

MARINE ELECTRIC MOTOR

YB2 Ranges of Three-Phase Induction Motors

Introduction YB2 ranges of three-phase induction motors are flameproof motors obtained by renewal and generation-changing of YB ranges of motors. The performances of the products have come up to advanced international standards.

ISO9001 Supplier

Class Certificate

Export Supply



Key Highlights

Category	Marine Electric Motor
Standard	DIN
Weight / Size	The outputs, mounting dimensions and their corresponding relationships c...
Certificate	CCS/LR/DNV/KR

We can supply according to your requirement, drawings, class certificate needs, and delivery schedule.

Technical Specifications

Category	Marine Electric Motor	Model / SKU	YB2-Ranges-of-Three-Phase-Induction-Motors
Standard	DIN	Weight / Size	The outputs, mounting dimensions and their corresponding relationships comply with IEC standards.
Certificate	CCS/LR/DNV/KR	Warranty	12 Months unless specified otherwise
Origin	China		

CONTENTS

- Introduction
- Type Designation
- Technical Data
- Output kW
- Ambient Conditions
- Mounting Arrangement
- Type
- Rated Speed r/min

Introduction

YB2 ranges of three-phase induction motors are flameproof motors obtained by renewal and generation-changing of YB ranges of motors. The performances of the products have come up to advanced international standards. The motors have the advantages of higher efficiency,

energy saving, higher locked-rotor torque, lower noise, smaller vibration, safe and reliable operation and beautiful appearance, etc. The outputs, mounting dimensions and their corresponding relationships comply with IEC standards.

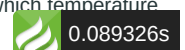
Ambient Conditions

Ambient air temperature changes with season, but does not exceed 35°C (underground coal mine) or 40°C (the factory), and is not lower than -15°C.

Altitude above sea level: up to 1000m.

Note: when ambient air temperature and altitude are different from the above, refer to GB755. In the moistest month, the monthly-average maximum relative humidity is 90%, and the minimum temperature does not exceed 25°C in this month (in the factory). In the underground coal mine, the highest relative humidity does not exceed 95%.

In the underground coal mine (non-excavating working) or the factory have easy-ignition and explosive gas, steam and air mixtures, which temperature class T1~T4.



Rated frequency: 50Hz.

Rated voltage: 380V, 660V and 380/660V.

Note: If you have special requirements for frequency, voltage, ambient air temperature and altitude, etc. Please put forward them when ordering.

Type Designation

The type designation consists of several letters and digits.



Mounting Arrangement

Three basic mounting arrangements and nine variant mounting arrangements, See the following table:

Technical Data

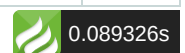
Type	Output kW	Rated Speed r/min	Current A		Efficiency %	Power factor or cos φ	Locked-rotor current / Rated current	Locked-rotor torque / Rated torque	Breakdown torque / Rated torque	Noise dB(A)	
			380 V	660 V						No-load	Load
Synchronous speed 3000r/min (2poles)											
80M1-2	0.75	2850	1.8	—	75	0.83	6.0	2.2	2.3	67	69
80M2-2	1.1	2840	2.6		78	0.84					
90S-2	1.5	2850	3.4		79	0.84	7.0			72	74
90L-2	2.2	2850	4.8		81	0.85					
100L-2	3.0	2870	6.2		83	0.88				76	78
112M-2	4.0	2890	8.1	4.7	85	0.88				77	79
132S1-2	5.5	2900	11.1	6.3	86	0.88	7.5			80	82
132S2-2	7.5	2900	14.8	8.6	87	0.88					
160M1-2	11	2910	21.6	12.5	88.4	0.88			2.4	86	88
160M2-2	15	2940	28.8	16.6	89.4	0.89					
160L-2	18.5	2940	35.5	20.5	90	0.89					
180M-2	22	2950	41	23.7	90.5	0.90		2.0	2.3	89	91
200L1-2	30	2950	55.5	32.1	91.4	0.90			2.4	92	94
200L2-2	37	2950	67.9	/39.2	92	0.90					
225M-2	45	2960	82.1	47.4	92.5	0.90			2.3		
250M-2	55	2970	99.7	57.5	93	0.90		2.1		93	95
280S-2	75	2970	135	78	93.6	0.91		2.0		94	96
280M-2	90	2970	160	93	93.9	0.91		2.1			

315S-2	110	2984	195	113	94	0.91	7.0	1.8	2.2	96	98
315M-2	132	2984	232	134	94.5	0.91				99	101
315L1-2	160	2984	280	162	94.6	0.91					
315L2-2	200	2984	348	201	94.8	0.92		1.6	103	105	
355M-2	250	2984	338	250	95.2	0.92					
355L-2	315	2984	544	314	95.4	0.92					

Type	Output kW	Rated Speed r/min	Current A		Efficiency %	Power factor or cos φ	Locked-rotor current / Rated current	Locked-rotor torque / Rated torque	Breakdown torque / Rated torque	Noise dB(A)	
			380 V	360 V						No-load	Load

Synchronous speed 1500r/min (4 poles)

80M1-4	0.55	1390	1.5	—	71	0.75	5.0	2.4	2.3	58	63		
80M2-4	0.75	1390	2.0		73	0.77				6.0	2.3	61	66
90S-4	1.1	1390	2.9		76.2	0.77							
90L-4	1.5	1390	3.7		78.5	0.79	7.0	2.2	2.4	64	69		
100L1-4	2.2	1420	5.1		81	0.81							
100L2-4	3.0	1420	6.8		82.6	0.82							
112M-4	4.0	1430	8.8	5.1	84.2	0.82	7.2	2.3	65	70			
132S-4	5.5	1450	11.5	6.7	86	0.84							
132M-4	7.5	1450	15.4	8.9	87	0.85							
160M-4	11	1460	22.3	12.9	88.4	0.85	7.0	2.1	2.2	75	80		
160L-4	15	1460	30.1	17.4	89.4	0.85				79			
180M-4	18.5	1470	36.5	21.2	90.5	0.85							
180L-4	22	1470	43.1	24.9	91.2	0.85	7.0	2.3	76	80			
200L-4	30	1470	57.6	33.3	92	0.86							
225S-4	37	1480	37.6	21.7	92.5	0.87					81	85	
225M-4	45	1480	84.7	48.9	92.8	0.87	84						
250M-4	55	1480	103	59.3	93	0.87		83	86				
280S-4	75	1480	140	81	93.8	0.87	86			89			
280M-4	90	1480	167	97	94.2	0.87							
315S-4	110	1484	201	116	94.5	0.88	7.0	2.1	2.2	93	96		
315M-4	132	1484	239	138	94.8	0.88				97	100		
315L1-4	160	1484	288	116	94.9	0.89							
315L2-4	200	1484	359	207	94.9	0.89		1.6	101	104			
355M-4	250	1484	495	255	95.2	0.90							
355L-4	315	1484	556	322	95.2	0.90							



Type	Output kW	Rated Speed r/min	Current A		Efficiency %	Power factor or cos ϕ	Locked-rotor current/ Rated current	Locked-rotor torque / Rated torque	Breakdown torque / Rated torque	Noise dB(A)	
			380 V	660 V						No-load	Load
Synchronous speed 1000r/min (6 poles)											
80M1-6	0.37	890	1.3	—	63	0.7	4.0	1.9	2.1	55	62
80M2-6	0.55	890	1.7		66	0.72					
90S-6	0.75	910	2.3		69	0.72		2.1		57	64
90L-6	1.1	910	3.1		73	0.73	5.0				
100L-6	1.5	930	3.9		76	0.76				61	68
112M-6	2.2	940	6.5		79	0.76				65	72
132S-6	3.0	970	7.3		81	0.77	6.0		2.4	69	76
132M1-6	4.0	970	9.4	5.4	83	0.78					
132M2-6	5.5	970	12.6	7.2	85	0.78	6.5				
160M-6	7.5	970	16.8	9.7	86	0.79				73	80
160L-6	11	970	24.3	14	87.5	0.79					
180L-6	15	980	31.6	18.3	89	0.81	7.0		2.1		84
200L1-6	18.5	980	37.6	21.7	90	0.83		2.2	2.4	76	82
200L2-6	22	980	44.7	25.8	90	0.83					
225M-6	30	980	57.6	33.3	92	0.86		2.1			
250M-6	37	980	69.8	40.3	92	0.86				78	84
280S-6	45	990	85.9	49.6	92.5	0.86				80	85
280M-6	55	990	105	60.5	92.8	0.86			2.2		
315S-6	75	987	140	80.9	93.5	0.86		2.0	2.0	85	90
315M-6	90	987	166.9	96.4	93.8	0.86					
315L1-6	110	987	202	117	94	0.86					
315L2-6	132	987	242	140	94.2	0.87					89
355S-6	160	980	292	168	94.5	0.88		1.9		92	96
355M-6	200	980	365	210	94.5	0.88					
355L-6	250	980	454	263	94.5	0.88					

Type	Output kW	Rated Speed r/min	Current A		Efficiency %	Power factor or cos φ	Locked-rotor current / Rated current	Locked-rotor torque / Rated torque	Breakdown torque / Rated torque	Noise dB(A)	
			380 V	660 V						No-load	Load

Synchronous speed 750r/min (8 poles)

80M1-8	0.18	650	0.8	—	52	0.61	3.3	1.8	1.9	52	60		
80M2-8	0.25	650	1.1		55	0.61							
90S-8	0.37	670	1.4		63	0.62	4.0	2.0	2.0	56	64		
90L-8	0.55	670	2.1		64	0.63							
100L1-8	0.75	670	2.4		71	0.68							
100L2-8	1.1	690	3.3		73	0.69							
112M-8	1.5	690	4.4		75	0.69							
132S-8	2.2	710	5.6		79	0.73	5.5			2.2	2.2	64	72
132M-8	3.0	710	7.6		81	0.73							
160M1-8	4.0	720	10.2	5.9	81	0.73	6.0	1.9	1.9	68	76		
160M2-8	5.5	720	13.4	7.8	83	0.75							
160L-8	7.5	720	17.5	10.1	85	0.76							
180L-8	11	720	25.3	14.6	87	0.76							
200L-8	15	730	33.7	19.5	89	0.76	6.5					2.0	2.0
225S-8	18.5	740	40	23.1	90	0.78							
225M-8	22	740	47.4	27.3	90.5	0.78							
250M-8	30	740	63.4	36.7	91	0.79							
280S-8	37	740	77.8	44.9	91.5	0.79	6.0	1.8	1.8	76	83		
280M-8	45	740	94.1	54.3	92	0.79							
315S-8	55	740	110	64	92.8	0.81	6.5					2.0	2.0
315M-8	75	740	148	86	93.5	0.81							
315L1-8	90	740	178	102	93.8	0.82							
315L2-8	110	740	216	125	94	0.82							
355S-8	132	740	260	150	94.2	0.82	90	95	95				
355M-8	160	740	313	181	94.2	0.82							
355L-8	200	740	386	223	94.5	0.83							

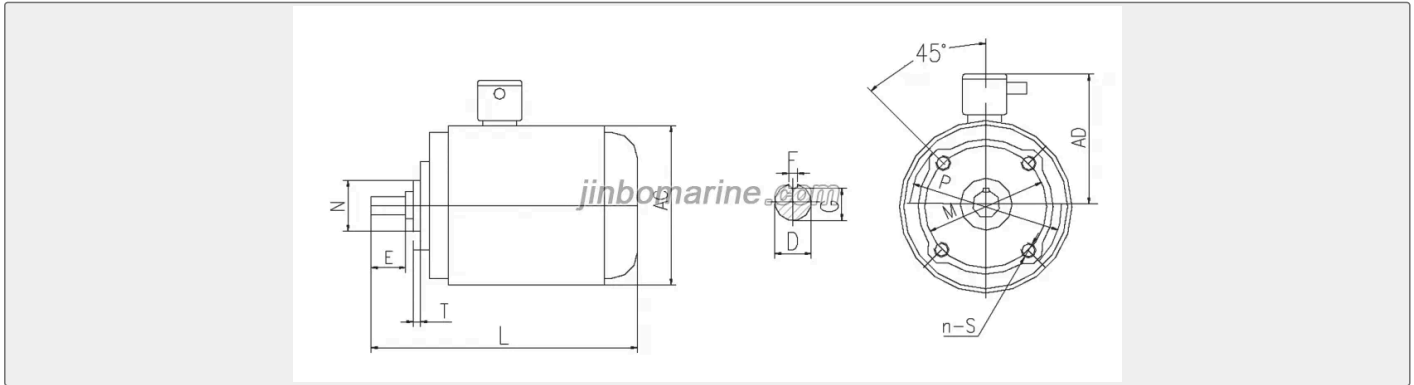
Synchronous speed 600r/min (10 poles)



315S-10	45	580	95.1	55	91.5	0.75	6.0	1.5	2.0	8.2	89
315M-10	55	580	117	67	92	0.75					
315L1-10	75	580	156	90	92.5	0.76					
315L2-10	90	580	187	108	93	0.77					
355M1-10	110	580	275	132	93.2	0.78	5.5	1.3		90	96
355M2-10	132	580	333	158	93.5	0.78					
355L-10	160	580	385	192	93.5	0.78					

Mounting and overall dimensions

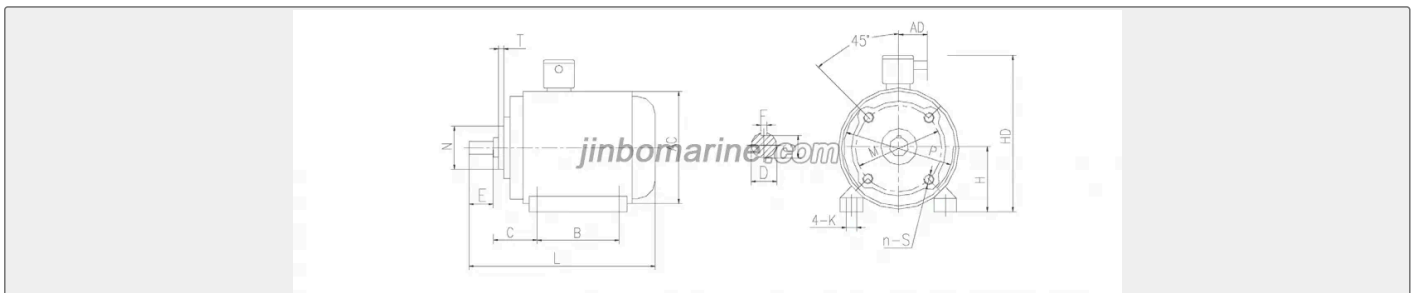
The motor of frame without feet, end-shield with flange(with threaded holes)



Frame size	Mounting and overall dimensions													
	D	E	F	G	M	N	P	S	T	n	Pipe thread for cable entry	AC	AD	L
80M	19	40	6	15.5	100	80	120	M6	3	4	M30X2	165	240	330
90S	24	50	8	20	115	95	140	M8	3.5			180	260	360
90L														
100L	28	60		24	130	110	160					205	300	440
112M												230	310	460

Note : The numerators of fractions in the table give the data of 2ix)le motors and the denaminators of fractions the data motors more than 2-pole.

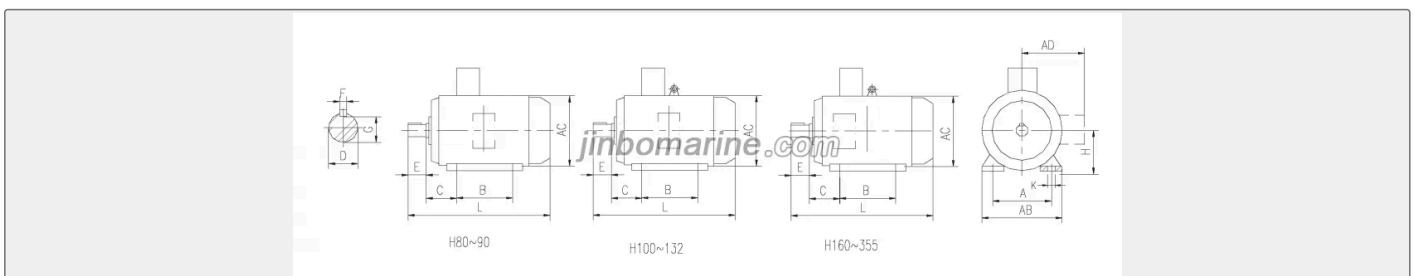
B14 The motor of frame with feet, end-shield with flange(with threaded holes)



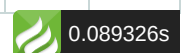
Frame size	Mounting and overall dimensions																				
	A	B	C	D	E	F	G	H	K	M	N	P	S	T	n	Pipe thread for cable entry	A B	A C	A D	H D	L
80M	125	100	50	19	40	6	15.5	80	10	100	80	120	M6	3	4	M30 X2	165	165	180	230	330
90S	140	125	56	24	50	8	20	90	10	115	95	140	M6	3	4		180	180	180	350	360
90L																					
100L	160	140	63	28	60	6	24	100	12	130	110	160	M8	3.5			200	205	180	400	440
112M	190		70						112									245		230	200

Note : The numerators of fractions in the table give the data of 2-pole motors and the denominators of fractions the data motors more than 2-pole.

Mounting arrangements B3, frame with feet, end-shield without flange



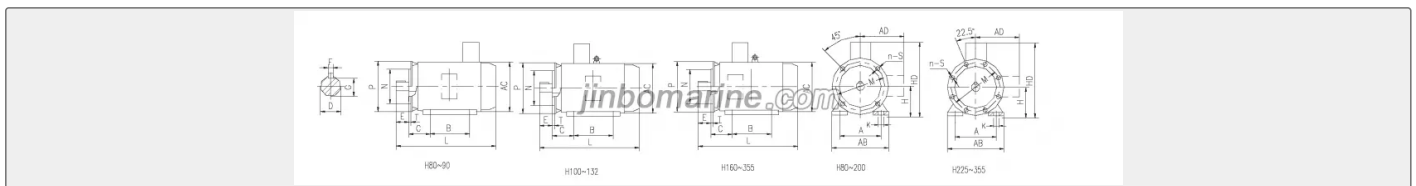
Frame size	Mounting and overall dimensions														
	A	B	C	D	E	F	G	H	K	Pipe thread for cable entry	A B	A C	A D	H D	L



80M	125	100	50	19	40	6	15.5	80	10	M30X2	165	165	180	230	330
90S	140		56	24	50	8	20	90			180	180		350	360
90L		125													385
100L	160	140	63	28	60		24	100	12		200	205		400	440
112M	190		70					112			245	230	200	420	460
132S	216		89	38	80	10	33	132			280	270		450	510
132M		178													550
160M	254	210	108	42	110	12	37	160	15	M36X2	330	325	220	520	670
160L		254													710
180M	279	241	121	48		14	42.5	180			355	360		550	730
180L		279													750
200L	318	305	133	55		16	49	200	19	M48X2	390	400	250	645	805
225S	356	286	149	55/60	110/140	16/18	49/53	225			435	450		690	865
225M		311													860/890
250M	406	349	168	60/65	140	18	53/58	250	24	M64X2	490	500	300	730	945
280S	457	368	190	65/75		18/20	58/67.5	280			545	560		810	1010
280M		419													1060
315S	508	406	216	65/80	140/170	18/22	58/71	315	28		640	630	400	1020	1320/1350
315M		457													1350/1380
315L		508													1490/1520
355S	610	500	254	75/95		20/25	67.5/86	355	28	M72X2	740	750	500	1080	1570
355M		560													165
355L		630													1750

Note : The numerators of fractions in the table give the data of 2-pole motors and the denominators of fractions the data motors more than 2-pole.

Mounting arrangements B35, frame with feet, end-shield with flange(with through holes)

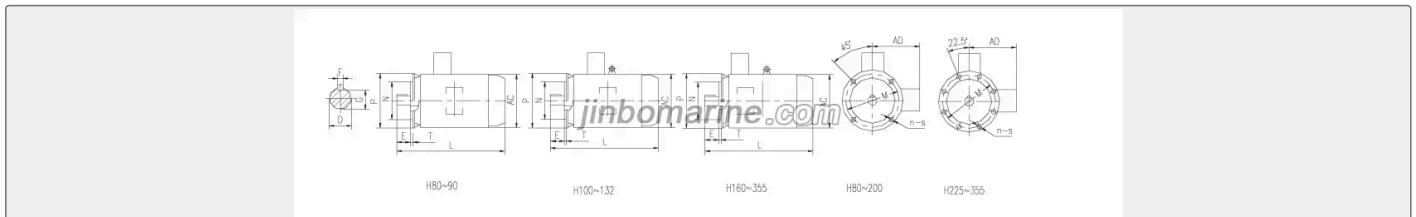


Frame size	Mounting and overall dimensions																						
	A	B	C	D	E	F	G	H	K	M	N	P	S	T	n	Pipe thread for cable entry	A _B	A _C	A _D	H _D	L		
80	125	100	50	19	40	6	15.5	80	10	165	130	200	12	3.5	4	M30 X2	165	165	180	320	330		
90S	140		56	24	50	8	20	90										180	180		350	360	
90L		125																				385	
100L	160	140	63	28	60		24	100	12	215	180	250	15	4				205	205		400	440	
112M	190		70					112										245	230	200	420	460	
132S	216		89	38	80	10	33	132		265	230	300						280	270		450	510	
132M		178																				550	
160M	254	210	108	42	110	12	37	160	15	300	250	350	19	5		M36 X2	330	325	220	520	670		
160L		254																				710	
180M	279	241	121	48		14	42.5	180											355	360		550	730
180L		279																					750
200L	318	305	133	55			16	49	200	19	350	300	400				M48 X2	390	400	250	645	805	

225S	356	286	149	55/60	110/140	16/18	49/53	225		400	350	450		8		435	450		690	865
225M		311																		860/890
250M	406	349	168	60/65	140	18	53/58	250	24	500	450	550			M64 X2	490	500	300	730	945
280S	457	368	190	65/75		18/20	58/67.5	280								545	565		810	1010
280M		419																		1060
315S	508	406	216	65/80	140/170	18/22	58/71	315	28	600	550	660	24	6		640	630	400	1020	1320/1350
315M		457																		1350/1380
315L		508																		1490/1520
355S	610	500	254	75/95		20/25	67.5/86	355		740	680	800			M72 X2	740	750	500	1080	1570
355M		560																		165
355L		630																		1750

Note : The numerators of fractions in the table give the data of 2-pole motors and the denominators of fractions the data motors more than 2-pole.

Mounting arrangements **B5** or **V1**, frame without feet, end-shield with flange(with through holes)



Frame size	Mounting and overall dimensions														
	D	E	F	G	M	N	P	S	T	n	Pipe thread for cable entry	A C	A D	L	B 5

80	19	40	6	15.5	165	130	200	12	3.5	4	M30X2	165	240	330	375				
90S	24	50	8	20	215	180	250	15	4	19		5	180	260	360	405			
90L															385	430			
100L	28	60		24	215	180	250	15	4	19		5	205	300	440	485			
112M															460	520			
132S	38	80	10	33	265	230	300	19	5	19		5	270	320	510	590			
132M															550	630			
160M	42	110	12	37	300	250	350	19	5	19		5	325	360	670	730			
160L															710	770			
180M	48		14	42.5	300	250	350	19	5	19		5	360	370	730	800			
180L											750				820				
200L	55		16	49	350	300	400	19	5	19	5	400	445	805	875				
225S	55/60	110/140	16/18	49/53	400	350	450	19	5	19	5	450	465	865	935				
225M														860/890	930/960				
250M	60/65 65/75 75/95	140	18	53/58	500	450	550	19	5	19	5	500	500	945	1035				
280S			18/20	58/67.5										560	550	1010	1100		
280M			1060	1150															
315S	60/65 65/75 75/95	140/170	18/22	58/71	600	550	660	24	6	19	5	630	705	-	1340/1370				
315M														1420/1450					
315L														1510/1540					
355S														20/25	67.5/86	740	680	800	1600
355M																			
355L							1780												
												M72X2	750	725					