

SPECIFICATION

General

The Multiflow square cased mixed flow fan SMB shall be from the Select range of Elta Fans Ltd. The all metal casing shall be manufactured using pre-galvanised sheet steel suitably stiffened. Casings shall incorporate Ductmate flange connections at each end. Motor supports shall be of steel sheet construction, hot dipped galvanised to BS729 after manufacture and shall have an aerodynamic profile. Each unit shall have an impeller inspection hole for rotation inspection.

Impeller Assemblies

Adjustable pitch mixed flow impellers shall be provided with the blade angles set to meet the required duty. The impeller construction shall comprise of aluminium spinnings and pressings in natural finish, together with steel hub assemblies, suitably zinc plated. Impellers are dynamically balanced to grade G6.3.

Motors

Motors are to be metric frame to IP55 with sealed for life bearings, standard industrial paint finish and Class F insulation to EN 60034-5, suitable for operating temperatures of up to +50°C. Motors are centrally located on their respected platforms and sized to meet the required duty. All motors are pre-wired to an integral weatherproof IP55 terminal enclosure in the casing wall.

Quality Management

Units are to be designed and manufactured with procedures as defined in BS EN ISO 9001:2000. EEC directives shall be met.

All SMB units are to be tested to ISO 5801:1997 (airside performance) and BS 848 Part 2:1995 (sound performance).

Model	A	B	C	D	E	Ductmate Flange	Max. Wt. kg.
SMB350	350	400	420	9	375	25	21.5
SMB400	400	450	480	9	425	25	29.5
SMB450	450	500	470	9	475	25	25.6
SMB500	500	550	500	9	525	25	29.8
SMB550	550	620	550	11	585	35	44.0
SMB650	650	720	600	11	685	35	58.0
SMB700	700	770	650	11	735	35	62.7
SMB 800	800	870	700	11	835	35	78.9
SMB1000	1000	1070	800	11	1035	35	118.2

ACCESSORIES

- ◆ Speed Controllers
- ◆ Mounting Brackets
- ◆ Anti-Vibration Mounts
- ◆ Flexible Connectors
- ◆ Silencers

SQUARE CASED MIXED FLOW FANS - SMB

multiflow



SINGLE PHASE - FIXED OR VARIABLE SPEED 220V-240V / 1PH / 50HZ

Product Code	Speed rpm	Airflow m³/sec @ Static Pressure Pa.										Motor Electrical Data			A.V. Mounts	Speed Controllers		Sound Level dBA @ 3m	Silencer Data	
		0	50	100	150	200	250	300	400	500	600	FL Amps	SC Amps	Output kW		Elec-tronic	Trans-former		dBA Attenuation	ΔP (Pa)
SMB350/4-5-2	1300	0.34	0.28	0.14								1.09	2.30	0.12	S1G	EL13	TC12	43	-18	5
SMB350/2-4-2	2750	0.66	0.63	0.60	0.58	0.54	0.50	0.46	0.36	0.21	0.08	2.55	7.00	0.37	S1G	EL13	TC14	60	-21	8
SMB400/4-5-2	1300	0.72	0.64	0.53	0.39	0.12						1.51	3.69	0.18	S1G	EL13	TC12	50	-18	6
SMB400/2-3-2	2750	1.20	1.16	1.14	1.10	1.07	1.03	1.00	0.90	0.78	0.66	6.15	22.7	1.0	S1G	-----	TC112	68	-23	22
SMB450/4-5-2	1350	1.18	1.09	0.97	0.80	0.57	0.29	0.10				2.56	5.93	0.37	S1G	EL13	TC14	54	-19	9
SMB500/4-4-2	1350	1.60	1.48	1.36	1.24	1.08	0.88	0.60	0.05			3.70	11.9	0.55	S1G	EL16	TC18	58	-22	10
SMB550/4-4-2	1350	2.43	2.30	2.15	1.95	1.76	1.53	1.25	0.38			6.28	16.4	1.0	S2B	-----	TC110	62	-20	18
SMB650/4-4-2	1350	2.93	2.81	2.72	2.60	2.46	2.30	2.11	1.60	0.70	0.05	10.1	25.9	1.5	S2B	-----	TC112	68	-20	14

THREE PHASE - FIXED SPEED 380V-415V / 3PH / 50HZ †

Product Code	Speed rpm	Airflow m³/sec @ Static Pressure Pa.										Motor Electrical Data			A.V. Mounts	Speed Controllers			Sound Level dBA @ 3m	Silencer Data	
		0	50	100	150	200	250	300	400	500	600	FL Amps	SC Amps	Output kW		Inverter		Trans-former		dBA Attenuation	ΔP (Pa)
																1Ph-3Ph†	3Ph-3Ph				
SMB500/6-5-3	910	1.16	1.02	0.75	0.28							0.75	2.30	0.18	S1G	08E/18	28E/75	TC33	50	-23	7
SMB500/4-5-3	1410	1.82	1.73	1.60	1.46	1.32	1.14	0.87				2.00	11.4	0.75	S1G	08E/75	28E/75	TC33	58	-22	19
SMB550/6-5-3	920	1.63	1.49	1.27	0.88	0.13						1.27	4.70	0.37	S2B	08E/37	28E/75	TC33	55	-18	9
SMB550/4-5-3	1410	2.51	2.43	2.33	2.20	2.03	1.83	1.60	0.84			2.90	15.4	1.1	S2B	28/150-1	28E/150	TC33	62	-20	24
SMB650/6-5-3	920	2.20	2.05	1.84	1.52	1.02	0.36					1.77	6.60	0.55	S2B	08E/75	28E/75	TC33	58	-19	9
SMB650/4-4-3	1420	3.09	2.97	2.84	2.72	2.59	2.46	2.29	1.85	1.24	0.38	3.70	20.4	1.5	S2B	28/150-1	28E/150	-----	67	-20	16
SMB700/6-4-3	920	2.84	2.65	2.38	2.10	1.73	1.26	0.65				2.12	8.70	0.75	S2B	08E/75	28E/75	TC35	59	-18	10
SMB700/4-5-3	1415	4.65	4.51	4.40	4.27	4.10	3.92	3.73	3.34	2.76	1.98	6.78	47.5	3.0	S2B	-----	28E/300	-----	68	-20	32
SMB800/8-5-3	700	3.52	3.26	2.92	2.42	1.42	0.33					2.33	10.7	0.75	S2B	08E/75	28E/150	-----	58	-20	5
SMB800/6-4-3	940	4.35	4.17	3.98	3.75	3.47	3.13	2.64	0.87			4.30	22.3	1.5	S2B	28/220-1	28E/220	-----	64	-22	11
SMB1000/8-4-3	710	6.83	6.53	6.2	5.81	5.35	4.78	3.98	0.93			5.31	32.9	2.2	S2G	-----	28E/300	-----	61	-16	17
SMB1000/6-3-3	940	7.88	7.68	7.46	7.24	6.99	6.73	6.43	5.74	4.78	3.21	8.95	47.5	4.0	S2G	-----	28E/400	-----	67	-18	25

All 3Ph electrical data stated at 400V. Starting currents are quoted as direct-on-line.

† Models shown as speed controllable using a 240V/1Ph input - 240V/3Ph output inverter.

All models with motor power up to 3kW may also be operated at 220V-240V/3Ph/50Hz.

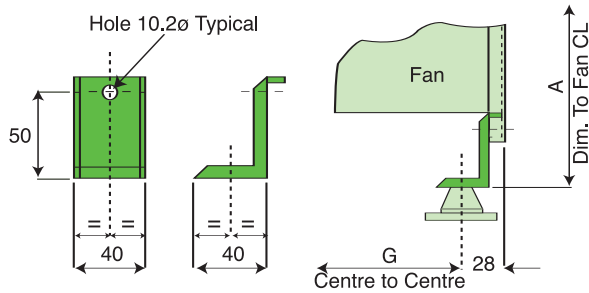
Sound levels are average spherical free field values (for comparative use only). Value at 50% peak pressure.

Inverters are fully enclosed in an IP55 enclosure c/w with control knob and RFI filters.

26 Performance & Electrical Data

Products detailed within this data sheet represent the stocked range of Elta Square Cased Mixed Flow fans. Many more options, selections and sizes are available on a made to order basis.

MOUNTING BRACKETS



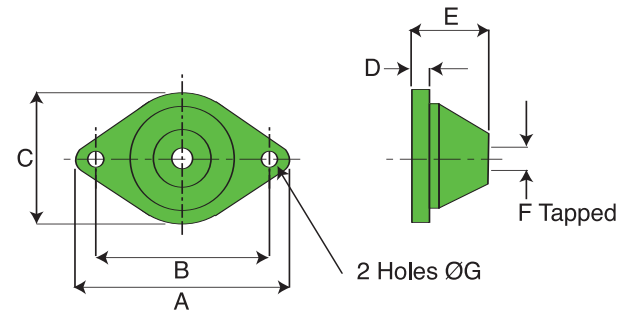
Fan Size	A	G
350	238	364
400	263	424
450	288	414
500	313	444
550	343	494
650	393	544
700	418	594
800	468	644
1000	568	744

For free standing support or for use with anti-vibration mounts. Mount directly to flange. Supplied in sets of 4, less fixings

Material & finish
Folded galvanised sheet.

Note: For product codes please refer to price list

ANTI-VIBRATION MOUNTS

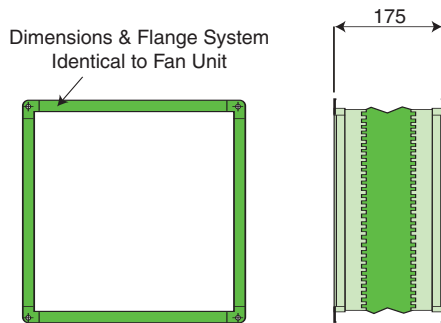


Fan Dia	Type	A	B	C	D	E	F	G
350	S1G	64	50	43	5.5	20	M6	7
400								
450								
500								
550	S2B	80	57	45	5.0	32	M8	12_9
650								
700								
800	S2B							
1000	S2G							

Fits directly to bracket to help minimise noise and vibration. Supplied in sets of 4, complete with fixings to mounting brackets.

Material & finish
Rubber with steel insert.

FLEXIBLE CONNECTORS



Fan Size	Wt. kg.
350	2.3
400	2.6
450	2.9
500	3.2
550	4.6
650	5.4
700	5.8
800	6.6
1000	8.1

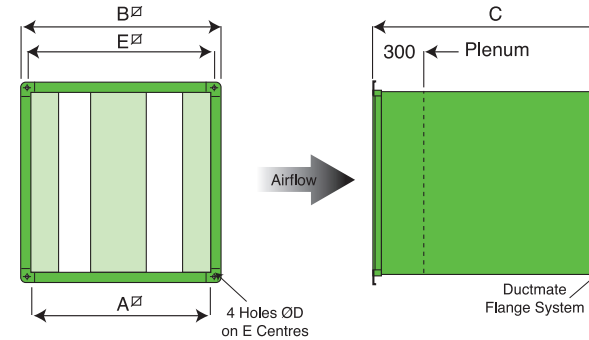
The assembly provides flexible interconnection with any matched ducting. Supplied as an assembly less fixings.

Material & finish

Dark grey, elastomer coated, fibreglass material.
Galvanised sheet steel flanges.

Note: For product codes please refer to price list

SILENCERS



Type	A	B	C	D	E	Ductmate Flange Size	Wt. kg.
350	350	400	1200	9	375	25	24.0
400	400	450	1200	9	425	25	31.0
450	450	500	1200	9	475	25	38.0
500	500	550	1200	9	525	25	42.0
550	550	620	1200	11	585	35	49.0
650	650	720	1500	11	685	35	74.0
700	700	770	1500	11	735	35	81.0
800	800	870	1800	11	835	35	117.0
1000	1000	1070	1800	11	1035	35	164.0

Baffle type silencers have been developed for use with SMB fan units to give good attenuation whilst minimising the resultant airside pressure loss.

Material & finish

Galvanised sheet steel casing and perforated steel baffles. Mineral wool in-fill to all baffles.