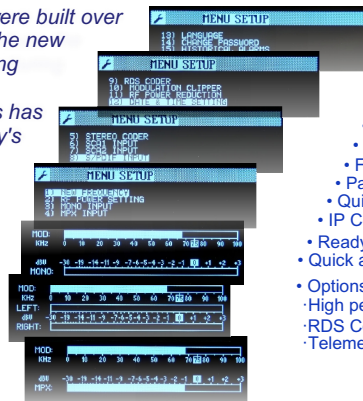


Following the legendary line of FM transmitters ESVA, of which were built over 12,000 pieces, ADVSAT now, continuing the tradition, introduce the new ESVB line, the best in our long 40 years of history of manufacturing Radio FM products.

In addition to the well-known quality and reliability, this new series has all those features and functions considered indispensable in today's high class equipments, such as top energy efficiency, telemetry LAN, IP connection and N+1 configuration.



KEY FEATURES

- Excellent audio performance
- Compact size in relation to the RF power
- Range in power from 10W to 5KW
- Best low power consumption achievable today
- Last generation of RF power devices
- Frontplane control and metering via HD Oled Display
- Parameters setting by only one rotary knob
- Quick and easy to use and immediate learning menu
- IP Connectivity for anywhere access
- Ready for N+1 system
- Quick and easy routine maintenance
- Options:
 - High performances Stereocoder
 - RDS Coder
 - Telemetry via IP



GENERAL

Power Output:.....from 0 to max. continuously adjustable from front panel.
 Frequency Range:.....87.5÷108.00 MHz, [66÷74 MHz (OIRT), 76÷90 MHz (JPN)]
 Type of Modulation:.....Direct frequency modulation of carrier, F3E stereo and mono.
 RF Output Impedance:.....50 ohm.
 RF Output Connector:.....N type to 500W 7/16" for 1000W.
 RF Output setting:.....1W and 10W selectable
 VSWR:.....1.5:1 Max with automatic fold-back VSWR prot. at all phase angles
 Frequency Stability:.....Internal TCXO ±2 ppm from -5 to +50°C (better on request)
 Modulation Capability:.....over ±200 KHz
 Audio Inputs:.....L&R analog balanced, Unbalanced composite, AES, SCA, RDS
 Operator interface setting:.....Encoder Push-Rotary
 LCD Display:.....Oled hi-definition graphic type
 Frequency Control:.....Synthesizer μprocessor controlled.
 Programming step:.....10 KHz increments
 Interface remote control:.....N°2 RS485 ports RJ45 back panel
 PC Interface: USB:.....connector Type B female front panel
 Telemetry:.....RJ45 LAN connection with WEB-Server
 Monitor RF:.....-10 dBm, BNC-F connector
 Off Lock RF Muting:.....< -80 dBc.
 RF Harmonics:.....Exceeds ETSI/CCIR/FCC requirements.
 RF Spurious:.....Exceeds ETSI/CCIR/FCC requirements.
 Preemphasis:.....Flat/50/75μs selectable from front panel.
 Asynchronous AM S/N Ratio:.....-65 dB below ref.100% AM modulation @ 400 Hz.
 Synchronous AM S/N Ratio:.....-60 dB below ref. 100% AM mod. 400 Hz with FM 100%
 AC Power Factor:.....0.95 typical at 220VAC
 Overall efficiency:.....> 72%
 Operating temperature:.....-10°C to +50°C.
 Max Operating Altitude:.....> 3000 mt.
 Relative Humidity Range:.....0 to 95% non condensing.

MONAURAL PERFORMANCE

Operational Modes:.....Mono (L+R)
 Input Impedance:.....600 ohm or 10 Kohms balanced.
 Input Level:.....-6 to +12 dBm in 0.5dB step (Other range on request)
 Input Connector:.....XLR female - balanced.
 Audio Frequency Response:.....±0.15 dB, 30 Hz to 15 KHz.
 Preemphasis setting:.....0, 50μS, 75μS
 Audio Filter Attenuation:.....< -55 dB @ 19 KHz, < -50 dB 20 KHz to 100 KHz
 T H Distortion + Noise:.....< 0.05% @ 400 Hz
 FM S/N Ratio:.....better than -80 dB RMS ref. ±75 KHz 50μs deemphasis.

MULTIPLEX PERFORMANCE

Composite Input Impedance:.....600 ohm or 10 Kohms balanced.
 Composite Input Level:.....-12 to +6 dBm in 0.5dB step (Other range on request)
 Input Connector:.....BNC female.
 AES/EBU Input Connector:.....BNC female
 Composite Response:.....±0.2 dB, 30 Hz to 100 KHz.
 THDistortion + Noise:.....0.05% @ 400 Hz
 Intermodulation Distortion:.....0.05%, 1 KHz/1.3 KHz, 1:1 ratio
 FM S/N Ratio:.....better than -80 dB RMS ref. ±75 KHz 50 μs de-emph. decoded.

STEREO CODER PERFORMANCE

Audio Input Impedance:.....600 ohm balanced, 15 Kohm unbalanced.
 Audio Input Level:.....-6 to +6 dBm in 0.5dB step (Other range on request)
 Input Connector:.....XLR female.
 Audio Frequency Response:.....±0.15 dB, 30 Hz to 15 KHz.
 Preemphasis setting:.....0, 50μS, 75μS
 THDistortion + Noise:.....0.05% @ 400 Hz
 Intermodulation Distortion:.....0.05%, 1 KHz/1.3 KHz, 1:1 ratio
 FM S/N Ratio:.....-80 dB RMS at ±75 KHz 50 μs de-emphasis.
 Pilot Frequency:.....19 KHz ± 1 Hz
 38 KHz Suppression:.....-60 dB (typ. -70 dB)
 Audio Filter Attenuation:.....< -55 dB @ 19 KHz, < -50 dB 20 KHz to 100 KHz
 Stereo Separation:.....30÷100 Hz = -50 dB, 100Hz÷15 KHz = -60 dB
 Crosstalk attenuation:.....Main to Sub -50 dB 30 Hz to 15 KHz below 100% Mod.

SCA-RDS 1&2 PERFORMANCE

Input Level:.....-6 to +6 dBm in 0.5dB step (Other range on request)
 Impedance:.....10k ohms unbalanced
 Connector:.....BNC female
 Amplitude Response:.....+/- 0.1dB; 53Hz to 100kHz

MECHANICAL/PHYSICAL

Height:.....88.2mm (3.5")
 Width:.....19" (48.3 cm) EIA Rack Mount
 Depth:.....22" (55.5 cm) with connectors
 Weight:.....12 kg 24 lbs unpacked