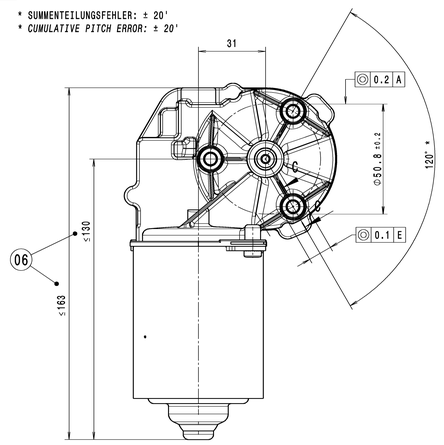
REV. NO.	ZONE	DESCRIPTION		DATE	NAME
50001657		UMSTELLUNG GEROLLTES GEHAEUSE DCK31	CONVERSION ROLLED HOUSING DCK31	2019-09-06	BAEUERLEG

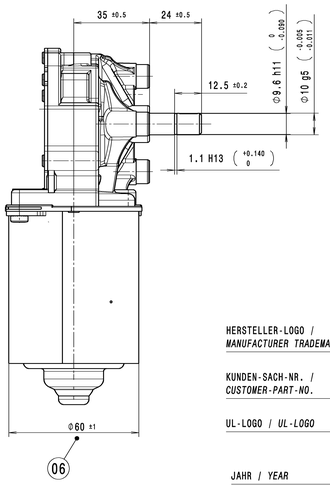
SAMPLING AND RELEASE ACCORDING TO HQ-G-C2-04 AND NWA SUPPLIER MANUAL

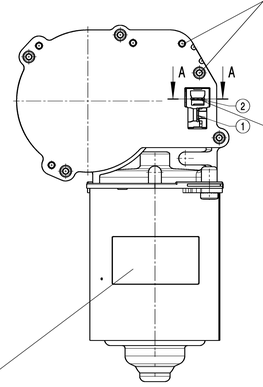
SPECIAL CHARACTERISTIC	QUANTITY
SRC	0
SC	0
FC	0
CD [CD]	0

VORZUGSDREHRICHTUNG
PRIORY DIRECTION OF ROTATION

* SUMMENTEILUNGSFEHLER: ± 20'
* *CUMULATIVE PITCH ERROR: ± 20'*



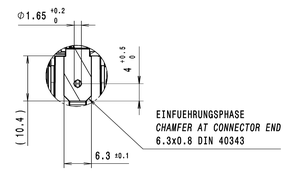




DECKELBEFESTIGUNG WAHLWEISE
GENIETET ODER GESCHRAUBT
COVER FIXING RIVETS OR SCREWS OPTIONAL

FLACHSTECKER (DIN 46244) 6,3x0,8
GEGENSTECKER/TYCOELECTRONICS-AMP
STECKERGEHAEUSE: SACHNUMMER 180907 (ZEICHNUNGSNUMMER C-180907)
FLACHSTECKHUELSE (DIN 46247): SACHNUMMER x-160526-x
(ZEICHNUNGSNUMMER C-160526)
FLACHSTECKHUELSE (DIN 46247): SACHNUMMER 925603-x
(ZEICHNUNGSNUMMER 925603)-(REDUZIERTE STECKKRAFT)
FUER LEITUNGSQUERSCHNITT 0,5-1,5mm²
FLAT PLUG (DIN 46244) 6,3x0,8
MATING CONNECTOR/TYCOELECTRONICS-AMP
RECEPTACLE HOUSING: PART NO 180907 (DRAWING NO C-180907)
RECEPTACLE FOR TABS (DIN 46247): PART NOx-160526-x
(DRAWING NO C-160526)
RECEPTACLE FOR TABS (DIN 46247): PART NO 925603-x
(DRAWING NO 925603)-(REDUCED INSERTION FORCE);
FOR CONDUCTOR CROSS SECTION 0,5-1,5mm²

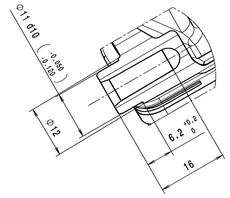
A-A
2:1



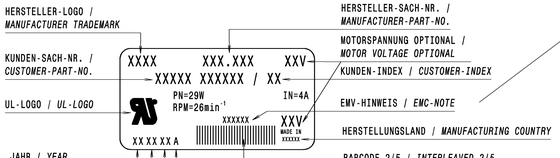
EINFUEHRUNGSPHASE
CHAMFER AT CONNECTOR END
6.3x0.8 DIN 40343

C-C (3x)
2:1

BEFESTIGUNGSLOECHER FUER SELBSTFORMENDE SCHRAUBEN M6,
POWER LOK GEWINDE DIN ISO 965-2, MAX. ZULAESSIGES
ANZUGSMOMENT DER BEFESTIGUNGSSCHRAUBE 13Nm
FASTENING HOLES FOR SELFFORMING SCREWS M6,
POWER LOK THREAD DIN ISO 965-2, MAX. PERMISSIBLE
TORQUE FOR FASTENING SCREW 13 Nm



2:1



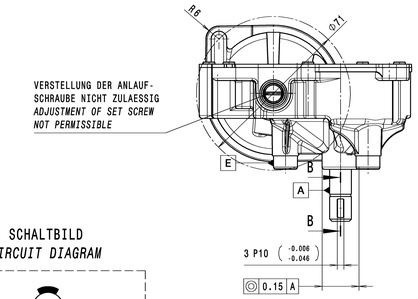
HERSTELLER-LOGO / *MANUFACTURER TRADEMARK*
KUNDEN-SACH-NR. / *CUSTOMER-PART-NO.*
UL-LOGO / *UL-LOGO*
HERSTELLER-SACH-NR. / *MANUFACTURER-PART-NO.*
MOTORSPANNUNG OPTIONAL / *MOTOR VOLTAGE OPTIONAL*
KUNDEN-INDEX / *CUSTOMER-INDEX*
EMV-HINWEIS / *EMC-NOTE*
HERSTELLUNGSLAND / *MANUFACTURING COUNTRY*
BARCODE 2/5 / *INTERLEAVED 2/5*

JAHR / *YEAR*
01 = 2001
02 = 2002
USW. / *ETC.*

MONAT / *MONTH*
05 = MAI / *MAY*
12 = DEZ./ *DEC.*
USW. / *ETC.*

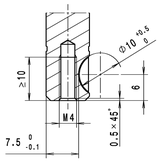
INTERNE SCHICHTKENNZEICHNUNG /
INTERNAL SHIFT WORK IDENTIFICATION
A = FRUEHSCHICHT /*MORNING SHIFT*
B = SPAETSCHICHT /*EVENING SHIFT*
C = NACHTSCHICHT /*NIGHT SHIFT*

TAG / *DAY*
11
12
USW. / *ETC.*

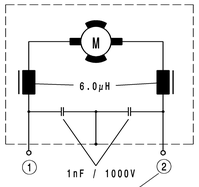


VERSTELLUNG DER ANLAUF-
SCHRAUBE NICHT ZULAESSIG
ADJUSTMENT OF SET SCREW
NOT PERMISSIBLE

B-B
2:1



SCHALTBILD
CIRCUIT DIAGRAM

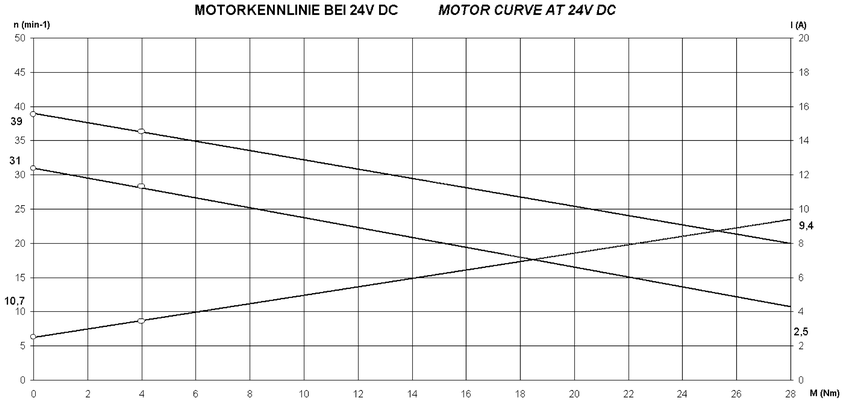


+ RECHTSLAUF	*CW ROTATION*
- LINKSLAUF	*CCW ROTATION*

06 MOTORSTROM IM NEUZUSTAND / *CURRENT OF NEW MOTOR*
** MESSPUNKTE KENNLINIE / *MEASURE POINTS GRAPH*

VORLAEUFIGE
MOTORKENNLINIE BEI 24V DC

PRELIMINARY
MOTOR CURVE AT 24V DC



A) *GENERAL*

**1.TEST VOLTAGE	*UP = 24V DC*
**2.NO LOAD SPEED	*nO = 31-39 min⁻¹*
**3.NO LOAD CURRENT	*IO = MAX. NEW MOTOR 2.5A*
4.SHORT-CIRCUIT CURRENT	*IK ≥ 14A*
5.STARTING TORQUE	*MK ≥ 30Nm*
6.RFI SUPPRESSION	*= SEE DIAGRAM*
7.THERMAL SWITCH	*= NA*
8.ISOLATION TEST	*= 850V DC FOR 1sec.*
9.SELF LOCKING STATIC	*= NA*
10.RADIAL LOAD ON DRIVE SHAFT	*F = 80N*
11.AXIAL LOAD ON DRIVE SHAFT	*F = NA*
12.NOISE LEVEL	*= NA*
13.AMBIENT TEMPERATURE	*= -30°C TO +60°C*
14.PROTECTION	*IP = 30*
15.VIBRATION	*= NA*

B) *RUNNING DATA*

OPERATING TORQUE (NOM. LOAD) MN = 6Nm CW+CCW
OPERATING TORQUE (MAX. LOAD) MNMAX = 14Nm CW+CCW
CURRENT RESTRICTED = 7A

C) *LIFE TEST*

1.CYCLE (DEFINITION)	*= ON (CW) 15sec. - BREAK 35sec.*
	= OFF (CCW) 15sec. - BREAK 35sec.
2.TEST VOLTAGE	*= 22 V DC*
3.TEST TORQUE	*= 6 Nm WITH RADIAL LOAD*
4.TEST TEMPERATURE	*= RT*
5.TEST POSITION	*= ANY*
6.EXTERNAL COOLING	*= AS REDUCTION THE BREAKS PERMISSIBLE*
7.MIN. LIFE TIME	*= 40 0000 CYCLES*
8.PERFORMANCE AFTER LIFE TEST	*= DIFFERENCE TILL 10% PERMISSIBLE*

D) *OTHER VALID DOCUMENTS*

1.GEN. SPECIFICATION INDUSTR.- MOTORS NIDEC
ACC. SWF 46.402 (EDITION AT 09.04.1998)
ADDITIONAL REQUIREMENTS, WHICH ARE NOT CONTENT OF THE
ABOVE SPECIFICATION, HAVE TO BE SECURED BY THE CUSTOMER.
FOR THIS ADDITIONAL REQUIREMENTS NIDEC CAN TAKE NO PRODUCT LIABILITY.

A) ALLGEMEINES

**1.PRUEFSPANNUNG	UP = 24V DC
**2.LEERLAUFDREHZAHL	nO = 31-39 min⁻¹
**3.LEERLAUFSTROM	IO = MAX. IM NEUZUSTAND 2.5A
4.BLOCKIERSTROM	IK ≥ 14A
5.BLOCKIERMOMENT	MA ≥ 30Nm
6.ENTSTOERBAUTEILE	= SIEHE DIAGRAMM
7.THERMOSCHALTER	= NA
8.ISOLATIONSPRUEFUNG	= 850V DC FUER 1sec.
9.GETRIEBEHEMMUNG STATISCH	= NA
10.RADIALBELASTUNG DER ABTRIEBSWELLE	F = 80N
11.AXIALBELASTUNG DER ABTRIEBSWELLE	F = NA
12.GERAEUSCHPEGEL	= NA
13.UMGEBUNGSTEMPERATUR	= -30°C- BIS +60°C
14.SCHUTZART	IP = 30
15.VIBRATION	= NA

B) BETRIEBSDATEN

NENNMOMENT (NENNLAST)	MN = 6Nm RL+LL
NENNMOMENT max. WERT	MNmax = 14Nm RL+LL
STROMBEGRENZUNG	= 7A

C) LEBENSDAUERPRUEFUNG

1.ZYKLUS (DEFINITION)	= AUF (RL) 15sec. - PAUSE 35sec.
	ZU (LL) 15sec. - PAUSE 35sec.
2.PRUEFSPANNUNG	= 22 V DC
3.PRUEFMOMENT	= 6 Nm MIT RADIALLAST
4.PRUEFTEMPERATUR	= RT
5.PRUEFLAGE	= BELIEBIG
6.FREMDKUEHLUNG	= ZUR VERKUERZUNG DER PAUSEN ZULAESSIG
7.MIN. LEBENSDAUER	= 40 000 ZYKLEN
9.LEISTUNG NACH LEBENSDAUERTEST	= ABWEICHUNG BIS 10% ZULAESSIG

D) MITGELTENDE UNTERLAGEN

1.ALLG. SPEZIFIKATION INDUSTRIEMOTOREN NIDEC
NACH SWF 46.402 (AUSGABE VOM 09.04.1998)
DARUEBERHINAUS GEHENDE ANFORDERUNGEN
HAT DER KUNDE DURCH PRUEFUNGEN IM SYSTEM SICHERZUSTELLEN.
HIERFUER UEBERNIMMT NIDEC KEINE HAFTUNG.

** 100% PRUEFUNG / ** *100% CHECKING* — KONTROLLPLAN / *CONTROL PLAN* — NA | NICHT ANGEWENDET / *NOT APPLICABLE*

GETRIEBEDATEN / *GEAR DATA*

UEBERSETZUNG	*RATIO*	i	= 1:69
GANGZAHL	*NO. OF STARTS*	z1	= 1
ZAEHNEZAHL	*NO. OF TEETH*	z2	= 69
NORMALMODUL	*NORMAL MODULE*	mn	= 0.8
ZAHNRADMATERIAL	*GEAR WHEEL MATERIAL*		= DELRIN 100
MATERIAL ABTRIEBSWELLE	*MATERIAL DRIVE SHAFT*		= C45Pb C DIN EN 10277
OBERFLAECHE	*SURFACE FINISH*		= VERGUETET HV=380-460 *HEAT THREATED HV=380-460*
WERKSTOFF MOTORTOPFLAGER:			SINTERBRONZE
MATERIAL OF MOTOR HOUSING BEARING:			*BRONZE*

MAX. GETRIEBEFESTIGKEIT STATISCH : 28Nm
MAX. GETRIEBEFESTIGKEIT DYNAMISCH: 17Nm
MAX. STATIC GEAR STRENGTH
MAX. DYNAMIC GEAR STRENGTH

ITEM	MATERIAL NUMBER	QUANT.	TITLE	DOCUMENT NO.

LIMIT DIMENSIONS FOR NOMINAL SIZE RANGES IN mm		...6	>6...30	>30...120	>120...400	>400...1000
TOLERANCES FOR NOMINAL SIZE RANGES IN mm	±	0,1	0,2	0,3	0,5	0,8
LIMIT DIM. FOR NOMINAL SIZE RANGES IN DEGREE/ MINUTE (SHORTER ANGLE SIDE)			...10	>10...50	>50...100	>100
TOLERANCES FOR NOMINAL SIZE RANGES	±		1°	30'	20'	10'

SURFACE FINISH ACC. TO SWF 00.051 — NORM FOR SURFACE FINISH
SURFACE TEXTURE ACC. TO DIN EN ISO 1302 — EDGES ACC. TO ISO 13715
GEOMETRICAL PRODUCT SPECIFICATIONS (GPS) SIZE ISO 14405 (E) — GEOM. TOLERANCING ACC. TO DIN EN ISO 1101
STOCK MATERIAL
CUSTOMER REFERENCE NO.
MATERIAL SPECIFICATION ACC. TO SWF 10.XXX — NORM FOR MATERIAL SPECIFICATION

MATERIAL NO.	OLD SPAIN MATERIAL NO.	REFERENCE NO.
404-867-99-99		

ALL DIMENSIONS IN mm — SCALE 1:1 — RELEASE-LEVEL RELEASED

TITLE: **MOTOR DCK31** / *MOTOR DCK31* — ARTICLE NO. 0266

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NIDEC MOTORS & ACTUATORS GERMANY / POLAND / SPAIN — SUB. FOR 4S 4975 N 200

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