

HOW TO ORDER

MDG 255 -12 H AI 400/50 2S FCP DS P

TYPE

MODEL

MOTOR POLES (6, 8, 12 or 16)

ORIENTATION

H=Horizontal

V=Vertical

COIL MATERIAL

AI = Copper tubes/Aluminium fins

AV = Copper tubes/Vinyl coated Aluminium fins

Cu = Copper tubes/Copper fins

ET = Copper tubes/Copper fins

ELECTRICAL SUPPLY (V/Hz)

400/50

400/60

220/50

220/60

COIL CIRCUITING

2S = 2 Section

SC = Sub Cooling

CONTROLS

FCB Fan Contactor Box

FCT Intelligent Fan Control (Temperature Sensing)

FCP Intelligent Fan Control (Pressure Setting)

FS Fan Speed Control (3ph) (Triac or Inverter)

WIRING

D = Delta

S = Star

DS = Dual Speed

PACKING

SELECTION DATA

12 POLE

△460 rpm

Model Modèle Modell	Capacity / Puissance / Leistung 15K DT1 *					Coil Details / Batterie / Kühlerblock							Motor / Moteur / Motor **				
	R134a	R404A/R507A	R407A	R407C	Air Volume Débit d'air Luftstrom	Surface Area Surface Kühlfläche	Number of circuits Nombre de Anzahl der Kreisläufe	Fin Spacing Ecartement Ailettes Lamellenabstand	Inlet Entrée Eintritt	Outlet Sortie Austritt	Internal Volume Volume interne Rohrinhalt	R404A Charge R404ACharge R404AFüllung	Number of Nombre de Anzahl der Kreisläufe	Nominal Speed Vitesse Nominale Nenn Drehzahl	Power Input Puissance Absorbée Leistungsaufnahme	FILC Intensité Betriebsstrom	SC Intensité de démarrage Anlaufstrom
MDG	kW	kW	kW	kW	m³/s	m²	mm	Ø	Ø	dm³	kg		rpm /mm UpM	kW	A	A	
10-12D	32.5	34.9	29.0	30.4	3.25	64.6	6	2.12	2 1/8"	1 1/8"	11.1	5.2	1	460	0.80	2.4	4.2
20-12D	37.5	40.3	33.4	35.1	3.20	81.8	9	2.54	2 1/8"	1 1/8"	16.6	7.3	1	460	0.80	2.4	4.2
30-12D	41.2	44.3	36.8	38.5	3.05	109.0	6	2.54	2 1/8"	1 1/8"	22.2	9.4	1	460	0.80	2.4	4.2
40-12D	65.0	69.8	58.0	60.8	6.50	129.3	12	2.12	2 1/8"	1 1/8"	27.8	9.0	2	460	0.80	2.4	4.2
50-12D	75.0	80.6	66.8	70.2	6.40	163.6	18	2.54	2 1/8"	1 1/8"	40.1	13.0	2	460	0.80	2.4	4.2
60-12D	82.4	88.6	73.6	77.0	6.10	218.1	18	2.54	2 1/8"	1 1/8"	52.4	17.0	2	460	0.80	2.4	4.2
70-12D	97.5	104.7	87.0	91.2	9.75	193.9	18	2.12	2 1/8"	1 3/8"	39.8	12.9	3	460	0.80	2.4	4.2
80-12D	112.5	120.9	100.2	105.3	9.60	245.3	18	2.54	2 1/8"	1 3/8"	58.0	18.8	3	460	0.80	2.4	4.2
90-12D	123.6	132.9	110.2	115.5	9.15	327.1	24	2.54	2 1/8"	1 3/8"	76.1	24.7	3	460	0.80	2.4	4.2
100-12D	130.0	139.6	116.0	121.6	13.00	258.5	18	2.12	2 5/8"	1 5/8"	53.3	17.5	4	460	0.80	2.4	4.2
105-12D	130.0	139.6	116.0	121.6	13.00	258.5	24	2.12	2 x 2 1/8"	2 x 1 1/8"	55.6	180.0	2 x 2	460	0.80	2.4	4.2
110-12D	150.0	161.2	133.6	140.4	12.80	327.1	27	2.54	2 5/8"	1 5/8"	77.3	25.0	4	460	0.80	2.4	4.2
115-12D	150.0	161.2	133.6	140.4	12.80	327.1	36	2.54	2 x 2 1/8"	2 x 1 1/8"	80.2	26.0	2 x 2	460	0.80	2.4	4.2
120-12D	164.8	177.2	147.2	154.0	12.20	436.2	35	2.54	2 5/8"	1 5/8"	101.0	32.9	4	460	0.80	2.4	4.2
125-12D	164.8	177.2	147.2	154.0	12.20	436.2	36	2.54	2 x 2 1/8"	2 x 1 1/8"	105.0	34.0	2 x 2	460	0.80	2.4	4.2
130-12D	162.5	174.5	145.0	152.0	16.25	323.2	36	2.12	2 5/8"	1 5/8"	65.0	21.0	5	460	0.80	2.4	4.2
140-12D	187.5	201.5	167.0	175.5	16.00	408.9	27	2.54	2 5/8"	1 5/8"	94.8	30.8	5	460	0.80	2.4	4.2
150-12D	206.0	221.5	184.0	192.5	15.25	545.2	35	2.54	2 5/8"	1 5/8"	125.0	40.5	5	460	0.80	2.4	4.2
165-12D	195.0	209.4	174.0	182.4	19.50	387.8	36	2.12	2 x 2 1/8"	2 x 1 3/8"	79.7	25.9	2 x 3	460	0.80	2.4	4.2
175-12D	225.0	241.8	200.4	210.6	19.20	490.7	36	2.54	2 x 2 1/8"	2 x 1 3/8"	116.0	37.6	2 x 3	460	0.80	2.4	4.2
185-12D	247.2	265.8	220.8	231.0	18.30	654.2	48	2.54	2 x 2 1/8"	2 x 1 3/8"	152.0	49.4	2 x 3	460	0.80	2.4	4.2
195-12D	260.0	279.2	232.0	243.2	26.00	517.0	36	2.12	2 x 2 5/8"	2 x 1 5/8"	107.0	34.6	2 x 4	460	0.80	2.4	4.2
205-12D	300.0	322.4	267.2	280.8	25.60	654.2	54	2.54	2 x 2 5/8"	2 x 1 5/8"	155.0	50.1	2 x 4	460	0.80	2.4	4.2
215-12D	329.6	354.4	294.4	308.0	24.40	872.3	70	2.54	2 x 2 5/8"	2 x 1 5/8"	203.0	65.8	2 x 4	460	0.80	2.4	4.2
225-12D	325.0	349.0	290.0	304.0	32.50	646.3	72	2.12	2 x 2 5/8"	2 x 1 5/8"	130.0	42.1	2 x 5	460	0.80	2.4	4.2
235-12D	375.0	403.0	334.0	351.0	32.00	817.8	54	2.54	2 x 2 5/8"	2 x 1 5/8"	190.0	61.6	2 x 5	460	0.80	2.4	4.2
245-12D	412.0	443.0	368.0	385.0	30.50	1090.4	70	2.54	2 x 2 5/8"	2 x 2 1/8"	249.0	80.9	2 x 5	460	0.80	2.4	4.2
255-12D	390.0	418.8	348.0	364.8	39.00	775.6	72	2.12	2 x 2 5/8"	2 x 2 1/8"	153.0	49.8	2 x 6	460	0.80	2.4	4.2
265-12D	450.0	483.6	400.8	421.2	38.40	981.4	108	2.54	2 x 2 5/8"	2 x 2 1/8"	225.0	72.9	2 x 6	460	0.80	2.4	4.2
275-12D	494.4	531.6	441.6	462.0	36.60	1308.5	70	2.54	2 x 2 5/8"	2 x 2 1/8"	296.0	96.2	2 x 6	460	0.80	2.4	4.2

△335 rpm

Model Modèle Modell	Capacity / Puissance / Leistung 15K DT1 *					Coil Details / Batterie / Kühlerblock							Motor / Moteur / Motor **				
	R134a	R404A/R507A	R407A	R407C	Air Volume Débit d'air Luftstrom	Surface Area Surface Kühlfläche	Number of circuits Nombre de Anzahl der Kreisläufe	Fin Spacing Ecartement Ailettes Lamellenabstand	Inlet Entrée Eintritt	Outlet Sortie Austritt	Internal Volume Volume interne Rohrinhalt	R404A Charge R404ACharge R404AFüllung	Number of Nombre de Anzahl der Kreisläufe	Nominal Speed Vitesse Nominale Nenn Drehzahl	Power Input Puissance Absorbée Leistungsaufnahme	FILC Intensité Betriebsstrom	SC Intensité de démarrage Anlaufstrom
MDG	kW	kW	kW	kW	m³/s	m²	mm	Ø	Ø	dm³	kg		rpm /mm UpM	kW	A	A	
10-12S	26.0	28.0	23.2	24.4	2.50	64.6	6	2.12	2 1/8"	1 1/8"	11.1	5.2	1	335	0.47	1.2	1.4
20-12S	29.4	31.6	26.2	27.5	2.40	81.8	9	2.54	2 1/8"	1 1/8"	16.6	7.3	1	335	0.47	1.2	1.4
30-12S	30.9	33.2	27.6	28.9	2.25	109.0	6	2.54	2 1/8"	1 1/8"	22.2	9.4	1	335	0.47	1.2	1.4
40-12S	52.0	56.0	46.4	48.8	5.00	129.3	12	2.12	2 1/8"	1 1/8"	27.8	9.0	2	335	0.47	1.2	1.4
50-12S	58.8	63.2	52.4	55.0	4.80	163.6	18	2.54	2 1/8"	1 1/8"	40.1	13.0	2	335	0.47	1.2	1.4
60-12S	61.8	66.4	55.2	57.8	4.50	218.1	18	2.54	2 1/8"	1 1/8"	52.4	17.0	2	335	0.47	1.2	1.4
70-12S	78.0	84.0	69.6	73.2	7.50	193.9	18	2.12	2 1/8"	1 3/8"	39.8	12.9	3	335	0.47	1.2	1.4
80-12S	88.2	94.8	78.6	82.5	7.20	245.3	18	2.54	2 1/8"	1 3/8"	58.0	18.8	3	335	0.47	1.2	1.4
90-12S	92.7	99.6	82.8	86.7	6.75	327.1	24	2.54	2 1/8"	1 3/8"	76.1	24.7	3	335	0.47	1.2	1.4
100-12S	104.0	112.0	92.8	97.6	10.00	258.5	18	2.12	2 5/8"	1 5/8"	53.3	17.5	4	335	0.47	1.2	1.4
105-12S	104.0	112.0	92.8	97.6	10.00	258.5	24	2.12	2 x 2 1/8"	2 x 1 1/8"	55.6	180.0	2 x 2	335	0.47	1.2	1.4
110-12S	117.6	126.4	104.8	110.0	9.60	327.1	27	2.54	2 5/8"	1 5/8"	77.3	25.0	4	335	0.47	1.2	1.4
115-12S	117.6	126.4	104.8	110.0	9.60	327.1	36	2.54	2 x 2 1/8"	2 x 1 1/8"	80.2	26.0	2 x 2	335	0.47	1.2	1.4
120-12S	123.6	132.8	110.4	115.6	9.00	436.2	35	2.54	2 5/8"	1 5/8"	101.0	32.9	4	335	0.47	1.2	1.4
125-12S	123.6	132.8	110.4	115.6	9.00	436.2	36	2.54	2 x 2 1/8"	2 x 1 1/8"	105.0	34.0	2 x 2	335	0.47	1.2	1.4
130-12S	130.0	140.0	116.0	122.0	12.50	323.2	36	2.12	2 5/8"	1 5/8"	65.0	21.0	5	335	0.47	1.2	1.4
140-12S	147.0	158.0	131.0	137.5	12.00	408.9	27	2.54	2 5/8"	1 5/8"	94.8	30.8	5	335	0.47	1.2	1.4
150-12S	154.5	166.0	138.0	144.5	11.25	545.2	35	2.54	2 5/8"	1 5/8"	125.0	40.5	5	335	0.47	1.2	1.4
165-12S	156.0	168.0	139.2	146.4	15.00	387.8	36	2.12	2 x 2 1/8"	2 x 1 3/8"	79.7	25.9	2 x 3	335	0.47	1.2	1.4
175-12S	176.4	189.6	157.2	165.0	14.40	490.7	36	2.54	2 x 2 1/8"	2 x 1 3/8"	116.0	37.6	2 x 3	335	0.47	1.2	1.4
185-12S	185.4	199.2	165.6	173.4	13.50	654.2	48	2.54	2 x 2 1/8"	2 x 1 3/8"	152.0	49.4	2 x 3	335	0.47	1.2	1.4
195-12S	208.0	224.0	185.6	195.2	20.00	517.0	36	2.12	2 x 2 5/8"	2 x 1 5/8"	107.0	34.6	2 x 4	335	0.47	1.2	1.4
205-12S	235.2	252.8	209.6	220.0	19.20	654.2	54	2.54	2 x 2 5/8"	2 x 1 5/8"	155.0	50.1	2 x 4	335	0.47	1.2	1.4
215-12S	247.2	265.6	220.8	231.2	18.00	872.3	70	2.54	2 x 2 5/8"	2 x 1 5/8"	203.0	65.8	2 x 4	335	0.47	1.2	1.4
225-12S	260.0	280.0	232.0	244.0	25.00	646.3	72	2.12	2 x 2 5/8"	2 x 1 5/8"	130.0	42.1	2 x 5	335	0.47	1.2	1.4
235-12S	294.0	316.0	262.0	275.0	24.00	817.8	54	2.54	2 x 2 5/8"	2 x 1 5/8"	190.0	61.6	2 x 5	335	0.47	1.2	1.4
245-12S	309.0	332.0	275.0	289.0	22.50	1090.4	70	2.54	2 x 2 5/8"	2 x 2 1/8"	249.0	80.9	2 x 5	335	0.47	1.2	1.4
255-12S	312.0	336.0	278.4	292.8	30.00	775.6	72	2.12	2 x 2 5/8"	2 x 2 1/8"	153.0	49.8	2 x 6	335	0.47	1.2	1.4
265-12S	352.8	379.2	314.4	330.0	28.80	981.4	108	2.54	2 x 2 5/8"	2 x 2 1/8"	225.0	72.9	2 x 6	335	0.47	1.2	1.4
275-12S	370.8	398.4	330.8	346.8	27.00	1308.5	70	2.54	2 x 2 5/8"	2 x 2 1/8"	296.0	96.2	2 x 6	335	0.47	1.2	1.4

Correction Factors

(Multiply the above capacity by the following factors depending on the DT1 temperature difference)

	DT1					
	8K	10K	12K	15K	17K	20K
R507, R134A, R404A	0.53	0.67	0.80	1.00	1.13	1.33
R4007A, R407C	0.46	0.62	0.77	1.00	1.15	1.38

NOISE DATA

12 POLE

△ 460 rpm

Model Modèle Modell	Sound Power Level Niveau de Puissance Sonore Schalleistungspegel	Sound Pressure Level (dB(A), NC & NR @ 10m) Niveau de Pression Sonore (dB(A), NC & NR @ 10m) Schalldruckpegel (dB(A), NC & NR @ 10m)											5 m			20 m			40 m			60 m			
		Octave Band Frequency (Hz) Bande de Fréquence (Hz) Oktavband Frequenz (Hz)								10 m															
		MDG	dB(A)	63	125	250	500	1K	2K	4K	8K	dB(A)	NC	NR	dB(A)	NC	NR	dB(A)	NC	NR	dB(A)	NC	NR		
	10-12D	75	41	42	40	37	36	31	25	14	40	36	37	45	41	42	34	30	31	28	23	25	20	22	
	20-12D	78	44	45	43	40	39	34	28	17	43	39	40	48	44	45	37	33	34	26	28	28	23	25	
	30-12D																								
	40-12D																								
	50-12D	80	45	47	44	41	41	35	30	19	45	40	41	50	46	47	39	35	36	33	28	30	29	24	26
	60-12D																								
	70-12D																								
	80-12D	81	47	48	46	43	42	37	31	20	46	42	43	51	47	48	40	36	37	34	30	31	31	26	28
	90-12D																								
	100-12D																								
	110-12D	81	47	48	46	43	42	37	31	20	46	42	43	51	47	48	40	36	37	34	30	31	31	26	28
	120-12D																								
	105-12D																								
	115-12D	82	48	49	47	44	43	38	32	21	47	43	44	52	48	49	41	37	38	35	31	32	32	27	29
	125-12D																								
	130-12D																								
	140-12D	82	48	50	47	44	43	38	33	21	47	43	44	52	48	49	42	37	38	36	32	33	32	28	29
	150-12D																								
	165-12D																								
	175-12D	83	49	51	48	45	44	39	34	22	48	44	45	53	49	50	43	39	40	37	33	34	34	29	31
	185-12D																								
	195-12D																								
	205-12D	84	50	52	49	46	45	40	35	23	49	45	46	54	50	51	44	40	41	38	34	35	35	30	31
	215-12D																								
	225-12D																								
	235-12D	85	51	53	50	47	46	41	36	24	50	46	47	55	51	52	45	40	41	39	35	36	35	31	32
	245-12D																								
	255-12D																								
	265-12D																								
	275-12D																								

∩ 335 rpm

Model Modèle Modell	Sound Power Level Niveau de Puissance Sonore Schalleistungspegel	Sound Pressure Level (dB(A), NC & NR @ 10m) Niveau de Pression Sonore (dB(A), NC & NR @ 10m) Schalldruckpegel (dB(A), NC & NR @ 10m)											5 m			20 m			40 m			60 m			
		Octave Band Frequency (Hz) Bande de Fréquence (Hz) Oktavband Frequenz (Hz)								10 m															
		MDG	dB(A)	63	125	250	500	1K	2K	4K	8K	dB(A)	NC	NR	dB(A)	NC	NR	dB(A)	NC	NR	dB(A)	NC	NR		
	10-12S	65	31	33	30	26	26	21	15	4	30	25	27	35	31	32	24	19	21	18	13	15	9	12	
	20-12S	68	34	36	33	29	29	24	18	7	33	28	30	38	34	35	27	22	24	21	16	18	13	15	
	30-12S																								
	40-12S																								
	50-12S	70	35	37	35	31	31	25	20	9	35	30	31	40	36	37	29	24	26	23	18	20	19	14	16
	60-12S																								
	70-12S																								
	80-12S	71	36	39	36	32	32	27	21	10	36	32	33	41	37	38	30	25	27	24	19	21	21	16	18
	90-12S																								
	100-12S																								
	110-12S	71	36	39	36	32	32	27	21	10	36	32	33	41	37	38	30	25	27	24	19	21	21	16	18
	120-12S																								
	105-12S																								
	115-12S	72	37	40	37	33	33	28	22	11	37	33	34	42	38	39	31	26	28	25	20	22	22	17	19
	125-12S																								
	130-12S																								
	140-12S	72	38	40	37	34	33	28	22	11	37	33	34	42	38	39	32	27	28	26	21	23	22	17	19
	150-12S																								
	165-12S																								
	175-12S	73	39	41	38	35	34	29	23	13	38	34	35	43	39	40	33	28	30	27	22	24	24	19	21
	185-12S																								
	195-12S																								
	205-12S	74	40	42	39	36	35	30	24	14	39	35	36	44	40	41	34	29	31	28	23	25	25	19	21
	215-12S																								
	225-12S																								
	235-12S	75	41	43	40	36	36	31	25	14	40	36	37	45	41	42	35	30	31	29	24	26	25	20	22
	245-12S																								
	255-12S																								
	265-12S																								
	275-12S																								

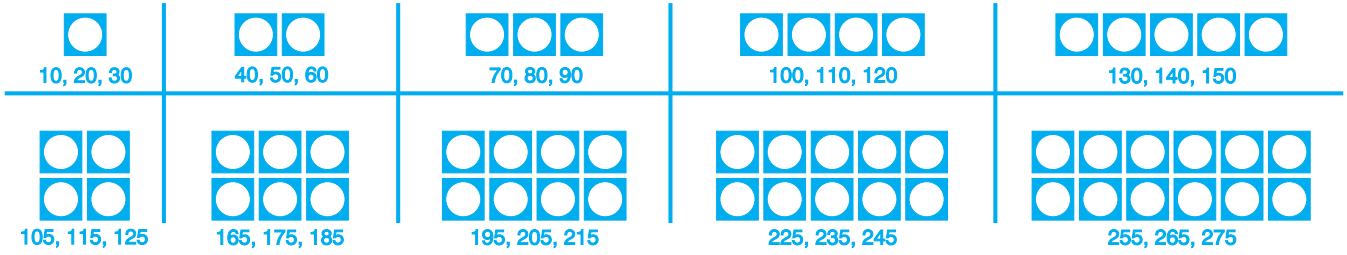
12 POLE ∆/∩
30-50 dB(A) 10m

Notes * Dew Point
** Motors

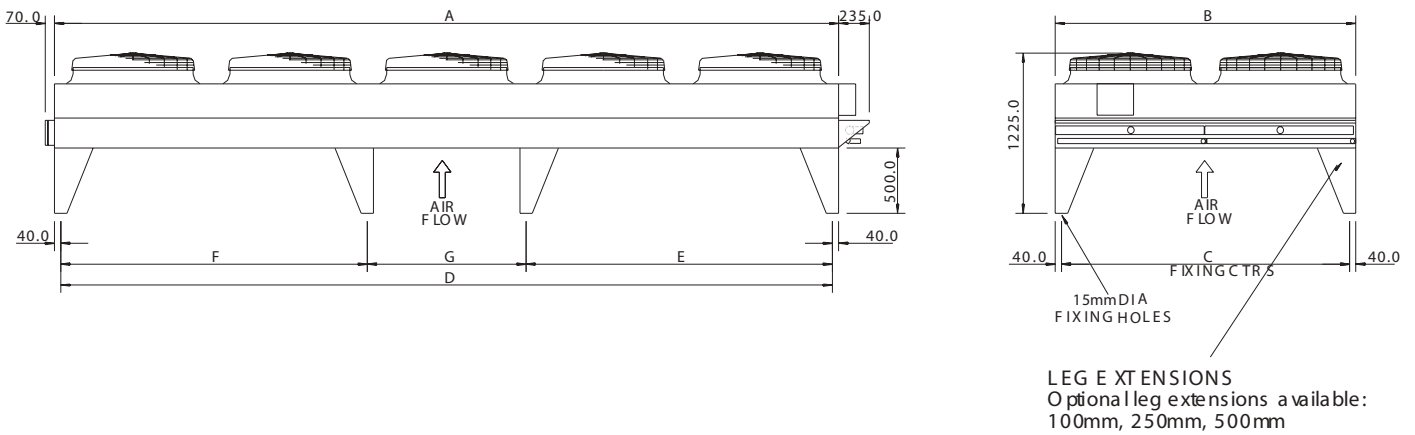
The capacities shown in this document are rated at dew point.
Figures in the tables are for 400V/3Ph/50Hz operation and are per motor

DIMENSIONS

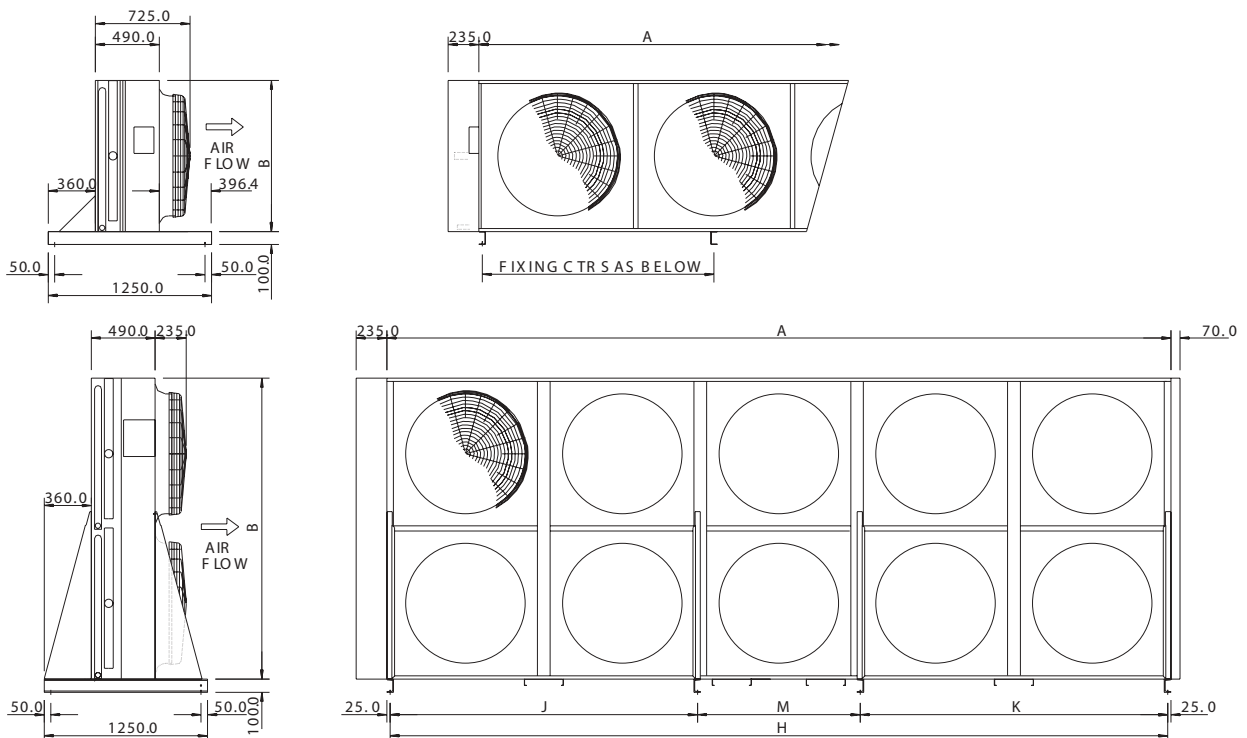
MDG Layout



Horizontal Units



Vertical Units



DIMENSIONS

MDG	All dimensions in mm										
	A	B	C	D	E	F	G	H	J	K	M
10	1203	1158	1078	1123	-	-	-	1153	-	-	-
20	1203	1158	1078	1123	-	-	-	1153	-	-	-
30	1203	1158	1078	1123	-	-	-	1153	-	-	-
40	2403	1158	1078	2323	-	-	-	2353	-	-	-
50	2403	1158	1078	2323	-	-	-	2353	-	-	-
60	2403	1158	1078	2323	-	-	-	2353	-	-	-
70	3603	1158	1078	3523	-	-	-	3553	-	-	-
80	3603	1158	1078	3523	-	-	-	3553	-	-	-
90	3603	1158	1078	3523	-	-	-	3553	-	-	-
100	4803	1158	1078	4723	2361	2361	-	4753	2353	2400	-
105	2403	2301	2221	2323	-	-	-	2353	-	-	-
110	4803	1158	1078	4723	2361	2361	-	4753	2353	2400	-
115	2403	2301	2221	2323	-	-	-	2353	-	-	-
120	4803	1158	1078	4723	2361	2361	-	4753	2353	2400	-
125	2403	2301	2221	2323	-	-	-	2353	-	-	-
130	6003	1158	1078	5923	2361	2361	1200	5953	2353	2353	1247
140	6003	1158	1078	5923	2361	2361	1200	5953	2353	2353	1247
150	6003	1158	1078	5923	2361	2361	1200	5953	2353	2353	1247
165	3603	2301	2221	3523	-	-	-	3553	1751.5	-	-
175	3603	2301	2221	3523	-	-	-	3553	1751.5	-	-
185	3603	2301	2221	3523	-	-	-	3553	1751.5	-	-
195	4803	2301	2221	4723	2361	2361	-	4753	2353	2400	-
205	4803	2301	2221	4723	2361	2361	-	4753	2353	2400	-
215	4803	2301	2221	4723	2361	2361	-	4753	2353	2400	-
225	6003	2301	2221	5923	2361	2361	1200	5953	2353	2353	1247
235	6003	2301	2221	5923	2361	2361	1200	5953	2353	2353	1247
245	6003	2301	2221	5923	2361	2361	1200	5953	2353	2353	1247
255	7203	2301	2221	7123	2361	2361	2400	7153	2353	2353	2447
265	7203	2301	2221	7123	2361	2361	2400	7153	2353	2353	2447
275	7203	2301	2221	7123	2361	2361	2400	7153	2353	2353	2447

WEIGHTS

MDG	Approximate Weight Al (kg)		Approximate Weight Cu (kg)	
	6 and 8 pole	12 and 16 pole	6 and 8 pole	12 and 16 pole
10	184	178	223	217
20	201	191	260	240
30	217	205	295	271
40	304	302	393	381
50	345	327	462	424
60	374	353	530	483
70	-	426	-	544
80	490	461	666	607
90	535	501	770	697
100	-	573	-	730
105	-	534	-	690
110	656	620	891	815
115	619	581	854	776
120	718	674	1031	935
125	677	635	990	896
130	-	717	-	913
140	821	772	1115	1017
150	895	842	1287	1168
165	-	767	-	1002
175	892	792	1244	1085
185	982	915	1451	1306
195	-	1019	-	1332
205	1182	1108	1652	1499
215	1306	1217	1932	1739
225	-	1357	-	1863
235	1601	1475	2303	2079
245	1760	1625	2657	2392
255	-	1496	-	2110
265	1754	1632	2602	2365
275	1928	1801	2991	2727