Technical Data

4.12 MSK060C - Technical Data

Designation	Symbol	Unit	MSK060C-0300-NN	MSK060C-0600-NN
UL Files (UL)			E335445	
Continuous torque at standstill 60 K	M_{0_60}	Nm	8.0	
Continuous current at standstill 60 K	$I_{0\_60(rms)}$	A	4.8	9.5
Continuous torque at standstill 100 K	M_{0_100}	Nm	8.8	
Continuous current at standstill 100 K	$I_{0\_100(rms)}$	A	5.3	10.5
Continuous torque at standstill. surface	M_{0_S}	Nm	12.0	
Continuous current at standstill. surface	$I_{0\_S(rms)}$	A	7.2	14.3
Maximum torque	M_{max}	Nm	24.0	
Maximum current	$I_{max(rms)}$	A	19.2	38.0
Torque constant at 20 °C	K_{M_N}	Nm/A	1.85	0.93
Voltage constant at 20 °C[1)]	K_{EMK_1000}	V/min^{-1}	114.0	57.0
Winding resistance at 20 °C	R_{12}	ohms	3.10	0.80
Winding inductivity	L_{12}	mH	35.900	8.600
Discharge capacity of the component	C_{dis}	nF	2.1	2.2
Number of pole pairs	p	-	4	
Moment of inertia of the rotor	J_{rot}	$kg*m^2$	0.00080	
Thermal time constant	T_{th}	min	14.0	
Maximum speed	n_{max}	min^{-1}	4,900	6,000
Sound pressure level	L_P	dB[A]	<75	
Weight [2)]	m	kg	8.4 (9.2)	
Ambient temperature in operation	T_{amb}	°C	0 ... 40	
Type of protection according to IEC 60529	---	-	IP65	
Insulation class according to DIN EN 60034-1	---	-	155	
				Latest amendment: 2008-02-11

1) Manufacturing tolerance ±5 %
2) (...) Values for motors with holding brake, sorted (holding brake 1, holding brake 2 ...)

Fig.4-29: Technical Data

Characteristic Motor Curves

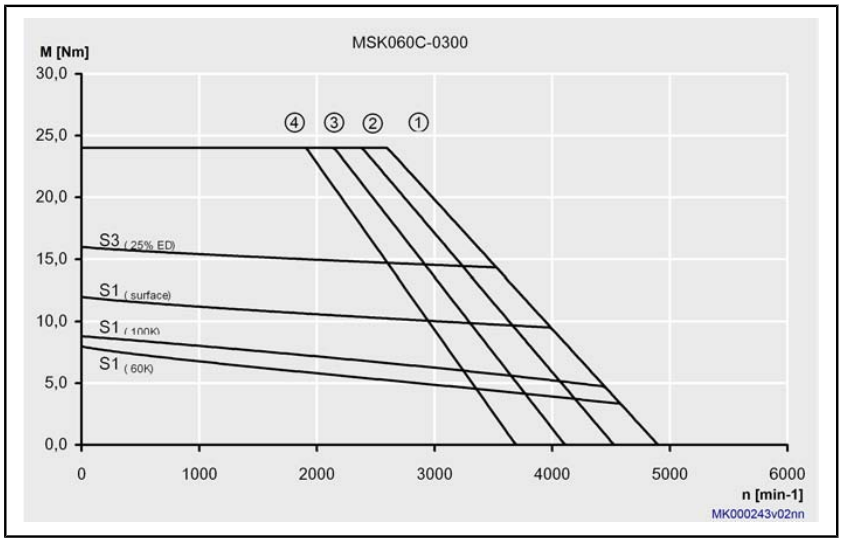

Fig.4-30: Characteristic curves MSK060C-0300

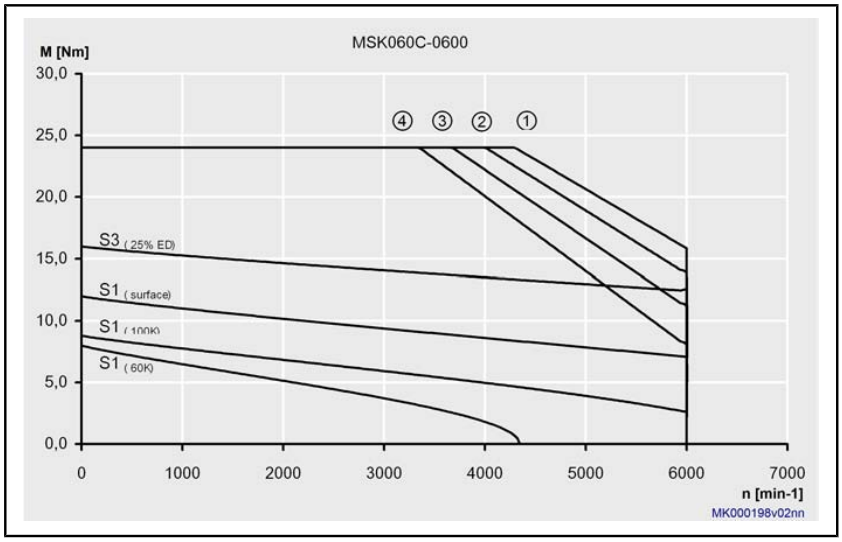

Fig.4-31: Characteristic curves MSK060C-0600

Specifications

5.6 MSK060 Specifications

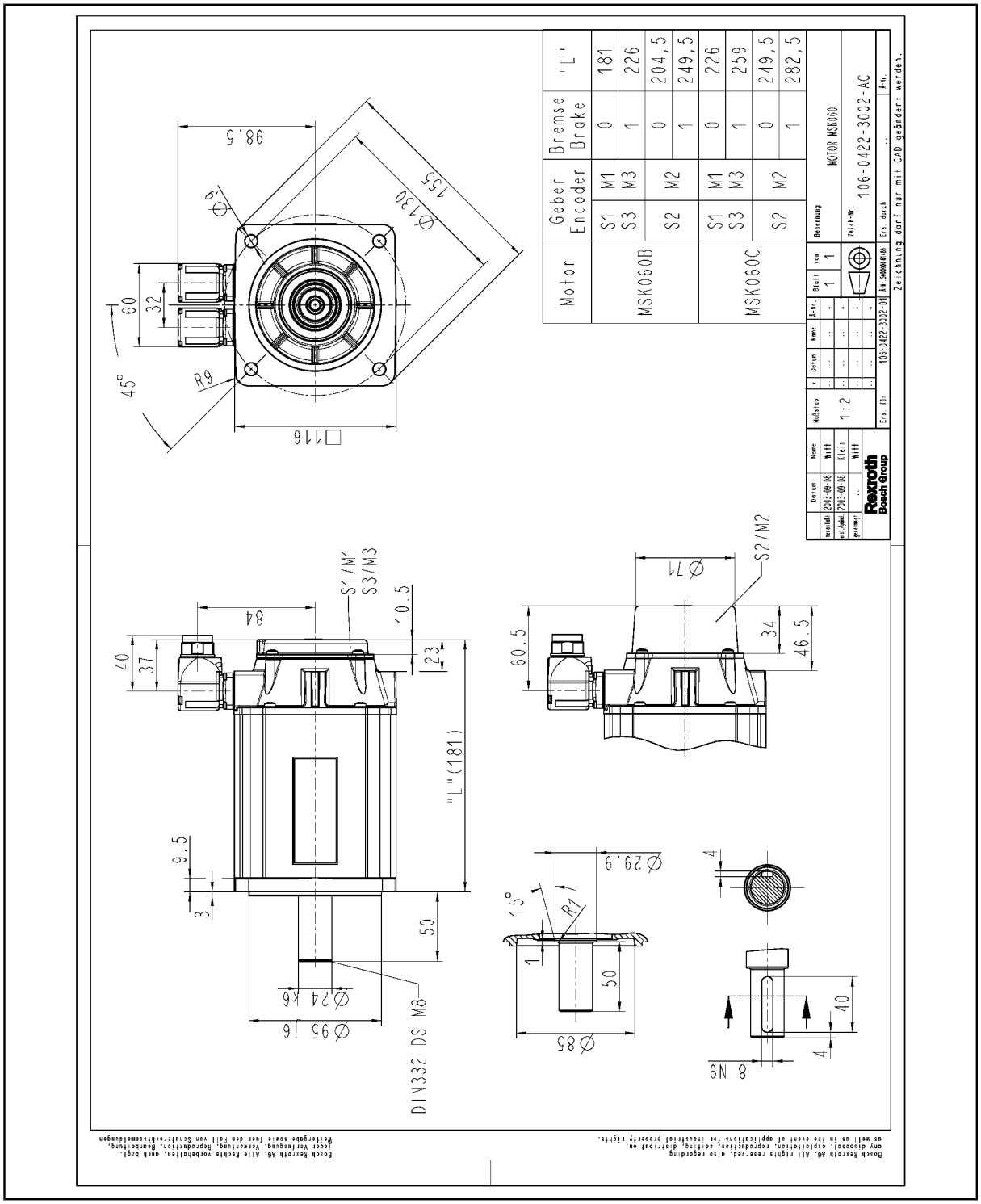

Fig.5-7: MSK060 specifications

Type Codes

6.6 MSK060 Type Code

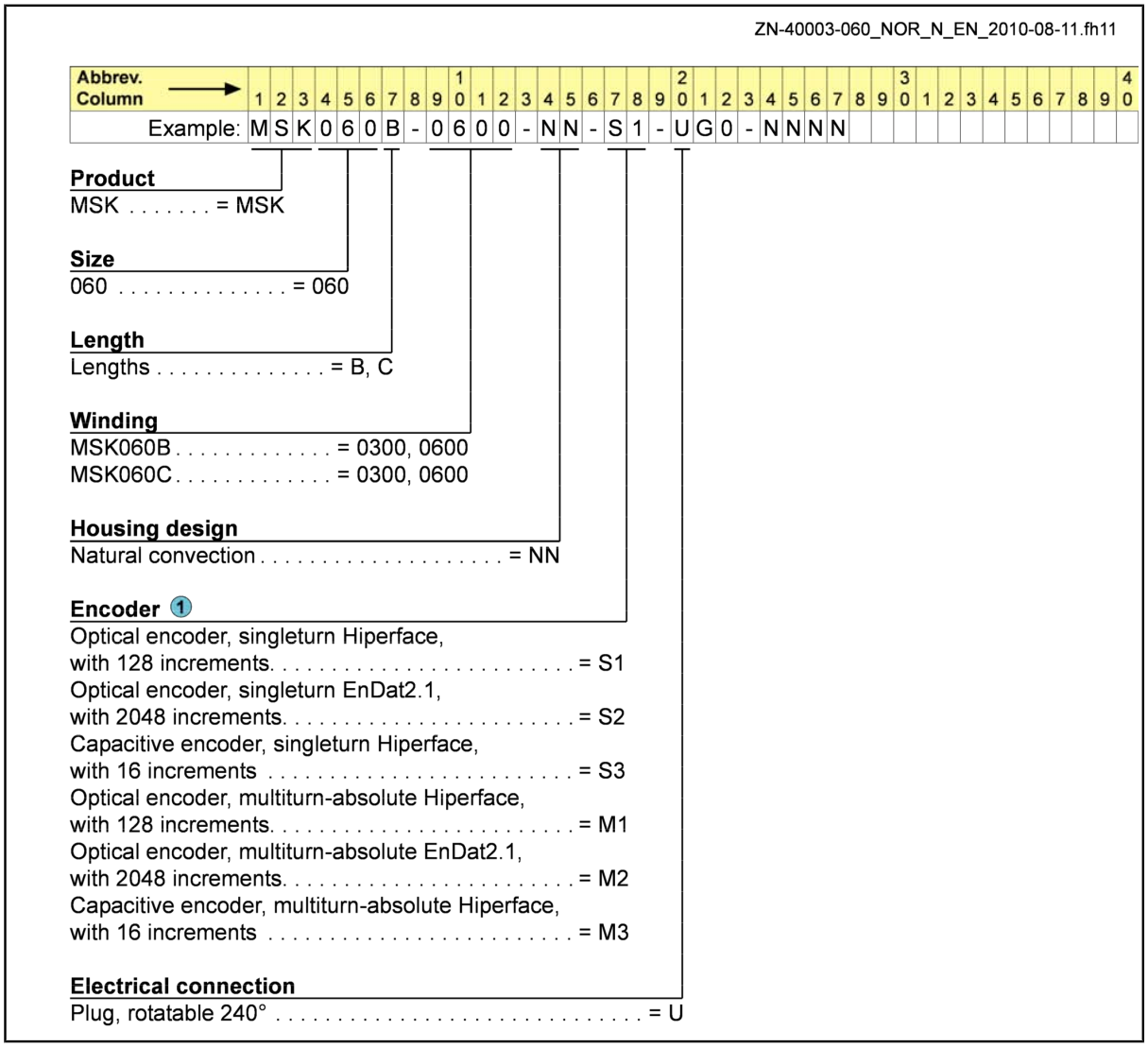

Fig.6-13: MSK060 type code (page 1)

Type Codes

ZN-40003-060_NOR_N_EN_2010-08-11.fh11

Abbrev. Column →	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40
Example:	M	S	K	0	6	0	B	-	0	6	0	0	-	N	N	-	S	1	-	U	G	0	-	N	N	N	N														

Shaft
Plain shaft with shaft sealing ring (standard). . . . . = G
Shaft with keyway per DIN 6885-1 with shaft sealing ring. . . = P

Holding brake
Without holding brake . . . . . = 0
Holding brake, electrical release, 10 Nm. . . . . = 1

Other design
Standard. . . . . = NNNN
Standard and Ex type for cluster II, categories 3G and 3D
on DIN EN 60079 ff . . . . . = NSNN
Reduced shaft run-out, axial run-out according to DIN 42955. . . . = RNNN
Reduced shaft run-out, axial run-out according to DIN 42955 and
Ex type for cluster II, categories 3G and 3D on DIN EN 60079 ff = RSNN

Note:
(1) Encoder "S1" and "M1" are only available with other design "NNNN" and "NSNN"
Encoder "S2" and "M2" are only available with other design "RNNN" and "RSNN"
Encoder "S3" and "M3" are only available with other design "NNNN"

Standard reference

Standard	Edition	Title
DIN 6885-1	1968-08	Drive Type Fastenings without Taper Action; Parallel Keys, Keyways, Deep Patter
DIN 42955	1981-12	Tolerances of shaft extension run-out of mounting flanges for rotating electrical machinery, test
DIN EN 60079 ff	-	Electrical apparatus for explosive gas atmospheres (ATEX)

Fig.6-14: MSK060 type code (page 2)