

A-Core Container

5g base station live protection



Overview

Why should a 5G base station be protected?

In addition to potential damage originating on the power line, the base stations must be sturdy to environmental electrical hazards such as lightning and electrostatic discharge (ESD) strikes. Design engineers need to protect their 5G base stations from these electrical hazards to prevent damage to the bases station and avoid critical downtime.

What is a 5G base station?

The base station connects to all wireless devices attempting communication within that geographic or coverage area. A 5G base station will include advanced, active antenna systems populated by numerous antennas in multiple input-multiple output (MI MO) configurations. These antennas provide: More efficient delivery of RF power. Figure 1.

How to reduce interference between 5G base stations and FSS earth stations?

To reduce the interference between 5G base stations (BSs) and FSS earth station (ES), a guard band protection method is proposed. Additionally, the distance and angular protection methods are amalgamated. The performances are evaluated by simulation in realistic 3GPP. Also, the impacts of four antenna types are analysed for a 5G BS.

Does 5G network coexist with Fixed Satellite Service (FSS)?

In this paper, the coexistence between fifth generation (5G) network and fixed satellite service (FSS) is investigated. To reduce the interference between 5G base stations (BSs) and FSS earth station (ES), a guard band protection method is proposed. Additionally, the distance and angular protection methods are amalgamated.

What is a 5G communication system?

With higher data speeds, lower latency, and larger connection density than

the fourth-generation system standard, the 5G communication system is the latest technology in the evolution of broadband cellular networks. The 5G system assumes to employ frequency bands at high, medium, and low .

Can guard band protection solve the interference for 5g/fss coexistence?

The numerical results show that the guard band protection can solve the interference for the 5G/FSS coexistence, when the distance protection is combined. In addition, when the hybrid protection method is employed, the coexistence between 5G BS and FSS ES is guaranteed.

1. Introduction

5g base station live protection

Contact Us

For catalog requests, pricing, or partnerships, please visit:
<https://www.a-core.pl>