



National Research Conference & Kerala Higher Education Expo 2026

Workshop on Accelerating Research with Responsible AI

10 February 2026 | 9.30 am - 4.30 pm

Venue: Orice Hall

In the era of the Fourth Industrial Revolution, national and international changes require state-level reforms for becoming a vibrant 'knowledge society', emphasising the critical role of technology in catalysing high-quality academic research. As the recent FICCI-EYParthenon report (2025) highlights, artificial intelligence (AI) has emerged as a foundational force, reshaping how knowledge is produced and disseminated. Although India currently ranks fourth globally in terms of AI research output, there is an urgent need to prioritise quality and impact in order to achieve true global leadership.

This workshop addresses the urgent need to integrate AI responsibly into academic workflows. We will move beyond merely adopting tools to fostering deep 'AI literacy' – understanding the design, limitations and ethical implications of these technologies. Participants will explore how AI can accelerate labour-intensive tasks such as literature scanning and data structuring, thereby freeing up scholars to focus on creative problem solving and mentorship. By embedding ethical guardrails and transparent governance early in the research lifecycle, we can ensure that technological acceleration reinforces academic integrity rather than compromising it. This training is vital for creating 'future-ready' campuses where technology enhances human intellect rather than replacing it.

Course outline:

- **Foundations and Ethics:** An introduction to the transformative potential of AI in research, along with the critical ethical considerations for its responsible use.
- **AI-Augmented Information Search:** Using semantic searches and natural language processing to refine academic database queries and identify misinformation.
- **Large Language Models (LLMs) for Research:** Exploring the specific capabilities and limitations of LLMs for text analysis and content creation in an academic context.
- **The Art of Prompt Engineering:** Mastering the principles of effective prompt design and advanced techniques for complex research tasks.
- **Rapid Literature Exploration:** Using AI platforms to automate literature review tasks, identify themes, and generate summaries.
- **AI-assisted literature analysis:** Prompting LLMs to conduct comparative analyses of papers, extract key findings and identify research gaps.
- **Academic Writing and Editing:** Using AI tools to check grammar and style, and to draft specific manuscript sections while ensuring originality.
- **Data extraction and structuring:** Using LLMs to retrieve targeted information from diverse sources and convert unstructured data into structured formats.
- **Automated data analysis and visualisation:** Identifying trends and patterns in research data and generating insightful, interactive visualisations.
- **Research communication and future trends:** Creating AI-assisted presentations and posters, and discussing the future impact of AI on academic disciplines.

Resource Person

Sunil Prabhakar is a leading consultant and trainer who specialises in the practical application of artificial intelligence and digital practices. He empowers academic, industrial and government organisations to use AI to innovate and increase efficiency. His areas of expertise include AI-powered academic research, strategic workflow optimisation and the ethical integration of AI in education. He designs and delivers high-impact training programmes, including a workshop series supported by the World Bank for Kerala Agricultural University. Sunil has successfully trained numerous professionals in using AI to enhance communication, analyse data, and create effective content. A strong advocate for responsible innovation, he is a key enabler for organisations navigating the evolving AI landscape, helping them to translate complex technology into tangible results.



Pre-requisites for Participants (Advised)

- Come with Good laptops and your own high speed internet connection. Sharing one connection may create some problems. If laptop is not available bring a smartphone with high speed internet connection.
- Create following free accounts [1. GMail (<https://accounts.google.co.in>) 2. Microsoft (<https://account.microsoft.com/account/Account>) 3. Adobe (<https://account.adobe.com/>) 4. ChatGPT (<https://chatgpt.com/>) 5. <https://grok.com/> 6. <https://chat.deepseek.com/> 7. <https://www.perplexity.ai/>]
- If possible install following Apps in your iPhone / Android Phone / Laptop:

ChatGPT

Grok

Perplexity

Deepseek

Gemini

NotebookLM

Claude AI

- Create an account in Google Keep (<https://keep.google.com>) with your GMail ID. If possible install Keep App in your mobile
- Download and keep the pdf versions of your favourite textbooks / chapters / research papers / notes / documents and keep it in your device (Smartphone / Laptop)
- Bring notebook and pen
- Reach on time



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& The Kerala State Higher Education Council**