

ACCVT-LKa-E28-V4

Dual Ka-band BUC Eos Series hubmount simultaneous transmission

The ACCVT-LKa family of BUCs is designed for the most challenging Ka-band professional & military satellite communication systems (ground, SOTP, SOTM, maritime, etc.).

Latest technology is applied to obtain the best power efficiency, phase noise, gain stability and linear power according to MIL-STD-188-164C. The ACCVT-LKa family is a high reliability solution designed for harsh environmental conditions, with every single production unit fully tested in an environmental chamber and delivered with a complete factory acceptance test report.

- Dual simultaneous L-band input ports
- DC supply operation
- Sector Se
- ∑ Extended temperature range -30 °C to +60 °C
- M&C with serial port (RS-232/485), Ethernet and SNMPv2
- No. In-built positive slope equalizers



EOS

Goddess of dawn, who opens the gates of heaven allowing the sun to rise every morning, as well as our line of upconverters, which elevate the input signal to the output signal by matching the frequencies to the satellite bands with great spectral purity and minimal distortion.



Transmitter

Input frequency	950 to 2450 MHz
Input L-band VSWR (50 Ω)	< 1.3:1
Output frequency	27.5 to 30.0 GHz
Output Ka-band VSWR (50 Ω)	< 1.3:1
Spectrum inversion	None
Max. input level without damage	0 dBm
PldB	> +10 dBm
OIP3	> +20 dBm
Spurious signal related @ $P_{OUT} = 0 \text{ dBm}$	< -60 dBc
Spurious signal independent	< -75 dBm
Gain @ mid band with min attenuation	35 ± 1 dB
Gain adjustment range	30 dB with 0.25 steps
Gain flatness	±1.0 dB over whole BW ±0.5 dB over 40 MHz
Gain stability (24 hours)	±0.25 dB @ constant T
Gain variation over temperature	±0.5 dB
Positive slope equalizer range	0 - 9 dB
Mute	> 75 dB
Noise figure @ min attenuation	< 15 dB
Group delay over 80 MHz	< 1 ns pp
Inputs/Output sample port	-10 ± 3 dB

Local Oscillator

Output phase noise	Maximum	Typical
10 1	Hz -50 dBc/Hz	-55 dBc/Hz
100 8	Hz –70 dBc/Hz	-75 dBc/Hz
1 kł	Hz -85 dBc/Hz	-90 dBc/Hz
10 kł	Hz –95 dBc/Hz	-100 dBc/Hz
100 kł	Hz –100 dBc/Hz	-105 dBc/Hz
1 MI	Hz –120 dBc/Hz	-125 dBc/Hz
External reference (Auto selection on presence)		10 MHz
External reference level		5 dBm ± 5 dB
Internal reference stability		±2 ppb/day

Enviromental

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

Mechanical

Size (LxWxH)	245 x 240 x 45 mm 9.6 x 9.4 x 1.8 in
Weight	3.2 kg 7.0 lbs
Finish	RAL 9003 (White)

Interfaces

All mating connectors provided

TX inputs (L-band)	Type N(F) 50 Ω
Input samples (L-band)	Type SMA(F) 50 Ω
TX output (Ka-band)	Type K(F) 50 Ω
Output sample (Ka-band)	Type K(F) 50 Ω
External reference	Type SMA(F) 50 Ω
M&C (RS-232/485)	62IN12E12-14S-4-622
M&C (Ethernet/SNMPv2)	RJF22G
Power supply & alarm	62IN12E8-4S-4-622

Power Supply

DC input voltaje	15-24 V _{DC}
Consumption @ Plin	17 W @ steady state 21 W @ warm-up

Order information

Part-number	Input	Output	LO frequency
ACCVT-LKa-E28-V4	950 - 2450 MHz	27.5 - 29.0 GHz	26.55 GHz @ Input 1
	950 - 2450 MHz	28.5 - 30.0 GHz	27.55 GHz @ Input 2

Any other frequency band or custom specification available under request. Please, contact factory. Specifications are subject to change without notice.

C/ El Castro 22N, 39011, Santander, Spain		
+34 942 766 44 00	www.acorde.com	sales@acorde.com