

ABSTRACT

IBC (indoor building coverage) is a method of pico that a solution to enhance the signal inside the building. Because in general the signal inside the building received from makrocell and mikrocell networks (outdoor) have low signal quality, this is caused by the losses of the structure of the building and the tower BTS considerable distance away from the building, so it does not reach into the coverage area of the building. So that the signal received by the user to be less than satisfactory

To overcome this we need a solution so that the condition of the existing signal at Trans Studio Bandung be good. One way is to build the IBC (Indoor Building Coverage). For the design of the 3G IBC Trans Studio Bandung using TEMS software in performing Walk Test, and RPS simulate the software.

By considering the number of visitors per year was highest TSB is ± 1.15 million people with effective user (8/12 hours) of 2100 people and potential users of communications services users by 60% amounting to 1261 users, then require a large capacity. Where the calculation results obtained capacity required number of cells is 12 cells. Based on the simulations carried out are obtained average - the average received power at the Trans Studio Bandung is equal to -57.34 dBm. This shows a significant change of the results obtained during Walk Test of -92.92 dBm. In other words, this design shows satisfactory results.

Keywords: IBC, 3G, Walk Test, BSM