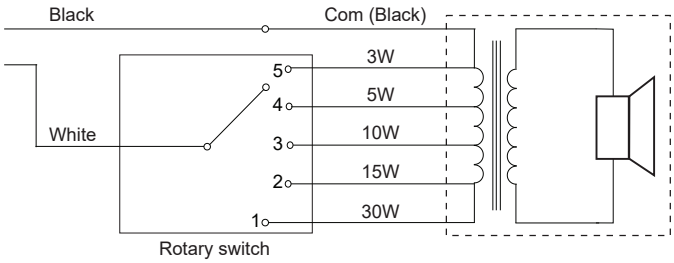
HS822 - Horn Speaker With Rect. Flare - 30W 100V Line

EVAC / PAGING

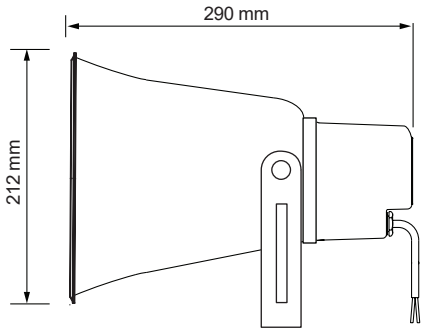
Introduction

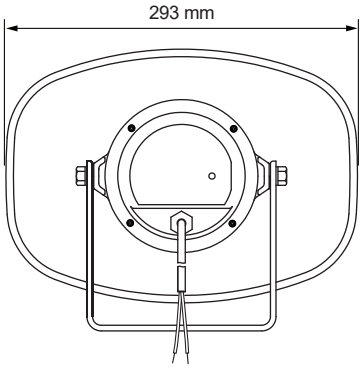
Constructed with high impact ABS flares rectangular shape to suit installation site where pattern of broadcast shall be controlled, such as low level car parks, corridors, etc. Suitable for indoor or outdoor sites with IP65 rating.

Circuit Diagram

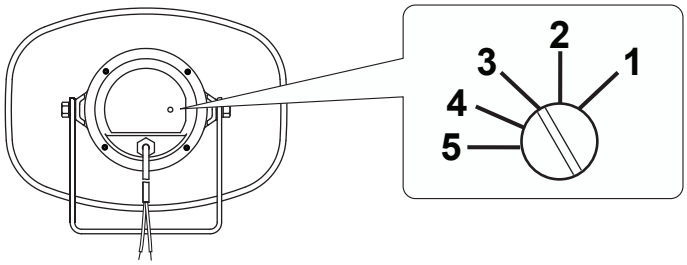


Physical Dimensions





Rotary switch

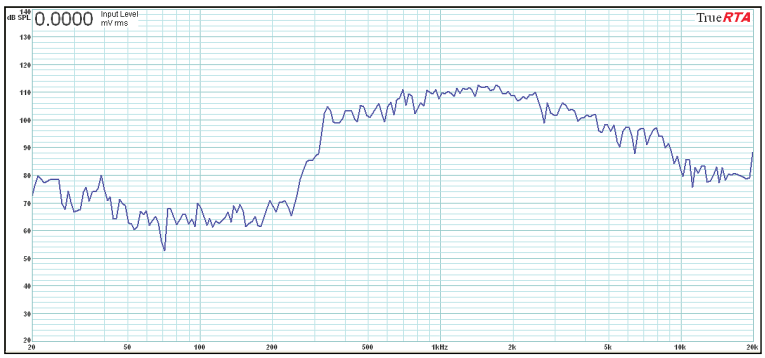


Output power selection chart:

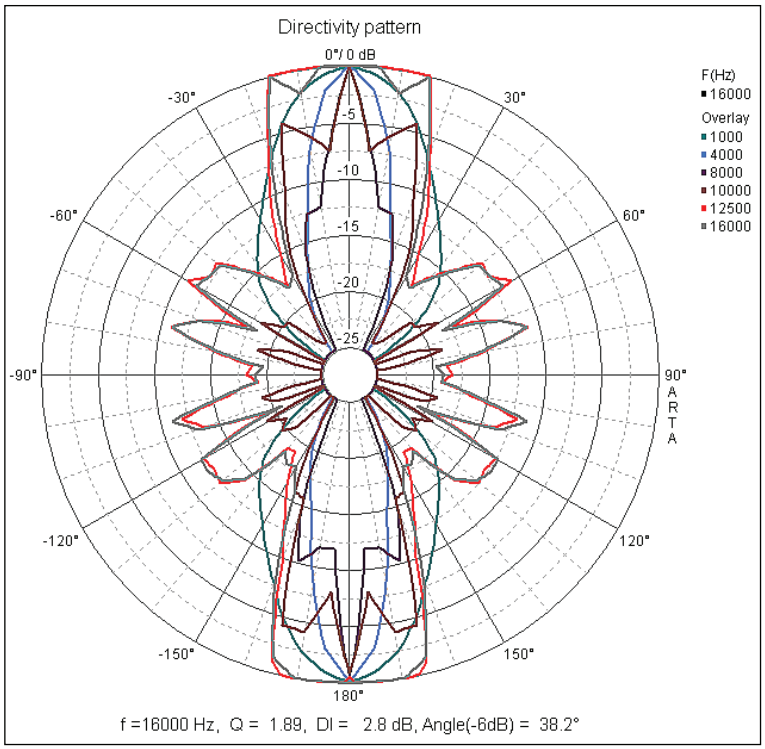
Tap	1	2	3	4	5
Power (W)	30	15	10	5	3
Imp (Ohm)	330	670	1K	2K	3.3K

To change the impedance, change the rear panel-mounted rotary switch position using a standard screwdriver.

SPL Chart



Polar Chart



Technical Specifications

Power rating	30W 100V line
Power tapping (W)	3 / 5 / 10 / 15 / 30
Primary Impedancer : 1	330 Ohm
2	670 K Ohm
3	1 K Ohm
4	2 K Ohm
5	3.3 K Ohm
Freq response@ 1KHz +/- 3dB	400 ~ 8 KHz
SPL (1 W/m @ 1 KHz)	105 dB
Flare material	ABS
Flare dimension	285 x 205 mm
Overall size	293(W) x 212(H) x 290(D) mm
Driver enclosure	ABS
Weight	2.15 kg
Colour	White cream

Design Assistance

Paging horns can achieve a higher SPL than ceiling or wall speakers, but have limited frequency response. Thus, it is meant purely for voice announcement and siren tone.

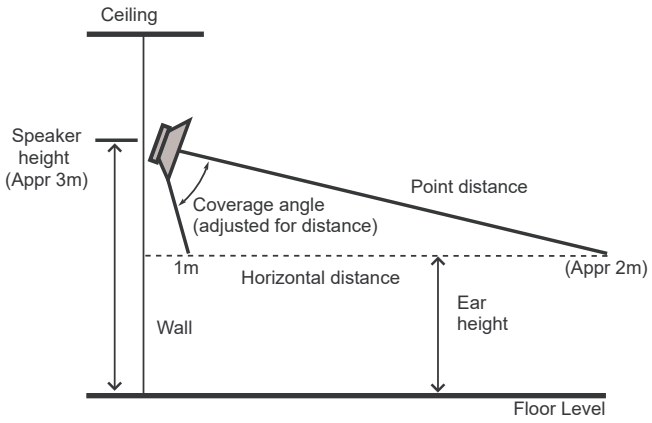
They are seldom used for music applications but are commonly used outdoors where long sound projection distances are needed.

They are also used in noisy environments where high sound levels are required for intelligible messages (i.e., large public spaces, warehouses, and factories).

When properly aimed and installed, their controlled coverage and reduced low frequency output increases the direct sound level to greater distance as compared to more broad band speakers.

Easy Selection Considerations:

- Directional sound projections
- Indoor, Outdoor or Industrial Environments
- Noise Levels higher noise areas
- Longer throw distance
- Applications mainly for paging purpose



Suggested installations

SPL Distribution Chart as per above diagram; tilt angle 45 deg

SPL (dB) vs Distance (m) - @ 1 kHz

Horizontal Distance / Point Distance	1m 1.4	2m 2.2	3m 3.2	4m 4.1	5m 5.1	6m 6.1	7m 7.1
1W (ref)	102	98	95	92	91	89	88
3W	106	99	96	94	92	90	89
5W	109	102	99	96	95	93	92
10W	112	104	102	99	98	96	95
15W	114	107	104	101	100	98	97
30W	117	110	107	104	103	101	100

Value rounded up without decimal points