

CEILING MOUNT SPEAKERS

PC-580RU AM PC-580RVU AM

Thank you for purchasing TOA's Ceiling Mount Speaker. Please carefully follow the instructions in this manual to ensure long, trouble-free use of your equipment.

1. SAFETY PRECAUTIONS

- Before installation or use, be sure to carefully read all the instructions in this section for correct and safe operation.
- Be sure to follow all the precautionary instructions in this section, which contain important warnings and/or cautions regarding safety.
- After reading, keep this manual handy for future reference.

WARNING

Indicates a potentially hazardous situation which, if mishandled, could result in death or serious personal injury.

- Install the unit only in a location that can structurally support the weight of the unit and the mounting bracket. Doing otherwise may result in the unit falling down and causing personal injury and/or property damage.

- Do not use other methods than specified to mount the bracket. If extreme force is applied to the unit, it could fall off and possibly resulting in personal injuries.

CAUTION

Indicates a potentially hazardous situation which, if mishandled, could result in moderate or minor personal injury, and/or property damage.

- Avoid touching the unit's sharp metal edge to prevent injury.
- To avoid electric shock, be sure to switch off the amplifier's power when connecting speakers.
- Do not operate the unit for an extended period of time with the sound distorting. This is an indication of a malfunction, which in turn can cause heat to generate and result in a fire.

2. GENERAL DESCRIPTION

Integrated with a speaker unit and panel, the PC-580RU and PC-580RVU Ceiling Mount Speakers are of all metallic construction and ideal for use in almost all commercial audio systems especially in a Mass Notification System and Voice Alarm System. It has a high sensitivity rating and a high intelligibility sound when compared to conventional speakers. The installations of PC-580RU and PC-580RVU into the ceiling with Back Can HY-BC580U and a Tile bridge or a Mounting rail are UL/ULC certified for fire alarm signaling and use in air handling spaces (plenum).

3. SPECIFICATIONS

Model No.	PC-580RU		PC-580RVU	
Rated Input	10 W (speaker), 5 W (transformer, 70.7 V line and 25 V line)			
Rated Impedance	70.7 V line	20 K (0.25 W), 10 K (0.5 W), 5 K (1 W), 2.5 K (2 W), 1 K (5 W) Ohms		
	25 V line	2.5 K (0.25 W), 1.25 K (0.5 W), 625 (1 W), 312.5 (2 W), 125 (5 W) Ohms		
Speaker Terminal	Spring Terminal Blocks			
Sensitivity	97 dB			
Frequency Response	50 – 16.5 KHz			
Speaker Component	200 mm (8") Dual cone type			
Magnet Size	Dia.80 (3.15") × dia.32 (1.26") × 12 (0.47 ") mm			
Magnet Weight	272 g (10 oz)			
Flux density	11,900 gauss			
Potentiometer	_____		Type: Screw-driver adjust Wire wound, resistance 50 Ohms	
Dimensions of Fixing Hole	Dia. 203.2 mm (8.00")			
Finish	Baffle: Steel plate, white			
	Grille: Surface-treated steel plate net, white			
Dimensions	Dia. 324 x 85.0 (d) mm		Dia. 324 x 96.2 (d) mm	
Weight	1.58 kg (3.47 lbs)		1.59 kg (3.50 lbs)	
Accessory	Mounting screw (M 5 x 38 mm) ... 4			
Option	Back Can (for UL/ULC certified installation) : HY-BC580U			
	Back Can (for other installations) : BBF-100EA, BB-671			
	Tile Bridge, Mount Rail : TBF-100EA, Q-HY-TB2			

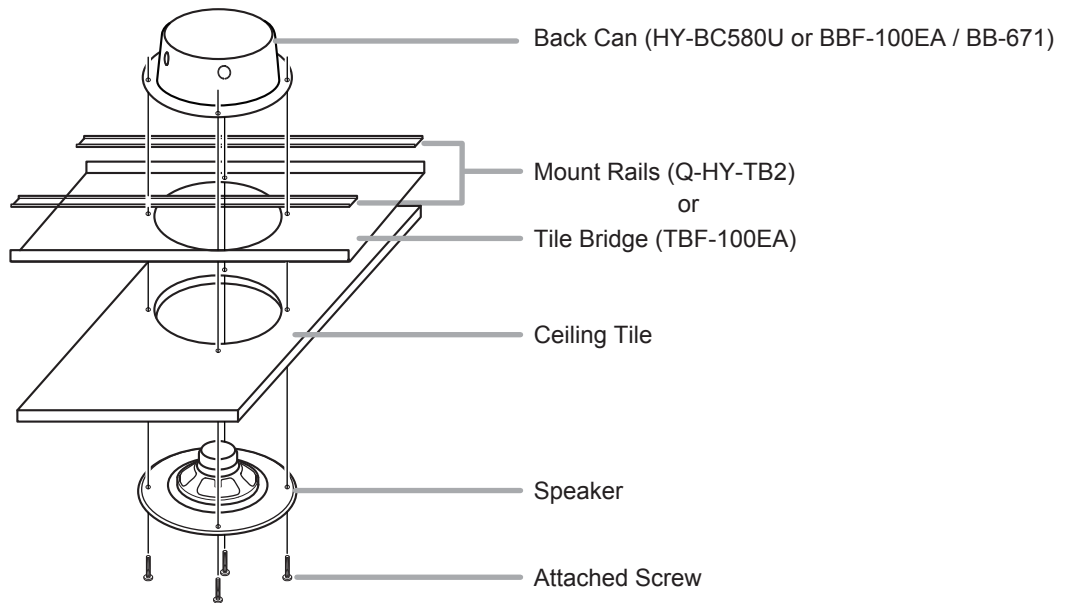
Voltage (Vrms)	PC-580RU.PC-580RVU									
	25V					70V				
Tap (W)	0.25W	0.5W	1W	2W	5W	0.25W	0.5W	1W	2W	5W
SPL @ 10ft.(dBA)	72	77	80	83	87	74	77	81	83	87

Note: The design and specifications are subject to change without notice for improvement.

4. INSTALLATION

Back Can shall be "TOA HY-BC580U", if UL1480UUMW, ULC-541S, (Fire alarm signaling) or UL 2043 (use in air handling spaces) is required. All wire entry Knockouts should use Metal conduit and Metal fitting only. No Rubber bushings on enclosures.

Note: Local codes may require other installation methods. Check with authority having jurisdiction to determine acceptability of the mounting methods shown.



5. WIRING DIAGRAMS

Make sure to connect an appropriate wire from transformer with the "Tr" speaker terminal. See the diagrams below for wire color and transformer tap selection (70 V line and 25 V line).

CAUTION:

To conform with UL 1480 UUMW / ULC-S541, requirements for fire alarm signaling speaker, field wires must be connected as shown in the wiring diagram below. And, installation must comply with all National and Local Building Codes, also NFPA guidelines.

