M3-E

Technical features

Power supply
Three-phase voltage 127/220V 50Hz, 200/346V 50Hz, or 210/363V 60 Hz; suitable for use with an inverter from 20Hz to the base frequency with constant torque load profile.

Polarity
2 poles.

Conformity with European Directives
Low Voltage 2006/95/EC, ATEX 94/9/EC.

Reference Regulations
IEC/EN 60079-0, IEC/EN 60079-7, IEC/EN 61241-0, IEC/EN 61241-1, EN 60034-1.

Controls
The components that affect protection are 100% accurately controlled and recorded.

Functioning
Continual service (S1) at maximum declared centrifugal force and electric power. Intermittent services are also possible depending on the type of vibrator and the operating conditions. For detailed information contact our technical assistance office.

Centrifugal force
Range up to 311 kgf (3.05 kN). Centrifugal force can be changed by adjusting the eccenctric weights.

Mechanical protection
IP 66 according to IEC 529, EN 60529.

Protection against mechanical impacts
IK 08 according to IEC 68, EN 50102.

Insulation class
Class F (155°C).

Tropicalization
Standard with vacuum encapsulation.

Ambient temperature
From -10°C to +40°C, on request it is possible to have vibrators for max. ambient temperatures of +55°C.

Vibrator thermal protectIon
On request with PTC thermistor rated heat detectors 130°C (DIN 44081-44082).

Fixing of the vibrator
In all positions and therefore without restriction. The terminal box is positioned underneath the vibrator, on the same side as the fixing base.

Lubrication
Sealed ball bearing, lubricated “for life”.

Terminal box
The terminal box is positioned underneath the vibrator, on the same side as the fixing base. Special shaped terminals allow to fix the power supply cable, protecting it from loosening.

Electric motor
Three-phase asynchronous type. Insulated windings using vacuum encapsulating. The rotor is die cast aluminium.

Casing
In high-tensile aluminium alloy, with sand-blasted surface.

Bearing flange
In ductile cast iron. The geometry of the flange transmits the load to the casing uniformly.

Motor shaft
In treated steel alloy (Isothermic hardening) resistant to stress.

Eccentric weights
Easily adjustable from 100% down to 0.

Weight covers
Made in die cast, high strength alluminum alloy with accurate surface sand blasting.

Other features
For the M3-E series, the user must fill the terminal box with suitable silicone, after having performed the connection.

M3-E

2 poles - 3000/3600 rpm

	Description			Mechanical specifications								Electrical specifications									
				Static moment* kgmm		Centrifugal force kg		Centrifugal force kN		Weight kg		Temp. class (G)	Temp. class (D)	Max input power W		Power rating W		Max. current A		t_E (s)	I_A/I_N
	Code	Type	SIZE	50 Hz	60 Hz	50 Hz	60 Hz	50 Hz	60 Hz	50 Hz	60 Hz			50 Hz	60 Hz	50 Hz	60 Hz	400 V 50 Hz	460 V 60 Hz		
three-phase	600467	**M3/65-E-S02**	00	6.43	6.43	**64.7**	**93.1**	**0.635**	**0.913**	4.3	4.3	T4	120°C	105	105	80	80	0.30	0.29	20	3.48
	600465	**M3/105-E-S02**	00	9.64	9.64	**97.0**	**140**	**0.950**	**1.37**	5.2	5.2										3.68
	600462	**M3/205-E-S02**	00	21.0	21.0	**211**	**304**	**2.07**	**2.98**	6.0	6.0										3.68
	600461	**M3/305-E-S02**	00	31.0	21.0	**311**	**304**	**3.05**	**2.98**	6.3	6.0										3.68

* Working moment = 2 x static moment. t_E (s) = set time t_E from IEC/EN 60079-7. I_A/I_N = ratio between start-up current and maximum current.

M3-E

2 poles - 3000/3600 rpm

	Type	Dimensional specifications (mm)														
		Fig.	A	B	C	Multi-hole D	Multi-hole E	Holes øG	Holes N°	F	H	I	L	M	M	Cable entry thread
three-phase	M3/65-E-S02	M1	197	123	127	30 - 60 65 - 62	85 - 100 85 - 106	9	4	24	70	40	106	86	106	M20x1,5
	M3/105-E-S02	M1	211									47				
	M3/205-E-S02	M1	235									59				
	M3/305-E-S02	M1	235									59				

Fig. M1