

SERVICE ORIENTATION FOR INTELLIGENT BUILDING MANAGEMENT: AN IOT AND IOS PERSPECTIVE

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ABSTRACT: The present work introduces a research perspective on developing Intelligent Building Management solutions based on a service-centric conceptual framework that the authors previously developed. The proposed conceptual framework relied on the service oriented architecture approach and its related supporting technologies, tools, mechanisms that facilitate discovery, integration, processing and analysis of datasets collected from various home appliances. In order to further develop the above mentioned service-centric conceptual framework, this paper proposes an extensive integration of emergency protection systems that take could into account a varied range of hazards and disasters, from small fires to earthquakes. According to this new way of approaching the more broader concept of *smarter building*, according to the basic research principles of the Internet of Things and Internet of Services, potential users might be able to compose services useful to them, to match their own needs at a particular moment and context, or to access services through at hand devices in situational scenarios. In this respect, the paper makes a broad introduction on perspectives and terminology dedicated to the Intelligent Building Management research domain, creating an integration path in the perspective of IoT and IoS.

KEYWORDS: *intelligent building management, smart home, smarter home, service orientation, service oriented architecture*

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