



INVITED SESSION

The 12th International conference on Innovation in Medicine and Healthcare (KES-InMed-24), 19-21 June 2024, Madeira, Portugal

The Full Papers conference proceedings will be published by Springer as book chapters in a volume of the KES Smart Innovation Systems and Technologies series, submitted for indexing in Scopus and Thomson-Reuters Conference Proceedings Citation Index (CPCI) and the Web of Science. (The Short Papers and Abstracts conference proceedings will be published online and will not appear in the Springer volume).

Title of Session:

Healthcare Transformation through Deep Learning and Big Data

Name, Title and Affiliation of Chair:**Prof. Ahmad Taher Azar, IEEE Senior Member**

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Details of Session (including aim and scope):

In the contemporary realm of healthcare, the convergence of advanced technologies has sparked a paradigm shift, propelling the industry into a new era characterized by unprecedented opportunities and challenges. At the forefront of this transformation are Deep Learning and Big Data, two dynamic domains that have seamlessly integrated into the fabric of healthcare to revolutionize the way we understand, diagnose, and treat various medical conditions.

This special session seeks to delve into the intricate interplay between Deep Learning and Big Data within the healthcare landscape, unraveling the multifaceted ways in which these technologies are fostering a profound metamorphosis. Deep Learning, with its capacity to discern intricate patterns within vast datasets, has emerged as a linchpin in medical diagnostics, prognostics, and treatment optimization. Concurrently, the exponential growth of healthcare-related data, propelled by electronic health records, wearables, and other sources, has provided an unprecedented repository for insights that were once elusive.

The fusion of Deep Learning and Big Data in healthcare promises to not only enhance clinical decision-making but also streamline operational processes, reduce costs, and ultimately improve patient outcomes. From image recognition for early detection of diseases to predictive modeling for personalized treatment plans, the applications are far-reaching and transformative.

As we embark on this intellectual exploration, the special session aims to bring together experts, researchers, and practitioners from diverse backgrounds, fostering a collaborative environment for the exchange of ideas, methodologies, and breakthroughs. Through a series of presentations, discussions, and case studies, participants will gain invaluable insights into the latest advancements, challenges, and potential future directions in the realm of healthcare transformation through the integration of Deep Learning and Big Data.

Topics of interest for submission include but are not limited to:

- Artificial Intelligence in Healthcare
- Big Data
- Clinical Research
- Data Analytics
- Data-driven Decision Making
- Deep Learning
- Disease Detection and Diagnosis
- Electronic Health Records
- Healthcare Automation
- Healthcare Data Security
- Healthcare Innovation
- Healthcare Transformation
- Health Informatics
- Integration of Technology in Healthcare
- Machine Learning in Healthcare
- Medical Imaging Analysis
- Patient Care Optimization
- Patient Outcomes
- Personalized Healthcare
- Precision Medicine
- Predictive Modeling
- Remote Patient Monitoring

Main Contributing Researchers / Research Centres (tentative, if known at this stage):

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Important Dates:

- Submission of Papers: 15 January 2024
- Notification of Acceptance: 19 February 2024
- Upload Final Publication Files: 11 March 2024

Website URL of Call for Papers (if any):

<http://inmed-24.kesinternational.org/submission.php>

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