

ABSTRACT

Technology of CDMA2000 was developed by an international working group so-called Third Generation Partnership Project 2 based-on IS-2000 platform. CDMA2000, one of several kinds of mobile radio transmission technologies, is equipped with data access supporting element, the Packet Data Serving Node (PDSN). R-P or A10/A11 interface, in CDMA2000 network, is a packet data interface connecting the Base Station Controller (BSC) to/from PDSN. The R-P interface provides mobility support in CDMA2000 network for mobile IP.

The term mobile IP refers to a new internet protocol designed to support users' mobility. Mobility is considered to be one of several crucial aspects in wireless network.

This final task will take an analysis on implementation of R-P interface in CDMA2000 for mobile IP purposes, especially procedures of the way it works. In addition to the former one, description of mobility management in CDMA2000 packet data network will also be covered.

Implementation result shows that CDMA2000 packet data network provides two type of access: simple IP and mobile IP. Analysis also shows how R-P interface works by using mobile IP message and several procedures to perform successful messaging scenario and fail one.

Keywords: CDMA2000, R-P *interface*, *Mobile IP*