

# Type Test Report

Report No.: TTR3IA21320A1SL

## Test Result Data

### Nameplate data

Type:	HMA3 132S-4	Protection Class.:	IP55
Voltage:	400 V	Duty:	S1
Current:	10,74 A	Frequency:	50 Hz
Output:	5,5 kW	Efficiency.:	89,7 %
Connection:	Y	Cos $\phi$ :	0,82
Speed:	1465 rpm	Insulation Class:	F

### No-Load test at rated voltage

No load loss:	249,8 W	No load current:	5,09 A
Machine loss:	35,1 W	Core loss:	159,5 W
Sound pressure level 1m:	61 dB(A)	Vibration:	0,9 mm/s

### Temperature rise test

Voltage:	400,0 V	Current:	10,74 A
Power:	5,50 kW	Temperature - rise:	49 K
Winding hotspot temperature:	74 °C	Bearing temperature:	67 °C
Frequency:	50 Hz	Ambient temperature:	24 °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	7,74	13,20	1455	45,14	0,85	88,85
<b>100</b>	<b>400</b>	<b>50</b>	<b>6,13</b>	<b>10,74</b>	<b>1465</b>	<b>35,86</b>	<b>0,82</b>	<b>89,68</b>
75	400	50	4,58	8,65	1475	26,71	0,77	89,99
50	400	50	3,09	6,92	1484	17,70	0,64	88,97
25	400	50	1,66	5,57	1492	8,80	0,43	83,12

### Locked rotor test at rated voltage

Input power:	38,3 kW	Cos $\phi$ :	0,59
Starting current:	94,11 A	Starting torque:	100,86 Nm
Starting/Rated current:	8,76	Starting/Rated torque:	2,81

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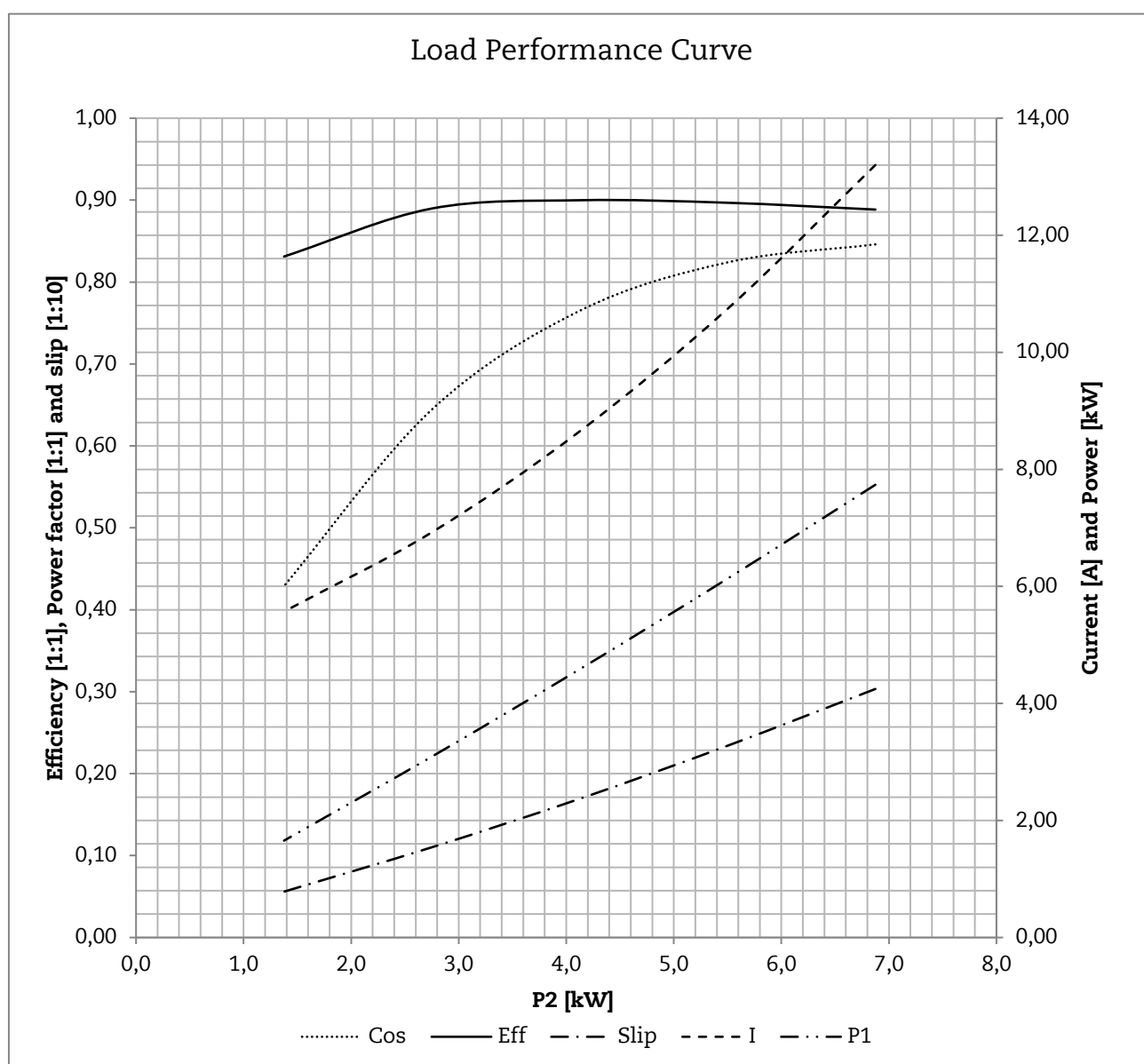
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Data are not binding. Hoyer reserves the right to implement changes without notice. The extent of data are not equivalent to nameplate on the motors.

## Load test data

P2 kW	P1 kW	Eff ( $\eta$ ) P2/P1	I A	T Nm	Cos $\phi$
6,9	7,7	0,889	13,20	45,1	0,85
5,5	6,1	0,897	10,74	35,9	0,82
4,1	4,6	0,900	8,65	26,7	0,77
2,7	3,1	0,890	6,92	17,7	0,64
1,4	1,7	0,831	5,57	8,8	0,43



## 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>
499,9	11,35	633,0	289,1
439,1	6,61	342,0	98,0
399,1	5,05	251,0	57,2
319,3	3,53	153,0	28,0
280,0	3,02	127,0	20,5
239,7	2,52	104,0	14,2
199,9	2,07	85,0	9,6
160,1	1,63	63,0	6,0
120,0	1,23	50,0	3,4
100,0	1,05	41,0	0,9

