

IEC LV MOTORS

Motor data sheet

M3AA 100LE 4

Definition	Data	Unit	Remarks
Product code	3GAA102550-**K		CalcId: 3GZF021010-1070
Voltage code	D		
Type/Frame	M3AA 100LE 4		
Design	BASIC		
Efficiency class	IE3		IEC 60034-2-1:2014
Rated output P _N	2.2	kW	
Rated voltage U _N	400	V	± 5 % (IEC 60034-1)
Rated frequency f _N	50	Hz	± 2 % (IEC 60034-1)
Rated speed n _N	1454	r/min	
Rated current I _N	4.3	A	
Starting current I _S /I _N	8.9		
Nominal torque T _N	14.5	Nm	
Locked rotor torque T _l /T _N	3.1		
Maximum torque T _b /T _N	4.1		
Efficiency - full load 100%	86.7	%	IEC 60034-2-1:2014
Efficiency - 75%	87.1	%	
Efficiency - 50%	86.0	%	
Power factor - full load 100%	0.83		
Bearing DE/NDE	6306-2Z/C3 6205-2Z/C3		
Sound pressure level L _{pA} dB	54	dB(A)	+3dB(A)
Moment of inertia J = ¼ GD ² kgm ²	0.014	kg-m ²	
Weight	36	kg	
Ambient temperature	40	°C	
Motor losses at VSD operating points	losses in efficiency %	losses in Watt	losses in relative to nom. power %
VSD Speed 90% Torque 100%	85.6	333	15.1
VSD Speed 50% Torque 100%	79.4	285	13.0
VSD Speed 25% Torque 100%	62.4	331	15.1
VSD Speed 90% Torque 50%	85.2	172	7.8
VSD Speed 50% Torque 50%	81.7	123	5.6
VSD Speed 50% Torque 25%	76.2	86	3.9
VSD Speed 25% Torque 25%	65.8	72	3.2