

C20M Series Five Band Cellular Signal Booster

Specifically engineered for small areas of approximately 300 m² such as apartments, offices, or retail shops, the C20M five-band cellular repeater significantly enhances 3G/4G/5G signal strength, ensuring crystal-clear voice calls and high-speed, seamless data connectivity.

The C20M booster with intelligent control technology to supports AGC, ALC and auto-sleep functions. These features maintain peak performance while conserving energy and extending the device's service life. Crucially, the unit integrates Amplitec's proprietary anti-interference technology. This system continuously monitors system isolation and actively prevents self-oscillation, effectively safeguarding against system damage or interfere BTS—even if the user installs it improperly.

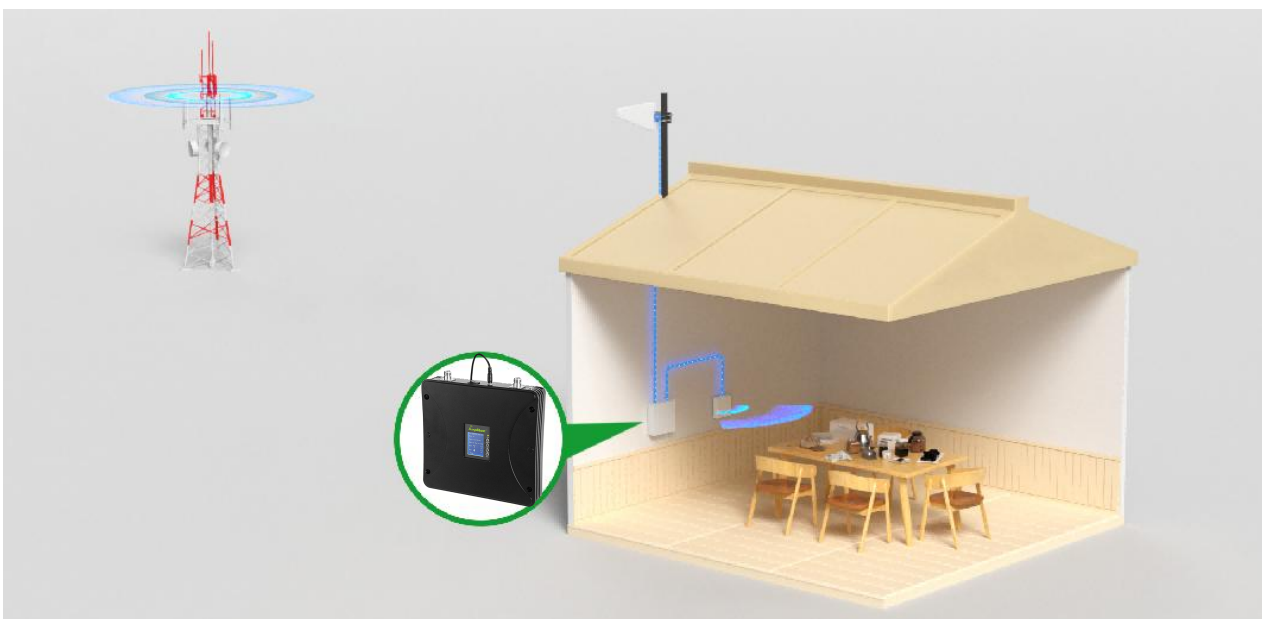
Designed for immediate use, it requires no complex configuration, allowing average users to deploy the system quickly and effortlessly for a consistently strong signal experience.



Product Features

- The large LCD display screen provides a clear overview of the device's operational status.
- Automatically detect system isolation during startup.
- Automatically reduce system gain when isolation is insufficient.
- Auto turn-off in case of excessive self oscillation or over input.
- Auto turn-off of uplink while no active users in the coverage , lowering interference to BTS.
- Support MGC function, professionals can manually adjust the system gain.
- Auto control of output power for stable coverage.
- Uplink gain follows downlink gain linkage control, keeping uplink and downlink balanced.

Applications



Technical Specification

Item		Up Link	Down link
Band Support		Any Five band within 3gpp band 1, 2, 3, 4, 5, 7, 8, 20, 25, 28, 66	
Output power		17±2 dBm	20±2 dBm
Gain		70±2 dB	75±2 dB
VSWR		≤2.5	≤2.5
Max. input power without damage		-10 dBm	-10 dBm
Gain Attenuate Range		1~31 dB, step of 1 dB	1~31 dB, step of 1 dB
ALC control Range		≥ 25 dB	≥ 25 dB
Spurious emission	9KHz~1GHz	≤-36 dBm	≤-36 dBm
	1GHz~12.75GHz	≤-30 dBm	≤-30 dBm
ACLR	BW _{channel}	≥30 dB	≥33 dB
	2 X BW _{channel}	≥35 dB	≥40 dB
EVM		≤ 8%	
Noise figure		≤8 dB	
Group delay		≤1.5μs	
LCD Indication		Band #, Frequency, Gain, Output power, Input RSSI, ISO, Work	
LED Indication		Run, Alarm	
Power supply		DC 12V/3A	
RF connector		N-Female	
Environment conditions		IP40	
Humidity		< 90%	
Operating temperature		-10℃ ~ +55℃	
Size		250*230*50mm (Booster host)	
Weight		<2.5kg (Booster host)	
Accessories		1* Donor antenna OY0727-0965 1* Cover antenna IP0727-0665 1* Coaxial cable 5D-NNJ-15m 1* Coaxial cable 5D-NNJ-5m	

Note: The specification might be adjusted, please reconfirm the final specification before order confirmed.

Order Model List

Model	Up Link Frequency Range (MHz)	Down Link Frequency Range (MHz)
C20M-5B-BR1 KIT	703~748/824~849/1710~1785/1920~1980/ 2500~2570	758~803/869~894/1805~1880/2110~2170/ 2620~2690
C20M-5B-BR2 KIT	703~748/880~915/1710~1785/1920~1980/ 2500~2570	758~803/925~960/1805~1880/2110~2170/ 2620~2690
C20M-5B-SA KIT	703~748/824~849/1710~1755/1850~1910/ 2500~2570	758~803/869~894/2110~2155/1930~1990/ 2620~2690
C20M-5B-EU KIT	832~862/880~915/1710~1785/1920~1980/ 2500~2570	791~821/925~960/1805~1880/2110~2170/ 2620~2690
C20M-5B-SA-EV KIT	703~748/824~849/1710~1780/1850~1915/ 2500~2570	758~803/869~894/2110~2200/1930~1995/ 2620~2690