

UNDERFLOOR AIR DISTRIBUTION — VARIABLE VOLUME DIFFUSER 6" 180°

Personal Displacement Diffuser | Variable Volume (VAV) | Uni-Directional

PRODUCT DESCRIPTION

The 6-inch Variable Volume Displacement Diffuser is an adjustable air terminal for use in raised-floor air systems. It features an 18 gauge (1.3 mm) galvanised steel catch pan assembly, with all interior features pre-painted flat black. The integrated air valve uses time modulation to vary total air supplied to the conditioned space. Air velocity is constant any time the valve is open; the short time duration between open/close cycles produces the effect of continuous air delivery. Rated for 24 V (18–30 VAC); one (1) PAP-1 Plug & Play Cable is included. The nominal 6" (152 mm) diameter cast aluminium grille is directionally adjustable and produces 180° uni-directional displacement air flow. Ten (10) standard grille colours are available; custom colours and finishes can be provided (specify on order).



KEY FEATURES

- DC synchronised magnetic motor
- Substantially horizontal displacement air flow
- Welded and riveted pre-painted galvanised steel construction
- Redirect air flow by rotating grille
- Manual air flow adjustment with sliding damper plate
- Multi-function circuit board for varying control strategies

TECHNICAL SPECIFICATIONS

Application	Underfloor Cooling Raised Access Floors 6" (152 mm) +
Volume Type	Variable Volume (VAV) — Time Modulation
Diffuser Opening	6" Ø (152 mm)
Full Face Diameter	6.75" Ø (171 mm)
Installation Cut-Out	6.125" Ø [+0.125 / -0.00] (156 mm [+3.175 / -0.00])
Grille Material	Cast Aluminium Conforms to NFPA 90a
Load Strength	1 250 lbs (567 kg)
Supply Pressure	0.02 – 0.1 in. w.c. (5 – 25 Pa)
Supply Temperature	40 – 140°F (4 – 60°C)
Max. Capacity	45 cfm @ 0.05 in. w.c. (77 m³/hr @ 12.5 Pa)
Min. Capacity (damper closed)	5 cfm @ 0.05 in. w.c. (8.5 m³/hr @ 12.5 Pa)
Noise Criterion	≤ NC-17 (all flow conditions)
Valve Rating	24 V (18–30 VAC)
Air Flow Pattern	180° Uni-Directional Displacement