ABSTRACT

LONG-TERM INTERFERENCE MITIGATION IN AN ASYNCHRONOUS WIRELESS NETWORK

Techniques for mitigating interference in a wireless communication network are described. A terminal may desire to communicate with a weaker serving base station and may observe high interference from a strong interfering base station. The two base stations may be asynchronous and have different frame timing. In an aspect, high interference may be mitigated by having the interfering base station reserve downlink and/or uplink resources. The interfering base station may transmit at a low power level or not at all on the reserved downlink resources to reduce interference to the terminal. Terminals served by the interfering base station may transmit at a low power level or not at all on the reserved uplink resources to reduce interference at the serving base station. The terminal may then be able to communicate with the serving base station.

Figure 9