



20W Full C-Band Block Up Converter

KEY FEATURES

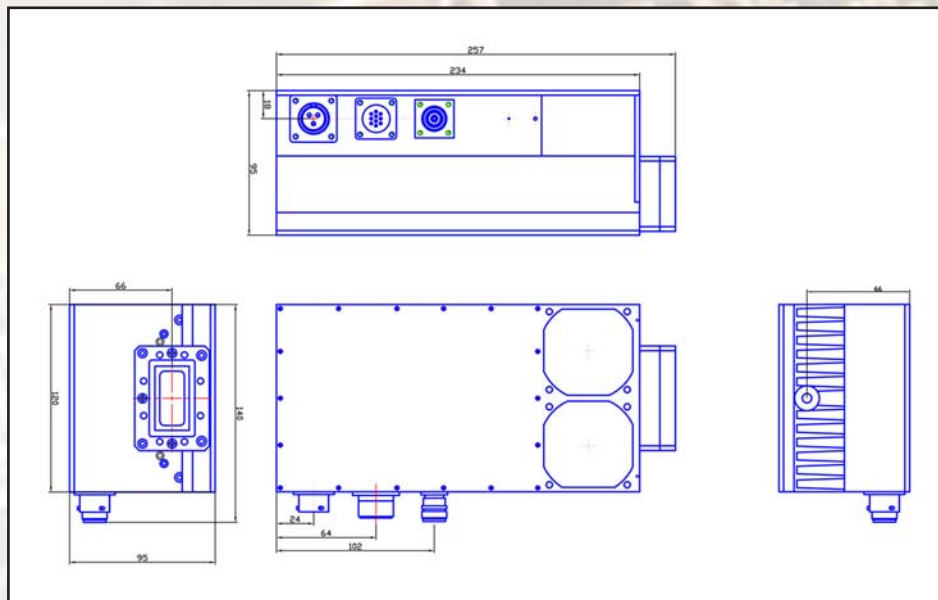
- ◆ 5.850 - 7.200 GHz output frequency
- ◆ Smallest package size and weight
- ◆ High power efficiency (20W min @P1dB over temperature)
- ◆ Double- L.O. (electronically switchable 4.9 & 5.5 GHz)
- ◆ Digital temperature compensation
- ◆ Field-exchangeable (F/N) IF connector
- ◆ 80 - 240 VAC or 38 - 56 VDC auto-ranging power (150W max)
- ◆ Power and lock status LED
- ◆ Advanced M & C - combined RS232/485 interface and optional FSK
- ◆ RoHS compliant
- ◆ Three-year warranty

ABD20XC / ABD20XCF ABC20XC / ABC20XCF



This is a unique Full C-Band (5.850-7.200 GHz) 20W Block Up Converter powered with auto-ranging 80-240 VAC or 38-56 VDC unit, designed for mobile applications especially when an earth station needs to be able to use different C-Band (Standard, Palapa and Insat) transponders or satellites. It's light enough to be mounted on a feed horn of most antennas.

Mechanical Drawing





20W Full C-Band Block Up Converter

TECHNICAL SPECIFICATIONS

RF frequency	5.850 to 7.200 GHz
Local oscillator	4.90 and 5.50 GHz
IF frequency	950 to 1,700 MHz
Output power @ P1dB	20W (+43 dBm min.)
IF connector	N-type or F-type (field-exchnageable)
Power supply via MS connector ABD20XC-auto-ranging ABC20XC-auto-ranging	80-240 VAC, 149 W max 38-56 VDC, 150 W max
Output interface	CPR 137 G
Gain	60 dB nominal
IMD3	-28 dBc max
L.O. Leakage	-45 dBm max
Spurious	-50 dBc max
Requirement for external reference: frequency input power	via IF cable 10 MHz (sine-wave) -5 to +5 dBm @ input port
Gain variation over 40 MHz over 500 MHz	1.1 dB p_p 1.6 dB p_p
Over operating temperature	1.2 dB p_p @ fixed frequency
Phase noise	-55 dBc/Hz max. @ 10 Hz
	-65 dBc/Hz max. @ 100 Hz
	-75 dBc/Hz max @ 1 KHz
	-85 dBc/Hz max @ 10 KHz
	-95 dBc/Hz max @ 100 KHz
	-120 dBc/Hz max @ 1 MHz
Noise figure	15 dB max
Input V.S.W.R.	2 : 1 max
Output V.S.W.R.	2 : 1 max.
Mute	Shut off the HPA if L.O. unlocked
Status LED RED GREEN YELLOW YELLOW blinking	Summary alarm All OK Standard L.O. 4.90 GHz Extended L.O. 5.50 GHz
Input interface ABC20XC / ABD20XC ABC20XCF / ABD20XCF	50 Ohm (N-type IF in) 75 Ohm (F-type IF in)
Temperature range (ambient) operating storage	-45 deg C to +65 deg C -55 deg C to +85 deg C
Dimensions & housing	257 (L) x 120 (W) x 95 (H) mm 10.2" (L) x 4.8" (W) x 3.8" (H)
Weight	3.5 kg (7.7 lbs) max