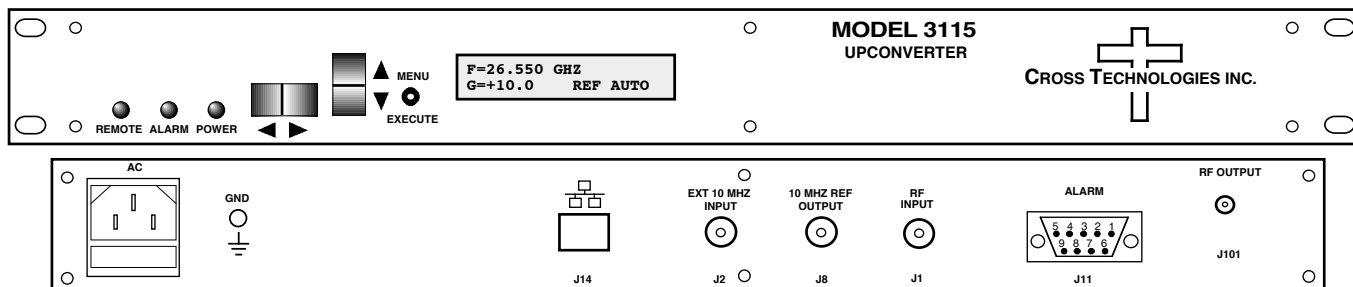


3115-275#-1200 Agile Block Upconverter, 1200 ± 40 MHz to 25.25 - 27.5 GHz

The 3115-275#-1200 Agile Block Upconverter converts 1200 ± 40 MHz to 25.25 to 27.5 GHz in 1 MHz steps. This unit converts 1200 MHz to 5.8 GHz and 5.8 GHz to 25.25 - 27.5 GHz. Synthesized local oscillators (LO) provide frequency selection. Multi-function switches select the RF frequency, gain, and other parameters. Front panel LEDs provide indication of DC power (green), PLL alarm (red), and remote operation (yellow). Variable attenuators for the 1200 MHz input provide a gain range of 0 to +20 dB as adjusted by the front panel multi-function switches. Remote operation allows selection of frequency and gain. Parameter selection and frequency and gain settings appear on the LCD display. Connectors are BNC (female) for 1200 MHz and external 10MHz reference input and output, and 2.92 mm (female) for the RF output. The unit is powered by a 100-240 ±10% VAC power supply, and housed in a 1 3/4" X 19" X 14" rack mount chassis.



Front and Rear Panels (shown with optional Ethernet)

EQUIPMENT SPECIFICATIONS*

Input Characteristics

Impedance/Return Loss	75Ω/14 dB
Frequency	1200 ± 40 MHz
Input Level range	-35 to -15 dBm

Output Characteristics

Impedance/Return Loss	50Ω/14 dB
Frequency	25.25 to 27.5 GHz
Output level	-25 to -10 dBm
Output 1 dB compr.	+0 dBm, Gmax , Fc

Channel Characteristics

Gain Max. /range	+20.0 ± 3 dB max gain; adjustable from 0 to +20.0 dB, 0.5 ± 0.5 dB steps, Fc
Spurious, Inband	< -50 dBc, Gmax
Spurious, Out of band	< -50 dBm, 24.0 - 25.25 and 27.5 - 29 GHz, Gmax
Intermod	< -50 dBc for two carriers at $F_c \pm 2$ Mhz, each at -15 dBm out, Gmax
Frequency Response	±2.0 dB, 25.25-27.5 GHz; ±1.0 dB, any 80 MHz band; ± 0.5 dB, 40 MHz BW
Frequency Sense	Non-inverting

LO Characteristics

Frequency Step	1 MHz, minimum
Frequency Accuracy	± 0.01 ppm max over temp internal reference; ext. ref. input
10 MHz In/Out Level	3 dBm, ± 3 dB, w/ Auto-detect

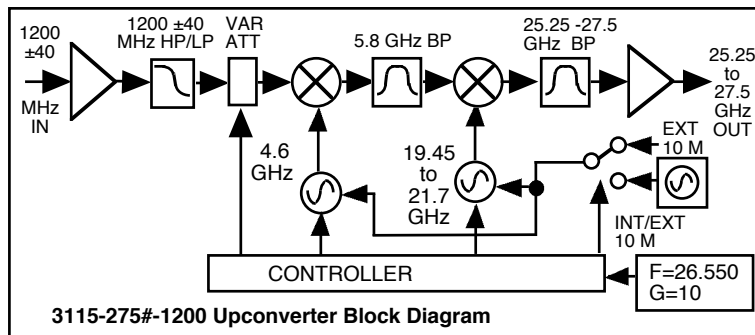
Phase Noise @ Freq	100 Hz	1kHz	10kHz	100kHz	1 MHz
dBc/Hz	60	70	80	90	100

Controls, Indicators

Freq., Gain, Ext Ref Sel.	Direct readout LCD; pushbutton switches or remote
Power; Alarm; Remote	Green LED; Red LED; Yellow LED
Remote	RS232C/RS485/422, 9600 baud (Ethernet/opt -W8, 18, 28, 828)

Other

RF Connector	2.92 mm (female)
L-Band Connector	BNC (female), 75Ω
10 MHz Connectors	BNC (female), 75Ω , works with 50 or 75 ohms
Alarm/Remote Conn.	DB9 (female) - NO or NC contact closure on Alarm
Size	19 inch, 1RU standard chassis 1.75" high X 14.0" deep
Power	100-240 ±10% VAC, 47-63 Hz, 30 watts max.



Available Options

- W8** - Ethernet; w/Web Browser (WB)
- W18** - Ethernet; w/WB & SNMP
- W28** - Ethernet; w/TCP/IP, Telnet
- W828** - W8 + W18 + W28

Connectors/Impedance

- S2** - 2.92mm (RF), 50Ω BNC (IF)
 - SS2** - 2.92mm (RF), SMA (IF)
- Contact Cross for other options

*10°C to 40°C; Specifications subject to change without notice