



Call for Papers

Workshop on Robot-based Inspection Systems and Post-processing Tools

Organized and Co-Chaired by

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❖ **FOCUS.** Maintenance of industrial installations and facilities typically require from inspection tasks to be performed on a regular basis. Buildings, electrical towers, nuclear plants, ships, aircrafts, underwater installations, etc. need to be periodically inspected to ensure that they are in good condition for a normal operation. Nowadays, inspections are mostly performed by human surveyors who have to systematically examine the infrastructure according to well-established standards. Progress in mobile robotics has recently allowed for the development of more or less automated systems aiming at supporting these activities. Moreover, the industry is now in the process of incorporating this kind of systems into inspection processes as part of standard procedures.

❖ TOPICS

- ❖ Robotic assistants in inspection
- ❖ Control architectures for inspection
- ❖ Perception for inspection robotics
- ❖ Advanced sensors for inspection robots
- ❖ Navigation for inspection robots
- ❖ Multi-robot solutions for inspection
- ❖ Robot interaction with the environment and non-destructive testing
- ❖ Machine learning for inspection
- ❖ Post-processing and visualization tools for inspection
- ❖ Human-robot interaction for inspection
- ❖ Inspection applications and use cases involving robotic systems
- ❖ New paradigms and trends in robot-based inspection systems
- ❖ Performance assessment (including infrastructures for assessment, protocols, regulations, safety, etc.)

❖ **AIM.** This workshop is organized within the framework of the EU-funded research project ROBINS (<https://www.robins-project.eu/>), with the aim of complementing the research carried out within it, bring together experts in the field of infrastructures inspection and raise awareness on the importance of the topic.

❖ **WORKSHOP FORMAT.** The workshop will be held on the first day of the conference, i.e., Sept. 8th. Papers are limited to 8 double column pages; they must comply with ETFA guidelines regarding formatting and must be submitted electronically in PDF format through the conference submission system. Accepted papers must be presented at the workshop in order to be included in the ETFA conference proceedings available at IEEE Xplore.

❖ AUTHOR'S SCHEDULE (2020)

Workshop papers

Submission deadline	May 13
Acceptance notification	June 10
Deadline for final manuscripts	June 17

Workshop Program Committee

- ❖ Javier Antich, University of the Balearic Islands, Spain
- ❖ Marco Bibuli, CNR-INM, Italy
- ❖ Francisco Bonnin-Pascual, University of the Balearic Islands, Spain
- ❖ Adrien Briod, Flyability, Switzerland
- ❖ Pascual Campoy, Technical University of Madrid, Spain
- ❖ Joan P. Company-Corcoles, University of the Balearic Islands, Spain
- ❖ Emilio García-Fidalgo, University of the Balearic Islands, Spain
- ❖ Alessandro Grasso, RINA Services S.p.a, Italy
- ❖ Antoni Grau, Technical University of Catalonia, Spain
- ❖ José Guerrero, University of the Balearic Islands, Spain
- ❖ Moritz Oetiker, General Electric Inspection Robotics, Switzerland
- ❖ Cédric Pradalier, GeorgiaTech Lorraine – CNRS, France
- ❖ Óscar Reinoso, University Miguel-Hernandez (Elche), Spain
- ❖ Cesare M. Rizzo, University of Genoa, Italy
- ❖ Borja Serra, Blueye Robotics, Norway
- ❖ Olivier Simonin, University of Lyon, France
- ❖ João Sousa, University of Porto, Portugal
- ❖ Raul Suarez, Technical University of Catalonia, Spain
- ❖ Stephan Weiss, Alpen-Adria-Universität Klagenfurt, Austria