

Fiber Optic Repeater_Quard Bands



700-2100 MHz Fiber Link-404 (Microwave Transmission)

Tone Spread
Solutions for Wireless Signal

LTE700+LTE900+LTE1800+UMTS/LTE2100

The Fiber Optic Repeater (FOR) is designed to solve problems of weak mobile signal in the place that is far away from the Base Transceiver Station (BTS) and has fiber optic cable network underground.

The system consists of two parts: Master Unit (MU) and Remote Unit (RU). The MU captures the BTS signal via direct coupler closed to BTS, then converts it into optic signal and transmits the amplified signal to the RU via Microwave transmission. The RU will reconvert the microwave transmission signal into RF signal and provide the signal to the areas where network coverage is inadequate. And the mobile signal is also amplified and retransmitted to the BTS via the opposite direction.

Key features

- Aluminum-alloy casing with IP65 protection has high resistance to dust, water and corrosion.
- Tx/Rx control and alarm messages can be transmitted via one Microwave transmission.
- Stable and improved signal transmission quality.
- Adopting filter with highly selectivity and low insertion loss eliminates interference between uplink and downlink.
- USB/RJ45 port provides a link to a notebook for local supervision or IP Based NMS (Network Management System) that can remotely supervise repeater's working status and download operational parameters to the repeater via Ethernet.

Advantages

- ☑ Multi_standards/Multi_operators
- ☑ Remote control
- ☑ Microwave transmission
- ☑ Low consumption

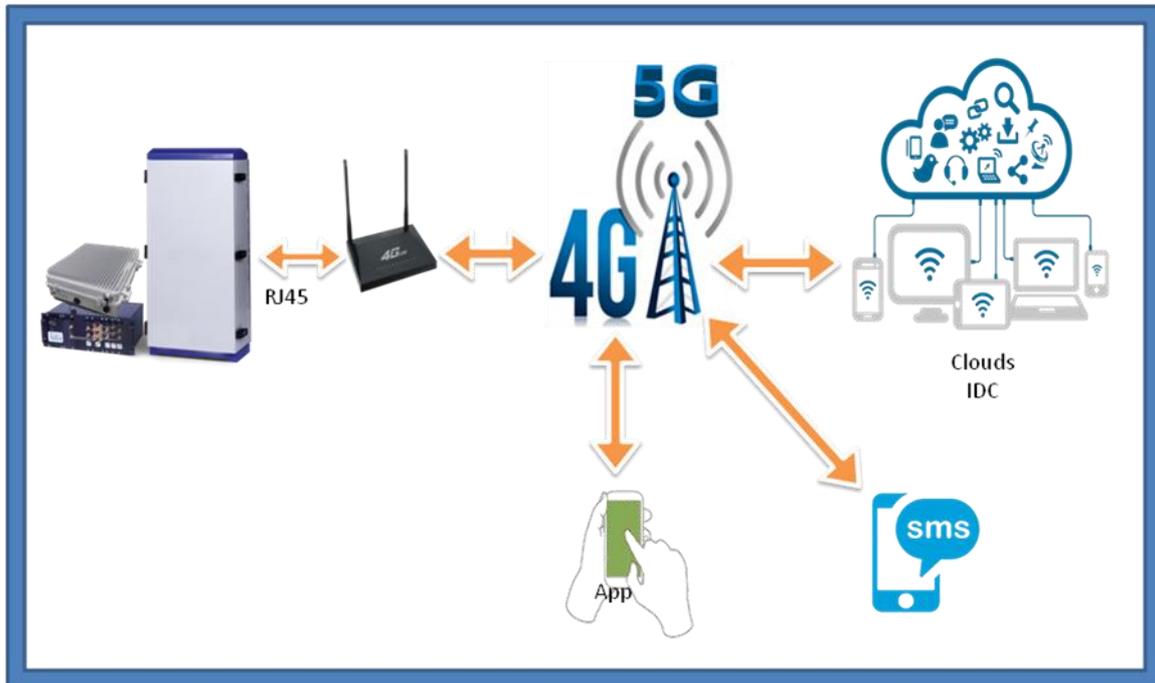


Specifications

Technical characteristics

Item	Specifications	
	Master Unit	Remote Unit
System	LTE700/LTE900/LTE1800/UMTS<E2100	
Working Frequency	Uplink (MHz)	703~748 /885~915 /1710~1775/1920~1980
	Downlink (MHz)	758~803 /930~960/1805 ~1870/2110~2170
Working Bandwidth	45MHz/30MHz/65MHz/60MHz	
Frequency Stability(+/-0.01ppm)	≤0.05ppm	
Gain Flatness	≤±3dB for All Band	
AGC/ALC Range	≥10dB	
Maximum Gain(Cable Access)	45dB per Band	45 dB per Band
Maximum RF Output Power	-10dBm per Band	43dBm per Band
Group (System) Delay	≤10us	
Noise Figure@ Max. Gain (UL)	≤5dB	
Link Frequency	5.8GHz	
Link RF Output Power	30dbm	
Transmission Distance	≤10Km	
Gain Adjustment Range	1~31 dB @ Step of 1 dB	
RF Connector Type	5xN-Female	2xN-Female
I/O Impedance	50Ω	
Ingress Protection	IP30	IP65
Operating Temperature	-25°C~+55°C	
Relative Humidity	≤95%	
Dimensions	482.6x222.25x290mm (Additional chassis will need to be added)	980mm×420mm×230mm
Weight	≤20Kg	≤50Kg
Power Consumption	180W	500W
Power Supply	AC100V ~240V, 50/60Hz	
Local Control	Via USB Interface and Wi-Fi Hotspot	
Remote Mode	Through MU via 5.8G Microwave transmission	
NMS Mode	4/5G Wireless Modem(Cloud Network Management System)	
Mounting Type	Wall or Pole Mounting	

Network Management System (NMS)



Applications

To expand signal coverage or fill signal blind area where signal is weak or unavailable.

Outdoor: Airports, tourism regions, golf courses, tunnels, factories, mining districts, villages, ...

Indoor: Hotels, exhibition centers, basements, shopping malls, offices, parking lots, ...

