

## FreeSpeech® Single-Channel Wireless Mic Receiver

- > Single-channel receiver for one FreeSpeech® wireless microphone
- > Advanced combined RF/IR wireless operation ensures trouble-free performance
- > 2.4GHz RF technology with “error recovery” minimizes noise and feedback
- > “Automatic Gain Control” maintains consistent speech levels
- > Built-in 30 Watt stereo amplifier drives one or two pairs of speakers
- > Line output enables connection to an external amplifier or video projector
- > Two stereo line inputs provide amplification for a DVD player, laptop computer, or other program sources
- > Speech and program audio signals are independently adjustable via a control on the wireless mic<sup>(1)</sup>
- > “Ducking” feature automatically turns down the program source whenever the instructor speaks
- > Built-in master volume, bass, and treble adjustment helps optimize the overall sound quality
- > High-efficiency, energy-saving design minimizes power consumption during operation and while idle
- > Includes external power pack and antenna

Note: This product is not sold individually, see [MP-FS100 PAK](#).

Crestron® FreeSpeech® systems provide a very simple and affordable solution for adding speech reinforcement as part of a complete classroom media presentation system. The MP-FS-RX1 is a single-channel receiver capable of supporting one wireless microphone ([MP-FSMIC<sup>\(1\)</sup>](#)). Built-in amplification provides everything needed to drive a set of speakers<sup>(2)</sup>, and even allows for the connection of a DVD player, computer, or other program audio sources.

## SPECIFICATIONS

### Wireless Communications

**RF:** 2.4 GHz ISM Device; 79 Channels FHSS (2402 to 2480 MHz)  
**IR:** 38 kHz (requires MP-FSIR IR Beacon Sensor<sup>(1)</sup>)  
**Range (typical):** 50 ft (15 m) indoor, subject to site-specific conditions

### Wired Communications

**USB:** USB host port for firmware update and configuration

### Audio

**A-D/D-A Conversion:** 16-bit, 44.1kHz  
**Master Volume Range:** -55dB to +20dB  
**Bass Gain Range:** ±15dB @ 100Hz  
**Treble Gain Range:** ±15dB @ 10kHz  
**Ducking Adjustment:** Software adjustable Threshold, Depth, Attack, and Release  
**Alert Tone:** Software configurable functionality



**Frequency Response:** 20Hz to 20kHz ±0.5dB  
**S/N Ratio:** 75dB 20Hz to 20kHz A-weighted  
**THD+N:** 0.7% 20Hz to 20kHz  
**Output Power:** 15 Watts per channel at 8 or 4 Ohms  
**Amplifier Protection:** Electronic short-circuit and overload protection

### Connectors

**COMPUTER:** (1) USB Type B female;  
 USB service port

**BEACON SENSOR 1 – 2:** (2) 3-pin 3.5mm detachable terminal blocks;  
 Interface for up to two MP-FSIR IR Beacon Sensors<sup>(1)</sup>

**MUTE SENSOR:** (1) 2-pin 3.5mm detachable terminal block;  
 Contact closure sensing input, or interface for MP-FS-PAS PA Audio Sensor<sup>(2)</sup>;  
 Mutes all audio outputs when a contact closure or PA audio signal is sensed

**ALERT OUT:** (1) 2-pin 3.5mm detachable terminal block;  
 Normally open isolated relay, software configurable functionality;  
 Rated 2 Amp, 50 Volts maximum

**LINE IN 1 – 2:** (4) RCA female comprising (2) unbalanced stereo line-level audio inputs;  
 Maximum Input Level: 2 Vrms;  
 Input Impedance: 47k Ohms nominal

**LINE OUT:** (2) RCA female, unbalanced stereo line-level audio output;  
 Maximum Output Level: 2 Vrms;  
 Output Impedance: 100 Ohms nominal

**SPEAKER OUT 4/8Ω:** (2) 2-pin 5mm detachable terminal blocks;  
 Left & right channel speaker-level audio outputs;  
 Wire Size: Connector accepts 14 AWG maximum;  
 Output Power: 15 Watts per channel at 8 or 4 Ohms

**G:** (1) 6-32 screw, chassis ground lug

**24VDC 2.0A:** (1) 2.1 x 5.5 mm DC power connector;  
 24 Volt DC power input (PW-2420RU power pack included)

# MP-FS-RX1 FreeSpeech® Single-Channel Wireless Mic Receiver



MP-FS-RX1 — Rear View

Antenna (front): (1) Connection for supplied antenna

## Controls & Indicators

**PWR:** Green LED, indicates operating power supplied from external power pack

**BASS:** Rotary low frequency boost/cut adjustment

**TREBLE:** Rotary high frequency boost/cut adjustment

**MASTER VOLUME:** Rotary master level adjustment

## Power Requirements

**Power Pack:** 2.0 Amps @ 24 Volts DC;

100-240 Volts AC, 50/60 Hz power pack, model PW-2420RU included

## Environmental

**Temperature:** 41° to 104°F (5° to 40°C)

**Humidity:** 10% to 90% RH (non-condensing)

**Heat Dissipation:** 35 BTU/Hr

## Enclosure

**Chassis:** Aluminum w/polycarbonate label overlay

**Faceplate:** Plastic w/polycarbonate label overlay

**Mounting:** Freestanding

## Dimensions

**Height:** 2.36 in (60 mm)

**Width:** 8.12 in (207 mm)

**Depth:** 5.95 in (151 mm)

## Weight

2.30 lb (1.05 kg)

## MODELS & ACCESSORIES

### Available Models

MP-FS-RX1-1: FreeSpeech® Single-Channel Wireless Mic Receiver

### Included Accessories

PW-2420RU: Power Pack, Desktop, 24VDC, 2A (50 Watts), Regulated, US/International (Qty. 1 included)

### Available Accessories

MP-FSMIC: FreeSpeech® Wireless Microphone

MP-FSIR: FreeSpeech® IR Beacon Sensor

MP-FS-PAS: FreeSpeech® PA Audio Sensor

FS6: 6.5" 2-Way Surface Mount Media Presentation Speakers, Pair

FSDI8: 8" Drop-in Ceiling Speakers, Pair

CBL Series: Crestron® Certified Interface Cables

MP-FS100\_PAK: FreeSpeech® Single-Channel Wireless Mic System Package

Notes:

1. Item(s) sold separately or as part of MP-FS100\_PAK system package.
2. Item(s) sold separately.

This product may be purchased from an authorized Crestron dealer. To find a dealer, please contact the Crestron sales representative for your area. A list of sales representatives is available online at [www.crestron.com/salesreps](http://www.crestron.com/salesreps) or by calling 800-237-2041.

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