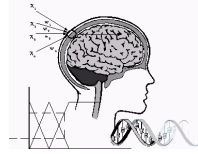




International

*Innovation in Knowledge Based and Intelligent
Engineering Systems*



INVITED SESSION SUMMARY

Title of Session:

AI, Robotics, and Human Machine Systems (IROHMS) for Medical and Healthcare Applications

Name, Title and Affiliation of Chair:

Chair: Dr Yulia Hicks, Cardiff University, UK

Co-Chair: Dr Hiroharu Kawanaka, Mie University, Japan

Co-Chair: Professor Rossi Setchi, Cardiff University, UK

Details of Session (including aim and scope):

Research in Artificial Intelligence (AI), Robotics and Human Machine Systems underwent huge development over the last decade and is starting to have effect on life of people in all areas, including medical, clinical and healthcare applications.

Although the idea of integrating robots into medicine and healthcare is not new, the introduction of AI and combining AI with robotics will produce a revolution in medicine and healthcare. Some of the main areas where these technologies are going to have powerful impact is the ability to make an earlier and more precise diagnosis; improved accuracy of surgery; remote treatment; enhancing and augmenting human abilities and supporting elderly and incapacitated people in daily tasks.

In this session, we aim to gather not only engineering researchers but also medical practitioners to discuss the most recent and innovative technologies and to define new problems in this field. Topics of interest for submission include, but are NOT limited to:

- AI for Early Detection and Diagnosis
- AI-assisted Disease Management Methods and Systems
- AI-assisted Devices for Medical and Healthcare Use
- Robot Assisting Systems for End of Life Care
- Robot Assisting Systems in Medical/Clinical Fields
- AI and Robotics for Clinical Training
- Emerging Trends in Medicine and Healthcare

Important Dates:

Submission of papers: **April 24th, 2020**

Notification of Acceptance: **May 10th, 2020**

Receipt of publication files: **May 29th, 2020**

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

Centre for Artificial Intelligence, Robotics and Human-Machine Systems, Cardiff University
Graduate School of Engineering, Mie University

Website URL of Call for Papers (if any):

<https://sites.google.com/view/kes2020is>

Email & Contact Details:

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