**5G Mobile Network**

**Abstract :**

This paper focuses on the new technologies coming to the market in the field of mobile network. Currently people are using 1G, 2G, 3G & 4G. So there are 4 generations of wireless network are available. It is said that after every decade, a new wireless network comes in the market. After 4G, now the world is moving towards 5G network. This paper focuses on the previous versions of wireless network, issues related to them, need of 5G & applications of 5G. This paper also includes the on-going research on 5G & proposed 5G architecture.

**Objectives:**

I propose to write a paper on 5G mobile network including different technologies developed or under development for supporting different prospective services of 5G. With this paper, I will be able to achieve following goals:

1. Describe the evolution of mobile network.
2. Need of 5G
3. Different prospective services availed in 5G
4. Different architectures like Software Defined Radio(SDR), All-IP used in 5G for supporting the prospective services
5. On-going research on 5G
6. Applications of 5G

**Plan of Action:**

This section presents my plan for obtaining the goals or objectives that I have mentioned above. For my research, I will look for different research papers on the technologies related to 5G, information on the architectures used in 5G, shortcomings of previous generation networks which lead to development of 5G.

First of all, I will start with the evolution of mobile network from time to time. This will also include the shortcomings of that network generation then the services provided by that generation.

Next, I will proceed with the architectures used in the previous generations & (if used then) the use of them in 5G. There are some architectures which are underdevelopment & research which I will with the services provided by them.

Lastly, I will include the advantages of 5G, & new prospective services, facilities & applications of 5G. I will also include the on-going research on 5G by the different institutions & companies including their collaboration.

**Outcomes :**

The whole world is keeping an eye on the new immerging technologies of mobiles. 5G is one of the most hot topics in upcoming technologies. This paper will atleast include need of 5G, 5G applications, 5G architectures, advantages, services supported by 5G.

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