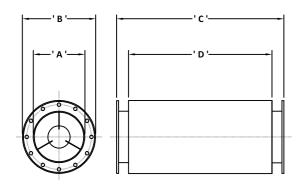


HPSC1 & HPSC1-SE Type: Central Pod-Low Pressure Drop - Air Intake Attenuator - 25dB(A) Insertion Loss

AXIAL INLET & AXIAL OUTLET VERSIONS



Silencer Part Number	'A'	'B'	'C'	'D'	Wt. (kg)
HPSC1 250 (F)	254.0	410.0	1100.0	900.0	50.0
HPSC1 300 (F)	304.8	460.0	1100.0	900.0	65.0
HPSC1 350 (F)	355.6	510.0	1100.0	900.0	75.0
HPSC1 400 (F)	406.4	560.0	1200.0	1000.0	90.0
HPSC1 450 (F)	457.2	610.0	1200.0	1000.0	108.0
HPSC1 500 (F)	508.0	660.0	1300.0	1100.0	130.0
HPSC1 550 (F)	558.8	710.0	1300.0	1100.0	140.0
HPSC1 600 (F)	609.6	760.0	1400.0	1200.0	155.0
HPSC1 650 (F)	660.4	810.0	1500.0	1300.0	170.0
HPSC1 700 (F)	711.2	860.0	1600.0	1300.0	210.0
HPSC1 750 (F)	762.0	920.0	1700.0	1400.0	225.0
HPSC1 800 (F)	812.8	960.0	1800.0	1500.0	275.0
HPSC1 850 (F)	863.6	1020.0	1900.0	1600.0	290.0
HPSC1 900 (F)	914.4	1080.0	2100.0	1700.0	320.0

'S' denotes B.S.P. Screwed versions are available as standard.

'F' denotes Flanged Versions are available in BS 10 Table 'D' drillings as standard.

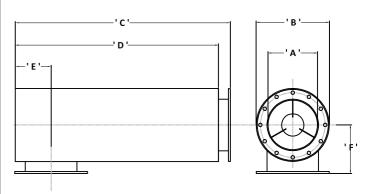
All the dimensions and weights given are approximate and may vary under manufacturing conditions.

conditions.

All dimensions and weights given are not binding and may change without prior warning.
Larger sizes are available upon request as well as bespoke design and manufacture.

All units can be installed vertically or horizontally without detriment acoustically.

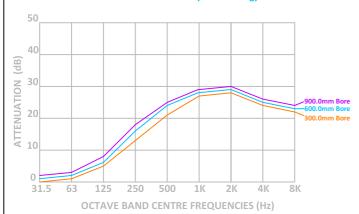
RADIAL INLET & AXIAL OUTLET VERSIONS



Silencer Part Number	'A'	'B'	'C'	'D'	'E'	'F'	Wt. (kg)
HPSC 1-SE 250 (F)	254.0	410.0	1400.0	1300.0	200.0	305.0	75.0
HPSC 1-SE 300 (F)	304.8	460.0	1450.0	1350.0	225.0	330.0	90.0
HPSC 1-SE 350 (F)	355.6	510.0	1500.0	1400.0	250.0	355.0	105.0
HPSC 1-SE 400 (F)	406.4	560.0	1650.0	1550.0	275.0	380.0	120.0
HPSC 1-SE 450 (F)	457.2	610.0	1700.0	1600.0	300.0	405.0	140.0
HPSC 1-SE 500 (F)	508.0	660.0	1850.0	1750.0	325.0	430.0	170.0
HPSC 1-SE 550 (F)	558.8	710.0	1900.0	1800.0	350.0	455.0	190.0
HPSC 1-SE 600 (F)	609.6	760.0	2050.0	1950.0	375.0	480.0	210.0
HPSC 1-SE 650 (F)	660.4	810.0	2200.0	2100.0	400.0	505.0	240.0
HPSC 1-SE 700 (F)	711.2	860.0	2250.0	2150.0	425.0	530.0	270.0
HPSC 1-SE 750 (F)	762.0	920.0	2400.0	2300.0	450.0	460.0	305.0
HPSC 1-SE 800 (F)	812.8	960.0	2350.0	2450.0	475.0	580.0	365.0
HPSC 1-SE 850 (F)	863.6	1020.0	2700.0	2600.0	500.0	610.0	380.0
HPSC 1-SE 900 (F)	914.4	1080.0	2950.0	2850.0	525.0	640.0	400.0

All units are manufactured from mild carbon steel to BS-EN 10025 S275JR or equal. The standard external protection is one coat heat resisting aluminium paint suitable for elevated temperatures. Alternative finishes including such processes as Aluminium/Zinc metal spray and galvanizing are available at extra cost, if required. Alternative materials of construction are available if required. These include stainless steel Types 321, 316, 316L, 304 304L as well as Corten A & B, Monel & Brass All units are supplied with drain points.

TYPICAL INSERTION LOSS FIGURES FOR HPSC 1 & HPSC 1-SE TYPE UNITS (Not Binding)



The HPSC 1 & HPSC 1-SE (Side-Entry) type, Air intake attenuation silencer is a simple energy converter utilizing both the flow energy in the intake duct and upstream noise from axial or centrifugal fans, turbochargers, superchargers, roots blowers or other such air moving equipment to excite individual fibres of different lengths in the acoustic infill to create friction resulting in heat energy, which is then dissipated to the passing air flow. The design also inadvertently uses the Helmholtz principle to increase the insertion loss to approximately 25 dB(A) to give a clean type silencer with a low pressure drop and good capabilities at 500 hertz and greater in the octave band spectrum.

The design has a central pod partially obscuring the line of sight which combats the flow velocity noise associated with the vast quantities of air required to feed all forms of internal combustion engines, small gas turbines, boilers, blowers of all sizes and configurations.

With additional modifications the silencer range can adapted for use inline on low pressure steam, air or gas pipelines, where noise radiation from the pipe work is evident. Under slightly different circumstances the design can used for medium to high velocity exhaust and air discharge applications in chimneys, exhaust stacks and flues. The design can be extended to longer lengths increasing the insertion loss with little or no increase in the pressure drop across the unit. This makes the concept useful for many arduous tasks and installations which other designs cannot match.

Consult PGS Engineering Staff for further details prior to order.