



11<sup>th</sup> International Conference on Control,  
Decision and Information Technologies

July 15- 18, 2025

Split, Croatia

## CALL FOR PAPERS - SPECIAL SESSION

### “Artificial Intelligence trends for healthcare optimization: Metaheuristics, Machine learning and IOT”

for **CODIT 2025**

July 15-18, 2025 ▪ Split, Croatia

#### Session Co-Chairs:

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#### Session description:

This session deals with the problem of advancing solutions for healthcare optimization using metaheuristics and machine learning. In a world where the healthcare industry continues to thrive and grow due to increasing demands in diagnosis, treatment, and services, all of which significantly impact mortality rates and the overall quality of human life. Optimization challenges within the healthcare sector can be modeled as scheduling, planning, prediction, and routing problems. In addressing these complex problems, metaheuristics and machine learning methods play pivotal roles. From computer-aided diagnosis to predictive modeling for disease prevention, machine learning techniques have the potential to revolutionize how healthcare challenges are approached and resolved. Similarly, metaheuristics, known for their robustness in solving NP-hard optimization problems applied to healthcare issues.

The goal is to explore and discuss the application of metaheuristic and machine learning techniques in healthcare optimization. It seeks to bring together researchers and practitioners to share insights, methodologies, and advancements in solving healthcare-related problems. The overarching goal is to contribute to the enhancement of healthcare quality while concurrently addressing the economic and human costs associated with the industry.

The topics of interest include, but are not limited to:

- Metaheuristics for healthcare scheduling problems
- Ambulance routing problem in emergency scenarios
- Integrating deep learning and evolutionary algorithm
- Performance hospital logistics chain
- Emergency medical systems
- Patient admission scheduling

- Learnheuristics
- Routing solutions in healthcare
- Patient bed assignment problem
- Healthcare decision support systems

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## SUBMISSION

Papers must be submitted electronically for peer review through PaperCept by **February 07, 2025**: <http://controls.paperccept.net/conferences/scripts/start.pl>. In PaperCept, click on the **CoDIT 2025 link** "Submit a Contribution to CoDIT 2025" and follow the steps.

**IMPORTANT:** All papers must be written in English and should describe original work. The length of the paper is limited to a maximum of 6 pages (in the standard IEEE conference double column format).

## DEADLINES

February 07, 2025: deadline for paper submission

April 27, 2025: notification of acceptance/reject

May 17, 2025: deadline for final paper and registration