

DATA SHEET



Three Phase Induction Motor - Squirrel Cage

Customer		: Astraprom d.o.o.			
Product line		: W22 IE3 Three-Phase		Product code : 12885654	
Frame	: 200L	Cooling method	: IC411 - TEFC		
Insulation class	: F	Mounting	: B35T		
Duty cycle	: 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 ²	: 274 kg		
Protection degree	: IP55	Moment of inertia (J)	: 0.3202 kgm ²		
Design	: N				
Output [kW]	30	30	30	30	
Poles	4	4	4	4	
Frequency [Hz]	50	50	50	60	
Rated voltage [V]	380/660	400/690	415	460	
Rated current [A]	58.0/33.4	57.1/33.1	56.4	50.0	
L. R. Amperes [A]	423/244	428/248	440	415	
LRC [A]	7.3	7.5	7.8	8.3	
No load current [A]	24.5/14.1	27.0/15.7	29.3	25.6	
Rated speed [RPM]	1480	1480	1485	1785	
Slip [%]					
Rated torque [kgfm]	19.7	19.7	19.7	16.4	
Locked rotor torque [%]	250	280	300	340	
Breakdown torque [%]	280	310	340	350	
Service factor	1.00	1.00	1.00	1.00	
Temperature rise	80 K	80 K	80 K	80 K	
Locked rotor time					
Noise level ²	63.0 dB(A)	63.0 dB(A)	63.0 dB(A)	66.0 dB(A)	
Efficiency (%)	25%				
	50%				
	75%				
	100%				
Power Factor	25%				
	50%				
	75%				
	100%				
Losses at normative operating points (speed;torque), in percentage of rated output power					
Losses (%)	P1 (0,9;1,0)	6.6	6.6	6.6	6.1
	P2 (0,5;1,0)	5.8	5.8	5.8	5.3
	P3 (0,25;1,0)	5.4	5.4	5.4	5.0
	P4 (0,9;0,5)	3.1	3.1	3.1	2.9
	P5 (0,5;0,5)	2.3	2.3	2.3	2.1
	P6 (0,5;0,25)	1.5	1.5	1.5	1.4
	P7 (0,25;0,25)	1.1	1.1	1.1	1.0
Bearing type	: Drive end : 6312 ZZ C3 Non drive end : 6212 ZZ C3	Foundation loads			
Sealing	: Oil Seal Lip Seal	Max. traction : 584 kgf			
Lubrication interval	: - -	Max. compression : 857 kgf			
Lubricant amount	: - -				
Lubricant type	: Mobil Polyrex EM				
This revision replaces and cancel the previous one, which must be eliminated.		These are average values based on tests with sinusoidal power supply, subject to the tolerances stipulated in IEC 60034-1.			
(1) Looking the motor from the shaft end.					
(2) Measured at 1m and with tolerance of +3dB(A).					
(3) Approximate weight subject to changes after manufacturing process.					
(4) At 100% of full load.					
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Thermal protection

ID	Application	Type	Quantity	Sensing Temperature
1	Winding	Thermistor - 2 wires	1 x Phase	155 °C

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TORQUE AND CURRENT VS SPEED CURVE

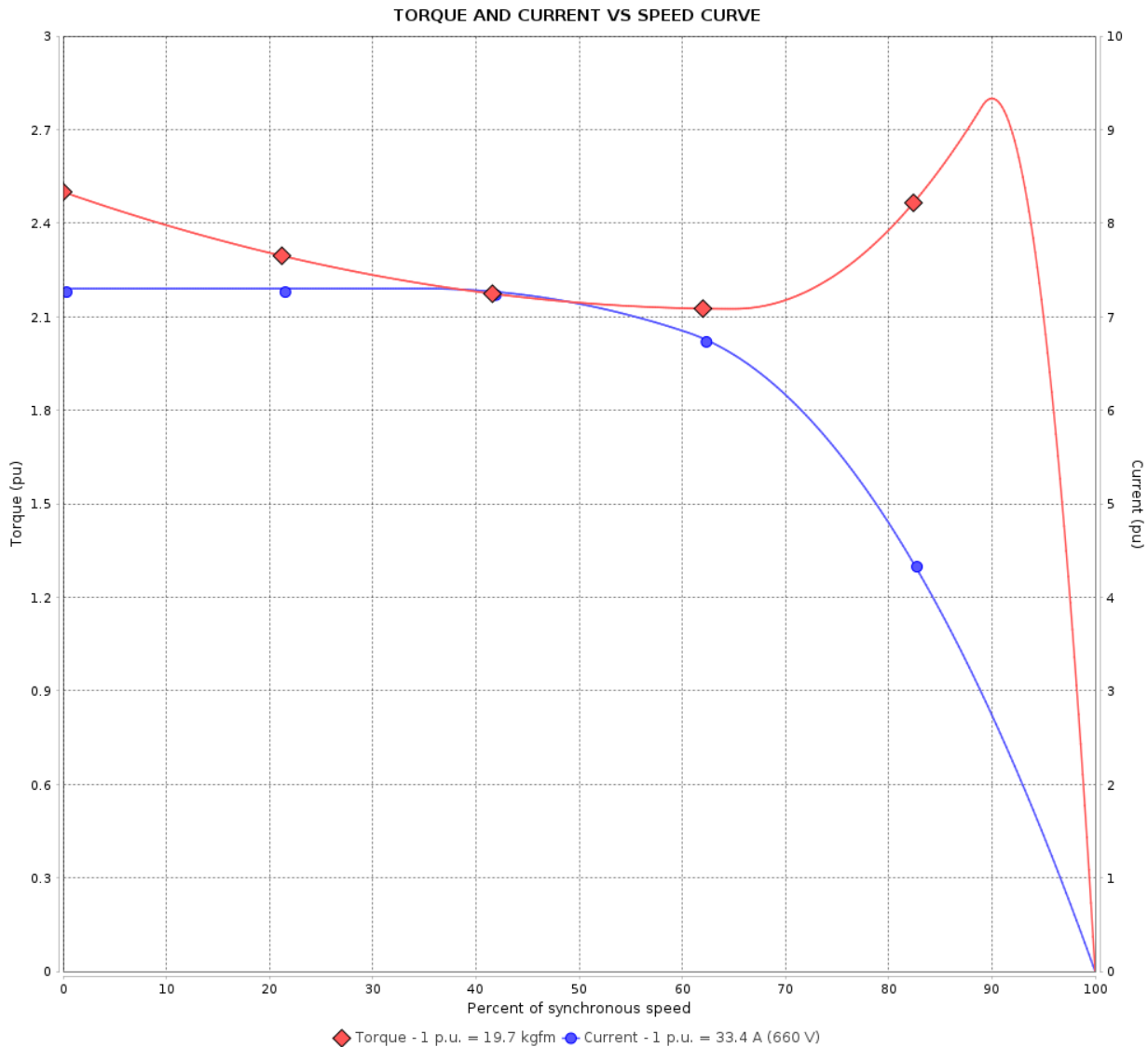
Three Phase Induction Motor - Squirrel Cage



Customer : Astraprom d.o.o.

Product line : W22 IE3 Three-Phase

Product code : 12885654



Performance : 380/660 V 50 Hz 4P

Rated current	: 58.0/33.4 A	Moment of inertia (J)	: 0.3202 kgm ²
LRC	: 7.3	Duty cycle	: S1
Rated torque	: 19.7 kgfm	Insulation class	: F
Locked rotor torque	: 250 %	Service factor	: 1.00
Breakdown torque	: 280 %	Temperature rise	: 80 K
Rated speed	: 1480 rpm	Design	: N

Locked rotor time

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TORQUE AND CURRENT VS SPEED CURVE



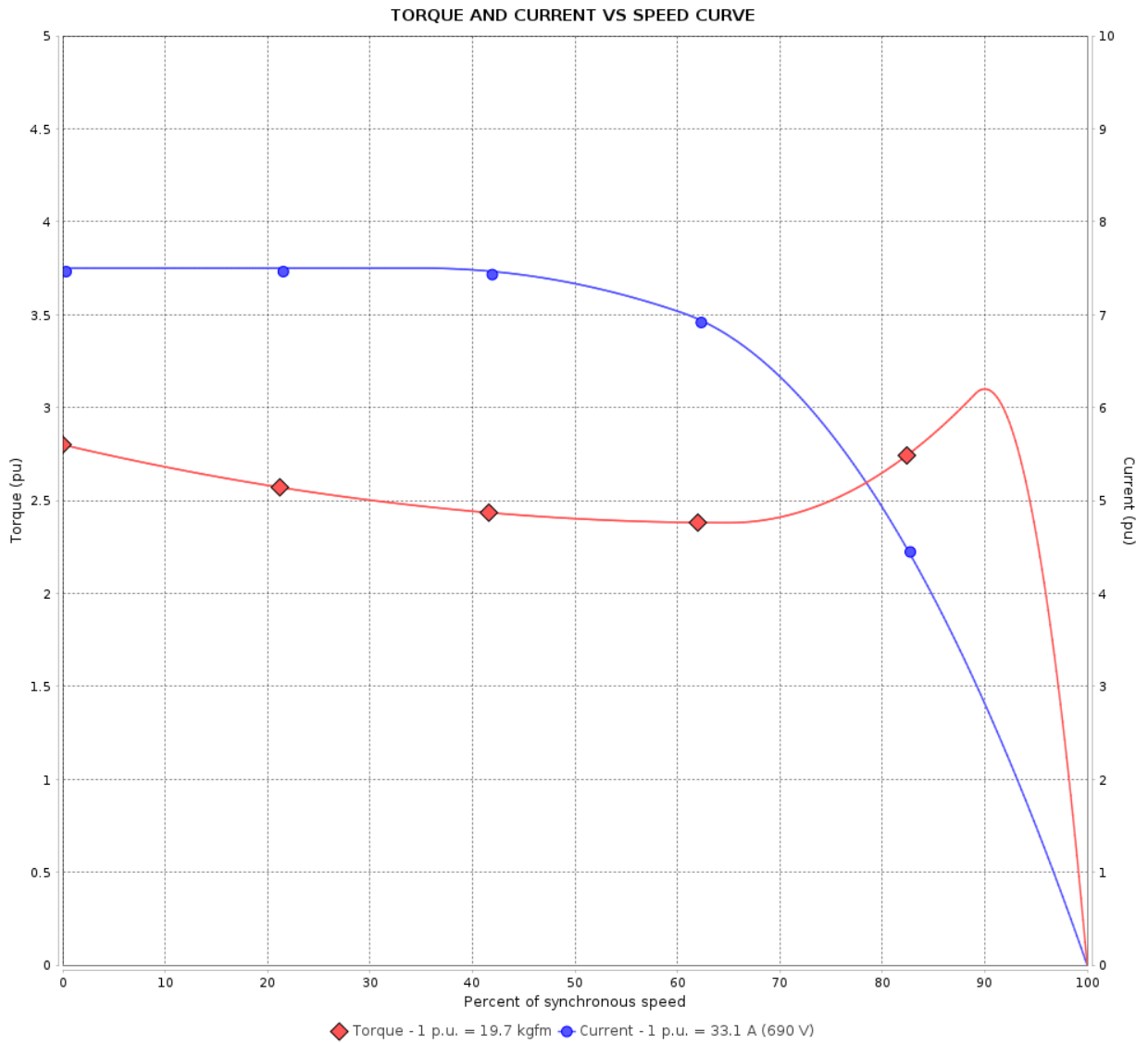
Three Phase Induction Motor - Squirrel Cage

Customer : Astraprom d.o.o.

Product line : W22 IE3 Three-Phase

Product code :

12885654



Performance : 400/690 V 50 Hz 4P

Rated current : 57.1/33.1 A
 LRC : 7.5
 Rated torque : 19.7 kgfm
 Locked rotor torque : 280 %
 Breakdown torque : 310 %
 Rated speed : 1480 rpm

Moment of inertia (J) : 0.3202 kgm²
 Duty cycle : S1
 Insulation class : F
 Service factor : 1.00
 Temperature rise : 80 K
 Design : N

Locked rotor time

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TORQUE AND CURRENT VS SPEED CURVE

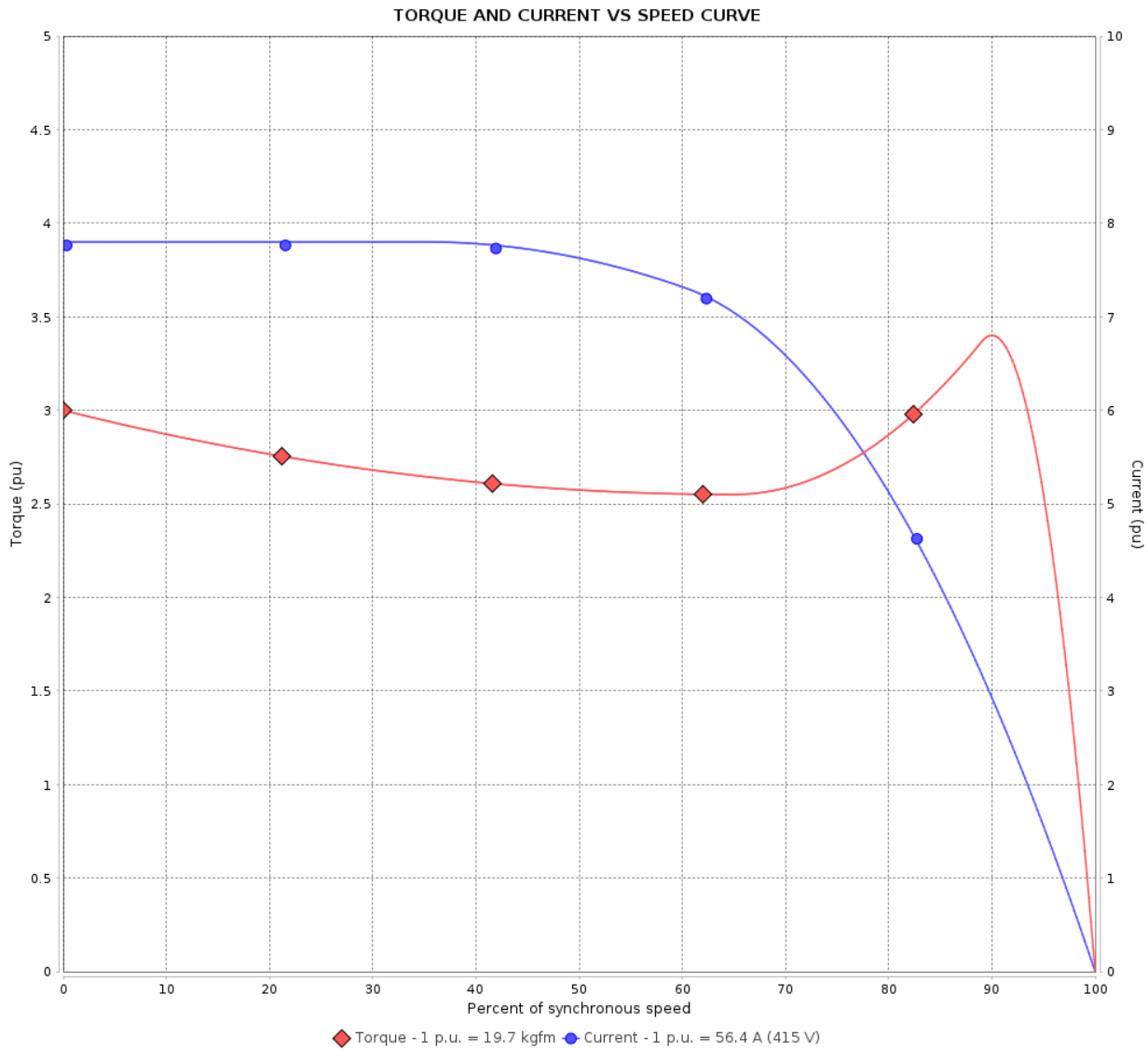
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Customer : Astraprom d.o.o.

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Performance : 415 V 50 Hz 4P

Rated current	: 56.4 A	Moment of inertia (J)	: 0.3202 kgm ²
LRC	: 7.8	Duty cycle	: S1
Rated torque	: 19.7 kgfm	Insulation class	: F
Locked rotor torque	: 300 %	Service factor	: 1.00
Breakdown torque	: 340 %	Temperature rise	: 80 K
Rated speed	: 1485 rpm	Design	: N

Locked rotor time

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TORQUE AND CURRENT VS SPEED CURVE

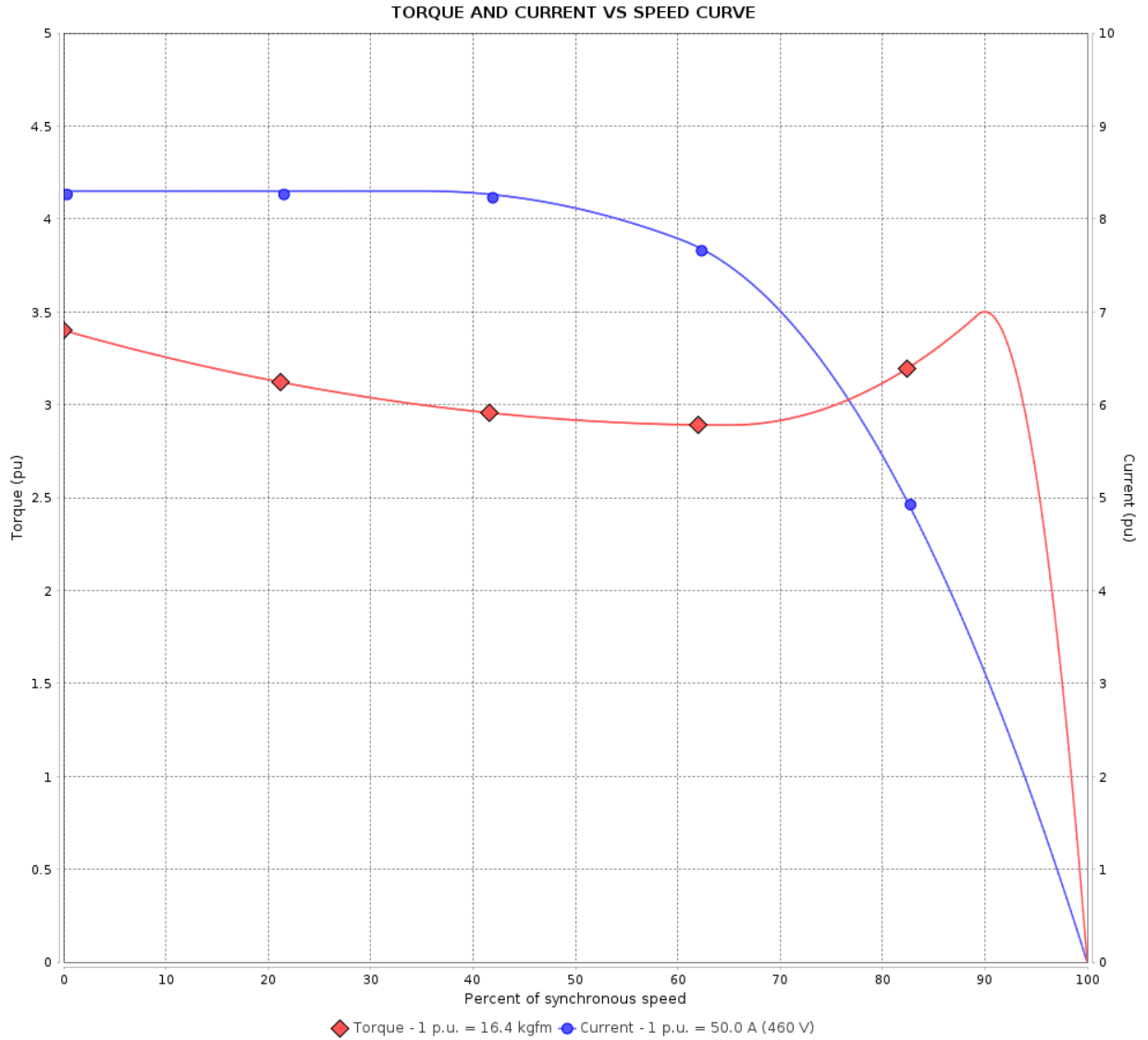


Three Phase Induction Motor - Squirrel Cage

Customer : Astraprom d.o.o.

Product line : W22 IE3 Three-Phase

Product code : 12885654



Performance : 460 V 60 Hz 4P

Rated current	: 50.0 A	Moment of inertia (J)	: 0.3202 kgm ²
LRC	: 8.3	Duty cycle	: S1
Rated torque	: 16.4 kgfm	Insulation class	: F
Locked rotor torque	: 340 %	Service factor	: 1.00
Breakdown torque	: 350 %	Temperature rise	: 80 K
Rated speed	: 1785 rpm	Design	: N

Locked rotor time

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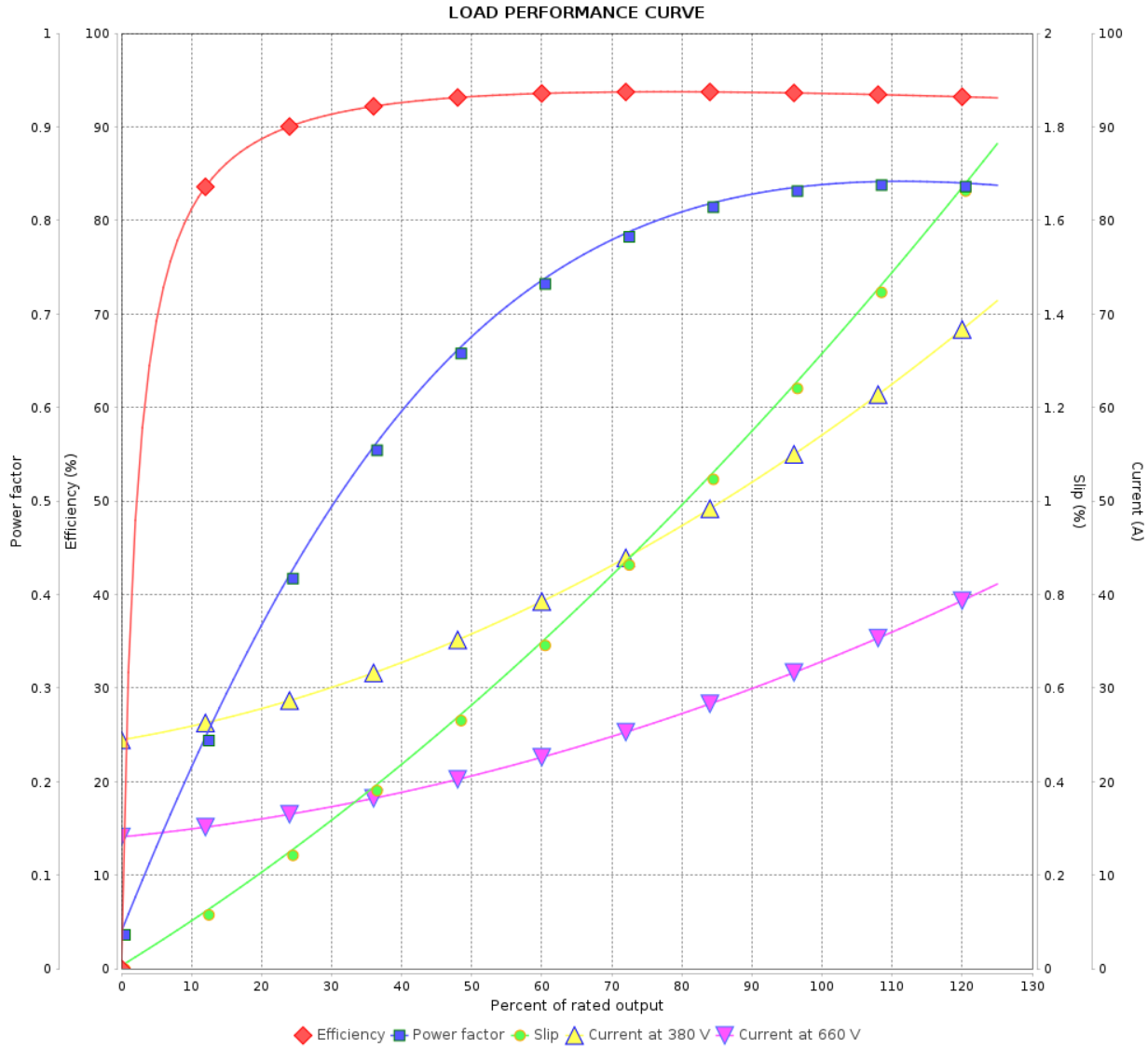
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 LRC : 7.3
 Rated torque : 19.7 kgfm
 Locked rotor torque : 250 %
 Breakdown torque : 280 %
 Rated speed : 1480 rpm

Moment of inertia (J) : 0.3202 kgm²
 Duty cycle : S1
 Insulation class : F
 Service factor : 1.00
 Temperature rise : 80 K
 Design : N

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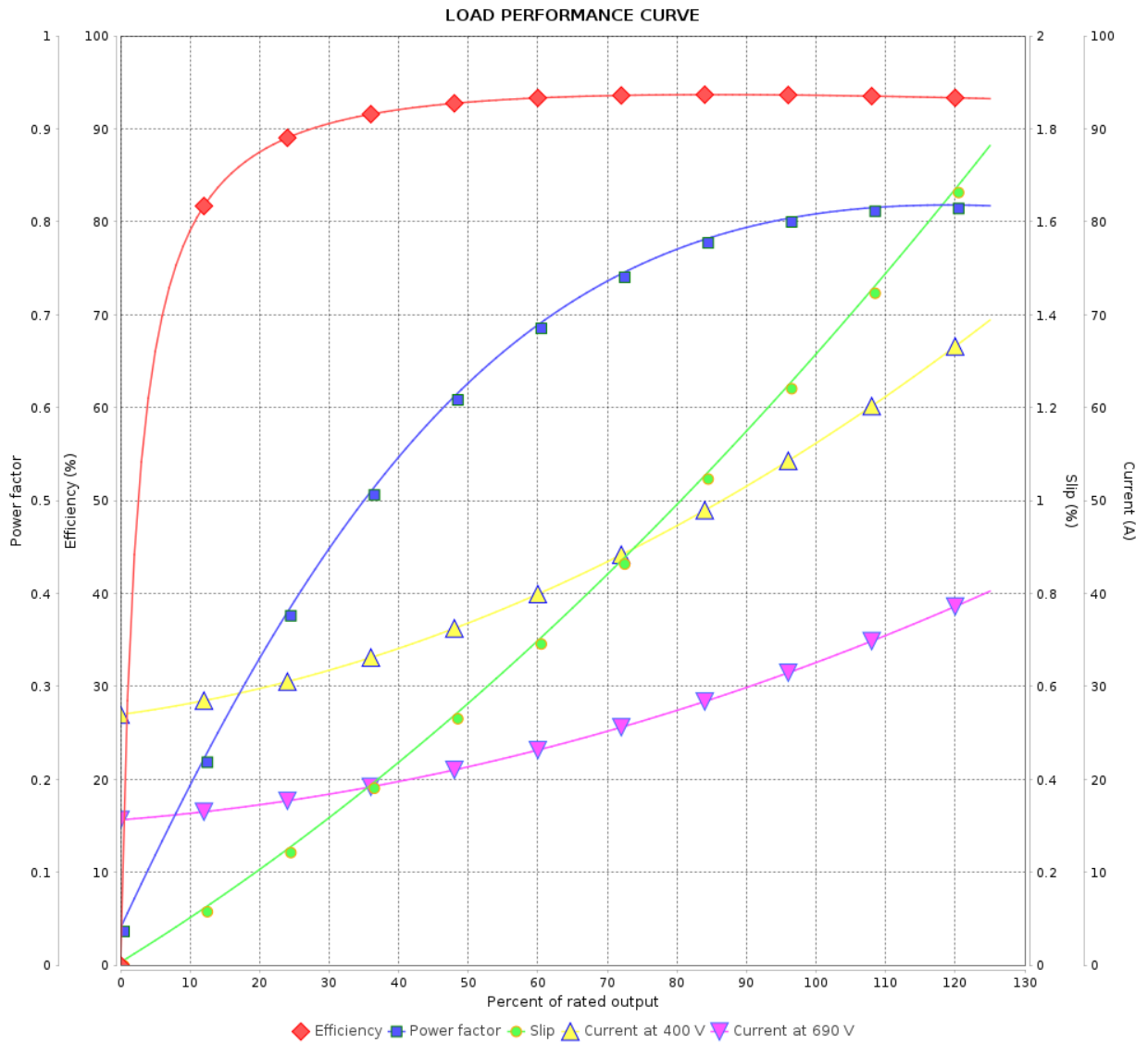
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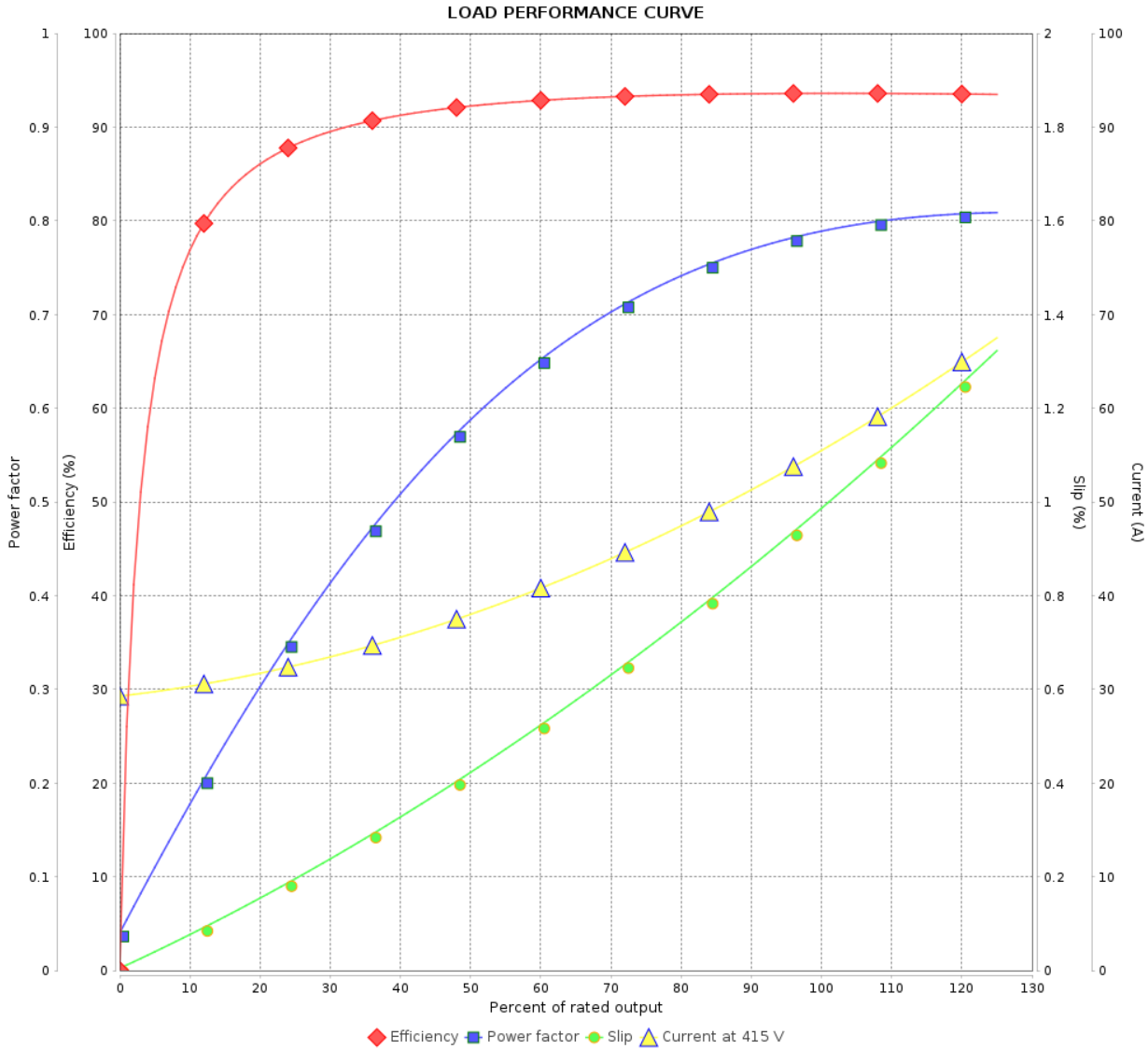
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Rated speed	: 1485 rpm	Design	: N

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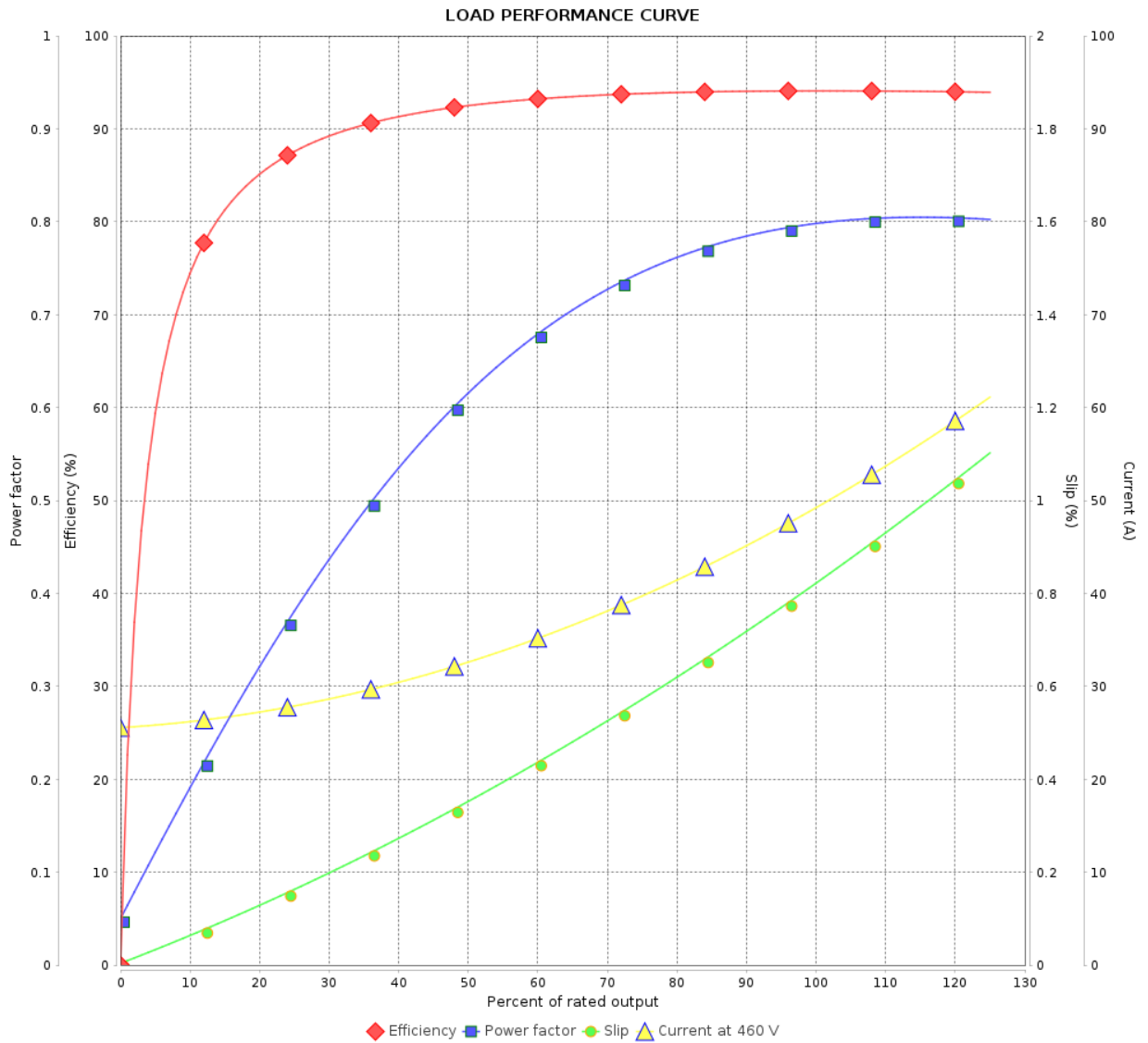
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THERMAL LIMIT CURVE

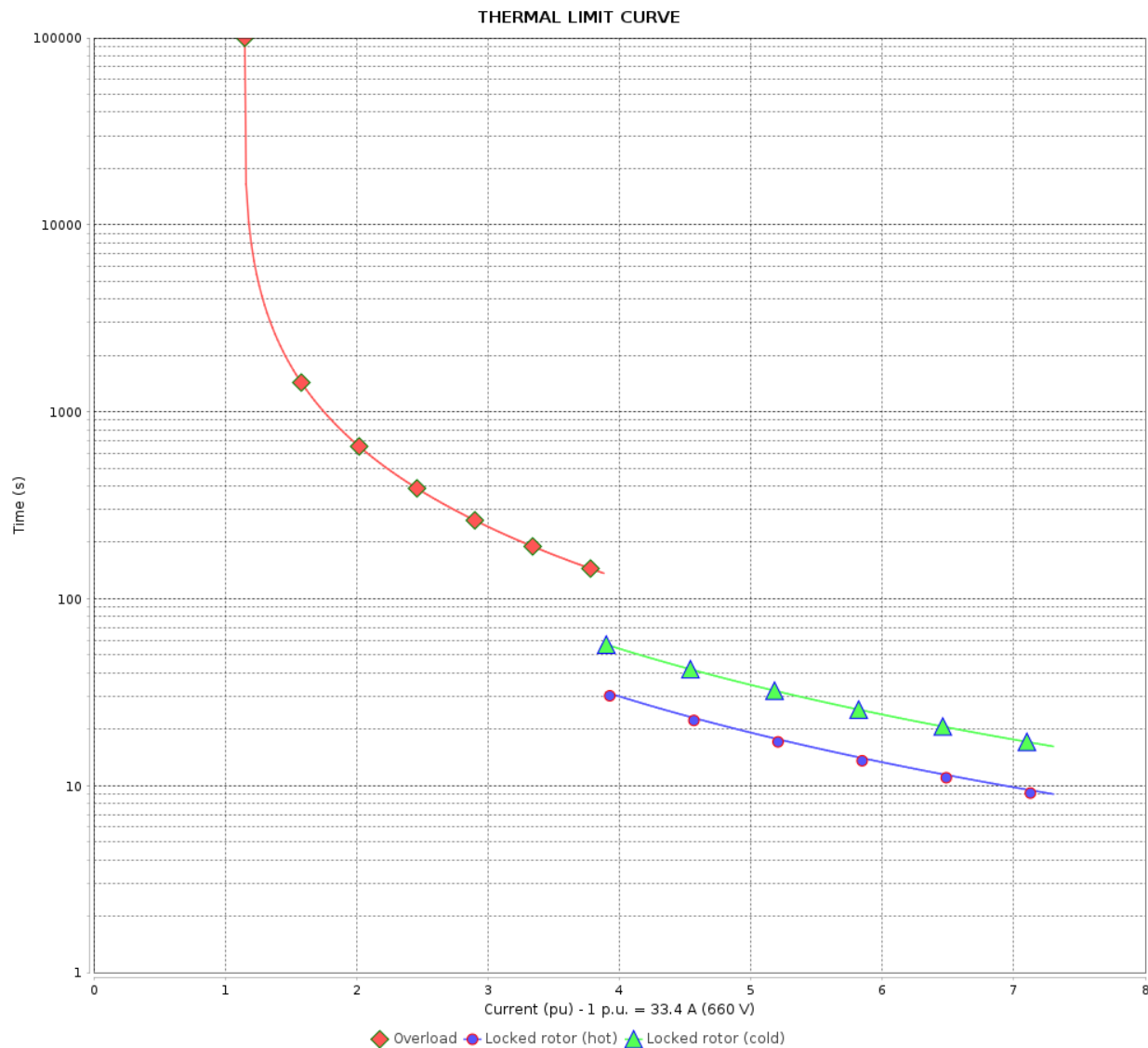
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Heating constant
 Cooling constant

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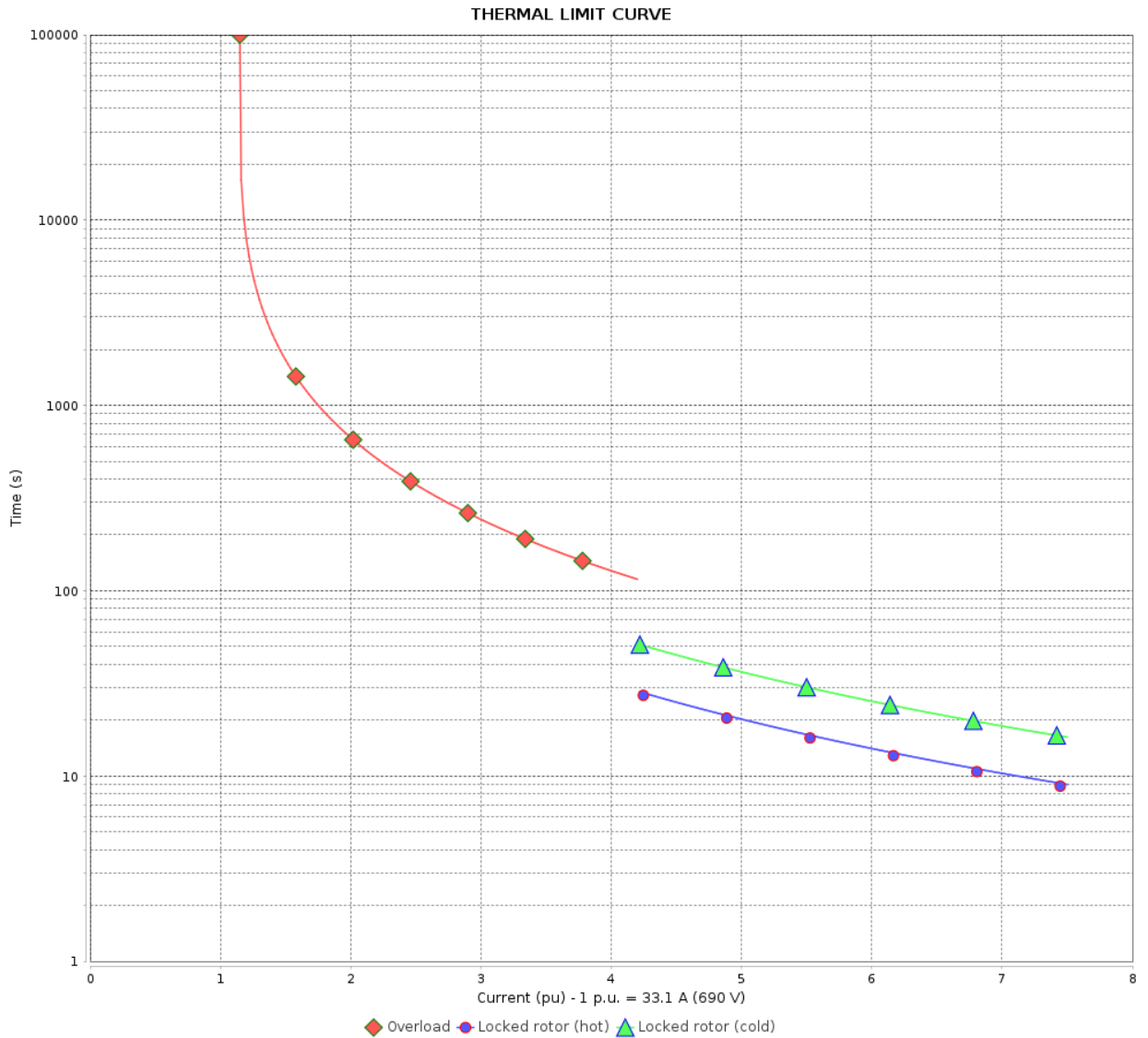
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Cooling constant

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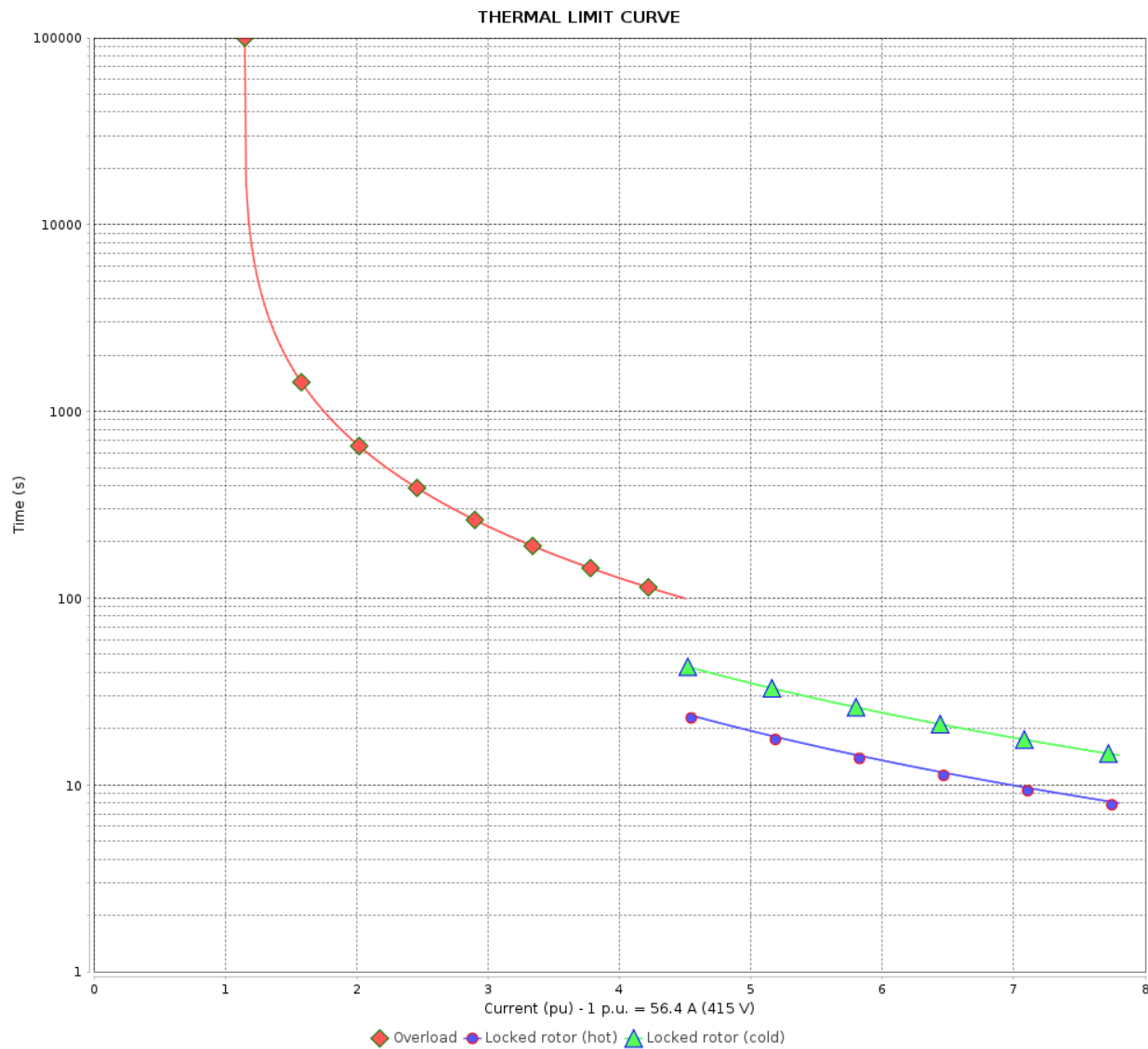
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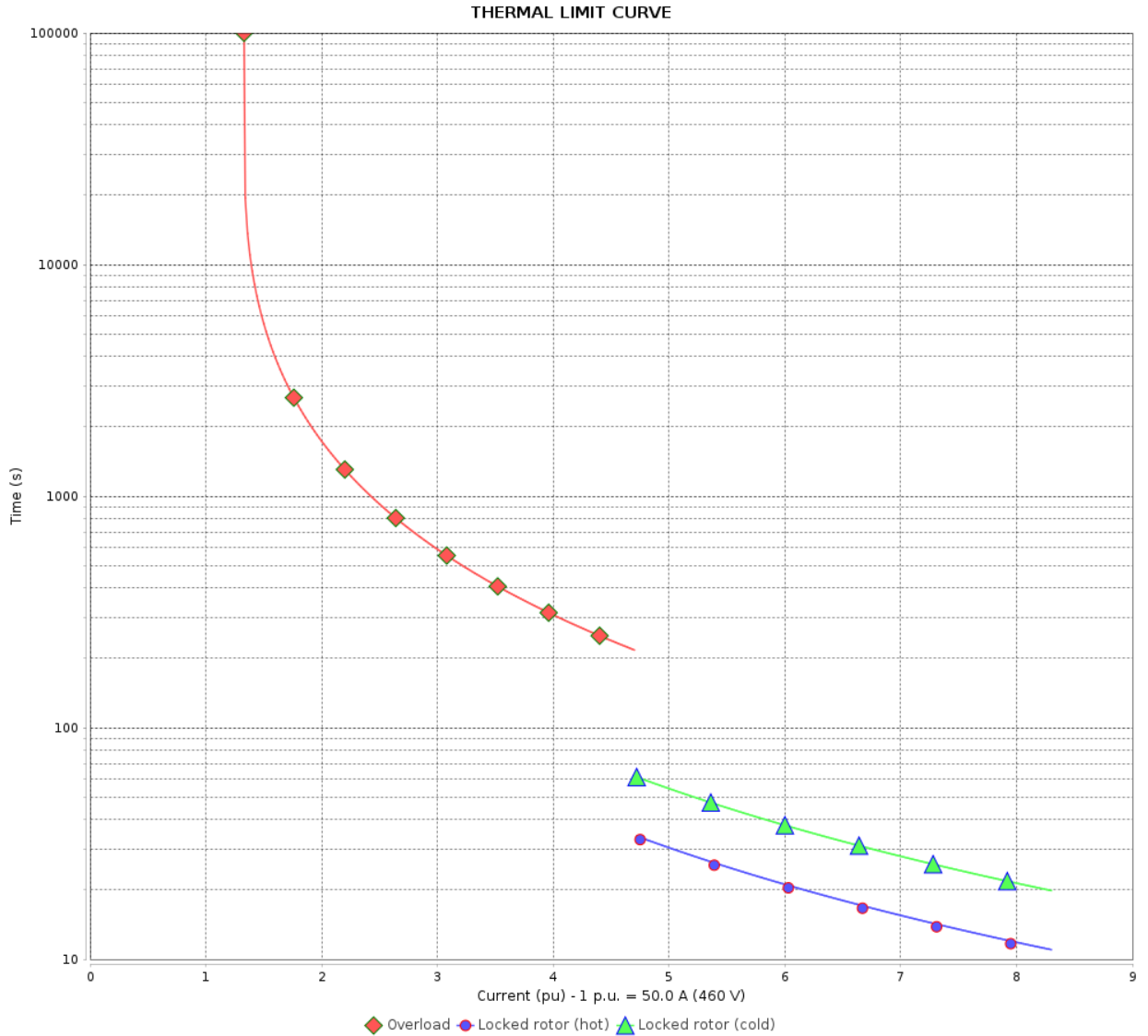
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VFD OPERATION CURVE

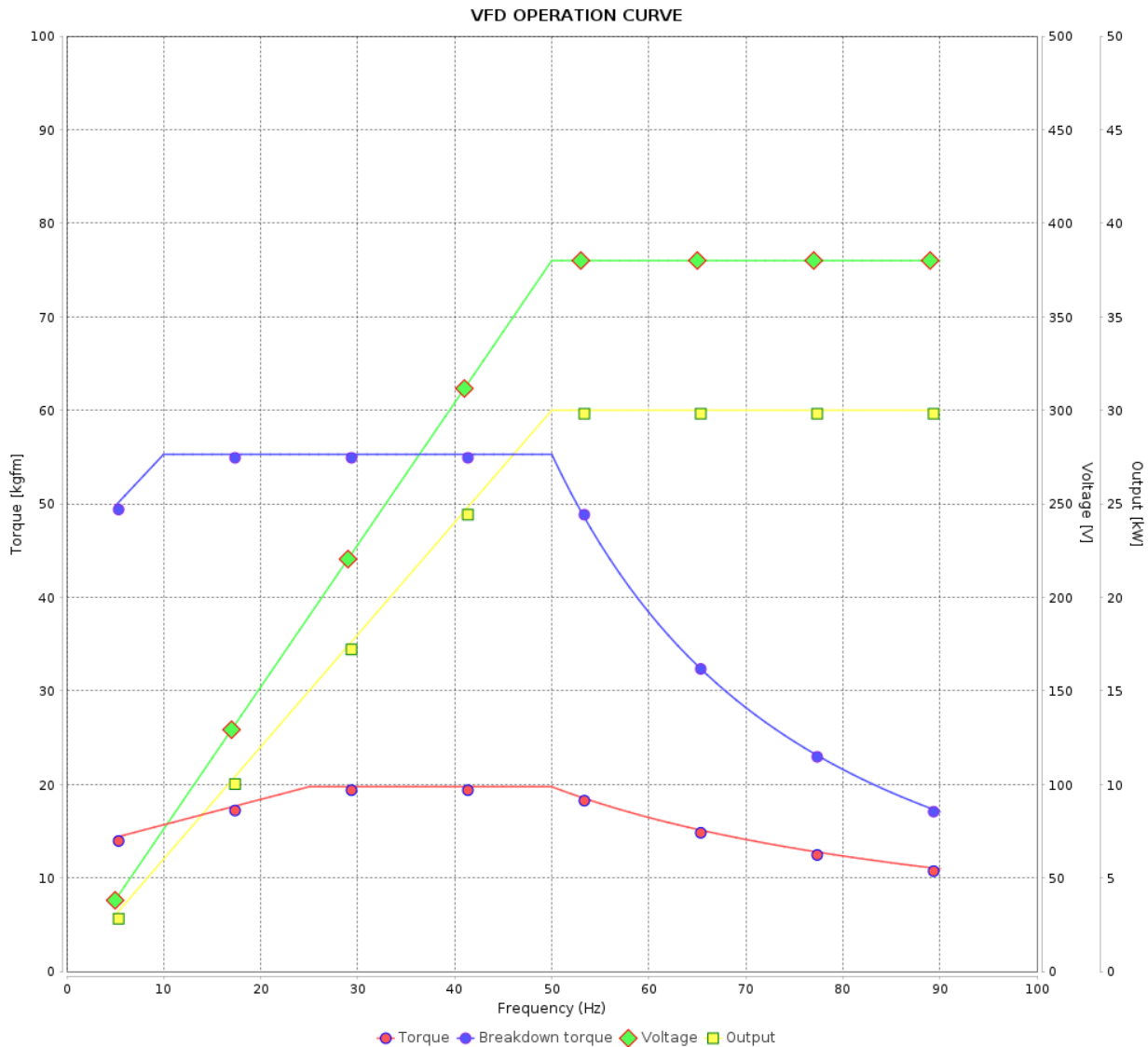
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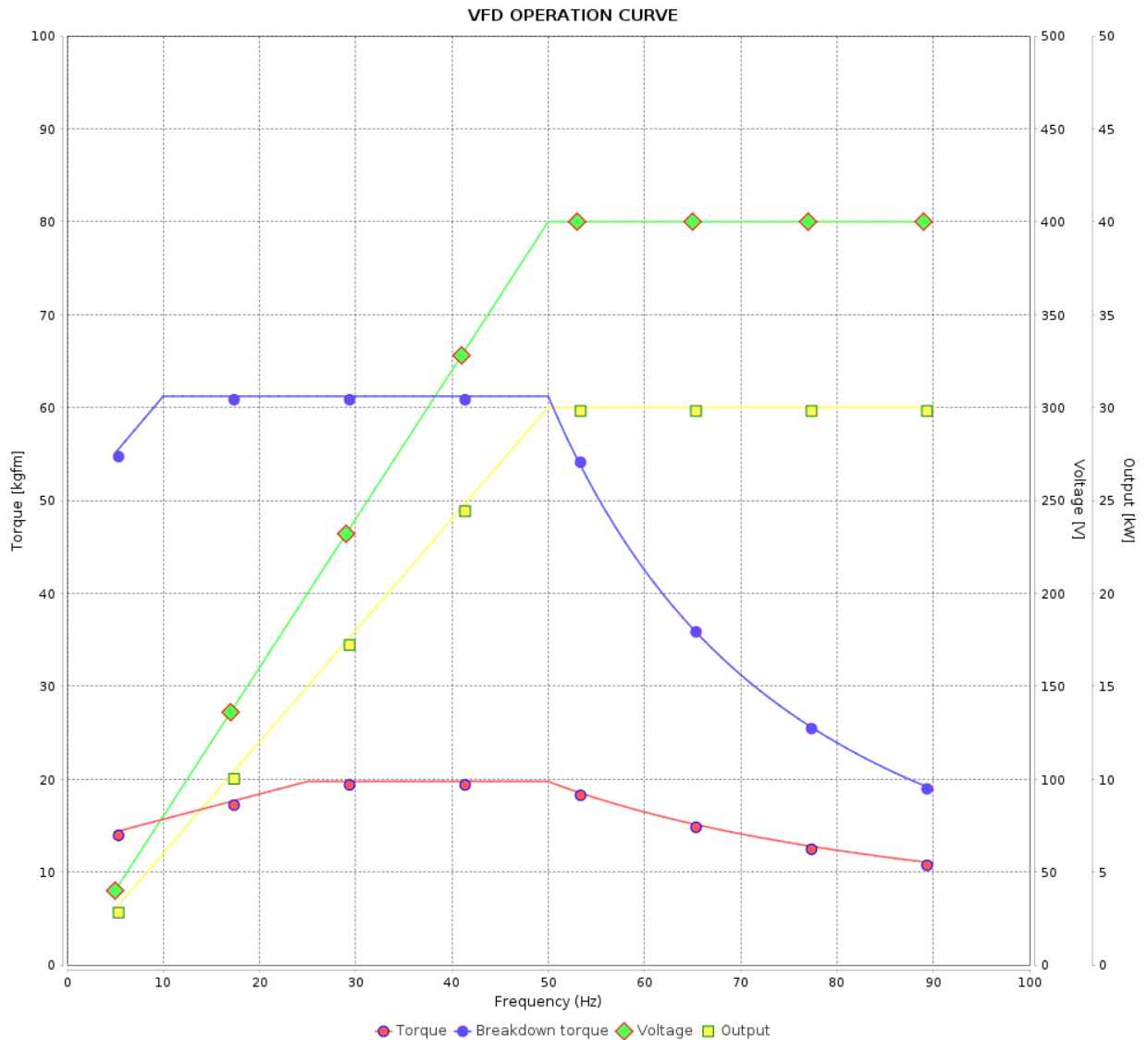
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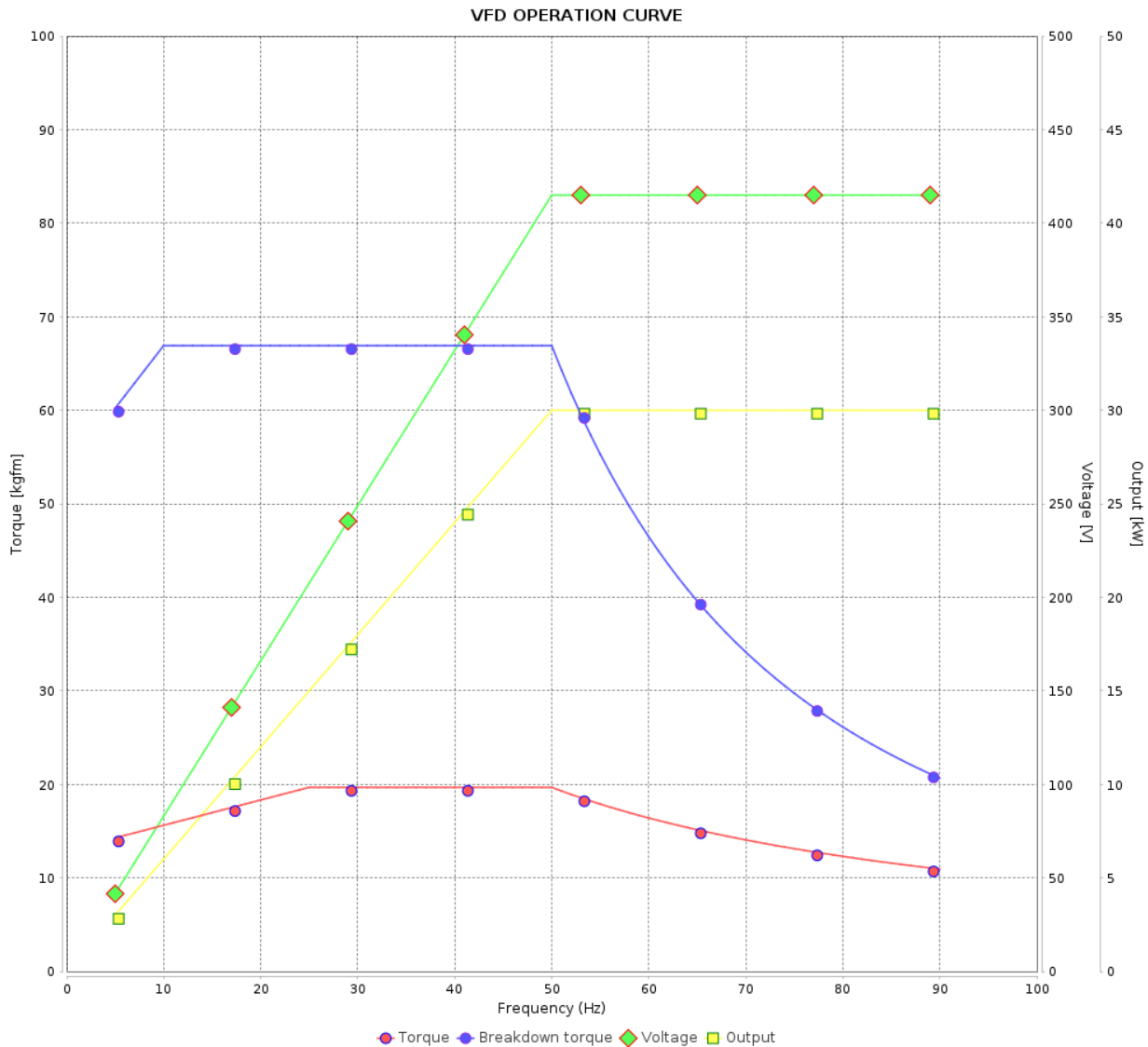
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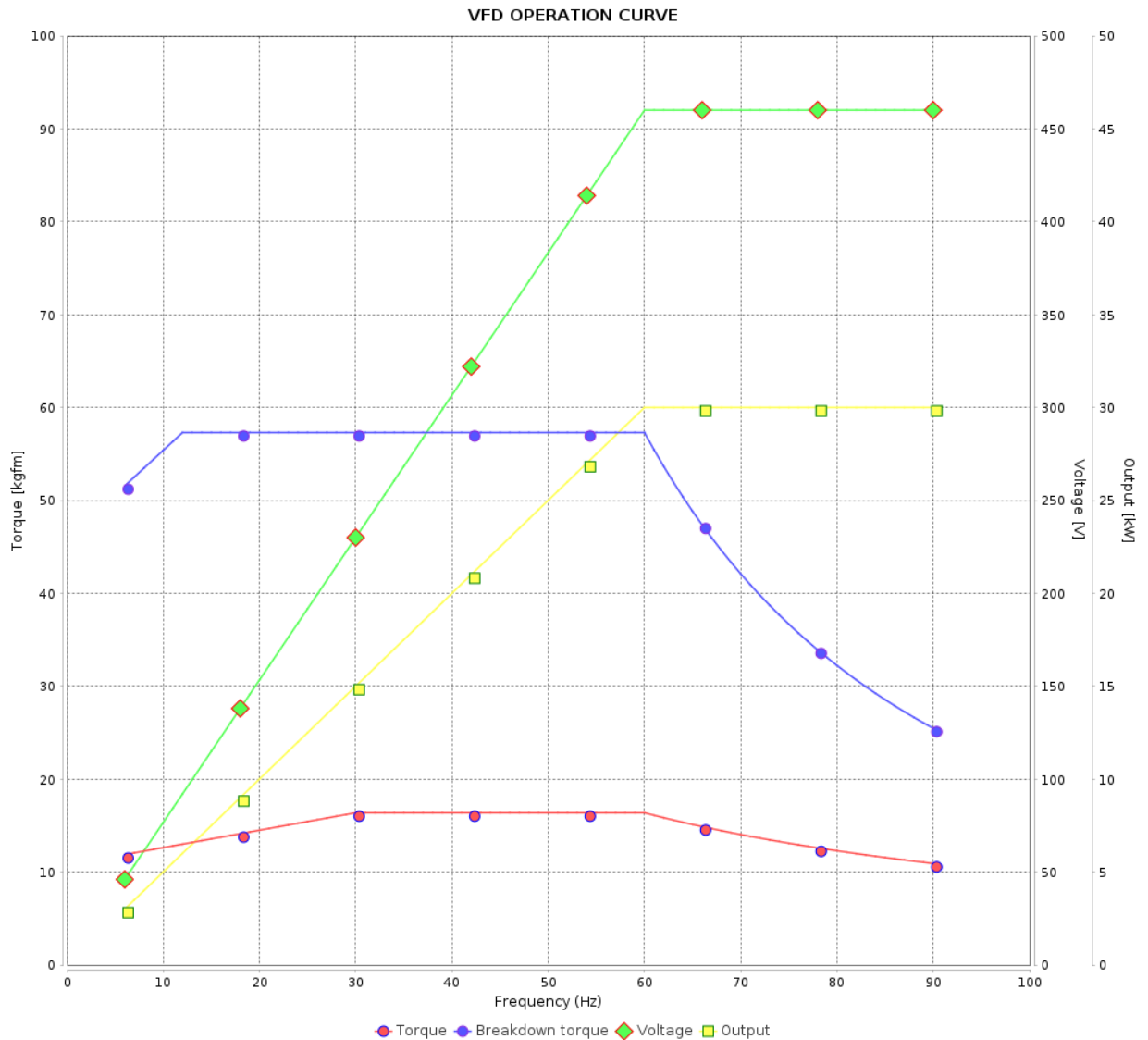
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