10   Overview of 5G Technologies

In the following two chapters, several key technical enablers are discussed.

In Chapter 11, the latest updates concerning several radio access technologies are chosen and summarized. Each technology has specific advantages supporting or serving under certain foreseen use cases and could be an essential part of a heterogeneous network. This collected information would be useful and beneficial in consolidating an actual 5G communication system after carrying out relevant studies at the ITU-R or establishing technical standards at standardization organizations. The related baseline research can be found in [1].

Chapter 12 outlines the network technology in order to realize 'extremely flexible networks' which will be able to serve a variety of services having variety of demands in real-world markets. Four focus areas, namely 'network softwarization', 'network operation and maintenance', 'network fronthaul and backhaul', and 'mobile edge computing', have been considered. One major area of consideration is 'network softwarization' which includes penetrating Network Function Virtualization (NFV) / Software Define Networking (SDN), with the ultimate goal being to virtualize network functions. This chapter spans technology outlines and their use cases as well as technical challenges necessary to deploy a working network that is 'extremely flexible'

Reference:
 [1]   "Mobile Communications Systems for 2020 and beyond," ARIB 2020 and Beyond Ad Hoc Group White Paper, Oct.2014.