

800MHz Digital Band Selective Repeater

mBDA-0833

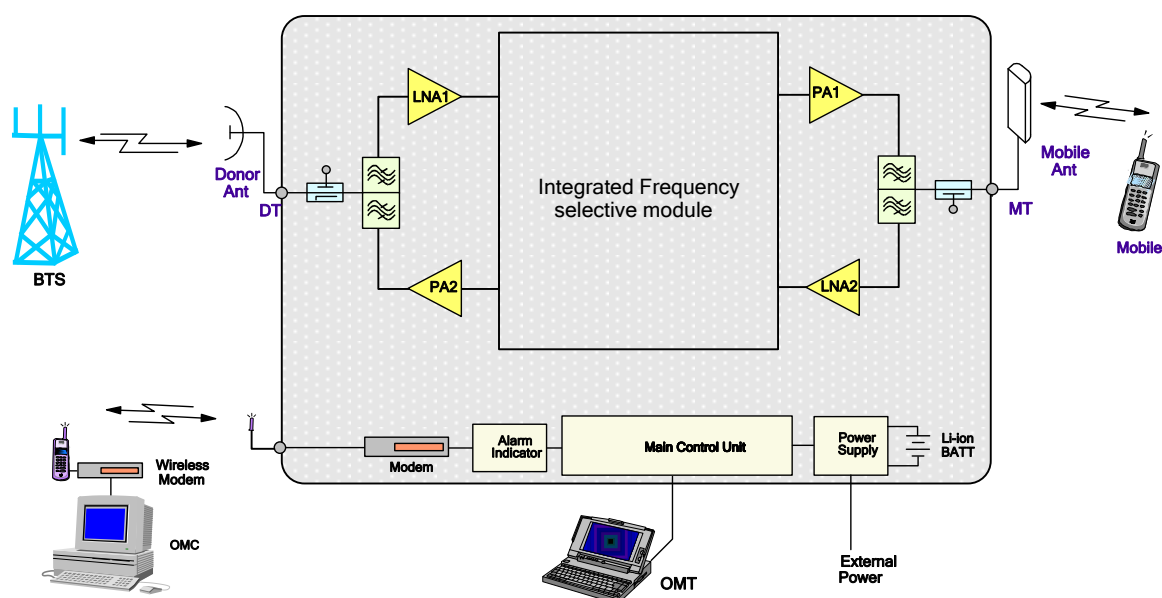
Features

- Up to 4 pass band segments with independent ON/OFF for maximum flexibility.
- Max. 2W total output power, support LTE, NB-IoT (Stand Alone, Guard Band and In-band) and 5G NR*, or hybrid application.
- Offline isolation detection for easy commissioning.
- Friendly and easy OMT interface via RJ45 connection
- Integrated wireless modem for remote monitoring and control.
- Compatible to Comba generic OMT and CMS platform.
- Waterproof, damp-proof and omni-sealed (IP65).



Note: 5G NR will be support by software upgrade at Q2, 2021

Functional Block Diagram



Specifications

Electrical		0.5W	1W	2W			
Operating Frequency, Uplink	MHz	832-862					
Operation Frequency, Downlink	MHz	791-821					
Operating Bandwidth Per Sub-band	MHz	0.2-20					
Number of Sub-bands		4					
Total Output Power, Uplink	dBm	17					
Total Output Power, Downlink	dBm	27	30	33			
Maximum System Gain	dB	90					
Attenuation Adjustment Range (1dB step)	dB	0-30					
Pass Band Ripple at FBW, p-p	dB	≤ 4					
Uplink Noise Figure	dB	≤ 5					
System Group Delay	μsec	≤ 6					
Out-of-Band Gain		Compliance with 3GPP TS 36.106					
Intermodulation							
Spurious Emission							
EVM							
ACRR							
PCDE							
Spurious Emission Mask							
Absolute Maximum RF input power	dBm				-10		
Input VSWR					≤ 1.6		
Impedance	Ω				50		
Mechanical							
Dimensions, W x H x D	mm/in	361x222x93 / 14.2x8.7x3.7					
Weight (approx.)	kg/lb	7 / 15.4					
Power Supply	VAC	100-240/47-63Hz					
Power Consumption (approx.)	W	60					
Enclosure Cooling		Convection					
RF Connectors		N-Female					
Operating Temperature	°C	-33 to +55					
Operating Humidity		≤ 95%					
Environmental Class		IP65					
MTBF	hrs	> 50,000					

Note: Typical specification at room temperature;