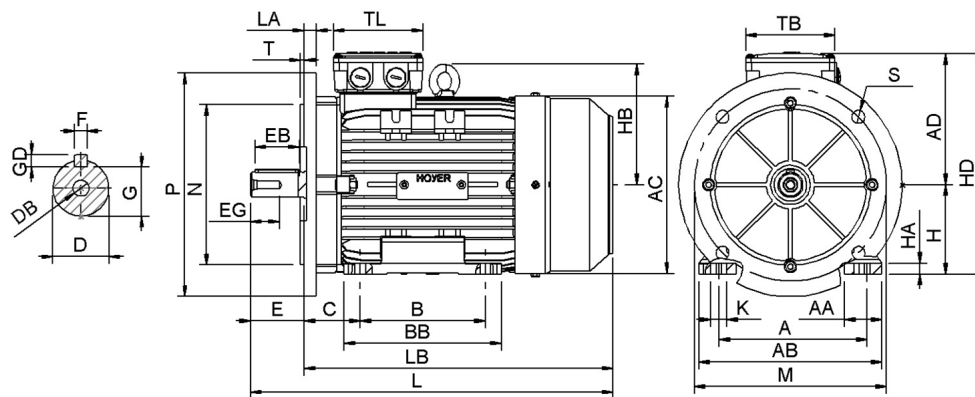


# Data Sheet

Itemnumber..... 5541120459



A = 190	AC = 219	BB = 180	DB = M10	EG = 28	GD = 7	HB = 145	L = 430	M = 215	S = 4-Ø14,5	TL = 120
AA = 45	AD = 168	C = 70	E = 60	F = 8	H = 112	HD = 280	LA = 14	N = 180	T = 4	
AB = 222	B = 140	D = 28	EB = 50	G = 24	HA = 13	K = 12	LB = 370	P = 250	TB = 120	

## Version

Type..... HMA3 112M-4  
Design..... Induction motor  
Standard series..... IEC 60034  
Phase / Voltage range..... 3~ / Low

## Electrical design

Efficiency..... IE3  
Pole..... 4  
Power at 50 Hz (kW)..... 4,00  
Hz..... 50  
Voltage..... 230VD/400VY  
Winding voltage..... 230VD/400VY 50 Hz  
Power output (kW)..... 4,00  
Duty..... S1  
Insulation class..... F  
Temperature rise..... B

## Mechanical design

Frame size..... 112  
Mounting..... B35  
Rain cap..... No  
Protection class..... IP55  
Cooling method..... IC411/TEFC  
External grounding..... Yes  
Drain hole..... Yes  
Frame material..... Aluminium  
Material approval..... None  
Shaft..... IEC standard  
Key..... Closed key  
Balancing..... Half key balancing  
Vibration class..... Grade-A  
Weight (kg)..... 41,4

## Environment condition

Ambient temp. min. (°C)..... -20  
Ambient temp. max. (°C)..... 40  
Altitude (mtr up to)..... 1000

## Bearing

DE Bearing..... 6306-ZZ/C3  
NDE Bearing..... 6306-ZZ/C3  
Fixed bearing..... DE

## Terminal box

Tbox position..... Top  
Cable entry direction..... Right (from DE)  
Cable entry  
Main..... 2 x M20x1,5  
Plastic blindcaps  
Accessory..... 1 x M20x1,5  
Plastic blindcap  
Terminal board thread..... 6-M5

## Motor protection

Thermal protection main..... PTC 3x 155 dgr  
Thermal protection second.. None  
Space heater..... None  
Temperature detector..... No  
SPM..... No  
IR wire..... No  
Tropical insulation..... No

## Explosion protection

According to..... None  
Type of protection..... None

## General

Direction of rotation..... CW  
Painting..... RAL 9005  
Nameplate..... Multivoltage  
Special packing..... No  
Special requirements..... No

## Test values

Rotor inertia (kgm²)..... 0,016  
Noise level (dB(A))..... 58  
No load current (A)..... 3,90  
Winding resist. (ohm)..... 0,94  
Starting time (sec.)..... 0,04  
Temp. rise winding (K)..... 54  
Temp. rise surface (K)..... 47

Rated power (kW)	4,00	3,90	4,80	4,65
Frequency (Hz)	50	50	60	60
Voltage (V)	230 400	220 380	280 480	440
Connection	D Y	D Y	D Y	Y
Full load current (A)	13,6 7,85	14,0 8,10	13,6 7,85	8,10
Speed (rpm)	1460	1460	1750	1750
Power factor cos(phi)	0,83	0,84	0,83	0,85
Efficiency, 100/75/50 (%)	88,6/ 89,1 /88,2	88,6/ 89,1 /88,2	88,6/ 89,1 /88,2	87,8/ 88,3 /87,4
Ist/In	9,35	8,25	9,35	8,60
Full load torque (Nm)	26,0	25,5	26,0	25,5
Tst/Tn	3,10	2,90	3,10	2,70
Tmax/Tn	3,30	3,05	3,30	2,85
Duty	S1	S1	S1	S1
Ambient temp. (°C)	40	45	40	45