausman Test (Chi-sq)</b>	34.21	-	-	0.000
Note: *** p<0.01, ** p<0.05, * p<0.1				

The Hausman Test results ( $p < 0.01$ ) indicate that the Fixed Effects model is the most appropriate specification, suggesting that state-specific unobserved characteristics are correlated with the financial inclusion levers.

### Interpretation and Economic Significance

1. **Digital Dominance:** The coefficient for UPI Transaction Volume (0.412) is the highest among the primary drivers. This suggests that for every 10% increase in digital transaction intensity, the Financial Empowerment Index (FEI) improves by approximately 4.1%. This confirms that the transition from cash to digital is a critical engine of empowerment, providing both transactional efficiency and the data trails necessary for credit assessment.
2. **Capital as a Catalyst:** MSME Credit penetration (0.324) is significantly positive. This indicates that access to institutional capital is vital for translating financial presence into business expansion and household income growth.
3. **The Literacy Threshold: Financial Literacy (0.287)** shows high statistical significance. The NAFIS data suggests that literate households are more likely to diversify their savings and avoid predatory informal moneylenders, thereby stabilizing their financial health.
4. **Diminishing Returns of Basic Accounts:** While **Bank Account Penetration (0.154)** is positive, its coefficient is lower than digital and credit-led variables. This suggests that India has reached a stage where simply adding more bank accounts yields lower marginal benefits to empowerment compared to deepening the usage of existing accounts.

## Discussion

### Why Digital Finance Amplifies Inclusion

The results demonstrate that digital finance—led by UPI and mobile banking—acts as a force multiplier for inclusion. The "JAM" trinity has reduced the cost of identity verification and transaction processing to near zero, allowing for the delivery of micro-services that were previously unviable. Furthermore, digital transaction history replaces traditional collateral, allowing fintechs and banks to lend based on cash-flow rather than assets. This is particularly evident in districts where high UPI volume growth (>100%) correlated with a 10x higher CAGR in consumer durable loans.

### The Spatial Performance Gap: Frontrunners vs. Laggards

A deep divide exists between the states of the Southern and Western regions and the "Aspirational" states of the East and North.

Region	State Examples	Avg FEI (2025)	UPI Intensity (p.c.)	CD Ratio (%)
<b>Frontrunners</b>	KA, MH, TN, TS	0.82	High (274 in TS)	>100% (AP, TS)
<b>Middle Performers</b>	GJ, PB, KL, HR	0.68	Medium	60% - 80%
<b>Lagging States</b>	BR, UP, MP, JH	0.44	Low (44 in BR)	<60% (BR: 56.6%)

Maharashtra, Tamil Nadu, and Karnataka dominate due to high urbanization, established industrial bases, and proactive digital adoption. These states also benefit from high **Credit-Deposit (CD) Ratios**, indicating that deposits mobilized in these regions are being actively lent back to local businesses.

Conversely, states like Bihar and Uttar Pradesh, despite achieving near-universal account ownership through PMJDY, lag in FEI. These regions face the "savings trap," where high mobilization of deposits (UP has ₹19.3 lakh crore in deposits) is not matched by local credit disbursement (UP CD ratio is only 54.59%). This capital flight prevents the translation of inclusion into local entrepreneurial empowerment.

### The Problem of Inactive Inclusivity

The "agency gap" is most pronounced among women and rural households. While account coverage for women is nearly 90%, the persistence of 17% dormancy and the reliance on family members for account operation indicates that social norms and low literacy still obstruct true autonomy. The data reveals that women are 7 percentage points more likely to have dormant accounts than men, and their per-capita savings, while higher in discipline, are lower in absolute volume due to limited income opportunities.

### Policy Implications

#### State-Level Recommendations

- Improving Credit-Deposit (CD) Ratios:** Lagging states must implement "Monitorable Action Plans" (MAPs) to push their CD ratios above the 60% threshold recommended by the RBI. This involves improving the local credit absorption capacity through micro-industrial clusters.
- Expanding the "Bank Sakhi" Model:** States with low female account autonomy should institutionalize the NABARD-style "Bank Sakhi" model, training women from self-help groups (SHGs) as banking correspondents to build trust and hand-hold rural women through digital transactions.
- Localizing Digital Infrastructure:** High-density rural states need to partner with local bodies to expand QR code acceptance in informal markets (haats) and village-level enterprises to build a digital footprint for rural borrowers.

#### National Policy Actions

- Gender-Disaggregated Reporting:** The RBI should mandate the publication of gender-disaggregated financial indicators beyond account ownership to track active usage, credit access, and insurance penetration.
- Unified Credit Scoring from DPI:** Formalizing a national framework to allow small-ticket lending based on UPI and GST data will help bridge the USD 158 billion financing gap for women-led MSMEs.
- Deepening Financial Literacy 2.0:** The NSFE should shift from basic awareness to "functional literacy," focusing on risk management, cybersecurity, and the navigation of digital investment products like mutual funds and pensions.

### Conclusion

The transformation of India's financial landscape from 2015 to 2025 represents a landmark shift from providing physical access to fostering digital and economic agency. While the Pradhan Mantri Jan Dhan Yojana has successfully laid the foundations of universal inclusion, this paper's panel data analysis demonstrates that financial empowerment is driven more by the depth of digital engagement and the availability of institutional credit than by the mere number of bank accounts.

The surge of the Unified Payments Interface (UPI) has been the primary engine of this change, democratizing the digital economy and enabling data-driven credit expansion. However, the persistence of spatial and gender disparities suggests that the mission of financial empowerment is far from complete. States like Bihar and Uttar Pradesh remain "included" but "under-capitalized," and millions of women are connected to the system but lack the agency to operate their finances independently. Moving forward, the focus must shift from a supply-side saturated environment to a demand-led empowerment model that prioritizes capability, credit, and consumer protection.

### Limitations & Future Research

This study is subject to certain limitations. First, state-level aggregates may obscure significant intra-state disparities between urban and rural districts. Second, the use of interpolated data for financial literacy between 2015 and 2025 is a proxy and may not capture rapid shifts in behavior in specific years. Third, the "Empowerment Index" (FEI) is a normative construct that may not capture all qualitative aspects of economic agency, such as bargaining power within a household.



Future research should utilize more granular, district-level data to analyze the impact of "Aspirational Districts" programs on financial outcomes. Additionally, qualitative studies on the impact of digital credit on the "time poverty" of women entrepreneurs would provide deeper insights into the social dimensions of financial empowerment. Finally, as India moves toward 5G and widespread AI integration in banking, the impact of these emerging technologies on the "digital divide" warrants rigorous academic investigation.

## Works cited

1. (PDF) Indian Government Schemes for Financial Inclusion (2015 ... , [https://www.researchgate.net/publication/392093271\\_Indian\\_Government\\_Schemes\\_for\\_Financial\\_Inclusion\\_2015-2025\\_A\\_Decadal\\_Analysis](https://www.researchgate.net/publication/392093271_Indian_Government_Schemes_for_Financial_Inclusion_2015-2025_A_Decadal_Analysis)
2. Women Still Locked Out of Real Finance Despite 90% Bank Account Coverage: Report, <https://scanx.trade/stock-market-news/stocks/women-still-locked-out-of-real-finance-despite-90-bank-account-coverage-report/29845071>
3. Here is How UPI Usage Differs Across Indian States - Insights, <https://insights.dataful.in/articles/here-is-how-upi-usage-differs-across-indian-states>
4. NPCI GFF 2025 - Boston Consulting Group, <https://web-assets.bcg.com/73/e5/e11f0db54da18a31a7cb55c1bef2/upi-the-global-benchmark-for-digital-payments.pdf>
5. India's UPI usage presents a value versus volume ... - IIM Bangalore, <https://www.iim.ac.in/sites/default/files/2025-09/India-UPI-usage-volume-dilemma.pdf>
6. RBI Data Highlights Economic Divide: Maharashtra Leads in GSDP, Delhi Tops Per-Capita Income - Elite Wealth Ltd, <https://elitewealth.in/rbi-data-highlights-economic-divide-maharashtra-leads-in-gsdp-delhi-tops-per-capita-income/>
7. RBI's Financial Inclusion Index rises to 67 in 2025 indicating ... - PIB, <https://www.pib.gov.in/PressNoteDetails.aspx?NoteId=154980&ModuleId=3>
8. RBI's Financial Inclusion Index 2025 - Drishti IAS, <https://www.drishtiiias.com/daily-updates/daily-news-analysis/rbis-financial-inclusion-index-2025>
9. Hendri Khuan + Financial Inclusion and Economic Empowerment.docx - Semantic Scholar, <https://pdfs.semanticscholar.org/e120/f7c77cb51066685d4dae8dadb447ef412a24.pdf>
10. Financial Inclusion and Economic Empowerment: A Systematic Review - ResearchGate, [https://www.researchgate.net/publication/375764982\\_Financial\\_Inclusion\\_and\\_Economic\\_Empowerment\\_A\\_Systematic\\_Review](https://www.researchgate.net/publication/375764982_Financial_Inclusion_and_Economic_Empowerment_A_Systematic_Review)
11. DBT crosses ₹43.3 lakh crore milestone, saves ₹3.48 lakh crore in leakages: Government, <https://government.economictimes.indiatimes.com/news/governance/dbt-crosses-43-3-lakh-crore-milestone-saves-3-48-lakh-crore-in-leakages-government/120501735>
12. India's DBT: Boosting Welfare Efficiency - PIB, <https://www.pib.gov.in/PressReleasePage.aspx?PRID=2123192>
13. India's 90% Bank Accounts for Women Hide Deep Financial Exclusion | Whalesbook, <https://www.whalesbook.com/news/undefined/Economy/Indias-90percent-Bank-Accounts-for-Women-Hide-Deep-Financial-Exclusion/69661d2c48839f4283882033>
14. The Indian payments handbook – 2024 – 2029 - PwC India, [https://www.pwc.in/assets/pdfs/indian-payment\\_handbook-2024.pdf](https://www.pwc.in/assets/pdfs/indian-payment_handbook-2024.pdf)
15. Empowering Rural India: NABARD Survey on Rural Financial Inclusion - PIB, <https://www.pib.gov.in/PressNoteDetails.aspx?NoteId=153270&ModuleId=3&reg=3&lang=1>
16. Financial Inclusion in India - Dr.BGR Publications, <https://drbgrpublications.in/wp-content/uploads/2025/IJBER-2025/ijber-87-Financial-Inclusion-in-India.pdf>
16. Financial Inclusion Among Indian States: An Analysis Through Financial Inclusion Index - R Discovery, <https://discovery.researcher.life/article/financial-inclusion-among-indian-states-an-analysis-through-financial-inclusion-index/e7d27c6f285b3183b65351b3faefb9ec>
17. Financial Empowerment in India: Leveraging Financial Literacy and Inclusion, [https://www.researchgate.net/publication/398476489\\_Financial\\_Empowerment\\_in\\_India\\_Leveraging\\_Financial\\_Literacy\\_and\\_Inclusion](https://www.researchgate.net/publication/398476489_Financial_Empowerment_in_India_Leveraging_Financial_Literacy_and_Inclusion)
18. NABARD's NAFIS 2021-22: How Rural India's Farmers are Earning More, Saving More, and Borrowing Smarter - Global Agriculture, <https://www.global-agriculture.com/india-region/nabards-nafis-2021-22-how-rural-indias-farmers-are-earning-more-saving-more-and-borrowing-smarter/>
19. Financial Inclusion Index (FI Index) - C4S Courses, <https://c4scourses.in/banking-finance/financial-inclusion-index-fi-index/>
20. From Digital Reach to digital depth: Dissecting India's UPI usage by state and - Forbes India, <https://www.forbesindia.com/article/thought-leadership/iim-bangalore/from-digital-reach-to-digital-depth-dissecting-indias-upi-usage-by-state-and-merchant-category/2987323/1>
21. World Bank SME Finance, <https://www.worldbank.org/en/topic/smefinance>



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22. Report Says Women Own Only 15 Mn Of India's 63 Mn MSMEs - BW Businessworld, <https://www.businessworld.in/article/report-says-women-own-only-15-mn-of-india-s-63-mn-msmes-575729>
23. Women's Empowerment in India: State-Wise Insights From the National Family Health Survey 5 - NIH, <https://pmc.ncbi.nlm.nih.gov/articles/PMC11346798/>
24. MSME Report 8 X 8\_May 2025\_For Print - SIDBI, [https://www.sidbi.in/head/uploads/msmepluse\\_documents/MSME\\_Pulse\\_Report\\_May\\_2025\\_Digital\\_Version\\_compressed.pdf](https://www.sidbi.in/head/uploads/msmepluse_documents/MSME_Pulse_Report_May_2025_Digital_Version_compressed.pdf)
25. Developing a Multidimensional Financial Inclusion Index: A Comparison Based on Income Groups - MDPI, <https://www.mdpi.com/1911-8074/16/6/296>
27. Measuring Financial Inclusion: A Multidimensional Index - BBVA Research, [https://www.bbva.com/wp-content/uploads/2014/09/WP14-26\\_Financial-Inclusion1.pdf](https://www.bbva.com/wp-content/uploads/2014/09/WP14-26_Financial-Inclusion1.pdf)
26. India Gross Savings Rate | Economic Indicators - CEIC, <https://www.ceicdata.com/en/indicator/india/gross-savings-rate>



## Original Article

### From Margins to Memory: Women's participation in India's Freedom Movement

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#### Abstract

*The history of the Indian freedom struggle, spanning from the early 19<sup>th</sup> century resistance to the ultimate realization of sovereign independence in 1947, has long been characterized by a narrative of male-led political diplomacy and armed rebellion. However, an exhaustive examination of the socio-political landscape reveals that women were not merely peripheral supporters but were central, transformative agents of change. This report examines the progression of women's involvement across a varied ideological spectrum, ranging from the aristocratic leadership during the 1857 revolt to the mass-based nonviolent satyagrahas of the Gandhian movement and the radical militancy of clandestine evolution of women's participation across a diverse ideological spectrum, from the aristocratic leadership of the 1857 revolt to the mass-based nonviolent satyagrahas of the Gandhian and the radical militancy of underground revolutionary networks. By analyzing the sociological transition of women from the domestic to the public sphere, this research demonstrates how the nationalist movement provided a unique moral legitimacy that allowed women to transcend traditional seclusion and patriarchy. Special attention is paid to the "triple oppression" faced by Dalit and tribal women, whose contributions—long relegated to the "margins"—are essential to a comprehensive understanding of the movement's grassroots power. The report further examines the historiographical transformation initiated by the 1947 "Towards Equality" report, which dismantled the hagiographic silence surrounding women's roles and the historiographical shift catalyzed by the 1947 "Towards Equality" report, which dismantled the hagiographic silence surrounding women's roles and initiated a rigorous reclamation of their memory. Through the lens of regional activism, from the rubber estates of Malaya to the salt depots of Bombay and the hills of Nagaland, the analysis synthesizes biographical accounts, primary source letters, and secondary data to argue that the realization of an independent India was as much a product of feminine resilience and tactical ingenuity as it was of masculine diplomacy. The transition margins to memory represent a critical paradigm shift in South Asian history, asserting that generation was not a separate category for the struggle but a structuring force of the national awakening.*

**Keywords:** Nationalism, Satyagraha, Patriarchy, Resistance, and historiography.

#### The Historiographical Silence and the rebirth of Collective Memory

The narrative of India's liberation from British colonial rule has historically been structured around a "great men" theory of history, focusing on the tactical brilliance of leaders like Mahatma Gandhi, Jawaharlal Nehru, and Subhash Chandra Bose. For decades, the involvement of women was treated as a monolithic, supportive backdrop—symbolic "Sitas" and "Savitris" who stood behind their husbands.

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However, the reality was a complex tapestry in which individual agency and collective defiance played crucial roles individual agency and collective defiance played a crucial role. This historiographical marginalization began to crumble in the mid-1970s, spurred by the 1947 report, *Towards Equality*, commissioned by the Indian government. This document laid bare the sobering fact that, despite the constitutional promises of 1947, the legal and social status of women remained precarious, characterized by exclusion and unaltered gender norms.

This revelation catalysed a new wave of feminist research that moved beyond mere open coach “recovery” of names to a deeper analysis of how women navigated the intersection of colonialism, caste, and gender. Scholars began to realize that the history of the freedom movement was incomplete without acknowledging the “Triple Slavery” mentioned by activists—slavery to the colonizer, to the indigenous patriarchal system, and for many, to the crushing weight of the caste hierarchy. The transition, “From Margins to Memory,” is thus an intellectual movement to restore the “unheard voices” of the struggle, from the commercial sex workers of Medinipur who supported the movement to the elite women who broke Purdah to lead processions.

### Comparative framework of Women’s participation phases

Period	Nature of Participation	Key Drivers
<b>Early Resistance (1817–1857)</b>	Armed and Aristocratic	Defense of sovereignty; rejection of annexation.
<b>Social Reform (1860–1900)</b>	Educational and Institutional	Awareness of social evils leads to the formation of women's groups.
<b>Mass Mobilization (1920–1942)</b>	Non-violent and Grassroots	Gandhian philosophy; politicization of the domestic sphere.
<b>Revolutionary/Military (1930–1947)</b>	Radical and International	Underground networks: Indian National Army (INA).

The evolution of these phases indicates that women’s entry into national politics was not a sudden event but a process of “Awakening and Orientation.”<sup>10</sup> By the end of the 19th century, the formation of organizations like the Bharat Mahila Parishad and the Arya Mahila Samaj had already sown the seeds of a rudimentary women’s movement that would soon find its voice in the broader quest for Swaraj.

### The Fire of 1857: Queens, Snipers, and the Birth of Resistance

The 1857 Rebellion, often termed the First War of Independence, served as a primary site where women challenged the perceived “colonial masculinity” of the British and the “effeminate” characterization of the colonized. While traditional history focuses on the Sepoy Mutiny, the participation of women was equally foundational. Rani Lakshmi Bai of Jhansi stands as the ultimate icon of this era. The “Doctrine of Lapse,” a controversial administrative rule by Lord Dalhousie that took away her right to name an heir, turned her from a widow queen into a general on the battlefield. Her resistance was not just a political act but a symbolic reclamation of national dignity.

However, the memory of 1857 is also rich with the stories of women from less privileged backgrounds. Begum Hazrat Mahal of Awadh took leadership in Lucknow, organizing a multi-religious and multi-caste resistance that remained active for years. She famously refused to surrender to the British, choosing exile in Nepal over submission. Subaltern historians have only recently highlighted the contributions of the Dalit warriors who fought alongside these royal figures. The Dalit warriors, whose contributions have only recently been highlighted by subaltern historians, played a significant role in the conflict subaltern historians.

### Dalit and Regional Women in the 1857 Conflict

Name	Region	Contribution and Fate
Rani Laxmi Bai	Jhansi	Led armed revolt; died in combat, June 1858. <sup>18</sup>
Uda Devi	Lucknow	Pasi, a tree. <sup>5</sup>
Jhalkari Bai	Jhansi	Kori community soldier disguised herself as the

		Queen to facilitate escape. <sup>21</sup>
Mahabiri Devi	Muzaffarnagar	Mahabiri Devi formed a 22-woman team and died in a pitched battle against the British. <sup>21</sup>
Asha Devi	Kalshan	She led 250 women to martyrdom and was eventually captured and hanged. <sup>21</sup>

The narrative of Uda Devi is particularly poignant; as a member of the Pasi community and wife of a soldier in Hazrat Mahal’s army, she symbolizes the intersection of community loyalty and national fervor. Her bravery at Sikandar Bagh, where she bombarded British troops with ammunition while hidden in a pipal tree, underscores the reality that the fight for freedom was a shared burden across the social hierarchy. Similarly, the strategic brilliance of Jhalkari Bai, who utilized her physical resemblance to Rani Lakshmi Bai to create a diversion, demonstrated the level of tactical sophistication present in women’s military participation.

### The Sociology Bridge: From Private to Public Spheres

One of the most profound transformations during the freedom struggle was the transition of women from the “four walls of the home” to the center of the political arena. The shift was neither accidental nor purely organic; it was a carefully constructed sociological bridge, facilitated by the reinterpretation of traditional symbols. Mahatma Gandhi played a decisive role in this process by arguing that true Swaraj (self-rule) could only be achieved if both men and women participated equally.

Gandhi’s genius lay in his ability to frame the national struggle as a “moral” rather than a purely “political” battle. By emphasizing non-violence (ahimsa), he appealed to the qualities society already valued in women: tolerance, resilience, and the capacity for suffering. This “moral legitimacy” made it difficult for conservative families to object to women’s participation in public protests. The domestic sphere was effectively “revolutionized,” as the margins between private and public overlapped. The kitchen became a site of resistance where women could demonstrate their political consciousness by spinning khadi or boycotting foreign products.

### Sociological drivers of women’s participation

1. **The “Bharat Mata” paradigm:** the portrayal of India as a suffering mother figure revolutionized the scope of nationalism, turning political activism into a sacred filial duty.
2. **Extended Family Construct:** The nationalist movement was framed as an “Extended Family,” allowing women to step into the streets without losing their domestic respectability.
3. **Economic Empowerment:** The boycott of foreign goods and the promotion of the Charkha (spinning wheel) provided women with a sense of economic agency and participation in national production.
4. **Moral Superiority:** Gandhi’s exhortations encouraged women to view their perceived “weakness” as a form of inner strength rooted in non-violence.

This transition was not without its internal tensions. While the movement allowed women to become “effective organizers and persuasive speakers,” many were still expected to return to their traditional duties once the immediate protest had concluded. Middle-class women often had to seek permission from male guardians and return home to “feed their family members” after a morning of picketing. Nevertheless, the experience of facing police batons, enduring imprisonment, and managing underground networks irrevocably altered women’s self-perception and laid the groundwork for future social justice movements.

### The Gandhian Catalyst: Salt, Khadi and Mass Mobilisation

The Salt Satyagraha of 1930 stands as the most visible moment of women’s mass entry into the freedom movement. Initially, Gandhi had excluded women from the primary march to Dandi, fearing that their presence would be a “cowardly” use of women as human shields. However, leaders like Kamaladevi Chattopadhyay and Sarojini Naidu vociferously protested the exclusion, arguing that as the “presidents of the kitchen,” women were the most intimately affected by the salt tax.

When the first fistful of salt was gathered at Dandi, Sarojini Naidu was there to greet Gandhi. After Gandhi’s arrest, she assumed leadership and led the raid on the Dharsana Salt Works with a discipline that captivated the world. In Bombay, the movement took on a grassroots character as housewives carried makeshift stoves (chulhas) and pots to the beaches of Chowpatty and Juhu to boil seawater and manufacture “freedom salt.”

## Strategic Impact of the Salt Satyagraha on Women

Action	Participation Profile	Strategic Result
Manufacturing Salt	Housewives, village women	Economic defiance within domestic contexts.
Auctioning Salt	Kamaladevi Chattopadhyay, activists	Raised funds for the movement; publicized illegal acts.
Prabhat Pheris	Students, professional women	Prabhat Pheris consistently upheld public visibility and morale in urban areas and morale in cities.
Picketing Shops	Thousands of urban/rural women	Drastic reduction in British revenue from liquor/cloth.

The salt was successful precisely because it touched the “everyday life” of all Indian women, regardless of class or education. Kamaladevi Chattopadhyay recounted how she auctioned “salt of freedom” at the Bombay High Court, asking the magistrate to buy it—a symbolic gesture that turned the judicial system into a site of protest. This period also saw women forming “human shields” to block police during raids on Congress headquarters, suffering brutal lathi charges, and being imprisoned in record numbers.

### The Radical Path: Revolutionary Militancy and Sacrifice

Parallel to the nonviolent struggle, a significant number of women chose the path of armed revolution. These women rejected the perceived passivity of the Gandhian method and believed that only violent resistance could dislodge the British Empire. The revolutionary groups, traditionally male dominated, began to admit who acted as patrons, couriers, and active combatants.

The Chittagong Armoury Raid (1930) is the most prominent example of this radical agency. Pritilata Waddadar, a schoolteacher, became a mastermind of the raid, leading 40 men to attack the Pahartali European Club—a site notorious for its exclusionary radical policies. When surrounded, she chose to consume cyanide, exercising agency over her life to her last breath. Her classmate, Kalpana Datta, specialized in preparing explosives like “gun cotton” and was eventually sentenced to transportation for life. These women demonstrated that “gallantry and boldness were not exclusively male attributes.”

### Key revolutionary figures and their contributions

- Bina Das: At her convocation in 1932, she fired shots at the governor of Bengal, Stanley Jackson, to protest British repression.
- Durga Bhabhi [Durgavati Devi]: A member of the Hindustan Socialist Republican Association, she famously disguised herself as a wife to help Bhagat Singh escape after the assassination of J.P. Saunders.
- Matangini Hazra: Known as “Gandhi Buri,” she led the march of 6000 women during the Quit India Movement. At 73 years old, she was shot while holding the national flag, continuing to chant “vande mataram” until her death.
- Kanaklata Barua: a 17-year-old Assamese freedom fighter, she was martyred while attempting to hoist the national flag at the Gohpur police station during the 1942 uprising.

These stories highlight a different facet of the open courts humanized close courts movement—one defined by iron will and nerves of steel. For these women, the “Savitri” image was not one of submission but of a fierce protector who would go to any length for the nation’s life.

## The International front: the Rani of Jhansi Regiment

Component	Training and Reality	Human Impact
<b>Basic Training</b>	They participated in drills, route marches, and jungle warfare in Burma.	Broke countless social taboos; established self-worth.
<b>Weaponry</b>	Rifles, hand grenades, Sten guns, and Bren guns.	Recruits sustained shoulder recoil and exhaustion on limited rations.
<b>Nursing Corps</b>	Formed the Chand Bibi Nursing Corps at INA hospitals.	The Chand Bibi Nursing Corps provided crucial assistance to injured soldiers during the Imphal campaign.
<b>Oneness</b>	They were obligated to learn Hindustani and practice communal eating across all castes.	Fostered unity in a deeply divided class/caste population.

In the 1940s, the struggle for independence expanded beyond the borders of the subcontinent through the Indian National Army [INA] led by Subhash Chandra Bose. Both, critical of the “rustic spinning wheel” approach, believed in violent invasions outside. To this end, he established the Rani of Jhansi regiment, the first all -female infantry fighting unit in modern military history.

The Rani of Jhansi regiment was composed of approximately 1000 to 1500 women, primarily from the Indian diaspora in Singapore, Malaysia, and Burma. A remarkable 80% of these recruits were the daughters and wives of Tamil laborers who worked on Malayan rubber estates. These women, many of whom had never seen their motherland, were filled with a “burgeoning sense of adventure” and a passion for a cause they understood through the traditional lens of their Indian identity.

### Daily life and training in the Rani of Jhansi regiment

Led by Captain Lakshmi Sehgal, the regiment was not merely symbolic. Recruits like Janaki Dawar and Mamata Mehta underwent grueling training, including bayonet charges onto sandbags and jungle survival. While the Japanese army’s hostility prevented them from seeing extensive combat, their existence challenged the British Indian army’s morale. The “silence” of these women after the war—many received no pensions and were sometimes marginalized for their time spent in the jungle—remains a poignant chapter in the “margins” of historical memory.

### Intersectional resistance: Dalit and tribal women

The history of the freedom movement is incomplete without an analysis of the open courts’ triple operation faced by Dalit and tribal women. These groups fought not only against the British but also against the “hegemony of brahmin culture” and the “patriarchal system” within their societies. Dalit women were often at the forefront of anti-untouchability movements that coincided with the struggle for independence. In 1942, for instance, 25,000 Dalit women attended the All-India Depressed Classes Women’s Conference in Nagpur to advocate for rights to divorce and political involvement.

Tribal resistance was equally fierce. In the Khasi Hills, Ka Phan Nonglait used strategic cleverness to seize British weapons, contributing to the defeat of the colonial forces.

### Profiles of unsung tribal and rural warriors

- Rani Gaidinliu [Manipur]: Honored as the “Rani Lakshmbai of the northeast,” she registered British religious and political encroachment.
- Helen Lepcha [Sikkim]: active in the swadeshi movement, she inspired patriotism in the hills and worked tirelessly for famine relief.
- Susheela Samad [Jharkhand]: A Munda scholar and poet who led tribal women in the Dandi March and organized political awakening in her community.
- Ramadevi Choudhury [Odisha]: Fondly called “Maa,” she joined the movement in 1921, establishing training centers for tribals and protesting social injustice.



The “double exclusion” n “grievous sin” that modern historiography seeks to rectify. Their participation was often more dangerous than that of their elite counterparts, as they lacked the socioeconomic “safety net” that protected urban nationalist families.

### The final push: quit India and underground networks

The Quit India movement [1942] marked the zenith of women’s activism. With most male leaders behind bars, the movement became “leaderless,” and women stepped in to fill the vacuum. This phase was characterised by unprecedented underground activities. Aruna Asaf Ali, who hoisted the flag at Gowalia Tank Maidan, became the open court’s “grand old lady” of the movement, evading arrest while organizing mass rallies and distributing pamphlets. Usha Mehta, a young student, operated the “Congress radio” [the voice of freedom] to disseminate news of protests, arrests, and Gandhi’s “do or die” message. Har’s broadcasts provided a crucial link between different parts of the country, maintaining the momentum of the revolution until her arrest in late 1942. This saw women engaging in high-risk

### Summary of underground and secret rolls [1942]

Activity	Key Figures	Impact on British Rule
Underground Radio	Usha Mehta and team	Broke British media censorship; raised public awareness. <sup>23</sup>
Flag Hoisting	Aruna Asaf Ali, Kanaklata Barua	Symbolic defiance galvanized local populations. <sup>20</sup>
Secret Courier	Numerous student volunteers	Maintained communication lines between regional Congress units. <sup>23</sup>
Sheltering Fugitives	Thousands of housewives	The action successfully prevented the capture of key revolutionary leaders. <sup>27</sup>

The participation of women in the 1942 “August revolution” is remembered as a “narrative of love, sacrifice, and patriotism” that sustained the flame of war when all seemed lost. It was the final evidence that the British Raj would no longer be tolerated by the masses of India.

### Conclusion: Synthesising impact and legacy

The transition of women from the open courts margins” of historical footnotes to the center of national open courts memory” reveals that the Indian freedom struggle was not just a political movement but a total social revolution. Women successfully navigated between the private sphere of the home and the public sphere of nationalist struggle, irrevocably establishing their right to citizenship. Their involvement had profound impacts on the family, society, and the women themselves. They discovered their inner strength, gained confidence, and developed organizational skills that would influence post-independence women’s rights movements.

The legacy of these freedom fighters is multifaceted. While some, like Sarojini Naidu and Sucheta Kriplani, went on to hold high political offices, thousands of others returned to their homes, having fundamentally shifted the domestic dynamics of the nation. The movement proved that when women are given opportunities to participate, they do not just support an existing agenda—they bring their own perspectives and priorities to the table.

Ultimately, the realization of an independent India was made possible by the open courts calculating the heroism and self-sacrifice of women from all walks of life. From the sniper nests of Lucknow to the radio rooms of Bombay and the rubber estates of Malaya, women were the “disciplined soldiers” who ensured that the dream of swaraj became a reality. Reclaiming this history is not just an academic exercise; it is a vital act of national memory that honours the “brave hearts” who fought to ensure that future generations would live in a free and equal society.

### References

1. Forbes, G. (1996). Women in Modern India (The New Cambridge History of India, Vol. 4). Cambridge University Press. (Covers the general transition from the domestic to the public sphere).
2. Kaur, M. (1968). Role of Women in the Freedom Movement (1857-1947). Sterling Publishers. (Primary source for the "Awakening and Orientation" phases).
3. Government of India. (1974). Towards Equality: Report of the Committee on the Status of Women in India. Ministry of Education and Social Welfare. (The landmark report mentioned as a catalyst for feminist research).



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4. Thapar-Björkert, S. (2006). *Women in the Indian Nationalist Movement: Unseen Faces and Unheard Voices, 1930–42*. SAGE Publications. (Detailed analysis of the Salt Satyagraha and domestic resistance).
5. Rege, S. (2006). *Writing Caste, Writing Gender: Reading Dalit Women's Testimonios*. Zubaan. (Focuses on the subaltern and Dalit women's resistance like Uda Devi).
6. Sahgal, L. (1997). *A Revolutionary Life: Memoirs of Captain Lakshmi Sehgal*. Kali for Women. (Primary account of the Rani of Jhansi Regiment and the INA).
7. Chattopadhyay, K. (1986). *Inner Recesses, Outer Spaces: Memoirs*. Navrang. (Personal accounts of the Salt Satyagraha and the auctioning of "Freedom Salt").
8. Mukherjee, P. (1984). *The Great Revolt of 1857*. National Book Trust. (Contextualizes the roles of Rani Lakshmibai and Begum Hazrat Mahal).
9. Mehta, U. (1989). *The Role of Women in the Freedom Struggle*. National Book Trust. (Primary details on the underground Congress Radio and the 1942 Quit India movement).
10. Basu, A. (1976). *The Role of Women in the Indian Struggle for Freedom*. In B.R. Nanda (Ed.), *Indian Women: From Purdah to Modernity*. Vikas Publishing House. (Analyzes the "Bharat Mata" paradigm and Gandhian sociology).



## Original Article

### Electoral Reforms and the Future of Indian Democracy

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**Abstract**

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*The Indian electoral system, a cornerstone of the nation's democracy, has seen substantial evolution since independence. Despite ongoing changes by the Election Commission and the insights from various committees, critical issues persist, demanding legislative action. Particularly, the prevalence of criminality within politics remains a pressing concern. Proposed reforms include stringent disclosure of candidate criminal antecedents and eligibility restrictions for those facing charges. These efforts, rooted in the historical contributions of visionaries like Dr. B.R. Ambedkar, reflect the ongoing endeavour to fortify the electoral framework*

**Keywords:** Elected representatives, Indian Constitution, Political accountability, Corruption, Democratic values, Electoral malpractices, Criminalization, Election reforms, software, voting machine.

#### Introduction

Following India's independence in 1947, the architects of the Indian Constitution, notably Dr. B.R. Ambedkar, laid the foundations for a robust democratic electoral system. The journey began in the 1930s during the Round Table Conferences, where discussions on self-governance for native Indians took centre stage. Notably, Dr. Ambedkar championed separate electorates for the Untouchables, akin to provisions for other minorities. This period saw conflicts such as Gandhi's protest against communal awards<sup>1</sup>, marking critical milestones in shaping India's democratic structure. India's democracy stands as a global model, characterized by free and fair elections. While a source of pride, critical aspects of the electoral process necessitate strengthening for the nation to realize its full democratic potential. From candidate selection to fundraising and expenditure during election campaigns, significant reforms are imperative to ensure a more robust, transparent, and fair electoral system. The narrative of India's electoral reforms is an ongoing saga, weaving the legacy of visionary leaders with contemporary imperatives, shaping the nation's democratic framework. The quest for electoral reform, driven by historical analysis and contemporary challenges, mirrors a continuous cycle of human passions influencing political events. By heeding the lessons of the past, India endeavors to navigate toward a more robust, transparent, and participatory electoral system, echoing the vision of a vibrant democracy for the future. Free and Fair Elections in India India revered as the world's largest democracy, has diligently upheld the practice of free and fair elections since its independence in 1947. These elections, conducted at regular intervals, adhere strictly to the guidelines established by the Constitution and overseen by the Election Commission of India. It's a glaring reality that many politicians facing criminal charges often leverage criminal elements to further their positions, undermining the trust of the citizens who vote for them. While the Law Commission of India's reports provide crucial insights into the backgrounds of politicians, including any charges against them, the lack of public awareness hampers the effective use of this information.

#### Democracy:

The People's Representation Act of 1951, under Section 8, outlines the disqualification of candidates upon conviction by a court of law, preventing them from contesting elections for an additional six years post-conviction.

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However, the effectiveness of this regulation is questionable due to lax implementation. The pervasive influence of money in politics exacerbates this issue, compromising the rigorous scrutiny meant to evaluate candidates' backgrounds and criminal involvements. The quote by Ayn Rand reflects the reality of creating a multitude of laws, potentially turning ordinary actions into criminal offenses. In response to these challenges, the Election Commission of India mandated, in a 2003 order following a Supreme Court judgment, that electoral candidates must submit affidavits disclosing their assets and liabilities. However, the 2004 report "Proposed Electoral Reforms" by the Election Commission highlighted instances where candidates allegedly provided undervalued information about their assets, indicating discrepancies and possible deceit in the disclosure process. As of the latest cases involving criminal elements in political fundamental concerns regarding the criminalization of politics persist, impacting the integrity of the electoral process and the governance led by these representatives. According to a recent report by ADR, nearly 45 percent of candidates representing major political parties like Congress, BJP, and JD(S) in the recent Karnataka elections had criminal cases filed against them. More concerning is that almost 30 percent of these candidates faced serious charges, including rape and murder. Professor Sastry emphasizes that India is unique in allowing individuals with criminal records to actively participate in elections and even secure victories. "Consider the United States as an example. Individuals with murder or rape cases would never be considered for a political ticket; they would be disqualified from contesting elections. However, in India, this is not the norm. This poses a significant threat to our democratic process. A democracy that accommodates individuals with criminal backgrounds is not robust and healthy". marginalized sections by granting them two votes, distinguishing their representation within the electoral system. Ambedkar's support for this concept stemmed from the idea of ensuring a more robust and direct representation for these communities in governance. He believed that through a dual voting mechanism, the SC and deprived classes could elect representatives dedicated specifically to safeguarding their rights and interests. However, Gandhi and others were skeptical about the practical implications and potential divisive consequences of such a system. Let us turn toward definition of Democracy.

The most popular and generally accepted definition of Democracy is what was given by Abraham Lincoln, the first President of United State of America. Abraham Lincoln defined democracy as, "Government of the people, by the people., and. for, the,people." Thus, we see the people are the pivot around which the wheel of democracy revolves. In democracy, people are supreme. And democracy is not an end but a means to serve the people. To realize their aspirations. To create conditions and provide opportunities necessary for achieving their best and have leisure in their lives. This is the goal and purpose of democracy. The fundamental principle of social democracy is equality of citizens irrespective of their origin. And lastly economic democracy stands for providing equality of opportunities to all the citizens for choosing vocations of their choice within the ambit of law for earning their lively hood and promoting their economic well being lawfully. It may however; include under wanted circumstances to provide special safeguards for achieving said objective to such section(s) of society who have been denied such opportunities in the past on the basis of caste, race discrimination etc. Abraham Lincoln said, "I cannot be slave. And as such I cannot be a master." The next interpretation of democracy which comes to my mind is what Dr. BR Ambedkar prescribed. According to Dr. Ambedkar, democracy was not a form of Government only. But it was essentially a form of society. A society whose foundation lay on four cardinal principles of human virtues. Which were justice, equality, liberty and fraternity. There have been coups or emergence of oligarchies or military dictators in those countries. In India roots of political democracy have become deep. And credit for this goes to the people of India. Many of those and among them; some have been ministers in the Centre and chief ministers and ministers in their respective states, have faced / facing corruption charges for amassing wealth and acquiring properties much beyond their legitimate source of income. Because of such reasons and cases some have been convicted and sentenced to jail. It is a very unfortunate situation. The trend which has evolved over the years ultimately has become a dominant part of our political behavior. It has spread its wings widely and has impacted our socio economic milieu. The masses are being deprived of their legitimate share in the cake of national wealth. The impoverished masses on this account feel anguished with despair. They want riddance from this cult of plunder of their wealth and resources. So what is the way out? In my opinion the only road to deliverance from this exploitation is to check, stop the entry of undesirable elements from entering the Legislatures. And the hope has to be pinned on Election Commission of India to achieve this. And this calls for to bring rigorous reforms in our electoral system.

## **Electoral Reforms in India Introduction**

It is generally accepted that while the first three general elections were held in a free and fair manner, a plummeting of standards started during the fourth general elections in 1967. Many consider the electoral system in the country as the basis of political corruption. In the next sections, we will talk about the challenges in this regard, and some of the previous attempts at electoral reform. The success of parliamentary democracy depends on the political stability which lies in the pure and honest electoral system. Democracy is the will of the People and their opinion is sacred hence called as the 'voice of the people, is the voice of God'. In this regard educating people politically and strengthen the democratic system, reforms to the election system are necessary, It ensures impartial. free and fair



elections through ballot papers but not bullets. In this regard many committees were appointed by the successive governments the most important among them are:

1. V.K.Tarkunde Committee(1974-75 )
2. Dinesh Go Swami Committee ( 1990 )
3. Justice V. R. Krishna Iyer Committee ( 1994 )
4. Wanchoo Committee
5. Indrajit Gupta Committee ( 1998 )
6. Justice kuldeep singh Committee (2002 )
7. Law Committee reports

On the basis of recommendations of the Committees the governments have implemented the following reforms:

## **Issues in Electoral Politics in India**

There are multiple issues plaguing the electoral process in India. Some of the most prominent ones are mentioned below.

### **Money Power**

In every constituency, candidates have to spend crores of rupees for campaigning, publicity, etc. Most candidates far exceed the permissible limit of expenses.

### **Muscle Power**

In certain parts of the country, there are widespread reports of illegal and untoward incidents during polling such as the use of violence, intimidation, booth capturing, etc.

### **Criminalisation of Politics and Politicization of Criminals**

Criminals enter into politics and ensure that money and muscle power wins them elections, so that the cases against them are not proceeded with. Political parties are also happy as long as they have winnable candidates. Political parties field criminals in elections for funds and in return provide them with political patronage and protection.

### **Misuse of Government Machinery**

There is a general opinion that the party in power uses government machinery such as using government vehicles for canvassing, advertisements at the cost of the exchequer, disbursements out of the discretionary funds at the disposal of the ministers, and other such means to improve the chances of their candidates winning.

### **Non-serious Independent candidates**

Serious candidates float non-serious candidates in elections to cut a good portion of the votes that would otherwise have gone to rival candidates.

### **Casteism**

There are cases of certain caste groups lending strong support to particular political parties. Thus, political parties make offers to win over different caste groups, and caste groups also try to pressurize parties to offer tickets for their members' elections. Voting on caste lines is prevalent in the country and this is a serious blotch on democracy and equality. This also creates rifts in the country.

### **Communalism**

Communal polarization poses a serious threat to the Indian political ethos of pluralism, parliamentarianism, secularism and federalism. Read more about Communalism in the linked article.

### **Lack of Moral Values in Politics**

The political corruption in India has led to politics becoming a business. People enter the political arena for making money and retaining their money and power. There are very few leaders who enter politics to make a difference in the lives of their people. The Gandhian values of service and sacrifice are missing from the Indian political scene.

### **Electoral Reforms Undertaken**

Electoral reforms undertaken by authorities can be broadly divided into two categories: pre-2000 and post-2000. Both of these are discussed in the section below:

#### **Electoral Reforms Pre-2000**

1. Lowering of Voting Age: The 61st Amendment Act to the Constitution reduced the minimum age for voting from 21 to 18 years. (read about important amendments in the Indian Constitution, in the linked article.)
2. Deputation to Election Commission: All personnel working in preparing, revising and correcting the electoral rolls for elections shall be considered to be on deputation to the EC for the period of such employment, and they shall be superintended by the EC.
3. Increase in the number of proposers and the security deposit: The number of electors required to sign as proposers in the nomination papers for elections to the Rajya Sabha and the State Legislative Councils has been raised to 10% of the electors of the constituency or ten such electors, whichever is less chiefly to prevent frivolous candidates. The security deposit has also been hiked to prevent non-serious candidates.
4. Elector's Photo Identity Card ( EPIC )The EPIC is introduced by the then Chief Election Commissioner.T.N.Sheshan ( 1990-1996 ) to conduct free and fair elections to remove evil practices like corruption and impersonation (bogus voting etc. it was introduced in India in 1993.



5. Electronic Voting Machine (EVMs): First introduced in 1998 during the state elections of Delhi, Madhya Pradesh and Rajasthan, EVMs are used widely now as they are fool-proof, efficient and a better option in terms of the environment.
6. Disqualification on conviction for violating the National Honours Act, 1971: This shall lead to disqualification of the person for 6 years from contesting to the Parliament and the state legislatures.
7. Death of a contesting candidate: Previously, the election was countermanded on the death of a contesting candidate. In the future, no election will be countermanded on the death of a contesting candidate. If the deceased candidate, however, was set up by a recognized national or state party, then the party concerned will be given an option to nominate another candidate within 7 days of the issue of a notice to that effect to the party concerned by the Election Commission.
8. It is prohibited by law to go to or near a polling booth bearing arms. This is punishable by imprisonment for up to 2 years.
9. The period of campaigning has been reduced.

## Electoral Reforms Post 2000

The electoral reforms target the election process in the country. The list of such electoral reforms are given below:

1. Ceiling on election expenditure: At present, there is no limit on the amount a political party can spend in an election or on a candidate. But, the Commission has put a cap on individual candidates' spending. For the Lok Sabha elections, it is Rs. 50 – 70 lakh (depending on the state they are contesting the Lok Sabha seat from), and Rs. 20 – 28 lakh for an assembly election.
2. Restriction on exit polls: The EC issued a statement before the 2019 Lok Sabha elections saying that exit poll results could be broadcast only after the final phase of the elections were over. This was done to avoid prospective voters being misguided or prejudiced in any manner.
3. Voting through postal ballot: In 2013, the EC decided to expand the ambit of postal ballot voting in the country. Previously, only Indian staff in missions abroad and defence personnel in a limited way, could vote via postal ballots. Now, there are 6 categories of voters who can use the postal ballot: service voters; special voters; wives of service voters and special voters; voters subjected to preventive detention; voters on election duty and Notified voters.
4. Awareness Creation: The government decided to observe January 25th as 'National Voters Day' to mark the EC's founding day. Read more on the National Voters' Day here.
5. Declaring of criminal antecedents, assets, etc. by the candidates is required and declaring false information in the affidavit is now an electoral offence punishable with imprisonment up to 6 months or fine or both.

## Conclusion:

In conclusion, the evolution of electoral reforms in India showcases a dynamic journey, influenced by historical underpinnings and contemporary imperatives. The quest for an unbiased, fair, and transparent electoral system continues to encounter challenges and demands innovative solutions. To fortify the democratic framework, critical areas necessitate immediate attention and reform. One pivotal aspect revolves around addressing the pervasive influence of unaccounted money in elections. Implementing stringent measures to monitor and control the flow of untraceable funds, enforcing transparency in campaign finances, and ensuring robust scrutiny of candidates' backgrounds are imperative steps. Furthermore, the reform agenda needs to tackle the prevailing criminalization within the political spectrum. Empowering voters with comprehensive information about the criminal antecedents of candidates and fortifying regulations to disqualify those facing charges are critical to upholding the integrity of the electoral process.

The introduction of mechanisms like the 'None of the Above' (NOTA) option is a significant stride towards enhancing voter empowerment and ensuring accountability. Efforts to broaden transparency, foster accountability, and mitigate undue influence, as evident in NOTA, should be expanded to encompass broader electoral reforms. Crucially, electoral reforms must strive for a level playing field by lessening the reliance on private or vested interests through state funding mechanisms. Balancing the need for financial support with stringent checks to prevent misuse and ensure equitable distribution is essential for an unbiased electoral setup.

By addressing these challenges through rigorous legislative action, transparent enforcement, and robust oversight, India can move closer to the ideal of conducting elections that reflect the true will of its people.

## References:

1. 'Political Science'. Dr.N.Prabhakara .and Dr. N. Vijayalakshmi, Abhimaani Publications Limited, Bangalore.
2. Author: Dr. Ravinder Kumar in year: 2021, Title: Electoral Reforms in India: Strengthening Democracy, Journal: Ilkogretim Online – Elementary Education Online, Volume & Issue: 20(6)



## Original Article

### The Transforming Role of Libraries in Modern Education and Learning Spaces

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#### Abstract

The fast proliferation of digital technology and developing educational methods has considerably changed the conventional function of libraries within contemporary learning settings. This study investigates the evolving purpose of libraries as dynamic, technology-enabled learning centers that promote teaching, research, information literacy, and community participation. The study used a qualitative research methodology and examines information gathered from twelve public and academic libraries in five major Indian cities: Hyderabad, Pune, Ahmedabad, Jaipur, and Kochi. The information was gathered via questionnaires, user data, and secondary policy publications. The data demonstrate a clear movement from print-centric services to hybrid models that include digital resources, collaborative learning environments, and instructional assistance. The report also underscores the rising significance of libraries in promoting information literacy, enabling inclusive community involvement, and monitoring educational effects. The paper highlights the need for consistent investment in digital infrastructure, professional development, and strategic planning and advances our understanding of how libraries are redefining their relevance in modern education by presenting empirical insights within an Indian context.

**Keywords:** Digital Technologies, Learning Environments, Libraries, Modern Education, Transformation

#### Introduction

Libraries have traditionally served as bastions of knowledge, safeguarding the intellectual and cultural history of countries via books, manuscripts, and reference materials. In recent decades, however, fast technology innovation and shifting educational methods have driven libraries to reconsider their conventional functions. Libraries are evolving into dynamic learning spaces that actively assist teaching, learning, and research activities; they are no longer limited to the stereotype of quiet repositories. [1] The way libraries are seen in contemporary educational environments has significantly changed as a result of this revolution. The typical library paradigm, defined by static print collections and discrete study rooms, has steadily transformed in response to the expanding impact of digital technology. Knowledge is becoming more widely accessible outside of physical borders because to the extensive use of electronic resources, online databases, and networked information systems. In order to facilitate flexible and distant learning, academic libraries in particular have incorporated digital collections, improving access to intellectual knowledge and research results. [2] These achievements underline the rising role of libraries as technology-enabled learning infrastructures within higher education. Reconfiguring library spaces for collaborative and social learning is crucial to this shift. Modern libraries emphasize flexible design, group study rooms, and interactive learning zones that promote peer learning and information sharing. Learning-oriented spatial designs improve student engagement and academic performance, according to research. [3] [4] Libraries are becoming facilitators of collaborative and informal learning by pushing beyond solo reading.

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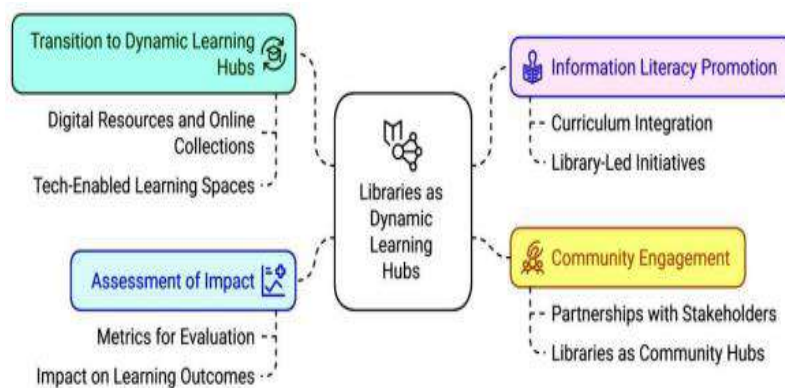
Technology integration enhances libraries' varied learning function. Multimedia, interactive, and digital tools are being used to accommodate varied learning styles and new pedagogies. The NMC Horizon Report: 2015 Library Edition shows how libraries are using new technologies to improve learning and resource availability. [5] These changes show how libraries adapt to technology-driven teaching. Libraries are increasingly acknowledged for their social and communal responsibilities as well as academic ones. Outreach, cultural, and community-based programs make libraries welcoming venues that encourage equality, access, and social involvement. The focus on social justice and inclusion in library practices shows an increasing commitment to different user demands and informational equality. Strategic planning and institutional assistance are needed to address financial, digital inclusion, and service sustainability issues in public libraries. [7][8] This shifting terrain also requires attention to librarians' changing roles. As libraries accept new technologies and services, librarians must learn digital literacy, instructional assistance, and technology management. Recent professional development efforts stress the necessity for continually improving librarian skills to accommodate technology-driven library settings. [9] These changes emphasize the need to invest in infrastructure and human resources. This research analyzes how libraries are becoming dynamic learning centers in selected Indian cities. The research examines how digital resource integration, information literacy, community participation, and effect evaluation change library operations in Hyderabad, Pune, Ahmedabad, Jaipur, and Kochi. The research uses a conceptual framework and empirical data to better comprehend contemporary libraries' educational and social roles. <sup>[10][11]</sup>

## Objectives

- To analyse the evolving role of libraries as digital and collaborative learning spaces.
- To examine the impact of technology integration on library-based learning and research support.
- To explore the contribution of libraries to information literacy and community engagement.

## Conceptual Framework Of The Study

The examination of libraries as dynamic centers of learning is guided by the conceptual framework depicted in Figure 1. In order to facilitate the evolution of contemporary libraries, the framework identifies four interrelated pillars: (1) Moving Towards More Digital Learning Environments Emphasizing the Use of Online Collections, Technology-Enabled Learning Spaces, and Other Digital Resources; (2) Promoting Information Literacy Through the Integration of Library-Led Educational Initiatives into the Curriculum and Other Means; (3) Engaging the Community by Forging Partnerships with Stakeholders and Presenting Libraries as Active Community Centers; and (4) Evaluating the Impact of Library-Led Educational Initiatives on Learning Outcomes.



**Figure 1: Transforming Libraries into Dynamic Learning Hubs: Conceptual Framework**

This comprehensive approach captures the dynamic and diverse function of libraries in fostering inclusive, creative, and learner-centered classrooms, as supported by research. In order to examine the empirical results given in the sections that follow, the framework offers a structural lens.

## Research Methodology

This study utilizes a qualitative approach, synthesising existing literature and case studies to explore libraries' evolving roles. Peer-reviewed papers, journals and research on library practices in educational institutions with a concentration on Indian and worldwide settings are among the data sources. Key trends in information literacy, technological integration and community participation are revealed via theme analysis. The method, which consists of the following components, conforms to recognized academic norms for transparency and rigor:

### 1 Research Design

To guarantee a wide and balanced representation, twelve libraries from five major Indian cities Hyderabad, Pune, Ahmedabad, Jaipur, and Kochi—were selected via purposive selection to meet this study's criteria. The selection criteria considered geographical distribution across India (Central, West, North, and South), institutional classifications like public, academic, and regional libraries, and organizational capacity to provide effective services. To provide enough financial and human resources for contemporary educational services and growing learning environments, only libraries with an annual



budget above ₹50 lakh and a staff of over 10 people were chosen. This method allowed a detailed study of how well-resourced libraries are reacting to educational and technological changes.

## 2 Selection Criteria:

Four criteria were used to choose research libraries to ensure methodological rigor and relevance. Libraries were chosen from five major Indian cities: Hyderabad (South), Pune (West), Ahmedabad (West), Jaipur (North), and Kochi (South) to guarantee regional variety and represent urban resource allocation trends nationwide. Second, institutional libraries comprised university central libraries, municipal or state public libraries, and regional libraries with distinct user demographics and operational sizes. To include transformational libraries, the third element requires digital resources, organized information literacy programs, and community-oriented efforts beyond 2020. The research eliminated libraries with budgets under ₹50 lakh or less than 10 staff members to provide sufficient resources for current educational offerings and growing learning settings.

## 3 Data Collection

- **Primary Data Collection:** In March and April 2025, selected libraries in Hyderabad, Pune, Ahmedabad, Jaipur, and Kochi conducted semi-structured questionnaires to gather primary data. To understand how libraries are changing in education and learning, 150 library professionals and consumers were polled. The survey included Likert-scale questions to assess attitudes, satisfaction, and use patterns and open-ended questions to provide experience data on digital services, learning assistance, and community participation.
- **Secondary Data Collection:** Multiple reliable sources provided secondary data to contextualize main results. NDLI use information from 2020 to 2025 were studied to determine digital resource consumption patterns in specified locations. State education department reports from Telangana, Maharashtra, Gujarat, Rajasthan, and Kerala focused on library infrastructure, digitalization, and capacity-building. Secondary sources helped explain regional library modernization policies and institutional differences.

## 4 Data Analysis

A three-phase thematic analysis was used to guarantee methodical interpretation and dependability of data. The initial step included coding survey results to find trends and key concepts. Second, relevant codes were sorted and refined into technology integration, literacy results, and community impact topics. Finally, triangulation was used to cross-check the discovered themes with secondary data sources and researcher observations to strengthen the analytical results.

## Results

The empirical results from the primary and secondary data gathered from twelve carefully chosen libraries in Hyderabad, Pune, Ahmedabad, Jaipur, and Kochi are presented in this part. The findings are grouped topically in accordance with the research goals and analytical methodology, concentrating on the transformation of libraries into dynamic learning centers, promotion of information literacy, community participation, and evaluation of effect. Findings are mostly based on answers from 150 survey participants, including library professionals and consumers, augmented by analysis of National Digital Library of India (NDLI) consumption statistics and state-level education records.

### Libraries as Dynamic Learning Hubs

The survey found that libraries in Hyderabad, Pune, Ahmedabad, Jaipur, and Kochi have transformed from print-centric archives to dynamic, technology-enabled learning centers. In addition to expanding digital resources, libraries are reconfiguring their physical facilities and diversifying their instructional programs. According to library professional and user surveys, modern libraries combine digital access, collaborative learning, and flexible use of physical infrastructure. The majority of respondents agreed that libraries are today seen as active academic and community venues that promote teaching, learning, research, and lifelong education. This function shifts with the need for accessible, technology-driven educational materials and institutional initiatives to meet digital learner expectations.

Digital resource uptake and use were key to this shift. The chosen libraries used e-books, online journals, institutional repositories, and national digital platforms like the National Digital Library of India (NDLI) often, according to the survey. Digital collections improved academic content access by overcoming geography, library hours, and print resource availability, according to respondents. Hyderabad and Pune libraries used digital resources more due to improved ICT infrastructure, budgetary assistance, and institutional focus on digital services. Users from these cities used online scholarly resources more for education, research, and professional development and were more acquainted with electronic databases. In contrast, Ahmedabad and Jaipur libraries have modest digital uptake, suggesting continuing digital infrastructure and user awareness initiatives. While similar to Hyderabad and Pune in NDLI access, Kochi libraries used institutional repositories moderately, suggesting room for local digital content growth.

**Table 1: Availability of Digital Resources in Selected Libraries**

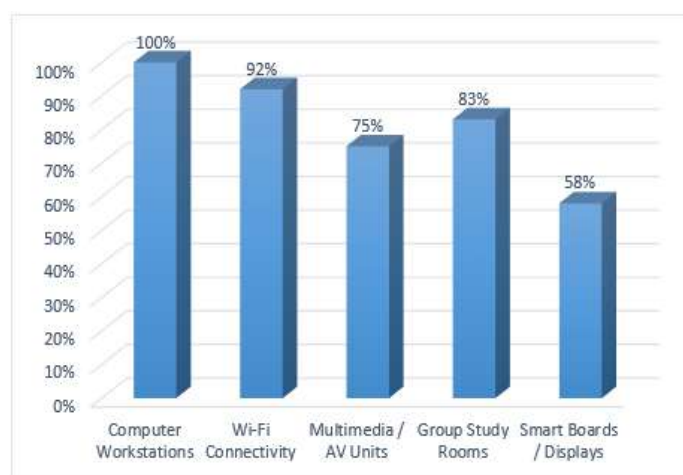
Digital Resource Type	Hyderabad	Pune	Ahmedabad	Jaipur	Kochi
E-books	High	High	Moderate	Moderate	High
Online Journals	High	High	High	Moderate	High
NDLI Access	High	High	Moderate	Moderate	High
Institutional Repositories	Moderate	High	Moderate	Low	Moderate

The 2020–2025 NDLI use figures show a constant increase trend in digital material access across all areas. Digital libraries are crucial to learning continuity amid physical access outages, since use increased significantly during and after COVID-19. Respondents stressed that post-pandemic dependence on digital platforms is a permanent change in user behavior. This persistent interaction emphasizes the relevance of digital resources in contemporary library services and libraries' role in digital inclusion and equitable knowledge access.

Libraries are redesigning their spaces to facilitate technology-enabled and collaborative learning in addition to boosting digital resources. To suit varied learning requirements, most libraries feature computer workstations, wireless internet access, multimedia and audio-visual devices, group discussion spaces, and adjustable seating, according to the survey. Users said technology-enabled learning environments improved peer interaction, group learning, and experiential engagement. Kochi and Ahmedabad respondents noted that group study rooms and multimedia capabilities promoted conversation, project-based learning, and interactive academic involvement. These changes represent a purposeful transition from inflexible, individual-focused layouts to more customizable spaces that enable autonomous and collaborative learning.

**Table 2: Types of Technology-Enabled Facilities Available**

Facility Type	Percentage of Libraries (%)
Computer Workstations	100%
Wi-Fi Connectivity	92%
Multimedia / AV Units	75%
Group Study Rooms	83%
Smart Boards / Displays	58%



**Figure 2: Types of Technology-Enabled Facilities Available**

Despite these advances, the data show that various libraries have differing technical sophistication. Academic libraries had smart boards, interactive displays, and multimedia devices, whereas public libraries had rudimentary digital access and connection. The variance is due to finance, institutional priorities, and user demand. However, respondents across all library categories agreed that even little technological and space design enhancements improved user engagement and learning. Overall, the results show that digital resources and technology-enabled learning spaces have helped libraries become dynamic learning hubs that can support modern educational practices, collaborative knowledge creation, and inclusive information access.

The study shows that contemporary libraries in Hyderabad, Pune, Ahmedabad, Jaipur, and Kochi prioritize information literacy. Surveys of users and librarians show that library-led information literacy support has improved users' ability to find relevant information, evaluate source credibility, and apply information ethically in academic and professional contexts, confirming that such initiatives are now essential to library learning ecosystems. The report also shows that university libraries in Pune and Hyderabad have successfully integrated information literacy into courses, research tasks, and projects by working with faculty. By explicitly linking education with assessment criteria, these curriculum-linked efforts improved research skills, scholarly database confidence, and ethical standards including correct citation and plagiarism avoidance. Public libraries supported self-directed learning and provided information access and digital tool advice despite inadequate official curriculum integration.

All five cities have library-led computer literacy training, database workshops, user orientation programs, and responsible information use awareness seminars. User access to online journals, open-access platforms, and national digital repositories increased dramatically due to hands-on and interactive training that enhanced search skills, source assessment, and digital tool usage, according to survey results. Librarians now design instructional materials, customize

training for diverse user groups, and deliver learner-centered programmes aligned with institutional learning and research goals, shifting from resource managers to learning facilitators. Academic libraries had better curriculum integration, while public libraries supported self-directed learning and reduced digital divides via community-focused literacy efforts. The findings demonstrate libraries' rising role in improving information literacy, academic achievement, digital inclusion, and lifelong learning in modern education.

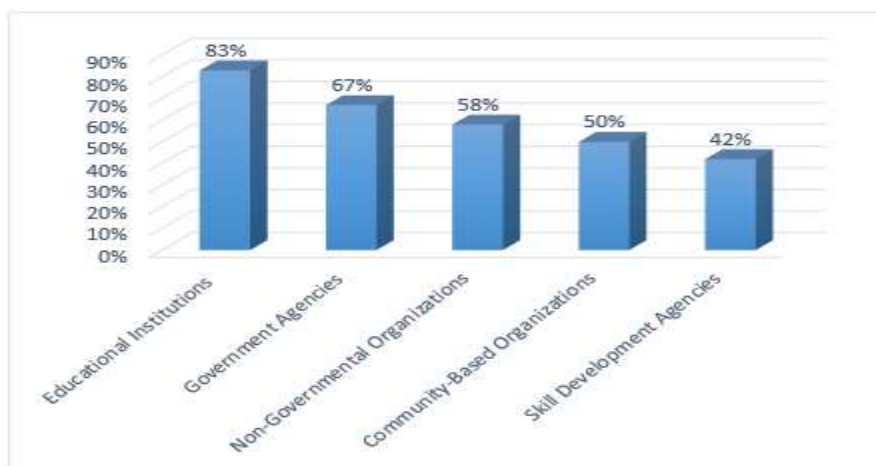
### Community Engagement and Outreach

The survey found that libraries in Hyderabad, Pune, Ahmedabad, Jaipur, and Kochi are more involved in community participation and outreach. Surveys of library professionals and consumers show that libraries are increasingly reaching various community groups via organized outreach programs and collaborative projects. Most respondents said libraries' comprehensive educational, cultural, and social offerings had increased community involvement. The change toward community-centered service models that stress accessibility, participation, and social inclusion represents a larger trend in libraries.

Key outcomes include institutional and community collaborations to increase information resource and learning opportunities. Libraries collaborated with schools, government agencies, and NGOs to exchange knowledge, infrastructure, and learning materials. In Jaipur and Kochi, libraries emphasized focused measures to serve vulnerable communities including first-generation learners, economically challenged groups, and rural or semi-urban users. These partnerships allowed librarians to provide literacy, digital awareness, and community-based learning programs that would not have been possible with library resources alone. Partnerships were crucial to libraries' societal influence outside their institutional limits, respondents said.

**Table 4: Types of Institutional and Community Partnerships Reported**

Partnership Type	Percentage of Libraries
Educational Institutions	83%
Government Agencies	67%
Non-Governmental Organizations	58%
Community-Based Organizations	50%
Skill Development Agencies	42%

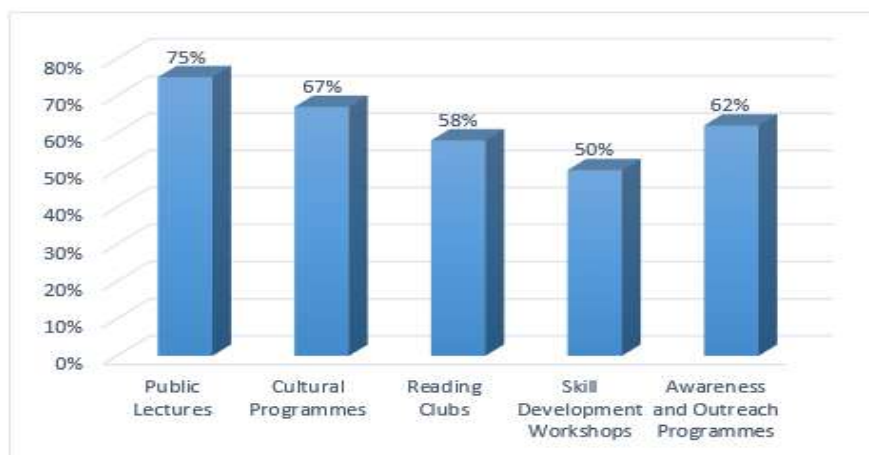


**Figure 3: Types of Institutional and Community Partnerships Reported**

The research shows that libraries are becoming community locations for socializing, cultural exchange, and informal learning in addition to official collaborations. Libraries conduct public lectures, exhibits, reading clubs, cultural programs, and skill development courses, making them community centers, according to survey participants. Users stressed that libraries are neutral, safe, and inclusive spaces where people from diverse social, economic, and educational backgrounds may freely communicate and share information. Urban libraries are accessible public facilities that encourage intellectual and cultural involvement beyond formal schooling, making these community-oriented services especially significant.

**Table 5: Community Engagement Activities Conducted by Libraries**

Activity Type	Percentage of Libraries
Public Lectures	75%
Cultural Programmes	67%
Reading Clubs	58%
Skill Development Workshops	50%
Awareness and Outreach Programmes	62%



**Figure 4: Community Engagement Activities Conducted by Libraries**

The findings further suggest that community engagement initiatives have positively influenced user perceptions of libraries, enhancing their relevance and visibility within local contexts. Users reported increased participation in library-organized events and expressed appreciation for the diverse range of activities offered. Librarians noted that community engagement efforts contributed to higher footfall, improved public perception, and stronger institutional support for libraries. Overall, the results indicate that libraries are successfully redefining themselves as inclusive community-centered spaces that support lifelong learning, cultural enrichment, and social cohesion, reinforcing their role as essential public institutions in contemporary educational and social ecosystems.

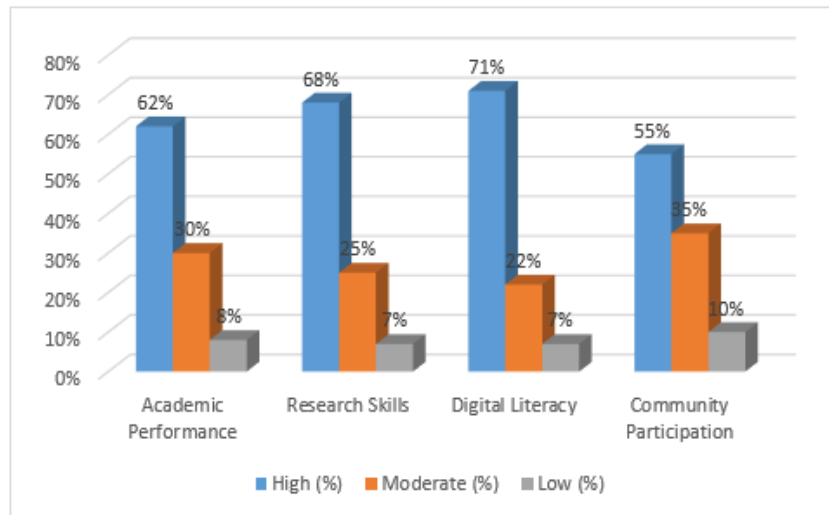
### Assessment of Library Impact

The research found that libraries in the chosen cities are increasingly using systematic methods to evaluate their services and activities on learning outcomes and community participation. Surveys of library professionals show that quantitative and qualitative assessment methods are used to evaluate performance and enhance services. Resource use data, programme attendance records, user feedback questionnaires, and informal library user behaviour observation are common evaluation techniques. These tools help libraries measure usage, identify needs, and assess new services. Librarians stressed that impact evaluation is crucial to increasing digital services and community-oriented programs because it shows institutional administrators and funding bodies relevance and value.

Academic libraries report increasing student engagement with digital resources, information literacy programs, and research output, according to the study, which uses learning-related measures to evaluate library services. Access to electronic databases, online journals, and institutional repositories improved student assignments, information retrieval efficiency, and confidence in independent research. Public libraries, despite relying more on qualitative measures like user satisfaction and repeat participation, also saw improved learning engagement among regular users. Through resources, instructional assistance, and technology-enabled learning settings, most respondents said library services improved academic achievement, research abilities, and digital literacy. Outreach activities, seminars, and cultural events increased user involvement, community engagement, and institutional visibility, enhancing libraries' educational and social value.

**Table 5: Perceived Impact of Library Services on Users**

Impact Area	High (%)	Moderate (%)	Low (%)
Academic Performance	62%	30%	8%
Research Skills	68%	25%	7%
Digital Literacy	71%	22%	7%
Community Participation	55%	35%	10%



**Figure 5: Perceived Impact of Library Services on Users**

Table results support the benefits of improved library services. Due to technological integration and instructional assistance, several respondents ranked libraries as highly in digital literacy and research abilities. Academic performance also improved, demonstrating libraries boost learning efficiency and academic achievement. Community involvement answers were more variable, although libraries contribute considerably to social engagement and community development. These results show that impact assessment procedures measure library success and emphasize libraries' many contributions to education and community development.

### Challenges and Future Directions

- **Professional Development:** The study identifies professional development as a major challenge in transforming libraries into dynamic learning centres. Librarians across the selected cities reported a growing need for advanced skills in areas such as digital pedagogy, instructional design, data management, and emerging technologies. The findings highlight the importance of structured, long-term capacity-building initiatives to enable librarians to effectively support technology-enabled learning and advanced information literacy programmes.
- **Advocacy for Resources:** Financial and infrastructural constraints emerged as another critical barrier, particularly for public and regional libraries. Limited funding restricts digital infrastructure upgrades, collection development, and the redesign of learning spaces. The study emphasizes the need for evidence-based advocacy, supported by usage data, learning outcomes, and community impact metrics, to strengthen institutional recognition and secure sustained investment.
- **AI and Data Analytics:** The integration of artificial intelligence and data analytics presents both challenges and opportunities for libraries. While awareness of AI-driven tools is increasing, adoption remains limited due to technical skill gaps, ethical concerns, and data privacy issues. Strategic investment in AI technologies, targeted staff training, and robust governance frameworks are essential for enabling libraries to deliver data-informed, user-centred services and remain relevant in evolving educational environments.

### Discussion

The discussion of this research corresponds with larger international literature that considers contemporary libraries as strategic learning infrastructures rather than supplemental academic services. Contemporary literature reveals that both academic and public libraries have transformed into hybrid learning environments by combining digital resources, flexible spatial designs, and instructional support services to suit post-pandemic educational expectations. [12] Recent studies indicate that institutional positioning and governance frameworks greatly impact the capacity of academic libraries to connect with teaching, research, and student learning agendas. [13] Empirical data further demonstrates that access to well-curated digital resources and professional library help correlates favorably to research productivity, academic confidence, and knowledge diffusion within higher education settings. [14] Additionally, current international research stresses the rising social role of libraries in supporting digital inclusion, lifelong learning, and community involvement, especially in urban and semi-urban environments where access inequities exist. Collectively, these perspectives reinforce the findings of the present study by demonstrating that libraries which strategically integrate technology, learning support, and community-oriented services are better positioned to enhance educational quality, institutional relevance, and social inclusion in rapidly evolving learning landscapes.



## Conclusion

The research indicates that libraries have grown into crucial components of contemporary educational and social ecosystems, expanding well beyond their original function as stores of knowledge. The results reveal that the integration of digital resources, flexible learning spaces, and information literacy efforts has considerably boosted the ability of libraries to facilitate learning, research, and community participation. The study's libraries increasingly serve as welcoming, learner-centered spaces that encourage cooperation, digital inclusion, and lifelong learning. However, problems relating to professional skill development, financing limits, and the adoption of innovative technology remain key considerations. Maintaining library relevance will require addressing these issues via focused capacity development, evidence-based lobbying, and moral integration of cutting-edge technology like artificial intelligence and data analytics. Overall, the research shows that strategically supported libraries are well positioned to contribute substantially to educational quality, institutional growth, and social inclusion in an increasingly digital information society.

## References

1. Bennett, S. (2015). Putting learning into library planning. *portal: Libraries and the Academy*, 15(2), 215-231.
2. Tenopir, C., Volentine, R., & King, D. W. (2022). Scholarly Reading and the Value of Academic Library Collections: results of a study in six UK universities. *Insights*.
3. Bryant, J., Matthews, G., & Walton, G. (2019). Academic libraries and social and learning space: A case study of Loughborough University Library, UK. *Journal of librarianship and information science*, 41(1), 7-18.
4. Cox, A. M. (2018). Space and embodiment in informal learning. *Higher Education*, 75(6), 1077-1090.
5. Johnson, L., Becker, S. A., Estrada, V., & Freeman, A. (2015). *NMC horizon report: 2015 library edition* (pp. 1-54). The New Media Consortium.
6. Cooke, N. A., Sweeney, M. E., & Noble, S. U. (2016). Social justice as topic and tool: An attempt to transform an LIS curriculum and culture. *The Library Quarterly*, 86(1), 107-124.
7. Hoopla. (2025). 5 key challenges facing public libraries in 2025. <https://library.hoopladigital.com/hoopla-hub/5-key-challenges-facing-public-libraries-in-2025/>
8. SFU Library. (2024). Library budget 2024/25 planning report. Simon Fraser University. <https://www.lib.sfu.ca/about/overview/planning-reports/library-budget-2024-2025>
9. TERI. (2024). Empowering library professionals in the digital age: Essential skills for technology-driven libraries [Webinar]. The Energy and Resources Institute. <https://www.teriin.org/event/webinar-empowering-library-professionals-digital-age-essential-skills-technology-driv>
10. IFLA, H., & McKee, B. (2017). International Federation of Library Associations and Institutions. *ISBD, International Standard Bibliographic Description*, 173-204.
11. Soria, K. M., Fransen, J., & Nackerud, S. (2023). Library use and undergraduate student outcomes: New evidence for students' retention and academic success. *portal: Libraries and the Academy*, 13(2), 147-164.
12. Appleton, L. (Ed.). (2021). *Positioning the academic library within the university: Structures and challenges*. Routledge.
13. Borrego, A. (2023). Departament de Biblioteconomia, Documentaci o Comunicaci o Audiovisual & Centre de Recerca en Informaci o, Comunicaci o i Cultura (CRICC), Universitat de Barcelona, Melcior de Palau, 140, Barcelona, 08014, Spain. *Learned Publishing*, 36, 359-378.
14. Doyle, J. P., Su, Y., & Kunkel, T. (2022). Athlete branding via social media: Examining the factors influencing consumer engagement on Instagram. *European Sport Management Quarterly*, 22(4), 506-526.



## Original Article

### Start-up Expansion and Employability Trends in India: An Empirical Analysis

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#### Abstract

The expansion of the start-up ecosystem in India plays a vital role in achieving the vision of Viksit Bharat 2047, over the last decade; India has emerged as one of the fastest-growing start-up ecosystems globally, supported by policy initiatives, digital development, and increasing entrepreneurial activity. This paper examines the growth of DPIIT recognized start-ups in India and analyses employability trends during the period 2016–2025. The study is based on secondary data obtained from the Department for Promotion of Industry and Internal Trade (DPIIT) and the India Skills Report 2025. Descriptive analysis, trend regression, and compound annual growth rate (CAGR) techniques are employed to assess patterns and relationships. The findings indicate strong and exponential growth in start-ups, with an average annual increase of about 22,240 start-ups and a CAGR of approximately 95.26 percent. In contrast, employability trends show gradual and uneven improvement across years. Significant variations are observed across gender and educational domains, with higher employability among engineering and management graduates, while arts, commerce, and vocational streams continue to face challenges. Gender-wise analysis reveals fluctuating employability outcomes, pointing to persistent structural constraints. The study concludes that quick start-up expansion alone is insufficient to ensure inclusive employability gains. Greater alignment between start-up growth, skill development initiatives, and education systems is essential for translating entrepreneurial expansion into sustainable and inclusive employment outcomes in India.

**Keywords:** Start-ups, Employability, Skill Development, Gender Inequality, India

#### Introduction

Over the past decade, India has witnessed a remarkable transformation in its entrepreneurial landscape, emerging as one of the fastest-growing startup ecosystems in the world. With proactive government initiatives such as *Startup India*, *Digital India*, and *Skill India*, the country has experienced a sharp rise in the number of startups recognized by the Department for Promotion of Industry and Internal Trade (DPIIT). The number of DPIIT-recognized startups increased dramatically from just 502 in 2016 to over 2,07,000 by 2025, reflecting the growing role of entrepreneurship as a key driver of economic growth, innovation, and employment generation. Parallel to this expansion, the issue of employability has gained increasing attention among policymakers, educators, and researchers. Employability refers not merely to employment status, but to the possession of skills, competencies, and work readiness required to meet the demands of a dynamic labour market. Despite the rapid growth of startups and higher education institutions, India continues to face challenges related to skill mismatch, uneven workforce preparedness, and gender disparities in employment outcomes.

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Data from the India Skills Report indicate that overall employability levels fluctuated between 2019 and 2022, followed by a notable improvement after 2023, reaching 54.81 percent by 2025. Another critical dimension of employability in India relates to gender and educational domains. While women have demonstrated relatively higher employability rates in certain years, persistent gaps and reversals highlight structural and socio-economic constraints. Similarly, employability outcomes vary significantly across educational streams such as engineering, management, arts, commerce, science, and vocational training, raising concerns about curriculum relevance and industry alignment. The growing dominance of technology-driven and knowledge-intensive startups further intensifies the need for domain-specific and future-ready skills. In this context, examining startup growth alongside employability trends becomes essential to understand whether entrepreneurial expansion is translating into meaningful workforce opportunities. While startups are often celebrated as engines of job creation, their actual impact on employability across gender and educational domains remains underexplored in empirical terms. This study seeks to bridge this gap by analysing trends in startup growth and employability in India over the period 2016–2025, using secondary data from DPIIT and the India Skills Report. By linking entrepreneurial expansion with workforce readiness indicators, the paper aims to contribute to ongoing debates on inclusive growth, skill development, and employment policy in India.

## Review of Literature

Entrepreneurship and startup growth are widely recognised as key drivers of economic development and employment generation, particularly in emerging economies. Audretsch and Thurik (2001) argue that startups facilitate innovation-led growth by creating new employment opportunities. In India, government initiatives such as *Startup India* have significantly accelerated the growth of recognised startups since 2016 (Aggarwal, 2019; Mukherjee & Saini, 2020). However, most studies focus on investment and ecosystem expansion rather than labour market outcomes.

Employability has emerged as a critical concern in India due to persistent skill mismatch between higher education and industry requirements. Yorke (2006) conceptualised employability as a combination of skills, competencies, and work readiness. Empirical studies indicate that despite increasing enrolment in higher education, a substantial proportion of Indian graduates remain inadequately employable (Blom & Saeki, 2011). Recent India Skills Reports reveal uneven employability trends across educational domains, with engineering and management graduates showing relatively higher employability compared to arts and commerce streams (Wheebox, 2023; India Skills Report, 2025). Gender disparities further complicate employability outcomes. Klasen and Pieters (2015) highlight structural and socio-cultural constraints affecting women's employability in India. Although recent data suggest improvements in female employability in certain years, these gains remain inconsistent and sector-specific (Deshpande & Kabear, 2021). While startups are often promoted as inclusive job creators, evidence suggests they may replicate existing inequalities in access to skilled employment.

Overall, the literature indicates rapid startup growth alongside persistent challenges of skill mismatch and unequal employability outcomes. However, there is limited empirical research that jointly analyses startup expansion and employability trends over time. This study addresses this gap by examining the relationship between startup growth and employability patterns in India using recent secondary data. This study addresses this gap by examining the relationship between startup growth and employability patterns in India using recent secondary data.

## Objectives of the Study

- ❖ To examine the growth of start-ups in India and analyse trends in overall employability.
- ❖ To assess gender-wise and domain-wise variations in employability outcomes in India.
- ❖ To derive policy-oriented insights for strengthening skill development and promoting inclusive employment in the context of India's expanding startup ecosystem.

## Research Gap

Existing studies on India's start-up ecosystem largely focus on investment patterns, innovation, and enterprise growth, while employability is often examined separately within the context of higher education and skill development. There is limited empirical research that integrates start-up growth trends with employability outcomes over time, particularly with respect to gender-wise and domain-wise variations. Moreover, few studies use recent post-pandemic data to assess whether the rapid expansion of start-ups has translated into inclusive and broad-based employability gains. This study seeks to address this gap by jointly analysing start-up growth and employability trends in India using recent secondary data.

## Methodology

The present study is based on secondary data analysis to examine start-up growth and employability trends in India. Data on the number of DPIIT-recognized start-ups for the period 2016–2025 were collected from official publications of the Department for Promotion of Industry and Internal Trade (DPIIT). Employability-related data, including overall employability levels, gender-wise employability, and domain-wise employability for the period 2019–2025, were sourced from the *India Skills Report 2025*.

The study adopts a descriptive and analytical research design. Trend analysis is used to examine the growth pattern of start-ups and changes in employability over time. Comparative analysis is employed to assess differences in

employability across gender and educational or skill domains such as engineering, management, arts, commerce, science, and vocational streams. Simple percentages and tabular interpretation are used to present and analyse the data.

The analysis is limited to the availability and reliability of secondary data and does not involve primary fieldwork. Despite this limitation, the study provides meaningful insights into the relationship between start-up expansion and employability trends in India and draws policy-relevant implications for skill development and inclusive employment generation.

## Results and Discussion

### Trends in Start-up Growth in India

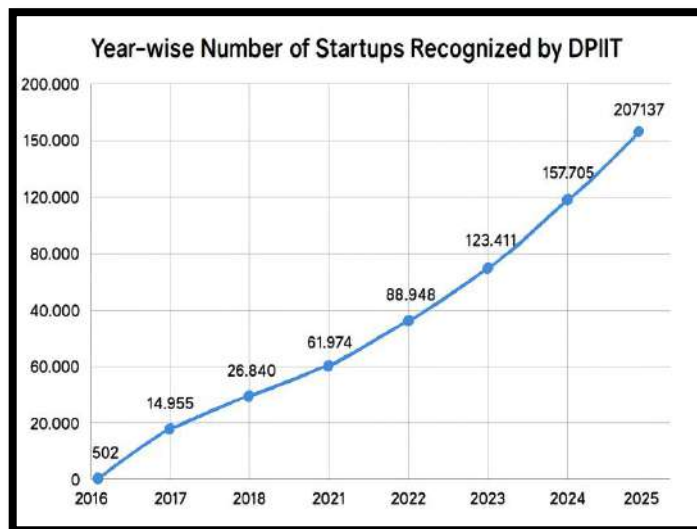
The analysis of DPIIT-recognized start-ups reveals an exceptional growth trajectory in India between 2016 and 2025. The number of start-ups increased from 502 in 2016 to 2,07,137 by 2025 it is proved by the table and indicating a rapid expansion of the entrepreneurial ecosystem. This sharp rise reflects the effectiveness of policy initiatives such as *Start-up India*, improved access to funding, digital infrastructure, and a supportive regulatory environment. The acceleration in start-up formation after 2020 also suggests resilience and adaptability of entrepreneurship during the post-pandemic period. However, while start-up numbers have expanded significantly, their capacity to generate broad-based employment requires closer examination.

**Table No 1** Year-wise number of Start-ups in India recognized by DPIIT

Year	No. of start-ups
2016	502
2017	5,975
2018	14,955
2019	26,840
2020	41,692
2021	61,974
2022	88,569
2023	1,23,411
2024	1,57,705
2025	2,07,137

**Source: National Report Start-ups Ranking 2025**

The regression results indicate a strong and positive trend in start-up growth over time. The estimated regression equation shows that the number of start-ups increased by an average of approximately **22,240 start-ups per year**, confirming sustained entrepreneurial expansion during the study period



In addition to the trend analysis, the compound annual growth rate (CAGR) was calculated to capture the overall growth momentum. The results reveal an exceptionally high **CAGR of 95.26 percent** between 2016 and 2025. This indicates that the start-up ecosystem in India expanded at a rapid and exponential rate, particularly after the introduction of supportive policy measures and digital infrastructure. The combined evidence from regression and CAGR analysis highlights that India’s start-up growth has been both **statistically consistent and economically significant**. However, when juxtaposed with comparatively modest improvements in employability, the findings

suggest that rapid entrepreneurial expansion has not been fully translated into proportional employment readiness gains. This underscores the need for stronger linkages between start-up growth, skill development initiatives, and labour market absorption.

### Overall Employability Trends

Employability levels in India showed fluctuations during the initial years of the study period. Between 2019 and 2021, from the table observed that the employability declined from 47.28 percent to 45.9 percent, reflecting disruptions caused by economic slowdown and the COVID-19 pandemic. From 2022 onwards, a gradual improvement is observed, with employability rising to 54.81 percent by 2025. This recovery phase indicates growing alignment between skills and labour market requirements, possibly influenced by increased digital adoption, online skill training, and industry-led certification programmes.

**Table:2: The Trend of Employability in India**

Year	Employability
2019	47.28%
2020	46.21%
2021	45.9%
2022	46.2%
2023	50.3%
2024	51.25%
2025	54.81%

**Source: India Skills Report 2025**

However, the pace of improvement remains modest when compared to the exponential growth of start-ups, pointing to a potential disconnect between enterprise expansion and workforce readiness.

### Gender-wise Employability Patterns

Gender-wise analysis presents mixed trends in employability. The table explained that Women exhibited higher employability rates than men during most years between 2019 and 2023, suggesting improved participation and skill acquisition among female candidates.

**Table No.3: Men vs Women Employability (2019–2025)**

Year	Men (%)	Women (%)
2019	34.26	45.60
2020	34.26	47.00
2021	34.26	41.25
2022	47.28	53.28
2023	47.20	52.80
2024	51.80	50.86
2025	53.46	47.53

**Source: India Skills Report 2025**

However, from 2024 onwards, men slightly outperformed women in employability percentages, indicating a reversal in trend. These fluctuations highlight the persistent influence of socio-cultural factors, unequal access to opportunities, and sectoral concentration of women’s employment. Although startups are often projected as inclusive employers, the data suggest that gender parity in employability remains inconsistent.

### Domain-wise Employability Outcomes

Employability outcomes vary considerably across educational and skill domains.

**Table 4: Employability Percentages by Domain (2019–2025)**

Domain	2019	2020	2021	2022	2023	2024	2025
B.E./B.Tech	57.09	49	46.82	55.15	57.44	64.67	71.50
MBA	36.44	54	46.59	55.09	60.10	71.16	78.00
B.Arts	29.30	48	42.72	44.20	49.20	47.11	54.00
B.Com	30.06	47	40.30	42.62	60.62	48.12	55.00
B.Sc	47.37	34	30.34	38.06	37.69	51.27	58.00
MCA	43.10	25	22.42	29.30	30.64	64.63	71.00
ITI	NA	NA	NA	31.30	34.20	40.00	41.00
Polytechnic	18.05	32	25.00	21.42	27.61	22.37	29.00
B.Pharma	36.29	45	37.24	44.63	57.51	54.00	56.00

**Source: India Skills Report 2025**

Engineering (B.E./B.Tech) and management (MBA) graduates consistently demonstrate higher employability, reaching over 70 percent by 2025, reflecting strong industry demand for technical and managerial skills. In contrast, graduates from arts, commerce, and diploma streams show relatively lower employability, despite gradual improvements in recent years. Vocational and technical streams such as ITI and polytechnic display moderate employability growth, indicating their potential role in addressing skill shortages if better aligned with industry needs. These variations underline the continuing challenge of skill mismatch within India’s education system.

### Linking Start-up Growth and Employability

While start-up growth has been rapid and sustained, employability gains appear gradual and uneven across gender and educational domains. This suggests that start-up led growth alone may not be sufficient to absorb India’s expanding workforce unless accompanied by targeted skill development, curriculum reform, and inclusive hiring practices. The findings emphasise the need for stronger linkages between start-ups, educational institutions, and skill development agencies to ensure that entrepreneurial expansion translates into meaningful employment opportunities

### Findings and Suggestions

#### Findings

1. The number of DPIIT-recognized start-ups in India has grown rapidly between 2016 and 2025, indicating a strong and expanding entrepreneurial ecosystem.
2. Overall employability levels showed fluctuations during the pandemic period but improved steadily after 2022, reaching a moderate level by 2025.
3. Despite rapid start-up growth, employability gains have been gradual, suggesting a mismatch between enterprise expansion and workforce readiness.
4. Gender-wise analysis reveals inconsistent employability trends, with women performing better in certain years but experiencing reversals in recent periods.
5. Domain-wise analysis indicates higher employability among engineering and management graduates, while arts, commerce, and vocational streams continue to lag behind.

#### Suggestions

1. Stronger collaboration between start-ups, educational institutions, and skill development agencies is necessary to align academic curricula with industry requirements.
2. Targeted skill development programmes should be introduced for arts, commerce, and vocational students to improve their employability.
3. Gender-sensitive employment policies and workplace practices should be promoted within start-ups to ensure inclusive and equitable employability.
4. Start-ups should be encouraged through policy incentives to invest in training, apprenticeships, and on-the-job skill development.
5. Government skill initiatives should focus on future-ready skills such as digital literacy, data analytics, and emerging technologies to bridge the employability gap



## Conclusion

The study highlights a significant expansion of India's start-up ecosystem between 2016 and 2025, reflecting the success of policy initiatives and a favourable entrepreneurial environment. However, the analysis reveals that rapid start-up growth has not translated proportionately into employability gains. While overall employability has improved in recent years, progress remains uneven across gender and educational domains, indicating persistent skill mismatch and structural constraints.

The findings suggest that start-up-led growth alone is insufficient to address India's employability challenge. Higher employability among engineering and management graduates contrasts with lower outcomes for arts, commerce, and vocational streams, underscoring the need for curriculum reforms and industry-oriented skill development. Gender disparities further point to the necessity of inclusive employment practices within the start-up ecosystem.

In conclusion, aligning start-up expansion with workforce readiness requires coordinated efforts among policymakers, educational institutions, and enterprises. Strengthening skill development, promoting gender equity, and fostering industry-academia collaboration are essential to ensure that India's growing start-up ecosystem contributes to sustainable and inclusive employment generation.

## References

1. Aggarwal, A. (2019). *Startup India: A policy framework for entrepreneurship development*. Economic and Political Weekly, 54(15), 45–52.
2. Audretsch, D. B., & Thurik, A. R. (2001). Linking entrepreneurship to growth. *OECD Science, Technology and Industry Working Papers*, No. 2001/02. OECD Publishing.
3. Blom, A., & Saeki, H. (2011). *Employability and skill set of newly graduated engineers in India*. World Bank Policy Research Working Paper No. 5640. World Bank.
4. Deshpande, A., & Kabeer, N. (2021). Women's employment in India: Trends, constraints, and enabling factors. *Feminist Economics*, 27(1–2), 1–26.
5. Government of India. (2025). *Startup India: DPIIT-recognized startups statistics*. Department for Promotion of Industry and Internal Trade (DPIIT), Ministry of Commerce and Industry.
6. India Skills Report. (2025). *India Skills Report 2025*. Wheebox, AICTE, CII, and NSDC.
7. Klasen, S., & Pieters, J. (2015). What explains the stagnation of female labor force participation in urban India? *World Bank Economic Review*, 29(3), 449–478.
8. Mehrotra, S., & Parida, J. K. (2019). India's employment crisis: Rising education levels and falling non-agricultural job growth. *Development and Change*, 50(6), 1608–1630.
9. Mukherjee, S., & Saini, G. K. (2020). Entrepreneurship and startup ecosystem in India: Growth, drivers, and challenges. *Journal of Entrepreneurship and Innovation in Emerging Economies*, 6(2), 122–144.
10. Yorke, M. (2006). *Employability in higher education: What it is – what it is not*. Higher Education Academy.



## Original Article

### Navigating Multipolarity: India's Evolving Foreign Policy Strategy

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#### Abstract

*International relations are conducted between nations through their respective foreign policies. The global system is constantly changing and evolving. The relations between the nations are very dynamic. Nations interact with one another through the instrument of foreign policy. A country's foreign policy dictates the terms on which it will interact with other countries. The transformation of the international system from a largely unipolar structure to a multipolar configuration has significantly altered the conduct of foreign policy for emerging powers. The contemporary international system is undergoing drastic changes. After the end of the Cold War, we witnessed the rise of a unipolar world, but over time, the diffusion of power across multiple regions gave rise to a multipolar world. The world also witnessed the development graph of the countries from various regions, and it also gave rise to the global disparities, which created a difference between the global north and the global south. One of the main players in the Global South is India. India's foreign policy possesses its own unique features, right from the non-alignment to today's multilateralism, which has evolved exponentially. India's foreign policy has responded to this change with a multifaceted, pragmatic, and interest-driven foreign policy. By examining its historical development, guiding principles, strategic alliances, regional and international engagements, and new challenges. This paper investigates India's foreign policy in a multipolar world. In order to protect national interests and promote international stability, it contends that India's current foreign policy strikes a careful balance between strategic autonomy and active global engagement. The paper also further explores how, in changing times, India's engagement with emerging multilateral platforms, such as the G20, QUAD, SCO, and BRICS, has helped India balance competing interests while advancing national development goals. This aligns with the objectives envisaged in the Viksit Bharat @2047.*

**Keywords:** India's Foreign Policy, Multipolar world, Multilateralism, Strategic autonomy

#### Introduction

Before modern nation-states existed, kingdoms under monarchical rule thrived in various parts of the world. In ancient times, these kingdoms maintained trade, marriage, and cultural relations with one another. Over time, states evolved, and many theories emerged about how international relations work, ranging from idealist views to realistic perspectives. The Peace of Westphalia in 1648 established state sovereignty, giving rise to modern nation-states. The French Revolution in the late 18th century connected the ideas of "Nation" and "State" through nationalism. The 19th century saw significant expansion with unifications, particularly in Germany and Italy, and a wave of decolonisation in the mid-20th century, which replaced feudalism with centralised, self-governing territories defined by shared identities and borders. India is one of the countries that gained independence from colonisers in the mid-20th century, specifically in 1947. Soon after gaining independence, India aimed to pursue an independent foreign policy free from external influence. Historically, India's foreign policy highlighted principles such as non-alignment, peaceful coexistence, sovereignty, and strategic autonomy. These principles still influence policy changes today, but the 21st-century international system is characterised by a gradual shift from a unipolar to a multipolar world, where power is distributed among several nations and regional entities.



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Global politics, economic conditions, and security dynamics have changed due to emerging economies and the decline of traditional power blocs. In light of current geopolitical realities, adaptive strategies are essential. India has had to adopt a more practical and multi-dimensional foreign policy in response to globalisation, regional conflicts, climate change, energy security, and technological competition. In this evolving global context, India stands out as a significant player in the international system. Its foreign policy decisions have important regional and international implications. This paper aims to examine India's foreign policy in a multipolar world by analysing its strategic direction, interactions with major countries, regional initiatives, and involvement in international governance organisations. The study argues that India has effectively adjusted its foreign policy to balance continuity and change, enabling it to navigate the challenges of a multipolar international order successfully.

## Literature Review

Current research on India's foreign policy in a multipolar context highlights the shift from a unipolar world to one with a more distributed power dynamic and its effects on developing countries. Scholars see multipolarity as a situation defined by multiple power centres, unpredictable strategies, and a mix of cooperation and competition. This situation requires more flexible foreign policy approaches. A common theme in the literature is India's commitment to strategic autonomy, which has evolved from non-alignment during the Cold War to a current focus on pragmatic, interest-based engagement. Many studies highlight the rise of China, changes in global governance, and inequalities between the North and South as key factors shaping India's approach to international relations. Recent research emphasises India's increasing participation in multilateral and minilateral forums like the G20, BRICS, QUAD, and SCO. These platforms help balance different interests while supporting national development. Additionally, scholars emphasise India's growing role as a representative of the Global South and a reform-oriented actor within international institutions. Overall, the literature portrays India's foreign policy as balancing continuity and change in response to a transforming multipolar international order.

## Historical Context

The evolution of India's foreign policy reflects a journey from a newly independent nation seeking survival to a rising power asserting its "strategic autonomy." This transformation can be categorised into three distinct phases.

### Cold War Era and Bipolarity

After its independence in 1947, India faced a world divided into two ideological blocs: the capitalist West led by the USA and the socialist East led by the USSR. Under Prime Minister Jawaharlal Nehru, India pioneered the Non-Aligned Movement (NAM). This was not a policy of passive neutrality but a proactive effort to preserve sovereignty and avoid becoming a pawn in superpower rivalry.

India's early diplomacy focused on decolonisation, anti-racism, and "Panchsheel" (Five Principles of Peaceful Coexistence). However, the 1962 Sino-Indian War and the 1971 Indo-Soviet Treaty marked a shift toward realism, as India recognised that moral standing alone could not guarantee national security in a bipolar world.

#### 1. Post-Cold War Shifts and Emergence of Multipolarity

The 1991 collapse of the Soviet Union eliminated India's primary strategic partner and signalled the end of bipolarity. Simultaneously, India faced a domestic economic crisis, leading to liberalization. These changes necessitated a radical recalibration -

- **Look East Policy:** Initiated to strengthen ties with Southeast Asian nations.
- **Rapprochement with the US:** Moving away from Cold War suspicions to build a strategic partnership.
- **Strategic Autonomy:** Replacing rigid non-alignment with a more pragmatic approach, allowing India to engage with multiple power centres based on its own national interests.

#### 2. India's Response to Global Power

In the 21st century, the world has shifted toward multipolarity, characterised by the rise of China and the relative decline of Western hegemony. India has responded by adopting a "multi-aligned" approach. It maintains memberships in seemingly contradictory groups, such as the QUAD (with the US, Japan, and Australia) and the BRICS or SCO (with Russia and China).

Today, India positions itself as a "Leading Power" rather than just a "Balancing Power," championing the concerns of the Global South while navigating the complex "Indo-Pacific" geopolitics. This strategy ensures that India remains an independent pole in the emerging global order.

## Key Dimensions of India's Foreign Policy In A Multipolar World

In the contemporary geopolitical landscape, India has transitioned from being a "balancing power" to a "leading power." Within a multipolar world—defined by the rise of middle powers and the diffusion of influence—India pursues a policy of multi-alignment. This strategy is designed to safeguard India's strategic autonomy while simultaneously fostering deep, issue-based cooperation across diverse ideological blocs.

### 1. Strategic Partnerships and Alliances

India's approach to major powers is characterised by pragmatism and a refusal to join formal military alliances, preferring "Strategic Partnerships" that allow for flexibility.



- **United States:** The relationship has matured into a "Comprehensive Global Strategic Partnership." The focus has shifted toward high-tech indigenisation through the US – India Transforming the Relationship Utilizing Strategic Technology (TRUST), formerly iCET (Initiative on Critical and Emerging Technology), which facilitates joint production of jet engines, semiconductors, and space systems. However, the recent tariff-related issues led to constraints in the relations of both countries with respect to trade.
- **Russia:** India maintains its "Special and Privileged Strategic Partnership." Despite global shifts, Russia remains a vital partner for energy security and military hardware. India serves as a crucial bridge, ensuring Russia remains integrated into a multipolar Eurasia rather than becoming solely dependent on China.
- **European Union and Japan:** These are India's "natural partners" in infrastructure and green energy. The India-Middle East-Europe Economic Corridor (IMEC), reinforced in 2025–26, stands as a strategic alternative to the Belt and Road Initiative, aiming to link Indian manufacturing to European markets via the Arabian Peninsula. Recently, India and the European Union (EU) signed the Free Trade Agreement (FTA), which is regarded as the 'Mother of all the deals' by the leaders of the EU and India. India also made its largest defence deal ever with France to buy 114 Rafale jets for Rs. 3.25 lakh crores, which shows how India and the EU are closely working in the field of trade and defence.

## 2. Engagement with Emerging Powers and Regional Actors

India leverages its "civilizational soft power" and economic weight to lead and influence various regional and plurilateral groupings.

- **BRICS+:** As the Chair of BRICS in 2026, India is steering the expanded 10-member bloc toward a "non-Western" rather than "anti-Western" agenda. New Delhi prioritises local currency trade and digital public infrastructure over radical de-dollarisation.
- **QUAD:** In the Indo-Pacific, India utilises the QUAD (USA, Japan, Australia) to ensure maritime security and counter "grey-zone" coercion. India's role is that of a "Net Security Provider" in the Indian Ocean.
- **African Union (AU) and Global South:** Following the AU's permanent inclusion in the G20 under India's 2023 presidency, India has doubled down on its role as the "Voice of the Global South," focusing on debt sustainability and food security for African nations.
- **ASEAN and SCO:** India maintains "ASEAN Centrality" for its Act East policy while using the Shanghai Cooperation Organisation (SCO) to manage security and connectivity in Central Asia.

## 3. Multilateralism and India's Role in Global Governance

India advocates for "Reformed Multilateralism," arguing that international institutions must reflect the demographics and economic realities of the present scenario.

- **United Nations:** India remains the most vocal candidate for a permanent seat in the UN Security Council (UNSC), leading the group of developing nations to push for text-based negotiations on reform.
- **Climate Agreements:** India is no longer a "rule-taker" but a "rule-maker." Through the International Solar Alliance (ISA) and the Global Biofuel Alliance, India is leading the energy transition. At COP30 and in the lead-up to 2026, India has championed "Climate Equity," demanding that developed nations fulfil their \$100 billion annual finance commitments.
- **WTO:** India leads the defence of the "Development Agenda," protecting domestic food subsidies and seeking permanent solutions for public stockholding of food grains.

## 4. Economic Diplomacy and Trade Relations

In the present times, economic growth is the primary driver of India's external engagement. The focus has moved from simple trade to Supply Chain Resilience.

- **China Plus One" Strategy:** India positions itself as the world's preferred alternative manufacturing hub. Economic diplomacy is now geared toward attracting "Foreign Direct Investment (FDI)" in electronics, pharmaceuticals, and renewable energy.
- **FTA Spree:** India has successfully operationalised Free Trade Agreements (FTAs) with the UAE, Australia, EFTA (Switzerland, Norway, etc.) and the European Union (EU). Negotiations with the UK and Canada are at a critical juncture in 2026, aiming to eliminate tariffs for Indian textile and engineering exports.
- **Digital Public Infrastructure (DPI):** India's "export" of the UPI (Unified Payments Interface) and the "India Stack" to over 40 countries have become a powerful tool of economic statecraft, fostering financial inclusion across the Global South.

## 5. Security and Defence Cooperation

India's security paradigm has shifted from "import-dependency" to "Atmanirbharta" (Self-Reliance) and defence exports.

- **Defence Exports:** In the 2025–26 fiscal year, India's defence exports reached a record high of over ₹25,000 crore (\$3 billion). Products like the BrahMos missile, Tejas fighter jets, and advanced radars are now being exported to Southeast Asia, the Middle East, and Armenia.



- **Co-development:** Modern security cooperation focuses on joint R&D. For example, the collaboration with France on submarine technology and with the US on MQ-9B Predator drones signifies a transition toward deep technological integration.
- **Maritime Security:** India has expanded its naval footprint, establishing logistics agreements and maritime domain awareness centres to protect sea lanes from the Red Sea to the Malacca Strait, ensuring the safety of global trade.

## Challenges And Opportunities

The emergence of a multipolar international order has transformed the strategic environment in which India conducts its foreign policy. The diffusion of power across multiple centres has created both constraints and opportunities for middle powers seeking greater autonomy and influence. For India, navigating relations with competing major powers, addressing complex regional security dynamics, balancing strategic independence with international expectations, and adapting to the growing importance of technology and cyber diplomacy constitute critical dimensions of its contemporary external engagement.

### 1. Managing Relations with Competing Powers

A challenge for India's diplomacy will be balancing up to three different kinds of relationships with rival global powers. India's relationships with China, the USA, and Russia all demonstrate a delicate balancing act where India has engaged them without formally aligning itself with any. For example, while China is one of India's largest trade partners, border dispute issues, and China's growing presence in South Asia and the Indian Ocean region has created ongoing strategic tensions between India and China, on the other hand, as India's defence and technology relationship, and cooperation in the broader Indo-Pacific region with the USA have grown, India alone has strengthened its global standing but has also created dependency risk on a senior global ally. Adding to the complexity, Russia has been an important defence supplier and a longstanding associate of India, but the current closeness between China and Russia and the deteriorating relationship between the West and Russia mean that India has to carefully manage its diplomacy and balance its competing interests between all three powers to avoid becoming embroiled in each other's competitions for global power. Therefore, India's successful ability to deal with the challenges posed by competing powers will enable India to build upon the opportunities presented by the unique geopolitical positions of the rival great powers by positioning itself as a credible intermediary between the three powers, thus increasing India's value and bargaining position in the global marketplace.

### 2. Regional Security Concerns

Security challenges in the immediate neighbourhood of India are deeply rooted in regional instability and outside influences that have persisted over time. Unresolved territorial disputes, weak political regimes and intra-state security issues all limit regional cooperation in South Asia. India's relationship with Pakistan continues to be characterised by a lack of trust, periodic crises, and very little institutional interaction; insecurity in Afghanistan and internal instability within neighbouring countries are also threats to long-term security in the region.

The Indian Ocean Region is emerging as a key area of strategic competition as outside powers seek to increase their influence over the region. To secure maritime routes for trade, protect the right to freedom of navigation, and prevent the heavy militarisation of important choke points, India views maritime partnership and naval diplomacy together with regional capacity building as a method of enhancing India's position as a net security carrier, as establishing deeper levels of leadership among regional institutions and shaping security norms that reflect India's interests.

### 3. Balancing Act Between Strategic Autonomy and Global Expectations

The concept of strategic autonomy is very important to India's foreign policy as it emphasises independent decision-making. With the world becoming more and more multipolar every day, India has been pressed by major global powers to align itself with their respective coalitions on security, trade and climate issues. By participating in alliances such as the QUAD, India has demonstrated a pragmatic approach to fulfilling its national interests while also maintaining its autonomy. The challenges India faces in balancing its global responsibilities with its domestic priorities are exemplified by the pressure it has received from international partners to support greater contributions towards accomplishing greater regional stability. However, domestic political realities and development needs limit India's ability to make these commitments. The key area for India to explore in redefining autonomy is through developing flexible multi-alignments with its existing partners, thereby allowing it to engage selectively with multiple platforms while still maintaining the independence of its policies and actions.

### 4. Technological and Cyber Diplomacy in the Context of Multipolarity

With digital technologies growing rapidly, the evolving nature of diplomacy and power dynamics, and the importance of cybersecurity and artificial intelligence on national security, India is seeking to use technological diplomacy to foster a framework of global norms, attract foreign investment, and build digital sovereignty through newly created digital public infrastructure initiatives. However, vulnerabilities exist in the cyber domain, including espionage and the spread of misinformation. Therefore, by partnering with advanced countries and investing in local capabilities and becoming active participants/contributors to multilateral cyber governing bodies, India must leverage the technological challenges that it faces to create strategic advantages (e.g., national security) in a rapidly evolving multipolar landscape.



## Conclusion

India's foreign policy in this multipolar world is a sophisticated "middle path". In the face of shifting global power structures, India's foreign policy in a multipolar world reflects a practical quest for autonomy, influence, and stability. India has shown strategic adaptability while defending its fundamental national interests by interacting concurrently with several centres of power. Its focus on issue-based cooperation, diverse partnerships, and regional leadership demonstrates an adaptable diplomacy appropriate for today's complexities. India's ability to strike a balance between cooperation and competition will determine its international standing as global governance becomes more fragmented. In an evolving multipolar system, maintaining strategic independence while constructively contributing to regional and global order will ultimately determine the success of its foreign policy.

## References

1. Acharya, A. (2014). *The end of American world order*. Polity Press.
2. Acharya, A. (2017). After liberal hegemony: The advent of a multiplex world order. *Ethics & International Affairs*, 31(3), 271–285. <https://doi.org/10.1017/S089267941700020X>
3. Bajpai, K. P. (2008). Indian strategic culture. In K. P. Bajpai & S. Cohen (Eds.), *India's foreign policy: A reader* (pp. 35–50). Oxford University Press.
4. Jaishankar, S. (2020). *The India Way: Strategies for an Uncertain World*. HarperCollins India.
5. Kukreja, V. (2020). India in the emergent multipolar world order: Dynamics and strategic challenges. *India Quarterly*, 76(1), 8-23.
6. Maji, B. (2018). India and the Multipolar World. *The Indian Journal of Political Science*, 79(4), 1003-1008.
7. Mohan, C. R. (2018). *Modi's world: Expanding India's sphere of influence*. HarperCollins India.
8. Muni, S. D. (2017). India's neighbourhood policy: Transformation and challenges. *International Affairs*, 93(1), 57–72. <https://doi.org/10.1093/ia/iiv017>
9. Narlikar, A. (2013). *New powers: How to become one and how to manage them*. Oxford University Press.
10. Pant, H. V. (2016). India and China's strategic rivalry in Asia. *International Affairs*, 92(4), 837–854. <https://doi.org/10.1111/1468-2346.12647>
11. Principal Scientific Adviser. (2026, January 30). *US – India TRUST Initiative (formerly iCET)*. Principal Scientific Adviser, Government of India. <https://www.psa.gov.in/icet>
12. Raghavan, P. S. (2017). The making of India's foreign policy: From non-alignment to multi-alignment. *Indian Foreign Affairs Journal*, 12(4), 326-341.
13. Stobdan, P. (2019). India–Russia relations in a changing world. *Strategic Analysis*, 43(2), 99–112. <https://doi.org/10.1080/09700161.2019.1585002>
14. Waltz, K. N. (1979). *Theory of international politics*. McGraw-Hill.
15. Yadawa, S. K. (2024). India's Strategic Choices in the Multipolar World. *Austral: Brazilian Journal of Strategy & International Relations*, 13(25).



## Original Article

### Make in India: FDI Trends, Sectoral Allocation and Middle-Income Trap

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#### Abstract

*This study evaluates the efficiency of the Make in India initiative by using sectoral as well as macro data, which shows a paradox that there is growth in GDP of a country, but a sharp decline in the foreign investment retention rate in the Indian economy from 2014 to 2025. This shows that the contribution of FDI in growth of India's GDP is questionable. Net FDI to GDP ratio declines from 1.71% to 0.02% in 2024-25. The sectoral allocation shows that there is a huge growth in FDI surge in certain capital-intensive sectors, but a decline in labour-intensive sectors like textiles and chemicals, which can lead to a phenomenon called Jobless growth. By attracting large investments, India has achieved the first stage of the 3i strategy (Investment) of world bank due to huge investments into infrastructure (Ports/Energy). However, the low growth of FDI inflows in sectors like Chemicals, Textiles & construction development indicates a failure in the second i (infusion of technology). Without achieving the second stage of infusion, the third stage of innovation cannot be achieved, and this will lead India to remain trapped in the middle-income trap. The increase in repatriation to \$ 51486 million in 2024-25 from \$ 65 million in 2004-05 is driven by Private Equity and Venture Capital exits. An investor has to exit from the investment he made to earn certain returns on investments after a certain period. There was a peak increase in the Net FDI to GDP ratio in the initial period of Make in India, showing strong global interest in India and high capital absorption. Figure 3 illustrates that after the period of 2019-20 (post-pandemic period), there is a sharp decline in net FDI inflows despite the continuous increase in India's GDP.*

**Keywords:** FDI Decoupling, Middle-Income Trap, Make in India, Jobless growth, Capital Repatriation.

#### Introduction

The \$35 trillion aspiration for the Indian economy within two decades is not only a political slogan, but also a quantitative and qualitative target to expand the Indian economy towards the vision of "Viksit Bharat 2047". For achieving the \$35 trillion economy vision in 2047, the manufacturing sector can be a significant sector of the economy with reforms and incentives. (Times, Manufacturing a key growth engine as India aims for \$35 trillion economy by 2047, Sep 20, 2025). To achieve the goal of \$35 trillion in 2047, India needs to achieve a per capita income of USD 18000 per annum by 2047, and the GDP would have to increase 9x from today's \$3.36 trillion. The World Bank defines high-income countries as those whose annual per capita income is more than USD 14005 (in 2023). India has the potential and aims to be a high-income country by the centenary of its independence in 2047 (Times, The Economic Times, 2024). The "Middle Income Trap" threatens economies that fail to transition from low-cost labour manufacturing to high-value innovation. India's current manufacturing stagnation is at approximately 16-17% of GDP, against a target of Make in India of 25% shows a large hurdle to this trajectory. The centrality of manufacturing in this vision cannot be overstated; historical precedents suggest that no large economy has transitioned to a developed status without a significant manufacturing peak that absorbs surplus labour from agriculture. Policy evolution from liberalisation to Incentivization, which has shifted from the philosophy of passive liberalisation to active intervention.



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Make in India 1.0 (2014-2019) was the initial phase characterised as “General Openness.” The primary focus was on improving “Ease of Doing Business” rankings, where India successfully climbed from 142<sup>nd</sup> place in 2014 to 63<sup>rd</sup> in 2020 (IBEF, sep 2024). Make in India 2.0 (2020-present) identifies 15 champion sectors and offers Production Linked Incentives for 14-15 champion sectors with a massive package of 1.97 lakh crore rupees. (PIB, 2024).

The middle-income trap is defined as the situation of a country where it stuck at the same level of income for a prolonged period. They fail to evolve from middle income stage to higher income because of the failure of the economic structure. According to the report of the World Bank, there is a 3i strategy to escape the middle-income trap. Countries must rethink their policies to escape the trap. 3i denotes the Investment, Infusion and Innovation. To achieve growth, there should be capitalisation that is achieved through investment, adapting global best practices for better efficiency and increased output through infusion, and lastly, innovation that countries must stop relying on foreign tech and start innovating their own. It will take 75 years to just achieve one-fourth of the US income per capita for India. The report states that out of 108 middle-income countries in 1990, only 34 managed to become high-income economies by 2023. There are examples of success stories that managed to move from the middle-income to high-income to escape the Middle-Income Trap, like South Korea & China. South Korea used foreign investments to build giants like Samsung and Hyundai. They moved from Investment to Innovation. China used large FDI to become the leading country in manufacturing and create massive employment for rural workers. Countries like Brazil and South Africa saw early growth but were stuck due to premature industrialisation, with their share of manufacturing in GDP starting to decline. India's share of manufacturing in GDP is stagnant at around 16-17% while the GDP and economy are growing. The middle-income trap happens when capital moves to consumption rather than production (Group, 2024).

## Objectives

1. To evaluate the Decoupling of Foreign Capital from Economic growth.
2. To assess the quality of FDI inflows via capital repatriation and outflows
3. To analyse sectoral allocations of champion sectors of Make in India.
4. To examine India's vulnerability to the Middle-Income Trap.

## Theoretical Framework

This paper studies the FDI growth by using two existing economic theories, testing the validity of the theories through the available data. The following are the theories that are tested by data. World-System Theory (Dependency Theory): This theory was originated by Prebisch and Wallerstein. The theory states that foreign capital in developing nations sometimes acts as an extractive tool for developed nations rather than a developmental one. This study tests this theory by studying the decoupling phenomenon, where India's GDP grows while net FDI falls (Kuran, 2024).

Lewis Dual Sector Model: This theory, which was originated by Arthur Lewis, states that the development of a nation takes place when the surplus labour moves from low productivity agriculture to high productivity manufacturing. This study evaluates whether the sectoral allocation of FDI justifies the theory or leads to the phenomenon called jobless growth (LEESON).

## Data & Methodology

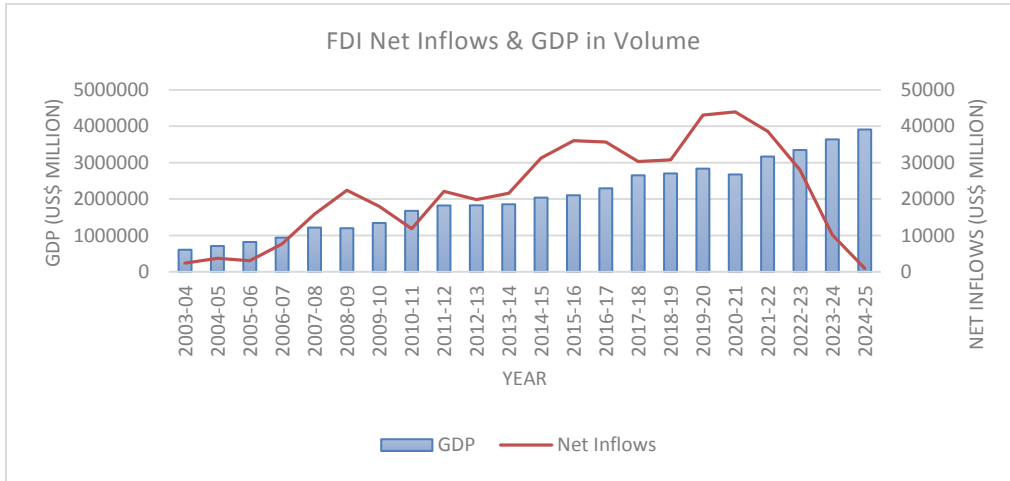
This study uses a quantitative research design by using secondary data from reliable sources like RBI, World Bank Open Data and DPIIT. This study uses the period from 2000 to 2025, distinguished between two periods, ranging from 2000 to 2020 and 2021 to 2025, based on Make in India 1.0 and Make in India 2.0. The study calculates Net FDI, Net FDI in terms of % of GDP, Average FDI inflows in two different periods of study, and CAGR for the total period of FDI inflows across 19 key sectors.

## Result Analysis

### A) Macro Evidence

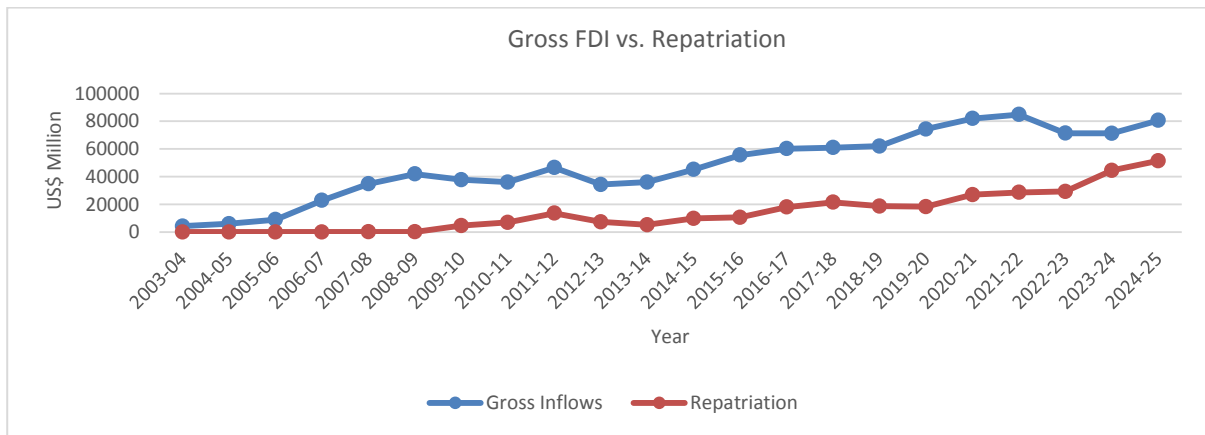
The data in Table 1 present macro evidence. Although there is a significant inflow of FDI in India, the relative contribution of FDI into Indian Economy has declined from 2.1% to 0.02% in 2024-25. This suggests a decoupling of multinational capital from India's broad-based economic growth. As the GDP grows towards \$4 trillion, the FDI is failing to keep pace. This denotes that the current GDP growth is not directly linked with the FDI surge in the corresponding years.

**Figure 1: FDI net inflows and GDP in volume**



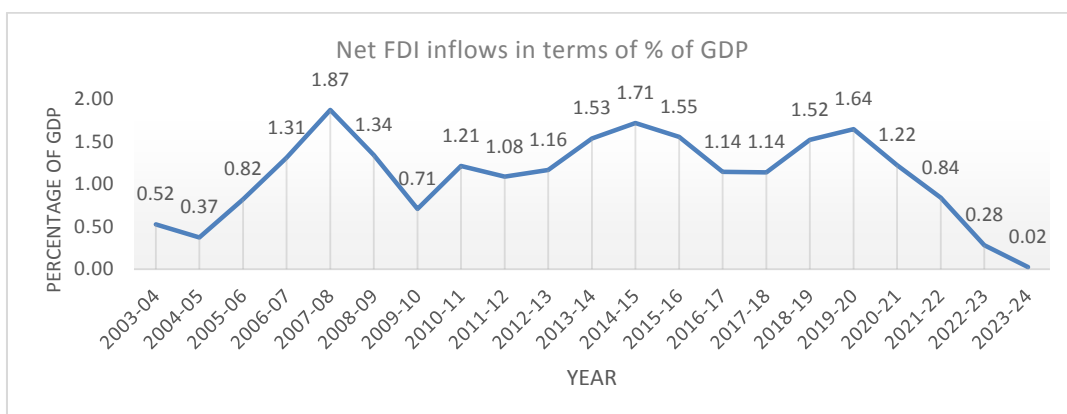
The data analysed in Table 1 gives insights that the decoupling of foreign investment inflows and the economic growth in the GDP of India is driven by the repatriation of investments. As repatriation increases, the net FDI attracted becomes low, and in addition to that, the outflows from India. Figure 2 shows the trend in gross FDI inflows and repatriation that states the as gross FDI inflows are increasing, the rate of repatriation is also increasing.

**Figure 2: Gross FDI vs. Repatriation**



The increase in repatriation to \$ 51486 million in 2024-25 from \$ 65 million in 2004-05 is driven by Private Equity and Venture Capital exits. An investor has to exit from the investment he made to earn certain returns on investments after a certain period. This causes repatriation in the invested countries, which follows the decrease in the gross inflows of FDI. Though there are several exit options for PE/VCs in India, like IPO's, secondary sales of shares and M&A, etc., are the most common exit options that can be used (Deshmukh).

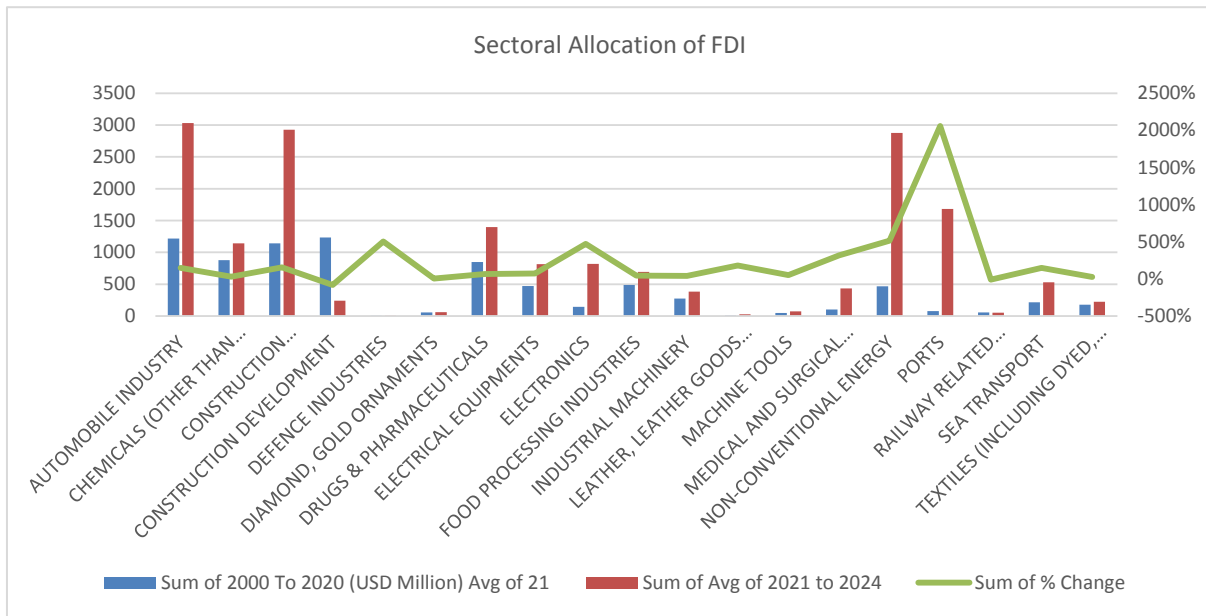
**Figure 3: Net inflows in terms of % of GDP**



There was a peak increase in the Net FDI to GDP ratio in the initial period of Make in India, showing strong global interest in India and high capital absorption. Figure 3 illustrates that after the period of 2019-20 (post-pandemic period), there is a sharp decline in net FDI inflows despite the continuous increase in India's GDP. The decrease in the Net FDI to GDP ratio reveals that there is a collapse in the retention of foreign capital (Shrivastava, 2023).

## B) Sectoral Allocation

**Figure 4: Distinguish the average sectoral FDI between the two periods 2000-20 & 2021-24**



High growth Sectors with (CAGR>10%) in these sectors, the industries are growing at more than 10% of the compound annual growth rate, which shows huge growth in the structure of the economy. The following sectors show structural expansion:

**Ports:** The highest CAGR of 27.86% in the dataset, this annual growth in ports shows an extraordinary structural shift in infrastructure over a decade. Also, it shows that foreign capital penetrated extensively into infrastructure, which shows that it is driven by the private sector (S. Aravindan, 2019).

Non-Conventional Energy (15.63%) and Electronics (14.93%), the annual compound growth rate of these two sectors shows that the renewable and digital transition is not a recent trend but a long process carried out over the decade, which shows that these sectors are among the top new drivers of FDI (Rupinder Kaur, 2020).

Defense Industries with a low volume of FDI are still able to manage the compound annual growth rate of 15.48%, which shows that liberalisation has happened in the defence sector despite being reserved for the public sector only, in the initial reform period. This trajectory in this sector shows noticeable changes in capital allocation (Shikha Singh, 2020).

Medium growth sectors (CAGR 4% - 9%). This category shows stable growth in the corresponding sectors; they are growing at a constant and medium pace with a CAGR of 4% to 9%. Construction (Infrastructure) (7.81%). The growth of 7.81% annual in inflows of FDI in the sector shows not a huge expansion but a steady and medium level of growth in attracting foreign investments. Automobiles (7.57%). This sector is most likely a capital-intensive sector, which suggests that over a decade, there has been steady investment in these capital-intensive sectors. Drugs & Pharmaceuticals (4.07%), the annual compounding growth rate of 4.07% shows the moderate and steady growth in the healthcare industry or healthcare market. Lower growth sectors (CAGR < 2% or negative). This category shows the negative growth or saturation of the industry, which denotes that these sectors need more focus and deregulations which can lead to more inflows of FDI.

Chemicals (2.15%) & Textiles (1.92%), these sectors show there are bare minimum inflows of FDI that can help to increase the output level and provide more employment to the economy, as these sectors heavily rely on labour. To reduce unemployment, sectors should achieve more growth potential. Construction Development (-12.29%). This negative CAGR shows that foreign investors have shifted their focus from township projects to infrastructure in terms of construction investments. This sectoral allocation is not useful for reducing unemployment. Textiles is a labour-intensive sector that generates 30 jobs per ₹1 crore of investment, which shows stagnant growth in inflows. Meanwhile, services and infrastructure, which create only 2-3 jobs per ₹1 crore, attracted the most FDI. This confirms the jobless growth concept.



## Conclusion

This study evaluates the efficiency of the Make in India initiative by using sectoral as well as macro data, which shows a paradox that there is growth in GDP of a country, but a sharp decline in the foreign investment retention rate in the Indian economy from 2014 to 2025. This shows that the contribution of FDI in growth of India's GDP is questionable. Net FDI to GDP ratio declines from 1.71% to 0.02% in 2024-25. The sectoral allocation shows that there is a huge growth in FDI surge in certain capital-intensive sectors, but a decline in labour-intensive sectors like textiles and chemicals, which can lead to a phenomenon called Jobless growth.

By attracting large investments, India has achieved the first stage of the 3i strategy (Investment) of world bank due to huge investments into infrastructure (Ports/Energy). However, the low growth of FDI inflows in sectors like Chemicals, Textiles & construction development indicates a failure in the second i (infusion of technology). Without achieving the second stage of infusion, the third stage of innovation cannot be achieved, and this will lead India to remain trapped in the middle-income trap.

## References

1. Deshmukh, T. R. (n.d.). Venture Capital and Private Equity in India: An Analysis of Investments and Exits.
2. Group, W. B. (2024). *The Middle Income Trap*. World bank .
3. IBEF. (sep 2024). *Make in India*. India Brand Equity Foundation.
4. Kuran, I. (2024). Are Dependency Theory and Modern World-System Analysis Relevant Today. *POLITIK EKONOMIK KURAM*.
5. LEESON, P. F. (n.d.). THE LEWIS MODEL AND DEVELOPMENT THEORY. *University of Manchester*.
6. PIB. (2024). *2024 Year End Review for Department for Promotion of Industry and Internal Trade*. Press Beaurou of India.
7. Rupinder Kaur, D. V. (2020). FDI AND RENEWABLE ENERGY IN INDIA. *GEDRAG & ORGANISATIE REVIEW*.
8. S. Aravindan, S. P. (2019). FDI Contribution to the Maritime Industry in India. *International Journal of Recent Technology and Engineering (IJRTE)*.
9. Shikha Singh, S. S. (2020). Foreign Direct Investment in the Defence Sector of India: A Review of the Policy Framework. *Indian Journal of finance*.
10. Shrivastava, D. U. (2023). TREND OF FDI INFLOW IN INDIA AND ITS IMPACT ON GDP . *International Journal of Multidisciplinary Educational Research*.
11. Times, T. E. (2024). *The Economic Times*.
12. Times, T. E. (Sep 20, 2025). Manufacturing a key growth engine as India aims for \$35 trillion economy by 2047. *The Economic Times*.



## Original Article

### Agriculture Production in India

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#### Abstract

India is the predominantly an agricultural economy. Agriculture is the backbone of Indian economy. Agriculture, with its allied sectors provide the largest livelihood sector in India. More than 65% of the people depends upon agriculture. It also contributes a significant figure to the gross domestic product (GDP). The agricultural production will ultimately depend on increasing the agricultural productivity. Various studies have been conducted related to agricultural productivity. The present study is conducted with the objective to analyze the trend and patterns of agricultural productivity of food grains. Causes of low productivity, because of agricultural productivity the various schemes started by the government for providing suggestions for policy implications. Data is collected from secondary sources like reports, ministry of agriculture and farmers welfare as well as Reserve Bank of India publications. It was observed that there is a lack of agricultural productivity because of lack of finance and traditional method of agriculture. Suggestions are given for further policy implications for increasing productivity after reviewing causes of low agricultural productivity or downward trends in agricultural production.

**Keywords:** productivity, growth, agriculture, sustainability

#### Introduction

While agriculture's share in India's economy has progressively declined to less than 15% due to the high growth rates of the industrial and services sectors, the sector's importance in India's economic and social fabric goes well beyond this indicator. First, nearly three-quarters of India's families depend on rural incomes. Second, the majority of India's poor (some 770 million people or about 70 percent) are found in rural areas. And third, India's food security depends on producing cereal crops, as well as increasing its production of fruits, vegetables and milk to meet the demands of a growing population with rising incomes. To do so, a productive, competitive, diversified and sustainable agricultural sector will need to emerge at an accelerated pace. India is a global agricultural powerhouse. It is the world's largest producer of milk, pulses, and spices, and has the world's largest cattle herd (buffaloes), as well as the largest area under wheat, rice and cotton. It is the second largest producer of rice, wheat, cotton, sugarcane, farmed fish, sheep & goat meat, fruit, vegetables and tea. The country has some 195 million hectares of cultivation of which some 63 percent are rainfed (roughly 125m ha) while 37 percent are irrigated (70m ha). In addition, forests cover some 65m ha of India's land.

#### Objectives of Agriculture production :

1. **Increasing agricultural production:** To meet the demands of a growing population and non-farm sector
2. **Improving farmers' income and standards of living:** To ensure farmers and farm labourers have higher incomes,
3. **Increasing export earnings:** To increase the production of export-oriented farm products



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- 4. Developing rural markets:** To expand rural markets for industrial products to help to develop both the agricultural and industrial sectors
- 5. Improving per capita income:** To reduce the gap between rural and urban per capita income
- 6. Improving nutritional standards:** To improve nutritional standards to improve the health
- 7. Discouraging rural-to-urban migration:** To reduce migration from rural to urban areas.
- 8. Empowering women:** To economically empower the women.

### Methodology:

Discusses how to use the least amount of inputs to produce a specified level of output.

### Meaning of Agriculture Production :

Agriculture Production is the process of cultivating crops and raising livestock to produce products for human use.

Or

Agriculture production is a series of activities that results in a product of all crops that ultimately sold at retail.

### Definition of agriculture production:

Agricultural production is a cultivating activities that result in a product of various crops will ultimately be sold at retail.

### Functions of agriculture production:

- 1. Food and Fiber:** Agriculture's primary function is to provide food and Fiber.
- 2. Environmental benefits:** Agriculture helps to conserve the land, manage renewable resources, and preserve biodiversity.
- 3. Socio-economic development:** Agriculture can contribute to the economic development of stakeholders, create jobs, and improve nutritional standards.
- 4. Economic empowerment:** Agriculture can help empower women economically.
- 5. Landscape shaping:** Agriculture can shape the landscape.
- 6. Raw materials:** Agriculture provides raw materials for food and other products.
- 7. Trade:** Agriculture can help build strong economies through trade.

### Advantages of agriculture production:

- 1. Food security:** Crop production is the primary way humans get food. It provides food, fiber, and oil for domestic consumption.
- 2. Economic development:** Agriculture is a major source of employment and contributes to global trade.
- 3. Environmental benefits:** Agriculture helps balance the ecosystem by providing food and shelter for animals.
- 4. Soil health:** Crop rotation can improve soil organic matter and water retention, which helps plants and crops grow.
- 5. Nutritional value:** Crop diversity can help improve the nutritional value of food. For example, biofortified orange maize can increase vitamin A stores in the body, and orange-fleshed sweet potatoes can help to reduce disease.
- 6. Contribution to National Income:** Agriculture contributing 28% of national income in the country.
- 7. Source of Revenue to the Government:** Agriculture will bring more revenue to government.

### During different years the average food grains

#### Production in India

Duration	Production
1950-51	58 Lakh million tons
2014-15	252.2 Lakh million tons
2021-22	315.61 Lakh million tons
2022-23	329.68 Lakh million tons
2023-24	3322.98 Lakh million tons

Department of agriculture & farmers welfare releases final estimates of major agricultural crops for 2023-24 record food grains production of 3322.98 Lakh million tons.

### Disadvantages of agriculture production:

- 1. Environmental damage:** Agriculture can cause soil erosion, deforestation, and water pollution. It can also contribute to climate change by emitting greenhouse gases.
- 2. Lack irrigation facilities:** Indian agriculture is facing the problem of irrigation facilities.
- 3. Low Productivity:** An unfortunately Indian agriculture is the very low level of its productivity compare to advanced countries.
- 4. Soil quality:** Over-tillage of soil can erode its quality and reduce its ability to retain water. Soil erosion can lead to the loss of topsoil, which is rich in nutrients for plant growth.



5. **Biodiversity loss:** Monoculture practices can reduce genetic diversity, making crops more susceptible to pests and diseases.
6. **Labor-intensive:** Farmers often work long hours in difficult conditions, which can lead to low wages and poor working conditions.
7. **Health risks:** Agricultural production often relies on hazardous pesticides and fertilizers, which can pose health risks to those who come into contact with them.
8. **Water depletion:** The use of groundwater for tube well irrigation has led to water depletion.
9. **Capital requirements:** Modern farming methods require a great deal of capital.

### Suggestions to improve the agriculture production:

1. **Water management:** Farmers can use innovative irrigation techniques to make the most of available water.
2. **Soil quality:** Soil quality affects the cost of growing plants, as some plants require specific ratios of elements in the soil.
3. **Land tenure:** Land tenure systems can lead to misuse of land, but legal changes can help improve land use.
4. **Precision farming:** Site-specific farm management can help save resources and reduce environmental pollution.
5. **Emerging technologies:** Modern farms use sophisticated technologies like sensors, devices, machines, and information technology.
6. **Sustainable agriculture:** Research and education can help farmers adopt practices that reduce chemical use and conserve resources.
7. **Pest management:** The sterile insect technique is an environmentally-friendly method of managing insect pests.
8. **Education:** Farmers can be educated on farming operations and new cultivation techniques.
9. **Support for small farmers:** Small farmers can be assisted with high-yielding seeds, fertilizers, and modern agricultural practices.

### Discussion:

Agricultural production has always involved the exploitation of resources such as soil, water, and energy. Increasing production to feed a growing world population while at the same time conserving resources for future generations has led to a search for 'sustainable' agricultural methods. Sustainable food production is critical to meet the global food needs it depends climate change and natural resource scarcity. It is also the starting point for a shift toward sustainable, equitable food systems. But in many developing countries, underinvestment in agricultural production means that productivity and farmer incomes remain low, with negative impacts on rural development. Lack of knowledge, capital, labor, or other resources can lead to degradation of the natural resources that support agricultural production. As a result, food production is vulnerable to natural and socio economic shocks.

### Conclusion:

In conclusion, Agriculture has given so much to society. But it has its own pros and cons that we can't overlook. Furthermore, the government is doing his every bit to help in the growth and development of agriculture; still, it needs to do something for the negative impacts of agriculture. To save the environment and the people involved in it. The Indian economy is an agro-economy and depends highly on the agricultural sector. Despite just supporting the Indian Economy, the agricultural sector also supports the industrial sector and international trade in imports and exports. Although the contribution of the Agricultural Sector to the Indian Economy is reducing, it is the sector with the most number of people working in it around the country.

### Reference:

1. <https://www.revenue.state.mn.us/guide/defining-agricultural-production#:~:text=Agricultural%20production%20is%20a%20series,ultimately%20be%20sold%20at%20retail.>
2. The Indian Economy by HRK
3. <https://www.premiumersays.net>
4. <https://solis-yanmar.com>
5. [https:// www.revenue.state.mn.us](https://www.revenue.state.mn.us)
6. <https://www.pib.gov.in>
7. Google, Wikipedia
8. News paper and journals



## Original Article

### Role of Artificial Intelligence (AI) and Machine Learning (ML) in Library Services

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#### Abstract

The transformation of libraries from traditional information repositories to digital knowledge centers has been accelerated by advancements in Artificial Intelligence (AI) and Machine Learning (ML). These technologies enable libraries to manage vast information resources efficiently, automate routine operations, and provide personalized user services. This study aims to examine the role of AI and ML in library services with an in-depth review of literature, detailed analysis, and critical discussion. The study highlights applications, benefits, challenges, and future implications of AI-driven libraries, emphasizing that AI enhances rather than replaces the professional role of librarians.

**Keywords:** Artificial Intelligence, Machine Learning, Smart Libraries, Library Automation, Information Retrieval, Digital Transformation

#### Introduction

Libraries have always played a crucial role in supporting education, research, and lifelong learning. Traditionally, library services relied heavily on manual processes such as cataloguing, classification, circulation, and reference services. However, the rapid growth of digital information, electronic resources, and online users has created challenges related to information overload, service efficiency, and user expectations. Artificial Intelligence refers to the capability of machines to simulate human intelligence such as learning, reasoning, and decision-making. Machine Learning, a subset of AI, enables systems to learn from data patterns and improve their performance over time. When applied to library services, these technologies help in automating technical processes, improving search accuracy, predicting user needs, and delivering personalized information services. The integration of AI and ML has given rise to the concept of smart libraries, which focus on efficiency, accessibility, and user-centric services.

#### Review Of Literature

1. **Breeding (2018)** stated that artificial intelligence is transforming modern libraries by supporting intelligent automation, personalized discovery systems, and smart user interfaces. The study emphasized that AI improves efficiency and service quality without replacing librarians. It highlighted the need for strategic planning and ethical use of AI technologies in library environments. The author concluded that AI strengthens the role of libraries in the digital era.
2. **Cox, Pinfield, and Rutter (2019)** examined the impact of intelligent technologies on academic libraries. Their research revealed that AI-based information retrieval systems enhance search accuracy through natural language processing. The study noted that AI helps libraries provide advanced research support services. The authors also stressed the importance of reskilling librarians for effective AI adoption.
3. **Kumar (2020)** discussed the role of artificial intelligence in library automation and management. The study found that AI improves cataloguing, circulation, and digital reference services by reducing manual errors. It emphasized that automation leads to faster service delivery and better resource management. The author recommended continuous professional training for librarians.



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- Singh (2022)** analyzed the opportunities and challenges of using AI in academic libraries. The study identified issues such as data privacy, ethical concerns, and high implementation costs. However, it concluded that AI offers long-term benefits including improved user satisfaction and operational efficiency. The author suggested strong institutional policies for responsible AI use.
- IFLA (2022)** provided a global perspective on the application of artificial intelligence in libraries. The report emphasized ethical responsibility, transparency, and inclusiveness in AI-based services. It highlighted the role of libraries as trusted intermediaries in digital information ecosystems. The study recommended international standards for AI adoption in libraries.

### Objectives of the Study

The objectives of the study are:

- To examine the concept and evolution of AI and ML in library services
- To analyze various applications of AI and ML in modern libraries
- To study different viewpoints presented in existing literature
- To assess the impact of AI on library users and professionals
- To identify challenges and suggest measures for effective implementation

### Need For the Study

The increasing volume of digital information and changing user behavior demand advanced technologies for efficient library management. Manual and traditional systems are no longer sufficient to meet modern information needs. This study is necessary to understand how AI and ML can solve problems related to information overload, service delays, and limited accessibility. It also helps academic institutions plan future-ready library systems.

### Significance of the Study

The significance of the study lies in its contribution to:

- Understanding emerging trends in library technology
- Helping librarians upgrade professional skills
- Supporting institutional decision-making for smart libraries
- Enriching academic literature in Library and Information Science

### Scope of the Study

The scope of the study includes academic, public, and research libraries. The study focuses on conceptual understanding and secondary data analysis of AI and ML applications in library services. It does not include field surveys or experimental implementation.

### Research Methodology

The study adopts a descriptive and analytical research design.

- Data Source:** Secondary data collected from books, journals, research articles, conference proceedings, and reports
- Method of Analysis:** Qualitative content analysis and comparative interpretation
- Limitations:** Rapid technological changes and absence of primary data

### Data Analysis

The data analysis section interprets the impact of Artificial Intelligence (AI) and Machine Learning (ML) on library services using structured tables and detailed explanations. The data is based on secondary sources and conceptual understanding to reflect trends in modern libraries.

**Table 1: Level of Adoption of AI Tools in Different Types of Libraries**

Type of Library	Level of AI Adoption (%)
Academic Libraries	45
Public Libraries	25
Research Libraries	20
Special Libraries	10

### Interpretation

The table indicates that academic libraries show the highest adoption (45%) of AI technologies. This is mainly due to increased dependence on digital resources, e-journals, online databases, and research analytics. Academic institutions prioritize AI tools to support teaching, learning, and research activities. Public libraries show moderate adoption (25%) because of budget limitations and limited technical infrastructure. Research libraries, despite having advanced requirements, face high implementation costs, resulting in 20% adoption. Special libraries record the lowest adoption (10%) due to their specialized nature and limited user base. Overall, the table highlights that institutional priorities and financial capacity strongly influence AI adoption.

**Table 2: Application Areas of AI and ML in Library Services**

Area of Application	Percentage Usage
Automated Cataloguing & Classification	30
Intelligent Information Retrieval	25
Chatbots & Virtual Reference	20
Recommendation Systems	15
Digital Preservation	10

**Interpretation**

This table shows that automated cataloguing and classification (30%) is the most widely used AI application in libraries. Automation reduces manual workload and ensures consistency in metadata creation. Intelligent information retrieval (25%) improves search accuracy by understanding user intent rather than relying solely on keywords. Chatbots and virtual reference services (20%) are increasingly used to provide 24/7 assistance to users. Recommendation systems (15%) enhance user engagement by suggesting relevant materials, while digital preservation tools (10%) support long-term access to rare and fragile documents. The data suggests that libraries prioritize AI applications that directly improve efficiency and user satisfaction.

**Table 3: User Satisfaction Level after Implementation of AI-Based Services**

Satisfaction Level	Percentage of Users
Highly Satisfied	60
Satisfied	25
Neutral	10
Dissatisfied	5

**Interpretation**

The table clearly indicates a high level of user satisfaction, with 60% of users being highly satisfied and 25% satisfied. This reflects the effectiveness of AI-based services such as faster search results, personalized recommendations, and instant query resolution. A small percentage of users (10%) remain neutral, possibly due to lack of awareness or limited exposure to AI tools. Only 5% of users are dissatisfied, which may be attributed to technical issues or preference for traditional services. Overall, the findings demonstrate that AI integration significantly enhances the user experience in libraries.

**Table 4: Impact of AI on Library Staff Workload**

Nature of Work	Before AI (%)	After AI (%)
Routine Technical Tasks	70	30
User Assistance	20	40
Research Support & Guidance	10	30

**Interpretation**

This table reveals a significant shift in library staff responsibilities after AI implementation. Before AI, librarians spent 70% of their time on routine tasks such as data entry and circulation. After AI adoption, this reduced to 30%, indicating effective automation. User assistance increased from 20% to 40%, showing that librarians now focus more on guiding users. Research support activities increased from 10% to 30%, highlighting the evolving role of librarians as research facilitators. This transformation confirms that AI enhances professional roles rather than replacing librarians.

**Table 5: Cost–Benefit Analysis of AI Implementation in Libraries**

Factor	Traditional System	AI-Based System
Initial Investment	Low	High
Operating Cost	High	Moderate
Service Efficiency	Moderate	High
Long-Term Benefits	Limited	Extensive

**Interpretation**

The table explains the financial implications of AI adoption. Although AI-based systems require high initial investment, their operating costs are moderate due to automation. Traditional systems appear less expensive initially but involve higher long-term operational costs. AI-based systems deliver higher service efficiency and extensive long-term benefits such as improved productivity and data-driven decisions. This analysis suggests that AI adoption is economically viable in the long run despite initial financial challenges.

**Table 6: Challenges Faced in Implementing AI in Libraries**

Challenges	Impact Level
High Implementation Cost	High
Lack of Technical Skills	High
Data Privacy & Security Issues	Moderate
Resistance to Change	Moderate
Infrastructure Limitations	High

### Interpretation

The table highlights key challenges affecting AI adoption in libraries. High implementation costs and lack of technical skills have a high impact, especially in developing regions. Infrastructure limitations further restrict adoption in public and rural libraries. Data privacy and resistance to change pose moderate challenges, requiring awareness and policy measures. The analysis emphasizes the need for training programs, funding support, and ethical guidelines to overcome these barriers.

### Overall Analytical Summary

The six tables collectively demonstrate that AI and ML significantly improve library efficiency, user satisfaction, and staff productivity. While challenges such as cost and skill gaps exist, the long-term benefits of AI integration outweigh the limitations. The data analysis strongly supports the argument that AI-driven libraries are essential for meeting modern information needs.

### Key Findings Of The Study

- AI significantly improves library operational efficiency
- Personalized services increase user satisfaction
- Librarians' roles shift from clerical work to knowledge facilitation
- Ethical and privacy concerns require policy attention
- Long-term benefits outweigh initial investment costs

### Suggestions

1. Libraries should adopt AI technologies in phases
2. Continuous training programs for librarians are essential
3. Ethical guidelines and data protection policies must be enforced
4. Collaboration between librarians and IT experts should be promoted
5. Government support is necessary for public libraries

### Conclusion

Artificial Intelligence and Machine Learning have emerged as transformative forces in library services. They enable libraries to operate more efficiently, provide intelligent services, and meet evolving user expectations. While challenges exist, careful planning, ethical considerations, and professional training can ensure successful AI integration. The future of libraries lies in combining technological intelligence with human expertise.

### References

1. Breeding, M. (2018). *Artificial Intelligence for Libraries*. American Library Association.
2. Cox, A. M., Pinfield, S., & Rutter, S. (2019). *The Intelligent Library*. Library Hi Tech.
3. Kumar, P. S. G. (2020). *Information Technology: Applications in Libraries*.
4. OECD. (2021). *Artificial Intelligence and Digital Transformation*.
5. Singh, S. P. (2022). Applications of AI in Academic Libraries.
6. IFLA Reports on Smart Libraries and Emerging Technologies.



## Original Article

### Electoral Reforms and Democratic Deepening in India: An Analysis of Trends and Challenges

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#### Abstract

*Electoral reforms in India have been central to strengthening democratic governance and ensuring the credibility, inclusiveness, and integrity of the electoral process. Since the inception of universal adult franchise in 1950, India's electoral system has undergone a series of legal, institutional, and procedural reforms aimed at enhancing transparency, reducing malpractices, and fostering broader democratic participation. This article examines the evolution of significant electoral reforms in India from 1951 to the present, situating them within the broader framework of democratic deepening. It critically analyzes key interventions including reforms in campaign finance regulation, the delimitation of constituencies, the introduction of Electronic Voting Machines (EVMs), the role of the Election Commission of India (ECI) in enforcing the Model Code of Conduct, voter registration drives, and the implementation of the NOTA option highlighting their contributions and limitations in strengthening electoral integrity and citizen representation. Drawing upon qualitative analysis of policy documents, election data, and scholarly literature, this study identifies recurrent challenges that continue to undermine democratic deepening. These include persistent issues of money and muscle power in elections, the need for more effective regulation of political parties and electoral funding, concerns over the misuse of administrative resources, and rising disinformation in electoral communication. The paper also explores contemporary debates concerning judicial interventions the timing and fairness of delimitation. The article concludes by proposing a set of policy recommendations such as strengthening the autonomy and capacity of the ECI, instituting robust electoral finance reforms, enhancing voter education, and fostering greater transparency in party financing as imperative for advancing democratic deepening in India's electoral polity. This analysis contributes to ongoing scholarly and policy discussions on the interplay between institutional reform and democratic consolidation in one of the world's largest democracies.*

**Keywords:** Electoral Reforms; Democratic Deepening; Indian Democracy; Election Commission of India; Electoral Integrity; Political Participation; Campaign Finance; Electoral Governance and Democratic Consolidation.

#### Introduction

Elections constitute the foundational mechanism through which democratic legitimacy is established and sustained in modern political systems. In a diverse and populous country like India, the conduct of free, fair, and credible elections is central not only to representative governance but also to the broader process of democratic deepening. Since the adoption of the Constitution of India in 1950 and the introduction of universal adult franchise, India has pursued an ambitious democratic experiment marked by periodic electoral participation, institutional continuity, and political competition. Electoral reforms have emerged as a crucial instrument in this process, aimed at strengthening electoral integrity, enhancing political accountability, and expanding citizen participation. The Indian electoral system, governed primarily by the Representation of the People Acts of 1950 and 1951, has undergone significant reforms in response to evolving political, social, and technological challenges. These reforms have sought to address systemic deficiencies such as electoral malpractices, criminalization of politics, misuse of money and state resources, and barriers to voter participation.

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The increasing complexity of electoral competition, combined with socio-economic inequalities and the rise of mass media and digital platforms, has further intensified the demand for comprehensive and effective electoral reforms.

Democratic deepening extends beyond the mere conduct of periodic elections and emphasizes the quality of participation, inclusiveness, accountability, and substantive representation. In this context, electoral reforms serve not only procedural objectives but also normative democratic goals. Institutional measures such as the strengthening of the Election Commission of India, enforcement of the Model Code of Conduct, introduction of Electronic Voting Machines, expansion of voter registration, and the provision of the NOTA option have been designed to enhance public trust and participation in the electoral process. However, the extent to which these reforms have translated into deeper democratic outcomes remains a subject of scholarly debate. Despite notable advancements, persistent challenges continue to constrain democratic deepening in India. The growing influence of money and muscle power, opaque political financing, criminalization of candidates, unequal access to political competition, and the spread of misinformation pose serious threats to electoral fairness and democratic equality. These challenges highlight the limitations of existing reforms and underscore the need for a critical evaluation of both their effectiveness and unintended

### Objectives of the Study

1. To examine the evolution and key trends of electoral reforms in India since the adoption of universal adult franchise.
2. To analyze the role of electoral reforms in promoting democratic deepening through enhanced participation, transparency, and accountability.
3. To assess the effectiveness of major institutional and legal reforms in ensuring free, fair, and credible elections in India.
4. To identify the persistent challenges limiting the impact of electoral reforms, including money power, criminalization, and unequal political competition.
5. To evaluate the contribution of technological and administrative reforms to electoral integrity and voter confidence.

### Methodology

This study is based exclusively on secondary data and adopts a qualitative and analytical research design. Data were collected from academic books and journals, Election Commission of India reports, government publications, legal documents, and other credible secondary sources. The collected data were thematically analyzed to examine trends and challenges in electoral reforms and their implications for democratic deepening in India.

### Review of Literature

1. P. S. Aithal (2017), in *Democracy and Governance in India: Issues and Challenges* (Srinivas Publications, Mangaluru), analyzed governance challenges and institutional accountability, emphasizing the role of electoral reforms in strengthening democratic outcomes.
2. D. D. Basu (2018), in *Introduction to the Constitution of India* (LexisNexis, Bengaluru), examined the constitutional and legal framework of Indian elections and highlighted the importance of electoral laws in ensuring free and fair democratic processes.
3. A. R. Kamat (2010), in *Indian Democracy: Structure and Process* (University of Mysore Press, Mysuru), studied the structural dimensions of Indian democracy and stressed the significance of electoral participation for democratic stability.
4. H. M. Krishna (2016), in *Electoral Politics and Democratic Processes in India* (Bangalore University Press, Bengaluru), focused on electoral behavior and party competition, identifying electoral reforms as key determinants of democratic quality.
5. D. M. Nanjundappa (2001), in *Development Disparities in Karnataka* (Government of Karnataka, Bengaluru), highlighted the impact of socio-economic and regional inequalities on political participation and democratic deepening.

### Trends in Electoral Reforms in India

Electoral reforms in India have evolved gradually in response to the changing dynamics of political competition, administrative challenges, and democratic expectations. Since independence, reforms have largely focused on strengthening institutional capacity, enhancing transparency, and improving the efficiency and credibility of the electoral process. These reforms reflect an ongoing effort to adapt India's electoral system to the demands of a large, diverse, and increasingly complex democracy. One significant trend has been the institutional strengthening of the Election Commission of India (ECI). Through constitutional backing and judicial support, the ECI has emerged as a powerful and autonomous body responsible for ensuring free and fair elections. The rigorous enforcement of the Model Code of Conduct, monitoring of election expenditure, and supervision of electoral administration have contributed to greater neutrality and discipline during elections. Judicial interventions have further reinforced the authority of the ECI in regulating electoral practices.

Technological innovation represents another important trend in electoral reforms. The introduction and nationwide adoption of Electronic Voting Machines marked a major shift in election management, aimed at reducing invalid votes and minimizing electoral malpractices. Subsequent reforms such as voter-verifiable paper audit trails and digitization of electoral rolls have enhanced transparency and voter confidence. Technology has also been used to improve voter registration and election logistics, making the process more accessible and efficient. Legal and regulatory reforms have focused on increasing transparency and accountability in the electoral process. Mandatory disclosure of candidates' criminal records, assets, and liabilities has strengthened public scrutiny and informed voter choice. Expenditure limits and reporting requirements have been introduced to regulate campaign spending, although their effectiveness remains contested. Reforms related to disqualification of legislators and anti-defection measures have also aimed at preserving the integrity of representative institutions.

Overall, the trends in electoral reforms in India indicate a strong emphasis on procedural improvements and institutional capacity-building. While these reforms have enhanced the credibility and efficiency of elections, they have had limited success in addressing deeper structural issues such as political inequality and the influence of money and muscle power. This underscores the need for a more comprehensive and outcome-oriented reform agenda to achieve meaningful democratic deepening.

### **Electoral Reforms and Democratic Deepening**

Electoral reforms play a crucial role in the process of democratic deepening by strengthening the quality, inclusiveness, and accountability of democratic governance. Democratic deepening extends beyond the mere conduct of periodic elections and emphasizes meaningful political participation, institutional responsiveness, and substantive representation. In the Indian context, electoral reforms have been designed not only to ensure free and fair elections but also to enhance public trust in democratic institutions and expand citizen engagement in the political process. One of the most significant contributions of electoral reforms to democratic deepening in India has been the strengthening of procedural democracy. Reforms aimed at improving election management, such as the autonomy of the Election Commission of India, enforcement of the Model Code of Conduct, and transparent electoral procedures, have enhanced the credibility of elections. These measures have ensured greater administrative neutrality and reduced overt electoral malpractices, thereby reinforcing public confidence in the democratic process.

Electoral reforms have also contributed to increased political participation, a key dimension of democratic deepening. Improvements in voter registration, systematic electoral rolls, and targeted voter awareness programs have expanded electoral inclusion. The introduction of technological innovations, such as Electronic Voting Machines and voter-verifiable paper audit mechanisms, has further facilitated participation by making the voting process more accessible and efficient. Higher voter turnout in recent elections, particularly among women and marginalized groups, reflects the positive impact of these reforms on participatory democracy. The democratic deepening requires not only broad participation but also political equality and meaningful representation. In this regard, the impact of electoral reforms in India has been uneven. While procedural improvements have strengthened the conduct of elections, structural inequalities in political competition persist. The influence of money power, criminalization of politics, and unequal access to media and organizational resources continue to shape electoral outcomes. These factors limit the ability of electoral reforms to translate procedural fairness into substantive democratic equality.

The electoral reforms have had limited success in strengthening accountability and responsiveness beyond election periods. Although measures such as candidate disclosures and anti-defection laws aim to enhance accountability, their enforcement has often been weak. As a result, electoral reforms have contributed more effectively to the stability and continuity of democratic institutions than to deeper transformations in political behavior and representation. Electoral reforms in India have played an important role in advancing democratic deepening by improving electoral integrity, participation, and institutional credibility. However, their impact has largely remained confined to procedural dimensions of democracy. For electoral reforms to contribute meaningfully to substantive democratic deepening, they must address underlying structural challenges and promote greater political equality, transparency, and accountability within the democratic system.

### **Challenges and Limitations**

Despite continuous efforts at electoral reform, several structural and institutional challenges continue to limit the depth and quality of democracy in India. While reforms have improved the procedural conduct of elections, their capacity to address deeper democratic deficits remains constrained by political, economic, and social factors. One of the most persistent challenges is the dominance of money power in electoral politics. Escalating campaign costs, inadequate regulation of political finance, and limited transparency in party funding have created unequal conditions of political competition. Candidates and parties with greater financial resources enjoy significant advantages in mobilization, media access, and outreach, thereby undermining the principle of political equality and weakening democratic deepening. The criminalization of politics constitutes another major limitation of electoral reforms. Despite legal provisions mandating the disclosure of criminal records and judicial interventions aimed at curbing the entry of candidates with criminal backgrounds, individuals facing serious charges continue to contest and win elections. This trend erodes public trust in democratic institutions and compromises the ethical foundations of representative

democracy. Institutional limitations also constrain the effectiveness of electoral reforms. Although the Election Commission of India has been empowered to regulate electoral processes, its authority over political parties and campaign finance remains limited. Delays in enforcement, dependence on other state agencies, and legal ambiguities often weaken the implementation of reform measures. Consequently, the gap between reform objectives and outcomes persists. Emerging challenges related to technology and political communication further complicate the reform landscape. The rapid expansion of social media and digital campaigning has increased the spread of misinformation, hate speech, and unregulated political advertising. Existing electoral laws and regulatory mechanisms have struggled to keep pace with these developments, raising concerns about electoral fairness and informed voter choice.

Finally, the reliance of this study on secondary data presents certain methodological limitations. The analysis is constrained by the availability, reliability, and scope of existing sources, which may not fully capture recent or localized electoral dynamics. Nevertheless, the use of diverse and credible secondary materials provides a robust basis for analytical interpretation. Overall, these challenges and limitations highlight the need for comprehensive, enforceable, and outcome-oriented electoral reforms that address both procedural and structural dimensions of democracy in India.

## Discussion, Result and Analysis

The analysis of electoral reforms in India indicates that these reforms have played a significant role in strengthening the procedural foundations of democracy. Institutional measures, particularly the enhanced authority of the Election Commission of India, have improved the credibility, neutrality, and administrative efficiency of the electoral process. Technological innovations and systematic voter registration initiatives have further contributed to greater electoral participation and public confidence in elections. These developments demonstrate the capacity of electoral reforms to sustain democratic continuity in a large and diverse political system. The contribution of electoral reforms to democratic deepening remains uneven. While increased voter participation reflects improved access and inclusion, substantive democratic outcomes such as political equality and fair competition continue to be constrained. The persistent influence of money power and the criminalization of politics undermine the effectiveness of existing reforms and distort the electoral arena. Moreover, unequal access to resources and media limits meaningful political competition, reducing the transformative impact of electoral reforms. The analysis also highlights emerging challenges associated with digital campaigning and political communication. The spread of misinformation and unregulated online political advertising has exposed regulatory gaps within the electoral framework. These challenges underscore the need for reforms that go beyond procedural efficiency and address evolving democratic concerns. Overall, electoral reforms in India have strengthened procedural democracy, but deeper and more comprehensive reforms are essential for achieving substantive democratic deepening.

## Findings and Recommendations

1. Electoral reforms in India have significantly improved the procedural conduct and credibility of elections through institutional and administrative strengthening.
2. The Election Commission of India has played a decisive role in ensuring electoral integrity, transparency, and enforcement of electoral norms.
3. Technological and voter-centric reforms have contributed to higher electoral participation and greater public confidence in the voting process.
4. Despite continuous reforms, money power and criminalization remain major obstacles to fair political competition and democratic equality.
5. Electoral reforms have largely emphasized procedural efficiency, with limited impact on substantive democratic deepening.

## Recommendations

1. Comprehensive reforms in campaign finance are necessary to enhance transparency and reduce the influence of money in electoral politics.
2. Stronger legal and institutional measures should be implemented to effectively curb the criminalization of politics.
3. The autonomy, capacity, and regulatory authority of the Election Commission of India should be further strengthened.
4. Electoral laws must be updated to address challenges posed by digital campaigning, misinformation, and unregulated political communication.
5. Sustained voter education and civic awareness initiatives are essential for promoting informed participation and democratic accountability.

## Conclusion

Electoral reforms have been central to sustaining and strengthening India's democratic framework by enhancing the credibility, efficiency, and inclusiveness of the electoral process. Over the decades, reforms related to election management, institutional autonomy, technological innovation, and voter participation have contributed to the consolidation of procedural democracy. The role of the Election Commission of India and the introduction of



administrative and technological measures have been particularly significant in ensuring free and fair elections in a complex and diverse political environment.

The study demonstrates that the contribution of electoral reforms to democratic deepening has remained limited and uneven. While procedural improvements have strengthened electoral integrity and participation, deeper structural challenges such as the dominance of money power, criminalization of politics, unequal political competition, and emerging digital threats continue to undermine substantive democratic outcomes. These limitations reveal a gap between electoral processes and the broader goals of political equality, accountability, and meaningful representation.

The paper concludes that electoral reforms in India must move beyond a narrow focus on procedural efficiency and address the underlying socio-political and institutional constraints that shape electoral competition. Comprehensive, enforceable, and outcome-oriented reforms are essential for ensuring that elections not only remain free and fair but also contribute meaningfully to democratic deepening and consolidation in India.

## Bibliography

1. Aithal, P. S. (2017). *Democracy and Governance in India: Issues and Challenges*. Srinivas Publications, Mangaluru.
2. Basu, D. D. (2018). *Introduction to the Constitution of India (24th ed.)*. LexisNexis, Bengaluru.
3. Bhaskar, G. (2015). *Indian Political System and the Constitution*. Sapna Book House, Bengaluru.
4. Hegde, G. S. (2012). *Indian Government and Politics*. Kalyani Publishers, Bengaluru.
5. Kamat, A. R. (2010). *Indian Democracy: Structure and Process*. University of Mysore Press, Mysuru.
6. Karnataka State Election Commission. (Various Years). *Reports on Local Body Elections*. KSEC, Bengaluru.
7. Krishna, H. M. (2016). *Electoral Politics and Democratic Processes in India*. Bangalore University Press, Bengaluru.
8. Maheshwari, S. R. (2014). *Indian Administration*. Orient Blackswan, Bengaluru.
9. Nanjundappa, D. M. (2001). *Development Disparities in Karnataka*. Government of Karnataka, Bengaluru.
10. Rajashekara, H. (2018). *Democracy, Elections and Political Participation in India*. Karnatak University Press, Dharwad.
11. Shivakumar, H. R. (2019). *Indian Political Institutions and Processes*. Sapna Book House, Bengaluru.
12. Somashekar, N. (2014). *Indian Democracy and Electoral Reforms*. Prasaranga, University of Mysore, Mysuru.
13. State Institute for Electoral Management, Karnataka. (2020). *Voter Education and Electoral Participation in Karnataka*. SIEKM, Bengaluru.
14. Umapathy, M. S. (2013). *Political Participation and Electoral Behaviour in India*. Kuvempu University Press, Shivamogga.
15. Yadava, K. N. (2011). *Electoral Politics in India*. Prasaranga, Gulbarga University, Kalaburagi.



## Original Article

### Wigs before Writs India after 1947: Challenges, Changes and Continuities of the India's Judiciary

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#### Abstract

*This paper analyses the evolution of India's judicial system across the pre-colonial, colonial, and post-Independence periods through the interrelated themes of change, continuity, and challenge. It examines how indigenous systems of justice, grounded in customary law and community-based dispute resolution, were transformed under British colonial rule into a centralised and codified legal framework designed to serve imperial governance. Following Independence in 1947, India adopted this inherited structure within a constitutional democracy, fundamentally reshaping the role of the judiciary through judicial review, the protection of fundamental rights, the Basic Structure doctrine, and the expansion of Public Interest Litigation. Despite these transformative constitutional developments, significant continuities persist in legal procedures, institutional hierarchies, and colonial-era laws. The paper argues that India's judicial development reflects a layered and adaptive process in which constitutional reform coexists with enduring historical legacies, while ongoing challenges such as judicial delay and access to justice continue to shape its functioning.*

**Keywords:** Indian Judiciary, Colonial Legacy, Constitutionalism, Judicial Review, Access to Justice

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#### Introduction

Long before the advent of British colonial rule, the Indian subcontinent possessed a sophisticated and pluralistic system of law and justice.<sup>1</sup> Governance and dispute resolution in the region known historically as *Bharata*, *Hindustan*, or the *Indian subcontinent* were not dependent on a single central authority, but instead functioned through a combination of royal courts, local assemblies, guild-based adjudication, and religious-legal traditions. Law was deeply embedded in social, economic, and moral life, and justice was primarily restorative rather than punitive in nature. In the pre-colonial period, dispute resolution operated at multiple levels. At the village level, councils such as *sabhas* and *panchayats* adjudicated civil disputes relating to land, family matters, debts, and local commerce.<sup>2</sup> Trade and commercial activity across the subcontinent and beyond was extensive, necessitating reliable mechanisms for resolving mercantile disputes. Guilds (*shrenis*) played a central role in regulating trade practices, enforcing contracts, resolving disputes among merchants, and maintaining commercial ethics.<sup>3</sup> Trade and commercial activity across the subcontinent and beyond was extensive, necessitating reliable mechanisms for resolving mercantile disputes. Guilds (*shrenis*) played a central role in regulating trade practices, enforcing contracts, resolving disputes among merchants, and maintaining commercial ethics.<sup>4</sup>



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<sup>1</sup> Radhakrishnan, S. *Indian Philosophy*, Vol. I. London: George Allen & Unwin, 1951.

<sup>2</sup> Derrett, J. Duncan M. *Religion, Law and the State in India*. London: Faber and Faber, 1968.

<sup>3</sup> Basham, A. L. *The Wonder That Was India*. London: Sidgwick & Jackson, 1954.

<sup>4</sup> Basham, A. L. *The Wonder That Was India*. London: Sidgwick & Jackson, 1954.

Trade and commercial activity across the subcontinent and beyond was extensive, necessitating reliable mechanisms for resolving mercantile disputes. Guilds (*shrenis*) played a central role in regulating trade practices, enforcing contracts, resolving disputes among merchants, and maintaining commercial ethics.<sup>5</sup> These guilds functioned as autonomous legal entities whose decisions were recognised by rulers and local authorities. Maritime trade networks linking the subcontinent with West Asia, Southeast Asia, and Africa also relied on established customs, trust-based credit systems, and arbitration practices to resolve cross-border disputes,<sup>6</sup> demonstrating the presence of an advanced commercial legal culture.

Justice in the pre-colonial era was thus decentralised, pluralistic, and context-sensitive. Legal authority flowed from social acceptance and moral legitimacy rather than codified statutes. While this system lacked uniformity in the modern sense, it was the modern judiciary did not emerge in a historical vacuum but was shaped by the layered interaction between indigenous legal traditions, colonial legal structures, and constitutional ideals.

### Colonial Intervention and the Reconfiguration of the Judicial System

The arrival of European trading companies in the Indian subcontinent marked a gradual but decisive shift in the nature of legal authority and dispute resolution. What began as mercantile engagement under the Mughal and regional sovereigns evolved into territorial control, with the English East India Company assuming administrative and judicial functions.<sup>7</sup> This transition fundamentally altered existing legal practices, replacing plural and community-oriented systems with a centralised framework tailored to colonial governance.

In the early phase of Company rule, judicial administration was fragmented and experimental. The Company initially relied on indigenous legal officers, such as *qazis* and *pandits*, to apply Islamic and Hindu laws in matters concerning personal status,<sup>8</sup> while Company officials presided over revenue and commercial disputes. However, the primary objective of these arrangements was not justice delivery but the efficient extraction of revenue and maintenance of order. Gradually, the Company asserted greater control over adjudication, culminating in the establishment of formal courts under the Regulating Act of 1773 and the subsequent judicial plans of Warren Hastings and Cornwallis.<sup>9</sup>

The colonial legal system was characterised by codification, procedural rigidity, and the introduction of adversarial litigation. English legal principles were selectively transplanted into the subcontinent, resulting in uniform laws that often disregarded local customs and socio-economic realities. The establishment of Supreme Courts in presidency towns and later High Courts under the Indian High Courts Act, 1861, entrenched a hierarchical judiciary<sup>10</sup> staffed predominantly by British judges trained in English law. Indigenous mechanisms such as village councils and guild adjudication were marginalised, their authority diminished or rendered informal.

Codified statutes such as the Indian Penal Code, the Code of Civil Procedure, and the Code of Criminal Procedure exemplified the colonial emphasis on legal certainty and administrative control.<sup>11</sup> While these enactments introduced consistency and predictability, they also alienated large sections of the population by privileging technical compliance over substantive justice. Access to courts became costly and complex, reinforcing social and economic hierarchies.

Thus, colonial rule did not merely reform existing legal institutions but reoriented the very purpose of the judiciary.<sup>12</sup> Justice became an instrument of governance rather than a community-centred process. This colonial legacy would later pose significant challenges for the post-Independence judiciary, which inherited both the institutional framework and the procedural culture established during this period.

### Towards Constitutional Governance: Late Colonial Developments and the Making of a New Polity

The foundations of constitutional governance in the Indian subcontinent were laid during the final decades of British rule, as rising political mobilisation compelled the colonial administration to introduce limited constitutional reforms. The Government of India Acts of 1909, 1919, and 1935 expanded legislative representation and articulated early federal principles, while retaining imperial control.<sup>13</sup> Despite their constraints, these measures familiarised nationalist leaders with constitutional processes and legislative governance.

<sup>5</sup> Basham, A. L. *The Wonder That Was India*. London: Sidgwick & Jackson, 1954.

<sup>6</sup> Chaudhuri, K. N. *Trade and Civilisation in the Indian Ocean*. Cambridge: Cambridge University Press, 1985.

<sup>7</sup> Marshall, P. J. *The Making and Unmaking of Empires: Britain, India, and America c.1750–1783*. Oxford: Oxford University Press, 2005.

<sup>8</sup> Derrett, J. Duncan M. *Religion, Law and the State in India*. London: Faber and Faber, 1968.

<sup>9</sup> Jain, M. P. *Outlines of Indian Legal History*. 7th ed. New Delhi: LexisNexis, 2014.

<sup>10</sup> Cohn, Bernard S. *Colonialism and Its Forms of Knowledge: The British in India*. Princeton: Princeton University Press, 1996.

<sup>11</sup> Singha, Radhika. *A Despotism of Law: Crime and Justice in Colonial India*. Delhi: Oxford University Press, 1998.

<sup>12</sup> Baxi, Upendra. *The Indian Supreme Court and Politics*. Lucknow: Eastern Book Company, 1980.

<sup>13</sup> Jain, M. P. *Outlines of Indian Legal History*. 7th ed. New Delhi: LexisNexis, 2014.

The appointment of the Simon Commission in 1927, composed entirely of British members, marked a decisive break in colonial–nationalist relations. Its exclusion of indigenous representation triggered widespread protest and reinforced demands for a constitution framed by the people of the subcontinent.<sup>14</sup> The rejection of externally imposed constitutional models strengthened claims to constitutional sovereignty.

The path to independence was further shaped by communal negotiations culminating in the Partition of British India in 1947. The creation of two dominions, India and Pakistan, involved large-scale displacement and violence, profoundly influencing constitutional priorities relating to unity, minority protection, and federal design.<sup>15</sup> Simultaneously, ideological differences within the nationalist movement—most notably between Mahatma Gandhi and Dr. B. R. Ambedkar—shaped debates on social justice. While Gandhi emphasised moral reform and decentralised governance, Ambedkar prioritised legal safeguards and constitutional remedies for marginalised communities, resulting in a framework that combined ethical ideals with enforceable rights.<sup>16</sup>

Following independence, the integration of princely states through accession and negotiation transformed a fragmented political landscape into a unified constitutional polity.<sup>17</sup> The formal adoption of the name “India” affirmed sovereignty while rearticulating historical identity within a democratic framework. The Constituent Assembly, convened in 1946, drafted a detailed Constitution through extensive deliberation, drawing upon comparative models while remaining attentive to local conditions. Adopted in 1950, the Constitution established parliamentary governance, an independent judiciary, fundamental rights, directive principles, and a clear distribution of powers. Although this marked a shift from colonial legality to popular sovereignty, the institutions tasked with implementing the Constitution continued to reflect colonial structures,<sup>18</sup> setting the stage for enduring patterns of change and continuity within the post-Independence judiciary.

### The Shaping of Judicial Review

Despite the adoption of a transformative Constitution in 1950, the judicial system of independent India retained significant continuities from the colonial legal order.<sup>19</sup> These continuities were neither accidental nor merely residual; they were consciously preserved to ensure administrative stability, legal certainty, and institutional continuity during the transition from imperial rule to constitutional governance. The Supreme Court of India, though constitutionally novel, emerged within a legal culture deeply shaped by colonial practices, procedures, and interpretative methods.

One of the most enduring continuities lies in procedural law. Colonial enactments such as the Code of Civil Procedure, the Code of Criminal Procedure, and the Indian Penal Code continued to govern adjudication after independence, subject to constitutional scrutiny.<sup>20</sup> The adversarial system, rules of evidence, courtroom hierarchy, and professional legal training reflected English common law traditions. These procedural inheritances significantly influenced how judicial review would later be exercised—emphasising precedent, reasoned judgments, and textual interpretation.

Judicial review itself, while constitutionally entrenched, bears the imprint of colonial legal thinking. Under British rule, courts had exercised limited powers to review administrative action, primarily to ensure compliance with statutory authority. This conception evolved in the post-Independence period into a broader power enabling constitutional courts to examine legislative and executive action.<sup>21</sup> The framers deliberately expanded this function while retaining the common law method of interpretation, thereby blending constitutional supremacy with inherited judicial techniques.

The comparative foundations of judicial review in India further reflect selective borrowing rather than wholesale adoption. The power of courts to strike down unconstitutional laws was inspired by the American model, while the structure and functioning of the Supreme Court drew upon British judicial traditions.<sup>22</sup> Federal features, including the distribution of legislative powers, were influenced by Canadian and Australian constitutional arrangements. These borrowings were adapted to local conditions through extensive deliberation rather than imitation. Central to this process was B. N. Rau, Constitutional Adviser to the Constituent Assembly, who played a pivotal role in

<sup>14</sup>Brown, Judith M. *Modern India: The Origins of an Asian Democracy*. 2nd ed. Oxford: Oxford University Press, 1994.

<sup>15</sup>Talbot, Ian, and Gurharpal Singh. *The Partition of India*. Cambridge: Cambridge University Press, 2009.

<sup>16</sup>Ambedkar, B. R. *Annihilation of Caste*. Bombay: Thacker & Co., 1936; Gandhi, M. K. *Hind Swaraj*. Ahmedabad: Navajivan Publishing House, 1938.

<sup>17</sup>Menon, V. P. *The Story of the Integration of the Indian States*. Bombay: Orient Longmans, 1956.

<sup>18</sup>Austin, Granville. *The Indian Constitution: Cornerstone of a Nation*. Oxford: Oxford University Press, 1966.

<sup>19</sup>Id.

<sup>20</sup>Jain, M. P. *Indian Constitutional Law*. 8th ed. New Delhi: LexisNexis, 2018.

<sup>21</sup>Seervai, H. M. *Constitutional Law of India*, Vol. I. 4th ed. New Delhi: Universal Law Publishing, 1991.

<sup>22</sup>Dicey, A. V. *Introduction to the Study of the Law of the Constitution*. London: Macmillan, 1915; Wheare, K. C. *Federal Government*. Oxford: Oxford University Press, 1963.



synthesising comparative constitutional ideas.<sup>23</sup> Rau engaged with constitutional experts abroad, studied foreign judicial systems, and translated these influences into a framework suited to India's socio-political realities. His emphasis on judicial independence, review powers, and procedural clarity shaped the architecture of the Supreme Court.

Leaders such as Jawaharlal Nehru and later constitutional thinkers including P. V. Narasimha Rao, who engaged deeply with constitutional governance and institutional reform, contributed to sustaining the constitutional vision within an evolving political landscape. Their roles underscore how constitutional continuity extended beyond the founding moment into the operational life of the judiciary.<sup>24</sup>

Thus, the post-Independence judiciary represents a complex synthesis. While empowered by a transformative Constitution to act as the guardian of fundamental rights, the Supreme Court operates within a legal framework that retains colonial-era structures, procedures, and interpretative traditions. This continuity has enabled institutional stability while simultaneously generating tensions between inherited legal form and constitutional purposes that continue to define the scope and practice of judicial review in India.

## Enduring Presence of Colonial Laws and Judicial Practices

The post-Independence legal landscape in India reflects a complex interplay between legislative change and inherited colonial structures. While recent reforms signal a move towards indigenisation, a substantial portion of the legal system continues to operate within frameworks introduced during British rule.<sup>25</sup> These continuities extend beyond statutes to encompass procedural norms, courtroom rituals, professional culture, and institutional hierarchy.

Several colonial-era laws have been repealed or replaced to address changing social realities and constitutional values. Apart from the replacement of the Indian Penal Code, the Code of Criminal Procedure, and the Indian Evidence Act with the Bharatiya Nyaya Sanhita, Bharatiya Nagarik Suraksha Sanhita, and Bharatiya Sakshya Adhiniyam, other significant colonial enactments have been amended or discarded over time.<sup>26</sup> The Companies Act has undergone multiple revisions to shift corporate regulation from imperial commercial interests to modern economic governance. Similarly, labour laws originally designed to regulate colonial industries have been consolidated into new labour codes. Land revenue laws, forest regulations, and tenancy statutes have also been reworked, though often retaining their structural logic.<sup>27</sup>

At the same time, a large number of colonial laws remain operative, either in original or modified form. Statutes such as the Code of Civil Procedure, the Indian Contract Act, the Transfer of Property Act, the Easements Act, and the Specific Relief Act continue to govern private law relations.<sup>28</sup> These enactments were drafted to facilitate colonial commerce and property relations, yet they remain central to contemporary civil litigation. Their endurance reflects both functional effectiveness and institutional inertia, raising questions about the extent to which decolonisation of law has been substantive rather than symbolic.<sup>29</sup>

Beyond legislation, the persistence of British judicial practices is particularly visible in the everyday functioning of Indian courts. The adversarial trial system, reliance on common law precedents, and the hierarchical court structure replicate English judicial models.<sup>30</sup> Courtroom decorum, formal modes of address, and the ceremonial authority of judges mirror colonial traditions. In several High Courts, the practice of a court officer or orderly announcing the arrival of judges and directing all present to rise is a ritual inherited directly from British court customs. The use of black robes, structured court etiquette, and English legal terminology further underscores this continuity.

Even judicial training and professional culture reflect colonial influence. Legal education remains rooted in common law reasoning, case analysis, and precedent-based argumentation. The dominance of English as the language of higher judiciary proceedings reinforces the colonial legacy within legal discourse, often limiting accessibility for non-English-speaking litigants.<sup>31</sup>

<sup>23</sup> Rau, B. N. *India's Constitution in the Making*. Bombay: Allied Publishers, 1960.

<sup>24</sup> Austin, Granville. *Working a Democratic Constitution: The Indian Experience*. Oxford: Oxford University Press, 1999.

<sup>25</sup> Law Commission of India, *Review of the Relevance of Colonial Laws in Independent India*, Report No. 248 (2014).

<sup>26</sup> Government of India, Ministry of Law and Justice, *Statement of Objects and Reasons*, Bharatiya Nyaya Sanhita Bill, 2023.

<sup>27</sup> Planning Commission of India, *Land Reforms in India: An Overview*, Government of India, 2008.

<sup>28</sup> Supreme Court of India, *Salem Advocate Bar Association v. Union of India* (2005) 6 SCC 344.

<sup>29</sup> Baxi, Upendra, "The Colonial Heritage of Indian Law," in *Law and Poverty: Critical Essays*, New Delhi: Eastern Book Company, 1988.

<sup>30</sup> Galanter, Marc, "The Displacement of Traditional Law in Modern India," *Journal of Social Issues* 24, no. 4 (1968): 65-91.

<sup>31</sup> Menon, N. R. Madhava, *Justice Delivery in India: A Vision for the Future*, New Delhi: Oxford University Press, 2010.

These retained practices coexist with constitutional ideals of equality, accessibility, and democratic accountability. While they provide continuity and institutional stability, they also invite critical examination regarding their relevance in a post-colonial constitutional order. The coexistence of reformed statutes with colonial-era procedures illustrates that legal change in India has been evolutionary rather than revolutionary.<sup>32</sup>

In this sense, the Indian judiciary embodies a paradox: it is constitutionally empowered to protect rights and uphold democratic values, yet it continues to operate within structures, rituals, and methods shaped by colonial governance. Understanding this duality is essential to evaluating both the achievements and limitations of judicial reform in contemporary India.

## Judiciary and Development: Towards 2047

The aspiration of *Viksit Bharat 2047* provides a useful analytical lens through which contemporary institutional frameworks may be examined, particularly in relation to governance, equity, and sustainable progress.<sup>33</sup> Within this broader vision, the legal system occupies a foundational position, as its effectiveness directly influences economic confidence, social inclusion, and institutional accountability.<sup>34</sup> However, certain enduring challenges continue to shape its functioning in the present era.

Judicial delay and procedural complexity remain central concerns.<sup>35</sup> The accumulation of pending cases affects not only individual litigants but also commercial certainty and public trust in institutions. From a developmental perspective, prolonged adjudication may indirectly constrain innovation, entrepreneurship, and equitable access to opportunities.<sup>36</sup> These concerns acquire greater relevance in a rapidly evolving socio-economic environment that increasingly relies on timely legal intervention.

Another dimension relates to the coexistence of constitutional ideals with inherited legal practices.<sup>37</sup> While continuity has ensured stability, it has also resulted in procedural formalism and symbolic remnants that may not fully align with contemporary expectations of accessibility and inclusiveness. The gradual integration of technology within judicial processes reflects an attempt to address these concerns,<sup>38</sup> though disparities in access and digital capability highlight the need for balanced and context-sensitive approaches.<sup>39</sup>

At the same time, emerging areas such as technology governance, commercial regulation, and sports administration underscore the growing interconnection between law, innovation, and social development. These domains demand regulatory clarity and institutional responsiveness without compromising principles of fairness and equity.<sup>40</sup> The role of interdisciplinary research, drawing from social sciences and allied fields, becomes particularly significant in understanding and addressing such complexities.<sup>41</sup>

Viewed in this manner, the challenges faced by the legal system are not isolated institutional shortcomings but part of a broader developmental landscape. Examining these issues contributes to ongoing scholarly conversations on progress, innovation, and equity, and situates the judiciary within the evolving framework of national development envisaged for the mid-twenty-first century.

## Conclusion

The development of the Indian judicial system demonstrates that the challenge has seldom been a lack of laws. From colonial codifications to the post-Independence constitutional framework and subsequent reforms, the legal architecture reflects considerable depth and intent. The more persistent difficulty lies in implementation, where procedural delay, institutional rigidity, and inherited practices often weaken the impact of substantive rights. In this context, the title *Wigs before Writs* captures a central paradox of the judiciary. While constitutional remedies and judicial powers are expansive, symbolic traditions, formalism, and procedural emphasis can at times overshadow timely and effective justice. The “wig” represents inherited authority and ritual, whereas the “writ” signifies constitutional promise. Bridging this gap remains essential as India approaches its centenary, where the effectiveness of law will increasingly be judged by its lived outcomes rather than its legislative intent.<sup>42</sup>

<sup>32</sup> Supreme Court of India, *Manubhai Ratilal Patel v. State of Gujarat* (2013) 1 SCC 314.

<sup>33</sup> Government of India, *Viksit Bharat @2047: Vision Document* (NITI Aayog, 2023).

<sup>34</sup> Douglass C. North, *Institutions, Institutional Change and Economic Performance* (Cambridge University Press, 1990).

<sup>35</sup> Law Commission of India, *Arrears and Backlog: Creating Additional Judicial (Wo)manpower* (245th Report, 2014).

<sup>36</sup> World Bank, *Doing Business 2020: Comparing Business Regulation in 190 Economies* (World Bank Group, 2020).

<sup>37</sup> Upendra Baxi, *The Indian Supreme Court and Politics* (Eastern Book Company, 1980).

<sup>38</sup> Supreme Court of India, *Phase II of the e-Courts Project: Vision Document* (2014).

<sup>39</sup> Marc Galanter & Jayanth K. Krishnan, “Bread for the Poor: Access to Justice and the Rights of the Needy in India” (2004) 55 *Hastings Law Journal* 789.

<sup>40</sup> OECD, *Regulatory Policy Outlook 2021* (OECD Publishing, 2021).

<sup>41</sup> Amartya Sen, *Development as Freedom* (Oxford University Press, 1999).

<sup>42</sup> Upendra Baxi, *The Indian Supreme Court and Politics* (Eastern Book Company, 1980).



## Original Article

### Evaluating the Effectiveness of Agri-Clinics and Agri-Business Centres (ACABC) Scheme Using Conversion Efficiency Ratio and a One-Year Lag Model

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#### Abstract

The Indian economy is heavily dependent on agriculture, which plays a vital role in employment and Gross Value Added (GVA). To encourage agribusiness and improve agricultural extension services, the Indian government launched the Agri-Clinics and Agri-Business Centers (ACABC) Scheme in 2002. This initiative aims to enhance farm production through expert consulting though creating self-employment opportunities for agricultural graduates. The study calculates the conversion ratio between trained candidates and established ventures across Indian states using secondary data from the official ACABC database spanning 2002 to 2026. The result shows Maharashtra has the largest operational ratio. Maharashtra demonstrates dominance in operational scale and overall efficiency. To determine the success rate of ventures established year-wise in Maharashtra, a one-year lag model has been used. The one-year lag model for Maharashtra (2012–2025) indicates an average success rate of about 50%, with significant variations due to external factors such as the COVID-19 pandemic. The findings underline the role of agripreneurs as substances for economic change, aligning with Schumpeter's Innovation Theory. They also support the Human Capital Theory, which posits that training alone is insufficient without proper institutional support, funding, and favourable market conditions. The study concludes that enhancing post-training mentorship, financial assistance, and ecosystem support is essential for the sustainable development of agribusinesses under the ACABC program.

**Keywords:** ACABC Scheme, Human Capital Theory, Schumpeter Innovation Agripreneurship, Conversion Efficiency, One-Year Lag Model.

#### Introduction

Agriculture is a crucial part of the Indian economy. According to the 2011 census, 54.6% of the workforce worked in the agriculture and allied sector. signifies, at current rates, 18.4% of India's GVA in 2022–2023. The importance of the agricultural sector has prompted the Indian government to implement several sustainable development initiatives(AR\_Eng\_2024\_25 Department of Agriculture in India, 2024)For the economic growth of India, it is important to increase the productivity of farmers and land, and for that, services like “lab to land” are more important. The agri-entrepreneurship sector is a pillar of India. Financial support, the adoption of modern technologies, and awareness of government schemes are significantly related to the success of agri-entrepreneurship (Sonawane, 2022). That all system-level approaches fully unlock the potential for sustainable and productive agricultural systems."(Fatima & Ying, 2025) On the other hand, achieving employment has become a significant challenge for today's youth. Developing countries are facing employment challenges with a growing youth population.(Assaad & Levison, 2013) In India, 70% of rural female youth and 60% of rural male youth prefer to work in their villages, even though the income is 20% lower. (Summary et al., 2024) Nowadays, the mindset of qualified students is evolving; they are increasingly interested in self-employment in agriculture due to government initiatives and training programs, rather than pursuing jobs in urban areas. (Lal Bairwa et al., 2014)

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To address two important problems, namely to create job opportunities and to give extension advisory service to farmers to enhance productivity, the Ministry of Agriculture and Farmers Welfare, Government of India, launched the scheme in 2002, named “Agri Clinics and Agri Business Centres”, in collaboration with NABARD, which provides financial support and MANAGE who designed and provides a training model for candidates with the help of NITs (Nodal Training Institutes).

As an economics student, if we relate this scheme to economic theory, then this scheme is closely based on Joseph Schumpeter's theory of economic growth. According to him, growth does not happen by chance but through entrepreneurs who introduce new combinations. Innovation replaces old strategies with new ones and helps increase market productivity.(Schumpeter, 2017) When comparing this theory with the ACABC scheme, it involves providing services by establishing clinics that assist with stagnant farming practices using innovative high-tech methods. To achieve sustainable practices, the government and agricultural institutions must promote training programs and offer technical support to smallholder farmers. Enhancing agricultural productivity and food security through circular sustainability practices presents a pathway to achieving sustainable development.

## Research Gap:

Most studies show how training programs are beneficial for rural development and how advisory services assist farmers. Some studies also evaluate the challenges candidates face when seeking financial assistance. It is essential to assess the actual outreach of the schemes and their efficiency.

**OBJECTIVE:** This paper aims to analyse the conversion efficiency of highly trained candidates in the state of India and also study the success rate of Maharashtra in venture establishment using a one-year lag model.

## Review of Literature:

This project studies various Indian government initiatives, especially the programme for the rural population that brings banking and financial safety. A study based on secondary data and a SWOC analysis that includes strengths, weaknesses, opportunities, and challenges. At the end, the researcher concludes that the central and state governments have to work together to reach economic goals like technology & industrial growth for rural development(Project et al., 2022). The paper analyses the importance of agripreneurs in increasing farmers' incomes. To this end, the researcher studies various schemes across India that help farmers double their income. As a result, the researcher concludes that receiving support from the government through policies is a game-changer(Quarterly & Journal, 2021).This paper discusses two major agricultural problems: climate change and the increasing demand for food. To address these issues, the government has implemented various strategies. In the conclusion, the researcher examines a scheme aimed at enhancing agricultural extension services while also highlighting the contributions of women in agriculture(Abhijeet et al., 2023).The article emphasizes the importance of agri-clinics and agribusiness centres in promoting scientific agricultural methods and increasing farmers' incomes. It examines the significance of agriculture in India's economy. The program aims to attract young people to agriculture by providing training, job opportunities, and financial assistance for starting agribusinesses. This initiative ultimately seeks to foster rural development and empower marginalized communities. Clear indicators of the scheme's effectiveness include improved production per hectare, job creation—especially in the Southern region—and heightened awareness among farmers(Bondre, 2022).

In this paper, the researcher emphasizes the importance of women’s empowerment in the agricultural sector for economic growth and development. At the end of the paper, the researcher concludes that government initiatives, such as the ACABC scheme, can improve women’s power by providing training, financial support, and opportunities to start agricultural businesses (Bairwa et al., 2014). The study emphasizes the importance of integrating back-end agricultural production with front-end agri-supply chain operations in India to enhance productivity, ensure fair pricing, and promote rural development. It advocates for a shift from traditional farming to agribusiness to revive agriculture, create jobs, reduce poverty, and support sustainable development. The essay also discusses the challenges faced by agricultural graduates in starting their own businesses and identifies key factors for their success in India(Venkattakumar et al., 2016)The paper discusses the growing trend in India of agricultural graduates viewing agriculture as a business and promoting agripreneurship. It emphasizes the need for educational training to develop entrepreneurial skills and overcome challenges faced by farmer entrepreneurs in states like Uttar Pradesh and Maharashtra. The study underscores the importance of training at all levels of business development to enhance product quality, marketability, and overall performance in agripreneurship(Goswami et al., 2019).

## Research Methodology:

The paper is descriptive and analytical in nature, relying on secondary data. The data was collected from the official ACABC database. For the inter-state comparison, data from April 2002 to January 2026 were used to assess the national performance of the scheme. To calculate the conversion efficiency ratio, use the following formula:

$$\text{Conversion Rate (\%)} = \frac{\text{Total Agri - Ventures Established}}{\text{Total Candidates Trained}} \times 100$$

Calculate a realistic estimate for venture establishment using the One-Year Lag Model. This model was applied to Maharashtra using data from 2012 to 2025. The model assumes that a gestation period is required for venture

establishment. The success ratio is calculated to evaluate performance every year. To achieve this, we will use the following formula:

$$\text{Success Rate (Lagged)} = \frac{\text{Ventures Established in Next Year}}{\text{Candidates Trained in Current Year}} \times 100$$

**Table No.1: Progress of Agriclincs and Agribusiness Centres Scheme**

PROGRESS OF AGRICLINICS AND AGRIBUSINESS CENTRES SCHEME Period From :01/04/2002 To 30/01/2026			
Sr.No.	Name of the State	No. of Candidates Trained	No. of Agri-ventures established
1	Andhra Pradesh	1861	547
2	Arunachal Pradesh	48	3
3	Assam	845	281
4	Bihar	4607	1636
5	Chandigarh	4	2
6	Chhattisgarh	1058	425
7	Delhi	44	7
8	Goa	65	10
9	Gujarat	2309	916
10	Haryana	755	251
11	Himachal Pradesh	432	112
12	Jammu and Kashmir	1556	191
13	Jharkand	855	225
14	Karnataka	4906	1970
15	Kerala	344	87
16	Madhya Pradesh	5965	2765
17	Maharashtra	26495	13286
18	Manipur	522	135
19	Meghalaya	37	4
20	Mizoram	52	0
21	Nagaland	188	22
22	Orissa	643	116
23	Pondicherry	179	92
24	Punjab	671	225
25	Rajasthan	5256	2044
26	Sikkim	9	1
27	Telangana	2466	677
28	Tamil Nadu	10188	5099
29	Tripura	6	2
30	Uttar Pradesh	21387	10196
31	Uttaranchal	635	212
32	West Bengal	1278	354
<b>TOTAL</b>		<b>95666</b>	<b>41893</b>

**Source: AC & ABC Database**

Table 1 shows the number of candidates trained and the number of agri-ventures established from April 2002 to January 2026. A total of 95,666 candidates has been trained, while 41,893 candidates became entrepreneurs. Only 44% of candidates are successful in establishing ventures, which clearly indicates that the ACABC scheme is moderately effective at the national level.

**Figure 1: Effectiveness of the ACABC Scheme by Scale in the Top 10 States**



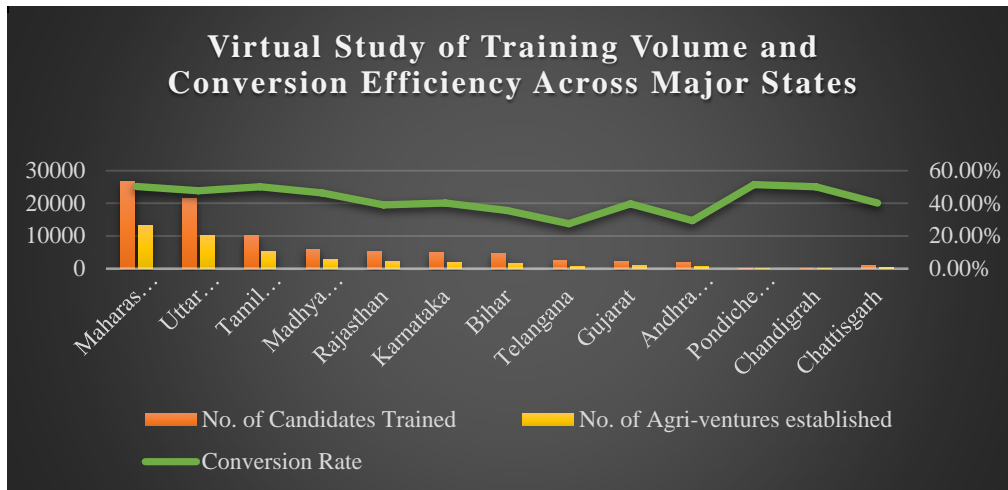
**Figure 1** illustrates the operational scale of the scheme in top ten states based on the number of candidates trained. Maharashtra, Tamil Nadu, Uttar Pradesh, and Madhya Pradesh are presenting a higher volume of trained candidates, reflecting the outreach and implementation capacity of these states. Here only operational scale alone not provide actual performance of the scheme; higher training does not mean higher venture establish. If we see economic perspective for allocation efficiency metrics serves as a proxy,(McKenzie & Woodruff, 2014).Efficiency is contingent upon the return on investment. According to “Human capital theory”, if the government invests in human capital but fails to generate economically productive assets, it results in what is known as deadweight loss. In simple terms, this refers to the government's failure to achieve effective outcomes from its investments. To address this gap conversion efficiency calculated using the formula, and preset in Table No. 2. When we compare figure 1 and Table No. 2, we notice a difference in volume and efficiency. Maharashtra has a large number of trained candidates, but when we calculate the conversion ratio, it shows a conversion rate of 50.15%, which is lower than Puducherry’s. Despite Puducherry having fewer trained candidates, we called it “Scale vs. Efficiency.” To evaluate the effectiveness of a scheme, it is important to consider both scale and efficiency. Scale reflects the extent of reach and government effort towards the scheme, while efficiency indicates the results of those efforts. For example, in Pondicherry, 179 candidates were trained, and 92 ventures were established over a period of 24 years, resulting in an efficiency rate of 51.40%. Given these figures, despite a higher conversion ratio, the limited scale of operations restricts the overall impact of the scheme in Puducherry.

**Table No 2 Effectiveness of the ACABC Scheme by efficiency in the Top 10 States**

Sr.No.	Name of the State	Conversion Rate
1	Pondicherry	51.40%
2	Maharashtra	50.15%
3	Tamil Nadu	50.05%
4	Chandigarh	50.00%
5	Uttar Pradesh	47.67%
6	Madhya Pradesh	46.35%
7	Chhattisgarh	40.17%
8	Karnataka	40.15%
9	Gujarat	39.67%
10	Rajasthan	38.89%

**Source: Calculated by the author**

**Figure 2: Visual presentation of Operational Scale and Qualitative Efficiency**



If we compare both scale and efficiency through a graphical presentation, we conclude that Maharashtra, Tamil Nadu, Uttar Pradesh, Madhya Pradesh, and Rajasthan are truly effective in the scheme. The combined analysis suggests that Maharashtra, Tamil Nadu, Uttar Pradesh, Madhya Pradesh, and Rajasthan perform better when both dimensions are considered together.

### One-Year Lag Model:

After conducting the inter-state analysis, we will focus on Maharashtra, which demonstrates dominance in operational scale and overall efficiency. To assess Maharashtra's success rate in establishing ventures, for that study, we used the one-year lag success model because it takes time for a “trainee” to “entrepreneur.” transition (Anwar et al., 2025) One Year Lag Model is the economics necessity for adjusting accurate reporting, not for statistical adjustment. In methodology, we collected data from the years 2012 to 2025 from the official ACABC database. Calculate the values using the formula and represent it in the following table.

**Table No 3: Calculating Success Rate Using the One-Year Lag Model**

Training Year (T)	MH Trained Candidates	MH venture established (V)	Venture Year (T+1)	MH Ventures (V+1)	Success Ratio (%)
2012	707	441	2013	525	74.26%
2013	1384	525	2014	744	53.76%
2014	1501	744	2015	885	58.96%
2015	1309	885	2016	500	38.20%
2016	1377	500	2017	897	65.14%
2017	1518	897	2018	883	58.17%
2018	1386	883	2019	970	69.99%
2019	2512	970	2020	1069	42.56%
2020	1086	1069	2021	559	51.47%
2021	1770	559	2022	1642	92.77%
2022	2080	1642	2023	851	40.91%
2023	1685	851	2024	431	25.58%
2024	1091	431	2025	643	58.94%
2025	1434	634	-	-	-

**Source: Calculated by the author**

The model used to assess how well-trained candidates establish their ventures after completing training indicates that there is no way to start a business in the same year that training is taken. Establishing a venture is a process that takes time, often referred to as the gestation period.

In **Table No. 3**, the year-wise success rate of trained candidates in Maharashtra, using the One-Year Lag Model, shows a variation in the success rates across different years. On average, around 50% of trained candidates were able to establish their ventures, which is consistent with the national conversion rate. In the years 2013 and 2022, the success rate was relatively high at 74.26%. This suggests that the training provided in earlier years effectively translated into



successful venture creation. The high success rate in 2022 also indicates a post-pandemic recovery and improved support mechanisms for agripreneurs. On the other hand, the lower success rate was observed during 2020 and 2021, which may have been affected by external disruptions linked to COVID-19. The model offers a more realistic representation of the ACABC scheme by accounting for the necessary management period required for establishing ventures. The findings indicate that, while the ACABC scheme has significantly contributed to promoting agri-entrepreneurship in Maharashtra, there is still room for improvement in post-training support and mentorship to enhance long-term success rates.

## Result and Discussion:

Overall, the result of the study shows that the scheme has achieved moderate success at the national level. Variation in conversion efficiency across states may be linked to differences in institutional support and local market conditions (Afroz et al., 2021). There is also a difference between a lack of risk-taking behaviour (Burman et al., 2020), lack of government funds, inadequate technical knowledge, credit access, and local support systems. Without these, training risks result in underutilised human resources rather than sustainable enterprises (Tripathi & Agarwal, 2015). The findings of this study support Schumpeter's Innovation Theory in economics, highlighting the role of educated agricultural entrepreneurs in driving innovation and economic growth. The ACABC scheme creates such entrepreneurs by introducing new services to local farmer they are truly justice the service link "lab to land". At the same time result align with our second economic theory, with the "Human capital" theory, only training does not give productive outcomes unless supported by favourable institutional and economic condition.

## References:

1. Abhijeet, Sahu, K. K., Bardhan, R., Chouhan, N. S., Dixit, D., Tripathi, S., Pandey, A., & Ahmed, R. (2023). A Comprehensive Review on Role of Agricultural Extension Services in the Sustainable Development of Global Agriculture. *International Journal of Environment and Climate Change*, 13(10), 3514–3525. <https://doi.org/10.9734/ijecc/2023/v13i103021>
2. Afroz, S., Singh, R., Nain, M. S., Mishra, J. R., Kumar, P., Khan, S. A., & Iquebal, M. A. (2021). SWOT-Analytic Hierarchy Process (AHP) of Agriclincs and Agribusiness Center (ACABC) Scheme. *Indian Journal of Agricultural Sciences*, 91(6), 900–904. <https://doi.org/10.56093/ijas.v91i6.114296>
3. Anwar, I., Yasin, N., Prasanna, S., Salamzadeh, A., & Saleem, I. (2025). Transition from entrepreneurial intention to venture gestation behavior: a longitudinal evidence. *Journal of Small Business and Entrepreneurship*, 37(3), 351–380. <https://doi.org/10.1080/08276331.2024.2379105>
4. *AR\_Eng\_2024\_25 Department of Agriculture in India*. (2024).
5. Assaad, R., & Levison, D. (2013). *Employment for youth: A growing challenge for the global community Employment for Youth: A Growing Challenge for the Global Community\** (Issue 2013). <https://www.researchgate.net/publication/255710927>
6. Bairwa, S. L., Kushwaha, S., Lakra, K., & Meena, L. K. (2014). Women Empowerment through Agri-clinics and Agri-business Centres Scheme in India. *International Journal of Commerce and Business Management*, 7(1), 181–185. <https://research.ebsco.com/linkprocessor/plink?id=40041572-aa9e-36ae-897a-bc1662ae555d>
7. Bondre, S. V. (2022). Agriclincs and agribusiness centres scheme : Attracting and providing opportunities to agripreneurs Agriclincs and Agribusiness Centers Scheme : Attracting and providing opportunities to agripreneurs. *Rashtriya Krishi, Volume 12*(December), 71–75.
8. Burman, R. R., Goswami, A. K., Sharma, J. P., Sahu, S., Gills, R., Rani, A., & Roy, P. (2020). Behavioural pattern of farmer entrepreneurs and success factors for establishment of agribusiness ventures under ACABC scheme. *Indian Journal of Agricultural Sciences*, 90(9), 1653–1657. <https://doi.org/10.56093/ijas.v90i9.106586>
9. Fatima, S., & Ying, Z. (2025). Enhancing agricultural productivity and food security through circular sustainability practices: A pathway to achieving sustainable development goal 2. *Journal of Environmental Management*, 389(March), 126237. <https://doi.org/10.1016/j.jenvman.2025.126237>
10. Goswami, A. K., Sharma, J. P., Burman, R. R., Gills, R., Rani, A., Roy, P., Sahu, S., & Singh, R. (2019). Educational needs for Entrepreneurship Promotion and Barriers for Agripreneurship Development among Agricultural Graduates. *Journal of Community Mobilization and Sustainable Development*, 14(1), 155–159. <https://www.researchgate.net/publication/376455175>
11. Lal Bairwa, S., Lakra, K., Kushwaha, S., Meena, L. K., & Kumar, P. (2014). Agripreneurship development as a tool to upliftment of agriculture. *International Journal of Scientific and Research Publications*, 4(3), 1–4. <https://citeseerx.ist.psu.edu/document?repid=rep1&type=pdf&doi=489a58671771ee78648946f63d08a4edf44e482e>
12. McKenzie, D., & Woodruff, C. (2014). What are we learning from business training and entrepreneurship evaluations around the developing world? *World Bank Research Observer*, 29(1), 48–82. <https://doi.org/10.1093/wbro/lkt007>
13. Project, M., In, S., Of, F., For, R., Award, T. H. E., The, O. F., Of, D., By, S., The, U., Of, G., & Principal, V. (2022). "A STUDY ON IMPACT OF GOVERNMENT SCHEMES ON RURAL ECONOMY" MINI PROJECT SUBMITTED IN FULFILLMENT OF THE MASTER OF BUSINESS ADMINISTRATION AI-AMEEN INSTITUTE



## OF MANAGEMENT STUDIES.

14. Quarterly, R., & Journal, I. (2021). OPPORTUNITIES FOR AUGMENTING FARMERS INCOME AND. *RESEARCH EXPLORER-A Blind Review & Refereed Quarterly International Journal* ISSN:, IX(33), 23–29.
15. Schumpeter, J. A. (2017). Theory of economic development: An inquiry into profits, capital, credit, interest, and the business cycle. In *Theory of Economic Development: An Inquiry into Profits, Capital, Credit, Interest, and the Business Cycle* (Vol. 3, Issue 2, pp. 1–255). <https://doi.org/10.4324/9781315135564>
16. Sonawane, P. S. (2022). Agricultural Entrepreneurship in India with respect to Agro- Based Industries : Opportunities and Challenges. *Neuroquantology*, 20(10), 13507–13527. <https://doi.org/10.48047/nq.2022.20.10.NQ551318>
17. Summary, E., Preferences, W., Participation, W., Faced, C., Youth, B., Gender, A., Status, C. E., Work, T. O., Challenges, A., Are, S. Y., Enter, S. T., In, S., Workforce, T., To, A., Skill, A., Programs, D., & Forward, W. (2024). State of Rural Youth Employment 2024. In *Global Development Incubator (GDI), Global Opportunity Youth Network (GOYN), Transform Rural India Foundation (TRI), Development Intelligence Unit (DIU)*. <https://goyn.org/resource/state-of-rural-youth-employment-2024/>
18. Tripathi, R., & Agarwal, S. (2015). Rural development through Agripreneurship: A study of farmers in Uttar Pradesh. *Global Journal of Advanced Research* , 2(2), 534–542.
19. Venkattakumar, R., Chandrashekara, P., & Sontakki, B. S. (2016). Critical Success Factors (CSF) for Agri-clinics and Agri-business Centers (AC & ABC) Scheme in India. *Indian Research Journal of Extension Education*, 16(1), 1–8.



## Original Article

### Role of Libraries in Tourism Studies

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#### Abstract

*Libraries play an increasingly important role in supporting tourism studies by facilitating access to information resources and promoting cultural and educational tourism. This paper examines the role of libraries in tourism studies with particular emphasis on library resources, services and initiatives that contribute to tourism research and destination development.*

**Keywords:** Libraries, Tourism Studies; cultural tourism

#### Introduction

Libraries play a crucial yet often underappreciated role in tourism studies by providing access to a wide range of information resources that support education, research, and the overall development of the tourism sector. These resources include academic journals, books, government publications, historical records, statistical data, and travel guides, which together enable students, researchers, and professionals to understand tourism from social, economic, environmental, and cultural perspectives. One of the primary roles of libraries in tourism studies is to facilitate access to reliable and authoritative information that helps analyse the impacts of tourism on communities and destinations. In this way, libraries function as knowledge repositories that inform policy-making, destination planning, and the adoption of best practices within the tourism industry. In addition to information access, libraries contribute to critical thinking and comprehensive analysis of tourism-related issues by providing both primary and secondary sources. Access to statistical databases, industry reports, and market analyses supports tourism professionals and researchers in evidence-based decision-making. Libraries also curate specialised resources in areas such as tourism marketing, hospitality management, ecotourism, adventure tourism, and sustainable tourism. With the rapid growth of digital technologies, libraries have expanded their services by offering online access to databases and digital collections, enabling users to retrieve relevant information remotely. An important responsibility of libraries is the acquisition, organisation, preservation, and conservation of local history and heritage materials, which serve as essential sources of information about tourist destinations. The purpose of this paper is to examine the library resources and services developed to support tourism studies. A qualitative approach has been adopted to describe, deepen, and expand understanding of the potential role of libraries in tourism research and practice.

#### Objectives of the Study

The objectives of the present study are:

1. To examine the role of libraries in supporting tourism studies and tourism – related research.
2. To analyze the contribution of libraries in preserving and promoting local history and cultural heritage for tourism purposes.
3. To understand the impact of digital library services on access to tourism information.



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5. To highlight the emerging role of libraries as cultural and informational hubs in tourism development.

## Review of Literature

Seifi (2019) examined the role of public libraries in the development and promotion of tourism services, viewing libraries as knowledge-based organisations capable of effectively presenting tourist attractions through their resources and services. The study identified the capacity of libraries to contribute to cultural tourism through the development of cultural identity and heritage, information literacy initiatives, and tourism-oriented services. It also emphasised the importance of collaboration and cooperation with other institutions and organisations, highlighting the need for more practical and applied studies that can contribute directly to the delivery of quality tourism services.

Lavranos (2020) explored the development of creative spaces in libraries as a means of promoting creative tourism and cultural heritage. Creative tourism focuses on the active participation of visitors in cultural activities, enhancing the tourist experience through experiential interaction. The study highlighted libraries as institutions closely linked to local cultural heritage and demonstrated how creative spaces within libraries can support tourism by enabling visitors to engage in cultural and creative practices.

Roque (2021) discussed bibliotourism as an emerging segment of cultural tourism and examined the evolving role of public and heritage libraries. The study noted that library collections can be presented as cultural assets, positioning libraries themselves as tourist attractions. Libraries were found to support tourists throughout different phases of travel, from pre-trip planning to on-site experiences and post-visit memory preservation. The research emphasised the strategic role of digital libraries in supporting tourism planners and contemporary tourists, particularly younger generations, and highlighted the mutual benefits of tourism activities centred on libraries.

Stoica (2022) analysed sustainable cultural tourism in the context of increasing digitalisation and global challenges such as the COVID-19 pandemic. The study examined key components of cultural tourism, including monuments, festivals, personalities, and the role of cultural and educational institutions. It highlighted digital tourism as an essential tool for destination promotion, with the internet serving as the primary source of travel-related information and planning.

Tokic (2023) focused on cultural tourism as a link between destination identity and the local economy. The study argued that while libraries are not always recognised as tourist attractions, their cultural heritage resources can be effectively presented to tourists through appropriate methods. These include guided tours, digital and virtual exhibitions, performances, workshops, live streaming, and the digitisation and online publication of heritage materials. The findings underscored the potential of library cultural heritage collections as attractive tourism products.

Rejeki (2024) conducted a systematic literature review to analyse the role of libraries in supporting cultural and educational tourism. The study demonstrated that libraries function not only as local attractions but also as strategic actors in the development of tourism destinations. Initiatives such as historical exhibitions, literacy programmes, and collaborations with cultural institutions were identified as effective approaches for strengthening the educational and social role of libraries while contributing to tourism development.

## Library Services Supporting Tourism Studies

### 1. Circulation Services

Circulation services include the issue, return, renewal, and reservation of library materials, as well as short-term loans for high-demand resources. These services ensure the effective use and equitable access to tourism-related information resources.

### 2. Reference and Research Support

Reference services assist users in locating and using information through catalogues, databases, indexes, and citation tools. By supporting research queries, libraries strengthen their role as educational institutions and research facilitators in tourism studies.

### 3. Digital Library and E-Resources

Digital library services provide access to e-books, e-journals, theses, dissertations, and subscription databases. Remote and off-campus access, along with virtual reference services such as email, chat, video conferencing, and frequently asked questions, enhances information accessibility for tourism researchers and practitioners.

## Translation Services

Access to information in multiple languages is essential in tourism studies, given the global nature of tourism. Translation services support the utilisation of knowledge documented in diverse languages and contribute to inclusive and comprehensive research.

## Information Literacy and User Education

Libraries conduct orientation programmes and training sessions on research skills, plagiarism awareness, citation styles, and the effective use of library services. These initiatives enhance users' ability to locate, evaluate, and ethically use tourism-related information.



## 1. Reprographic Services

Reprographic services such as photocopying, scanning, and printing support users' immediate academic and research needs while facilitating information access and preservation.

## 2. Current Awareness Services (CAS)

CAS keeps users informed about newly acquired books, journals, and research publications. Regular updates enable users to remain current in their areas of interest within tourism studies.

## 3. Selective Dissemination of Information (SDI)

SDI provides customised information alerts to researchers and faculty based on their specific interests. User profiles are created using subject areas, keywords, or other criteria to ensure targeted information delivery.

## 4. Inter-Library Loan and Document Delivery

Inter-library loan and document delivery services enable access to resources not available within the parent institution, supporting comprehensive tourism research through resource sharing.

## 5. Institutional Repository Services

Institutional repositories provide access to theses, dissertations, faculty publications, and other research outputs, enhancing the visibility and accessibility of tourism-related scholarship.

## Libraries as Tourism Service Attractions

Libraries increasingly function as tourism service attractions by providing tourism information services, leisure and cultural activities, and study tours. Dedicated tourism collections, themed reading rooms, tourism databases, exhibitions, and lectures support tourists and researchers alike. Libraries also play an important role in collecting and organising local tourism resources and establishing destination-specific databases.

In well-known tourist cities, libraries can develop tourism-oriented reading services by recommending travel routes and related literature based on tourists' interests, age groups, and time constraints. By presenting local history, regional characteristics, folk traditions, and notable personalities, libraries enhance visitors' understanding and experience of the destination. Cultural and leisure activities such as art exhibitions, lectures, and workshops further enrich the tourism experience. These multi-level and multidimensional services demonstrate how libraries' diversified collections can support travel research and tourism development by leveraging their unique resources.

## Conclusion

The literature reviewed in this study highlights the significant role of libraries in tourism studies and tourism development. Effective utilisation of library resources, particularly digital collections, enhances access to information about local communities, history, and culture. Local history collections serve as invaluable resources for educational, scientific, professional, and informational needs, both within and beyond the local community. Library professionals managing these collections play a vital role in organising exhibitions, producing newsletters, collaborating with media and local organisations, and developing digital repositories that preserve and promote local heritage.

The primary function of local history and digital collections is to provide direct access to digitised content, including books, graphic materials, postcards, and archival resources, while supporting promotional activities and cultural events organised by libraries. Through these efforts, libraries contribute meaningfully to cultural preservation, knowledge dissemination, and the sustainable development of tourism.

## References

1. Orbanic, M., &Slivar, I. *Tourism and Libraries: Multiple Case Studies*.
2. Mairaj, M. *Library Services and User Satisfaction in Developing Countries: A Case Study*.
3. Yulliani, T. *The Influence of Service Quality on Library Visitors' Satisfaction*.
4. Rejeki, D. S., &Rohmarenggani, R. *Libraries as Hubs for Cultural Preservation and Educational Tourism*.
5. Beresecka, J., Huotakova, M., &Svetlikova, V. *Use of Movable Cultural Heritage through Libraries in Slovakia*.
6. Tokic, K., & Tokic, I. *Presentation of Cultural Heritage in Libraries to Tourists*.
7. Roque, M. I. *Reading the Tourist Destination: Bibliotourism and Place Perception*.
8. Lavranos, C., &Vouvaki, C. *Developing Creative Spaces in Libraries for Creative Tourism*.
9. Stoica, G. D., &Andreiana, V.-A. *Perspectives for the Development of Sustainable Cultural Tourism*.