



## Dual Band GSM900+1800MHz RF Repeater



### OVERVIEW

ATNJ RF repeater with industrial design, combines multi mobile network signals together and improves the mobile voice and data communication, aiming to provide a more cost-effective solution for signal. ATNJ RF repeater is easy to install and maintain, which could help signal providers get fast solution.

A repeater is working as a relay between the BTS and mobiles. It picks up the strongest signal from BTS via the Donor Antenna, linearly amplifies the signal and then re-transmits it via the Indoor Signal Distribution System to the weak/blind coverage area. And the mobile signal is also amplified and re-transmitted to the BTS via the opposite direction.

### FEATURES

- Improve any two mobile networks at the same time
- LCD display the input/output signal strength
- Auto isolation detect function
- Auto gain control
- Auto level control
- Auto uplink noise reduction, avoid disturbing to BTS
- Smart LCD to guide the installation
- Golden color metal industrial design

### WHERE TO USE

- Indoor: Hotels, Exhibition Centers, Basement, Parking Lots, Shopping Malls, Apartments..
- Outdoor: Airport, Tunnel, Village, Mining Area, Court, Tourism Area..

# APPLICATION SCENE



## Technical Specification

SPECIFICATIONS		PARAMETERS	
Frequency Range		GSM 900	890-915MHz/935-960MHz
		DCS 1800	1710-1785MHz/1805-1880MHz
Band Width		GSM 900	25MHz
		DCS 1800MHz	75MHz
Gain		<b>70 ± 3dB</b>	
Automatic Gain Control		31dB	
MGC (Step Attenuation)		20dB@ 1dB/Step	
Output Power		<b>20 ± 2dB</b>	
Spurious Emission	9 kHz -150 kHz/1kHz	≤-36dBm @1kHz	
	150 kHz - 30 MHz/10kHz	≤-36dBm@10kHz	
	30 MHz - 1 GHz/100kHz	≤-36dBm@100kHz	
	1 GHz- 12.75 GHz/1MHz	≤-30dBm@1kHz	
ACPR		Uplink Fully comply with 3GPP 36.106	
		Downlink Fully comply with 3GPP 36.106	
Unwanted emissions		Fully comply with 3GPP 36.106	
VSWR		≤2	
Ripple		≤5dB	
Noise Figure		≤9dB	
Delay		≤3 μ s	
I/O Impedance		50 Ω	
RF Connector		N-Type (Female)	
Operating Temperature		-25°~+55°	
Power Supply		DC 5V2A	

Power consumption	$\leq 15W$
Environment Conditions	IP43
Humidity	$\leq 90\%$
Weight	1.1kg
Size	195×140×40mm