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[54] **BASE STATION FOR A MOBILE TELECOMMUNICATIONS SYSTEM**

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[52] **U.S. Cl.** **455/440**; 370/331; 455/456

[58] **Field of Search** 455/436, 440, 455/444, 446, 449, 450, 456, 507, 517; 370/331–334

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[57] **ABSTRACT**

A base station (**202**) for a mobile telecommunications system, adapted to communicate with mobile stations (**208**, **210**) of the system which are within a cell area, the cell area being divided into an inner area (**204**) in which distances to the base station (**202**) are within a first predetermined range, and an outer area (**206**) in which the distances are within a second predetermined range, the base station (**202**) including a first transceiver operating at a first carrier frequency and adapted for communication with mobile stations (**208**) in the inner area, and a second transceiver operating at a second carrier frequency adapted for communication with mobile stations in the outer area (**210**).

28 Claims, 12 Drawing Sheets

