Special Session:

Resilience of cyber-physical production systems

Organizers

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Description:

Resilience becomes a key performance criterion that should be considered in relation to the traditional criteria used in the management of cyber-physical production systems - CPP - (flexibility, responsiveness, reliability, etc.). The objective of this session is to highlight the research on resilience in the management of complex systems sunder uncertainties. Its aim is to carry out a mapping of the works related to resilience and its application in different domains and scientific disciplines. The fourth industrial revolution as well as the sustainable current constraints promise enhanced connection between smart systems and people and become a good context to make systems more resilient. The challenges of resilience in CPP have also captured the interest of the SOHOMA community. Similarly, this session will serve as a forum emerging interdisciplinary research relevant to resilience and performance improvement of CPPs within the current Industry 4.0 context.

In accordance with the above-mentioned themes, possible topics may include:

* Resilience based simulation.
* Resilience measurement approaches
* Information systems
* Decision-making systems
* key enabling technologies for resilience measurement.
* CPPs performance improvement
* Multi-criteria analysis including resilience.
* scheduling problems
* Resilience within sustainable constraints

Considering the theme of the workshop, research that applies the service-oriented, holonic and/or multi-agent systems approaches to the human integration challenge will be of particular interest to the SOHOMA community. Conceptual, positioning, and short review papers, as well as papers reporting on case study implementations, are welcome.

Keywords: Resilience; Cyber-Physical production systems; Simulation; Measurement; Industry 4.0; Sustainability

**Important dates:**

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| Full paper submission: | May 15, 2023 |
| Notification of acceptance/Rejection: | June 15, 2023 |
| Final camera-ready paper submission: | July 10, 2023 |
| Early registration and fee payment: | July 15, 2023 |
| SOHOMA 2023 Workshop | September 28-29, 2023 |
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More information: [https://sohoma2023.sciencesconf.org](https://sohoma2023.sciencesconf.org/) - Email: [sohoma2023@sciencesconf.org](mailto:sohoma2023@sciencesconf.org)