Call for Papers

2nd Workshop on Smart Building and Internet of Things (SBIoT)

To be held in conjunction with Global IoT Summit (GIoTS), 3-5 June 2020, Dublin, Ireland.

https://globaliotsummit.org/#call-for-papers

Workshop Chairs

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Important Dates

Paper submission:
March 15, 2020

Acceptance Notification:
April 15, 2020

Camera-Ready:
April 30, 2020

The Internet of Things (IoT) enables network objects of the most diverse types to dynamically cooperate and make their resources available in order to reach a common goal. Such a paradigm is currently revolutionizing a variety of fields, facilitating and improving human life and work. Among them are Smart Buildings, which take advantage of the pervasive presence of embedded and smart devices to monitor and to remotely control key equipment within buildings. In such an intelligent environment, major goals are to improve the comfort and quality of life of people and to provide decision-support tools in order to aid users in making cost-effective decisions when utilizing electrical energy.

Smart Buildings integrate autonomy and adaptive control and are considered as the next generation of buildings that contribute in enabling Smart Cities. Smart Buildings link automation, sustainable development, information technology, security, industrial controllers and communications (among other systems) to achieve an optimal level of comfort and energy consumption. As the indoor environment is being increasingly digitized, traditional building automation processes are rapidly reshaping to build the next revolution. Indeed, IoT will be one of the founding pillars of Society 5.0, a super-smart people-centric society in which both economic prosperity and resolution of societal challenges are achieved.

The main challenge of Society 5.0 is to develop people-centric applications, where the presence of intelligent tools can augment the capabilities of the objects in constructing a relationship with users and exploit the user profile to construct personalized services; moreover, it is important to define methodologies and algorithms to analyze and exploit the context in which users live and work.

Based on these considerations, the objective of this workshop is to highlight recent research, development, and evaluation of novel systems in Smart Building scenarios. We are seeking for original, previously unpublished work, addressing key issues and challenges in this area.

Potential topics include, but are not limited to:

- Active and Collaborative Sensing in Smart Building
- Behavioral and Energy Consumption Analytics
- Implementation of Social IoT for Smart Building
- IoT applications, systems, and testbeds for Smart Building
- IoT-enabled indoor revolutions: Industry 4.0 and Society 5.0 in Smart Buildings
- Models of context and context awareness
- IoT for Smart Building devices and accessibility
- New design paradigms in human-machine interaction for Smart Building
- Cloud and mobile cloud architectures supporting Smart Building through IoT
- Privacy-preserving data processing techniques
- Big data, analytics, and signal processing for Smart Building enabled by an IoT approach
- People-centric applications in Smart Building
- Algorithms, architectures and platforms for Active and Assisted Living
- Safety and Security preservation in Smart Building
- Indoor location and guidance applications