A Survey on Improved Framework for Smart Phone using Internet of Things

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Abstract: The explosive growth of Internet of things and particularly of the Internet has created many stability and security problems. The Internet of things is a part of future network and will comprise many billions of internets connected to objects or things where we can sense communicate, compute and potentially actuate as well as have intelligence. Now in the world internet is the most important things and upto 99% people have mobile. So many people have Smartphone; we combine both things for our future work. Normally we can communicate by using smart phones without internet of things this is difficult of observes what operations going on. We want to observe the Smartphone operation and supervise that operations going on by using internet of thing. If one company provide the smart phone to their employees for company purpose but some employees, use it for their personal use or employee not working properly their Smartphone's so by using Internet of things of Smartphone we can supervise what operations going on. We can also find out that Smartphone GPS location .we can also think to provide caller identity and type of service. The Internet of thing by using Smartphone we also can send the message and main operations is supervise the which operations going on our mobile. So by using this any person not misuses the Smartphone for their own purpose.

Keywords: Internet of things, Job processing, Smart phone.

1.Introduction

As software world evolve, the internet data usage, importance and security increased largely. Internet of Things (IOT) is a fast growing innovation that will greatly change the way humans life. It can be thought of as the next big step in Interest technology. What really enable IOT to be a possibility are the various technologies that build it up. There is an increasing interest in Internet of Things (IOT) and Smartphone is considered to be one of the most common applications of it. Using the IOT paradigm, various operations including GPS location, Caller identity, Type of Data Service, to make calls, Send message, Data sharing, Supervise can be used for monitoring Smartphone. In this study, we model an IOT use case scenario with regard to monitoring the activities associated with mobile.

Internet of Things (IOT) is a concept that aims to enhance the forms of communication that we have today. Currently, the Internet is a network tool that humans access using devices. The main form of communication is human –human .IOT attempts to not only have humans communicating through the Internet but also have objects or devices. These things are to be able to exchange information by themselves over the Internet, and new forms of Internet communication would be formed, human-things and things-things. The number of things connected to the Internet will be much larger than the number of human, and things become the major generators and receivers of traffic.

The Internet of Things (IOT) is a technology born out of a network. On the ends of the network are information sensing equipment and systems. These are devices that are able to obtain data or information from the physical world. Through a network, these objects can be connected to other such devices or other smart objects. Smart objects are able to analyze the data obtained from the information sensing equipment and make independent decisions.

If we use IOT then there will be some issues like as Security (Signal interference ,Sniffing). The Internet of Things we can use in Smartphone that supervise the operations going on.

2. Literature Survey

To detect different kinds of Internet of Things effectively, various techniques have evolved. These techniques have shown some constraint such as they are applicable for certain Applications. The following literature survey explains various research works proposed and conducted in order to detect and prevent different Internet of Things.

1) A Survey of Technologies in Internet of Things. Jasper Tan, Simon G. M. Koo

Internet of Things (IoT) is a fast-growing innovation that will greatly change the way humans live. It can be thought of as the next big step in Internet technology. What really enable IoT to be a possibility are the various technologies that build it up. The IoT architecture mainly requires two types of technologies: data acquisition technologies and networking technologies. Many technologies are currently present that aim to serve as components to the IoT paradigm. This paper aims to categorize the various technologies present that are commonly used by Internet of Things.

2) Towards Simulating the Internet of Things

Stelios Sotiriadis, Nik Bessis, Eleana Asimakopoulou and Navonil Mustafee

There is an increasing interest in Internet of Things (IoT) and healthcare is considered to be one of the most common applications of it. Using the IoT paradigm, various devices including smart-phones and sensor-embedded healthcare applications can be used for monitoring health. In this study, we model an IoT use case scenario with regard to monitoring the activities associated with health. In particular, we present our use case using the SimIoT extended simulation toolkit to demonstrate the various functions and the interactions occurring within the IoT-enabled healthcare context. Specifically, we extend the functionalities of the SimIC simulation toolkit by adding the IoT layer that incorporates IoT devices which generated data for the private clouds. We focus our experimental analysis from the perspective of cloud performance to illustrate the turnaround and makespan of the system.

3) A Large-Scale Empirical Study on Software Reuse in Mobile.

Israel J. Mojica, McAfee

MOBILE APPS ARE applications developed to run on devices such as smartphones or tablets. Users typically access them through online app stores, such as Google Play, Black-Berry World, the Apple App Store, and the Windows Phone marketplace. The number of available products is staggering, with Google Play alone offering 700,000 apps at the end of 2012

4) MOSDEN: An Internet of Things Middleware for Resource Constrained Mobile Devices.

Charith Perera, Prem Prakash Jayaraman, Arkady Zaslavsky, Dimitrios Georgakopoulos

The Internet of Things (IoT) is part of Future Internet and will comprise many billions of Internet Connected Objects (ICO) or 'things' where things can sense, communicate, compute and potentially actuate as well as have intelligence, multi-modal interfaces, physical/ virtual dentities and attributes. Collecting data from these objects is an important task as it allows software systems to understand the environment better. Many different hardware devices may involve in the process of collecting and uploading sensor data to the cloud where complex processing can occur. Further, we cannot expect all these objects to be connected to the computers due to technical and economical reasons. Therefore, we should be able to utilize resource constrained devices to collect data from these ICOs. On the other hand, it is critical to process the collected sensor data before sending them to the cloud to make sure the sustainability of the infrastructure due to energy constraints. This requires moving the sensor data processing tasks towards the resource constrained computational devices (e.g. mobile phones). In this paper, we propose Mobile Sensor Data Processing Engine (MOSDEN), an plug-in-based IoT middleware for mobile devices, that allows to collect and process sensor data without programming efforts. Our architecture also supports sensing as a service model. We present the results of the evaluations that demonstrate its suitability towards real world deployments. Our proposed middleware is built on Android platform.

5) J. Nakamura, Image sensors and signal processing for digital still cameras. CRC Press

J. Nakamura

Image Sensors and Signal Processing for Digital Still Cameras focuses on image acquisition and signal-processing technologies in DSCs. From the perspective of the flow of the image information, a DSC consists of imaging optics, an image sensor, and a signal-processing block that receives a signal from the image sensor and generates digital data that are eventually compressed and stored on a memory device in the DSC. The image acquisition part of that flow includes the optics, the sensor, and front-end section of the signalprocessing block that transforms photons into digital bits. The remainder of the signal-processing block is responsible for generating the image data stored on the memory device. Other technologies used in a DSC, such as mechanics, data compression, user interface, and the output-processing block that provides the signals to output devices, such as an LCD, a TV monitor.

6) Review of the use of biosensors as analytical tools in the food and drink industries.

L. D. Mello and L. T. Kubota

The requirements for application of most traditional analytical methods to environmental pollutants analysis often constitute an important impediment for their application on a regular basis. These analysis calls for fast and cost-effective analytical techniques to be used in Extensive monitoring programs. So, the need for disposable systems or tools for environmental applications has encouraged the development of new technologies and more suitable methodologies. In this context, biosensors appear as a suitable alternative or as a complementary analytical tool. Biosensors can be considered as a subgroup of chemical sensors in which a biological mechanism is used for analyze detection

7) The application of radio frequency identification technology on tires tracking

Y. Wang, Y. Wu, Y. Liu, and A. Tang

The tire has an extensive application in automanufacture. The tracing of tires is very important to the entire supply chain of automanufacture industy. Radio frequency identification systems are one of the most anticipated technologies that will supposedly transform processes across the engineering and production industries. In an effort, this paper refers to use radio frequency identification technology in order to improve the efficiency of tracking tires, improve the warehouse management of the tire, envelop the quality tracking with the high efficiency and finish the after market compensations. This RFID system develops a tire tracking method and information system which includes production inventory management process, and after market compensation management.

8) Research and design on radio frequency identification reader

L. Qiwei

The function and the fundamental rule of the radio frequency identification (RFID) were introduced in the paper. The protocol of radio frequency identification system and the demand of radio frequency identification system to the radio frequency criterion were analyzed. On the based of analyses, a design scheme and corresponding circuit structure for RFID reader was proposed. The scheme was based on international standard ISO 15693 and worked at the frequency band of 13.56 MHz to identify electron label.

9) Automatic identification technologyapplication of twodimensional code

T. Sun and D. Zhou

With the modern development of intelligent information society, automatic identification technology will be a research priority. This article focuses on one field of automatic identification technology - two-dimensional code technology. By studying the application of two-dimensional codes, the application of certain areas could be promoted, so as to improve the development of automatic identification technology in China, promote China's economic growth, contributed to the international Internet of Things technology

3. Conclusion

This paper gives an overview on the Internet of Things Concept. The number of mobile devices connected to the Internet is growing at a rapid space. Significant portion of these devices are mobile phones today. However, it is expected that billions of different types of resource constrained computational device will be connected to the Internet over the coming decade. In this paper the internet of things can supervise the operations of smart phone. We can find the GPS location, caller identity ,type of data service, send message . We can improve the speed of the smart phone using internet of things.

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