



WRM2000

WCU-6+1 and MTX-AUD-6+1
WEB RADIO MONITOR

WEB HIGH FIDELITY
FM RADIO,
IP & AUDIO MONITORING
RECEIVER



WRM2000

General Features

WRM2000 supervises simultaneously the FM and the online stream of the radio station to ensure perfect performance and remote monitoring. This rack-mountable unit is equipped with two wide range speakers to reproduce low, mid- and high-range audio frequencies. Users are enabled to toggle through the FM and online stream of radio station to confirm audio presence and quality in live broadcast environments. WRM monitoring solution has a built-in sensitive and high-selective tuner that allows the FM and online stream of the station to be selected, monitored and listened to. You can constantly monitor the sound of your station, measure and store data for future analysis. WRM2000 comes with a built-in RDS/RBDS decoder for self-monitoring purposes.

Main Features:

- FM Band 87 - 108 MHz DSP-based Tuner
- Up to 100 dB μ V direct RF Antenna Input
- Selectable wide range IF filter bandwidth
- Selectable De-emphasis - 50 μ s and 75 μ s
- RDS and RBDS decoder with BER meter
- Wide angle, easy to read OLED display
- Very Intuitive Navigational Menu
- Quick Station access via 4 Presets
- Real Time Audio Program Streaming
- Full fidelity radio program monitoring in only 1RU
- Built-in WEB server
- Easy to use WEB interface
- Apple and Android devices support
- Restore Factory Parameters option
- Protected access to the device settings
- Easy Installation and Setup
- Wide operating voltage range: 100-240V AC
- Bright bar graph LED metering of the RF and Audio Levels
- Headphone output with front panel level control
- Advanced Internet Radio Monitoring Capabilities
- Automatically decodes AAC, AAC+, MP3 and PCM IP Audio
- Support of all standard bitrates and VBR as well
- SHOUTcast / ICEcast compatible
- Automatically displays live metadata for all standards
- Adjustable alarms for Stream Loss and Internet Loss
- DSP controlled, high efficient class-D switching amplifier
- Accurate 3-way speaker system
- Two mid/high frequency speakers for excellent stereo imaging.
- Active crossover for perfect separation between mid-range and bass bands
- Magnetically shielded drivers that allows placement next to video monitors
- SNTP for automatic synchronization of the built-in clock
- Level Adjustable, Balanced Analog Audio Outputs on XLR Connectors
- Professional AES/EBU Digital audio output
- LAN port for full TCP/IP remote control and monitoring
- Adjustable MIN/MAX alarms for RF, Left & Right Audio Levels
- Alarm dispatch via E-mail, SNMP ver.2C and GPO
- Firmware updates will ensure improved operation
- Multi-point screw fixings ensured 19" aluminum case

Specifications:

- IP Audio Player
- Stream client Shoutcast/Icecast compatible TCP/IP client
- FM Radio Tuner
- Tuning Range 87.1 to 108 MHz, Frequency Agile
- Tuning Step 10, 20, 50, 100 kHz
- Tuner Sensitivity $\leq 10\mu\text{V}$ for 50dB monaural FM S/N
- Antenna Port BNC Connectors, 50 Ω
- Internal Attenuator 0, 10, 20 and 30 dB
- Dynamic range 100 dB
- FM Demod
- IF Filter Bandwidth Adjustable from 10kHz to 150kHz
- Frequency Response ± 0.1 dB, 10 Hz to 86 kHz
- Dynamic range 90 dB
- Stereo Decoder
- Frequency Response (L and R) ± 0.1 dB, 10 Hz to 15 kHz
- SNR (Stereo) 60 dB, 50 μs de-emphasis
- THD 0.1%, 10 Hz to 15 kHz, 50 μs de-emphasis
- Stereo Separation 50 dB, 50 Hz to 10 kHz, 50 μs de-emphasis
- RDS Decoder
- Standards European RDS CENELEC; United States RBDS NRSC
- Error Correction & Counting Yes
- Decoder PI, PS, PTY, AF, RT, RT+, DI, MS, TA, TP, CT, ODA
- Group Analyzer Yes • BER Analyzer Yes
- Group Sequence Display Yes
- RDS RAW Data Display Yes
- Metering Accuracy
- RF Level 1%, 0 to 100 dB μV , 1dB resolution
- Audio 1%, +5.0 to -50.0 dB, 0.1 dB resolution
- Amplifier & Loudspeakers
- Configuration with stereo low/mid/ high-frequency drivers
- Class D Audio Amplification
- Dolby® Digital / Dolby® E Decoding (with optional ARDM-D552 module)
- Selectable Stereo Downmix Modes
- USB 2.0 Port enables on-site firmware upgrades
- Ethernet port allows remote alarm monitoring
- Balance and Volume Control
- 1/4-inch Headphone Jack
- Power Output 2 x 50W
- Distortion, HF Outputs < 0.1% - 1kHz, 3W output (below limit threshold)
- Distortion, LF Output < 0.05% - 100Hz, 6W output (below limit threshold)
- Noise Better than -72 dB below full output
- Volume Control Mute to Full, Front panel, Rotary type
- Balance Trim ± 32 dB, Front panel, Rotary type
- Peak Acoustic Level 98dB SPL @ 2ft
- Outputs
- Analog Audio Outputs (L, R) +10 dBu, balanced XLR Connector
- AES/EBU Output (L, R) 5.0 Vp-p, 110 Ω , balanced XLR Connector
- Alarms Programmable terminals on rear panel, Optoisolated
- Headphone 6,3mm (1/4") Phone Jack
- Network
- Connector RJ-45
- Type Ethernet
- Device discovery UPnP support
- Measurements and Log Storage
- Storage with USB Pen Drive
- Data format Text, CSV
- Power Supply
- Voltage 100-240V / 50-60 Hz / 25W
- Size and Weight
- Dimensions (W;H;D) 485 x 44 x 300 mm
- Shipping Weight 540 x 115 x 300 mm / 4.5kg