

BATHROOM CEILING SPEAKER SYSTEM

There is a growing demand for customized solutions for the hotel and leisure industries, where additional offerings add value to the overall user experience and service provided to customers.

Designing a speaker system for regular use in wet environments such as a bathroom or shower room comes with the challenges of ensuring full protection against the damaging forces of moisture, humidity and splashing water.

A bathroom ceiling speaker system in hotel rooms is a cost-effective set-up which extends the listening experience from the living room to the bathroom. This has applications as simple as guests listening to their favorite tracks while lazing in the bathtub or as crucial as not missing out on important news and updates, especially for traveling businessmen. The greatest advantage is that there is no worry about audio equipment getting damaged by accidental contact with water.

The AQUA bathroom speaker system is available in two configurations AQ100 and AQ200 with wall-mount and wireless remote volume control options, respectively. The standard bathroom speaker system comprises the following components: amplifier, ceiling speaker, volume control, and voice alarm interface.

The **BCL3** is a waterproof, white ceiling speaker which easily matches the aesthetic requirements of even the most soughtafter and elegant bathroom designs.

The **SPA 101** amplifier drives the 8-ohm speaker to provide high-fidelity sound beyond the confines of the living room. The weatherproof volume controller (**MVC10-8**) completes the circuit, allowing manual adjustment of the sound output as per the listener's requirements. The corrosion-resistant volume controller is available in different colors to match the paint finishing and texture of bathroom interiors.

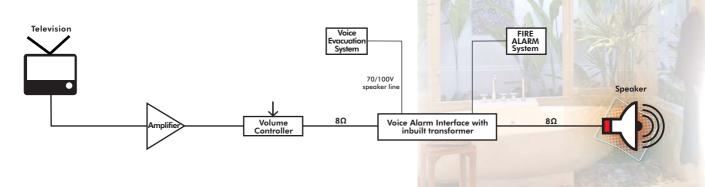
The voice alarm interface (VAI) is a module wired between the volume controller and speaker as a common interface with the fire alarm and mass notification network in the hotel.



Integration with mass notification systems

To address the concern of life safety measures within a hotel room or bathroom, in emergency conditions, mass notification must have top priority, that is, voice messages must reach the user wherever his/her location.

The main door of the hotel room absorbs approximately 30dBA of the sound output from voice evacuation speakers installed in the corridor. Furthermore, the bathroom door inside the hotel room absorbs approximately 20dBA of the sound entering the bathroom. If the ambient noise in the room is taken into consideration, the combined effect significantly attenuates voice messages entering the hotel room, and the recipient may miss instructions issued during an emergency situation.



The bathroom speaker system can be linked to the hotel's mass notification/voice evacuation system with the addition of the voice alarm box wired to the volume controller and speaker.

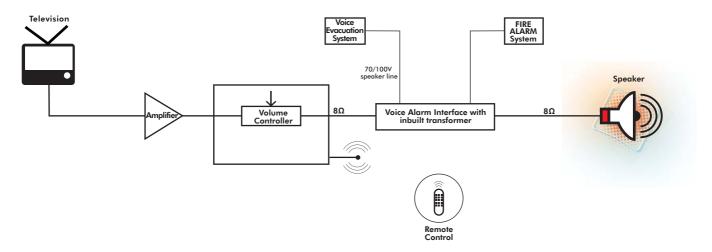
An inbuilt transformer in the voice alarm interface steps down the 70/100 V on the voice alarm distribution line to match the impedance (8 Ω) of the BCL3 speaker.

The voice alarm interface switches between the fire alarm system and the independent bathroom speaker system via a relay to connect the bathroom speaker to voice message signals during life threatening events such as fires.

This feature ensures that guests are not isolated from emergency alerts due to loud music playing the bathroom. The bathroom speaker system when linked to the mass notification system outputs messages at a preset volume level, irrespective of the level set by the guest on the volume controller.

Wireless remote volume control

A wireless interface module can be added to the bathroom speaker network to ease adjustment of the speaker volume. The user can control the audio output gain by means of a wireless, handheld RF remote control. This expandable feature is useful especially in sites where cable installtion is difficult or impossible.



The RF remote control allows flexibility in movement within the range of communication. The wireless interface module and remote control have IP54 certification, which provides adequate protection against dust and water sprays from all directions.





KEY FEATURES

IP55 rated, fire retardant speaker

Integration of the bathroom speaker system with the hotel's mass notification system

Waterproof, plastic speaker

Waterproof, corrosion-resistant volume controller available in different colors

Wireless remote volume control







Bathroom ceiling speaker system (standard) AQ200 Bathroom ceiling speaker system (with wireless remote volume control)





WIM (Wireless Interface Module)

WRC (Wireless Remote Volume Control)



MVC10-8 (Volume Control)



VAI (Voice Alarm Interface)

MVC10-8/B	Brushed metal (standard)
MVC10-8/P	Polished metal (standard)
MVC10-8/CB	Brushed metal (chrome)
MVC10-8/CP	Polished metal (chrome)
MVC10-8/RBB	Brushed metal (red bronze)
MVC10-8/RBP	Polished metal (red bronze)
MVC10-8/BRB	Brushed metal (brass)
MVC10-8/BB	Brushed metal (bronze)
MVC10-8/GP	Polished metal (gold)



AQUA

Bathroom Ceiling Speaker System



TECHNICAL SPECIFICATIONS

A 4 1 1	
Model	BCL 3
Rated power, Watts	6
Transformer tappings 100 volt line, Watts	6/3/ 1.5/ 0.75/ 0.25
100 volt line Transformer Impedance , Ohms	1.67k/ 3.33k/ 6.67k/ 20k/ 40k
Transformer tappings 70.7 volt line, Watts	3/1.5/0.75/0.375/0.125
Driver impedance, Ohms	8
Effective frequency range, Hz (BS6840)	220 - 18,500
S.P.L. ,@ 1m, 1watt,1k hz, dB	89
S.P.L. ,@Full power/ 1m, dB	96
Dispersion at 1,000 Hz, Degrees	140
Directivity Q factor, 1k Hz	1.70
Dimensions front and depth, mm (inch)	f139 x 128.5
Net weight, Kgs (lbs)	0.78 (BCL3T), 0.61 (BCL3 8ohm)
Colour / Finish	RAL9016 White
Material	UL94v0 grade fire retardant plastic
	Anodized aluminum mesh and coating
Mounting	Stainless steel springs clips

Model	SPA 101
Input Voltage	230/240 V AC
Power Rating	10 W/8 Ohm
Input Signal	Mono; unbalanced detachable connector
Input sensitivity	40 m V
Input Impedance	150 K Ohm
Frequency Response	40 – 18 KHz
Current Consumption	0.06 A/ 0.14 A 240 V ac
Indication	Power LED
Color	Black/White
Dimensions (D x H x W)	83 x 45 x 103 mm
Weight (Kg)	650 g

As our policy is one of constant product improvement the right is therefore reserved to modify product specifications without prior notice

