

Title (en)

METHOD FOR ASSOCIATING TIME SLOTS WITH A TRANSMISSION PATH IN A WIRELESS INTERCONNECTED NETWORK

Title (de)

VERFAHREN ZUR ZUORDNUNG VON ZEITSCHLITZEN ZU EINEM ÜBERTRAGUNGSPFAD IN EINEM DRAHTLOSEN VERMASCHTEN NETZ

Title (fr)

PROCÉDÉ D'ASSOCIATION DE CRÉNEAUX TEMPORELS À UNE VOIE DE TRANSMISSION DANS UN RÉSEAU MAILLÉ SANS FIL

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Abstract (en)

[origin: WO2011089134A1] The invention relates to a method for associating time slots with a transmission path (P) in a wireless interconnected network made of a plurality of network nodes (1, 2, 3, 4). The transmission path (P) thereby extends between a source node (1) and a destination node (4) and comprises a plurality of sequential links (L1, L2, L3) between adjacent network nodes. Data are thereby transmitted in the network on a time slot basis by means of the association of the time slots (S0, S1,..., S7) to be used with the links (L1, L2, L3) of the transmission path. According to the method, a quality value can be determined for each link (L1, L2, L3) within an association sequence of time slots (S0, S1,..., S7) describing an end-to-end data transmission from the source node (1) to the destination node (4) along the transmission path (P), said value representing the reliability of the data transfer. An overall quality value for the association sequence can further be determined as a function of the quality values of each of the links (L1, L2, L3). In the course of the method according to the invention, further time slots are incrementally added to the association sequence having the lowest quality value, until the overall quality value of the association sequence has reached a minimum quality value. Data transfer having low energy consumption by the network nodes can be achieved by the method according to the invention.

IPC 8 full level

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