

Certificate of Publication

YMER

Open Access | Peer reviewed | Scopus Active 2025 | Care UGC Group- II Journal | ISSN - 0044-0477



Title

IMPACT OF AI IN IT INDUSTRY

Author

Dr. K. SURESH BABU, M.Com, M.Phil, MBA., Ph.D., HDTM, PGDCA, NET.,

From

PSG College of Arts and Science, Coimbatore – 641014

Has been published in

YMER: VOLUME 24, ISSUE 03, MARCH - 2025



Scopus



OPEN ACCESS

Editor-in-chief


(James Gaskin)

IMPACT OF AI IN IT INDUSTRY

Project Guide:

Dr. K. SURESH BABU M.Com, M.Phil, MBA., Ph.D., HDTM, PGDCA, NET.,
PSG College of Arts and Science, Coimbatore – 641014

Team:

M. LAKSHMI DHARAN (22BCR031), PSG College of Arts and Science, Coimbatore –
641014

S. ISHWARYA (22BCR021), PSG College of Arts and Science, Coimbatore – 641014

T.DHARANEESHWARAN (22BCR011), PSG College of Arts and Science, Coimbatore –
641014

ABSTRACT

The impact of Artificial Intelligence (AI) on Information Technology (IT) companies has been transformative, driving innovation, improving operational efficiency, and reshaping business models. This paper explores the various ways in which AI technologies are revolutionizing IT companies, from automating routine tasks and enhancing data analytics to enabling advanced decision-making processes. AI's integration into software development, cybersecurity, customer service, and IT infrastructure management has created new opportunities for growth and efficiency. However, challenges related to data privacy, ethical concerns, and workforce adaptation remain. The study highlights the potential of AI to streamline processes, reduce costs, and provide competitive advantages, while also addressing the implications for employees and organizational structures. By examining real-world applications, this paper provides insights into the current and future role of AI in the IT sector, offering a comprehensive understanding of its transformative effects.

Keywords: AI in this generation is making a great leap in IT industry

INTRODUCTION

This topic is about the impact of AI in the IT industry. The IT industry is a service and skillbased industry. People in IT do programming, data analysing, etc. Before the invention of Artificial intelligence IT was considered a highly paid job in 2020 but after 2020 AI become normalize in every job or industry because AI makes the job easy in circumstance, saves time which makes it efficient and effective. So, in this project let us see how AI impacts the IT companies in 2024.

AI is revolutionizing IT companies in Tamil Nadu, making the state a prominent hub like Tidel Park for AI-driven innovation. Leading firms like Zoho, Fresh works, and TCS are leveraging AI for automation, predictive analytics, and personalized customer experiences. Tamil Nadu's

IT companies are developing AI solutions for industries such as healthcare, manufacturing, retail, and logistics, enabling smarter decision-making and operational efficiency. Startups in cities like Chennai and Coimbatore are exploring cutting-edge technologies in machine learning and natural language processing. The Tamil Nadu government supports this growth with initiatives like the Tamil Nadu Safe and Ethical AI Policy and partnerships with institutions like IIT Madras, fostering AI research and talent development. AI is also being used in smart city projects for traffic control, waste management, and energy optimization. Companies are investing heavily in upskilling their workforce to meet AI demands, addressing talent shortages. The state's focus on ethical AI ensures responsible innovation and sustainable growth. Tamil Nadu's thriving tech ecosystem and proactive policies are positioning it as a leader in India's AI-driven IT sector.

REVIEW OF LITERATURE

- 1) Agnew, J., & Watson, A. (2017). *Artificial Intelligence in IT: Changing Roles and Job Functions*. Journal of Information Technology. pp: 56-70.
- 2) Caruana, A. (2019). *I and Automation in IT: Disruptive Technologies and Transformations* Journal of Technology and Innovation. pp: 43-58.
- 3) Kolbjornsrud, V., Amico, R., & Thomas, R. (2018). *The Impact of AI on IT Services: A Business Perspective*. Journal of Business Strategy. pp: 44-58
- 4) Mehta, P., & Rathi, N. (2019). *AI and Its Impact on IT Product Development in India*. Indian Journal of Software Engineering. pp: 18-30.
- 5) Bhardwaj, S., & Gupta, K. (2020). *AI in Cloud Computing for Indian IT Companies*. eCloud Computing Journal: Pp 50-64

OBJECTIVES

1. To analysis the uses of AI in IT
2. To understand how AI help in decision making in IT companies
3. TO learn how AI improve performance tracking
4. To explore the findings and giving suggestion for betterment

RESEARCH METHODOLOGY

The research methodology for this study on the impact of AI in IT industry , how management uses , how the management and employee feel about use of AI in their work and how employee feel about management using AI for performance management and tracking .descriptive analysis in order to find the responds in percentage form and also used ranking based questioner for better understanding in employees feeling

AREA OF STUDY

Area of study is restricted to only Coimbatore and respondents ages are categorized accordingly. Area of study is only restricted to Coimbatore because in Tamil Nadu Coimbatore is considered one of the IT hubs which makes easy to collection of responses and also sufficient for research analysis

SOURCE OF DATA COLLECTION

Primary Data:

Surveys/Questionnaires: structured questionnaire will be developed to collect data on impact of AI in IT industry.

Secondary Data:

Literature Review: Data will be collected from existing research, reports, and articles related to impact of AI in IT industry and other.

LIMITATIONS OF THE STUDY

- 1) The sample size is limited to only 100 respondents
- 2) The area was restricted to Coimbatore city only.
- 3) The research on the study is fully based on the respondents.

FINDINGS

- Most respondents are in the age between 20-25 (51%).
- Majority respondents are male (76%).
- Most respondents are business (30.1%).
- Majority respondents are Experienced (57.7%).
- Majority respondents' companies use AI (83.5%).
- Most respondents are using AI for Customer service (30.1%).
- Most respondents are not using AI because of lack of skilled professionals (33.7%).
- Majority respondents are rarely using AI tools for decision making (63.5%).
- Most respondents' organisations use AI for strategic planning (30.8%).
- Most respondents use AI for every Decision making (43.1%).
- Most respondents are using AI for performance tracking (30.1%).
- Most respondents are feeling very positive and positive (32.7%) (32.7%) about use of performance Tracking AI by management.
- Most respondents' companies use performance tracking AI for better employee productivity (35%).
- Majority respondents feel bad about management using AI for performance tracking.
- Majority respondents feel moderate about management using AI for output review.
- Most respondents feel moderate about use of AI in program training..

- Majority respondents feel moderate about using AI for data analyzing and interpreting.
- Majority respondents feel moderate about management not allowing to use AI for basic outline Planning.

SUGGESTIONS

Automation & Efficiency

AI is significantly improving automation in IT, allowing businesses to streamline operations and reduce manual efforts. AI-driven IT operations (AIOps) automate system monitoring, log analysis, and incident resolution, minimizing downtime and improving efficiency. Automated IT workflows help organizations manage routine tasks such as software updates, troubleshooting, and system backups, freeing up IT teams to focus on strategic projects. Additionally, predictive maintenance powered by AI can identify potential issues before they escalate, reducing costly system failures and improving IT infrastructure resilience.

Software Development & Testing

AI is reshaping software development by automating coding, debugging, and testing processes. AI-powered code generation tools assist developers by suggesting code snippets and optimizing software development speed. Automated testing tools leverage AI to identify defects, improve test coverage, and ensure software quality. AI also enhances debugging by detecting patterns in code errors, reducing development time and improving software reliability. With AI's capabilities, developers can focus on innovation while minimizing errors and accelerating the software development lifecycle.

Data Management & Analytics

AI is revolutionizing data management by enabling advanced analytics, predictive insights, and intelligent decision-making. AI-driven big data processing allows organizations to analyse vast datasets in real time, extracting valuable business insights. Predictive and prescriptive analytics help IT leaders make informed decisions based on historical data trends. AI also ensures data governance by automating data classification, compliance monitoring, and anomaly detection. With AI-powered analytics, organizations can gain deeper insights, improve operational efficiency, and drive data-driven decisionmaking.

Network Management & Optimization

AI is enhancing network management by improving performance monitoring, troubleshooting, and optimization. AI-powered tools analyse network traffic patterns to detect anomalies and prevent downtime. Self-healing networks use AI to predict and resolve network issues automatically, ensuring seamless connectivity. AI-based load balancing optimizes traffic distribution across servers, improving network efficiency and reducing latency. By integrating

AI into network management, organizations can enhance performance, minimize disruptions, and ensure a stable IT infrastructure.

AI in Employee Performance Tracking

AI-driven tools are revolutionizing employee performance monitoring by analysing work patterns, engagement levels, and productivity metrics. Intelligent analytics platforms can assess employees' efficiency by tracking project completion rates, communication effectiveness, and overall contribution to team goals. AI also eliminates biases in performance evaluations by providing objective data, reducing reliance on human judgment. Moreover, AI-powered sentiment analysis can gauge employee morale, helping managers address concerns before they impact productivity. However, organizations must ensure transparency and ethical use of AI to maintain employee trust and privacy.

AI in Business Process Performance Tracking

AI-driven business intelligence tools provide organizations with real-time insights into operational performance, helping leaders make data-driven decisions. Machine learning algorithms analyse

Workflow efficiencies, identify bottlenecks, and suggest process optimizations to improve overall productivity. AI also enhances financial performance tracking by analysing revenue patterns, cost structures, and market trends, allowing businesses to forecast future performance accurately. Companies leveraging AI for business process monitoring gain a competitive edge by adapting quickly to changing market conditions.

CONCLUSION

AI is revolutionizing the IT industry by enhancing automation, optimizing workflows, and improving decision-making across multiple domains. From IT operations and software development to data management and network optimization, AI-driven tools are enabling businesses to streamline processes, reduce manual efforts, and increase overall efficiency. The integration of AI in employee performance tracking and business process monitoring ensures data-driven, unbiased evaluations, fostering productivity and innovation while maintaining transparency and ethical considerations.