

DHVC multidirectional diffusers



MADEL®

DHVC multidirectional diffusers meet the functional and architectural requirements of modern updated locations. Its geometrical shape, whether square or rectangular, fits perfectly in the style of the surroundings.

The multidirectional diffuser offers great flexibility of use, as it can provide a diffusion of air suitable to the type of surroundings.

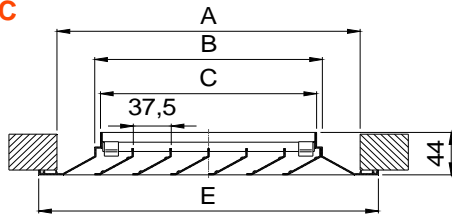
A characteristic of this sort of diffuser is its high level of induction rate.

They can be used in premises up to 4 meters high and with a temperature differential up to 12° C, obtaining good results, not only in air speed but also in sound pressure level in the comfort zone.



MAD E L[®]

DH/DV/DC



L o H	E	A	B	C
150	259	219	148	137
225	334	292	223	212
300	409	367	298	287
375	484	442	373	362
450	559	517	448	437
525	634	592	523	512
600	709	667	598	587

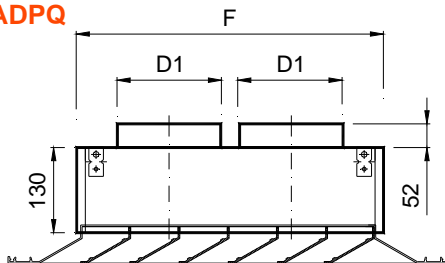
CLASSIFICATION

DH1 / DH2 One or Two - Way rectangular diffusers with blades parallel to the largest side (L size) and removable core.

DV1 / DV2 One or Two - Way rectangular diffusers with blades parallel to the shortest side (H size) and removable core.

DC1 / DC2 One or Two-Way square diffusers with removable core.

DHVC+ADPQ



L \ H	150	225	300	375	450	525	600
150	1/125						
225	1/125	1/198					
300	1/125	1/198	1/248				
375	1/125	1/198	1/248	1/315			
450	2/125	1/198	1/248	1/315	1/355		
525	2/125	2/198	2/248	1/315	1/355	1/398	
600	2/125	2/198	2/248	1/315	1/355	1/398	1/398

MATERIAL

Diffusers constructed from aluminium.

ADDITIONAL ACCESSORIES

SPQ Opposed blades volume damper from electro-zinc steel, in black colour.

CQ Mounting frame from galvanised steel.

ADPQ Plenum box with an upper connection diffuser.

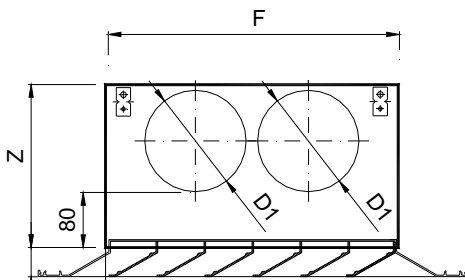
...-R Plenum box with flow damper in the spigot.

.../L Plenum box with a lateral circular connection.

.../AIS/ Plenum box thermo acoustically insulated by a foam with a coefficient of thermal conductivity of 0,04 w/mk. This foam complies with the fire reaction specifications:

- UNE 23-727 M2
- NFP 92-501 M2
- DIN 4102 M2

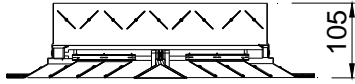
DHVC+ADPQ/L



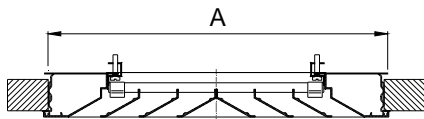
H ó L	F
150	177
225	252
300	327
375	402
450	477
525	552
600	632

L \ H	150	225	300	375	450	525	600
150	1/125						
225	1/125	1/158					
300	1/125	1/158	1/198				
375	1/125	1/158	1/198	1/248			
450	2/125	1/158	1/198	1/248	1/355		
525	2/125	2/158	2/198	1/248	1/355	1/398	
600	2/125	2/158	2/198	1/248	1/355	1/398	1/398
Z	225	260	300	350	455	500	500

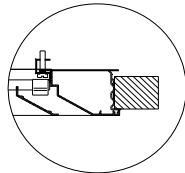
DHVC+SPQ



DHVC+CQ (O)



L ó H	A
150	233
225	308
300	383
375	458
450	533
525	608
600	683



FIXING SYSTEMS

- (D) Riveted directly to the metallic duct.
- (T) Visible screws.
- (O) Hidden screws. It requires mounting frame CQ.

FINISHES

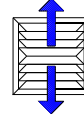
- AA Matt silver anodised.
- M9016 Painted white similar to RAL 9016.
- R9010 Painted white RAL 9010.
- RAL... Painted in other RAL colours.

SPECIFICATION TEXT

Supply and mounting of One-Way square diffuser with removable core, series **DC1 M9016 dim. LxH**. Constructed from aluminium paint in white **M9016**. Manufacturer **MADEL**.

DHVC



DC2



NECK AREA m2.

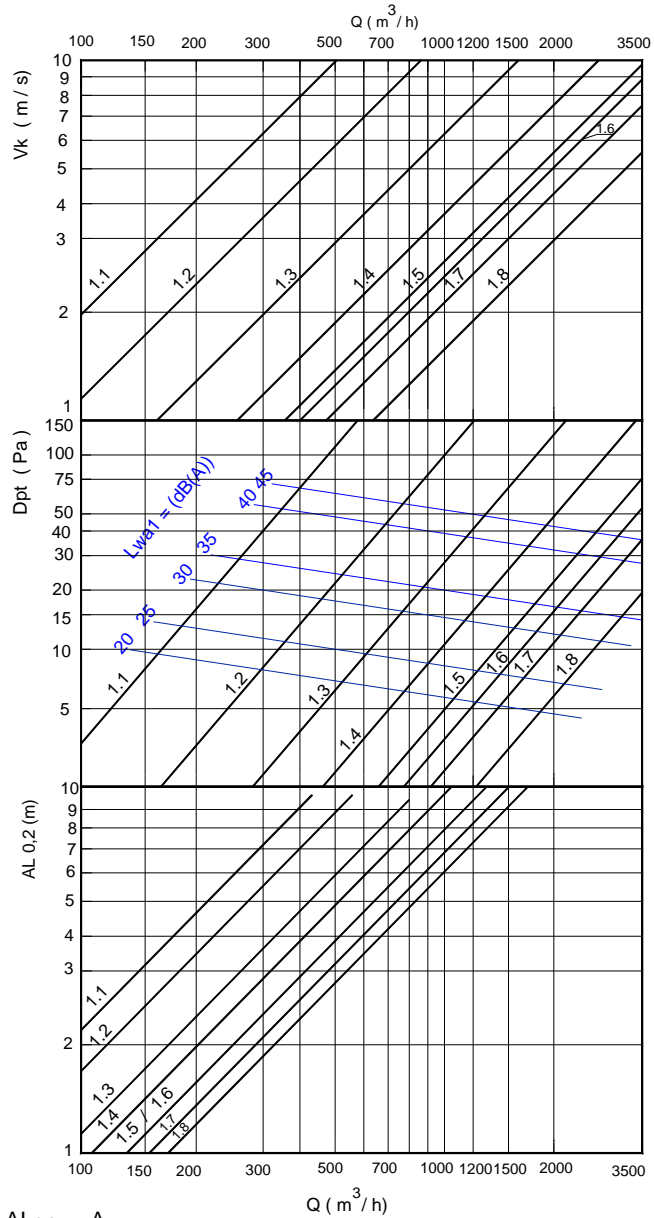
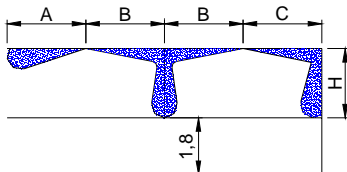
DC1	Afree m2	Qmin. m3/h	Qmax. m3/h	
1.1	150x150	.014	100	300
1.2	225x225	.023	190	600
1.3	300x300	.045	340	1010
1.4	375x375	.070	470	1600
1.5	450x450	.097	650	2010
1.6	490x490	.111	750	2300
1.7	525x525	.130	900	2750
1.8	600x600	.167	1250	3444

$$AL_{0.2 DC1} = AL_{0.2 DC2} \times Kd$$

	K d
 DC2	1
 DC1	1.25

$$Dpt1 = Kp \times Dpt$$

$$Lwa = Lwa1 + Kf$$

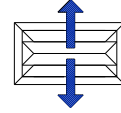


$$AL_{0.2} = A$$

$$AL_{0.2} = B + H$$

$$AL_{0.2} = C + H$$

DHVC

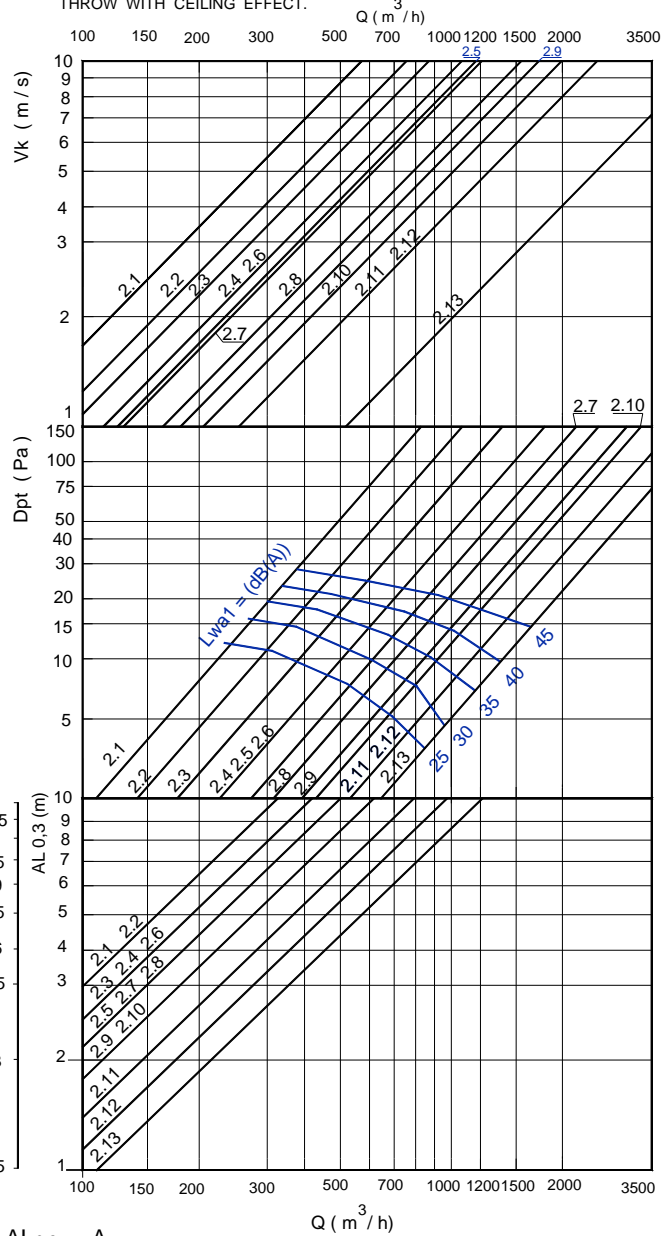


DH2

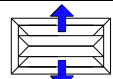
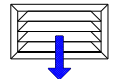
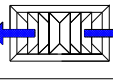
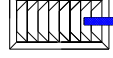
NECK VELOCITY, PRESSURE LOSS AND SOUND POWER LEVEL, THROW WITH CEILING EFFECT.

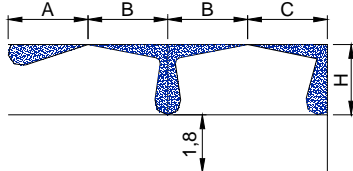
NECK AREA m².

DH2	Afree m ²	Qmin. m ³ /h	Qmax. m ³ /h
2.1	225x150	.016	145 260
2.2	300x150	.021	189 340
2.3	375x150	.025	225 405
2.4	450x150	.031	279 500
2.5	525x150	.035	315 570
2.5	600x150	.040	360 650
2.6	300x225	.031	279 500
2.7	375x225	.037	333 600
2.8	450x225	.044	396 715
2.9	525x225	.050	450 810
	600x225	.057	
	375x300	.061	
2.10	450x300	.057	515 925
2.11	525x300	.069	620 1120
	600x300	.079	
	450x375	.058	
2.12	525x375	.069	620 1120
	600x375	.077	
2.13	525x450	.113	
	600x450	.130	



$AL_{0.2 DH1} = AL_{0.2 DH2} \times K_d$

	K _d
 DH2	1
 DH1	1.25
 DV2	1.75
 DV1	2.2



$AL_{0.2} = A$
 $AL_{0.2} = B + H$
 $AL_{0.2} = C + H$