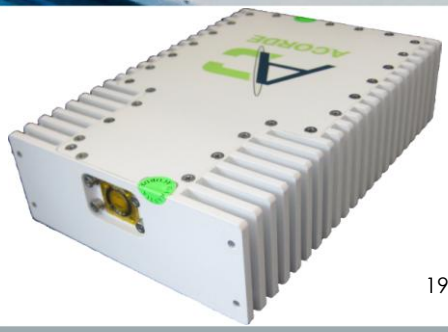
Ka-BAND BLOCK UP CONVERTER (BUC)

ACTX-Ka4W Low Power Series

Low Cost Family



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ACTX-Ka series are designed for Ka-band satellite communication systems. ACTX-Ka BUCs are integrated with power supply, phase locked oscillator, power amplifier and frequency converter.

ACTX-Ka series BUCs have been tested between -30°C and +60°C, providing very good gain stability with temperature. They also include a temperature alarm and power supply shutdown to protect the amplifier from permanent damages in high temperature conditions.

TRANSMITTER SPECIFICATIONS

Input frequency ..... 950 to 1450 MHz (Option E2)
950 to 1950 MHz (Option E6)
Input impedance ..... 50 Ω
Input L-band VSWR ..... < 1.5:1

Output frequency ..... 29.5 to 30.0 GHz (Option E2)
30.0 to 31.0 GHz (Option E6)
Output impedance ..... 50 Ω
Output Ka-band VSWR ..... < 2.0:1
Spectrum inversion ..... None

Transmitter Characteristics @ 25°C	P1dB min.	Gain	Power Consumption	Size (LxWxH)	Weight
ACTX-Ka4W-E2-V2 ACTX-Ka4W-E6-V2	36.0 dBm	65 dB min	50 W @ P1dB	195 x 135 x 50 mm	1.8 kg

Gain flatness over the whole bandwidth ..... ± 2.0 dB
Gain flatness over 40 MHz ..... ± 0.5 dB
Gain variation over temperature ..... ± 2.0 dB over the whole range
Spurious ..... < -60 dBc @ P1dB
Mute ..... SSPA Off in case LO unlocked

Output phase noise typical (IESS-308/309 – 5 dB):
100 Hz ..... -65 dBc/Hz
1 kHz ..... -75 dBc/Hz
10 kHz ..... -85 dBc/Hz
100 kHz ..... -95 dBc/Hz
Reference frequency ..... 10 MHz
Reference input level (multiplexed on L-band input) ..... 0 dBm ± 5 dB
DC input voltage ..... 48 VDC (24 VDC as option[1])

Storage temperature ..... -40 to +85°C
Operating temperature ..... -30 to +60°C
Relative humidity ..... up to 100%
Operating altitude ..... up to 4500 m

Interfaces:
TX input (L-Band+DC+Ext. Ref.): ..... Type N(F) 50 Ω
TX output (Ka-Band): ..... WR28 grooved
Finish ..... White

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