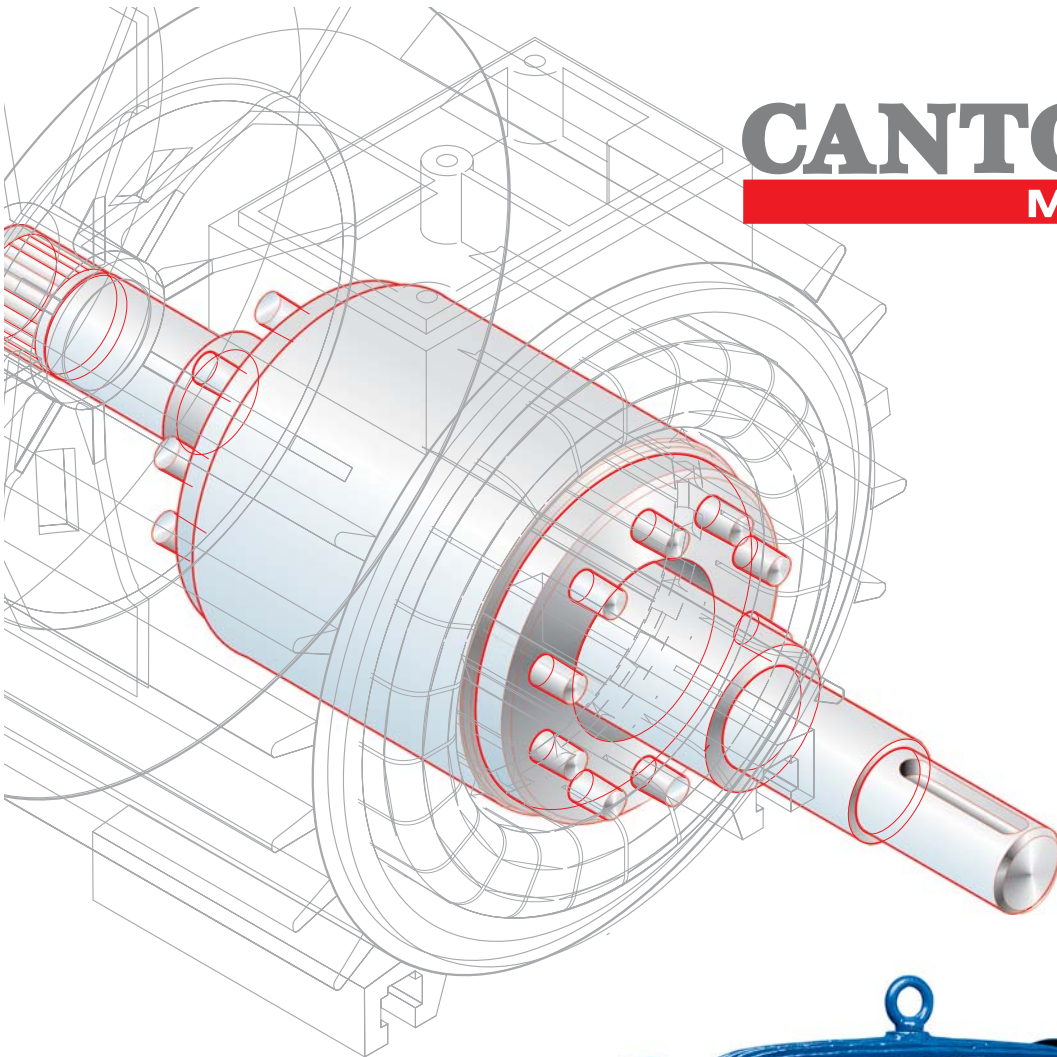


CANTONI
MOTOR



**General
Purpose
3-Phase
Induction
Motors**



Product Catalogue

Certificates

Cantoni Motor SA
ISO 9001
KEMA
Since September 30, 1999
Number 99515

Besel SA
ISO 9001
Since July 21, 1995

CELMA INDUKTA SA
ISO 9001
Germanisher Lloyd
Since June 16, 1995
Number QS-234 HH
ISO 14001
Germanisher Lloyd
Since November 15, 1999
Number EM-1835 HH

Emit SA
ISO 9001:2008
ISO 14001:2004
PN-N-18001:2004
Polski Rejestr Statków
Since January 23, 2012
Number NC-34

CERTIFICATE

ISO 9001:2008

DEKRA Certification Sp. z o.o. hereby certifies that the company

Cantoni Motor S.A.

Scope of certification:
Export sale of electric motors, co-ordination of the procurement of materials for the production of electric motors.

Certified location:
ul. Grażyńskiego 22 • PL – 43-300 Bielsko-Biała

has established and maintains a quality management system according to the above mentioned standard. The conformity was assessed with audit report no. WA-907013ASJ/ISO9001.

This certificate is valid from 2013-07-02 to 2016-07-01
Certificate registration no.: 320611042/1
Duplicate

DEKRA Certification Sp. z o.o. • Plac Solny 20 • 50-063 Wrocław • www.dekra-certification.com.pl

CERTYFIKAT CERTIFICATE

Przyznany organizacji:
issued for:
Zakład Maszyn Elektrycznych "EMIT" S.A.
ul. Narutowicza 72
99-320 Żychlin

Euro Certyfikacji Systemów Zarządzania Polskiego Rejestru Statków S.A., al. gen. Józefa Hallera 126, 0-416 Gdańsk, zaświadczająca, że Zintegrowany System Zarządzania obejmujący System Zarządzania Jakością, System Zarządzania Środowiskowego oraz System Zarządzania Bezpieczeństwem i Higieną, który wydaj wymienionej organizacji został oceniony i stwierdzono jego zgodność z wymaganiami: Management Systems Certification Bureau of Poland Register Statków S.A., al. gen. Józefa Hallera 126, 0-416 Gdańsk, certifies that the Integrated Management System including the Quality Management System, Environmental Management System and Occupational Health and Safety Management System of the above organization has been assessed and found to be in accordance with the requirements of:

**ISO 9001:2008
ISO 14001:2004
PN-N-18001:2004**

Zakres certyfikacji:
PROJEKTOWANIE I PRODUKCYJA:
- SILNIKÓW INDUKCYJNYCH TRÓJFAZOWYCH
- GENERATORÓW SYNCHRONICZNYCH
- MASZYN PRĄDU STAŁEGO
- ZESPÓŁÓW PRĄDOWYCH
- CZĘŚCI I PODZESPÓŁÓW DO MASZYN ELEKTRYCZNYCH
- KONSTRUKCJI SPAWANYCH
ORAZ REMONTY MASZYN ELEKTRYCZNYCH

Scope of certification:
DESIGN AND MANUFACTURE OF:
- THREE-PHASE INDUCTION MOTORS
- SYNCHRONOUS GENERATORS
- POWER GENERATING SETS
- PARTS AND SUBASSEMBLIES FOR ELECTRIC MACHINES
- WELDED STRUCTURE
AND REPAIRS OF ELECTRIC MACHINES

Certyfikat jest ważny do:
The Certificate is valid until:
22.01.2015

Nr Certyfikatu: **NC-34**
Certificate No.:

Działek, 23.01.2012

Jan Jankowski
Papiński
Jacek Papiński

AC 014
QMS, EMS,
BSP

Porozumienie IAF/MLA między QMS / EMS
The Arrangement IAF/MLA refers to QMS and EMS

Certificate

GL Systems Certification

GL Systems Certification herewith certifies, that the company

CELMA INDUKTA S.A.
ul. 3 Maja 19, PL-43-400 Cieszyń

with the subsidiary

Olewnia Żelwa Cieszyń Sp. z o.o.
ul. 3 Maja 19, PL-43-400 Cieszyń

has established and maintains a Management System relevant for

**Design, production and repair of electric machines,
Iron castings.**

GL Systems Certification confirms that the Management System of the above mentioned company has been assessed and found to be in accordance with the requirements of the following standard:

ISO 9001:2008

The validity of this certificate is subject to the company applying and maintaining its Management System in accordance with the standard indicated. This will be monitored by GL Systems Certification.

The certificate is valid from 04.11.2012 until 03.11.2015

GL Systems Certification Hub Romania
Certificate No. **QS-234 HH**

DAkkS
Deutsche
Akkreditierungsstelle
D-ZM-16026-01-02

Competence Center Systems Certification, Brookholzer 18, D-20667 Hamburg

Daniel Savu

CERTIFICATE

ISO 9001:2008

DEKRA Certification Sp. z o.o. hereby certifies that the company

Fabryka Silników Elektrycznych BESEL S.A.

Scope of certification:
Design, manufacture, sale and service of single-phase and three-phase asynchronous electric motors of low-power.

Certified location:
ul. Elektryczna 8 • PL – 49-300 Brzeg

has established and maintains a quality management system according to the above mentioned standard. The conformity was assessed with audit report no. Z-A-491512/BS/P/9001.

This certificate is valid from 19.06.2012 to 18.06.2015
Certificate registration no.: 000612060
Duplicate

DEKRA Certification Sp. z o.o.
Wrocław, 18.06.2012

DEKRA Certification Sp. z o.o. • Plac Solny 20 • 50-063 Wrocław • www.dekra-certification.pl

Cantoni[®] GROUP

Cantoni Motor S.A.
3 Maja 28
43-400 Cieszyn, Poland
tel.: +48 33 813 87 00
fax: +48 33 813 87 01
motor@cantonigroup.com
www.cantonimotor.com

since 1950



since 1920
since 1878



since 1921



since 1954



Contents

General information

pages 5-12

Description of the catalogue version

Description of the customised version

Ratings-tolerances

Standards and equivalents

Degree of protection

Insulation classification

Mounting arrangements

Motor feet

Terminal box

Vibration and acoustic level

Housing, endshields

Permissible loading on the shaft end

Bearings

Cooling system

Ordering information

Data tables

pages 13-17

Dimension drawings

pages 18-28

List of motor parts

pages 29-32

Production program

pages 34-35

DESCRIPTION OF THE CATALOGUE VERSION

Duty:	S1
Rated voltage:	380V, 400V, 690V (Δ/Y)
Frequency:	50 Hz
Ambient temperature:	+ 40°C
Mounting height:	up to 1000 m above sea level
Number of free shaft ends:	1
Insulation class:	F
Bearings:	according to page 12

Other specifications dependent on the frame size:

Frame size	Degree of protection	Position of the terminal box	Number of terminals	Number of cable outlets	Optional rotation of the terminal box	Glands	Temperature sensors in winding	Bearing lubrication system	Thermal protection of bearings
Sh 56	IP 55	top	6	1	180°	M 20	on request	no	no
Sh 63	IP 55	top	6	1	180°	M 20	on request	no	no
Sh 71	IP 55	top	6	1	180°	M 20	on request	no	no
Sh 80	IP 55	top	6	1	180°	M 20	on request	no	no
Sh 90	IP 55	top	6	2	180°	M 20	on request	no	no
Sg 100	IP 55	top	6	2	180°	M 20	on request	no	no
Sg 112	IP 55	top	6	2	180°	M 25	on request	no	no
Sg 132	IP 55	top	6	2	180°	M 25	on request	no	no
Sg 160	IP 55	top	6	2	180°	M 40	on request	on request	on request
Sg 180	IP 55	top	6	2	180°	M 40	on request	on request	on request
2Sg 200	IP 55	right	6	2+1	4 × 90°	M 50	PTC	yes	on request
2Sg 225	IP 55	right	6	2+1	4 × 90°	M 50	PTC	yes	on request
2Sg 250	IP 55	right	6	2+1	4 × 90°	M 63	PTC	yes	on request
2Sg 280	IP 55	right	6	2+1	4 × 90°	M 63	PTC	yes	on request
2Sg 315	IP 55	right	6	2+1	4 × 90°	M 76	PTC	yes	on request
SEE 315	IP 55	top	6	2	4 × 90°	M 76	PTC	yes	on request
Sg 355	IP 55	right	6	2	4 × 90°	M 76	PTC Mark A	yes	on request
SEE 355	IP 55	top	6	2	4 × 90°	M 76	PTC Mark A	yes	on request
Sh 355	IP 55	top	6	2	4 × 90°	M 76	Pt 100	yes	Pt 100
Sh 400	IP 55	top	3 (bars)	3	180°	3× ϕ 55	Pt 100	yes	Pt 100
Sh 450	IP 55	top	3 (bars)	3	180°	3× ϕ 55	Pt 100	yes	Pt 100
Sh 500	IP 55	top	3 (bars)	3	180°	3× ϕ 55	Pt 100	yes	Pt 100

We are able to supply almost any motor made according to customer's specifications

DESCRIPTION OF THE CUSTOMISED VERSION

Different supply voltage	
Frequency:	60 Hz
Degree of protection:	IP 56
Insulation class:	H
Number of free shaft ends:	2
Tropicalization	
Different bearings	
Different duty type	
Adaptation for supply from a frequency inverter	
Different versions per customer's specifications	

As part of our development program, we reserve the right to alter or amend any of the specifications without giving prior notice

RATINGS - TOLERANCES

STANDARDS

The electric motors are manufactured according to the international standards:

Rating and performance	IEC 60034-1
Methods for determining losses and efficiency	IEC 60034-2
Classification of degrees of protection	IEC 60034-5
Methods of cooling	IEC 60034-6
Symbols of construction and mounting arrangements	IEC 60034-7
Terminal markings and direction of rotation	IEC 60034-8
Noise limits	IEC 60034-9
Dimensions and output of electric machines	IEC 60072-1
Vibration limits	IEC 60034-14

All the motors are manufactured in Quality Assurance System consistent with ISO 9001.

ISO9001

The motors covered by the present catalogue comply with the regulations and standards effective in other countries, consistent with IEC standards.

IEC


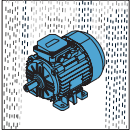
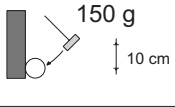

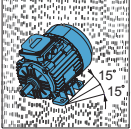
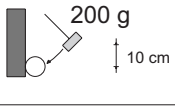
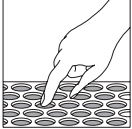
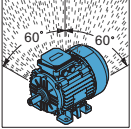
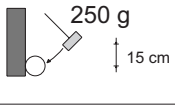
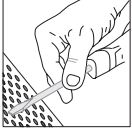
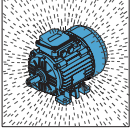
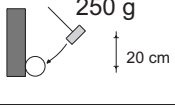
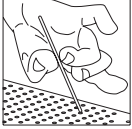

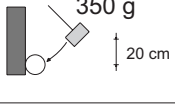
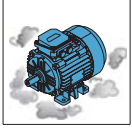

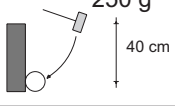
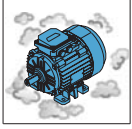
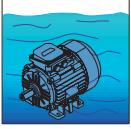
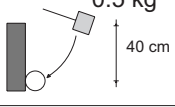
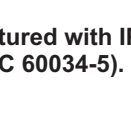
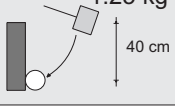
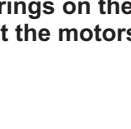
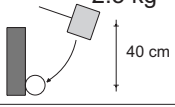
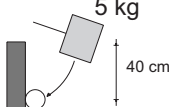
All the motors described in the present catalogue are provided with CE mark.

CE

INTERNATIONAL PROTECTION IP

According to the IEC 60034-5 standard the electric motors are provided with IP code which determines the degree of protection (ensured by the housing) against penetration of solid matter and fluids.

IP55

PROTECTION AGAINST PENETRATION OF SOLID MATTER		PROTECTION AGAINST PENETRATION OF FLUIDS		MECHANICAL PROTECTION			
1st digit	DESCRIPTION	2nd digit	DESCRIPTION	3rd digit	DESCRIPTION		
				0	No protection		
0	 Not protected	0	 Not protected	1	 Striking energy: 0.15 J		
	 Protected against solid bodies larger than 50 mm		1		 Protected against vertically falling drops of water	2	 Striking energy: 0.20 J
	 Protected against solid bodies larger than 12 mm		2		 Protected against vertically falling drops of water up to 15°	3	 Striking energy: 0.37 J
	 Protected against solid bodies larger than 2.5 mm		3		 Protected against rain up to 60°	4	 Striking energy: 0.50 J
	 Protected against solid bodies larger than 1 mm		4		 Protected against rain falling from any direction	5	 Striking energy: 0.70 J
	 Protected against deposition of dust		5		 Protected against sprayed water from any direction	6	 Striking energy: 1 J
	 Totally protected against deposition of dust		6		 Protected against temporary immersion	7	 Striking energy: 2 J
		7	 Protected against immersion between 0.15 and 1 m		8	 Striking energy: 5 J	
		8	 Protected against immersion at preset pressure and time		9	 Striking energy: 10 J	
					10	 Striking energy: 20 J	

All Cantoni Group standard motors are manufactured with IP 55 degree of protection according to the standard in force (IEC 60034-5). The following table lists its characteristics.

Each size 80 to 180 motor is equipped with seal rings on the control side and on the opposite side. Labyrinth seals protect the motors from size 200 and above.

The terminal board box is sealed with a gasket.

Motors with a higher degree of protection are available on request.

INSULATION CLASSIFICATION

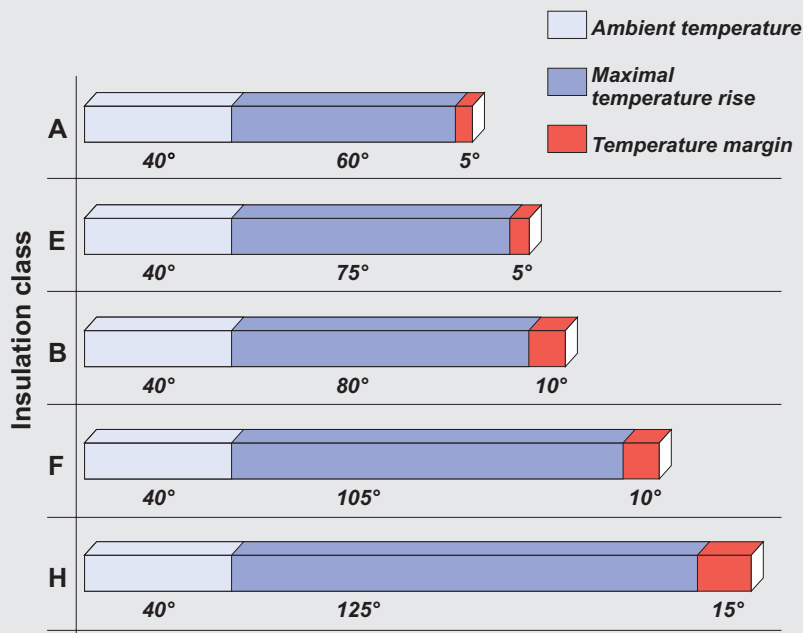
The insulation system of an electric motor is determined by a given insulation class on the basis of its thermal resistance.
This thermal resistance should be guaranteed by the entire set of electric insulating materials used in the motor insulating system.

Thermal resistance classification is related to the temperature of the hotspot in the insulation occurring during rated operating conditions of the electric motor, allowing for the highest permissible rise in average temperature.

This rise should be selected so that at the highest permissible ambient temperature, the temperature of the hotspot in insulation will not exceed the value assigned to a given thermal resistance class.

Symbols of thermal resistance classes (permissible insulation temperatures for ambient temperature of 40°C)

Symbol	Temperature [°C]
A	105
E	120
B	130
F	155
H	180



Insulation class F for an electric motor means that at ambient temperature of 40°C the temperature rise of its windings may be max. 105°C with the additional temperature margin of 10°C (under specified measuring conditions in accordance with the IEC 60034-1 standard).

Class F

The motors made by Cantoni Motor in their basic version have the insulation class F while the temperature rise is for class B. It means longer life of motors.

On customer's demand, we make motors with insulation class H.

Strengthened insulation system makes it possible to supply our motors from frequency inverters.

MOUNTING ARRANGEMENTS

According to the IEC 60034-7 standard

	Horizontal shaft			Vertical shaft			
	Designation		Frame size	Designation		Frame size	
	Code II	Code I			Code II		Code I
	IM 1001	IM B3	56 ÷ 500		IM 1011	IM V5	56 ÷ 315 except Sg 315 M6C except Sg 315 M8C
	IM 1051	IM B6	56 ÷ 280		IM 1031	IM V6	56 ÷ 315 except Sg 315 M6C except Sg 315 M8C
	IM 1061	IM B7	56 ÷ 280		IM 2011 or IM 2111	IM V15	56 ÷ 315 except SLg 315 M6C except SLg 315 M8C
	IM 1071	IM B8	56 ÷ 280		IM 2031 or IM 2131	IM V36	56 ÷ 315 except SLg 315 M6C except SLg 315 M8C
	IM 2001	IM B35	56 ÷ 500		IM 3011	IM V1	56 ÷ 500 except SVEE 355 (2-pole) except SVh 355 (2-pole) except SVh 400 (2-pole)
	IM 2101	IM B34	56 ÷ 132		IM 3031	IM V3	56 ÷ 280
	IM 3001	IM B5	56 ÷ 315 except SKg 315 M6C except SKg 315 M8C		IM 3611	IM V18	56 ÷ 180
	IM 3601	IM B14	56 ÷ 132		IM 3631	IM V19	56 ÷ 180

MOUNTING ARRANGEMENTS

MOTOR FEET

Motors of frame size ≤ 112 have screwed feet.
 Motors of frame size 132 have screwed feet or integrated with the motor housing.
 Motors of frame size ≥ 160 have feet integrated with the motor housing.

TERMINAL BOX

Terminal boxes of low voltage motors have threaded inlet holes designed for mounting cable glands. The box contains terminal board with marked terminals making possible connection of supply cables.

In addition, terminal boxes may be provided with additional terminals connected to the ends of thermal protection or anticondensation heater circuits and extra glands to connect these circuits.

Low voltage high-power motors contain terminal boxes with cable gland seals and cable clamps to prevent their removal. Inside the boxes there are special clamps used to ground the supply cable armouring.

In low voltage motors of very high power three supply busbar are used.

Box covers of low voltage high-power motors are made in form of antiimplosion membranes.

The circuits of thermal protection and anticondensation heaters are connected to separate terminal boxes.

VIBRATION LEVEL AND ACOUSTIC POWER



The rotor balancing method guarantees maintaining a normal vibration level A in accordance with the IEC60034-14 standard and basic acoustic power level in accordance with the IEC60034-9 standard. On customer's demand the motors may be made with reduced vibration or noise level.

HOUSING, END SHIELDS, FEET

Frame size [mm]	Motor housing	End shields	Feet
56	Aluminium	Aluminium	Aluminium - screwed
63	Aluminium	Aluminium	Aluminium - screwed
71	Aluminium	Aluminium	Aluminium - screwed
80	Aluminium	Aluminium	Aluminium - screwed
90	Aluminium	Aluminium	Aluminium - screwed
100	Aluminium	Aluminium	Aluminium - screwed
112	Aluminium	Cast iron	Aluminium - screwed
132	Cast iron	Cast iron	Cast iron - screwed
160	Cast iron	Cast iron	Cast iron - integrated
180	Cast iron	Cast iron	Cast iron - integrated
200	Cast iron	Cast iron	Cast iron - integrated
225	Cast iron	Cast iron	Cast iron - integrated
250	Cast iron	Cast iron	Cast iron - integrated
280	Cast iron	Cast iron	Cast iron - integrated
315	Cast iron	Cast iron	Cast iron - integrated
355	Cast iron	Cast iron	Cast iron - integrated
400	Cast iron	Cast iron	Cast iron - integrated
450	Cast iron	Cast iron	Cast iron - integrated
500	Cast iron	Cast iron	Cast iron - integrated

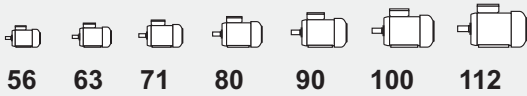
In motors of frame size 80, 90 and 100: on request end shields may be made of cast iron.

In motors of frame size 132: feet may be integrated with housing.

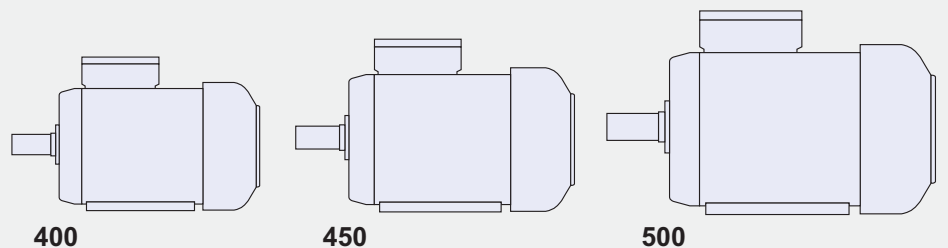
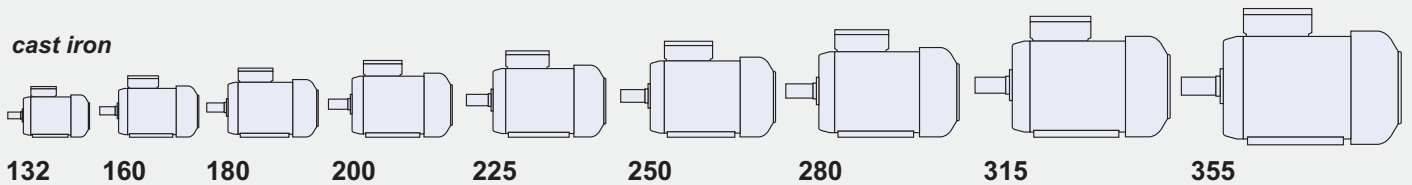
Motor housing

 aluminium  cast iron

aluminium



cast iron



PERMISSIBLE LOADING ON THE SHAFT END

Frame size	Number of poles	Horizontal operation		Vertical operation			Frame size	Number of poles	Horizontal operation		Vertical operation		
						$F_R(x=0)$			$F_R(x=\max)$	F_p	F_{a1}	F_{a2}	$F_R(x=0)$
		[kN]		[kN]					[kN]		[kN]		
Sh 56	2	0,20	0,16	0,04	0,03	0,05	2Sg 200 LB	6	4,50	3,70	3,70	2,90	4,60
Sh 56	4	0,25	0,20	0,05	0,04	0,06	2Sg 200 L	8	5,10	4,20	4,10	3,40	5,00
Sh 63	2	0,20	0,16	0,04	0,04	0,06	2Sg 225 S	4	4,50	3,60	3,70	3,00	4,60
Sh 63	4	0,25	0,20	0,06	0,05	0,07	2Sg 225 S	8	5,90	4,70	4,70	3,90	5,70
Sh 63	6	0,27	0,22	0,06	0,05	0,07	2Sg 225 M	2	3,50	2,90	2,60	2,00	3,40
Sh 71	2	0,29	0,24	0,07	0,05	0,09	2Sg 225 M	4	4,30	3,40	3,60	2,80	4,70
Sh 71	4	0,36	0,30	0,09	0,07	0,11	2Sg 225 M	6	5,00	4,00	4,10	3,20	5,40
Sh 71	6	0,40	0,35	0,10	0,08	0,12	2Sg 225 M	8	5,70	4,60	4,60	3,70	5,80
Sh 71	8	0,40	0,35	0,11	0,09	0,13	2Sg 250 M	2	4,30	3,60	3,20	2,40	4,20
Sh 80	2	0,33	0,27	0,09	0,06	0,12	2Sg 250 M	4	5,40	4,40	4,40	3,40	5,80
Sh 80	4	0,44	0,37	0,12	0,09	0,15	2Sg 250 M	6	6,10	5,00	5,00	3,80	6,70
Sh 80	6	0,51	0,42	0,14	0,11	0,17	2Sg 250 M	8	6,90	5,60	5,60	4,30	7,20
Sh 80	8	0,51	0,42	0,17	0,15	0,20	2Sg 280 S	2	4,00	3,30	3,10	1,90	4,50
Sh 90	2	0,58	0,44	0,53	0,30	0,40	2Sg 280 S	4	6,10	5,10	5,10	3,70	7,00
Sh 90	4	0,64	0,52	0,60	0,30	0,40	2Sg 280 S	6	7,50	6,20	6,00	4,70	7,70
Sh 90	6	0,74	0,68	0,73	0,30	0,40	2Sg 280 S	8	8,30	6,90	6,60	5,20	8,50
Sh 90	8	0,82	0,74	0,80	0,30	0,40	2Sg 280 M	2	3,90	3,20	3,00	1,80	4,60
Sg 100	2	0,78	0,56	0,70	0,25	0,40	2Sg 280 M	4	5,90	4,90	5,00	3,50	7,10
Sg 100	4	0,81	0,79	0,83	0,25	0,40	2Sg 280 M	6	7,30	6,10	5,90	4,50	7,90
Sg 100	6	0,98	0,92	0,98	0,25	0,40	2Sg 280 M	8	8,00	6,60	6,50	4,90	8,60
Sg 100	8	1,12	1,04	1,11	0,25	0,40	2Sg 315 S	2	3,70	3,20	3,00	1,60	4,80
Sg 112	2	0,70	0,56	0,67	0,25	0,40	2Sg 315 S	4	6,40	5,30	4,90	3,10	7,30
Sg 112	4	0,81	0,71	0,79	0,25	0,40	2Sg 315 S	6	7,40	6,20	6,30	4,30	8,90
Sg 112	6	0,92	0,84	0,92	0,25	0,40	2Sg 315 S	8	8,40	7,00	7,00	5,00	9,60
Sg 112	8	1,05	0,97	1,05	0,25	0,40	2Sg 315 MA	2	3,60	3,00	2,90	1,50	4,80
Sg 132	2	1,02	0,94	1,04	0,17	0,57	2Sg 315 MB	2	3,30	2,80	2,90	1,30	4,90
Sg 132	4	1,16	1,04	1,16	0,17	0,57	2Sg 315 MA	4	6,20	5,10	4,80	2,90	7,40
Sg 132	6	1,40	1,22	1,37	0,17	0,57	2Sg 315 MB	4	5,90	4,90	4,80	2,70	7,50
Sg 132	8	1,63	1,39	1,57	0,17	0,57	2Sg 315 MA	6	7,20	6,00	6,20	4,10	9,00
Sg 160	2	1,23	1,09	1,22	0,82	1,07	2Sg 315 MB	6	6,80	5,60	6,10	3,60	9,30
Sg 160	4	1,35	1,13	1,32	1,00	1,39	2Sg 315 MA	8	8,20	6,80	6,90	4,80	9,70
Sg 160	6	1,61	1,37	1,58	1,26	1,62	2Sg 315 MB	8	7,70	6,40	6,80	4,30	10,00
Sg 160	8	1,92	1,50	1,80	1,47	1,80	SEE 315MC	2	2,90	2,50	2,80	1,00	5,10
Sg 180	2	1,90	1,66	1,65	1,00	1,20	SEE 315MC	4	7,50	6,30	4,70	2,60	7,40
Sg 180	4	2,42	1,82	1,98	1,00	1,35	SEE 315MD	6	8,30	6,90	5,30	2,50	9,00
Sg 180	6	2,75	2,07	2,15	1,60	1,95	SEE 315MD	8	9,40	7,80	5,90	3,10	9,60
Sg 180	8	3,30	2,04	2,49	1,90	2,44	SEE 355	adaptation to belt drive on customer's request					
2Sg 200 LA	2	3,20	2,60	2,30	1,90	2,90	Sg 355	adaptation to belt drive on customer's request					
2Sg 200 LB	2	3,10	2,50	2,30	1,80	2,90	Sh 355	adaptation to belt drive on customer's request					
2Sg 200 L	4	3,90	3,20	3,20	2,60	4,00	Sh 400	adaptation to belt drive on customer's request					
2Sg 200 LA	6	4,60	3,80	3,70	3,00	4,60	Sh 450	adaptation to belt drive on customer's request					
							Sh 500	adaptation to belt drive on customer's request					

Value of radial force F_R acting on the shaft end for a given belt pulley diameter is calculated according to the following formula:

$$F_R = \frac{19600 \times P \times k}{D_k \times n} \text{ [N]}$$

- where: P - motor output [kW]
 D_k - belt pulley diameter [m]
 n - speed [rpm]
 k - belt tension factor:
 for V-belts $k=2,2$
 for flat belts $k=3$

Value of force F_R acting on any point of the shaft end (between points $X=\max$ and $X=0$) may be calculated according to the following formula:

$$F_R = F_{X0} - \frac{X}{E} \times (F_{X0} - F_{XMAX}) \text{ [N]}$$

- where: F_{X0} - value of F_R force acting on the beginning of the shaft end
 F_{XMAX} - value of F_R force acting on the end of the shaft end
 E - length of the shaft end

BEARINGS

Frame size	Number of poles	Bearings
Sh 56	2 ÷ 6	6201 2Z
Sh 63	2 ÷ 8	6202 2Z
Sh 71	2 ÷ 8	6203 2Z
Sh 80	2 ÷ 8	6204 2Z
Sh 90	2 ÷ 8	6205 2Z
Sg 100	2 ÷ 8	6206 2Z
Sg 112	2 ÷ 8	6306 2Z
Sg 132	2 ÷ 8	6308 2Z
Sg 160	2 ÷ 8	6309 2Z
Sg 180	2 ÷ 8	6311 2Z
2Sg 200	2 ÷ 12	6312 C3
2Sg 225	2 ÷ 12	6313 C3
2Sg 250	2 ÷ 12	6315 C3
2Sg 280	2	6315 C3
2Sg 280	4 ÷ 12	6317 C3
2Sg 315	2	6315 C3
2Sg 315	4 ÷ 12	6318 C3

The bearings in basic version of motors for horizontal duty.

Frame size	Number of poles	Bearings	
Sg 315 MC	DE NDE	6 ÷ 8	NU320 EM1 6320 C3
SEE 315		2	6315 2ZC3
SEE 315	DE NDE	4 ÷ 8	6320 2ZC3 6318 2ZC3
Sg 355	DE NDE	4 ÷ 12	NU322 C3 6322 C3
SEE 355		2	6217 C3
SEE 355		4 ÷ 8	6222 C3
Sh 355		2	6217 C3
Sh 355		4 ÷ 8	6322 C3
Sh 400		2	6218 C3
Sh 400	DE NDE	4 ÷ 8	6324 MC3 6322 MC3
Sh 450	DE NDE	4 ÷ 10	6324 MC3 NU222 EM1
Sh 500	DE NDE	4 ÷ 10	NU226 EM1+ 6226 C3 NU226 EM1

DE - drive end NDE - non drive end

COOLING SYSTEM

Standard motors in frame size 56 ÷ 500 are being cooled down by means of a fan installed on the shaft from the non-drive end, covered with steel cover, cooling system IC 411 according to the IEC 60034-6 standard.

The design of fans and fan covers as well as materials used ensure optimum utilization of their aerodynamic and aeroacoustic properties.

Standard motors can operate in both directions of rotation, with the exception of Sh 355, 400, 450, 500 (2 and 4 poles) motors where unidirectional fans are applied.

ORDERING INFORMATION

Orders for motors should specify:

- motor type designation,
- rated output,
- rated speed,
- operating duty,
- supply voltage and connection,
- frequency,
- mounting arrangements, end shield material,
- degree of protection,
- machine to be driven,
- other details of out-of-catalogue or special version,

and information concerning additional accessories e.g.

- thermal protection,
- anticondensation heaters,
- vibration sensors,
- etc.

When ordering high-power or special purpose motors one should also indicate:

- required direction of rotation,
- required degree of interior protection,
- method of start-up,
- method of coupling with the driven unit (gears, dimensions of belt pulleys, etc.),
- type of driven machine (nature of load), including the moment of inertia J or flywheel effect GD² brought to the motor shaft,
- other customer's specifications.

When ordering spare parts one should specify:

- full designation of the motor type including its serial number (provided on the nameplate) or catalogue number,
- degree of protection,
- mounting form,
- name of part,
- number of pieces.

Item	Type	Rated output		Rated speed n_N [min ⁻¹]	Rated torque T_N [Nm]	Efficiency			Power factor $\cos \varphi_N$ [-]	Full load current			Locked rotor torque T_L/T_N [-]	Locked rotor current I_L/I_N [-]	Breakdown torque T_b/T_N [-]	Moment of Inertia J [kgm ²]	Weight (IME3) m [kg]
		P_N [kW]	[HP]			η_N [%] at % of full load				I_N at rated voltage							
		50%	75%	100%	[A] _{230V}	[A] _{380V}	[A] _{400V}										
2p=2 $n_s=3000$ rpm																	
1.	Sh 56-2A	0,09	0,12	2820	0,30	45	52	62	0,63	0,60	0,35	0,35	2,5	3,4	2,7	0,000076	2,9
2.	Sh 56-2B	0,12	0,17	2800	0,41	50	58	65	0,70	0,65	0,38	0,38	2,0	3,0	2,0	0,000095	3,2
3.	Sh 63-2A	0,18	0,25	2760	0,62	63	68	70	0,77	0,85	0,50	0,50	2,1	3,4	2,1	0,000175	3,5
4.	Sh 63-2B	0,25	0,33	2780	0,85	66	69	72	0,78	1,1	0,65	0,65	2,4	4,0	2,5	0,000235	4,1
5.	Sh 71-2A	0,37	0,5	2800	1,25	67	69	71	0,77	1,75	1,0	1,0	2,2	4,4	2,2	0,000389	5,0
6.	Sh 71-2B	0,55	0,75	2790	1,88	69	72	75	0,82	2,35	1,35	1,35	2,0	4,0	2,1	0,000484	6,0
7.	Sh 80-2A	0,75	1	2800	2,56	66	72	74	0,80	3,3	1,9	1,9	2,7	4,5	2,6	0,000829	7,9
8.	Sh 80-2B	1,1	1,5	2780	3,78	69	75	77	0,84	4,3	2,5	2,5	2,6	5,1	2,6	0,001005	9,1
9.	Sh 90S-2	1,5	2,0	2835	5,1	80,7	82,1	81,1	0,83	5,6	3,4	3,2	3,0	6,1	3,0	0,0013	14
10.	Sh 90L-2	2,2	3,0	2855	7,40	82,2	83,9	83,2	0,82	8,1	4,9	4,7	3,4	7,1	3,5	0,002	16,8
11.	Sg 100L-2	3,0	4,0	2905	9,9	80,9	83,2	83,4	0,86	10,5	6,4	6,0	2,7	7,5	2,8	0,0048	25
12.	Sg 112M-2	4	5,5	2865	13,33	85,7	86,4	85,4	0,90	13,1	7,9	7,5	2,1	6,4	2,3	0,0079	34
13.	Sg 132S-2A	5,5	7,5	2910	18,0	86,4	87,5	87,0	0,88	18,0	10,9	10,4	2,4	7,0	3,2	0,0150	60
14.	Sg 132S-2B	7,5	10	2920	24,53	88,1	89,2	88,5	0,88	24,2	14,6	13,9	2,5	7,5	3,2	0,0180	71
15.	Sg 160M-2A	11	15	2945	35,7	88,9	90,1	90,0	0,87	35,3	20,9	20,3	2,2	7,7	3,4	0,042	96
16.	Sg 160M-2B	15	20	2935	48,8	90,6	91,5	91,0	0,89	46,5	28,1	26,7	2,0	7,2	2,6	0,048	103
17.	Sg 160L-2	18,5	25	2930	60,3	90,0	90,7	90,3	0,91	56,5	34,2	32,5	2,1	6,8	2,9	0,059	119
18.	Sg 180M-2	22	30	2920	71,95	89,5	90,8	90,6	0,88	69,3	41,9	39,8	2,5	6,0	2,5	0,076	165
19.	2Sg 200L2A	30	40	2960	97	92,3	93	92,9	0,89	91	55	52	1,9	6,0	2,3	0,15	245
20.	2Sg 200L2B	37	50	2960	119	93,4	93,8	93,7	0,89	111	67	64	2,2	6,7	2,5	0,18	265
21.	2Sg 225M2	45	60	2968	145	93,8	94,6	94,5	0,89	134	81	77	2,4	7	2,5	0,26	335
22.	2Sg 250M2	55	75	2970	177	91,6	93	93,5	0,9	164	99	94	2	6,9	2,4	0,36	410
23.	2Sg 280S2	75	100	2977	241	92,5	93,8	94	0,9	223	135	128	2,1	7,5	3,3	0,76	550
24.	2Sg 280M2	90	125	2970	289	93	94,2	94,7	0,91	262	159	151	2	7	3,2	0,87	585
25.	2Sg 315S2	110	150	2977	353	94,3	95,2	95,1	0,91	319	193	183	2,0	8,7	2,8	0,91	690
26.	2Sg 315M2A	132	175	2975	424	94,5	95,1	95	0,91	383	232	220	2,1	8,5	2,8	0,98	725
27.	2Sg 315M2B	160	220	2975	514	95,5	95,9	95,4	0,89	473	286	272	2,3	9,1	2,5	1,2	790
28.	SEE 355ML2	200	270	2987	639	94,6	95,9	96,3	0,90	-	-	333	1,9	8,0	3,4	2,8	1600
29.	SEE 355ML2A	250	340	2982	800	95,5	96,3	96,4	0,91	-	-	415	1,8	7	2,8	2,8	1600
30.	SEE 355ML2B	315	430	2982	1009	95,9	96,6	96,6	0,91	-	-	517	1,9	7,3	3,0	3,0	1680
31.	Sh 355H2Ds	355	480	2985	1136	95,5	96,3	96,5	0,91	-	-	584	1,7	7,4	2,7	4,9	2140
32.	Sh 355H2Es	400	540	2985	1280	95,5	96,6	96,7	0,91	-	-	656	1,6	8	2,8	5,7	2200
33.	Sh 400H2Cs	450	610	2983	1441	95,5	96,3	96,5	0,91	-	-	741	1,3	6,6	2,6	6,7	2800
34.	Sh 400H2Ds	500	680	2985	1600	95,8	96,5	96,6	0,91	-	-	821	1,4	7,2	2,8	7,7	2880
35.	Sh 400H2Es	560	760	2989	1789	95,9	96,7	96,9	0,90	-	-	927	1,7	8	3	8,7	3100
36.	Sh 400H2Es	600	816	2987	1918	96,0	96,8	97,0	0,91	-	-	981	1,7	8	3	8,7	3100

TECHNICAL DATA

Totally Enclosed Motors IP 55

TECHNICAL DATA

Item	Type	Rated output		Rated speed n_N	Rated torque T_N	Efficiency			Power factor $\cos \varphi_N$	Full load current			Locked rotor torque T_L/T_N	Locked rotor current I_L/I_N	Breakdown torque T_b/T_N	Moment of inertia J	Weight (IMB3) m
		P_N	P_N			η_N [%] at % of full load				I_N at rated voltage							
		[kW]	[HP]	[min ⁻¹]	[Nm]	50%	75%	100%	[-]			[-]	[-]	[-]	[kgm ²]	[kg]	
2p=4 $n_s=1500$ rpm																	
37.	Sh 56-4A	0,06	0,08	1400	0,41	40	48	50	0,58	0,52	0,30	0,30	2,0	2,8	2,3	0,00015	2,6
38.	Sh 56-4B	0,09	0,12	1400	0,61	54	58	58	0,60	0,70	0,40	0,40	2,1	2,6	2,3	0,00019	2,8
39.	Sh 63-4A	0,12	0,17	1380	0,83	56	60	60	0,63	0,8	0,45	0,45	1,9	2,6	2,0	0,00024	3,5
40.	Sh 63-4B	0,18	0,25	1340	1,25	52	55	57	0,66	1,2	0,70	0,70	2,0	2,6	2,0	0,00031	4,1
41.	Sh 71-4A	0,25	0,33	1380	1,73	60	63	66	0,64	1,5	0,85	0,85	2,0	3,0	2,0	0,00061	5,1
42.	Sh 71-4B	0,37	0,5	1370	2,60	64	67	70	0,68	2,2	1,25	1,25	2,1	3,1	2,1	0,00077	5,8
43.	Sh 80-4A	0,55	0,75	1400	3,75	62	68	72	0,71	2,7	1,6	1,7	2,1	3,6	2,1	0,00158	7,5
44.	Sh 80-4B	0,75	1	1380	5,15	67	73	76	0,70	3,5	2	2	2,4	4	2,3	0,0019	8,8
45.	Sh 90S-4	1,1	1,5	1405	7,48	75,5	77,8	76,7	0,8	4,5	2,7	2,6	2,2	4,9	2,8	0,0023	14
46.	Sh 90L-4	1,5	2	1410	10,16	78,1	80	79	0,78	6,1	3,7	3,5	2,5	5,3	2,8	0,0028	16,5
47.	Sg 100L-4A	2,2	3	1425	14,74	80,2	82,3	82	0,80	8,3	5,1	4,8	2,5	6,1	2,8	0,0058	25
48.	Sg 100L-4B	3,0	4,0	1415	20,25	81,1	83,1	82,7	0,81	11,2	6,8	6,5	2,6	6,1	2,7	0,0065	26
49.	Sg 112M-4	4	5,5	1435	26,62	84	85,6	85,1	0,82	14,4	8,7	8,3	2,6	6,3	3	0,0118	34
50.	Sg 132S-4	5,5	7,5	1450	36,22	84,3	86,1	85,9	0,84	19,1	11,6	11	2,2	6,9	3,1	0,029	62
51.	Sg 132M-4	7,5	10	1450	49,4	87	87,8	87	0,85	25,5	15,4	14,6	2,4	6,7	3,1	0,035	73
52.	Sg 160M-4	11	15	1460	71,95	88,2	89,3	89	0,85	36,5	22,1	21,0	2,3	7	3,1	0,061	105
53.	Sg 160L-4	15	20	1460	98	89,1	89,9	89,5	0,87	48,4	29,3	27,8	2,4	7,3	3,2	0,075	125
54.	Sg 180M-4	18,5	25	1470	120	90	90,9	90,5	0,90	57,0	34,5	32,8	2,4	6,8	2,9	0,135	165
55.	Sg 180L-4	22	30	1465	143	90,4	91,3	91	0,90	67,4	40,8	38,8	2,7	7,3	2,8	0,155	175
56.	2Sg 200L4	30	40	1472	196	92,4	93	92,5	0,88	93	56	53	2,9	7,1	2,5	0,31	265
57.	2Sg 225S4	37	50	1475	240	92	93	92,6	0,88	114	69	66	2,1	6,3	2,2	0,44	315
58.	2Sg 225M4	45	60	1480	290	93,9	94,3	94	0,88	137	83	79	2,6	7	2,3	0,53	345
59.	2Sg 250M4	55	75	1483	354	93,2	93,9	93,5	0,91	162	98	93	2,4	7,3	2,6	0,79	425
60.	2Sg 280S4	75	100	1485	482	92,5	93,5	94,2	0,90	222	134	128	2,5	7,3	2,5	1,37	585
61.	2Sg 280M4	90	125	1485	579	93,5	94,3	94,8	0,91	262	159	151	2,6	7,3	2,6	1,63	630
62.	2Sg 315S4	110	150	1480	710	94,1	94,4	94,2	0,92	379	193	183	2,3	6,9	2,2	1,67	720
63.	2Sg 315M4A	132	175	1487	848	94,5	95	94,9	0,90	388	235	223	2,3	7,6	2,5	1,84	750
64.	2Sg 315M4B	160	220	1489	1026	94,8	95,4	95,4	0,86	490	296	281	2,7	8,5	2,4	2,24	800
65.	SEE 315ML4	200	270	1487	1284	95,2	95,8	95,9	0,87	-	-	346	2,3	-	2,4	3,3	1200
66.	SEE 355ML4A	250	340	1489	1603	95,8	96,4	96,3	0,89	-	-	424	2,0	7,2	2,4	5,3	1680
67.	SEE 355ML4B	315	430	1489	2020	96,4	96,7	96,6	0,90	-	-	523	2,2	7,3	2,5	6,4	1810
68.	Sh 355H4Ds	355	480	1488	2278	96,3	96,7	96,5	0,88	-	-	604	1,6	7,6	2,2	7,8	2175
69.	Sh 355H4Es	400	540	1489	2566	96,4	96,8	96,7	0,88	-	-	678	1,8	6,5	2,3	9,1	2320
70.	Sh 400H4Cs	450	610	1490	2884	96,3	96,9	96,9	0,88	-	-	762	1,6	7,0	2,6	12,3	2920
71.	Sh 400H4Ds	500	680	1491	3203	96,2	96,7	96,7	0,88	-	-	848	1,6	7,6	2,6	13,6	3100
72.	Sh 400H4Es	560	760	1491	3587	96,6	97,0	97,0	0,87	-	-	958	1,7	7,5	2,6	15,0	3220
73.	Sh 400H4Fs	630	850	1491	4035	96,7	97,1	97,1	0,87	-	-	1076	1,9	7,6	2,8	16,5	3440
74.	Sh 450H4Bs	710	960	1492	4545	96,6	97,1	97,1	0,88	-	-	696 ²	1,6	8,4	2,5	27,1	4000
75.	Sh 450H4Cs	800	1080	1493	5117	96,8	97,1	97,1	0,89	-	-	774 ²	1,6	7,0	2,6	31,6	4400
76.	Sh 450H4Ds	900	1210	1493	6757	96,8	97,2	97,2	0,88	-	-	881 ²	1,0	6,8	2,5	35,4	4620
77.	Sh 450H4Es	1000	1350	1493	6397	96,8	97,3	97,3	0,89	-	-	966 ²	1,5	7,3	2,5	38,0	4700
78.	Sh 500H4Cs	1120	1510	1495	7155	96,7	97,4	97,4	0,87	-	-	1107 ²	0,8	7,3	2,5	58,4	6100
79.	Sh 500H4Ds	1250	1680	1495	7985	96,7	97,4	97,5	0,87	-	-	1234 ²	0,8	6,9	2,7	65,2	6600
80.	Sh 500H4Es	1400	1880	1494	8949	96,9	97,5	97,5	0,88	-	-	1367 ²	0,7	7,5	2,4	66,5	6900

² - at rated voltage 690 V

Item	Type	Rated output		Rated speed	Rated torque	Efficiency			Power factor	Full load current			Locked rotor torque	Locked rotor current	Breakdown torque	Moment of inertia	Weight (MB3)
		P _N				η _N	T _N	η _N [%] at % of full load			I _N at rated voltage						
		[kW]	[HP]	[min ⁻¹]	[Nm]	50%	75%	100%	cos φ _N	[A] _{230V}	[A] _{380V}	[A] _{400V}	T _L /T _N	I _L /I _N	T _b /T _N	J	m
2p=6 n_s=1000 rpm																	
81.	Sh 56-6B	0,06	0,08	870	0,64	44	46	50	0,65	1,1	0,65	0,65	1,3	1,8	1,5	0,00019	2,8
82.	Sh 63-6A	0,09	0,12	820	1,05	26	32	40	0,75	0,8	0,45	0,45	1,15	1,9	1,3	0,00024	3,5
83.	Sh 63-6B	0,12	0,17	870	1,30	38	44	50	0,65	1,15	0,65	0,65	1,3	1,8	1,1	0,00031	4,1
84.	Sh 71-6A	0,18	0,25	890	1,93	47	54	57	0,68	1,3	0,75	0,75	1,9	2,6	1,9	0,00074	4,8
85.	Sh 71-6B	0,25	0,33	860	2,78	45	52	55	0,79	1,75	1,0	1,0	1,6	2,0	1,6	0,00095	5,8
86.	Sh 80-6A	0,37	0,5	910	3,88	61	63	64	0,65	2,4	1,4	1,4	2,0	3,0	2,1	0,00169	7,4
87.	Sh 80-6B	0,55	0,75	900	5,84	62	65	67	0,70	3,1	1,8	1,8	1,9	2,7	2,0	0,00207	8,7
88.	Sh 90S-6	0,75	1	915	7,83	70,2	73,3	72,4	0,72	3,6	2,2	2,1	1,9	3,7	2,2	0,002	13,5
89.	Sh 90L-6	1,1	1,5	920	11,42	73,5	76,2	75,4	0,71	5,2	3,1	3,0	2,2	4	2,2	0,0028	16,5
90.	Sg 100L-6	1,5	2	945	15,16	74	76,9	76,7	0,73	6,7	4,1	3,9	1,9	4,6	2,3	0,009	24
91.	Sg 112M-6	2,2	3	960	21,89	81,6	83,8	83,8	0,78	8,4	5,1	4,9	2,2	5,9	2,8	0,0177	33
92.	Sg 132S-6	3	4	950	30,16	79,2	81,5	81	0,78	11,9	7,2	6,9	2,1	5,4	2,8	0,025	54
93.	Sg 132M-6A	4	5,5	950	40,21	83,5	84,8	84	0,79	15,1	9,2	8,7	2,4	6	3,1	0,032	66
94.	Sg 132M-6B	5,5	7,5	950	55,29	84,8	85,9	85	0,79	20,6	12,4	11,8	2,7	6,3	3,1	0,04	72
95.	Sg 160M-6	7,5	10	960	74,61	86,6	87,9	87,5	0,81	26,6	16,1	15,3	2,3	6,5	3,1	0,072	100
96.	Sg 160L-6	11	15	960	109,4	88,3	89,2	88,5	0,82	38	23	21,9	2,4	7	3,1	0,096	125
97.	Sg 180L-6	15	20	975	146,9	88	89,2	89	0,84	50,4	30,5	29,0	2,8	6	2,4	0,22	170
98.	2Sg 200L6A	18,5	25	980	180	90	90,8	90,5	0,86	60	36	34,5	2,5	6,8	2,4	0,41	250
99.	2Sg 200L6B	22	30	981	214	90	90,8	90,5	0,88	69	42	40	2,4	6,9	2,2	0,47	265
100.	2Sg 225M6	30	40	982	292	92,3	92,5	91,9	0,88	93	56	54	2,1	6,3	2,2	0,76	325
101.	2Sg 250M6	37	50	985	359	92	92,8	92,5	0,89	113	68	65	2,6	6,8	2,3	1,23	430
102.	2Sg 280S6	45	60	985	436	91,8	93	93	0,87	140	85	80	2	6,5	2,3	1,35	525
103.	2Sg 280M6	55	75	985	533	93,2	93,5	93,5	0,89	166	100	95	2,2	6,2	2,2	1,61	565
104.	2Sg 315S6	75	100	985	727	93,2	93,6	93,5	0,89	226	137	130	2,3	6,6	2,2	2,16	730
105.	2Sg 315M6A	90	125	984	873	92,8	93,8	93,7	0,88	274	166	158	2,5	6,8	2	2,29	740
106.	2Sg 315M6B	110	150	985	1066	93	94	94,2	0,89	329	199	189	2,3	7,2	2,1	2,86	840
107.	SEE 315ML6	160	220	987	1548	94,5	95,0	94,7	0,84	-	-	290	2,4	6,3	2,1	3,5	1240
108.	SEE 355ML6A	200	270	989	1931	95,4	95,9	95,7	0,86	-	-	351	2,1	7,0	2,4	7,2	1720
109.	SEE 355ML6B	250	340	990	2411	95,7	96,1	95,9	0,86	-	-	437	2,2	7,1	2,4	8,6	1920
110.	Sh 355H6Cs	315	430	991	3035	96,0	96,2	96,1	0,86	-	-	550	1,9	7,0	2,2	12,7	2370
111.	Sh 355H6Ds	355	480	991	3421	96,0	96,2	96,2	0,86	-	-	620	1,8	6,9	2,3	13,6	2480
112.	Sh 400H6Bs	400	540	992	3851	95,6	96,3	96,3	0,84	-	-	714	1,7	6,8	2,2	18,2	3050
113.	Sh 400H6Cs	450	610	993	4328	95,8	96,3	96,0	0,83	-	-	815	1,5	7,5	2,5	19,4	3250
114.	Sh 450H6As	500	680	994	4804	96,6	96,9	96,8	0,88	-	-	491 ²	1,2	6,7	2,6	36,5	3800
115.	Sh 450H6Bs	560	760	994	5380	96,7	97,0	96,9	0,88	-	-	549 ²	1,2	6,8	2,6	40,6	4300
116.	Sh 450H6Cs	630	850	994	6053	96,7	97,1	97,0	0,89	-	-	611 ²	1,3	7,0	2,6	45,0	4500
117.	Sh 450H6Ds	710	960	994	6821	96,5	96,8	96,8	0,89	-	-	690 ²	1,4	7,4	2,6	50,0	4890
118.	Sh 500H6As	800	1080	995	7678	96,7	97,1	97,0	0,86	-	-	802 ²	0,9	5,8	2,4	61,5	6200
119.	Sh 500H6Bs	900	1210	995	8638	96,8	97,1	97,0	0,87	-	-	893 ²	1,0	6,0	2,2	67,5	6550
120.	Sh 500H6Cs	1000	1350	995	9598	96,4	97,0	97,1	0,86	-	-	1002 ²	1,0	6,4	2,5	70,0	6700
121.	Sh 500H6Ds	1120	1510	996	10739	96,4	97,1	97,2	0,85	-	-	1134 ²	1,1	7,0	2,6	80,0	7130
122.	Sh 500H6Es	1250	1680	996	11985	96,4	97,1	97,2	0,85	-	-	1266 ²	1,1	7,1	2,6	84,9	7460

² - at rated voltage 690V

Totally Enclosed Motors IP 55

TECHNICAL DATA

Item	Type	Rated output		Rated speed n_N [min ⁻¹]	Rated torque T_N [Nm]	Efficiency			Power factor $\cos \phi_N$ [-]	Full load current			Locked rotor torque T_L/T_N [-]	Locked rotor current I_L/I_N [-]	Breakdown torque T_b/T_N [-]	Moment of inertia J [kgm ²]	Weight (IMB3) m [kg]
		P_N [kW]	[HP]			η_N [%] at % of full load	I_N at rated voltage										
		50%	75%	100%	[A] _{230V}	[A] _{380V}	[A] _{400V}										
2p=8 $n_s=750$ rpm																	
123.	Sh 63-8A	0,04	0,05	670	0,57	20	31	35	0,60	0,6	0,35	0,35	1,6	1,7	1,7	0,00024	3,5
124.	Sh 63-8B	0,06	0,08	660	0,87	20	24	28	0,48	1,1	0,65	0,65	1,4	1,5	1,6	0,000307	4,1
125.	Sh 71-8A	0,09	0,12	680	1,26	25	31	35	0,50	1,3	0,75	0,75	1,9	1,9	1,9	0,000736	4,7
126.	Sh 71-8B	0,12	0,17	670	1,71	40	45	47	0,63	1,25	0,7	0,7	1,7	1,9	1,8	0,000946	5,6
127.	Sh 80-8A	0,18	0,25	680	2,53	43	51	53	0,57	1,55	0,9	0,9	1,8	2,3	2,0	0,001693	7,2
128.	Sh 80-8B	0,25	0,33	680	3,51	52	55	57	0,60	2,1	1,2	1,2	1,7	2,5	1,7	0,00207	8,7
129.	Sh 90S-8	0,37	0,5	695	5,08	54,2	60,8	63,4	0,59	2,5	1,5	1,4	1,7	2,9	2,3	0,0021	13,4
130.	Sh 90L-8	0,55	0,75	675	7,78	60,4	65,3	65	0,64	3,3	2	1,9	1,7	2,8	1,9	0,0024	15,3
131.	Sg 100L-8A	0,75	1	710	10,1	65,9	70,5	71,1	0,66	4	2,4	2,3	1,4	3,5	1,9	0,009	23,6
132.	Sg 100L-8B	1,1	1,5	705	14,9	67,6	71,8	72,2	0,65	5,9	3,6	3,4	1,6	3,6	1,9	0,01	26,3
133.	Sg 112M-8	1,5	2	720	19,9	72,5	76,2	76,8	0,71	6,9	4,2	4,0	1,9	4,6	2,3	0,0192	31
134.	Sg 132S-8	2,2	3	710	29,6	75,4	78,2	78	0,74	9,6	5,8	5,5	2,0	4,7	2,4	0,033	53
135.	Sg 132M-8	3	4	710	40,4	78,5	80,7	80	0,74	12,7	7,7	7,3	2,3	5,0	3,0	0,044	65
136.	Sg 160M-8A	4	5,5	705	54,2	81,5	82,7	81,5	0,76	16,2	9,8	9,3	2,2	5,0	2,7	0,06	85
137.	Sg 160M-8B	5,5	7,5	710	74	82,1	83,7	83	0,75	22,2	13,4	12,8	2,7	5,5	3,0	0,077	95
138.	Sg 160L-8	7,5	10	705	102	84,5	85,5	84,5	0,78	28,6	17,3	16,4	2,7	5,8	3,0	0,102	115
139.	Sg 180L-8	11	15	730	144	87,7	89,2	89	0,76	40,8	24,7	23,5	2,0	5,5	2,4	0,213	165
140.	2Sg 200L8	15	20	733	195	88,8	90	89,5	0,83	51	30,5	29,1	2,2	5,5	2,1	0,45	255
141.	2Sg 225S8	18,5	25	735	240	88,8	90	89,5	0,81	64	39	37	2,0	5,6	2,0	0,58	280
142.	2Sg 225M8	22	30	735	286	90,0	90,8	90,4	0,8	76	46	44	2,0	5,2	1,8	0,68	315
143.	2Sg 250M8	30	40	738	388	91,0	92	91,5	0,84	98	59	56	2,5	6,3	2,1	1,27	430
144.	2Sg 280S8	37	50	737	479	92,0	93,1	92,8	0,83	121	73	69	2,0	5,3	1,8	1,47	535
145.	2Sg 280M8	45	60	737	583	92,0	92,8	92,5	0,84	145	88	84	2,1	5,4	2,0	1,8	590
146.	2Sg 315S8	55	75	735	715	92,0	93,0	92,7	0,81	184	111	106	2,0	5,3	1,9	2,16	720
147.	2Sg 315M8A	75	100	737	972	92,5	93,5	93,2	0,82	246	149	142	2,5	6,2	1,9	2,29	750
148.	2Sg 315M8B	90	125	737	1166	92,5	93,5	93,2	0,82	296	179	170	2,4	6,5	1,9	2,86	840
149.	Sg 355S8	132	175	741	1701	93,7	94,7	94,8	0,80	-	-	251	1,3	5,5	2,0	7,2	1320
150.	SEE 355ML8A	160	220	739	2068	95,1	95,5	95,0	0,80	-	-	305	1,6	5,8	2,0	7,0	1680
151.	SEE 355ML8B	200	270	740	2581	95,1	95,6	95,0	0,79	-	-	384	1,8	6,2	2,1	7,7	1750
152.	Sh 355H8Ds	250	340	742	3218	95,5	96,0	95,6	0,78	-	-	484	1,3	6,0	2,0	12,9	2440
153.	Sh 355H8Es	315	430	742	4054	95,6	96,0	95,8	0,78	-	-	609	1,3	6,0	2,0	16,0	2590
154.	Sh 400H8Ds	355	480	742	4569	95,3	95,9	95,9	0,77	-	-	695	1,2	5,8	2,0	18,8	3200
155.	Sh 400H8Es	400	540	742	5148	95,4	96,0	96,0	0,77	-	-	782	1,2	5,9	2,0	21,0	3350
156.	Sh 450H8Bs	450	610	746	5761	95,5	96,3	96,4	0,78	-	-	501 ²	1,0	5,8	2,1	41,6	4400
157.	Sh 450H8Cs	500	680	746	6401	95,5	96,3	96,4	0,78	-	-	557 ²	1,0	5,8	2,1	46,0	4600
158.	Sh 450H8Ds	560	760	746	7169	95,6	96,4	96,5	0,78	-	-	623 ²	1,0	5,7	2,1	49,0	4770
159.	Sh 450H8Es	630	850	746	8065	95,8	96,4	96,5	0,79	-	-	692 ²	1,0	5,6	2,0	53,8	4980
160.	Sh 500H8Bs	710	960	746	9089	96,0	96,6	96,7	0,81	-	-	758 ²	1,0	6,0	2,4	92,4	6500
161.	Sh 500H8Cs	800	1080	746	10241	96,0	96,6	96,7	0,80	-	-	865 ²	1,1	6,3	2,5	95,8	6780
162.	Sh 500H8Ds	900	1210	746	11522	96,1	96,8	96,9	0,80	-	-	971 ²	1,0	6,0	2,4	108	7240
163.	Sh 500H8Es	1000	1350	746	12802	96,1	96,8	96,9	0,80	-	-	1079 ²	1,1	6,5	2,5	118	7570

² at rated voltage 690 V

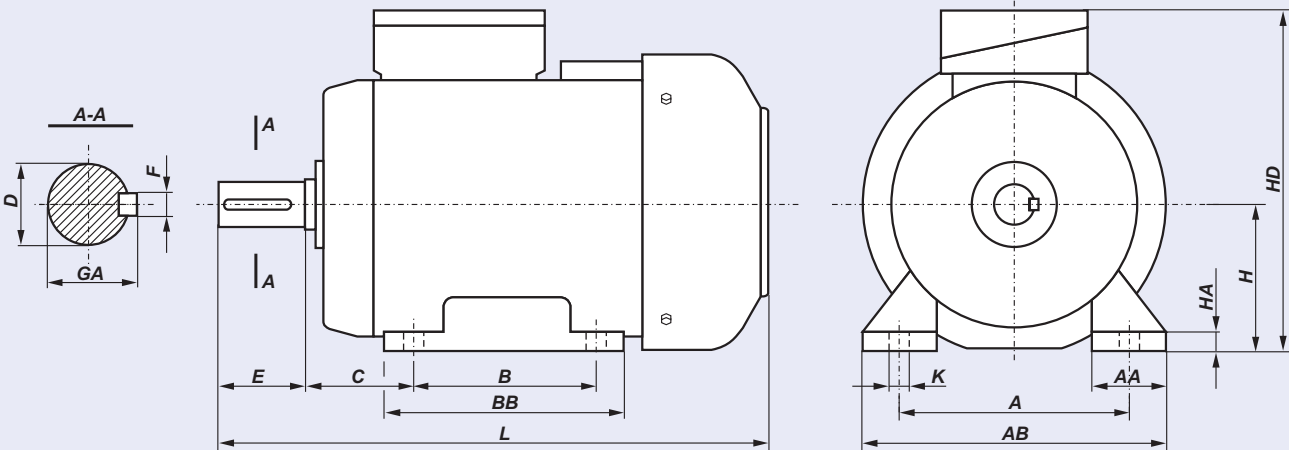
Totally Enclosed Motors IP 55

Item	Type	Rated output		Rated speed	Rated torque	Efficiency			Power factor	Full load current			Locked rotor torque	Locked rotor current	Breakdown torque	Moment of inertia	Weight (IMB3)
		P _N	η _N			T _N	η _N [%] at % of full load			I _N at rated voltage							
		[kW]	[HP]	[min ⁻¹]	[Nm]	50%	75%	100%	cos φ _N	[A] _{230V}	[A] _{380V}	[A] _{400V}	T _L /T _N	I _L /I _N	T _b /T _N	J	m
2p=10 n_s=600 rpm																	
164.	2Sg 200L10A	7,5	10	580	123	82,5	84	85	0,68	32,5	19,7	18,7	1,7	3,5	2,1	0,4	240
165.	2Sg 200L10B	11	15	590	178	84,7	86,7	87,5	0,68	46	28,1	26,7	3,2	5,9	2,4	0,47	255
166.	2Sg 225S10	13	18	592	210	87,5	89,3	90,5	0,67	54	32,5	31,0	1,8	3,8	2	0,6	280
167.	2Sg 225M10	15	20	590	243	86	88	89	0,67	63	38,0	36,5	2,8	5,4	2	0,76	315
168.	2Sg 225M10z	18,5	25	590	299	84,3	87,1	87,7	0,64	83	50	48	2,8	5,5	2,1	0,76	430
169.	2Sg 250M10	22	30	592	355	87,5	89,6	90	0,70	88	53	50	3	5,8	2	1,27	525
170.	2Sg 280S10A	30	40	585	489	85,3	87,3	88,8	0,71	119	72	69	2	4,5	1,7	1,35	565
171.	2Sg 280S10B	37	50	583	606	87	90	91	0,75	136	82	78	1,9	4,5	1,5	1,61	630
172.	2Sg 280M10	45	60	587	732	88	90,5	91,6	0,76	162	98	78	2	4,5	1,6	2,03	570
173.	2Sg 315S10z	55	75	583	901	88,0	90,5	91,5	0,75	201	122	116	1,7	4,7	1,9	2,86	840
174.	2Sg 315M10	75	100	583	1229	88,0	90,5	91,5	0,75	274	166	158	1,8	4,9	1,5	3,01	895
175.	Sg 355S10A	90	125	592	1453	93,1	94,1	94,0	0,81	-	-	176	1,4	5,7	2,2	8,2	1250
176.	Sg 355S10B	110	150	592	1774	93,8	94,6	94,4	0,79	-	-	213	1,4	5,8	2,4	10,3	1390
177.	Sg 355M10A	132	175	592	2129	93,9	94,6	94,4	0,80	-	-	253	1,8	6,1	2,3	12,7	1620
178.	Sg 355M10B	160	220	592	2581	93,7	94,7	94,7	0,83	-	-	294	1,8	6,3	2,4	14,1	1730
179.	Sh 400 H10As	200	270	594	3216	94,4	95,1	95,0	0,82	-	-	371	1,0	5,4	2,5	25,6	3010
180.	Sh 400 H10Bs	250	340	594	4019	94,4	95,2	95,2	0,79	-	-	480	1,1	5,6	2,6	31,3	3270
181.	Sh 450H10As	315	430	594	5064	94,9	95,5	95,5	0,81	-	-	341 ¹	1,0	5,9	2,2	49,4	4050
182.	Sh 450H10Bs	355	480	594	5708	95,0	95,7	95,7	0,81	-	-	384 ¹	1,0	6,0	2,3	53,9	4130
183.	Sh 450H10Cs	400	540	594	6431	95,0	95,7	95,7	0,81	-	-	432 ¹	1,1	6,4	2,3	58,3	4300
184.	Sh 500H10As	450	610	594	7235	95,1	95,8	95,7	0,81	-	-	486 ¹	1,4	6,3	2,1	74,1	5420
185.	Sh 500H10Bs	500	680	594	8039	95,2	95,9	95,8	0,82	-	-	533 ¹	1,5	6,6	2,2	85,5	5700
186.	Sh 500H10Cs	560	760	593	9019	95,4	95,9	95,8	0,82	-	-	597 ¹	1,3	6,2	2,0	94,2	5950
187.	Sh 500H10Ds	630	850	594	10129	95,5	96,0	96,0	0,82	-	-	670 ¹	1,7	6,9	2,2	108	6400
2p=12 n_s=500 rpm																	
188.	2Sg 200L12	9	12	490	175	75,3	80,1	81,8	0,55	50	30,5	28,9	2,7	4,3	2,5	0,47	255
189.	2Sg 225S12	11	15	490	214	83,1	85,0	86,0	0,63	51	31	29,3	1,7	3,5	1,7	0,58	315
190.	2Sg 225M12	13	18	475	261	81,5	82,2	82,5	0,59	67	41	38,5	1,7	3,5	1,7	0,68	350
191.	2Sg 225M12z	15	20	491	292	80,5	83,5	84,4	0,58	77	46,5	44	2,7	4,6	1,8	0,68	350
192.	2Sg 250M12	18,5	25	490	361	84,0	86,0	87,8	0,65	81	49	47	1,7	3,5	1,8	1,27	430
193.	2Sg 280S12	22	30	491	428	86,9	89,2	89,6	0,61	101	61	58	2,3	4,5	1,8	1,47	535
194.	2Sg 280M12	30	40	490	585	85,6	88,2	89,0	0,62	136	83	78	1,8	3,5	1,8	1,8	570
195.	2Sg 315S12	37	50	492	718	87,5	89,9	90,4	0,58	177	107	102	2,6	4,5	1,9	2,29	730
196.	2Sg 315M12A	45	60	490	877	87,9	89,0	90,1	0,58	216	131	124	2	3,5	1,8	2,86	870
197.	2Sg 315M12B	55	75	490	1072	87,5	90,0	89,5	0,58	266	161	153	2,5	4,4	1,8	3,01	885
198.	Sg 355S12	75	100	492	1456	91,2	92,6	92,5	0,75	-	-	157	1,2	4,3	1,9	8,3	1250
199.	Sg 355S12A	90	125	493	1743	92,5	93,6	93,4	0,72	-	-	193	1,2	5,6	2,2	10,4	1390
200.	Sg 355S12B	110	150	491	2140	92,6	93,7	93,5	0,76	-	-	224	1,5	5,1	1,9	12,1	1570
201.	Sg 355M12	132	175	492	2562	92,4	93,8	94,2	0,74	-	-	273	1,2	4,8	1,9	13,1	1730
202.	Sh 450H12As	160	220	495	3087	94,1	95,0	95,0	0,79	-	-	308	0,9	5,9	2,6	30,0	3470
203.	Sh 450H12Bs	200	270	495	3859	94,7	94,9	94,9	0,80	-	-	381	0,9	5,7	2,3	33,7	3600
204.	Sh 450H12Cs	250	340	493	4843	94,7	95,0	94,7	0,82	-	-	465	0,8	5,1	2,2	40,0	3750
205.	Sh 450H12Ds	315	430	493	6102	94,9	95,2	94,9	0,82	-	-	584	0,8	5,1	2,3	45,0	4050

TECHNICAL DATA

¹ - at rated voltage 690 V

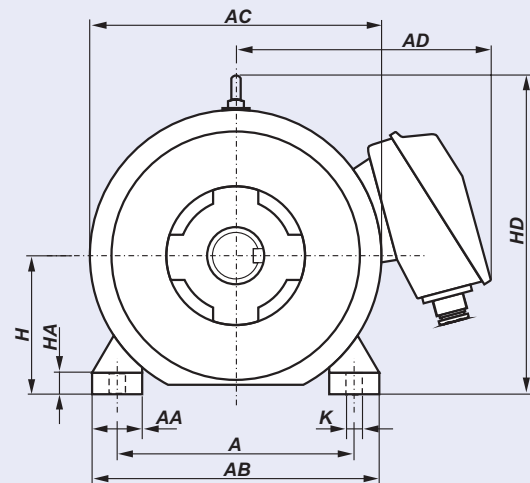
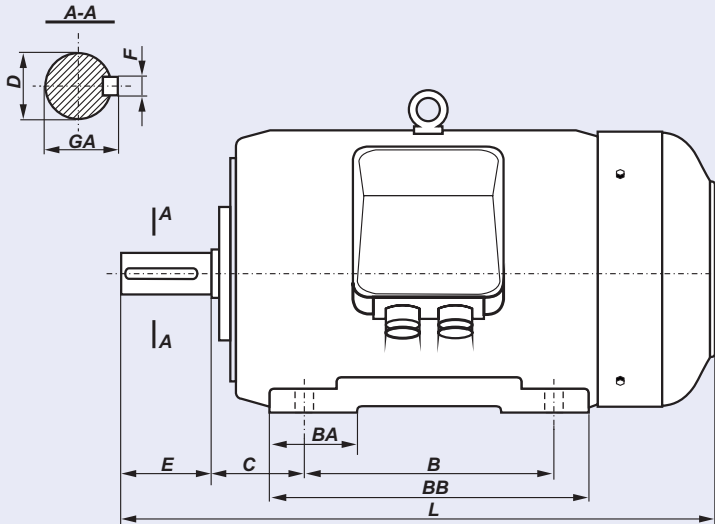
FOOT MOUNTED MOTORS - IM B3



DIMENSION DRAWINGS

Motor type	A	B	C	D	E	F	GA	H	HA	K	AA	AB	BB	HD	L
Sh 56-2A	90	71	36	9j6	20	3h9	10,2	56	7	5,8	30	110	92	154	183
Sh 56-4A	90	71	36	9j6	20	3h9	10,2	56	7	5,8	30	110	92	154	183
Sh 56-2B	90	71	36	9j6	20	3h9	10,2	56	7	5,8	30	110	92	154	193
Sh 56-4B	90	71	36	9j6	20	3h9	10,2	56	7	5,8	30	110	92	154	193
Sh 56-6B	90	71	36	9j6	20	3h9	10,2	56	7	5,8	30	110	92	154	193
Sh 63-A	100	80	40	11j6	23	4h9	12,5	63	8,5	7	36	124	106	165	200
Sh 63-B	100	80	40	11j6	23	4h9	12,5	63	8,5	7	36	124	106	165	210
Sh 71-A	112	90	45	14j6	30	5h9	16	71	8	7	45	142	116	182	223
Sh 71-B	112	90	45	14j6	30	5h9	16	71	8	7	45	142	116	182	245
Sh 80-A	125	100	50	19j6	40	6h9	21,5	80	9	10	55	160	130	199	266
Sh 80-B	125	100	50	19j6	40	6h9	21,5	80	9	10	55	160	130	199	278
Sh 90S ...	140	100	56	24j6	50	8h9	27	90	10	10	50	170	153	220	305
Sh 90L ...	140	125	56	24j6	50	8h9	27	90	10	10	50	170	153	220	330
Sg 100L ...	160	140	63	28j6	60	8h9	31	100	14	12	45	200	172	240	376
Sg 112M ...	190	140	70	28j6	60	8h9	31	112	14	12	54	230	174	276	384
Sg 132S ...	216	140	89	38k6	80	10h9	41	132	16	12	56	278	182	310	463
Sg 132S-2B	216	140	89	38k6	80	10h9	41	132	16	12	56	278	220	310	501
Sg 132M ...	216	178	89	38k6	80	10h9	41	132	16	12	56	278	220	310	501
Sg 160M ...	254	210	108	42k6	110	12h9	45	160	20	15	60	305	256	370	612
Sg 160L ...	254	254	108	42k6	110	12h9	45	160	20	15	60	305	300	370	656
Sg 180M ...	279	241	121	48k6	110	14h9	51,5	180	26	15	70	350	320	408	705
Sg 180L ...	279	279	121	48k6	110	14h9	51,5	180	26	15	70	350	320	408	705

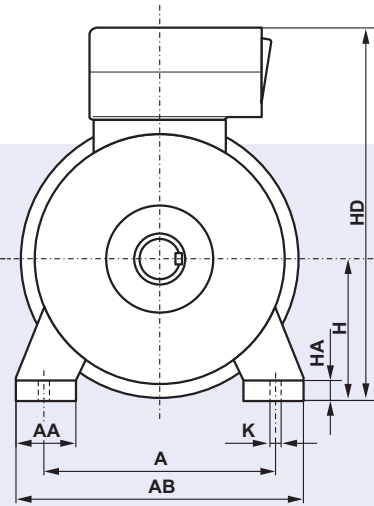
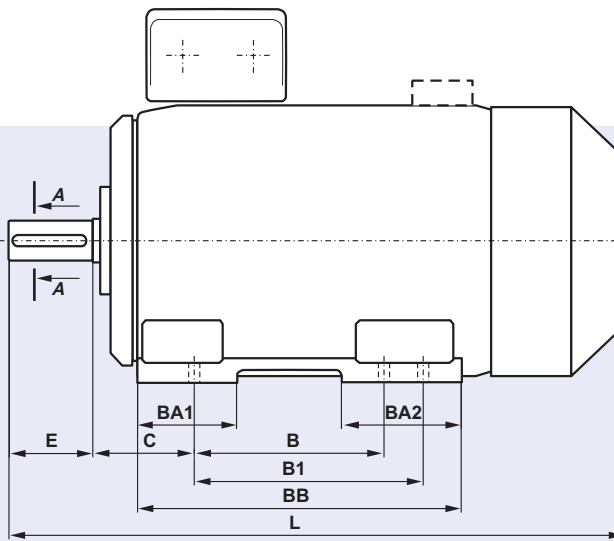
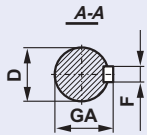
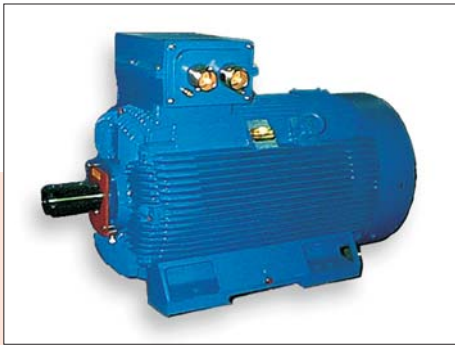
FOOT MOUNTED MOTORS - IM B3



Motor type	A	B	C	D	E	F	GA	H	HA	K	AA	AB	AC	AD	BA	BB	HD	L
2Sg 200 L..	318	305	133	55m6	110	16h9	59	200	32	19	80	400	450	355	100	380	485	825
2Sg 225 S..	356	286	149	60m6	140	18h9	64	225	34	19	85	445	505	375	110	355	535	865
2Sg 225 M2	356	311	149	55m6	110	16h9	59	225	34	19	85	445	505	375	110	380	535	860
2Sg 225 M..	356	311	149	60m6	140	18h9	64	225	34	19	85	445	505	375	110	380	535	890
2Sg 250 M2	406	349	168	60m6	140	18h9	64	250	36	24	90	495	540	415	120	420	590	965
2Sg 250 M..	406	349	168	65m6	140	18h9	69	250	36	24	90	495	540	415	120	420	590	965
2Sg 280 S2	457	368	190	65m6	140	18h9	69	280	40	24	100	560	620	450	165	520	660	1040
2Sg 280 S..	457	368	190	75m6	140	20h9	79,5	280	40	24	100	560	620	450	165	520	660	1040
2Sg 280 M2	457	419	190	65m6	140	18h9	69	280	40	24	100	560	620	450	165	520	660	1040
2Sg 280 M..	457	419	190	75m6	140	20h9	79,5	280	40	24	100	560	620	450	165	520	660	1040
2Sg 315 S2	508	406	216	65m6	140	18h9	69	315	46	28	105	610	620	450	190	560	695	1180
2Sg 315 S..	508	406	216	80m6	170	22h9	85	315	46	28	105	610	620	450	190	560	695	1210
2Sg 315 M2	508	457	216	65m6	140	18h9	69	315	46	28	105	610	620	450	190	560	695	1180
2Sg 315 M..	508	457	216	80m6	170	22h9	85	315	46	28	105	610	620	450	190	560	695	1210
Sg 355 S..	610	500	254	100m6	210	28h9	106	355	50	28	158	720	764	587	170	600	848	1394
Sg 355 M..	610	560	254	100m6	210	28h9	106	355	50	28	158	720	764	587	205	730	848	1454

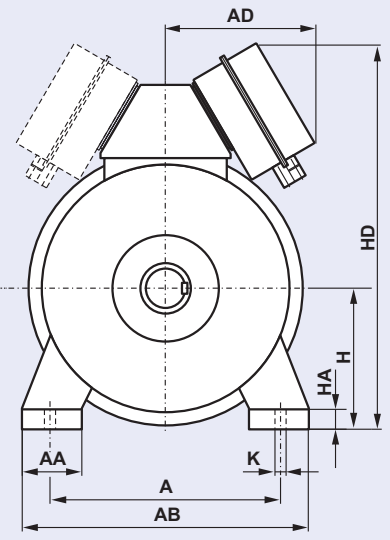
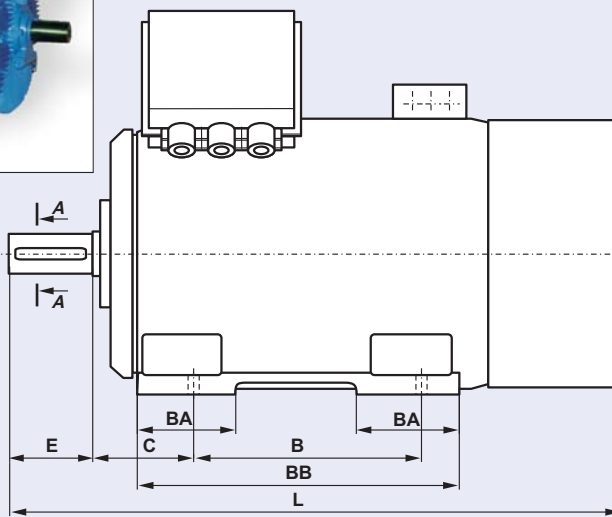
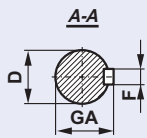
DIMENSION DRAWINGS

FOOT MOUNTED MOTORS - IM B3



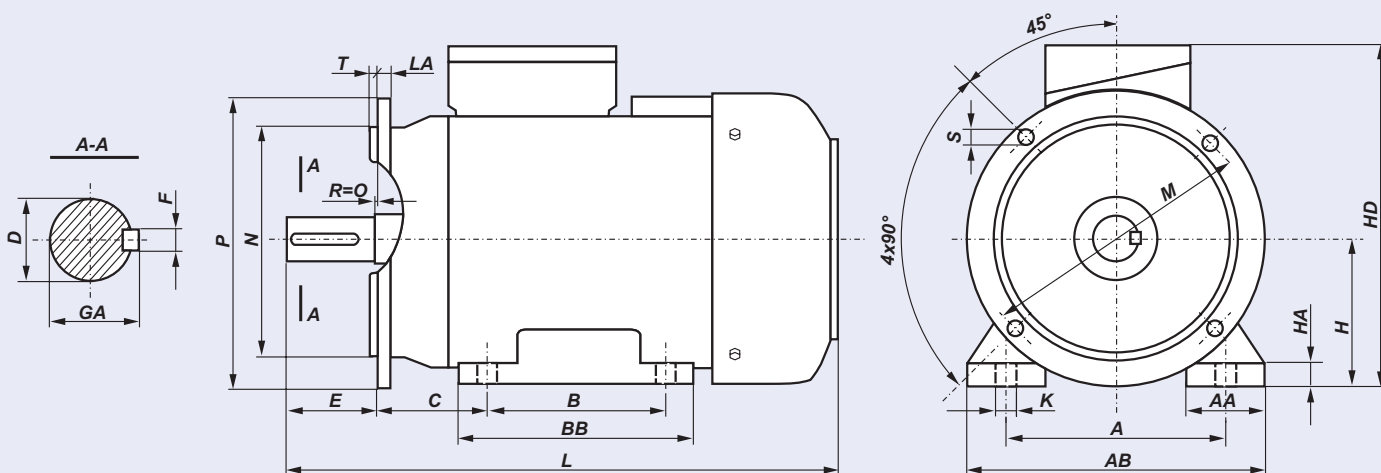
DIMENSION DRAWINGS

Motor type	Poles	A	B	B1	C	D	E	F	GA	H	HA	K	AA	AB	BA1	BA2	BB	HD	L
		SEE 315ML	4+6	508	457	508	216	80	170	22	85	315	40	28	120	620	150	180	637
SEE 355...	2	610	560	630	254	80	170	22	85	355	50	28	150	720	250	300	890	935	1580
SEE 355...	4+8	610	560	630	254	100	210	28	106	355	50	28	150	720	250	300	890	935	1620
Sh 355...s	2	610	900	-	200	70	140	20	74,5	355	45	28	160	730	265	265	1045	995	1800
Sh 355...s	4+8	610	900	-	200	100	210	28	106	355	45	28	160	730	265	265	1045	995	1870



Motor type	Poles	A	B	C	D	E	F	GA	H	HA	K	AA	AB	AD	BA	BB	HD	L
		Sh 400...s	2	686	1000	224	80	170	22	85	400	50	35	175	840	520	265	1160
Sh 400...s	4+8	686	1000	224	110	210	28	116	400	50	35	175	840	520	265	1160	1255	1960
Sh 450...s	4+12	750	1120	254	110	210	28	116	450	60	35	205	940	560	340	1320	1356	2105
Sh 500...s	4+10	850	1250	280	120	210	32	127	500	70	42	223	1050	560	300	1450	1470	2430

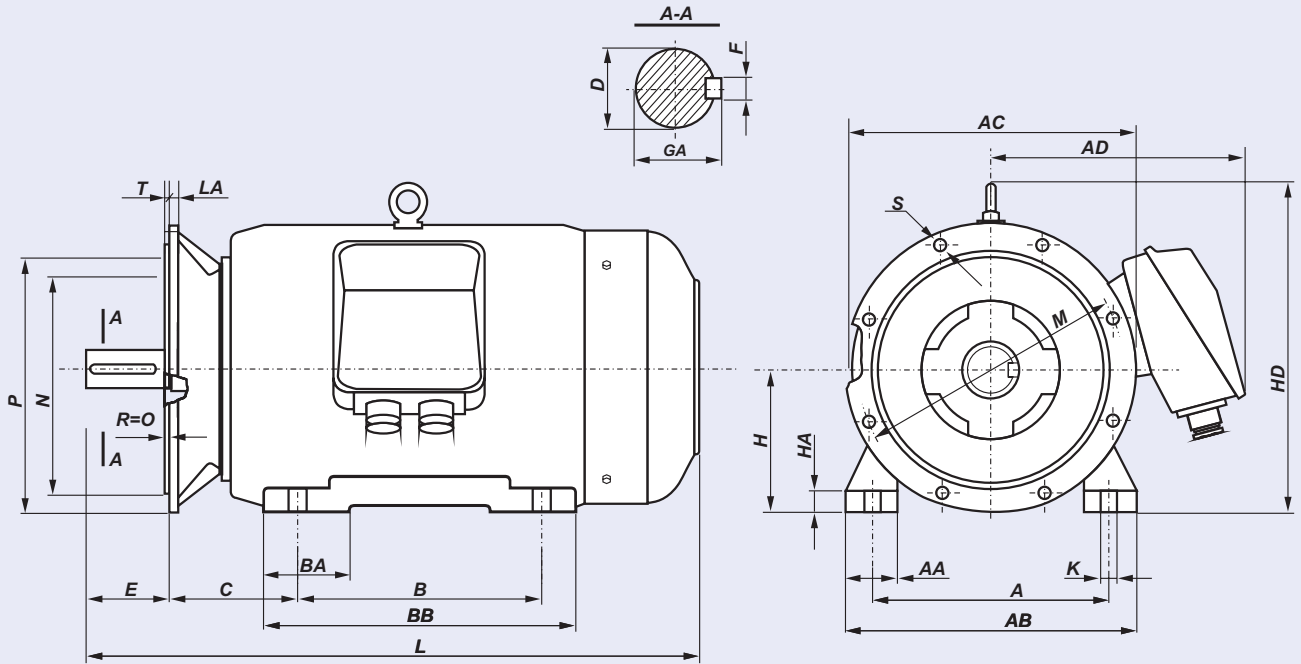
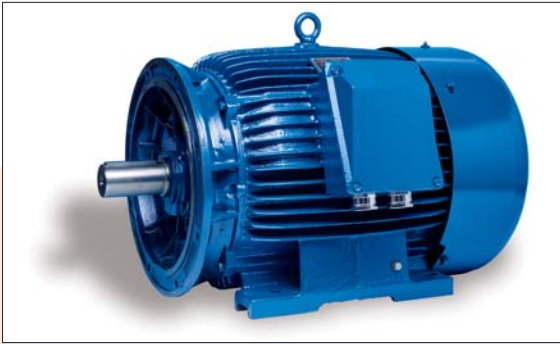
FOOT/FLANGE MOUNTED MOTORS - IM B35



Motor type	A	B	C	D	E	F	GA	H	HA	K	AA	AB	BB	HD	L	LA	M	N	P	T	S
SLh 56-2A	90	71	36	9j6	20	3h9	10,2	56	7	8	30	110	92	154	183	8	100	80j6	120	3	7
SLh 56-4A	90	71	36	9j6	20	3h9	10,2	56	7	8	30	110	92	154	183	8	100	80j6	120	3	7
SLh 56-2B	90	71	36	9j6	20	3h9	10,2	56	7	8	30	110	92	154	193	8	100	80j6	120	3	7
SLh 56-4B	90	71	36	9j6	20	3h9	10,2	56	7	8	30	110	92	154	193	8	100	80j6	120	3	7
SLh 56-6B	90	71	36	9j6	20	3h9	10,2	56	7	8	30	110	92	154	193	8	100	80j6	120	3	7
SLh 63- .A	100	80	40	11j6	23	4h9	12,5	63	8,5	10	36	124	106	165	200	9	115	95j6	140	3	10
SLh 63- .B	100	80	40	11j6	23	4h9	12,5	63	8,5	10	36	124	106	165	210	9	115	95j6	140	3	10
SLh 71- .A	112	90	45	14j6	30	5h9	16	71	8	10	45	142	116	182	223	9	130	110j6	160	3,5	10
SLh 71- .B	112	90	45	14j6	30	5h9	16	71	8	10	45	142	116	182	245	9	130	110j6	160	3,5	10
SLh 80- .A	125	100	50	19j6	40	6h9	21,5	80	9	10	55	160	130	199	266	10	165	130j6	200	3,5	12
SLh 80- .B	125	100	50	19j6	40	6h9	21,5	80	9	10	55	160	130	199	278	10	165	130j6	200	3,5	12
SLh 90S ...	140	100	56	24j6	50	8h9	27	90	10	10	50	170	153	220	305	8	165	130j6	200	3,5	12
SLh 90L ...	140	125	56	24j6	50	8h9	27	90	10	10	50	170	153	220	330	8	165	130j6	200	3,5	12
SLg 100L ...	160	140	63	28j6	60	8h9	31	100	14	12	45	200	172	240	376	11	215	180j6	250	4	15
SLg 112M ...	190	140	70	28j6	60	8h9	31	112	14	12	54	230	174	276	384	12	215	180j6	250	4	15
SLg 132S ...	216	140	89	38k6	80	10h9	41	132	16	12	56	278	182	310	463	12	265	230j6	300	4	15
SLg 132S-2B	216	140	89	38k6	80	10h9	41	132	16	12	56	278	220	310	501	12	265	230j6	300	4	15
SLg 132M ...	216	178	89	38k6	80	10h9	41	132	16	12	56	278	220	310	501	12	265	230j6	300	4	15
SLg 160M ...	254	210	108	42k6	110	12h9	45	160	20	15	60	305	256	370	612	13	300	250j6	350	5	19
SLg 160L ...	254	254	108	42k6	110	12h9	45	160	20	15	60	305	300	370	656	13	300	250j6	350	5	19
SLg 180M ...	279	241	121	48k6	110	14h9	51,5	180	26	15	70	350	320	408	705	13	300	250j6	350	5	19
SLg 180L ...	279	279	121	48k6	110	14h9	51,5	180	26	15	70	350	320	408	705	13	300	250j6	350	5	19

DIMENSION DRAWINGS

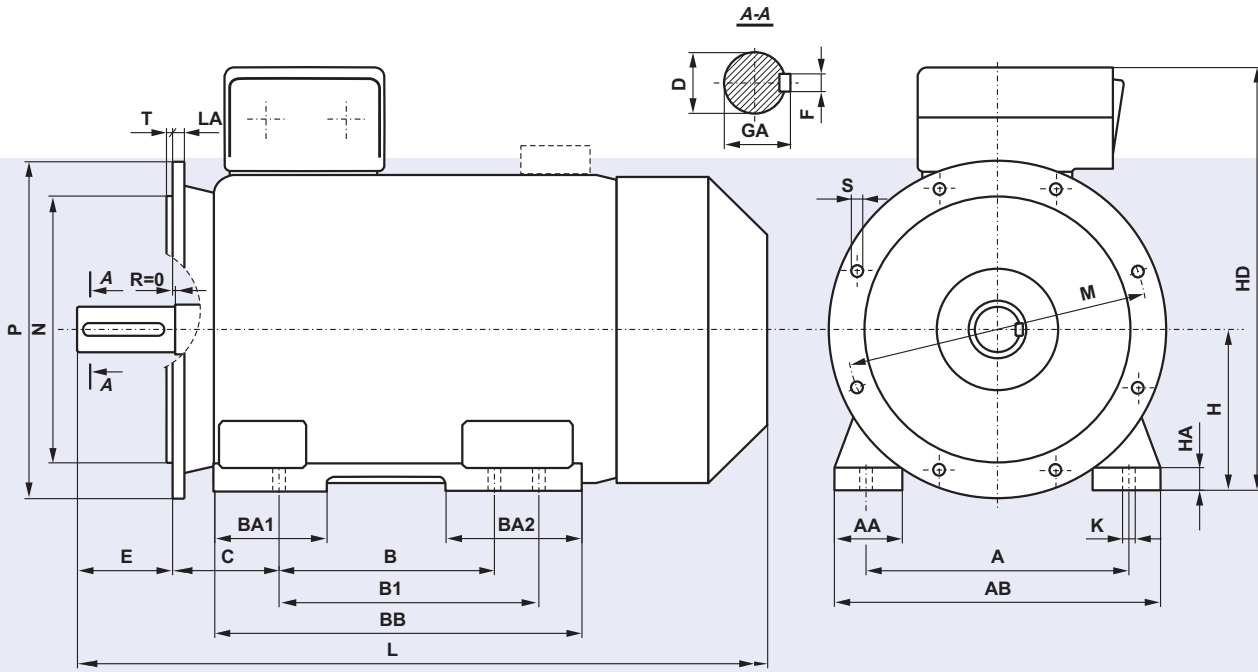
FOOT/FLANGE MOUNTED MOTORS - IM B35



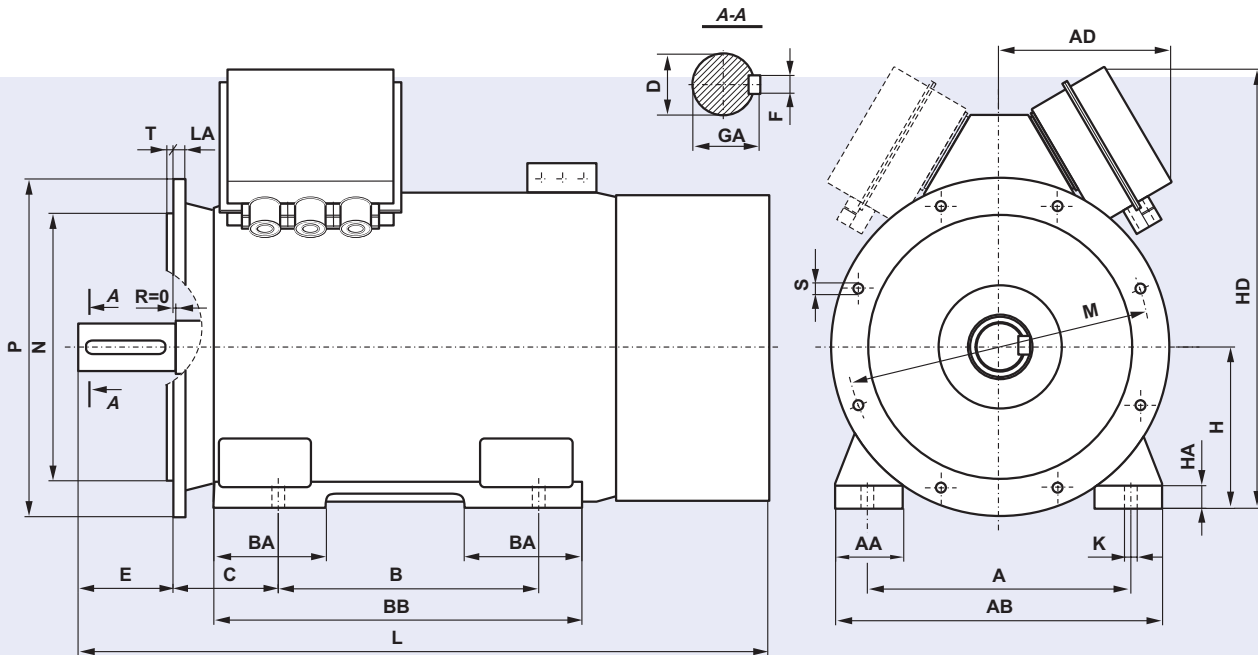
DIMENSION DRAWINGS

Motor type	A	B	C	D	E	F	GA	H	HA	K	AA	AB	AC	AD	BA	BB	HD	L	LA	M	N	P	T	S	ϕ	Holes
2SLg 200 L..	318	305	133	55m6	110	16h9	59	200	32	19	80	400	450	355	100	380	485	825	16,5	350	300j6	400	5	18	4	
2SLg 225 S..	356	286	149	60m6	140	18h9	64	225	34	19	85	445	505	375	110	355	535	870	18	400	350j6	450	5	18	8	
2SLg 225 M2	356	311	149	55m6	110	16h9	59	225	34	19	85	445	505	375	110	380	535	865	18	400	350j6	450	5	18	8	
2SLg 225 M..	356	311	149	60m6	140	18h9	64	225	34	19	85	445	505	375	110	380	535	895	18	400	350j6	450	5	18	8	
2SLg 250 M2	406	349	168	60m6	140	18h9	64	250	36	24	90	495	540	415	120	420	590	965	19	500	450j6	550	5	18	8	
2SLg 250 M..	406	349	168	65m6	140	18h9	69	250	36	24	90	495	540	415	120	420	590	965	19	500	450j6	550	5	18	8	
2SLg 280 S2	457	368	190	65m6	140	18h9	69	280	40	24	100	560	620	450	165	520	660	1040	20	500	450j6	550	5	18	8	
2SLg 280 S..	457	368	190	75m6	140	20h9	79,5	280	40	24	100	560	620	450	165	520	660	1040	20	500	450j6	550	5	18	8	
2SLg 280 M2	457	419	190	65m6	140	18h9	69	280	40	24	100	560	620	450	165	520	660	1040	20	500	450j6	550	5	18	8	
2SLg 280 M..	457	419	190	75m6	140	20h9	79,5	280	40	24	100	560	620	450	165	520	660	1040	20	500	450j6	550	5	18	8	
2SLg 315 S2	508	406	216	65m6	140	18h9	69	315	46	28	105	610	620	450	190	560	695	1180	22	600	550js6	660	6	22	8	
2SLg 315 S..	508	406	216	80m6	170	22h9	85	315	46	28	105	610	620	450	190	560	695	1210	22	600	550js6	660	6	22	8	
2SLg 315 M2	508	457	216	65m6	140	18h9	69	315	46	28	105	610	620	450	190	560	695	1180	22	600	550js6	660	6	22	8	
2SLg 315 M..	508	457	216	80m6	170	22h9	85	315	46	28	105	610	620	450	190	560	695	1210	22	600	550js6	660	6	22	8	
SLg 355 S..	610	500	254	100m6	210	28h9	106	355	50	28	158	720	764	587	170	600	848	1394	24	740	680	800	6	24	8	
SLg 355 M..	610	560	254	100m6	210	28h9	106	355	50	28	158	720	764	587	205	730	848	1454	24	740	680	800	6	24	8	

FOOT/FLANGE MOUNTED MOTORS - IM B35



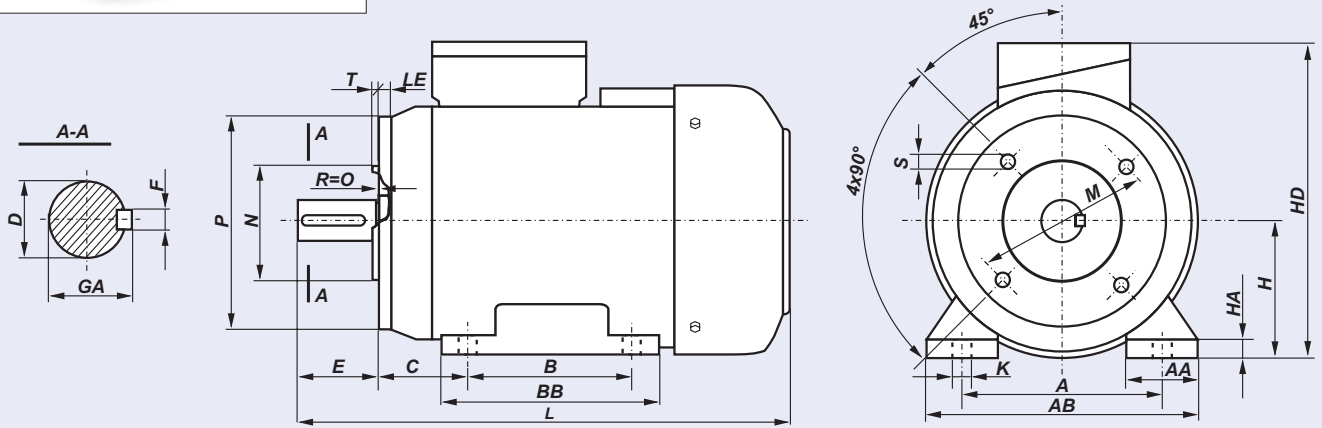
Type of motor	Poles	Dimensions (mm)																							
		A	B	B1	C	D	E	F	GA	H	HA	K	AA	AB	BA1	BA2	BB	HD	L	LA	M	N	P	S	T
SLEE 315ML	4+6	508	457	508	216	80	170	22	85	315	40	28	120	620	150	180	637	865	1345	22	600	550	660	22	6
SLEE 355....	2	610	560	630	254	80	170	22	85	355	50	28	150	720	250	300	890	935	1580	24	740	680	800	22	6
SLEE 355....	4+8	610	560	630	254	100	210	28	106	355	50	28	150	720	250	300	890	935	1620	24	740	680	800	22	6
SLh 355...s	2	610	900	-	254	70	140	20	74,5	355	45	28	160	730	265	265	1045	995	1854	24	740	680	800	22	6
SLh 355...s	4+8	610	900	-	254	100	210	28	106	355	45	28	160	730	265	265	1045	995	1924	24	740	680	800	22	6



Type of motor	Poles	Dimensions (mm)																						
		A	B	C	D	E	F	GA	H	HA	K	AA	AB	AD	BA	BB	HD	L	LA	M	N	P	S	T
SLh 400...s	2	686	1000	280	80	170	22	85	400	50	35	175	840	520	265	1160	1255	2031	30	940	880	1000	25	6
SLh 400...s	4+8	686	1000	280	110	210	28	116	400	50	35	175	840	520	265	1160	1255	2016	30	940	880	1000	25	6
SLh 450...s	4+12	750	1120	315	110	210	28	116	450	60	35	205	940	560	340	1320	1356	2162	30	1080	1000	1150	28	6
SLh 500...s	4+10	850	1250	355	120	210	32	127	500	70	42	223	1050	560	300	1450	1470	2505	30	1080	1000	1150	28	6

DIMENSION DRAWINGS

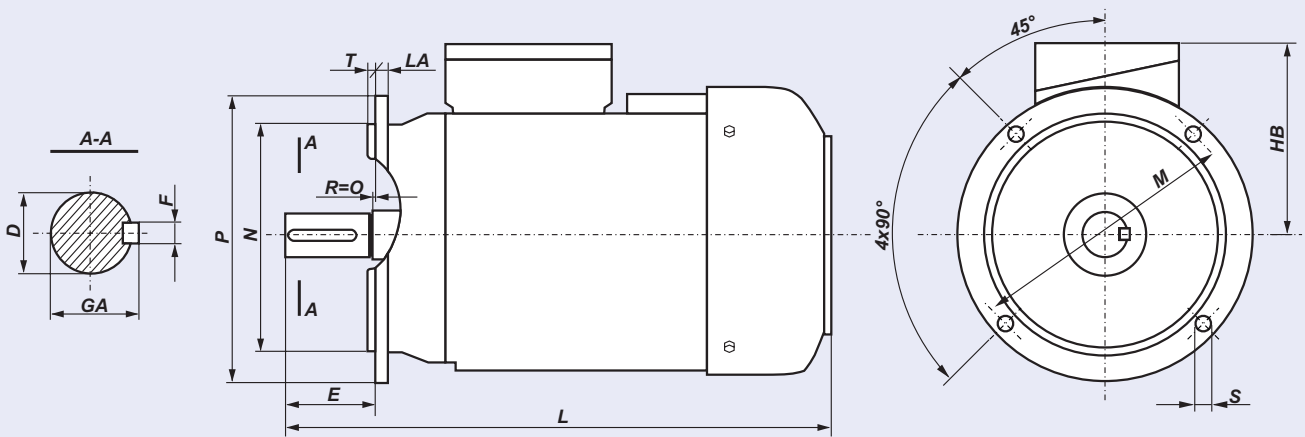
FOOT/FLANGE MOUNTED MOTORS - IM B34



DIMENSION DRAWINGS

Motor type	Flange	A	AA	B	C	D	E	F	GA	H	HA	K	M	N	P	S	LE	T	HD	L
SLh 56-2A1	B14/C1	90	30	71	36	9j6	20	3h9	10,2	56	7	8	85	70j6	105	M6	15	2,5	154	183
SLh 56-2A2	B14/C2	90	30	71	36	9j6	20	3h9	10,2	56	7	8	65	50j6	80	M5	12,5	2,5	154	183
SLh 56-4A1	B14/C1	90	30	71	36	9j6	20	3h9	10,2	56	7	8	85	70j6	105	M6	15	2,5	154	183
SLh 56-4A2	B14/C2	90	30	71	36	9j6	20	3h9	10,2	56	7	8	65	50j6	80	M5	12,5	2,5	154	183
SLh 56-2B1	B14/C1	90	30	71	36	9j6	20	3h9	10,2	56	7	8	85	70j6	105	M6	15	2,5	154	193
SLh 56-2B2	B14/C2	90	30	71	36	9j6	20	3h9	10,2	56	7	8	65	50j6	80	M5	12,5	2,5	154	193
SLh 56-4B1	B14/C1	90	30	71	36	9j6	20	3h9	10,2	56	7	8	85	70j6	105	M6	15	2,5	154	193
SLh 56-4B2	B14/C2	90	30	71	36	9j6	20	3h9	10,2	56	7	8	65	50j6	80	M5	12,5	2,5	154	193
SLh 56-6B1	B14/C1	90	30	71	36	9j6	20	3h9	10,2	56	7	8	85	70j6	105	M6	15	2,5	154	193
SLh 56-6B2	B14/C2	90	30	71	36	9j6	20	3h9	10,2	56	7	8	65	50j6	80	M5	12,5	2,5	154	193
SLh 63- .A1	B14/C1	100	36	80	40	11j6	23	4h9	12,5	63	8,5	10	100	80j6	120	M6	14	3	165	200
SLh 63- .A2	B14/C2	100	36	80	40	11j6	23	4h9	12,5	63	8,5	10	75	60j6	90	M5	9,5	2,5	165	200
SLh 63- .B1	B14/C1	100	36	80	40	11j6	23	4h9	12,5	63	8,5	10	100	80j6	120	M6	14	3	165	210
SLh 63- .B2	B14/C2	100	36	80	40	11j6	23	4h9	12,5	63	8,5	10	75	60j6	90	M5	9,5	2,5	165	210
SLh 71- .A1	B14/C1	112	45	90	45	14j6	30	5h9	16	71	8	10	115	95j6	140	M8	14	3	182	223
SLh 71- .A2	B14/C2	112	45	90	45	14j6	30	5h9	16	71	8	10	85	70j6	105	M6	12	2,5	182	223
SLh 71- .B1	B14/C1	112	45	90	45	14j6	30	5h9	16	71	8	10	115	95j6	140	M8	14	3	182	245
SLh 71- .B2	B14/C2	112	45	90	45	14j6	30	5h9	16	71	8	10	85	70j6	105	M6	12	2,5	182	245
SLh 80- .A1	B14/C1	125	55	100	50	19j6	40	6h9	21,5	80	9	10	130	110j6	160	M8	14	3,5	199	266
SLh 80- .A2	B14/C2	125	55	100	50	19j6	40	6h9	21,5	80	9	10	100	80j6	120	M6	12	3	199	266
SLh 80- .B1	B14/C1	125	55	100	50	19j6	40	6h9	21,5	80	9	10	130	110j6	160	M8	14	3,5	199	278
SLh 80- .B2	B14/C2	125	55	100	50	19j6	40	6h9	21,5	80	9	10	100	80j6	120	M6	12	3	199	278
SLh 90S ...	B14/C1	140	50	100	56	24j6	50	8h9	27	90	10	10	130	110j6	160	M8	10	3,5	220	305
SLh 90S ...	B14/C2	140	50	100	56	24j6	50	8h9	27	90	10	10	115	95j6	140	M8	10	3	220	305
SLh 90L ...	B14/C1	140	50	125	56	24j6	50	8h9	27	90	10	10	130	110j6	160	M8	10	3,5	220	330
SLh 90L ...	B14/C2	140	50	125	56	24j6	50	8h9	27	90	10	10	115	95j6	140	M8	10	3	220	330
SLg 100L ...	B14/C1	160	45	140	63	28j6	60	8h9	31	100	14	12	165	130j6	200	M10	12	3,5	240	376
SLg 100L ...	B14/C2	160	45	140	63	28j6	60	8h9	31	100	14	12	130	110j6	160	M8	12	3,5	240	376
SLg 112M ...	B14/C1	190	54	140	70	28j6	60	8h9	31	112	14	12	165	130j6	200	M10	12	3,5	276	384
SLg 112M ...	B14/C2	190	54	140	70	28j6	60	8h9	31	112	14	12	130	110j6	160	M8	12	3,5	276	384
SLg 132S ...	B14/C1	216	56	140	89	38k6	80	10h9	41	132	16	12	215	180j6	250	M12	12	4	310	463
SLg 132S ...	B14/C2	216	56	140	89	38k6	80	10h9	41	132	16	12	165	130j6	200	M10	12	3,5	310	463
SLg 132S-2B	B14/C1	216	56	140	89	38k6	80	10h9	41	132	16	12	215	180j6	250	M12	12	4	310	501
SLg 132S-2B	B14/C2	216	56	140	89	38k6	80	10h9	41	132	16	12	165	130j6	200	M10	12	3,5	310	501
SLg 132M...	B14/C1	216	56	140	89	38k6	80	10h9	41	132	16	12	215	180j6	250	M12	12	4	310	501
SLg 132M...	B14/C2	216	56	140	89	38k6	80	10h9	41	132	16	12	165	130j6	200	M10	12	3,5	310	501

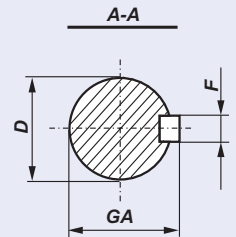
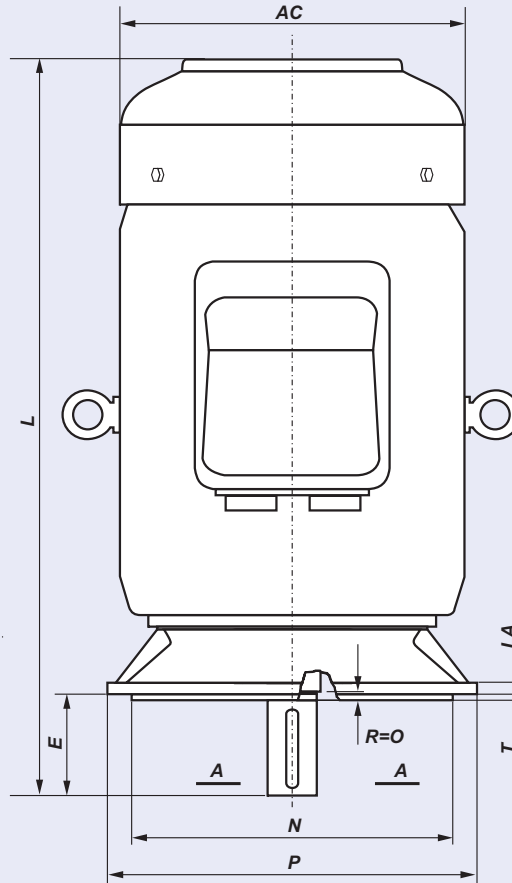
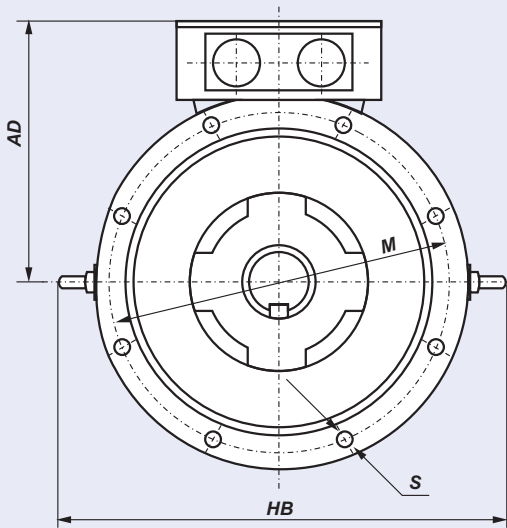
General Purpose 3-Phase Induction Motors
FLANGE MOUNTED MOTORS - IM B5



Type of motor	D	E	F	GA	M	N	P	LA	T	S	HB	L
SKh 56-2A	9j6	20	3h9	10,2	100	80j6	120	8	3	7	98	183
SKh 56-4A	9j6	20	3h9	10,2	100	80j6	120	8	3	7	98	183
SKh 56-2B	9j6	20	3h9	10,2	100	80j6	120	8	3	7	98	193
SKh 56-4B	9j6	20	3h9	10,2	100	80j6	120	8	3	7	98	193
SKh 56-6B	9j6	20	3h9	10,2	100	80j6	120	8	3	7	98	193
SKh 63- .A	11j6	23	4h9	12,5	115	95j6	140	9	3	10	102	200
SKh 63- .B	11j6	23	4h9	12,5	115	95j6	140	9	3	10	102	210
SKh 71- .A	14j6	30	5h9	16	130	110j6	160	9	3,5	10	111	223
SKh 71- .B	14j6	30	5h9	16	130	110j6	160	9	3,5	10	111	245
SKh 80- .A	19j6	40	6h9	21,5	165	130j6	200	10	3,5	12	119	266
SKh 80- .B	19j6	40	6h9	21,5	165	130j6	200	10	3,5	12	119	278
SKh 90S ...	24j6	50	8h9	27	165	130j6	200	8	3,5	12	130	305
SKh 90L ...	24j6	50	8h9	27	165	130j6	200	8	3,5	12	130	330
SKg 100L ...	28j6	60	8h9	31	215	180j6	250	11	4	15	140	376
SKg 112M ...	28j6	60	8h9	31	215	180j6	250	12	4	15	164	384
SKg 132S ...	38k6	80	10h9	41	265	230j6	300	12	4	15	178	463
SKg 132S-2B	38k6	80	10h9	41	265	230j6	300	12	4	15	178	501
SKg 132M ...	38k6	80	10h9	41	265	230j6	300	12	4	15	178	501
SKg 160M ...	42k6	110	12h9	45	300	250j6	350	13	5	19	210	612
SKg 160L ...	42k6	110	12h9	45	300	250j6	350	13	5	19	210	656
SKg 180M ...	48k6	110	14h9	51,5	300	250j6	350	13	5	19	228	705
SKg 180L ...	48k6	110	14h9	51,5	300	250j6	350	13	5	19	228	705

DIMENSION DRAWINGS

FLANGE MOUNTED MOTORS - IM B5, IM V1

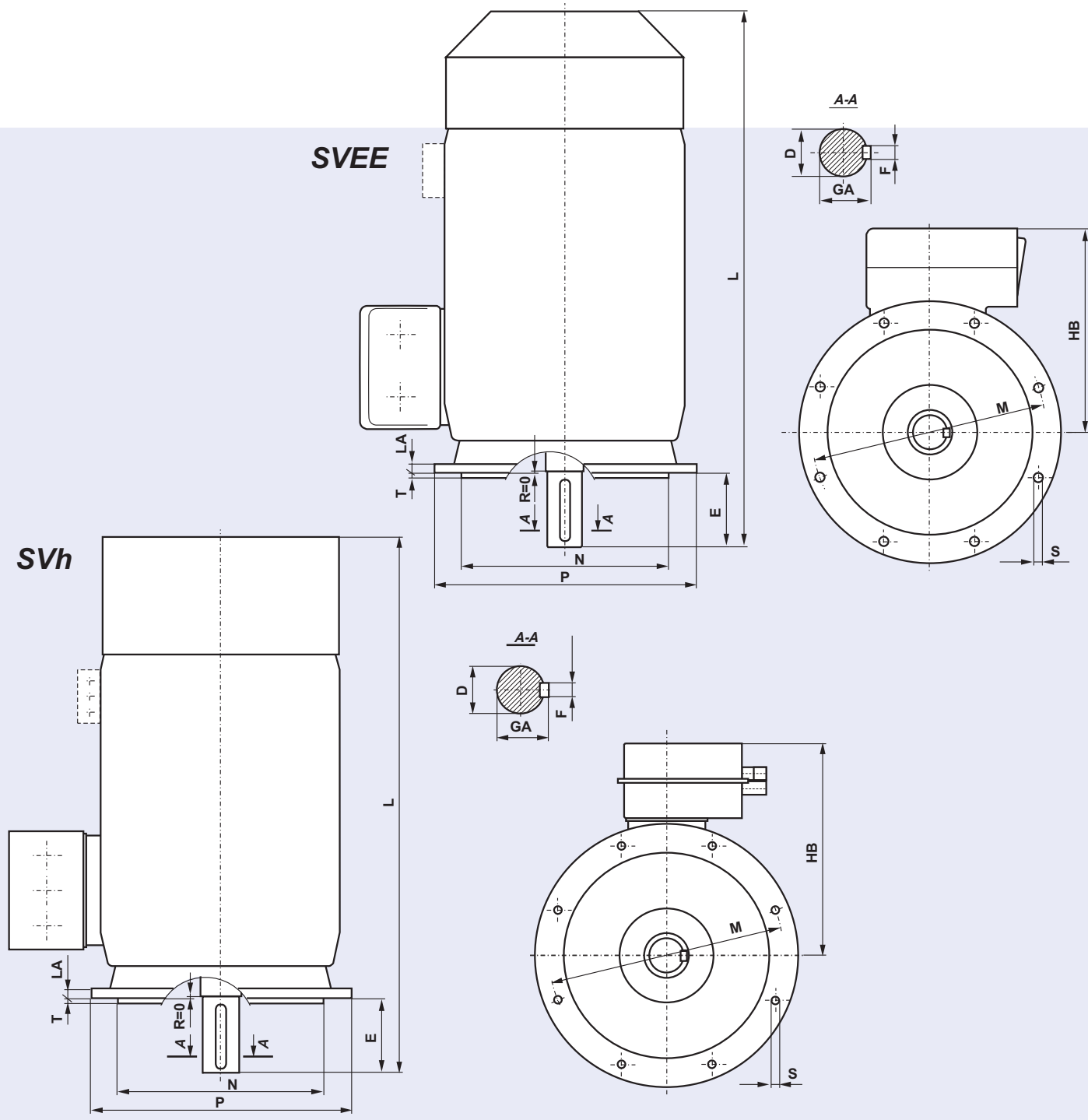


DIMENSION DRAWINGS

Motor type	D	E	F	GA	AC	AD	HB	L	LA	M	N	P	T	S	Holes
2SKg 200 L...	55m6	110	16h9	59	450	355	570	825	16,5	350	300j6	400	5	18	4
2SKg 225 S...	60m6	140	18h9	64	505	375	620	870	18	400	350j6	450	5	18	8
2SKg 225 M2	55m6	110	16h9	59	505	375	620	865	18	400	350j6	450	5	18	8
2SKg 225 M...	60m6	140	18h9	64	505	375	620	895	18	400	350j6	450	5	18	8
2SKg 250 M2	60m6	140	18h9	64	540	415	675	965	19	500	450j6	550	5	18	8
2SKg 250 M...	65m6	140	18h9	69	540	415	675	965	19	500	450j6	550	5	18	8
2SKg 280 S2	65m6	140	18h9	69	620	450	755	1040	20	500	450j6	550	5	18	8
2SKg 280 S...	75m6	140	20h9	79,5	620	450	755	1040	20	500	450j6	550	5	18	8
2SKg 280 M2	65m6	140	18h9	69	620	450	755	1040	20	500	450j6	550	5	18	8
2SKg 280 M...	75m6	140	20h9	79,5	620	450	755	1040	20	500	450j6	550	5	18	8
2SKg 315 S2	65m6	140	18h9	69	620	450	790	1180	22	600	550js6	660	6	22	8
2SKg 315 S...	80m6	170	22h9	85	620	450	790	1210	22	600	550js6	660	6	22	8
2SKg 315 M2	65m6	140	18h9	69	620	450	790	1180	22	600	550js6	660	6	22	8
2SKg 315 M...	80m6	170	22h9	85	620	450	790	1210	22	600	550js6	660	6	22	8
SVg 355 S..*	100m6	210	28h9	106	767	588	970	1580	24	740	680js6	800	6	22	8
SVg 355 M..*	100m6	210	28h9	106	767	588	970	1580	24	740	680js6	800	6	22	8

* - the SVg motors may operate only in vertical position IM V1.

FLANGE MOUNTED MOTORS - IM B5, IM V1

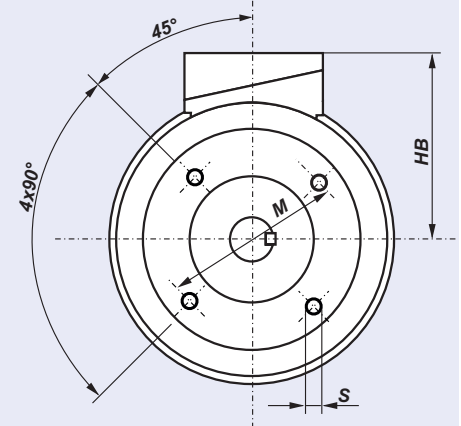
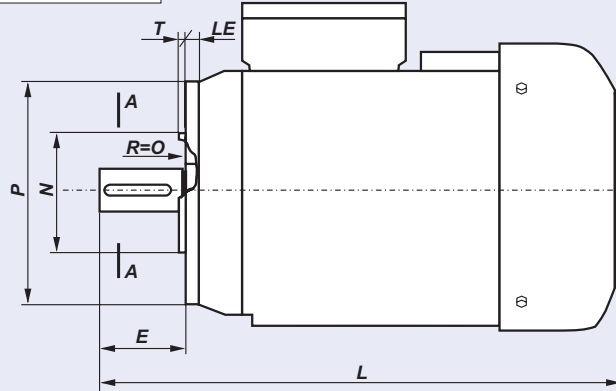
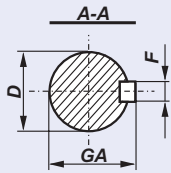


DIMENSION DRAWINGS

Motor type	Poles	D	E	F	GA	HB	L	LA	M	N	P	S	T
SVEE 355....*	8	100	210	28	106	580	1620	24	740	680	800	22	6
SVh 355...s*	4+8	100	210	28	106	638	1955	24	740	680	800	22	6
SVh 400...s*	4+8	110	210	28	116	745	2130	37	940	880	1000	23	6
SVh 450...s*	4+12	110	210	28	116	849	2350	30	1080	1000	1150	28	6
SVh 500...s*	4+10	120	210	32	127	935	2504	30	1080	1000	1150	28	6

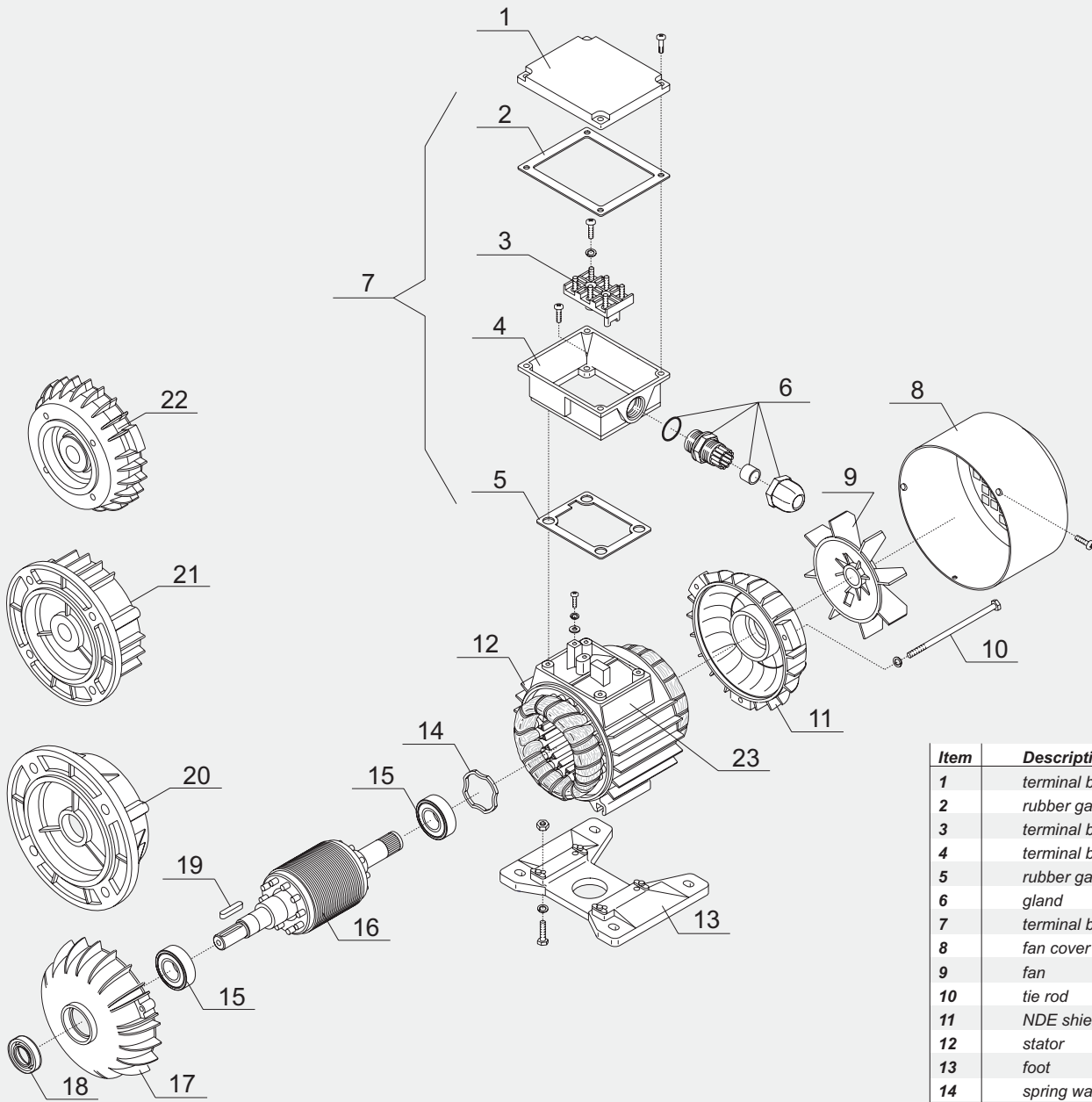
* - the SVh and SVEE motors may operate only in vertical position IM V1.

FLANGE MOUNTED MOTORS - IM B14



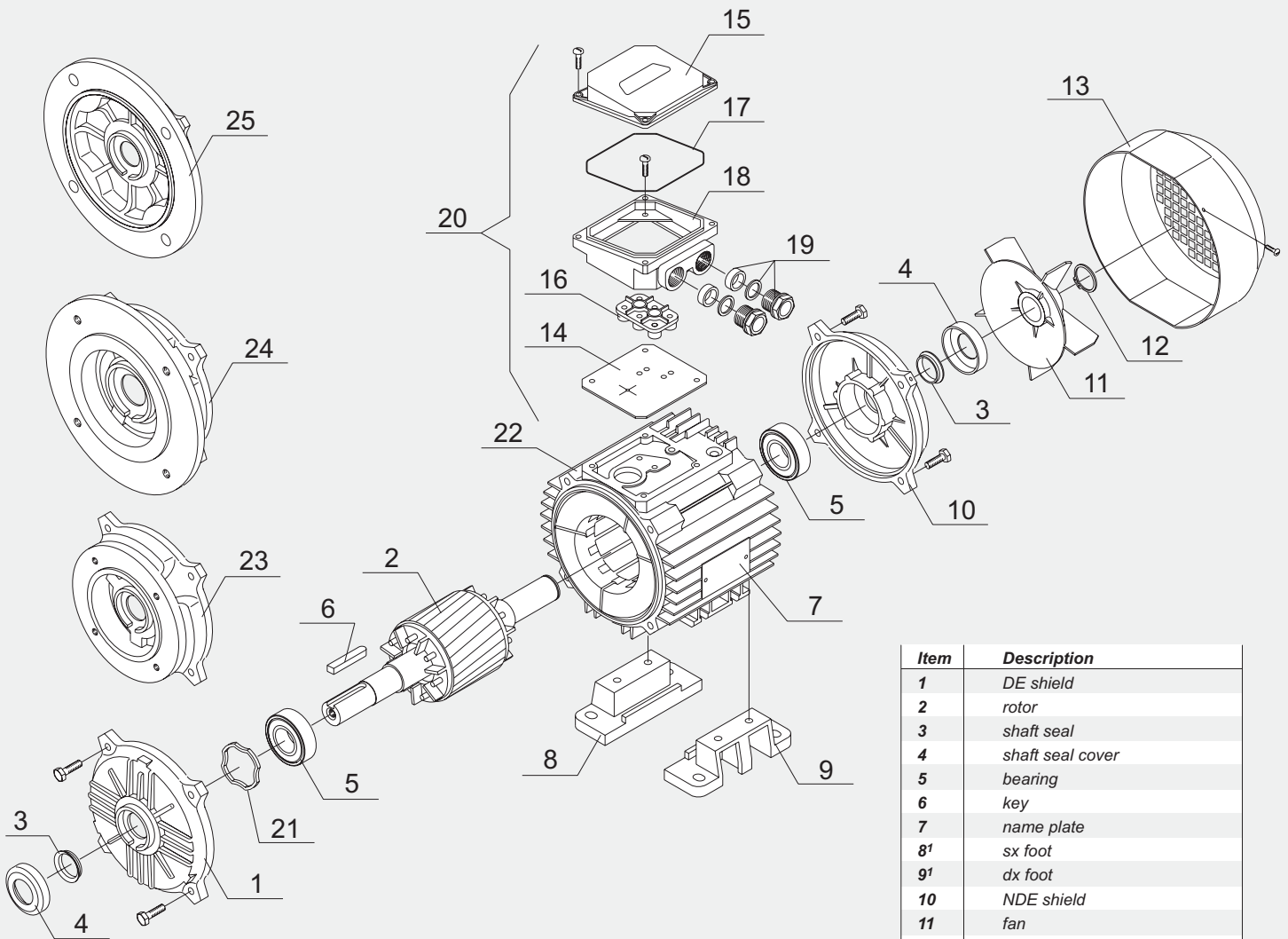
DIMENSION DRAWINGS

Motor type	Flange	D	E	F	GA	M	N	P	S	T	LE	HB	L
SKh 56-2A1	B14/C1	9j6	20	3h9	10,2	85	70j6	105	M6	2,5	15	98	183
SKh 56-2A2	B14/C2	9j6	20	3h9	10,2	65	50j6	80	M5	2,5	12,5	98	183
SKh 56-4A1	B14/C1	9j6	20	3h9	10,2	85	70j6	105	M6	2,5	15	98	183
SKh 56-4A2	B14/C2	9j6	20	3h9	10,2	65	50j6	80	M5	2,5	12,5	98	183
SKh 56-2B1	B14/C1	9j6	20	3h9	10,2	85	70j6	105	M6	2,5	15	98	193
SKh 56-2B2	B14/C2	9j6	20	3h9	10,2	65	50j6	80	M5	2,5	12,5	98	193
SKh 56-4B1	B14/C1	9j6	20	3h9	10,2	85	70j6	105	M6	2,5	15	98	193
SKh 56-4B2	B14/C2	9j6	20	3h9	10,2	65	50j6	80	M5	2,5	12,5	98	193
SKh 56-6B1	B14/C1	9j6	20	3h9	10,2	85	70j6	105	M6	2,5	15	98	193
SKh 56-6B2	B14/C2	9j6	20	3h9	10,2	65	50j6	80	M5	2,5	12,5	98	193
SKh 63- .A1	B14/C1	11j6	23	4h9	12,5	100	80j6	120	M6	3	14	102	200
SKh 63- .A2	B14/C2	11j6	23	4h9	12,5	75	60j6	90	M5	2,5	9,5	102	200
SKh 63- .B1	B14/C1	11j6	23	4h9	12,5	100	80j6	120	M6	3	14	102	210
SKh 63- .B2	B14/C2	11j6	23	4h9	12,5	75	60j6	90	M5	2,5	9,5	102	210
SKh 71- .A1	B14/C1	14j6	30	5h9	16	115	95j6	140	M8	3	14	111	223
SKh 71- .A2	B14/C2	14j6	30	5h9	16	85	70j6	105	M6	2,5	12	111	223
SKh 71- .B1	B14/C1	14j6	30	5h9	16	115	95j6	140	M8	3	14	111	245
SKh 71- .B2	B14/C2	14j6	30	5h9	16	85	70j6	105	M6	2,5	12	111	245
SKh 80- .A1	B14/C1	19j6	40	6h9	21,5	130	110j6	160	M8	3,5	14	119	266
SKh 80- .A2	B14/C2	19j6	40	6h9	21,5	100	80j6	120	M6	3	12	119	266
SKh 80- .B1	B14/C1	19j6	40	6h9	21,5	130	110j6	160	M8	3,5	14	119	278
SKh 80- .B2	B14/C2	19j6	40	6h9	21,5	100	80j6	120	M6	3	12	119	278
SKh 90S ...	B14/C1	24j6	50	8h9	27	130	110j6	160	M8	3,5	10	130	305
SKh 90S ...	B14/C2	24j6	50	8h9	27	115	95j6	140	M8	3	10	130	305
SKh 90L ...	B14/C1	24j6	50	8h9	27	130	110j6	160	M8	3,5	10	130	330
SKh 90L ...	B14/C2	24j6	50	8h9	27	115	95j6	140	M8	3	10	130	330
SKg 100L ...	B14/C1	28j6	60	8h9	31	165	130j6	200	M10	3,5	12	140	376
SKg 100L ...	B14/C2	28j6	60	8h9	31	130	110j6	160	M8	3,5	12	140	376
SKg 112M ...	B14/C1	28j6	60	8h9	31	165	130j6	200	M10	3,5	12	164	384
SKg 112M ...	B14/C2	28j6	60	8h9	31	130	110j6	160	M8	3,5	12	164	384
SKg 132S ...	B14/C1	38k6	80	10h9	41	215	180j6	250	M12	4	12	178	463
SKg 132S ...	B14/C2	38k6	80	10h9	41	165	130j6	200	M10	3,5	12	178	463
SKg 132S-2B	B14/C1	38k6	80	10h9	41	215	180j6	250	M12	4	12	178	501
SKg 132S-2B	B14/C2	38k6	80	10h9	41	165	130j6	200	M10	3,5	12	178	501
SKg 132M ...	B14/C1	38k6	80	10h9	41	215	180j6	250	M12	4	12	178	501
SKg 132M ...	B14/C2	38k6	80	10h9	41	165	130j6	200	M10	3,5	12	178	501



Item	Description
1	terminal box cover
2	rubber gasket
3	terminal board
4	terminal box
5	rubber gasket
6	gland
7	terminal box complete
8	fan cover
9	fan
10	tie rod
11	NDE shield
12	stator
13	foot
14	spring washer
15	bearing
16	rotor
17	DE shield
18	shaft seal
19	key
20	flange B5
21	flange B14/C1
22	flange B14/C2
23	name plate

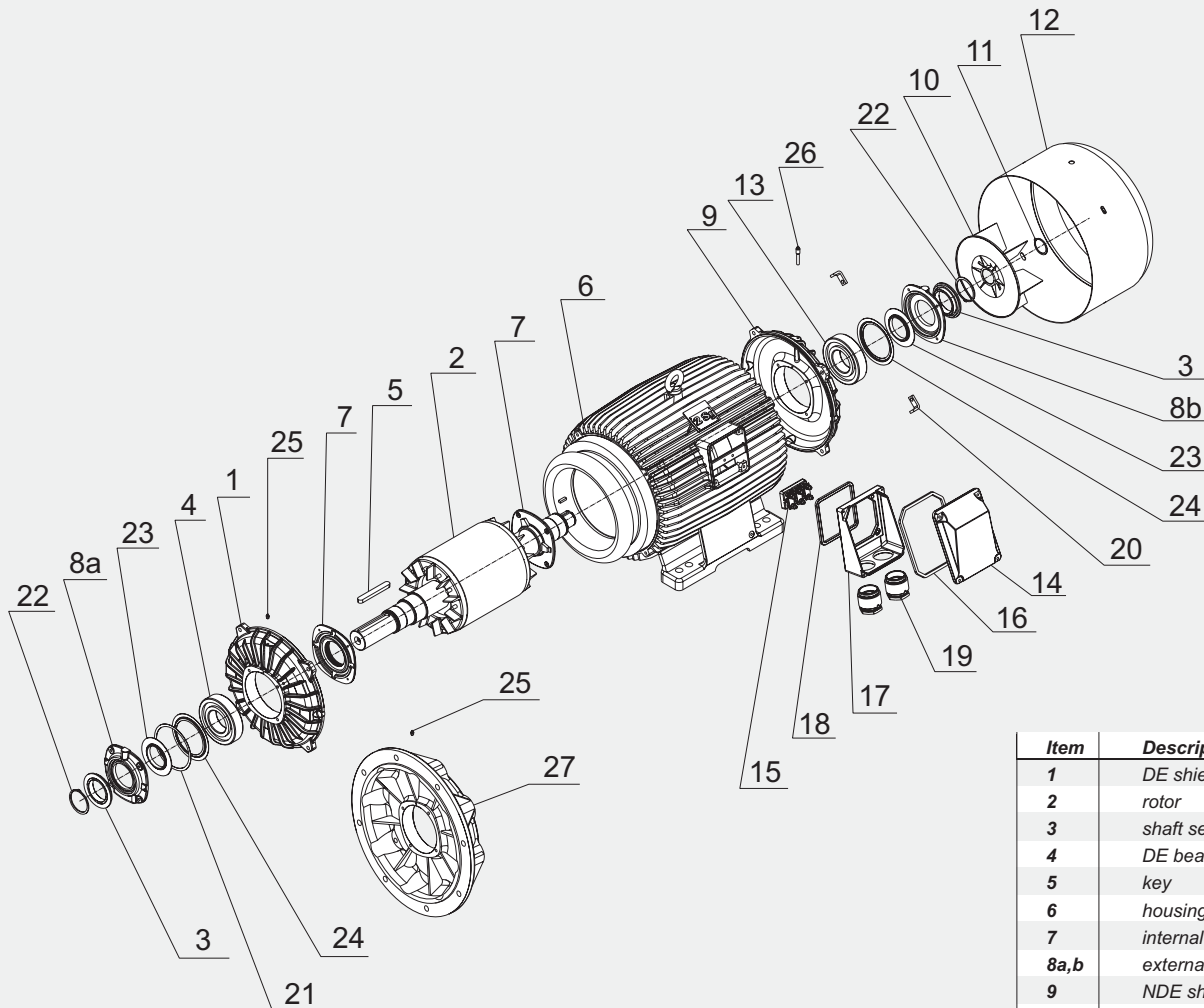
DE - drive end
NDE - non drive end



Item	Description
1	DE shield
2	rotor
3	shaft seal
4	shaft seal cover
5	bearing
6	key
7	name plate
8 ¹	sx foot
9 ¹	dx foot
10	NDE shield
11	fan
12	seeger ring
13	fan cover
14	rubber gasket
15	terminal box cover
16	terminal board
17	rubber gasket
18	terminal box
19	glands
20	terminal box complete
21	spring washer
22	stator
23 ²	flange B14/C2
24 ²	flange B14/C1
25	flange B5

DE - drive end
NDE - non drive end

1 - for frame size 132 feet can be screwed or integrated with the motor housing, for frame size 160 -180 feet are integrated with the motor housing.
2 - only for frame size 90 - 132.

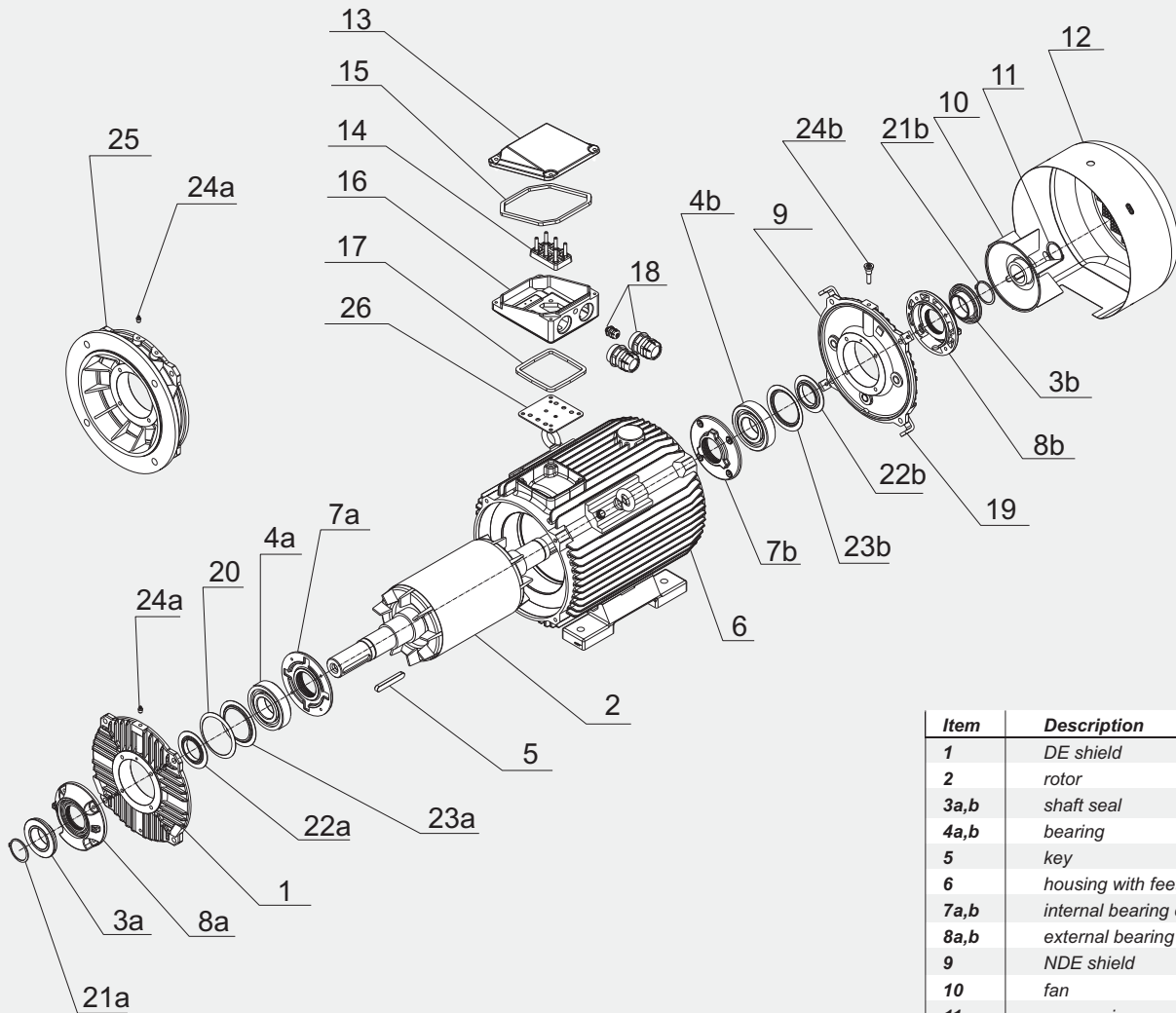


Item	Description
1	DE shield
2	rotor
3	shaft seal
4	DE bearing
5	key
6	housing with feet
7	internal bearing cap
8a,b	external bearing cap
9	NDE shield
10	fan
11	seeger ring
12	fan cover
13	NDE bearing
14	terminal box cover
15	terminal cover support
16	rubber gasket
17	terminal box housing
18	rubber gasket
19	cable glands
20	fan cover support
21	spring washer
22	seeger ring
23	grease shield *
24	bearing internal ring *
25	DE grease nipple
26	NDE grease nipple
27	flange B5

DE - drive end
NDE - non drive end

* only for size 315

LIST OF MOTOR PARTS



Item	Description
1	DE shield
2	rotor
3a,b	shaft seal
4a,b	bearing
5	key
6	housing with feet
7a,b	internal bearing cap
8a,b	external bearing cap
9	NDE shield
10	fan
11	seeger ring
12	fan cover
13	terminal box cover
14	terminal board
15	rubber gasket
16	terminal box housing
17	rubber gasket
18	cable glands
19	fan cover support
20	spring washer
21a,b	seeger ring
22a,b	grease shield
23a,b	bearing internal ring
24a,b	grease nipple
25	flange B5
26	rubber gasket

DE - drive end
NDE - non drive end

PRODUCTION PROGRAM

GENERAL PURPOSE 3-PHASE INDUCTION MOTORS

GENERAL PURPOSE 1-PHASE INDUCTION MOTORS

HIGH VOLTAGE INDUCTION MOTORS

- Totally enclosed motors IP55
- Totally enclosed motors for power engineering IP55
- Open drip proof motors IP23

MOTORS WITH INCREASED RATED OUTPUT

MOTORS WITH FOREIGN COOLING

- Motors with foreign cooling IP54 (IP55)
- Motors with foreign cooling IP20

3-PHASE INDUCTION MOTORS FOR PUMPS

- Standard motors for pumps
- Explosion-proof motors for pumps
- Explosion-proof marine motors for pumps

MOTORS TO BE BUILT-IN

- 1-phase motors to be built-in
- 3-phase motors to be built-in

BRAKE MOTORS

- Brake motors (with DC brake)
- Brake motors (with AC brake)

EXPLOSION-PROOF MOTORS

- Increased safety motors
- Flame-proof motors
- Flame-proof marine motors
- Special purpose flame-proof motors for mining
- Special purpose flame-proof motors for chemical industry
- Special purpose flame-proof marine motors
- High voltage flame-proof motors

MOTORS FOR AXIAL-FLOW FANS

- 1-phase motors for axial-flow fans
- 3-phase motors for axial-flow fans
- 3-phase motors for axial-flow mining fans
- 3-phase explosion-proof motors for air duct axial-flow fans
- 3-phase marine motors for axial-flow fans
- 3-phase explosion-proof marine motors for axial-flow fans
- 3-phase multi-speed motors for axial-flow fans
- 3-phase multi-speed motors for air duct axial-flow fans

PRODUCTION PROGRAM

MULTI-SPEED MOTORS

- General purpose 2-speed motors
- General purpose multi-speed motors

MARINE MOTORS

- General purpose marine motors
- Marine motors for pumps
- Marine motors for axial-flow fans
- Marine motors for boat davits
- Marine motors for tubular rudders
- General purpose explosion-proof marine motors
- Explosion-proof marine motors for pumps
- Explosion-proof marine motors for axial-flow fans

SLIP RING INDUCTION MOTORS

- Totally enclosed (IP 54, 55) wound rotor induction motors
- Open drip proof (IP 23) wound rotor induction motors

CRANE MOTORS

- Squirrel cage crane motors
- Slip ring rotor crane motors
- Two-speed crane motors with brake

SPECIAL PURPOSE INDUCTION MOTORS

- Motors with increased slip
- Roller table motors for iron and steel industry
- 1-phase motors with shaft height 65 mm
- 3-phase motors with shaft height 65 mm

NEMA MOTORS ACCORDING TO EPACT AND NEMA PREMIUM REQUIREMENTS

ACCESSORIES

- DC electromagnetic disc brakes
- AC electromagnetic disc brakes
- Powder brakes and clutches
- Thrustors

CANTONI
MOTOR



ISO 9001

CANTONI MOTOR S.A.
3 Maja 28
43-400 Cieszyn, Poland
tel.: +48 33 813 87 00
fax: +48 33 813 87 01
motor@cantonigroup.com
www.cantonimotor.com