

# Base Station Market Trends

The capacity of mobile communication network's base station is reaching its limit, due to increased mobile traffic from video distribution, etc.

As a solution, it has been proposed that the load of macro cells be reduced by increasing small cells. For this reason, the demand of small cells is expected to increase in the future.

In order to reduce time error at each network node and base station for 5G, the clock is expected to be more accurate and highly stable.



The communication companies use cesium or rubidium atomic clocks as the most significant clock (PRTC/T-GM) applied to the backbone system to produce extremely high precision.

Although each device installed on the network is designed so that it synchronizes with the most significant clock desynchronization can occur. If the state becomes unsynchronized, the communication must be continued with its own precision. The holdover, which ensures accuracy based on the previous synchronized data for a fixed period and the accuracy of the free-run that operates with its own accuracy, is defined.