

DATA SHEET

Three Phase Induction Motor - Squirrel Cage



Customer :							
Product line	: W22 NEMA Premium Efficiency Three-Phase	Product code :	11166498				
Frame	: 447/9T	Cooling method	: IC411 - TEFC				
Insulation class	: F	Mounting	: F-1				
Duty cycle	: Cont.(S1)	Rotation ¹	: Both (CW and CCW)				
Ambient temperature	: -20°C to +40°C	Starting method	: Direct On Line				
Altitude	: 1000 m.a.s.l.	Approx. weight ³	: 1360 kg				
Protection degree	: IP55	Moment of inertia (J)	: 6.09 kgm ²				
Design	: B						
Output [HP]	250	200	200	200	250	250	250
Poles	6	6	6	6	6	6	6
Frequency [Hz]	60	50	50	50	50	50	50
Rated voltage [V]	230/460	380	400	415	380	400	415
Rated current [A]	584/292	284	280	273	350	336	326
L. R. Amperes [A]	3562/1781	1732	1904	2020	1680	1848	1956
LRC [A]	6.1x(Code G)	6.1x(Code G)	6.8x(Code H)	7.4x(Code J)	4.8x(Code D)	5.5x(Code F)	6.0x(Code G)
No load current [A]	240/120	119	127	134	119	127	134
Rated speed [RPM]	1185	980	980	985	980	980	985
Slip [%]	1.25	2.00	2.00	1.50	2.00	2.00	1.50
Rated torque [kgfm]	153	148	148	147	185	185	184
Locked rotor torque [%]	240	220	260	280	180	210	229
Breakdown torque [%]	240	240	260	280	190	210	229
Service factor	1.15	1.15	1.15	1.15	1.00	1.00	1.00
Temperature rise	80 K	80 K	80 K	80 K	105 K	105 K	105 K
Locked rotor time	21s (cold) 12s (hot)	18s (cold) 10s (hot)	18s (cold) 10s (hot)	18s (cold) 10s (hot)	18s (cold) 10s (hot)	18s (cold) 10s (hot)	18s (cold) 10s (hot)
Noise level ²	70.0 dB(A)						
Efficiency (%)	25%						
	50%	95.0	94.8	94.7	94.6	95.0	94.5
	75%	95.4	95.5	95.5	95.5	94.5	94.5
	100%	95.8	95.5	95.5	95.5	94.5	94.5
Power Factor	25%						
	50%	0.68	0.68	0.65	0.61	0.74	0.71
	75%	0.79	0.79	0.77	0.74	0.83	0.81
	100%	0.83	0.84	0.81	0.80	0.85	0.84
Losses at normative operating points (speed;torque), in percentage of rated output power							
Losses (%)	P1 (0,9;1,0)	4.8	4.8	4.8	4.8	4.8	4.8
	P2 (0,5;1,0)	4.2	4.2	4.2	4.2	4.2	4.2
	P3 (0,25;1,0)	3.9	3.9	3.9	3.9	3.9	3.9
	P4 (0,9;0,5)	2.3	2.3	2.3	2.3	2.3	2.3
	P5 (0,5;0,5)	1.7	1.7	1.7	1.7	1.7	1.7
	P6 (0,5;0,25)	1.2	1.2	1.2	1.2	1.2	1.2
	P7 (0,25;0,25)	0.8	0.8	0.8	0.8	0.8	0.8
Bearing type	: Drive end : NU-322 C3	Non drive end : 6319 C3	Foundation loads				
Sealing	: WSeal	WSeal	Max. traction : 3026 kgf				
Lubrication interval	: 7000 h	13000 h	Max. compression : 4386 kgf				
Lubricant amount	: 60 g	45 g					
Lubricant type	: Mobil Polyrex EM						
This revision replaces and cancel the previous one, which must be eliminated. (1) Looking the motor from the shaft end.				These are average values based on tests with sinusoidal power supply, subject to the tolerances stipulated in NEMA MG-1.			
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Three Phase Induction Motor - Squirrel Cage



Customer : _____

Notes
USABLE @208V 646A SF 1.00 SFA 646A

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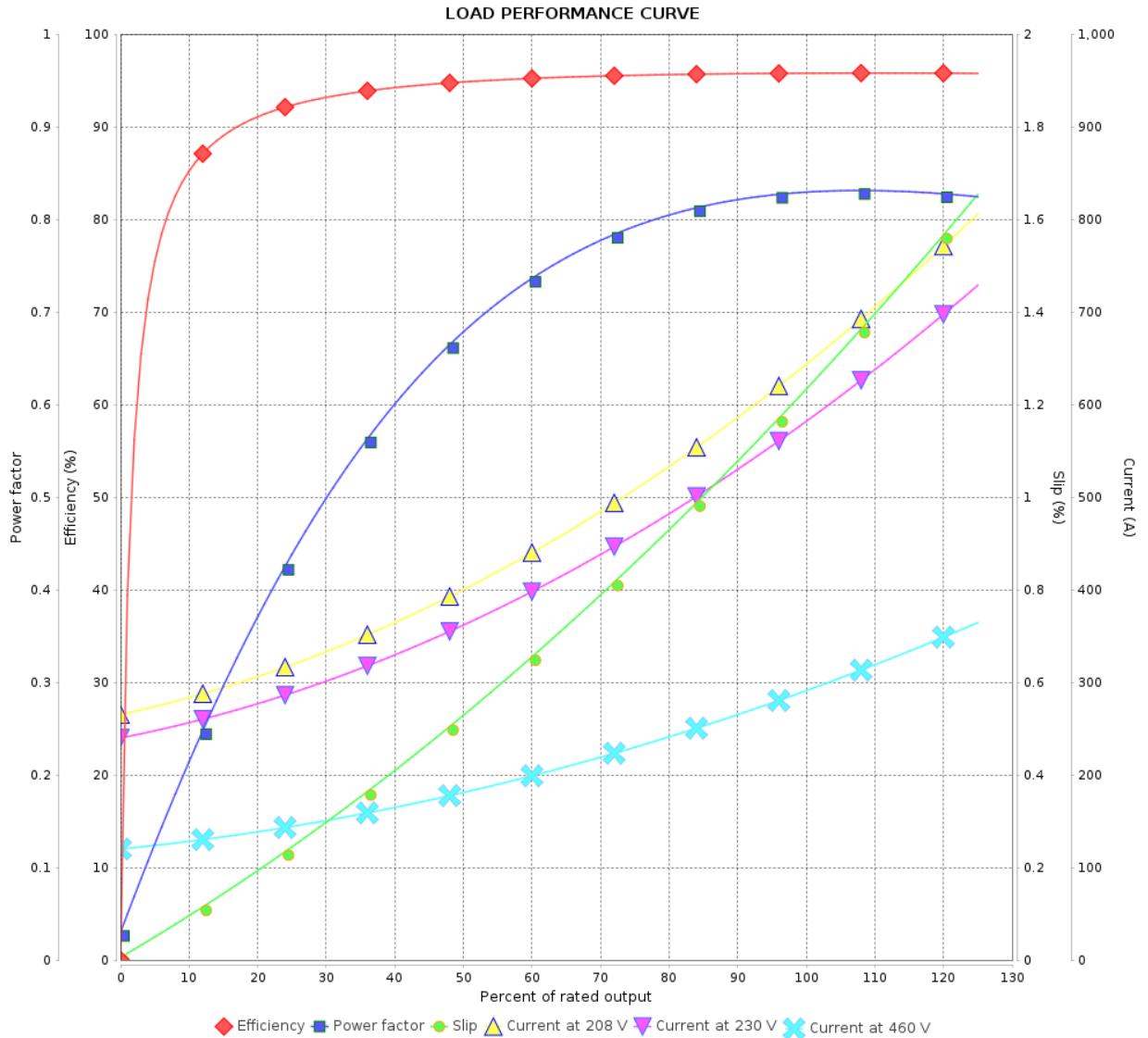
Three Phase Induction Motor - Squirrel Cage



Customer : _____

Product line : W22 NEMA Premium Efficiency Three-Phase

Product code : 11166498



Performance : 230/460 V 60 Hz 6P

Rated current : 584/292 A
 LRC : 6.1
 Rated torque : 153 kgfm
 Locked rotor torque : 240 %
 Breakdown torque : 240 %
 Rated speed : 1185 rpm

Moment of inertia (J) : 6.09 kgm²
 Duty cycle : Cont.(S1)
 Insulation class : F
 Service factor : 1.15
 Temperature rise : 80 K
 Design : B

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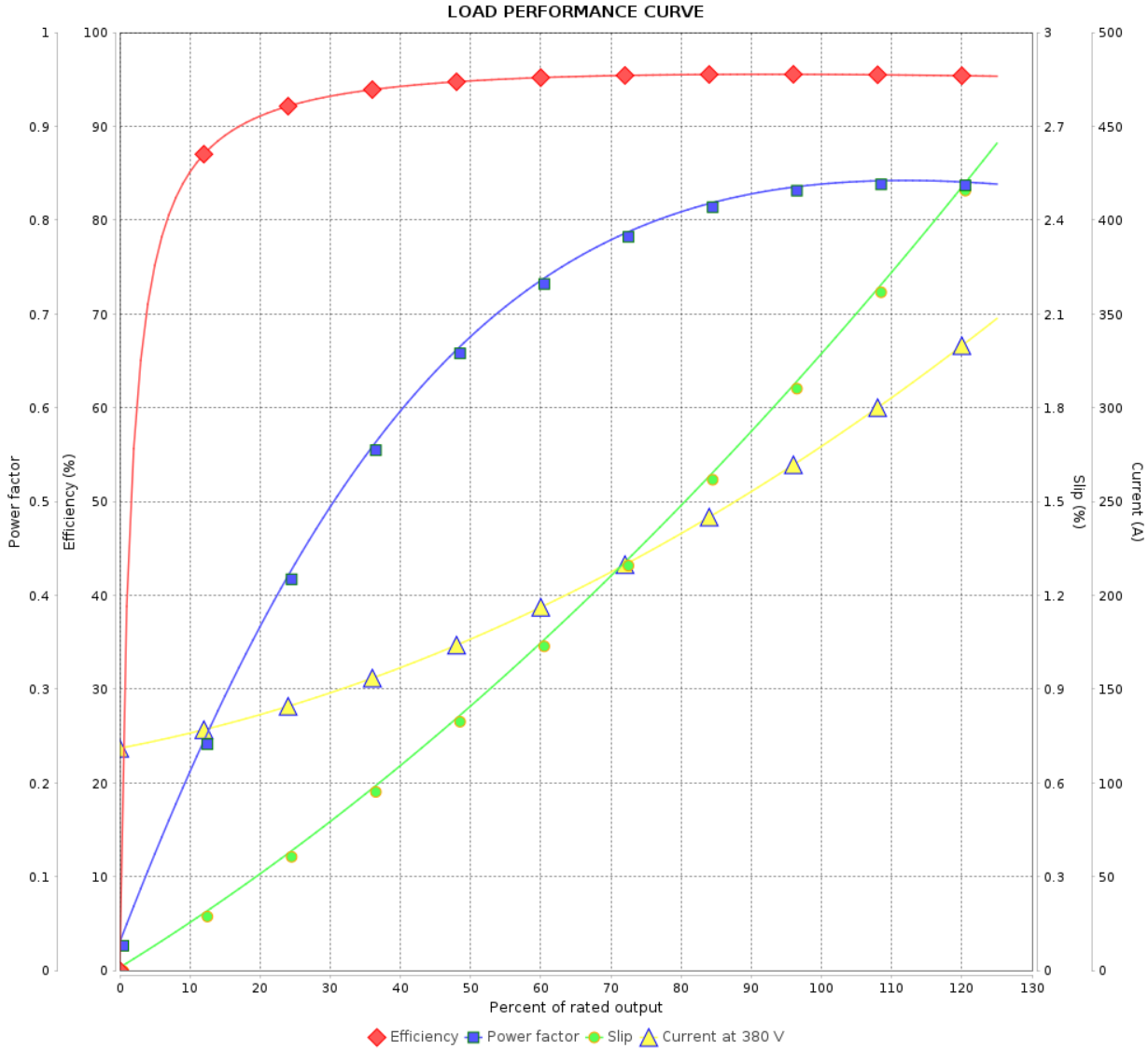
Three Phase Induction Motor - Squirrel Cage



Customer : _____

Product line : W22 NEMA Premium Efficiency Three-Phase

Product code : 11166498



Performance : 380 V 50 Hz 6P IE3

Rated current : 284 A
 LRC : 6.1
 Rated torque : 148 kgfm
 Locked rotor torque : 220 %
 Breakdown torque : 240 %
 Rated speed : 980 rpm

Moment of inertia (J) : 6.09 kgm²
 Duty cycle : Cont.(S1)
 Insulation class : F
 Service factor : 1.15
 Temperature rise : 80 K
 Design : B

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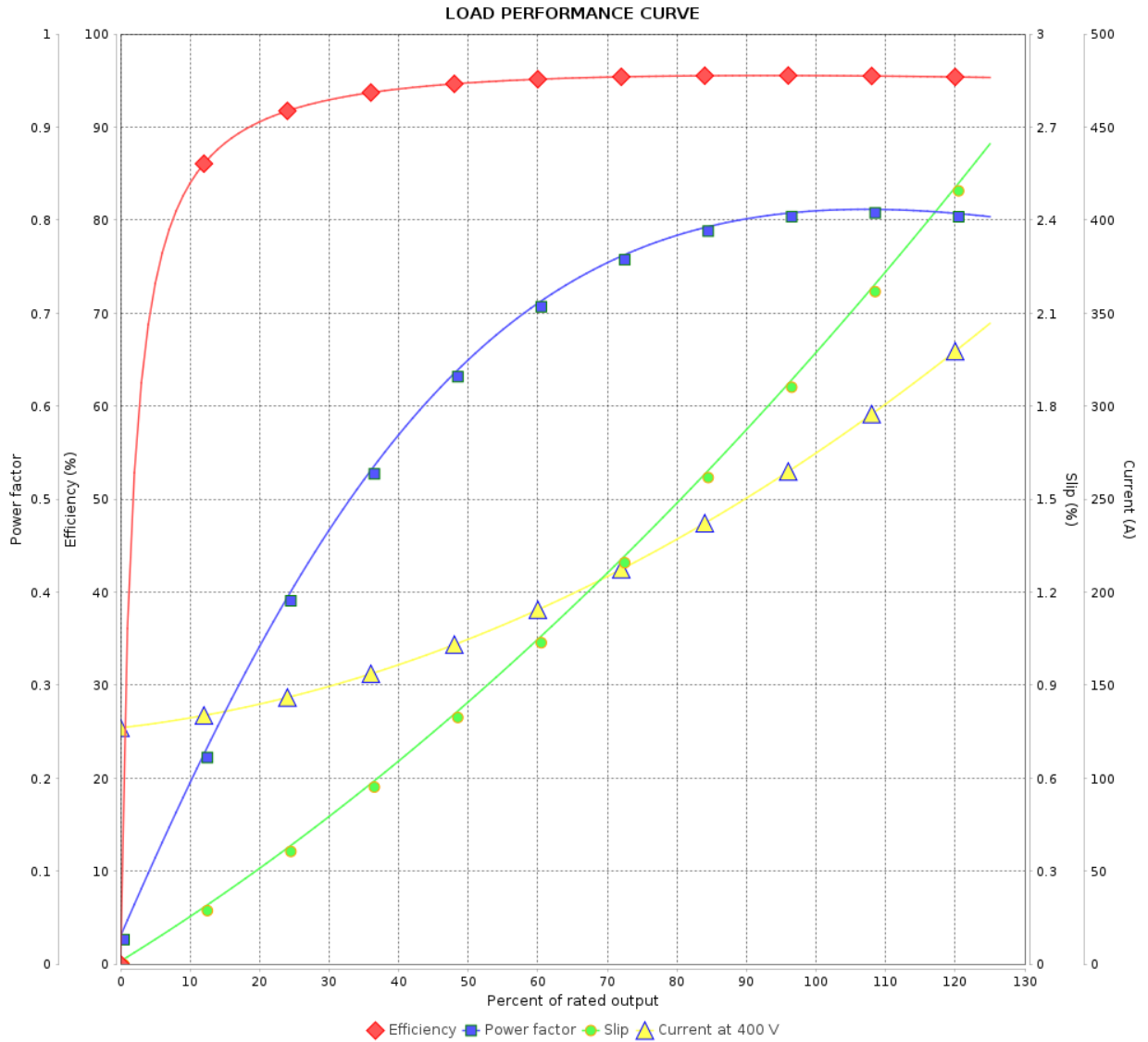
Three Phase Induction Motor - Squirrel Cage



Customer : _____

Product line : W22 NEMA Premium Efficiency Three-Phase

Product code : 11166498



Performance : 400 V 50 Hz 6P IE3

Rated current : 280 A
 LRC : 6.8
 Rated torque : 148 kgfm
 Locked rotor torque : 260 %
 Breakdown torque : 260 %
 Rated speed : 980 rpm

Moment of inertia (J) : 6.09 kgm²
 Duty cycle : Cont.(S1)
 Insulation class : F
 Service factor : 1.15
 Temperature rise : 80 K
 Design : B

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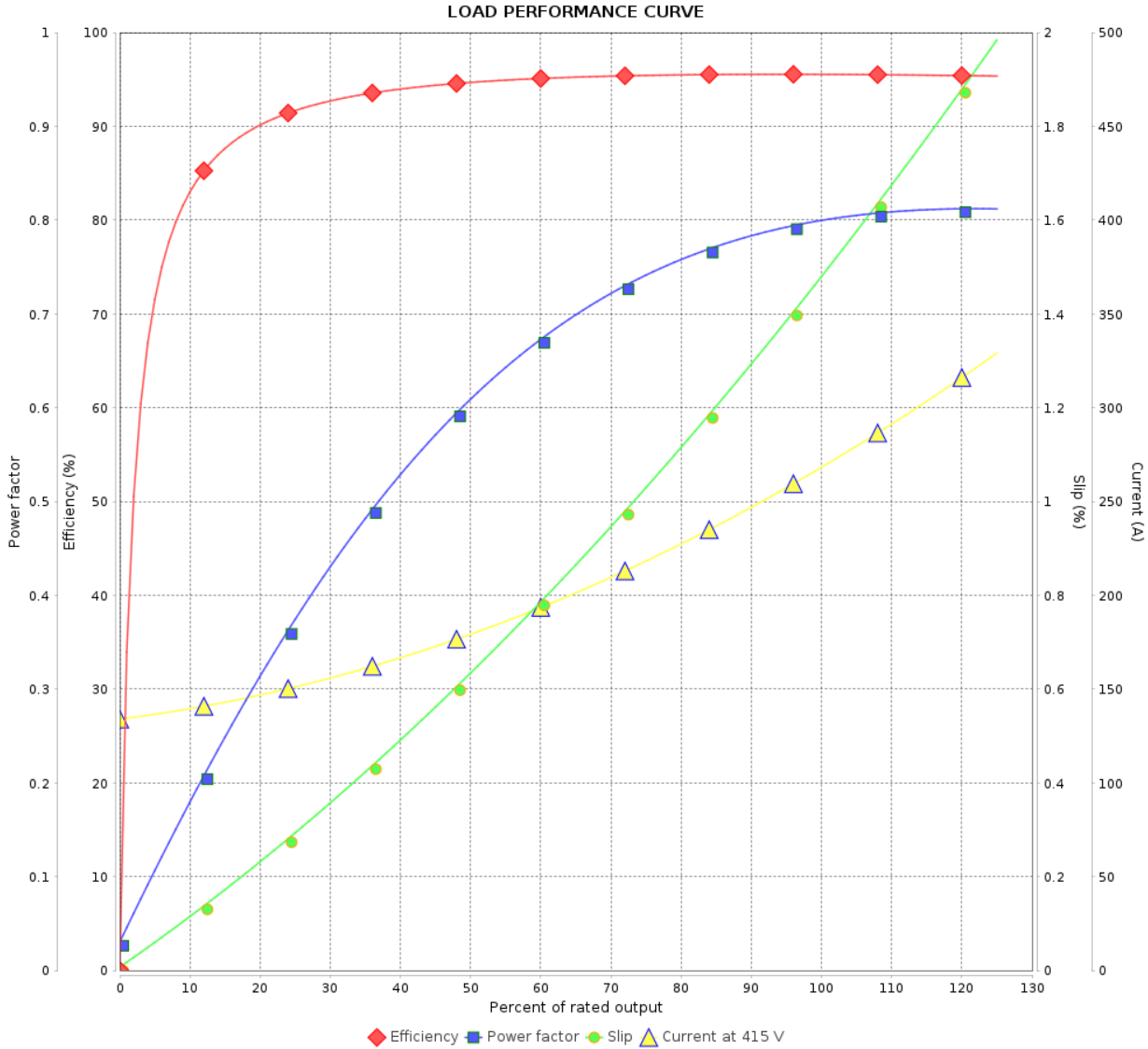
Three Phase Induction Motor - Squirrel Cage



Customer :

Product line : W22 NEMA Premium Efficiency Three-Phase

Product code : 11166498



Performance : 415 V 50 Hz 6P IE3

Rated current : 273 A
 LRC : 7.4
 Rated torque : 147 kgfm
 Locked rotor torque : 280 %
 Breakdown torque : 280 %
 Rated speed : 985 rpm

Moment of inertia (J) : 6.09 kgm²
 Duty cycle : Cont.(S1)
 Insulation class : F
 Service factor : 1.15
 Temperature rise : 80 K
 Design : B

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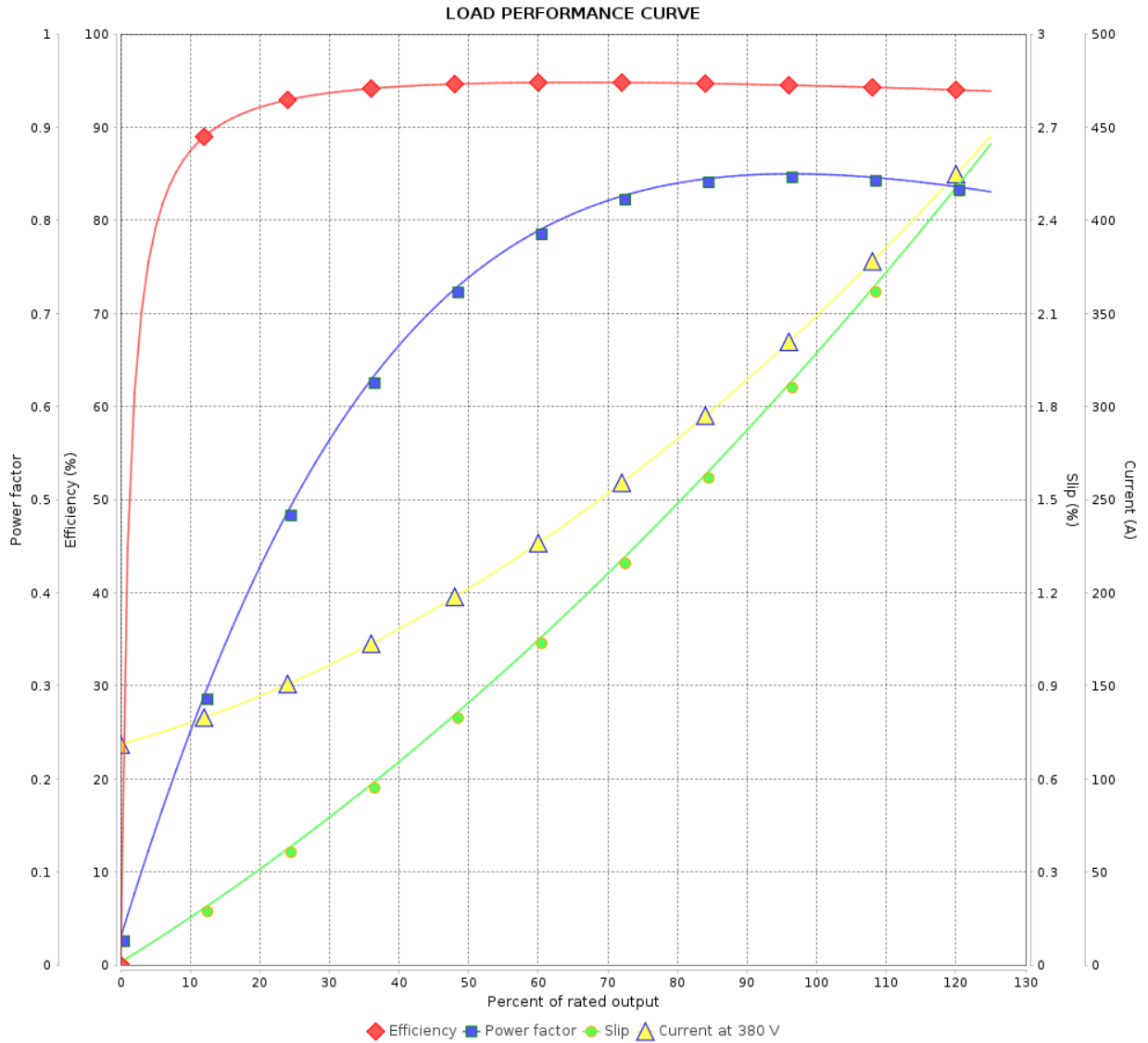
Three Phase Induction Motor - Squirrel Cage



Customer : _____

Product line : W22 NEMA Premium Efficiency Three-Phase

Product code : 11166498



Performance : 380 V 50 Hz 6P IE1

Rated current : 350 A
 LRC : 4.8
 Rated torque : 185 kgfm
 Locked rotor torque : 180 %
 Breakdown torque : 190 %
 Rated speed : 980 rpm

Moment of inertia (J) : 6.09 kgm²
 Duty cycle : Cont.(S1)
 Insulation class : F
 Service factor : 1.00
 Temperature rise : 105 K
 Design : B

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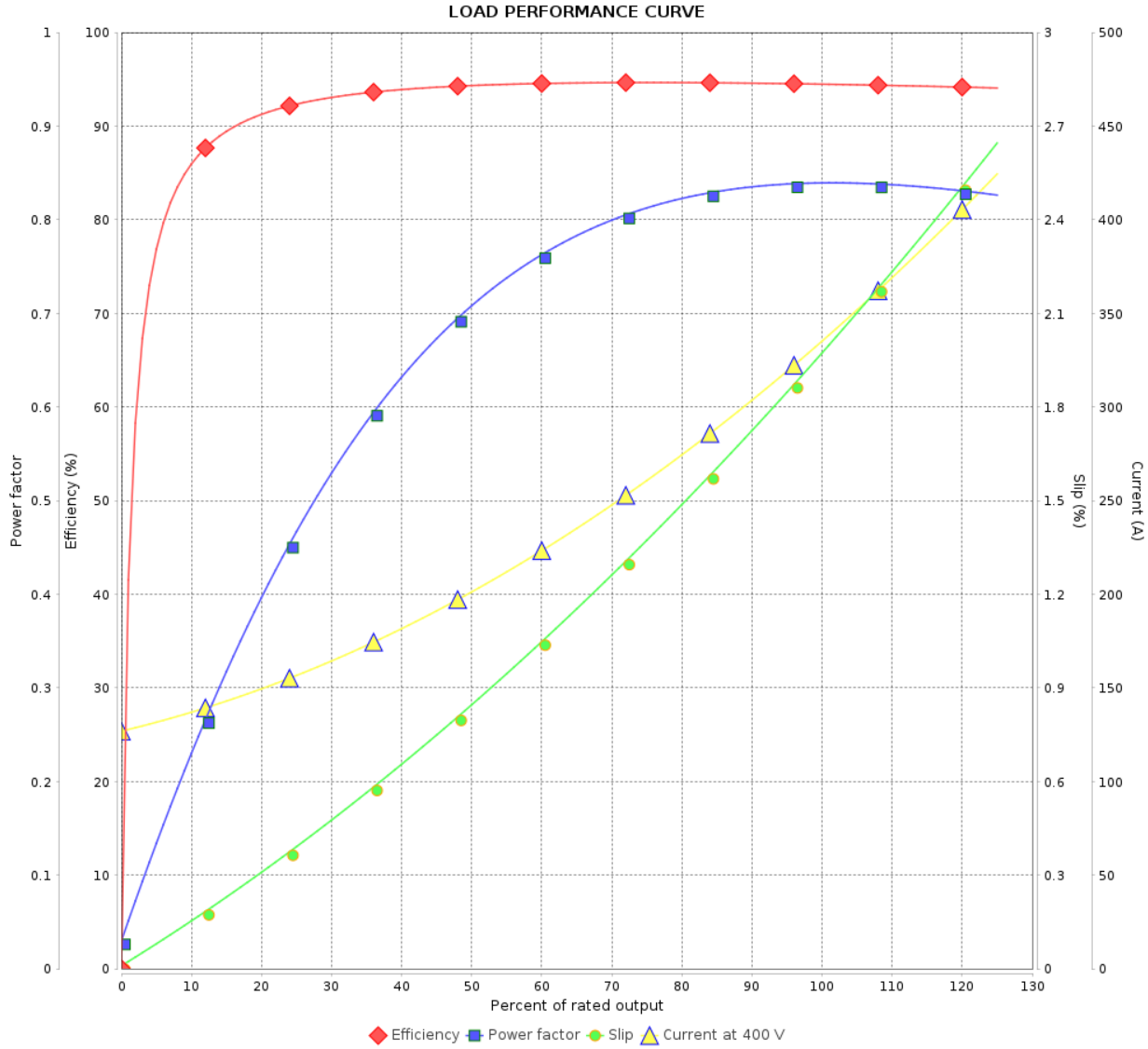
Three Phase Induction Motor - Squirrel Cage



Customer : _____

Product line : W22 NEMA Premium Efficiency Three-Phase

Product code : 11166498



Performance : 400 V 50 Hz 6P IE1

Rated current : 336 A
 LRC : 5.5
 Rated torque : 185 kgfm
 Locked rotor torque : 210 %
 Breakdown torque : 210 %
 Rated speed : 980 rpm

Moment of inertia (J) : 6.09 kgm²
 Duty cycle : Cont.(S1)
 Insulation class : F
 Service factor : 1.00
 Temperature rise : 105 K
 Design : B

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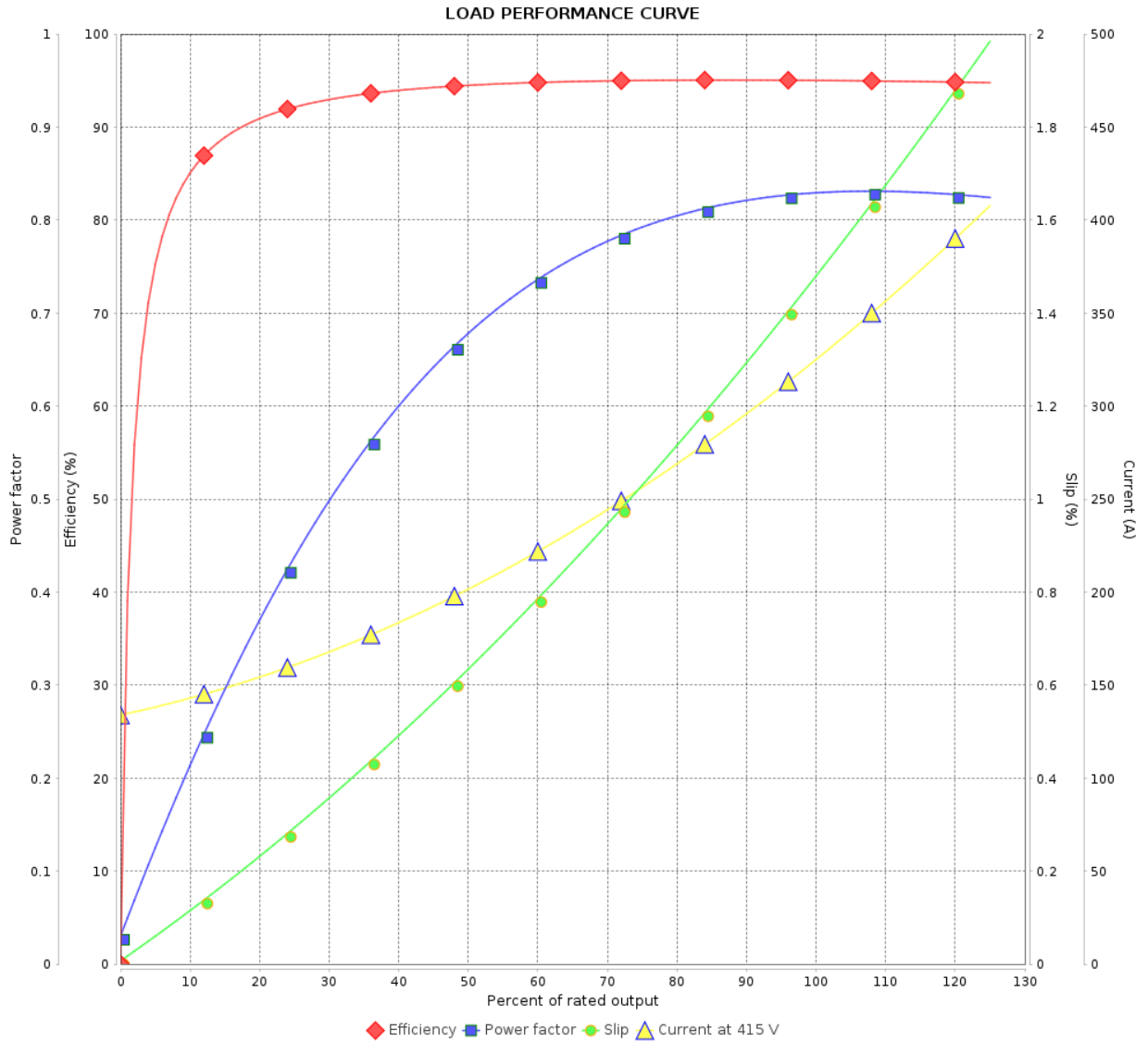
Three Phase Induction Motor - Squirrel Cage



Customer : _____

Product line : W22 NEMA Premium Efficiency Three-Phase

Product code : 11166498



Performance : 415 V 50 Hz 6P IE2

Rated current : 326 A
 LRC : 6.0
 Rated torque : 184 kgfm
 Locked rotor torque : 229 %
 Breakdown torque : 229 %
 Rated speed : 985 rpm

Moment of inertia (J) : 6.09 kgm²
 Duty cycle : Cont.(S1)
 Insulation class : F
 Service factor : 1.00
 Temperature rise : 105 K
 Design : B

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