

SCHEDULING DATA TRANSMISSIONS TO IMPROVE POWER EFFICIENCY IN A WIRELESS NETWORK

ABSTRACT

5 Various embodiments are disclosed relating to scheduling data transmissions
to improve power efficiency in a wireless network. In an example embodiment,
uplink transmissions (315, 406) may be scheduled after the downlink transmissions
(309, 311, 404) within the frame sequence (301). One or more nodes (PSTA1, FIG.
4) having only scheduled downlink transmissions during the frame sequence may be
10 scheduled for downlink transmissions (410) at or near the start of the downlink
transmissions (404). In another embodiment, one or more nodes (PSTA2, FIG. 4)
having only scheduled uplink transmissions during the frame sequence may be
scheduled for uplink transmissions (420) at or near the end of the uplink transmissions
(406). In yet another embodiment, one or more nodes (PSTA3, PSTA4, FIG. 4)
15 having scheduled both downlink (428, 440) and uplink (432, 440) transmissions
during the frame sequence may be scheduled for transmissions (428, 432, 440) near a
transition (317, 408) from downlink to uplink transmissions.

Fig.4