



# CLIMAVER A2 APTA

## CLIMAVER Self-Supporting Ducts

High-density, ISOVER rigid glass wool panel; the external facing is covered with *kraft* paper and glass mesh reinforced aluminium foil, which acts as a vapour barrier, and the internal facing with a black reinforced glass neto fabric with high mechanical resistance. Given its superior thermal and acoustic insulation, **CLIMAVER A2 APTA** is the ideal solution in order to meet the highest reaction to fire requirements when installing: • Networks of self-supporting air-distribution ducts in thermal installations within air-conditioning systems in buildings.

### Technical Properties

Symbol	Parameter	Icon	Units	Value	Standard
$\lambda_D$	Declared thermal conductivity as a function of temperature		W/m·K (°C)	0,032 (10) 0,033 (20) 0,036 (40) 0,039 (60)	EN 12667 EN 12939
—	Reaction to fire		Euroclass	A2-s1, d0	EN 13501-1 EN 15715
MU	Mineral wool: water-vapour diffusion resistance, $\mu$		—	1	EN 12086
Z	Facing: water vapour diffusion resistance		m <sup>2</sup> ·h·Pa/mg	> 140	EN 12086
MV	The vapour diffusion-equivalent air layer thickness, $S_d$		m	100	EN 12086
DS	Dimensional stability, $\Delta\epsilon$		%	< 1	EN 1604
—	Airtightness		Class	D	UNE-EN 13403 EN 12237
—	Pressure resistance		Pa	800	UNE-EN 13403

Working conditions: Air speed up to 18 m/s and circulating air temperature up to 90°C.

Thickness d (mm)	Weighted acoustic absorption coefficient, $A_W$ , $\alpha_{w0}$	Acoustic absorption class	Designation code
EN 823	EN ISO 354 EN ISO 11654	UNE EN ISO 11654	EN 14303
40	0,90 <sup>(1)</sup>	A	MW-EN 14303-T5-MV1

Acoustic trials with plenum: CTA 140003/REV.

<sup>(1)</sup> Weighted acoustic absorption coefficient  $A_W$ ,  $\alpha_{w0}$  without plenum 0,70 (40mm thickness) CTA 140053/REV-2 y  $\alpha_{w0}$  without plenum 0,90 (50mm thickness) CTA 140045/REV-2.

	Frequency (Hz)					
	125	250	500	1000	2000	4000
Thickness d, mm	Practical acoustic absorption coefficient, $\alpha_p$ EN ISO 354 / EN ISO 11654					
40	0,40	0,70	0,85	0,85	0,90	1,00
Section, S mm <sup>2</sup>	Acoustic attenuation, in a straight duct, $\Delta L$ (DB/m)*					
200x200	5,82	12,75	16,73	16,73	18,12	21,00
300x400	3,40	7,43	9,76	9,76	10,57	12,25
400x700	2,29	5,01	6,57	6,57	7,12	8,25

\*Estimated by the formula:  $\Delta L = 1,05 \cdot \alpha_p^{1,4} \cdot \frac{P}{S}$ , (P = perimeter)

for the sound power of a ventilator with a 20,000 m<sup>3</sup>/h flow, load loss 15 mm ca.

### Presentation



Thickness d (mm)	Length l (m)	Width b (m)	m <sup>2</sup> /package	m <sup>2</sup> /pallet	m <sup>2</sup> /truck load
40*	3,00	1,21	18,15	199,70	1.597

\*Also available in 50mm upon request.

### Advantages

- High thermal performance.
- Highest airtightness class.
- Optimal acoustic ambient quality.
- Resistant to the most aggressive cleaning methods; UNE 100012.
- Unique guiding mark lines for SDM (Straight-Duct Method) cuts.
- Easy and fast installation. Maximum on-site efficiency.
- Duct union continuity, thanks to the exclusive male/female leaning shiplaps of the panels.
- No proliferation of mould and bacteria; EN 13403.
- Sustainable product. 100% recyclable. Recycled material > 50%



### Certification



### Installation Guide

Consult the **CLIMAVER** Ducts Assembly Manual  
Additional information available at: [www.isover.es](http://www.isover.es)