

IEC frame, three phase AC motors

- B3 foot, B5 flange and B14 face mountings available
- Ratings from 0.07 to 37 kW
- 2, 4, 6 and 8 pole
- 3 phase, 230-400V 50Hz / 277-480V 60Hz
- IEC Frame sizes 63 to 200
- Efficiency class EFF2
- IP55 enclosure



Metric-E - 2-pole, 3000 RPM

Catalogue No. (B3 Foot Mount—see note on page 16 for B5 & B14 mount)	kW	Motor type	F.L. RPM	Nominal efficiency			Power factor			Current 400V	Torque			Rotor inertia kgm ²	Length ‘L’ mm §	Weight kg
				Eff @ 1/2	Eff @ 3/4	Eff @ F.L.	P.F. @ 1/2	P.F. @ 3/4	P.F. @ F.L.		FLT Nm	POT Nm	LRT Nm			
MM50612-57	0.18	63 A2	2800	56.0	60.0	61.1	0.50	0.58	0.71	0.6	0.614	2.10	2.10	0.00016	220	3.6
MM50622-57	0.25	63 B2	2800	49.0	60.0	63.4	0.55	0.64	0.76	0.75	0.853	2.20	2.20	0.00016	220	3.9
MM50632-57	0.37	63 C2	2760	52.0	63.0	66.8	0.55	0.64	0.80	1.0	1.281	3.20	3.20	0.00020	220	4.1
MM50712-57	0.37	71 A2	2810	59.0	64.0	65.3	0.53	0.67	0.78	1.05	1.258	3.40	3.10	0.00032	253	5
MM50722-57	0.55	71 B2	2810	62.0	67.5	68.5	0.57	0.69	0.80	1.45	1.870	5.50	5.10	0.00041	253	6
MM50812-57	0.75	80 A2	2800	69.4	72.0	74.1	0.73	0.84	0.86	1.7	2.559	6.30	6.30	0.00064	282	9
MM50822-57	1.1	80 B2	2800	75.1	77.6	77.0	0.72	0.81	0.86	2.4	3.753	11.3	11.2	0.00083	282	10
MM50912-57	1.5	90 SA2	2850	78.1	80.2	78.8	0.73	0.82	0.86	3.2	5.028	12.5	11.0	0.0013	305	11.5
MM50922-57	2.2	90 LA2	2840	77.9	81.9	81.6	0.74	0.83	0.86	4.5	7.401	20.3	18.7	0.0017	330	15
MM51012-57	3	100 LA2	2860	81.4	83.0	82.8	0.66	0.77	0.84	6.2	10.02	24.0	23.3	0.0030	373	21
MM51112-57	4	112 MB2	2880	83.6	84.9	84.4	0.77	0.82	0.84	8.1	13.27	36.5	34.0	0.0051	390	31
MM51312-58	5.5	132 SA2	2890	86.0	86.0	85.8	0.72	0.82	0.86	10.8	18.18	58	51	0.0097	468	38.5
MM51322-58	7.5	132 SB2	2890	87.0	87.5	87.3	0.72	0.82	0.85	14.6	24.79	79	70	0.0126	468	44.5
MM51612-58	11	160 MA2	2920	87.0	87.3	86.5	0.91	0.93	0.94	19.5	35.99	108	108	0.0422	602	116
MM51622-58	15	160 MB2	2930	87.0	88.6	88.5	0.90	0.92	0.93	26.3	48.91	158	158	0.0422	602	116
MM51632-58	18.5	160 LA2	2930	87.2	88.8	88.7	0.90	0.92	0.93	32.4	60.32	190	190	0.0501	646	133
MM51812-58	22	180 LA2	2950	89.6	91.0	91.6	0.91	0.93	0.95	36.7	71.25	203	195	0.0855	706	186
MM52012-58	30	200 LA2	2940	89.0	91.0	89.2	0.89	0.93	0.94	52.0	97.49	285	280	0.0890	731	200
MM52022-58	37	200 LB2	2940	89.0	91.0	89.7	0.89	0.92	0.93	64.1	120.2	360	350	0.1002	731	214

Metric-E - 4-pole, 1500 RPM

Catalogue No. (B3 Foot Mount—see note on page 16 for B5 & B14 mount)	kW	Motor type	F.L. RPM	Nominal efficiency			Power factor			Current 400V	Torque			Rotor inertia kgm ²	Length ‘L’ mm §	Weight kg
				Eff @ 1/2	Eff @ 3/4	Eff @ F.L.	P.F. @ 1/2	P.F. @ 3/4	P.F. @ F.L.		FLT Nm	POT Nm	LRT Nm			
MM50614-57	0.12	63 A4	1330	47.0	55.0	55.1	0.47	0.55	0.70	0.45	0.862	2.10	2.10	0.00018	220	3.4
MM50624-57	0.18	63 B4	1350	50.0	56.0	61.1	0.44	0.56	0.71	0.6	1.274	3.60	3.60	0.00026	220	4.1
MM50634-57	0.22	63 C4	1350	59.5	66.2	64.2	0.37	0.52	0.66	0.75	1.557	4.40	4.40	0.00030	220	4.5
MM50644-57	0.30	63 D4	1350	63.0	69.0	64.5	0.37	0.50	0.64	1.05	2.123	6.60	6.60	0.00034	220	4.8
MM50714-57	0.25	71 A4	1400	50.0	62.6	69.5	0.42	0.57	0.65	0.8	1.706	4.30	4.30	0.00066	253	5.0
MM50724-57	0.37	71 B4	1400	65.3	69.0	71.5	0.45	0.57	0.68	1.1	2.525	6.70	6.70	0.00066	253	6.0
MM50734-57	0.55	71 C4	1360	65.0	69.2	68.8	0.46	0.61	0.70	1.65	3.864	9.20	9.20	0.00081	253	7.0
MM50744-57	0.65	71 D4	1350	68.0	72.0	68.1	0.45	0.60	0.69	2.0	4.600	10.0	8.9	0.00091	253	7.5
MM50814-57	0.55	80 A4	1400	62.4	68.9	67.8	0.45	0.57	0.69	1.7	3.753	9.00	7.80	0.00101	282	9.0
MM50824-57	0.75	80 B4	1400	70.5	72.5	73.5	0.45	0.58	0.67	2.2	5.118	13.0	12.5	0.00133	282	10.0
MM50834-57	0.9	80 C4	1390	72.2	74.5	74.7	0.40	0.49	0.67	2.6	6.186	17.6	17.6	0.00149	282	11.0
MM50914-57	1.1	90 SA4	1400	75.0	77.5	76.5	0.55	0.68	0.77	2.7	7.507	18.8	17.0	0.0021	305	11.5
MM50924-57	1.5	90 LA4	1400	79.2	81.2	80.3	0.51	0.66	0.75	3.6	10.24	28.0	27.2	0.0029	330	14.0
MM50934-57	1.85	90 LB4	1400	80.1	81.0	80.7	0.52	0.66	0.77	4.3	12.63	37.5	33.5	0.0034	330	15.5
MM51014-57	2.2	100 LA4	1415	80.0	81.8	81.5	0.60	0.73	0.78	5.0	14.85	37.0	35.8	0.0047	373	19
MM51024-57	3	100 LB4	1415	81.0	83.5	83.0	0.59	0.72	0.80	6.5	20.26	62.0	57.9	0.0062	373	25
MM51114-58	4	112 MB4	1410	86.0	86.2	84.8	0.66	0.78	0.84	8.1	27.10	73.0	70.0	0.0108	390	32
MM51314-58	5.5	132 SB4	1430	85.5	86.0	85.8	0.70	0.77	0.82	11.3	36.75	87.0	87.0	0.0213	468	44.5
MM51324-58	7.5	132 MA4	1435	86.8	87.5	87.2	0.70	0.80	0.84	14.8	49.93	125	125	0.0287	506	55
MM51614-58	11	160 MB4	1460	89.2	88.8	88.5	0.71	0.81	0.85	21.2	71.98	210	210	0.0566	602	116
MM51624-58	15	160 LA4	1460	86.8	89.3	87.5	0.74	0.83	0.87	28.5	98.16	265	265	0.0754	646	133
MM51814-58	18.5	180 LA4	1460	88.5	89.4	89.1	0.82	0.87	0.89	33.7	121.1	350	350	0.1388	706	186
MM51824-58	22	180 LB4	1460	91.3	92.0	89.5	0.71	0.80	0.85	41.8	144.0	360	360	0.1388	706	187
MM52014-58	30	200 LB4	1455	89.6	89.3	88.2	0.75	0.83	0.87	56.5	197.0	490	490	0.1623	731	214

Catalogue No's for B3 motors with shaded cells are stocked in Europe

Please check stock availability for B5 and B14 motors with your local Baldor office

IEC frame, three phase AC motors

Metric-E - 6-pole, 1000 RPM

Catalogue No. (B3 Foot Mount—see note below for B5 & B14 mount)	kW	Motor type	F.L. RPM	Nominal efficiency			Power factor			Current 400V	Torque			Rotor inertia kgm ²	Length ‘L’ mm §	Weight kg
				Eff @ 1/2	Eff @ 3/4	Eff @ F.L.	P.F. @ 1/2	P.F. @ 3/4	P.F. @ F.L.		FLT Nm	POT Nm	LRT Nm			
MM50616-57	0.09	63 C6	890	30.6	38.5	46.4	0.41	0.49	0.56	0.5	0.966	2.60	2.60	0.00030	220	4.5
MM50626-57	0.12	63 D6	870	30.0	41.0	48.2	0.36	0.46	0.60	0.6	1.318	3.10	3.10	0.00034	220	4.8
MM50716-57	0.18	71 A6	875	54.2	59.8	61.1	0.49	0.62	0.71	0.6	1.965	3.20	2.90	0.00082	253	5.5
MM50726-57	0.25	71 B6	900	58.7	64.1	63.6	0.50	0.61	0.71	0.8	2.654	4.60	4.50	0.00107	253	6.0
MM50816-57	0.37	80 A6	910	56.4	64.0	63.8	0.40	0.52	0.67	1.25	3.885	10.5	10.0	0.00197	282	9.0
MM50826-57	0.55	80 B6	900	62.6	66.4	64.9	0.45	0.59	0.68	1.8	5.839	13.2	12.8	0.00252	282	10.0
MM50916-57	0.75	90 SA6	910	66.3	69.8	69.3	0.44	0.58	0.68	2.3	7.874	16.1	16.1	0.00339	305	11.0
MM50926-57	1.1	90 LA6	910	70.1	73.3	72.1	0.42	0.56	0.68	3.2	11.55	25.9	25.9	0.00452	330	13.5
MM51016-57	1.5	100 LA6	930	76.7	78.2	77.1	0.47	0.60	0.71	3.9	15.41	35.3	35.3	0.0086	373	20.5
MM51026-57	1.85	100 LB6	920	74.4	78.2	78.0	0.42	0.57	0.68	5.0	19.21	50.0	49.4	0.0104	373	25
MM51116-58	2.2	112 MB6	945	75.1	80.3	77.4	0.63	0.72	0.79	5.2	22.24	55.0	38.0	0.0167	390	32
MM51316-58	3	132 SB6	960	81.5	83.5	83.7	0.62	0.74	0.78	6.6	29.86	91.0	75.0	0.0288	468	44.5
MM51326-58	4	132 MA6	960	81.8	83.8	84.0	0.63	0.75	0.81	8.5	39.81	110	90	0.0344	506	55
MM51336-58	5.5	132 MB6	960	82.0	84.0	83.3	0.65	0.77	0.83	11.5	54.74	133	109	0.0411	506	66
MM51616-58	7.5	160 MB6	965	86.2	86.6	86.3	0.58	0.72	0.79	15.9	74.25	210	160	0.0845	602	112
MM51626-58	9.2	160 LA6	970	88.1	89.6	89.7	0.62	0.74	0.81	18.3	90.62	270	205	0.1145	646	133
MM51636-58	11	160 LB6	970	86.7	90.0	87.8	0.60	0.72	0.80	22.7	108.3	340	270	0.1145	646	145
MM51816-58	15	180 LB6	970	85.7	89.3	87.8	0.67	0.78	0.84	29.4	147.7	460	340	0.1740	706	187
MM52016-58	18.5	200 LA6	970	85.4	85.7	85.7	0.69	0.77	0.82	38.1	182.2	520	400	0.2029	731	200
MM52026-58	22	200 LB6	965	85.9	86.0	86.0	0.70	0.79	0.85	43.5	217.8	540	420	0.2029	731	214

Metric-E - 8-pole, 750 RPM

Catalogue No. (B3 Foot Mount—see note below for B5 & B14 mount)	kW	Motor type	F.L. RPM	Nominal efficiency			Power factor			Current 400V	Torque			Rotor inertia kgm ²	Length ‘L’ mm §	Weight kg
				Eff @ 1/2	Eff @ 3/4	Eff @ F.L.	P.F. @ 1/2	P.F. @ 3/4	P.F. @ F.L.		FLT Nm	POT Nm	LRT Nm			
MM50618-57	0.07	63 D8	650	20.5	26.0	30.0	0.46	0.51	0.62	0.55	1.029	2.50	2.50	0.00034	220	4.8
MM50718-57	0.08	71 A8	660	30.0	39.0	42.0	0.40	0.47	0.53	0.6	1.158	2.10	2.10	0.00051	253	5.5
MM50728-57	0.11	71 B8	660	30.0	37.0	40.0	0.42	0.49	0.55	0.8	1.592	2.80	2.80	0.00066	253	6
MM50818-57	0.18	80 A8	675	38.3	45.5	50.0	0.43	0.52	0.59	0.95	2.548	5.30	4.90	0.00197	282	9
MM50828-57	0.25	80 B8	675	43.0	50.0	52.0	0.41	0.51	0.62	1.25	3.539	7.00	7.00	0.00252	282	10
MM50918-57	0.37	90 SA8	680	51.0	57.4	59.4	0.38	0.49	0.60	1.5	5.199	11.6	10.6	0.00341	305	11
MM50928-57	0.55	90 LA8	690	52.0	59.0	64.5	0.37	0.46	0.56	2.2	7.616	16.0	15.8	0.00452	330	13.5
MM51018-57	0.75	100 LA8	700	62.2	67.7	68.0	0.37	0.47	0.58	2.75	10.24	20.6	20.6	0.0086	373	22
MM51028-57	1.1	100 LB8	700	60.0	66.6	65.7	0.36	0.46	0.59	4.1	15.01	40.0	38.3	0.0104	373	26
MM51118-58	1.5	112 MB8	705	66.8	69.2	73.7	0.38	0.50	0.60	4.9	20.33	55.0	40.3	0.0167	390	32
MM51318-58	2.2	132 SB8	720	69.0	76.0	78.0	0.52	0.64	0.72	5.3	29.20	72.0	58.0	0.0310	468	47
MM51328-58	3	132 MB8	720	70.0	78.0	80.0	0.53	0.65	0.72	7.3	39.80	99.0	79.0	0.0400	506	65
MM51618-58	4	160 MA8	725	76.1	81.1	83.1	0.51	0.64	0.72	9.6	52.71	150	120	0.0950	602	116
MM51628-58	5.5	160 MB8	725	77.4	83.3	83.5	0.49	0.61	0.70	13.6	72.48	210	170	0.0950	602	120
MM51638-58	7.5	160 LA8	725	77.5	83.5	83.8	0.49	0.61	0.70	18.6	98.84	290	230	0.1287	646	135
MM51818-58	11	180 LB8	730	82.3	85.4	85.2	0.50	0.62	0.72	25.9	144.0	380	280	0.2151	706	194
MM52018-58	15	200 LA8	730	83.5	85.4	85.8	0.56	0.69	0.77	32.8	196.3	460	370	0.2595	731	214

Notes for ordering B5 and B14 motors:

For B5 flange mount motor, replace first 2 letters (MM) of the catalogue number with MVM and add a D before the hyphen (-).
MM51812-58 becomes MVM51812D-58

For B14 face mount motor, replace first 2 letters (MM) of the catalogue number with MVM and add a C before the hyphen (-).
MM50818-57 becomes MVM50818C-57

B14 face mount motors are only available up to frame size 132

For pricing of B5 and B14 motor types, consult your local Baldor office

§ : Length and all nominal dimensions are specified against frame size in IEC quick reference chart on page 26

IEC frame, three phase AC brake motors 90W...45kW

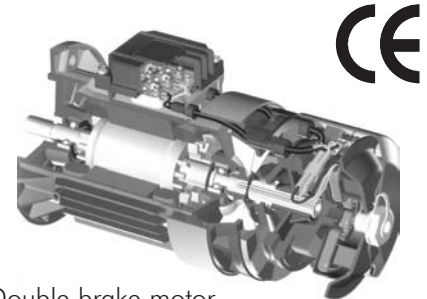
- Brake motors are available in 2, 4, 6 and 8 pole designs
- B3 foot, B5 flange and B14 face mountings available
- BA series - AC powered braking assembly
- BM series - DC powered braking assembly
- Dual speed also available
- No axial sliding of shaft - equal braking torque in both directions

- Double brake models are available on request



Metric-E brake motors - 4-pole, 1500 rpm

Motor Frame	BM series - DC powered braking		BA series - AC powered braking	
	Max. braking torque Nm	Brake reaction time (normal/quick) ms	Max. braking torque Nm	Brake reaction time ms
56	2	70/30	N/A	N/A
63	5	70/30	N/A	N/A
71	9	80/20	14	7
80	15	80/20	18	7
90	30	80/20	38	7
100	42	80/30	50	9
112	60	80/30	80	9
132	120	85/30	150	12
160	155	85/30	190	12
180	180	90/30	300	12
200	180	90/30	300	12



Double brake motor

Specifications for Metric-E brake motors are as our standard Metric-E motors on pages 14 and 15. For complete details contact your Baldor representative.

Certain models available from European stock - call for details

IEC frame, washdown duty AC motor range

- B3 foot, B5 flange and B14 face mountings available
- Stainless steel shafts and hardware
- Corrosion resistant rotor
- Extra protection provides moisture resistant windings
- Special epoxy paint gives five times more corrosion resistance
- Withstands ASTM, B117 salt spray test for over 500 hours
- FDA approved
- Motors may be mounted in any orientation

**COMPLETE STAINLESS STEEL
MOTORS AVAILABLE,
Call for details**

IEC frame, washdown duty motors

Catalogue No. (B3 Foot Mount—see notes below for B5 & B14 mount)	Motor power kW	Base speed RPM	Motor type	Voltage (50Hz) VAC	Nominal length § mm	Weight kg (approx.)
WDMM3538-50	0.37	1425	D71	230-400 volt 3 Phase	281	15
WDMM3546-50	0.75	1440	D80	230-400 volt 3 Phase	308	19
WDMM3554-50	1.1	1440	D90	230-400 volt 3 Phase	329	23
WDMM3558-50	1.5	1425	D90	230-400 volt 3 Phase	339	21
WDMM3611-50	2.2	1425	D100	230-400 volt 3 Phase	420	32
WDMM3615-50	4	1450	D112	400 volt 3 Phase	406	37
WDMM3710-50	5.5	1460	D132	400 volt 3 Phase	455	58
WDMM3714-50	7.5	1450	D132	400 volt 3 Phase	484	63



B3 Foot

§ Length and all nominal dimensions are specified against frame size in IEC quick reference chart on page 26

Notes for ordering B5 and B14 motors:

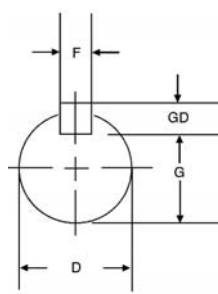
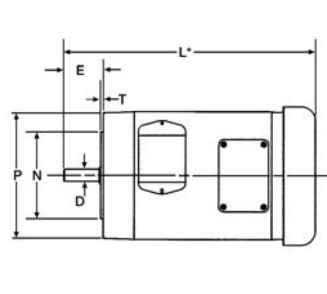
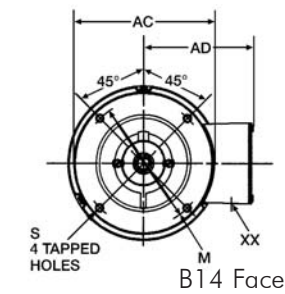
For **B5** flange mount motor, replace the third and fourth letters (**MM**) of the catalogue number with **MVM** and add a **D** before the hyphen (-).

WDMM3538-50 becomes WDMVM3538D-50

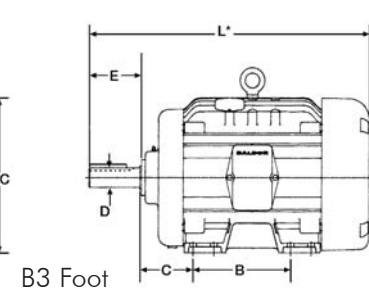
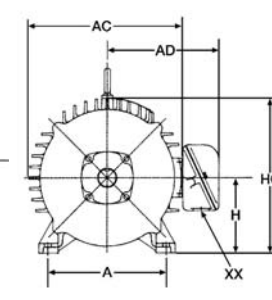
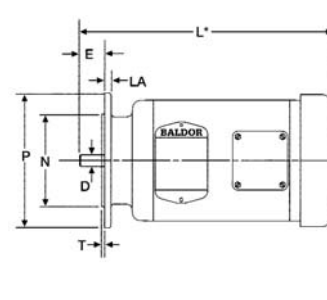
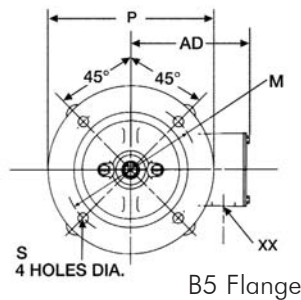
For **B14** flange mount motor, replace the third and fourth letters (**MM**) of the catalogue number with **MVM** and add a **C** before the hyphen (-).
WDMM3538-50 becomes WDMVM3538C-50

Catalogue No's with shaded cells are stocked in Europe, B5 and B14 variants are also stocked.

IEC - quick reference chart



IEC Key and Keyseat dimensions											
FRAME	D	G	F	GD	FRAME	D	G	F	GD		
63	11	8.5	4	4	160	37	42	12	8		
71	14	11	5	5	180	48	42.5	14	9		
80	19	15.5	6	6	200	55	49	16	10		
90	24	20	8	7	225	60	53	18	11		
100	28	24	8	7	250	70	67.5	20	12		
112	28	24	8	7	280	80	71	22	14		
132	38	33	10	8	315	85	76	22	14		
					355	85	76	22	14		



IEC Frame	Type	Foot mounting				Shaft		B5 flange						B14 face					General				
		A	B	C	H	D	E	LA	M	N	P	S	T	M	N	P	S	T	L	AC	AD	HC	XX
63	300	100	80	40	63	11	23	8	115	95	140	9	3	75	60	90	M5	2.5	*	119	102 116d	121 136d	13 22d
71	300 400	112	90	45	71	14	30	8	130	110	160	10	3.5	85	70	105	M6	2.5	*	119 145d	102	131 149d	18 21d
80	400 500	125	100	50	80	19	40	13	165	130	200	11	3.5	100	80	120	M6	3	*	145 168d	116 130d	152 162d	22 21d
90	S L	140	100 125	56	90	24	50	13	165	130	200	12	3.5	115	95	140	M8	3	*	168 144d	130 107d	173 165d	22 21d
100	S L	160	112 140	63	100	28	60	14	215	180	250	14	4	130	110	160	M8	3.5	*	200	149 153d	180 239d	27
112	S M	190	114 140	70	112	28	60	14	215	180	250	14	4	130	110	160	M8	3.5	*	200	149	214	27
132	S M	216	140 178	89	132	38	80	14	265	230	300	14	4	165	130	200	M8	3.5	*	243	187	256	27
160	M L	254	210 254	108	160	42	110	20	300	250	350	19	5	215	180	250	M12	4	*	329	242	329	35
180	M L	279	241 279	121	180	48	110	20	300	250	350	19	5						*	395	333	372	51
200	L M	318	267 305	133	200	55	110	27	350	300	400	19	5						*	441	359	416	63
225	S M	356	286 311	149	225	60	140	19	400	350	450	19	6						*	495	383	483	63
250	S M	406	311 349	168	250	70	140												*	520	457	513	63
280	S M	457	368 419	190	280	80	170												*	616	497	581	63
315	S M	508	406 457	216	315	85	170												*	759	683	682	102
355	S L	610	500 630	254	355	85	170												*	759	683	719	102

Horizontal shaft arrangements					
B3	B5	B6	B7	B8	B14
FOOT MOUNTED.	"D" TYPE FLANGE AT DRIVE END, NO FEET.	FOOT WALL MOUNT WITH FEET ON LEFT HAND SIDE WHEN VIEWED FROM DRIVE END.	FOOT WALL MOUNT WITH FEET ON RIGHT HAND SIDE WHEN VIEWED FROM DRIVE END.	CEILING MOUNTED WITH FEET ABOVE MOTOR.	"C" TYPE FACE AT DRIVE END, NO FEET.
Vertical shaft arrangements					
V1	V3	V5	V6	V18	V19
"D" TYPE FLANGE AT DRIVE END, SHAFT DOWN, NO FEET.	"D" TYPE FLANGE AT DRIVE END, SHAFT UP, NO FEET.	VERTICAL FOOT, WALL MOUNTED, SHAFT DOWN.	VERTICAL FOOT, WALL MOUNTED, SHAFT UP.	"C" TYPE FACE AT DRIVE END, SHAFT DOWN, NO FEET.	"C" TYPE FACE AT DRIVE END, SHAFT UP, NO FEET.

IP Protection Baldor Enclosures	
IP22	Open Drip Proof AC or DC Motors
IP54	All standard TEFC AC and DC Motors
IP55	All TEFC Chemical Processing, Dirty Duty, and Washdown Duty Motors

Summary of IP protection numbers			
First number Protection against solid objects		Second number Protection against liquids	
0	NO PROTECTION	0	NO PROTECTION
1	Protection against solid objects up to 50 mm. (E.G. Accidental touch by hands.)	1	Protection against vertical drops of water. (E.G. Condensation.)
2	Protection against solid objects up to 12 mm. (E.G. Fingers)	2	Protection against falling water up to 15 degrees from the vertical.
3	Protection against solid objects over 2.5 mm. (E.G. Tools, Wires)	3	Protection against falling water up to 60 degrees from the vertical.
4	Protection against solid objects over 1 mm. (E.G. Tools, Wires, and Small Wires)	4	Protection against splashing water from all directions, limited ingress.
5	Protection against dust - limited ingress (No harmful deposits)	5	Protection against low pressure jets of water from all directions, limited ingress.
6	Totally protected against all dust.	6	Protection against strong jets of water. (E.G. Use on shipdecks, limited ingress.)
		7	Protection against immersion.
		8	Protection against submersion.

Drawings represent standard TEFC general purpose motors
 *Dimensions are for reference only. All dimensions in mm

'L' dimension - see IEC motor sections in this catalogue for these dimensions or contact your local Baldor sales office