Smart Data Systems and Applications - Situational-Context Position Statement

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As the number of devices connected to the IoT increases, so increases their presence in all kinds of industries. This also implies an increment in the interactions required between users and those systems. To reduce the barriers to entry for the use of these technologies we have proposed the Situational-Context. A computational model to allow Internet of Things software to automatically adjust its behavior to the context of its users through service provisioning from smart devices [1].

Our initial efforts in these concepts led us to the creation of a technological company (www.gloin.es) working on comercial solutions for these aspects. On the research front we have been focused on machine learning in smart devices, on the analysis of resource consumption of service provisioning from the devices[3], and on its application to Smart Healthcare[2]. In this topic we are currently members of the 4IE european project (0045-4IE-4-P) funded by Interreg V-A España-Portugal (POCTEP). This project is focused on using technology for improving the living conditions of aging population living in areas with low population density.

Besides, we still have to address several open challenges that emerges from the Situational-Context. These challenges are related with the exchange of large quantities of contextual information between devices, the reach of agreements between those devices and the seamless management of significant changes in the devices context.

Therefore, we are actively seeking to get involved in potential initiatives resulting from this sysmposium that could help us further our research or industrial interests in these or related topics.

References

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