



## AC 2022

### 16TH INTERNATIONAL CONFERENCE ON AUGMENTED COGNITION

Jointly held under one management and one registration with HCI International 2022

#### HCI International 2022

26 June - 1 July 2022

The Conference will be  
held virtually

<http://2022.hci.international/ac>

#### Chairs

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The main goal of the field of Augmented Cognition is to research and develop adaptive systems capable of extending the information management capacity of individuals through computing technologies. Augmented Cognition research and development is therefore focused on accelerating the production of novel concepts in human-system integration and includes the study of methods for addressing cognitive bottlenecks (e.g., limitations in attention, memory, learning, comprehension, visualization abilities, and decision making) via technologies that assess the user's cognitive status in real time. A computational interaction employing such novel system concepts monitors the state of the user, through behavioral, psychophysiological and/or neurophysiological data acquired from the user in real time, and then adapts or augments the computational interface to significantly improve their performance on the task at hand.

The Augmented Cognition (AC) Conference, an affiliated conference of the HCI International Conference, arrived at its 16th edition, solicits papers from academics, researchers, industry and professionals, on a broad range of theoretical and applied issues related to Augmented Cognition and its applications.

#### The related topics include, but are not limited to:

- Augmented Cognition: Evolving Theory and Practice
- Neural Ergonomics and Operational Neural Science
- Physiological Measuring and Human Performance in Operational Settings
- Understanding Human Cognition and Behavior in Complex Tasks and Environments
- Brain Activity Measurement: electroencephalography, fNIRS, eye tracking
- Cognitive Load and Performance
- Applied Cognitive Modeling, Perception, Emotion and Interaction
- Cybernetics and Artificial Intelligence for adaptive training systems
- Closed-Loop Human-Machine Design and Development
- Crowd-augmented cognition
- Biofeedback for applied science
- Shared Cognition, Team performance, and Decision Making
- Context aware adaptive techniques and systems
- Virtual and Augmented Reality Techniques for augmented cognition applications
- Accelerated Learning through augmented learning and training
- Predictive technologies for enhancing real world performance
- Novel brain-computer interface technologies
- Rehabilitation and Cognitive Aids
- Interactive technologies for population with special needs

Submission deadlines are available at the HCII 2022  
website:

<http://2022.hci.international/submissions>

Conference proceedings published by

