

# Type Test Report

Report No.: TTR3IA10800A1SL

## Test Result Data

### Nameplate data

Type:	HMA3 801-2	Protection Class.:	IP55
Voltage:	400 V	Duty:	S1
Current:	1.71 A	Frequency:	50 Hz
Output:	0.75 kW	Efficiency.:	82.1 %
Connection:	Y	Cos $\phi$ :	0.77
Speed:	2910 rpm	Insulation Class:	F

### No-Load test at rated voltage

No load loss:	69.9 W	No load current:	1.12 A
Machine loss:	16 W	Core loss:	26.3 W
Sound pressure level 1m:	58 dB(A)	Vibration:	1.2 mm/s

### Temperature rise test

Voltage:	400.0 V	Current:	1.71 A
Power:	0.75 kW	Temperature - rise:	37 K
Winding hotspot temperature:	51 °C	Bearing temperature:	34 °C
Frequency:	50 Hz	Ambient temperature:	15 °C

### Load performance test

Load %	Un V	f Hz	P1 KW	I1 A	N rpm	T Nm	Cos $\phi$ Cos $\phi$	Eff ( $\eta$ ) %
125	400	50	1.16	2.02	2883	3.11	0.83	80.80
<b>100</b>	<b>400</b>	<b>50</b>	<b>0.91</b>	<b>1.71</b>	<b>2910</b>	<b>2.48</b>	<b>0.77</b>	<b>82.10</b>
75	400	50	0.68	1.46	2935	1.86	0.68	82.40
50	400	50	0.47	1.27	2958	1.24	0.53	80.30
25	400	50	0.27	1.14	2978	0.62	0.34	70.10

### Locked rotor test at rated voltage

Input power:	7.0 kW	Cos $\phi$ :	0.71
Starting current:	14.32 A	Starting torque:	7.36 Nm
Starting/Rated current:	8.37	Starting/Rated torque:	2.96

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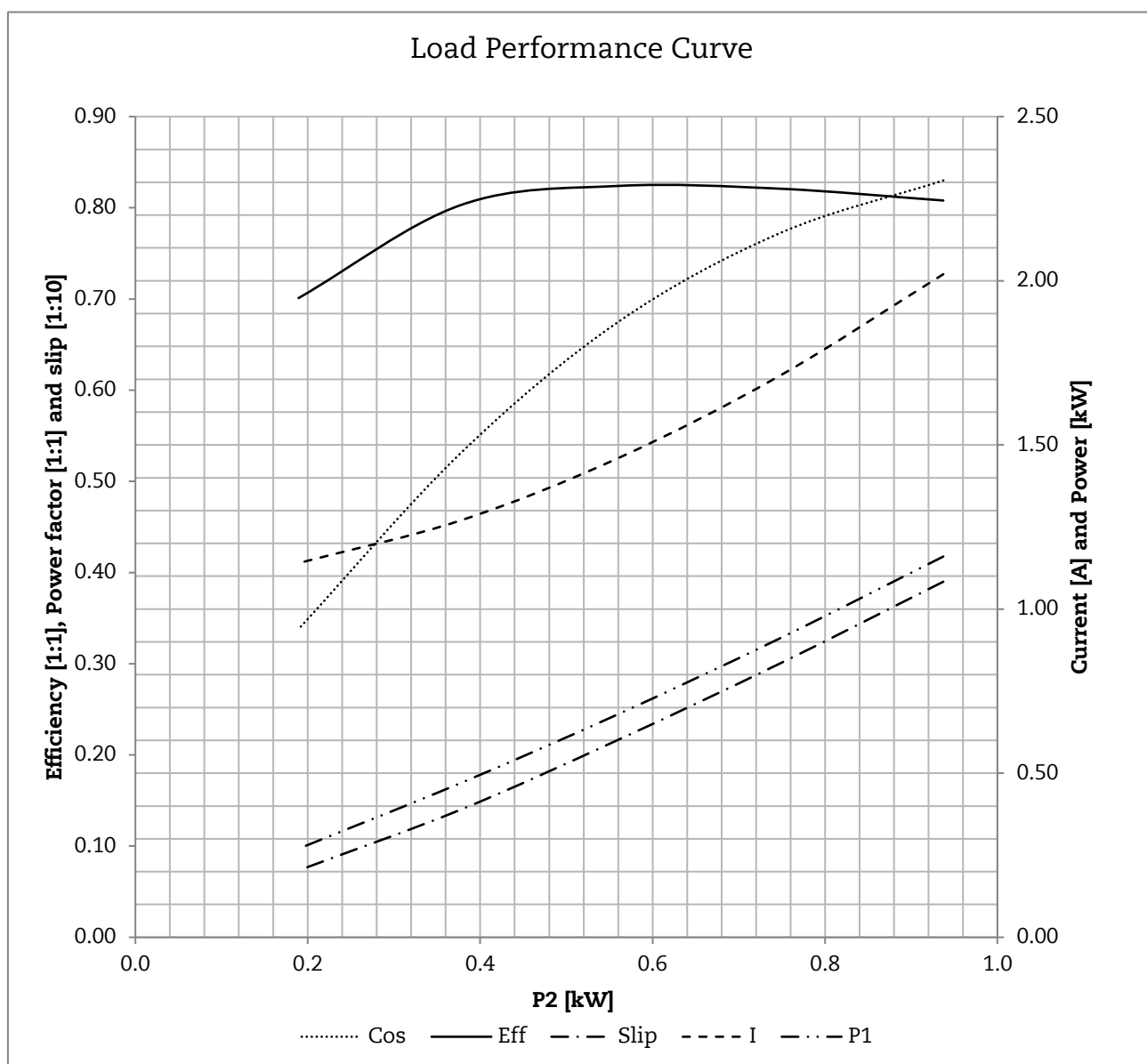
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Data are not binding. Hoyer reserves the right to implement changes without notice. The extent of data are not equivalent to nameplate on the motors.

## Load test data

P2 kW	P1 kW	Eff ( $\eta$ ) P2/P1	I A	T Nm	Cos $\phi$
0.9	1.2	0.808	2.02	3.1	0.83
0.7	0.9	0.821	1.71	2.5	0.77
0.6	0.7	0.824	1.46	1.9	0.68
0.4	0.5	0.803	1.27	1.2	0.53
0.2	0.3	0.701	1.14	0.6	0.34



## No-load test data at rated frequency

U <sub>o</sub> V	I <sub>o</sub> A	P <sub>o</sub> W	P <sub>cul.</sub>
500.0	3.10	327.0	217.0
440.0	1.64	119.0	63.0
400.0	1.10	71.0	28.0
320.0	0.64	40.0	9.4
280.0	0.52	36.0	6.5
240.0	0.43	29.0	4.3
200.0	0.35	25.0	2.9
160.0	0.28	21.0	1.8
120.0	0.23	20.0	1.2
100.0	0.20	22.0	0.6

