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Special Session

RFID for Healthcare and Wearable Applications

SESSION ORGANIZERS

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ABSTRACT

RFID devices are increasingly becoming a pillar of the Healthcare Internet of Things (H-IoT) systems that are essential to enable new services while reducing costs and environmental impact. Moreover, recent advances in material and manufacturing technologies allow for even more bio-integrated reader and tags that are comfortable for the wearer so to foster the acceptance and diffusion of the RFID framework for body-centric communications. The last generation of IoT system can therefore exploit both environmental and body-worn RFID sensors to support the user during daily life, for example, by sensing the wearer's body and seamlessly use the information for telemonitoring and remote health services.

The special session will host research on RFID development and applications in the broad area of healthcare and wearable devices.

Topics:

- RFID-based sensor and systems for assessing health status.
- Management of medical devices and records by RFID.
- RFID for the Home-hospital (hospital-at-home) paradigm.
- Wearable and epidermal RFID towards 5G framework.
- On-skin bio-integrated RFID antennas and sensor.
- RFID sensors and antennas embedded in prosthesis.
- Activity detection, localization, and tracking through body-worn RFID.
- Electromagnetic compatibility and exposure of RFID in hospitals.
- Application to the fight against COVID-19.