IoT (Internet of Things)

Sk Wasim Ali

1. INTRODUCTION

"Internet of Things", the term itself describes its properties. The Term is first said be Kevin Ashton, a British Entrepreneur in 1999. Actually "Things" refer to the object or devices around us. Internet of Things means wide variety of devices has the ability to do networking via internet and sharing of data among them globally and those devices can be controlled via remote connectivity. Basically IoT is an environment to transfer data over a network without human-human or human-computer interaction. More over IoT refers to semantic web's linked data which are vast part of Big Data. It includes wide variety of devices, sensors, cloud based services and data's. In the generation of Artificial Intelligence, it can be called as a big revolution of technology.

2. BENEFITS

IoT is the big revolutions and Up gradation of technology. Why we need of IoT? Then we should 1st ask our self, why we need of technology? Technology makes our life efficient and easy. So, if technology gets upgraded obviously our life will be more comfortable and easy to access every digital world artificial tech products. We can access our large systems of device via single click through a small device as a remote device in hand. IoT refers to connectivity of necessity around us. Benefits are huge to reveal. Human life will get a new system via which they can get easily fulfil their hard work demands. Moreover IoT provides cost effective system. It may look 1st time investment is high then usual investment but IoT provides long time benefit, via just one investment policy. It's obviously always better if we pay for a single device to access large number of devices data collections, without paying for large number of devices cost. So cost effectiveness is always there. Secondly, if we have to use large number of devices then we may need more employee to handle large sets of data receives but if single device can access those, why need of more employee!! So, labour cost decreases. Benefits are huge.

3. LIMITATION AND THREATS

Where there are pros, there are cons also. In the world of technology there is nothing like security. We always say of security, but yes there is nothing like secured. If there is 100 ways of breaking a security system, then ways of intrusion alerts are negligible. So, detection of Intrusion and searching of intruder is hard to find out. Moreover every digital data flow networking products can face Man-In-The-Middle Attack or complete Hijack. So, Security of data transmission and receiving correct data depends on the secure protocols of Organization. Limitation and existence of threats are always dependable on the product architecture and security solutions of products.

REFERENCES

- [1] "Internet of Things Global Standards Initiative"
- [2] https://hbr.org/resources/pdfs/comm/verizon/18980_HBR_Verizon_IoT_Nov_14.pdf
- [3] http://www.internet-of-thingsresearch.eu/pdf/Converging_Technologies_for_Smart_Environments_and_Integrated_Ecosystems_IERC_Book_Open_Access_2013.pdf
- [4] http://www.cisco.com/web/solutions/trends/iot/introduction_to_IoT_november.pdf
- [5] http://cordis.europa.eu/fp7/ict/enet/documents/publications/iotrevolution.pdf
- [6] http://www.vs.inf.ethz.ch/publ/papers/Internet