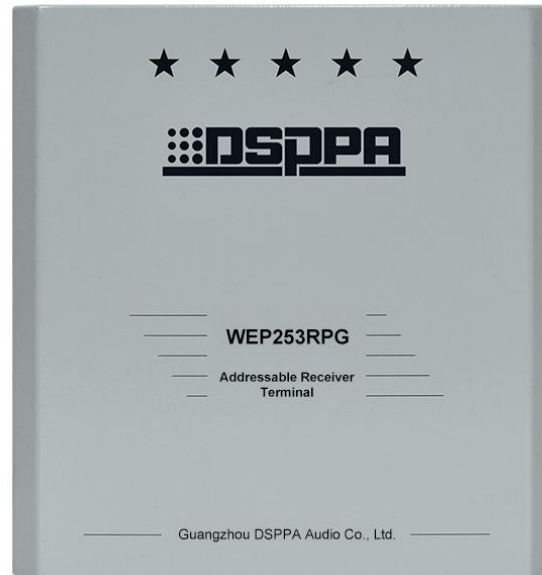


## WEP253RPG

### Emergency Broadcast Multi-mode Terminal



#### Description

WEP253RPG is an emergency broadcast multi-mode terminal developed specifically for wireless PA system, which integrates FM reception, audio decoding, signal amplification and audio output to support wireless and wired transmission modes.

The device uses DSP digital audio processing technology as the core and outputs high-fidelity audio signal. With RDS subcarrier decoding, high reliability signal encryption technology to prevent illegal insertion of radio; The built-in gas discharge tube that can absorb high voltage and strong current protects the equipment from lightning attacks, effectively ensuring the safety and stability of the PA system.

The device is suitable for urban and rural emergency broadcasting systems; outdoor sound reinforcement of public address systems in campuses, parks, squares, amusement parks, factories and other places. It is ideal choice for outdoor audio reception, signal amplification and other needs.

#### Features

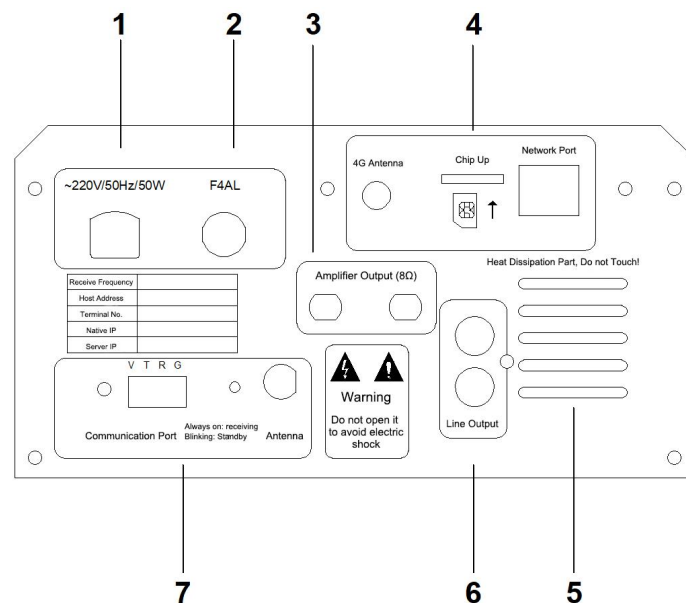
- All-weather outdoor waterproof design, small and beautiful appearance;
- Wireless/wired addressable receiving, RDS subcarrier decoding, high-reliability encryption means to ensure broadcast security;
- Built-in gas-discharge tube which can absorb high voltage and high current to protect device from lightning attacks, with high reliability.
- DSP digital radio unit, high sound quality output;
- Support the remote timing and digital volume control of the remote upper host, to solve the problem that mechanical potentiometer will fail for a long time;

- With DSPPA special control protocol, ultra-high sensitivity reception, it can still accurately demodulate the control signal even under weak signal;
- Can be customized for fixed frequency reception or automatic tracking transmitter frequency reception, super adaptability;
- Built-in high-fidelity amplifier circuit with complete protection function.
- With two line signal output interface, facilitate to connect more high-power amplifier.
- With working status indicator, easy to determine the device failure;
- With reserved USB/ Network communication port to facilitate parameter setting and upgrade and maintenance;
- The communication port has a bidirectional power supply mode, which supports powering external series devices and external devices to power internal devices;
- Receiver parameters can be controlled by PC software, host or dedicated handheld device, and remote wireless or wired settings can be performed at the same time;
- Support multiple energy supply modes such as solar energy, wind energy, ordinary mains electricity, line power supply, etc.; automatic standby when there is no signal and mute function at the line output port, low power consumption operation, saving electricity and extending the service life of the equipment.
- Supports two input modes (IP/4G) with mutual backup, and automatic switching between primary and backup reception modes.
- Allows remote configuration of audio columns, including frequency, volume, and area codes; Designed for all-weather outdoor use with a compact and aesthetically pleasing appearance.
- Support connection to an external high-power speaker, delivering high-fidelity output with continuously adjustable volume for excellent sound quality.
- For emergency and routine broadcasts, volume levels are software-configured and stored within the device.
- Designed with a well-organized internal structure, the core circuit board is coated for enhanced protection. Equipped with a grounding terminal for secure grounding.
- Dustproof and waterproof level reaches IP66, which requires dustproof and waterproof for all interfaces of the equipment.
- Support both real-time and scheduled network playback.
- Adopt addressable full digital decoding, receive remote control from superiors, realize multi-level partitioning according to different usage environments, and support full-zone playback, zone playback, and single-point playback.
- Compatible with 3G and 4G reception and decoding.
- Support multiple incoming tasks, with the terminal prioritizing playback of higher-priority tasks.
- Automatically resumes broadcasting after a power outage.
- Equipped with LED indicators that display various device statuses. Allows configuration and parameter queries via both app and web client.
- Supports remote firmware upgrades through the web client.
- Enables remote reboot functionality.
- Allows remote access to device logs.
- Integrated overheat, over-voltage, and over-current protection for the amplifier.
- Displays terminal location on the app/platform, with direct navigation to the installation point via the app.
- Scan the QR code on the device using the app to configure device attributes, including area, installation location, and on-site installation images.
- Support connection to outdoor LED screens via serial port, LAN port, or platform for text and video output (at least one connection method required).
- Support automatic status feedback from the device.

# Specifications

Model	WEP253RPG		
FM Reception	Reception Frequency	76-108MHz	
	Frequency Response	180Hz-15KHz	
	SNR	≥60dB	
	Receiving Sensitivity	2-100dBuV	
	Data Demodulation	57 kHz, RDS encoding	
Network Audio Decoding	Decoding or Encoding	MPEG-1 Layer 2	
	Sampling Rate	48KHz	
	Sampling Accuracy	24-bit	
	Bit Rate	64Kbps	
	1×IP Input	100/1000Mbps, UDP Protocol	
Line Output & Ports	1×USB Input	USB Interface	Bitstream Format:MP3
	Output Interface	2×RCA	
	Output Level	1Vrms	
	Output Impedance	≤100Ω	
	Frequency Response	180Hz-15KHz	
	SNR	≥60dB	
	Distortion	≤0.3%	
	USB Communication Method	USB/TTL Serial Port	
Power Supply	Peak Output Audio Power	≥25W/8Ω (THD=0.5%)	
	Standby Power Consumption	≤0.85W	
	Max. Load Power Consumption	≤60W	
	Voltage & Frequency	AC100-240V/50Hz	

# Front / Rear Panel



1. AC200V Power Input Cable.
2. AC220V Power Fuse

If the power fuse is blown, please replace it with a fuse of the same specification; if it blows continuously, it

means there is a fault inside the machine. Please replace the fuse after eliminating the fault.

3. 8Ω/25W Amplifier Output Port.

Connect the 8Ω constant resistance speaker.

4. 4G Antenna, 4G Card

5. Cooling Ventilation Window.

Do not block the ventilation port under any circumstances.

6. Audio Output Interface.

Connect to the amplifier.

7. (1) Antenna Interface

Connect the antenna for wireless reception, or connect a coaxial cable for wired reception.

(2) Status Indicator light.

A steady light indicates that the terminal is receiving a signal; a flashing light indicates standby mode.

(3) Communication Port

Connect to an addressable control host or PC for remote parameter configuration.