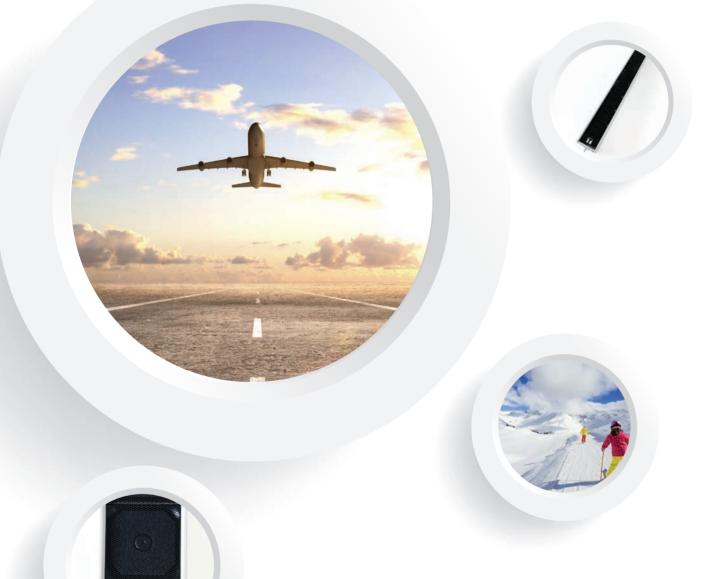


## Q-HA1000Y

Long range horn array speaker



# High intelligibility over long distances.

### sound without compromise

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## **Q-HA1000Y** Long range horn array speaker

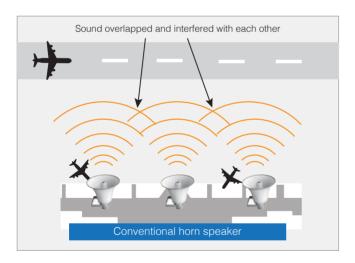
The Q-HA-1000Y is a slim horn array speaker with extremely longe range. It can spread sound over 600 m while a conventional speaker can cover only 300 m. Besides applications where you need this long range to transport information over an extreme long distance (e.g. airports, skiing locations, factories, public squares or leisure parks) the new horn array speaker also eases the intelligibility in standard distances and under extreme situations.

On a runway for example, poles can not be built, so it is impossible to install speakers. In order to deliver announcements, a large number of speakers must be installed outside of the terminal building. In this case, the sound may lose intelligibility before the sound reaches the target area due to speaker intereference from one another. The Q-HA1000Y is composed of multiple horn speakers positioned in an array and can not only reduce the total number of speakers, but also can achieve a better speech intelligibility.

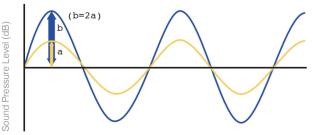
- Long-range sound coverage further than conventional horn speakers
- Better speech intelligibility thanks to horn array technology
- > Compact and lightweight design

- The sound level progressively decreases as it travels, so to deliver sound far, input power must be increased.
- Doubling the input power adds 3 dB in sound pressure level (SPL) and can increase distortion. However, when two sound sources are accurately overlapped, there is a rise of 6 dB in SPL.
- Overlapped sound by using multiple speakers can be delivered much farther with less distortion. Even if the speakers are installed on the roof of the buildings, announcements can be delivered with high intelligibility.

High intelligibility up to 600 m thanks to array technology



#### Status when two sounds overlapped



Two oscillations of sound "a" are overlapped and become"b".



#### **Specifications**

	Q-HA1000Y
Rated Input (100 V line)	50 W
SPL (1W, 1m)	114dB
Maximum SPL (50W, 1m)	131 dB
Frequency Response	350 Hz – 7 kHz
Directivity angle	Horizontal: 90° (2kHz), Vertical: 15° (2kHz)
Water protection	IPX5
Dimensions (W x H x D)	167 x 1,233 x 140.5 mm
Weight	13.5 kg

Specifications are subject to change without notice. Printed in Germany (1501) 833TEEC251