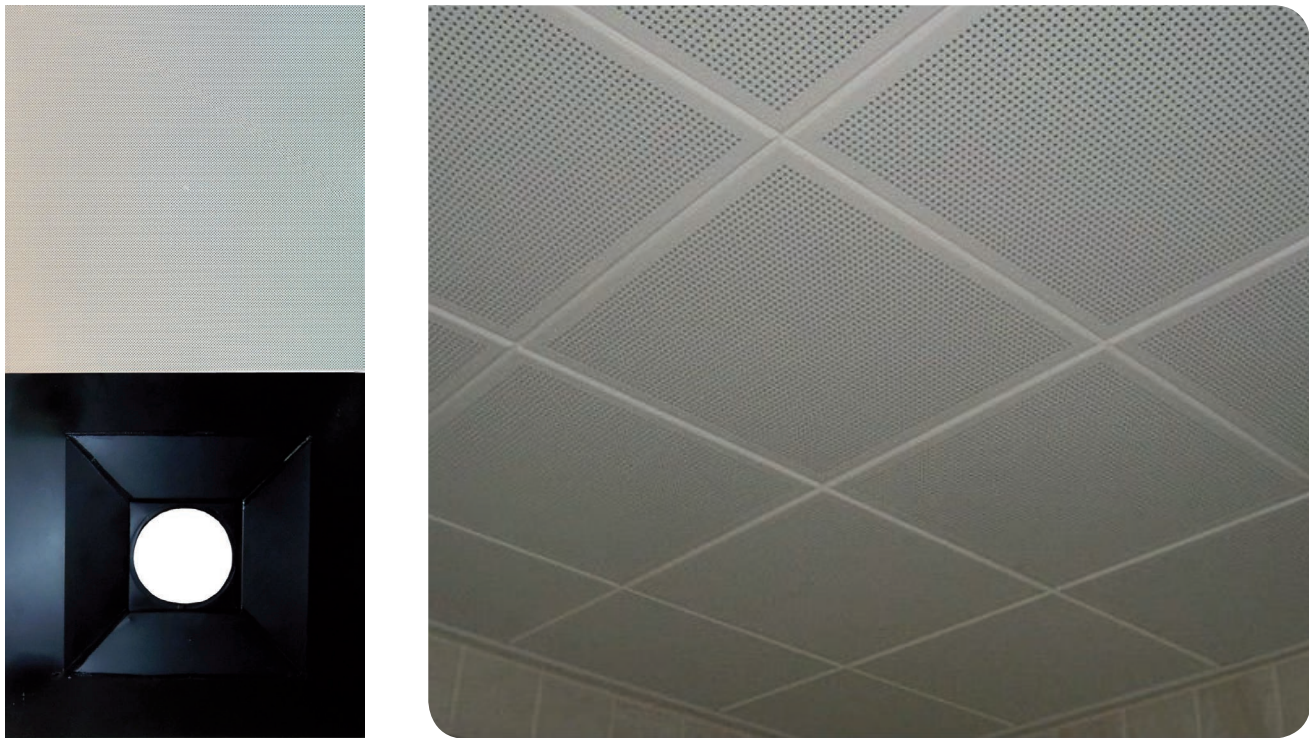


56-FR



Hidden square diffuser

Product description

KOOLAIR square diffuser, model **56-FR-Q-PR**, nominal dimensions $_x_$ mm incorporated in 595x595 mm micro-perforated tile. Incorporates a set of internal directional vanes that can be manually configured to supply air in 1,2,3 or 4 directions either during commissioning or by the end user. Option to include plenum for lateral connection and regulating damper.

Available or adaptable to micro-perforated suspended ceiling tiles with a free area between 16% and 50%, covering a large part of the range of existing standard micro-perforated ceilings on the market.

Made entirely of sheet steel. Finished ceiling tile painted in RAL colour to be defined; interior diffuser in RAL9005 (black) to prevent it from being seen and guarantee discretion.

They achieve one of the design premises most sought after by architects and designers: to completely hide the components of the air conditioning installation. The air diffusion unit is integrated above the micro-perforated ceiling tiles (inside the false ceiling), giving total aesthetic uniformity to the space.

Recommended installation height between 2.4 and 3.5 m.

Mounting

PFL-RE. Fixed plenum box without internal insulation, with manual damper accessible from false ceiling.

PFL-A-RE. Fixed plenum box with side connection internally insulated, with manual damper accessible from false ceiling.

Note: On request, top plenum available insulated/uninsulated (PFS-A-RE/PFS-RE).

Other models

56-FR-I-PR-Q. Square supply diff user incorporated on a 595x595 mm micro-perforated tile.

56-FR-I-Q. Square supply diff user ready to be integrated on a 595x595 mm micro-perforated tile.

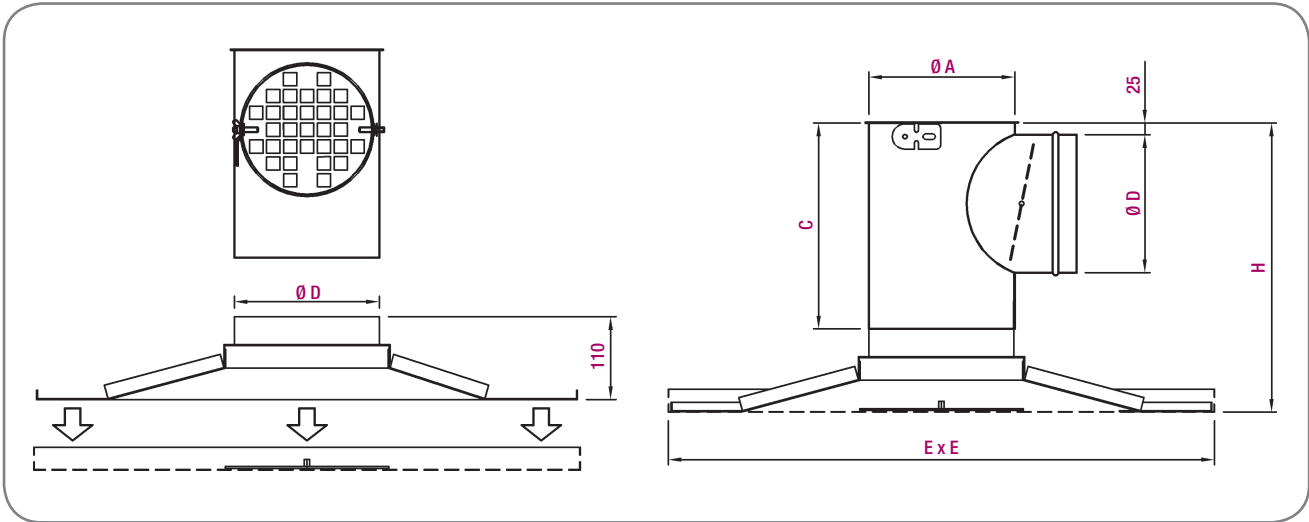
56-FR-I-PR-Placa LxH. Square supply diff user incorporated on a $_x_$ mm micro-perforated tile.

56-FR-R-PR-Q. Square return diff user incorporated on a 595x595 mm micro-perforated tile.

56-FR-R-Q. Square return diff user ready to be integrated on a 595x595 mm micro-perforated tile.

56-FR-R-PR-Placa LxH. Square return diff user incorporated on a $_x_$ mm micro-perforated tile.

General dimensions



Custom plenums available to suit reduced heights above false ceilings.

Model	A	C	Ø D	H	E x E
200	103	169	98	265	595x595
250	103	169	98	265	
315	128	194	123	220	
400	163	229	158	325	
500	203	269	198	365	
600	253	319	248	415	
625	253	319	248	415	625x625

Unit in mm

Selection table

Size	Q (m³/h)	L _{wa} [dB(A)]	ΔP _t (Pa)	X (m)
200	60	24	5	0,5
	80	32	10	0,9
	110	40	18	1,0
250	75	24	6	0,7
	100	32	11	1,1
	135	40	20	1,3
315	95	24	6	0,8
	125	32	12	1,1
	170	40	22	1,4
400	125	24	7	1,2
	170	32	12	1,3
	230	40	23	1,6
500	180	24	6	1,2
	245	32	12	1,5
	330	40	22	1,9
600 / 625	260	24	6	1,3
	350	32	11	1,7
	475	40	21	2,0

Technical data for micro-perforated tile with 50% free area.
Availability of other perforation designs. Consult the Technical Department.



LEGEND

Q (m³/h): Air flow.
L_{wa} [dB(A)]: Sound power level.
ΔP_t (Pa): Total pressure loss.
X (m): Throw for a maximum velocity of 0.25 m/s at the occupied zone
ΔT = −10 °C (cold), installed at a height of 2.8 m.