marathon®

General Purpose Motors

Model No: 180LTFC6588
Catalog No: R338A

General Purpose Motor, 20 & 15 HP, 3 Ph, 60 & 50 Hz, 230/460 & 200/400 V, 1200 RPM, 180L Frame, TEFC

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Product Information Packet: Model No: 180LTFC6588, Catalog No: R338A General Purpose Motor, 20 & 15 HP, 3 Ph, 60 & 50 Hz, 230/460 & 200/400 V, 1200 RPM, 180L Frame, TEFC

Nameplate Specifications

Phase	**3**	Output HP	**20 & 15 Hp**
Output KW	**14.9 & 11.2 kW**	Voltage	**230/460 & 200/400 V**
Speed	**1185 & 985 r/min**	Synchronous RPM	**1200 & 1000 r/min**
Service Factor	**1.15 & 1.0**	Frame	**180L**
Enclosure	**Totally Enclosed Fan Cooled**	Thermal Protection	**No Protection**
Efficiency	**92.4 & 91 %**	Ambient Temperature	**40 °C**
Frequency	**60 & 50 Hz**	Current	**54/27 & 50/25 A**
Power Factor	**75**	Duty	**Continuous**
Insulation Class	**F**	Design Code	**B**
KVA Code	**G**	Drive End Bearing Size	**6311**
Opp Drive End Bearing Size	**6211**	UL	**No**
CSA	**Y**	CE	**Y**
IP Code	**55**	Number of Speeds	**1**

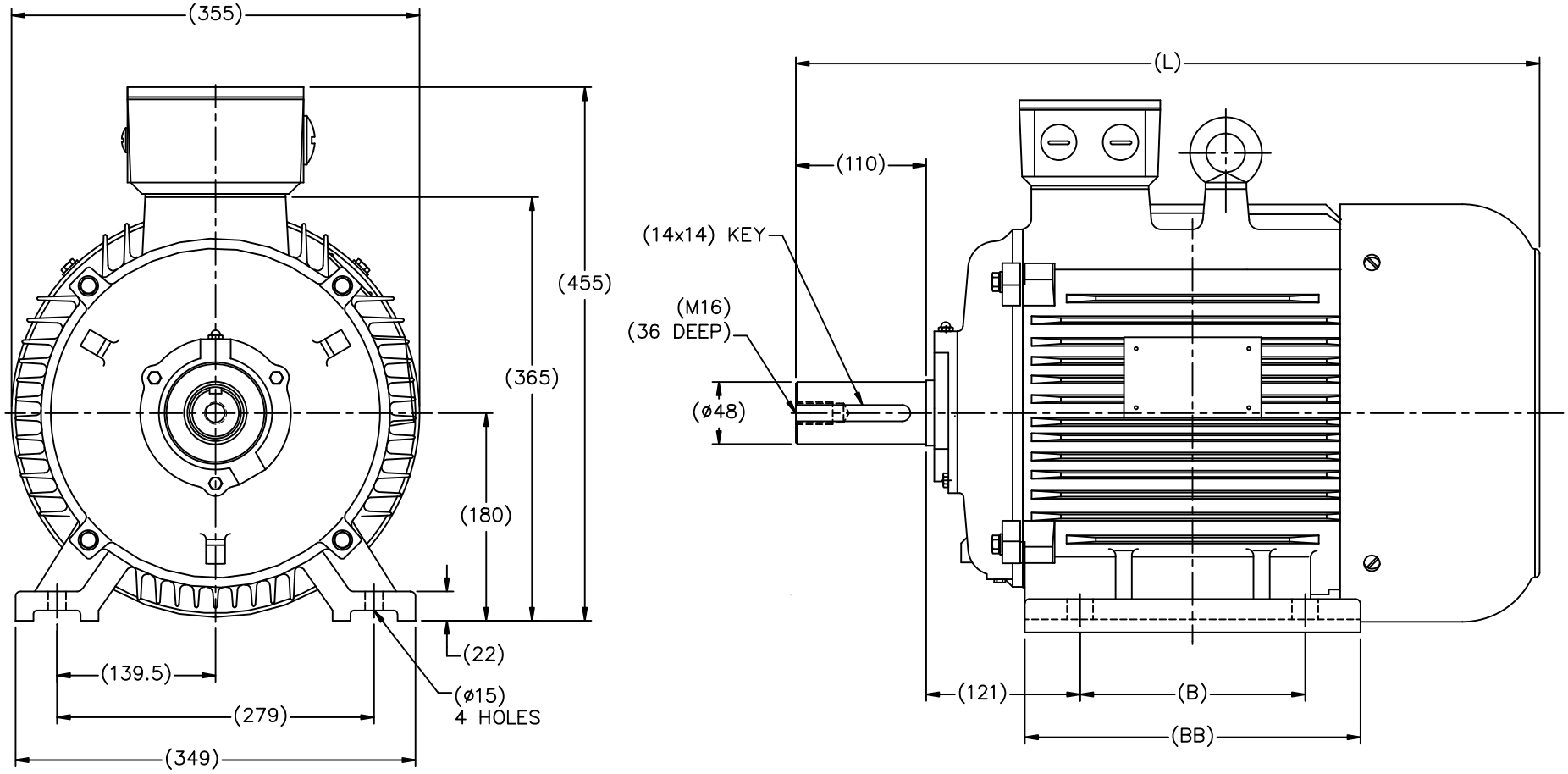
Technical Specifications

Electrical Type	**Squirrel Cage Inverter Rated**	Starting Method	**Part Wdg Start & Wye Start Delta Run Or Inverter**
Poles	**6**	Rotation	**Reversible**
Mounting	**Rigid Base**	Motor Orientation	**Horizontal**
Drive End Bearing	**Ball**	Opp Drive End Bearing	**Ball**
Frame Material	**Cast Iron**	Shaft Type	**IEC**
Overall Length	**28.26 in**	Shaft Diameter	**1 8/9 in**
Shaft Extension	**4.31 in**	Assembly/Box Mounting	**F3**
Inverter Load	**Constant 2:1**		

Drawings

Connection Drawing	**004172.01ME**	Outline Drawing	**B-SS622257**

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(DIMENSIONS ARE IN MILLIMETERS)

Cat.No		FRAME	B	BB	L
193324.60	193322.60	DF180M	241	311	680
193325.60	193320.60	DF180L	279	349	718

NO.	REVISION	BY & DATE	CHK

TOLERANCES UNLESS SPECIFIED

DEC.	METRIC
.X	±2.5
.XX	±.76
.XXX	±.127
.XXXX	±.0127
ANG	±7'30"

REGAL-BELOIT CORPORATION

DRAWN HLB 12-06-2010
CHK DJK 12-17-2010
APPD SB 12-13-2010
SCALE 1=18
REF
FMF HEBEI
PREV

TITLE OUTLINE
DF180M,L-4,6

MAT'L.
FINISH
CAD FILE SS622257
RFP 12-22-2010
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Data Sheet

Date: 29-06-2017
Customer:
Attention:
Submitted by: FAREEDA DUDEKULA

marathon® electric

180LTFC6588

Submittal

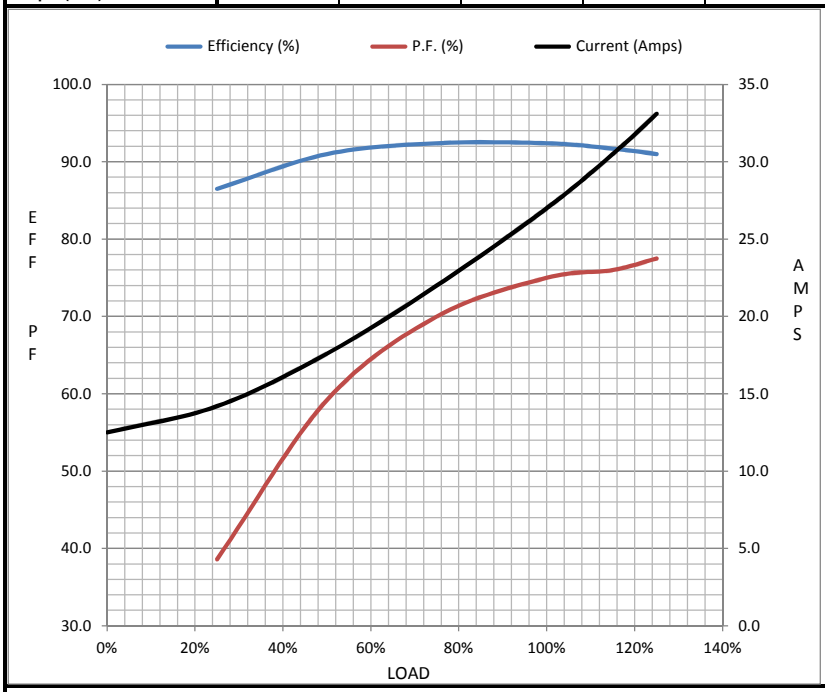
Data @ 460 V

Motor Load Data

Load	0%	25%	50%	75%	100%	115%	125%	LR	
Current (Amps)	12.5	14.2	17.6	22.0	27.0	30.5	33.1	145	
Torque (ft-lb)	0.00	22.0	45.0	67.0	88.0	103	112	142	
RPM	1200	1197	1192	1190	1185	1,180	1180	0	
Efficiency (%)		86.5	91.0	92.4	92.4	91.7	91.0		
P.F. (%)	5.1	38.6	59.2	70.0	75.0	76.0	77.5	0.0	

Motor Speed Data

	LR	Pull-Up	BD	Rated	Idle
Speed (RPM)	0	850	1110	1185	1200
Current (Amps)	145	135	99.0	27.0	12.5
Torque (ft-lb)	142	123	230	88.0	0.00



Information Block

HP	20.0
Sync. RPM	1200
Frame	286
Enclosure	TEFC
Construction	TFC
Voltage	230/460#200/40(V
Frequency	60 Hz
Design	B
LR Code letter	G
Service Factor	1.15
Temp Rise @ FL	55 ° C
Duty	CONT
Ambient	40 ° C
Elevation	1,000 feet
Rotor/Shaft wk²	6.6 Lb-Ft²
Ref Wdg	T14506013 FR
Sound Pressure @ 1M	56 dBA
VFD Rating	CONSTANT 2:1
Outline Dwg	B-SS622257
Conn. Diag	004172.01ME

Additional Specifications:

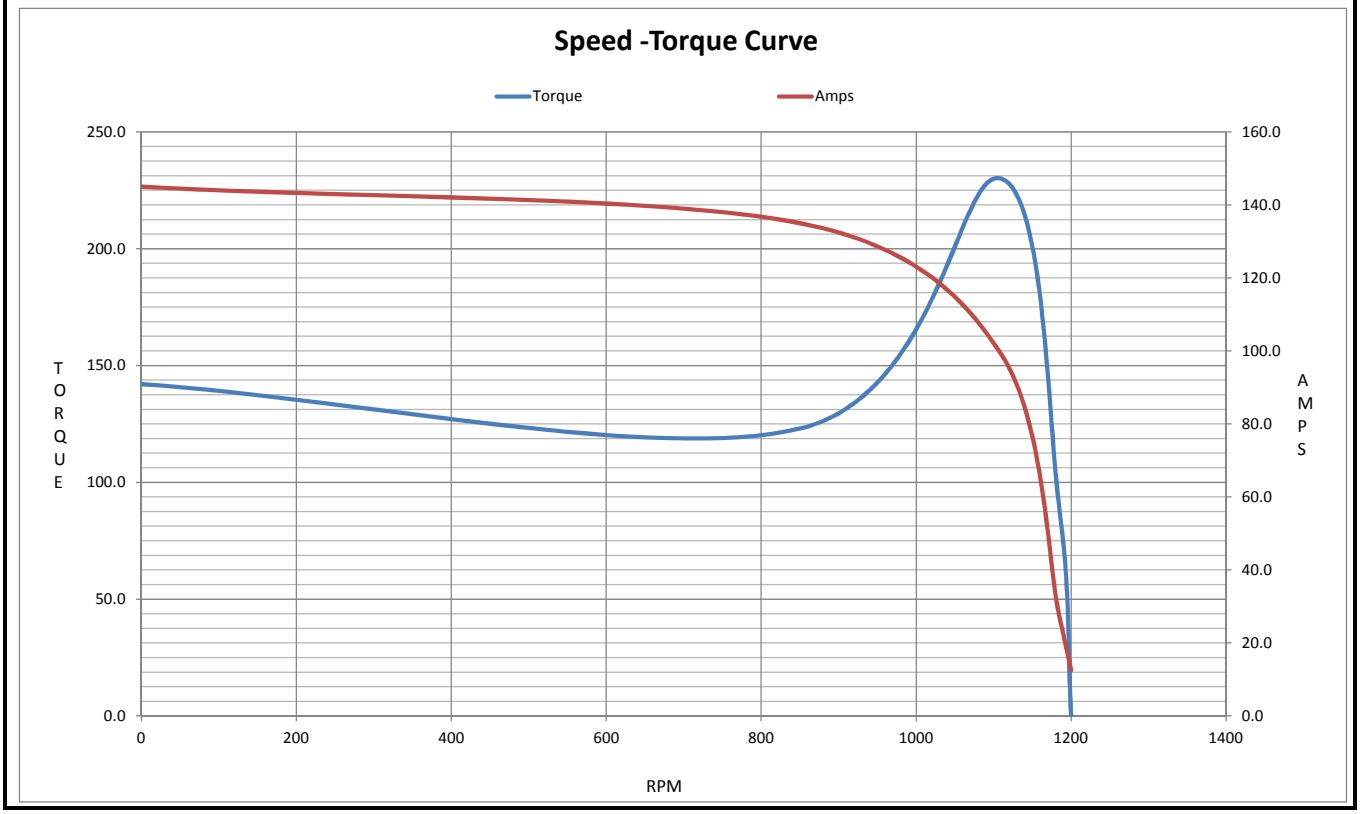
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365THFS8036

EQUIV CKT (OHMS / PHASE)

R1	R2	X1	X2	Xm
0.0000	0.0000	0.0000	0.0000	0.0000

Speed -Torque Curve



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CERTIFICATION DATA SHEET

Model#:	180LTFC6588 AA	**WINDING#:**	T14506013 FR 3
CONN. DIAGRAM:	004172.01ME	**ASSEMBLY:**	F3
OUTLINE:	B-SS622257		

TYPICAL MOTOR PERFORMANCE DATA

HP	KW	SYNC. RPM	F.L. RPM	FRAME	ENCLOSURE	KVA CODE	DESIGN
20&15	14.9&11.2	1200	1185&985	180L	TEFC	G	B

PH	Hz	VOLTS	FL AMPS	START TYPE	DUTY	INSL	S.F	AMB°C	ELEVATION
3	60/50	230/460#200/400	54/27&50/25	PWS & YDRUN OR INV	CONTINUOUS	F2	1.15/1.0	40	3300

FULL LOAD EFF: 92.4&91	3/4 LOAD EFF: 92.4	1/2 LOAD EFF: 91	GTD. EFF	ELEC. TYPE	NO LOAD AMPS
FULL LOAD PF: 75&69	3/4 LOAD PF: 70	1/2 LOAD PF: 59.2	91	SQ CAGE INV RATED	25 / 12.5

F.L. TORQUE	LOCKED ROTOR AMPS	L.R. TORQUE	B.D. TORQUE	F.L. RISE°C
88 LB-FT	290 / 145	142 LB-FT 160	230 LB-FT 260	55

SOUND PRESSURE @ 3 FT.	SOUND POWER	ROTOR WK^2	MAX. WK^2	SAFE STALL TIME	STARTS /HOUR	APPROX. MOTOR WGT
55.5 dBA	65.5 dBA	6.64 LB-FT^2	6.6 LB-FT^2	15 SEC.	2	400 LBS.

*** SUPPLEMENTAL INFORMATION ***

DE BRACKET TYPE	ODE BRACKET TYPE	MOUNT TYPE	ORIENTATION	SEVERE DUTY	HAZARDOUS LOCATION	DRIP COVER	SCREENS	PAINT
STANDARD	STANDARD	RIGID	HORIZONTAL	PREMIUM SEVERE DUTY	NONE	FALSE	NONE	BLUE (ENAMEL)

BEARINGS		GREASE	SHAFT TYPE	SPECIAL DE	SPECIAL ODE	SHAFT MATERIAL	FRAME MATERIAL
DE	OPE						
BALL 6311	BALL 6211	POLYREX EM	STANDARD IEC	NONE	NONE	1045 HOT ROLLED (C-204)	CAST IRON

THERMO-PROTECTORS				THERMISTORS	CONTROL	SPACE /n HEATERS
THERMOSTATS	PROTECTORS	WDG RTDs	BRG RTDs			
NONE	NOT	NONE	NONE	NONE	FALSE	NONE VOLTS

If Inverter equals NONE, contact factory for further information

INVERTER TORQUE: CONSTANT 2:1
INV. HP SPEED RANGE: 1.5 X BASE SPEED

ENCODER: NONE
NONE NONE
NONE NONE PPR

BRAKE: NONE NONE
NONE P/N NONE
NONE NONE
NONE FT-LB NONE V NONE Hz

*
NOTES
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