

SM Network Speaker Clock



The **SM Network Speaker Clock** is part of the FrontRow SM Series, designed specifically for **Symphony** — FrontRow’s third-generation campus communication software.

It features a programmable LCD screen that displays the date and time, along with an integrated microphone for hands-free, two-way intercom communication.



Applicable Scenarios

The SM Network Speaker Clock is an excellent choice for classrooms that require precise timekeeping, paging, bell scheduling, and intercom communication.

Two-way Intercom

The SM Network Speaker Clock supports for two programmable “press-to-talk” switch buttons, and built-in microphone, allowing for two-way intercom calls. (Optional two button call switch, part number MC-CS-2BM-V1)

Multiple SIP Accounts

While designed for FrontRow’s Symphony, the SM Network Speaker Clock supports up to three total SIP PBX connections.

Multicast

The SM Network Speaker Clock offers 15 unique multicast priority streams, providing exceptional flexibility to meet your communication needs.

Audio Codecs

The SM Network Speaker Clock supports four industry-standard audio codecs:

- G.722 (High Definition)
- G.711 (alaw)
- G.711 (ulaw)
- Opus (High Definition)

Built-in Amplifier

The SM Network Speaker Clock features a built-in 10W amplifier, a 70Hz to 20kHz frequency range, and a maximum sound pressure level of 101dB. This speaker delivers clear audibility and intelligibility for voice paging in classroom environments.

Power over Ethernet (PoE)

The SM Network Speaker Clock is powered via standard PoE (IEEE 802.3at), ensuring a streamlined installation and enabling network control through the built-in web interface or Symphony.

Relay

The SM Network Speaker Clock is equipped with a NO/NC dry relay, enabling your existing FrontRow audio systems to be automatically muted during a Symphony Audio event.

The SM Series IP Audio Devices by FrontRow



Network Speaker Clock



Network Speaker



Network Horn Speaker



Network Interface

Audio

Speaker Component	4.5" Full Range Driver Unit
Sensitivity	91dB/1m/1W
Max Sound Pressure Level	101dB
Frequency Response	70Hz - 20KHz
Coverage Pattern	90°H 50°V 30m2
Amplifier	Single Channel Class-D Topology
THD	<0.1%
Rated Power	8Ω 10W
Network Audio Codec	G.722, G.711 a-law, G.711 u-law, Opus

Microphone

Directivity	Omni-Directional
Sensitivity	-36±2dB
Impedance	2.2kΩ (Max)
S/N Ratio	65dB
Maximum Input Sound Pressure Level	110dB THD≤3%
Standard Operating Voltage	2.0 Vdc
Current Consumption	500μA (Max)

Display

Display Type	High Resolution Back-Lit Color LCD Display
Display Color	16-bit RGB
Brightness	600 cd/m²
Resolution	1920*480
Viewable Dimensions	8.63" x 2.16" (219.1mm x 54.9mm)
Text Display	Configured via WebGUI

Mounting

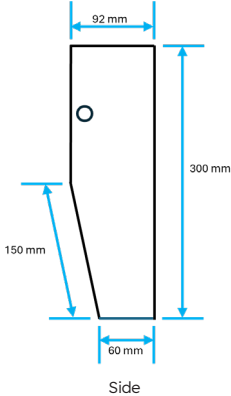
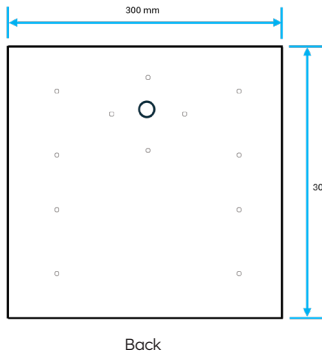
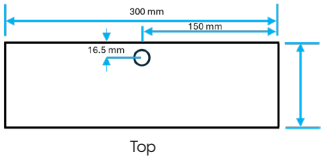
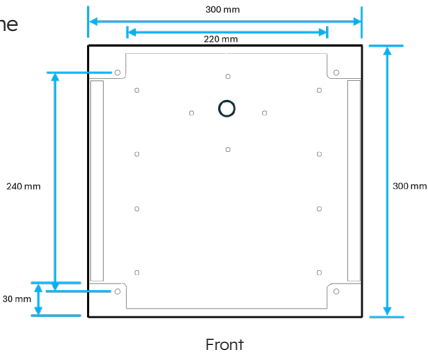
The SM Network Speaker Clock surface can be installed either flat against the wall or at a 12° downward slant without additional equipment.

Included in the Box:

- 1 SM Network Speaker Clock
- 1 SM Network Speaker Clock back box
- 4 mounting screws (for attaching the speaker to the back box)

Not included:

- Network cable
- Mounting hardware for attaching the back box to the wall



Network

Ethernet	IEEE 802.3 10/100 Base-T
PoE	IEEE 802.3 at Compliant
Supported Protocols	SIP(RFC3261), HTTP, TCP/IP, SSL, DNS, SNTP, NTP, RTSP,RTP, RTCP, TCP, UDP, MQTT, ICMP, DHCP, ARP, SSH
IP Addressing	DHCP / Static

Mechanical Properties

Memory	128MB RAM, 256MB Flash
Power Input	PoE+ and External 24VDC - not included
Casing Material	Cold Rolled Steel Finished in Textured White Epoxy
Mounting Method	Wall Mounted
Color	White
Weight	3.25kg (7.17lb)
Dimensions	11.81" x 11.81" x 3.62" (300mm x 300mm x 92mm)

Environmental

Installation Environment	Indoor
Operating Temperature	-20°C - 50°C (-4°F - 122°F)
Storage Temperature	-40°C - 70°C (-40°F - 158°F)
Humidity	10% - 95% RH Non-condensing

Approvals

Approvals	EEN 55032:2015, EN 55035:2017, EN 61000-3-2:2014, EN 61000-3-3:2013, EN 62368-1:2014+A11:2017, FCC Part 15B Class A
Warranty Coverage	2 Years