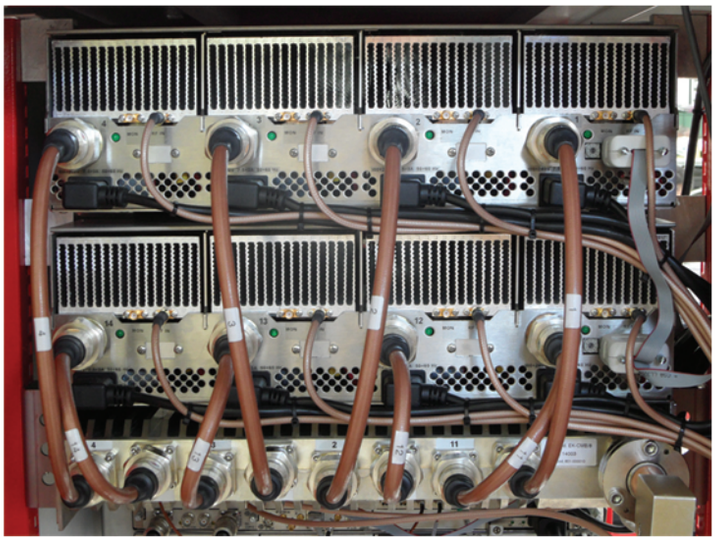
Eurotek
Broadcast Solutions

SCALABLE MEDIUM & HIGH POWER DTV TRANSMITTERS

ALL4DIGIT SYSTEM

DVB Digital Video Broadcasting

1200 WATT CONFIGURATION



HIGHLIGHTS

- From 150W to 2,4KW with the same amplifier module
- DVB-T/T2 & ISDB-T full compliant
- MFN / SFN full compliant with NIT / MIP processing
- Excellent MER value: > 37 dB
- Integrated GPS Professional Receiver with direct power supply for preamplified antenna and improved filtering
- Power modules with autonomous cooling concept
- Significant reduction of energy cost
- Innovative compact design
- Optimal & redudant power supply design
- Full management by SNMP & WEB

Questa nuova famiglia di prodotti Eurotek introduce un nuovo concetto di scalabiltà e modularità applicato ai trasmettitori di media e alta potenza. L'utilizzo di un unico modulo di potenza da 150 W rms, opportunemente parallelato, consente la costruzione di apparati fino a 2,4 KWatt rms. Il modulo utilizza transistor LDMOS a 50 Volt e grazie alla sua linearità viene caratterizzato su tutta la banda UHF consentendone l'utilizzo in qualsiasi sezione di amplificazione. Ogni modulo viene alimentato singolarmente da un alimentatore che, in caso di guasto sull'alimentazione di un'altro modulo, ne gestisce la completa ridondanza.

OPTIONS

- DUAL-DRIVE configuration with automatic change over
- DVB-S/S2 Multistream receiver board
- Power feed in several configuration
- Rack cabinets
- GPS antenna kit
- RF filter & Combiner
- GSM Modem kit

This new family of Eurotek products introduces a new concept of scalability and modularity applied to medium and high power transmitters. The use of a single power module 150W rms, suitably connected in parallel, allows the construction of apparatuses up to 2.4W. The module uses a 50 Volt LDMOS transistor and thanks to its linearity is characterized over the entire UHF band allowing its use in any section of amplification. Each module is individually powered by a power supply which, in case of fault on the power of another module, manages the complete redundancy.

BENEFITS AND KEY FEATURES

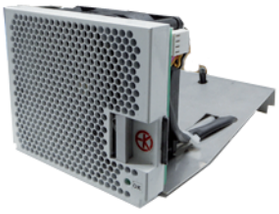
- **Hot-swap power supply with high efficency and power factor correction**
- **Redundant power supply**
- **Same Amplifier module and power supply from 150 W to 2,4 Kw**
- **Characterised Amplifier module full band without tuning**
- **Amplifier Module managed by High speed microprocessor**
- **Power managing based on power supply faults**
- **Hot-swap amplifier module replacement on 60 seconds**
- **Hot-swap fan module replacement on 10 seconds**
- **Alarm management related on the Mainframe (EK-MFR/2)**
- **Simplified configuration for multichannel system (4 CH 150 W channel on 3+1 RU)**

SUB SYSTEMS

EXCITER

150 W RMS
UHF MODULE

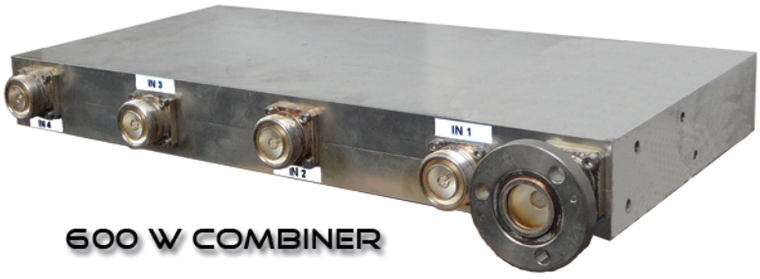
POWER
SUPPLY



FAN

SUB RACK 19" 3U

300 W COMBINER



600 W COMBINER

1200 W COMBINER

TECHNICAL FEATURES

POWER AMPLIFIER SECTION

POWER OUT*	DVB-T2 DVB-T ISDB-T/Tb	150 Watt EK-PAM/150	300 Watt EK-PAM/300	600 Watt EK-PAM/600	1200 Watt EK-PAM1K2	2400 Watt EK-PAM2K4
	ATSC	200 Watt EK-PAM/150	400 Watt EK-PAM/300	800 Watt EK-PAM/600	1600 Watt EK-PAM1K2	3200 Watt EK-PAM2K4
GAIN		57 dB	56,5 dB	56 dB	55,5 dB	55 dB
VOLTAGE SUPPLY		100÷240 Vac	100÷240 Vac	100÷240 Vac Mono Three-phase + Neutral	100÷240 Vac Three-phase + Neutral	100÷240 Vac Three-phase + Neutral
POWER CONSUMPTION (W) **		630÷840	1260÷1680	2520÷3360	5040÷6720	10080÷13440
EFFICENCY		24÷18 %				
OPERATING TEMP.		0÷45°C	0÷45°C	0÷45°C	0÷45°C	0÷45°C
RELATIVE HUMIDITY		90% non condensing				
AIR STATIC PRESSURE		500.0 Pa	1000.0 Pa	2000.0 Pa	4000.0 Pa	8000.0 Pa
WEIGHT		20 Kg	43 Kg	70 KG	120 Kg	250 Kg

*POWER OUT LEVEL BEFORE CHANNEL FILTER
**POWER CONSUMTION: EXCITER SECTION EXCLUDED

SYSTEM FEATURES

- SCALABLE ARCHITECHTURE FROM 150 WATT TO 2.4 KWATT
- MULTISTANDARD & MULTIMODE TRANSMITTERS DVB-T/T2, ISDB-T, ATSC, DUAL CAST
- FREQUENCY AGILE EXCITER 30÷875 MHZ
- ADAPTIVE PRECORRECTION
- HIGH EFFICIENCY 50V LDMOS TECHNOLOGY
- SINGLE OR DUAL DRIVE VERSION
- 1+1, N+1 CONFIGURATIONS
- USER FRIENDLY LOCAL AND REMOTE MANAGEMENT
- HOT-SWAP REDUNDANT POWER SUPPLY WITH HIGH EFFICIENCY & POWER FACTOR CORRECTION
- HOT-SWAP AMPLIFIER MODULE REPLACE