

EUROCASTER DDS 3000 – 3 kW FM TRANSMITTER

COMPACT



Prognostic

Analysis for predictive maintenance

Simply

Hot pluggable PSU - Easy to replace fans

Controls

LCD display, Web server and SNMP

Integrated unique features

Micro SD card slot FM. Satellite and Terrestrial receiver

Advanced Efficiency Boost

Efficiency up to 75% with adaptive optimization

Digital Processing

Unique performances thanks to DDS digital modulator

Stereo & Soft clipper

Always included

Audio processor
Full telemetry with 3G connection



GENERAL SPECIFICATION

Output frequency range 87.5 to 108MHz in 1Hz steps

Output Power 3000W (tol. +0/-0.5dB)

Output connector FL 7/8" EIA

Spurious and harmonic suppressionCompliant with ETSI and FCC specification

Analog input $2x \text{ XLR female (Balanced; impedance } 600\Omega/10K\Omega \text{ selectable)}$

MPX/SCA/RDS input 2x BNC female (Unbalanced; impedance 50Ω/10ΚΩ selectable)

Soft Clipper with band limitation Included

Power consumption Typ. 4,1KVA - Max. <4,6KVA

AEB (Advanced Efficiency Boost) Included

Power supply 230Vac single phase/ 400Vac three phase start conn. (with power neutral)/

230Vac three phase delta conn. (without power neutral)

Operative temperature -5°C to +45°C @MSL

Maximum operative altitude 3000m ASL. For higher altitudes please contact our sales dept.

Maximum operative humidity 95% non-condensing

Housing Rack drawer 19" 4U

Weight <30Kg





SOFTWARE OPTIONS		
S-AM-UN	Audio monitor for input or on-air signal + test tone	
	generator	
S-SD-UN	Micro SD card slot	
S-AES-UN	Digital AES/EBU & AES192 (MPX over AES) inputs .⊆	Included in S-PLUS-UN
S-FMRX-UN	FM receiver input (for regenerative FM repeater/ translator)	
S-SWI-UN	Automatic input switching (n.3 MPX profiles – audio/ RDS)	
S-RDS-UN	Static RDS coder	
S-RDS+-UN	Dynamic RDS	
S-IP-UN	IP input (Icecast2 streaming & AES67)	
S-DMPX-UN	Digital MPX over TS & Digital MPX over IP	
S-ISO-UN	SFN/ Isofrequency operation	
S-AP-DEL	Delossifier (for audio processor H-AP-PRO)	
S-AP-ARDS	Advanced RDS (for audio processor H-AP-PRO)	
HARDWARE OPTIONS		

	HARDWARE OPTIONS
H-SATDTT	Embedded Satellite and Terrestrial receiver demodulator. DVB-S/S2 (L-band
	input) and/or DVB-T/T2 and ISDB-T (VHF/UHF band input)
H-3G	2G/3G modem router for remote connection/telemetry and SMS
H-I/O	Analog telemetry interface with n.3 isolated clean contact outputs, n.4
	optoisolated inputs, n.4 analog outputs (0 to 5V), mini UPS for remote control,
	for router and for telemetry interface, RF filter for router
H-AP-PRO	Audio Processor card with professional software license, Advanced Dynamics
	(Auto EQ & dynamic ratios), Declipper & Natural Dynamics
H-SATDTT2	Second Redundant Embedded Satellite and Terrestrial receiver demodulator
	with seamless switching
H-CAM	CAM Slot (Common Interface Module)
H-ASI	ASI T.S. input (or output) interface
H-REF	10MHz and 1pps inputs
H-GNS	High stability reference oscillator GNSS (GPS + GLONASS) locked, oven clock
	10MHz + 1pps outputs
H-AGNS	GPS/GLONASS receiving antenna (gain 26dB typ.) + 15 meters cable



The software-based audio processor can be integrated in any of our EuroCaster DDS transmitters, from low and medium compact versions to high power line.

"H-AP" Audio Processor offers outstanding audio quality and comes with many unique features.



FM Composite Clipper

Up to 140% audio level at 100% modulation gives 2-3 dB extra headroom for highs. Improve your audio, being the loudest and cleanest station on the dial!

Stereo & RDS Coder

Built-in stereo and RDS encoder RT+

Advanced Dynamics & EQ

Increases the dynamics for music that lacks dynamics. Adjusts the spectrum without compression, making it possible to generate a very consistent sound without sounding compressed

Dehummer

Improves the sound of MPEG2/MP3 style lossy compressed files, removing unwanted constant sounds, such as a 50/60 Hz hum from bad cables

Better FM reception

Improves stereo reception area up to 30Km

Declipper & Natural Dynamics

Repairs clipped audio, removes distortion Restores Natural Dynamics

Delossifier *

Improves the sound quality of MPEG2/ MP3 style lossy compressed files

All specifications contained in this document may be changed without prior notice