

**BALDOR • RELIANCE**

---

# Customer information packet

## SUM21004

10HP, RPM, 3PH, 60HZ, 210TY, TENV, V1

Class - None

Division - Not Applicable

## Specifications

Enclosure	TENV
Frame	210TY
Frequency	60.00 Hz
Phase	3
XP Class and Group	None
XP Division	Not Applicable
Agency Approvals	CCSA US
Base Indicator	Rigid
Bearing Grease Type	Polyrex EM (-20F +300F)
Design Code	B
Drip Cover	No Drip Cover
Duty Rating	CONT
Heater Indicator	No Heater
Insulation Class	F
Inverter Code	Not Inverter
IP Rating	NONE
KVA Code	H
Lifting Lugs	Standard Lifting Lugs
Motor Standards	NEMA
Mounting Arrangement	V1
Number of Poles	4
Product Family	Pump - Centrifugal
Pulley End Bearing Type	Ball
Pulley Face Code	Standard
Service Factor	1.15
Shaft Diameter	1.437 IN
Shaft Rotation	Reversible
Shaft Slinger Indicator	No Slinger
Starting Method	Direct on line
Thermal Device - Winding	Normally Closed Thermostat

## Part detail

Revision	A
Type	AC
Mech. spec.	
Base	
Status	PRD/A
Elec. spec.	86077
Layout	619738-003
Eff. date	09-15-2021
CD Diagram	416820-001
Poles	///
Leads	
Proprietary	False
Created date	07-22-2021

**Nameplate**

**000613007MN**

<b>CAT NO</b>	SUM21004	<b>SPEC NO.</b>	S21-CWS0-0005						
<b>HP</b>	10	<b>AMPS</b>	25/12.5	<b>VOLTS</b>	230/460	<b>DESIGN</b>	B		
<b>FRAME SIZE</b>	210TY	<b>RPM</b>	1765	<b>HZ</b>	60	<b>AMB</b>	40	<b>SF</b>	1.15
<b>D.E. BRG.</b>	60BC02JPP30A	<b>PH</b>	3	<b>DUTY</b>	15MIN	<b>INSUL</b>	F		
<b>O.D.E. BRG.</b>	30BC02JPG30A	<b>TYPE</b>	P	<b>ENCL</b>	TENV	<b>CODE</b>	H		
		<b>POWER FACTOR</b>		<b>NEMA-NOM-EFF</b>					
		<b>MAX CORR KVAR</b>		<b>GUARANTEED EFFICIENCY</b>					
		<b>NEMA NOM/CSA QUOTED EFF @</b>		<b>100% LOAD</b>					
<b>SER.NO.</b>		<b>MOTOR WEIGHT</b>	351	<b>LBS.</b>					
	FINAL CONN VOLTAGE = 230								
	*15MIN IN AIR								

**000613007MR**

<b>CAT NO</b>	SUM21004	<b>SPEC NO.</b>	S21-CWS0-0005						
<b>HP</b>	10	<b>AMPS</b>	25/12.5	<b>VOLTS</b>	230/460	<b>DESIGN</b>	B		
<b>FRAME SIZE</b>	210TY	<b>RPM</b>	1765	<b>HZ</b>	60	<b>AMB</b>	40	<b>SF</b>	1.15
<b>D.E. BRG.</b>	60BC02JPP30A	<b>PH</b>	3	<b>DUTY</b>	15MIN	<b>INSUL</b>	F		
<b>O.D.E. BRG.</b>	30BC02JPG30A	<b>TYPE</b>	P	<b>ENCL</b>	TENV	<b>CODE</b>	H		
		<b>POWER FACTOR</b>		<b>NEMA-NOM-EFF</b>					
		<b>MAX CORR KVAR</b>		<b>GUARANTEED EFFICIENCY</b>					
		<b>NEMA NOM/CSA QUOTED EFF @</b>		<b>100% LOAD</b>					
<b>SER.NO.</b>		<b>MOTOR WEIGHT</b>	351	<b>LBS.</b>					
	FINAL CONN VOLTAGE = 230								
	*15MIN IN AIR								

**AC induction motor performance data**

Record #86077 - Typical performance - not guaranteed values

Winding	07WGA0017
Type	0738M
Enclosure	TENV

**Nameplate data**

Rated Output			10
Volts			230/460
Full Load Amps			25/12.5
R.P.M.			1765
Hz	60	Phase	3
KVA Code			H
S.F.			1.15
NEMA Nom. Eff.	90.2	Power Factor	82
Duty			15 MIN
S.F. Amps			

460 V, 60 Hz:

**High Voltage Connection**

Full Load Torque	29.74 LB-FT
Start Configuration	direct on line
Breakdown Torque	83.88 LB-FT
Pull-up Torque	29.9 LB-FT
Locked-rotor Torque	45.11 LB-FT
Starting Current	87.77 A
No-load Current	4.92
Line-line Res. @ 25°C	1.25 Ω
Temp. Rise @ Rated Load	15°C
Temp. Rise @ S.F. Load	18°C
Locked-rotor Power Factor	37.1
Rotor inertia	0.934 lb-ft²

**Load Characteristics 460 V, 60 Hz, 10 HP**

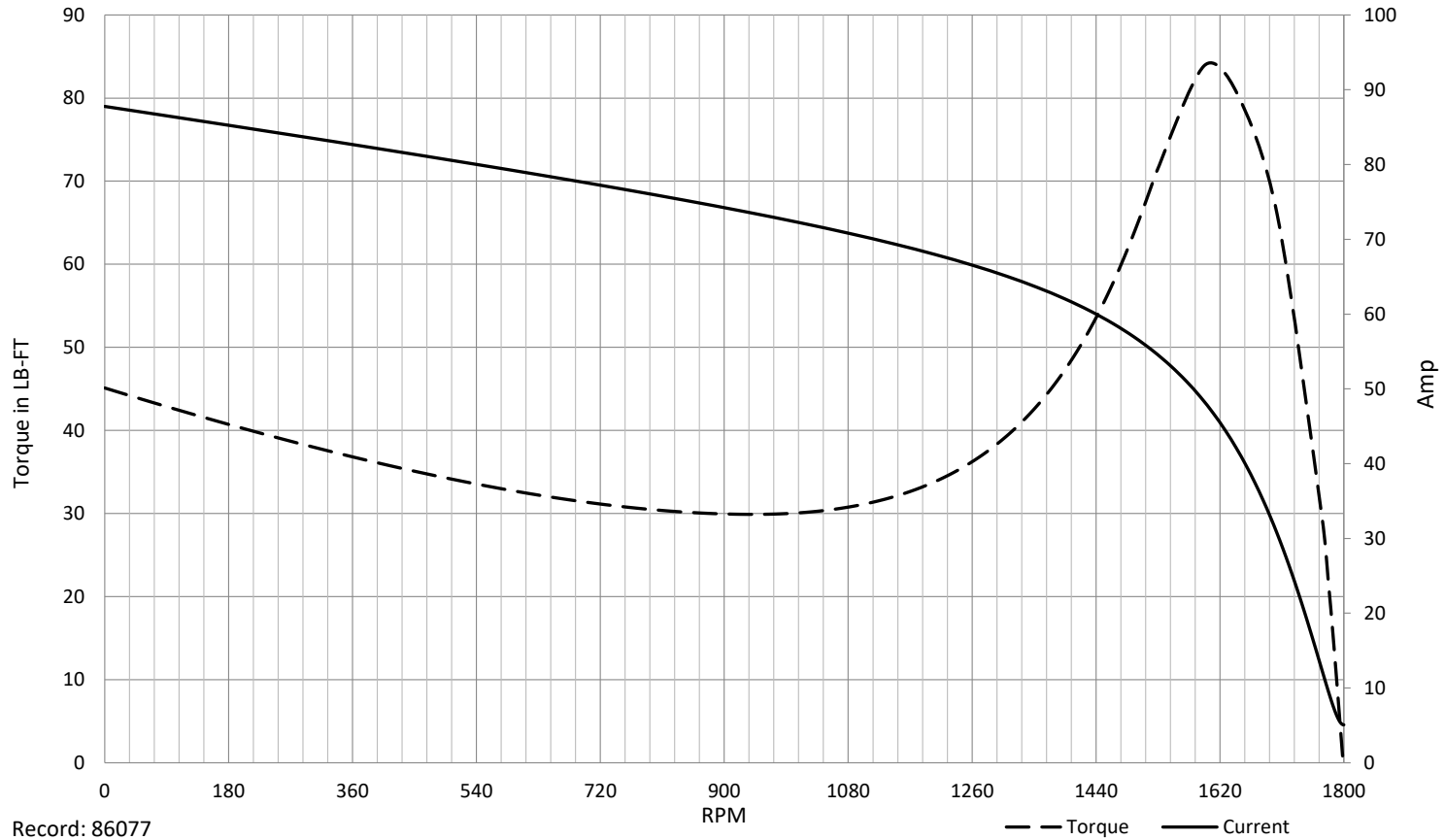
% of Rated Load	NL	25	50	75	100	125	150	SF
Power Factor	6	47	68	78	82	84	84	83
Efficiency	0	88.1	90.8	91.9	90.9	90	88.6	90.4
Speed	1799	1792	1785	1777	1768	1758	1747	1762
Line amperes	4.92	5.73	7.53	9.86	12.49	15.44	18.79	14.3

SPEED TORQUE / SPEED CURRENT CURVES



07WGA0017

10HP 460V 60HZ



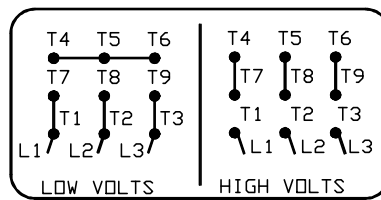
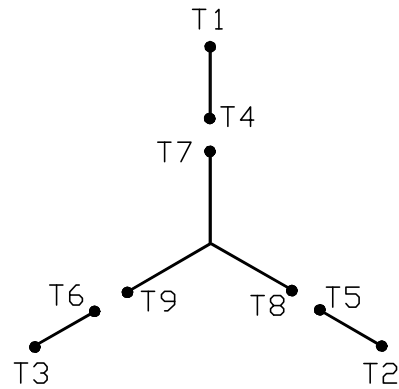
Record: 86077

--- Torque    — Current



416820-001

A-C MOTOR  
 CONNECTION DIAGRAM  
 STANDARD 9 LEAD Y CONNECTED



(N. P. 1575-A)

416820-001

REV. DESC: FONT CHANGE FOR PDF SEARCHABLE		
REV. LTR: A	VERSION: 01	TDR: 000001009382
FILE: \MGA\00000\659	REVISED: 10: 33: 07 12/21/2016	BY: MGHMTT
MTL: -	© □	

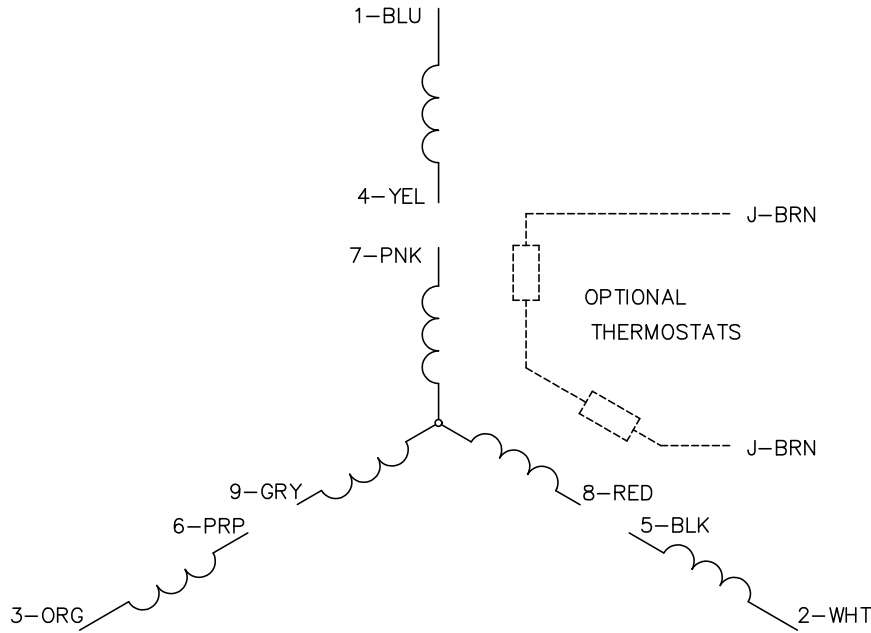
**BALDOR**

CONN DIAG - STANDARD 9 LEAD, Y CONNECTED

SH 1 of 1



CD0005



LOW VOLTAGE  
(2Y)



LINE

HIGH VOLTAGE  
(1Y)



LINE

NOTES:

1. INTERCHANGE ANY TWO LINE LEADS TO REVERSE ROTATION.
2. OPTIONAL THERMOSTATS ARE PROVIDED WHEN SPECIFIED.
3. ACTUAL NUMBER OF INTERNAL PARALLEL CIRCUITS MAY BE A MULTIPLE OF THOSE SHOWN ABOVE.
4. LEAD COLORS ARE OPTIONAL. LEADS MUST ALWAYS BE NUMBERED AS SHOWN.

CD0005

REV. DESC: REVISE TO SHOW OPTIONAL COLORS			
REV. LTR: E	BY: JLP	REVISED: 01/19/99 10:15	TDR: 0171435
S00000		FILE: AAA00005140	MDL: -
		MTL: -	

**BALDOR ELECTRIC Co.**

3PH, DV, 9 LEADS