



**IEEE SMC 2022**  
**International Conference on Systems,  
Man, and Cybernetics**  
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## Special Session

Code: hky29

### Title

**Human motion analysis and applications**

### Proposer / Main Organizer

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### IEEE Member or SMC Society Member

IEEE Senior Member: Prof. Baihua Li, Prof. Shengyong Chen, Prof. Naoyuki Kubota

IEEE Member: Dr. Bangli Liu

### Category

Human-Machine Systems

### Number of Expected Paper Submissions:

*6 or more*

### Keywords

Intelligent sensing

Motion tracking

Human motion modelling and analysis

### Brief Description and Justification (200-250 words):

Human motion analysis plays an important role in applications such as healthcare, video surveillance, elderly care, virtual reality, and human-machine interaction. Quantitative analysis of human motion is a powerful tool to support objective human body movement evaluation, which has the potential to assist decision making processes in the context of rehabilitation. Despite active research and significant progress have been achieved in recent decades, effectively transforming multimodal motion data and interpreting human motion in rehabilitation is still challenging due to the viewpoint variance, occlusion, and different performing habits. This special session will report research results in the field of human motion analysis, including as applied to intelligent sensing, assistant robotics, and rehabilitation. This also provides researchers an excellent opportunity to share ideas and to discuss the recent advances and emerging issues in this field.