



Rotary Cylinders

SOMMER
automatic



Pneumatic Rotor

Order no.	Pivot angle [°]	Torque [Nm]	Pivot time [s]	Catalogue no..
Product Information PRN-Series				6
PRN1-90-B	90	0,15	0,10	8
PRN1-180-B	180	0,15	0,17	8
PRN3-90-B	90	0,38	0,13	10
PRN3-180-B	180	0,38	0,20	10
PRN10-90-B	90	1,20	0,13	12
PRN10-180-B	180	1,20	0,20	12
PRN20-90-B	90	2,10	0,14	14
PRN20-180-B	180	2,10	0,25	14
PRN30-90	90	4,10	0,17	16
PRN30-180	180	4,10	0,33	16
PRN30-270	270	4,10	0,50	16
PRN50-100	100	12,80	0,17	18
PRN50-180	180	5,90	0,33	18
PRN50-280	280	5,90	0,50	18
PRN150-100	100	41,50	0,25	20
PRN150-180	180	18,00	0,38	20
PRN150-280	280	18,00	0,63	20
PRN300-100	100	83,00	0,33	22
PRN300-180	180	34,50	0,50	22
PRN300-280	280	34,50	0,71	22
PRN800-180	180	247,00	0,45	24
PRN800-280	280	123,00	1,00	24
Accessories PRN				26



Step-Rotor

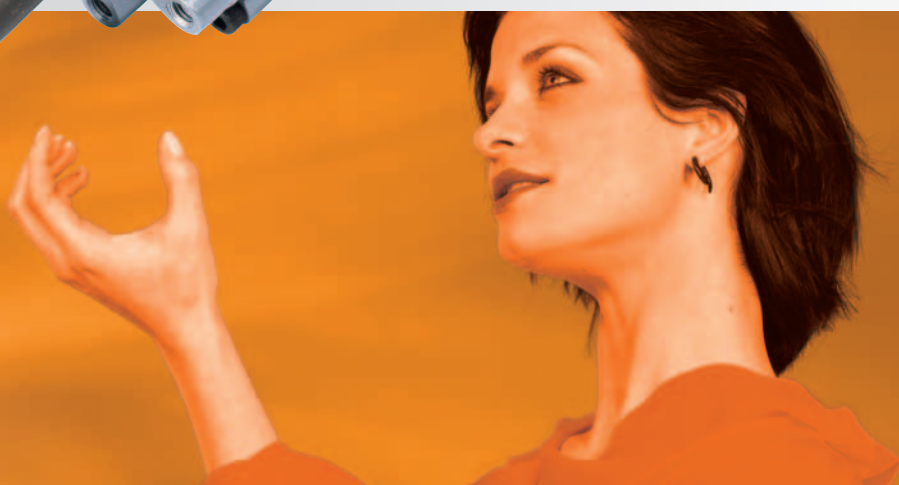
Order no.	Drive	Pivot angle [°]	Torque [Nm]	Pivot time [s]	Catalogue no.
Product Information SH-Series					30
SH-5	Outer blade	180	2,73	0,80	32
SH-5	Inner blade	180	0,59	0,50	32
SH-20	Outer blade	180	7,20	1,10	34
SH-20	Inner blade	180	2,35	0,80	34





Rotary **Cylinders**

pneumatic



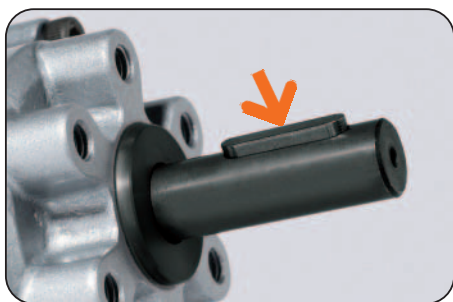
PRN-Series

SOMMER
automatic

Rotary **Cylinder**

➤ Features

- Compact design, light weight in connection with high performance
- High reliability and long durability
- Adjustable swivel angle of up to 360°



Force transfer

positive fit by featherkey (from size PRN30)

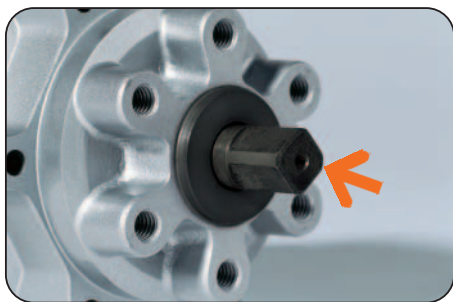
- safety against slipping through of the drive flange
- ideal force transfer



Drive

Blade-type cylinder with one blade and double-blade (from size PRN50)

- max. drive force in both swivel directions
- torque up to 247 Nm
- rapid cycle times



Shaft

forged from one piece

- reworking possible e.g. supply-bore through the axis

Terms

- Swivel time:** time required to cover a 0° – 90°/180° swivel movement
- Cycle:** distance covered by the blade-type cylinder in one 0°/90°/0° or 0°/180°/0° swivel movement
- Maintenance:** maintenance free up to 1.5 mil. cycles
(please see the owner's manual for conditions,
download from www.sommer-automatic.com)
- long maintenance intervals keep costs down
 - long durability

Model Rotary Cylinder

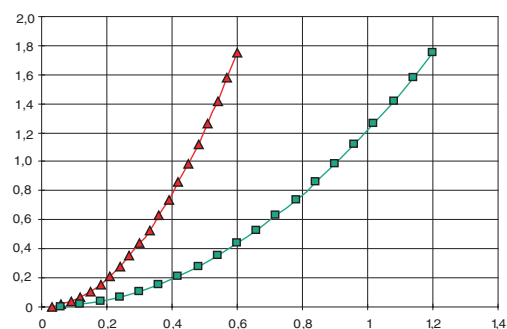
Order no.	Swivel angle [°]	Torque [Nm]	Swivel time [s]
PRN1-90-B	90	0,15	0,10
PRN1-180-B	180	0,15	0,17
PRN3-90-B	90	0,38	0,13
PRN3-180-B	180	0,38	0,20
PRN10-90-B	90	1,20	0,13
PRN10-180-B	180	1,20	0,20
PRN20-90-B	90	2,10	0,14
PRN20-180-B	180	2,10	0,25
PRN30-90	90	4,10	0,17
PRN30-180	180	4,10	0,33
PRN30-270	270	4,10	0,50
PRN50-100	100	12,80	0,17
PRN50-180	180	5,90	0,33
PRN50-280	280	5,90	0,50
PRN150-100	100	41,50	0,25
PRN150-180	180	18,00	0,38
PRN150-280	280	18,00	0,63
PRN300-100	100	83,00	0,33
PRN300-180	180	34,50	0,50
PRN300-280	280	34,50	0,71
PRN800-180	180	247,00	0,45
PRN800-280	280	123,00	1,00

Rotary **Cylinder**

Moment of inertia

Shows the expected swivel time against the calculated moment of inertia.

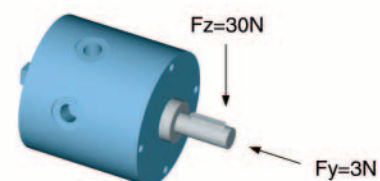
Moment of inertia in [kg cm²]



Data measured at 6 bar and horizontale mounting position

Forces and Moments

Max. static shaft load



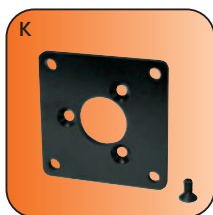
PRN1-90
PRN1-180

Swivel time in [sec]

Accessory list



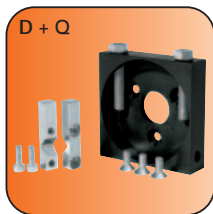
Pneumatic fittings
Order no. WVM5



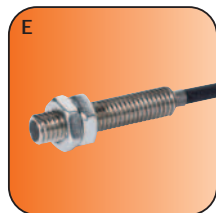
Flange
Order no. F1-P



Angle flange
Order no. F1-LB



Rotation limiter
Order no. DB1-B



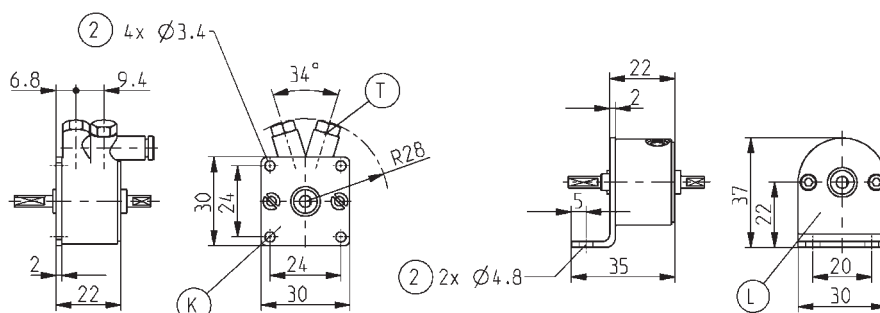
Stop confirm screw
Order no. NJ3-E2/02



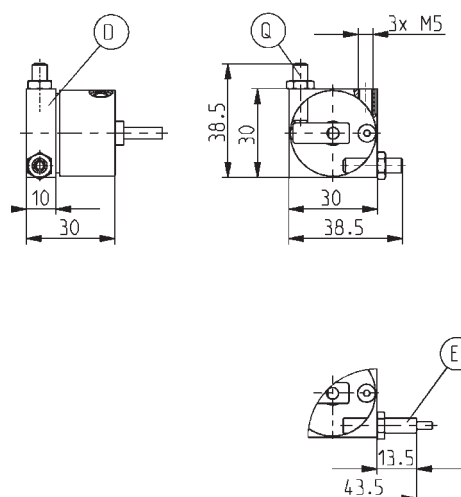
Plug 3-pole
Order no. S12-G-3

Accessories

② Fixing flange



Accessories



Subject to change without prior notice

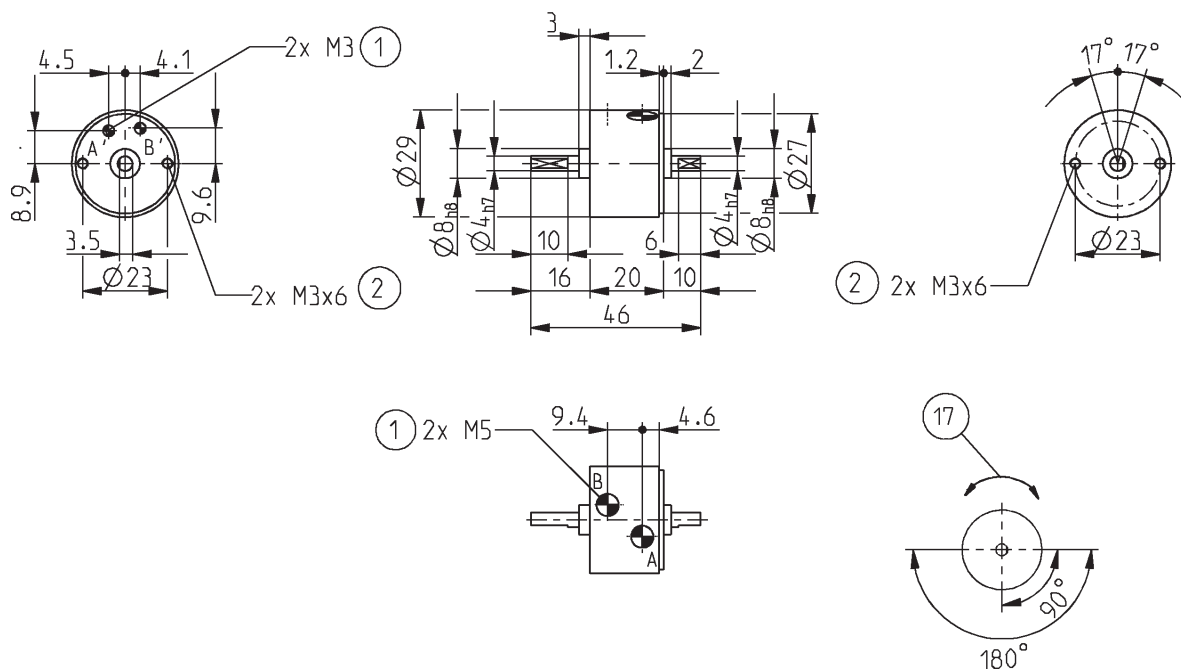
Order no.:	PRN1-90-B	PRN1-180-B
Swivel angle [°]:	90° ^{±4}	180° ^{±4}
Torque [Nm]:	0,15	0,15
Swivel time [s]:	0,10	0,17
Min./max. operating pressure [bar]:	2/7	2/7
Min./max. operating temperature [°C]*:	-5/80	-5/80
Air volume per cycle [cm³]:	2,8	2,8
Weight [g]:	40	40

All data measured at 6 bar

* At temperature below 5°C, possibility of icing

PRN1-90
PRN1-180

- ① Energy supply
- ② Fixing Rotor
- ①7 Rotating direction
- Ⓐ Air connection 0° – 90°/180°
- Ⓑ Air connection 90°/180° – 0°
- Ⓐ Air connection alternate 0° – 90°/180°
- Ⓑ Air connection alternate 90°/180° – 0°



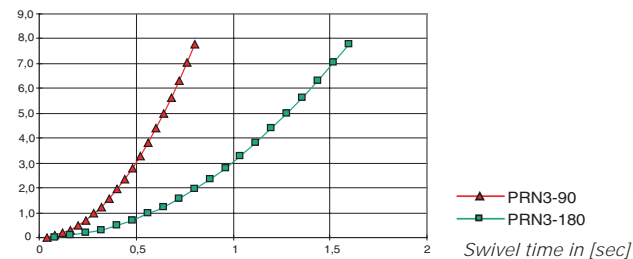
Rotary **Cylinder**

Moment of inertia

Shows the expected swivel time against the calculated moment of inertia.



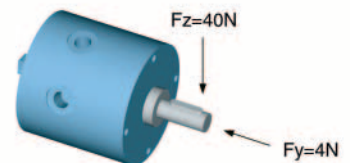
Moment of inertia in [kg cm²]



Data measured at 6 bar and horizontale mounting position

Forces and Moments

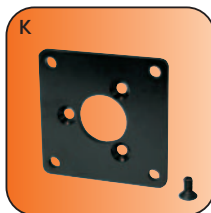
Max. static shaft load



Accessory list



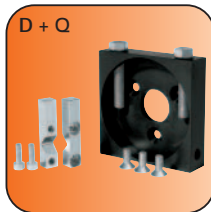
Pneumatic fittings
Order no. WVM5



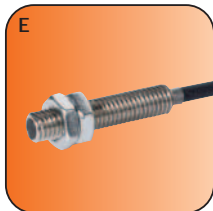
Flange
Order no. F3-P



Angle flange
Order no. F3-LB



Rotation limiter
Order no. DB3



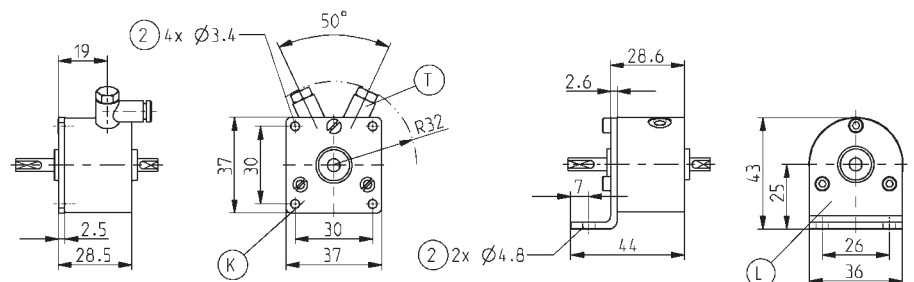
Stop confirm screw
Order no. NJ3-E2/02



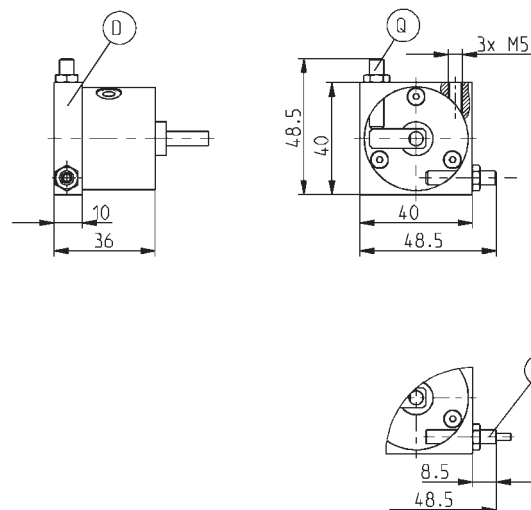
Plug 3-pole
Order no. S12-G-3

Accessories

② Fixing flange



Accessories



Subject to change without prior notice

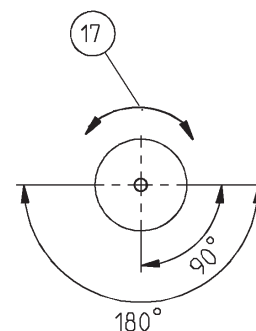
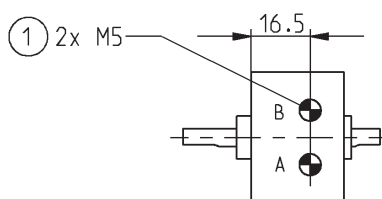
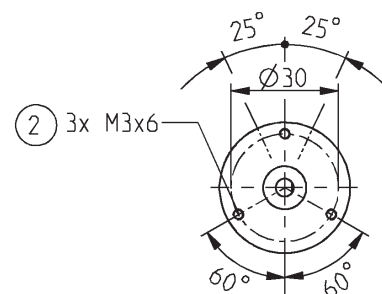
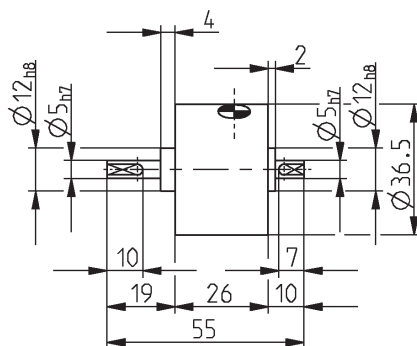
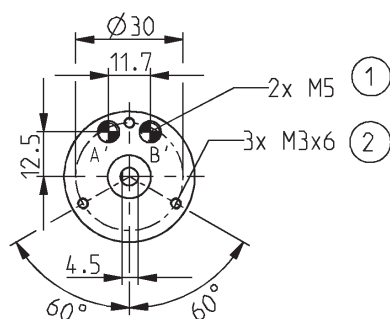
Order no.:	PRN3-90-B	PRN3-180-B
Swivel angle [°]:	90° ⁴	180° ⁴
Torque [Nm]:	0,38	0,38
Swivel time [s]:	0,13	0,20
Min./max. operating pressure [bar]:	2/7	2/7
Min./max. operating temperature [°C]*:	-5/80	-5/80
Air volume per cycle [cm³]:	6,8	6,8
Weight [g]:	70	70

All data measured at 6 bar

* At temperature below 5°C, possibility of icing

PRN3-90
PRN3-180

- ① Energy supply
- ② Fixing Rotor
- ①7 Rotating direction
- Ⓐ Air connection 0° – 90°/180°
- Ⓑ Air connection 90°/180° – 0°
- Ⓐ Air connection alternate 0° – 90°/180°
- Ⓑ Air connection alternate 90°/180° – 0°



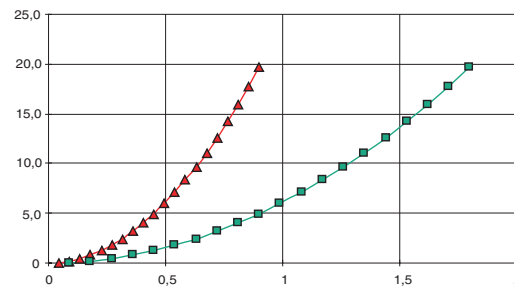
Rotary **Cylinder**



Moment of inertia

Shows the expected swivel time against the calculated moment of inertia.

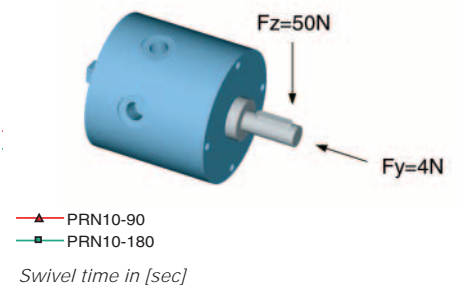
Moment of inertia in [kg cm²]



Data measured at 6 bar and horizontale mounting position

Forces and Moments

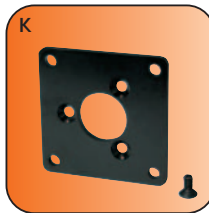
Max. static shaft load



Accessory list



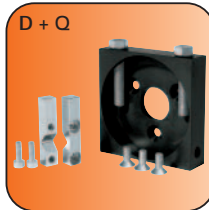
Pneumatic fittings
Order no. WVM5



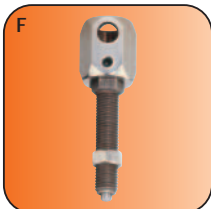
Flange
Order no. F10-P



Angle flange
Order no. F10-LB



Rotation limiter
Order no. DB10



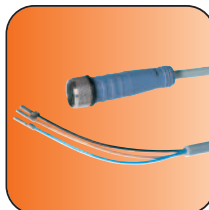
Stop confirm screw
Order no. AI-M8x1-38



Proximity switch
Order no. NJ12-E2S

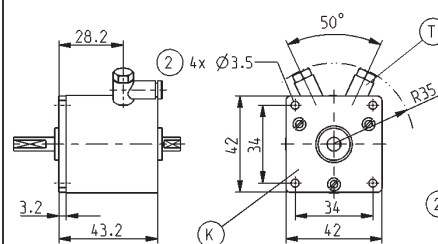


Cable angled plug
Order no. KAW500

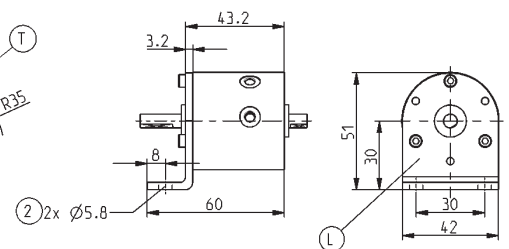


Cable straight plug
Order no. KAG500

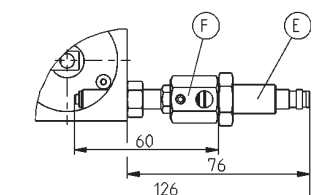
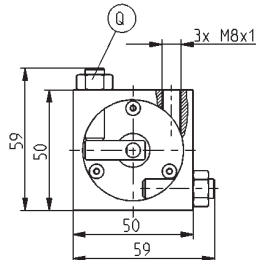
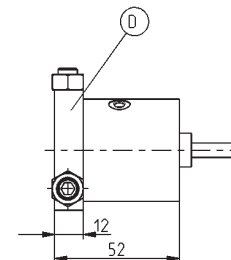
Accessories



② Fixing flange

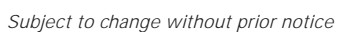


Accessories



Subject to change without prior notice

* At temperature below 5°C, possibility of icing



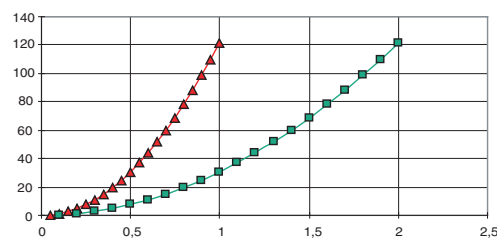
Rotary **Cylinder**



Moment of inertia

Shows the expected swivel time against the calculated moment of inertia.

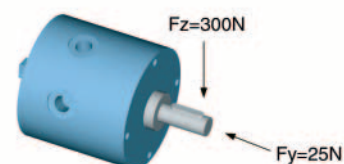
Moment of inertia in [kg cm²]



Data measured at 6 bar and horizontale mounting position

Forces and Moments

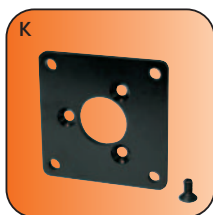
Max. static shaft load



Accessory list



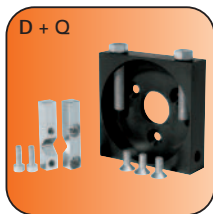
Pneumatic fittings
Order no. WVM5



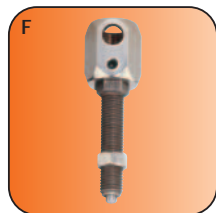
Flange
Order no. F20-P



Angle flange
Order no. F20-LB



Rotation limiter
Order no. DB20



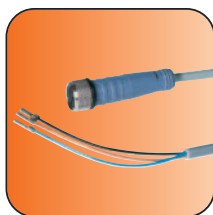
Stop confirm screw
Order no. AI-M8x1-38



Proximity switch
Order no. NJ12-E2S



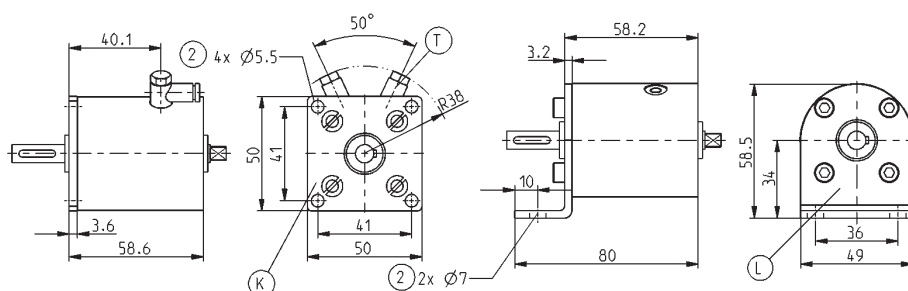
Cable angled plug
Order no. KAW500



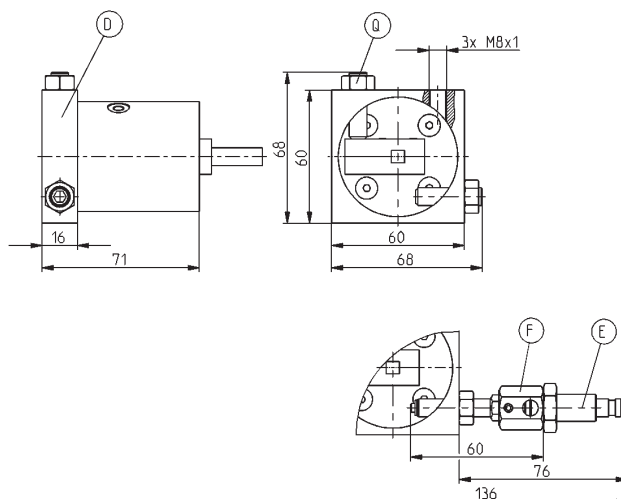
Cable straight plug
Order no. KAG500

Accessories

② Fixing flange



Accessories



Subject to change without prior notice



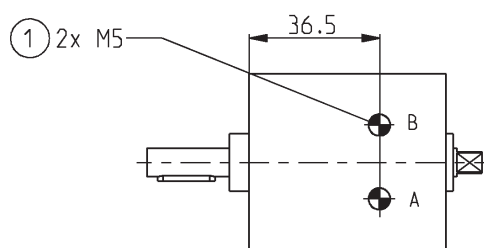
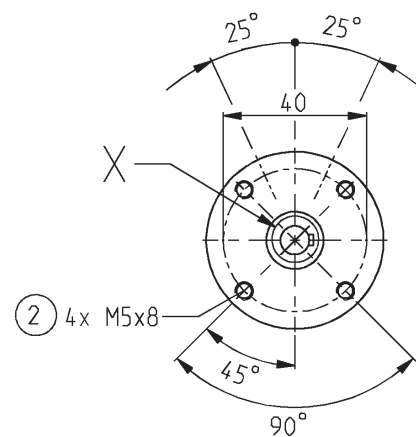
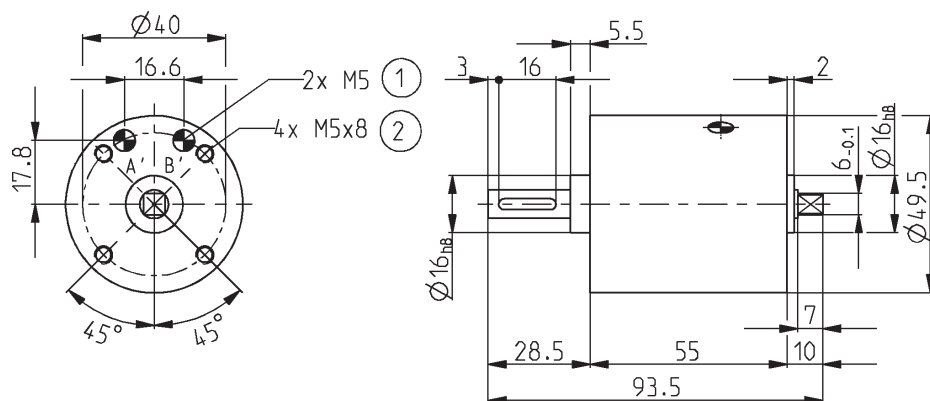
Order no.:	PRN20-90-B	PRN20-180-B
Swivel angle [°]:	90° ^{±1}	180° ^{±1}
Torque [Nm]:	2,1	2,1
Swivel time [s]:	0,14	0,25
Min./max. operating pressure [bar]:	2/10	2/10
Min./max. operating temperature [°C]*:	-5/80	-5/80
Air volume per cycle [cm³]:	34	34
Weight [g]:	250	250

All data measured at 6 bar

* At temperature below 5°C, possibility of icing

PRN20-90
PRN20-180

- ① Energy supply
- ② Fixing Rotor
- ⑰ Rotating direction
- Ⓐ Air connection 0° – 90°/180°
- Ⓑ Air connection 90°/180° – 0°
- Ⓐ Air connection alternate 0° – 90°/180°
- Ⓑ Air connection alternate 90°/180° – 0°



Subject to change without prior notice

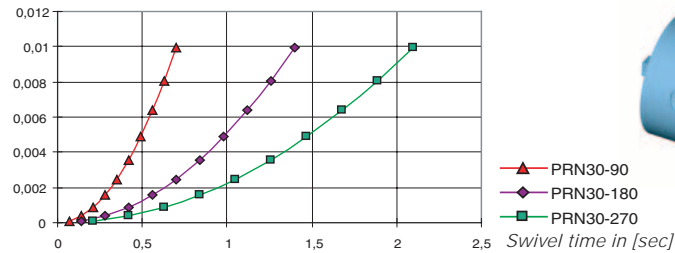
Rotary **Cylinder**



Moment of inertia

Shows the expected swivel time against the calculated moment of inertia.

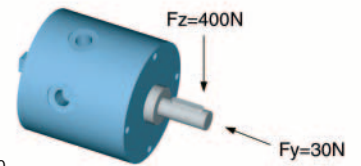
Moment of inertia in [kg cm²]



Data measured at 6 bar and horizontale mounting position

Forces and Moments

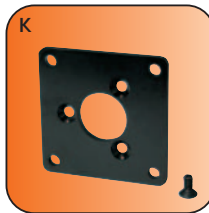
Max. static shaft load



Accessory list



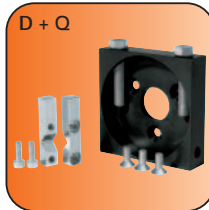
Pneumatic fittings
Order no. WV1/8x6



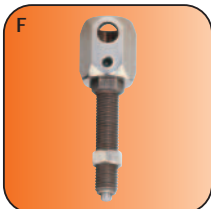
Flange
Order no. F30-P



Angle flange
Order no. F30-LB



Rotation limiter
Order no. DB30



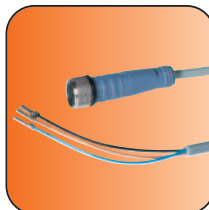
Stop confirm screw
Order no. AI-M8x1-53



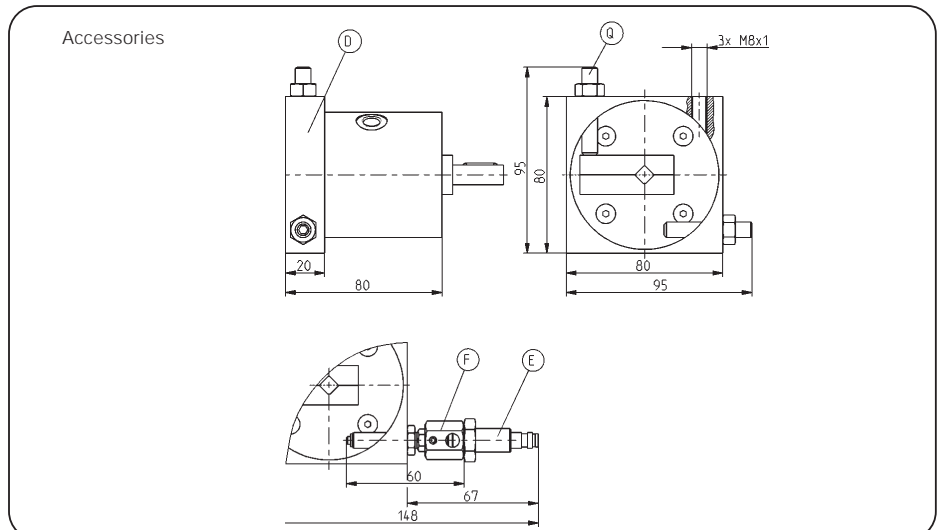
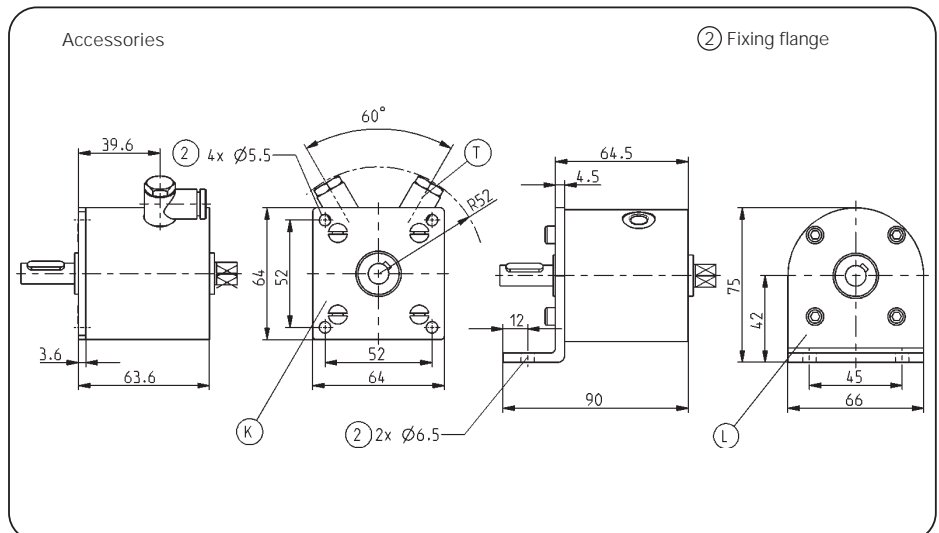
Proximity switch
Order no. NJ12-E2S



Cable angled plug
Order no. KAW500



Cable straight plug
Order no. KAG500



Subject to change without prior notice

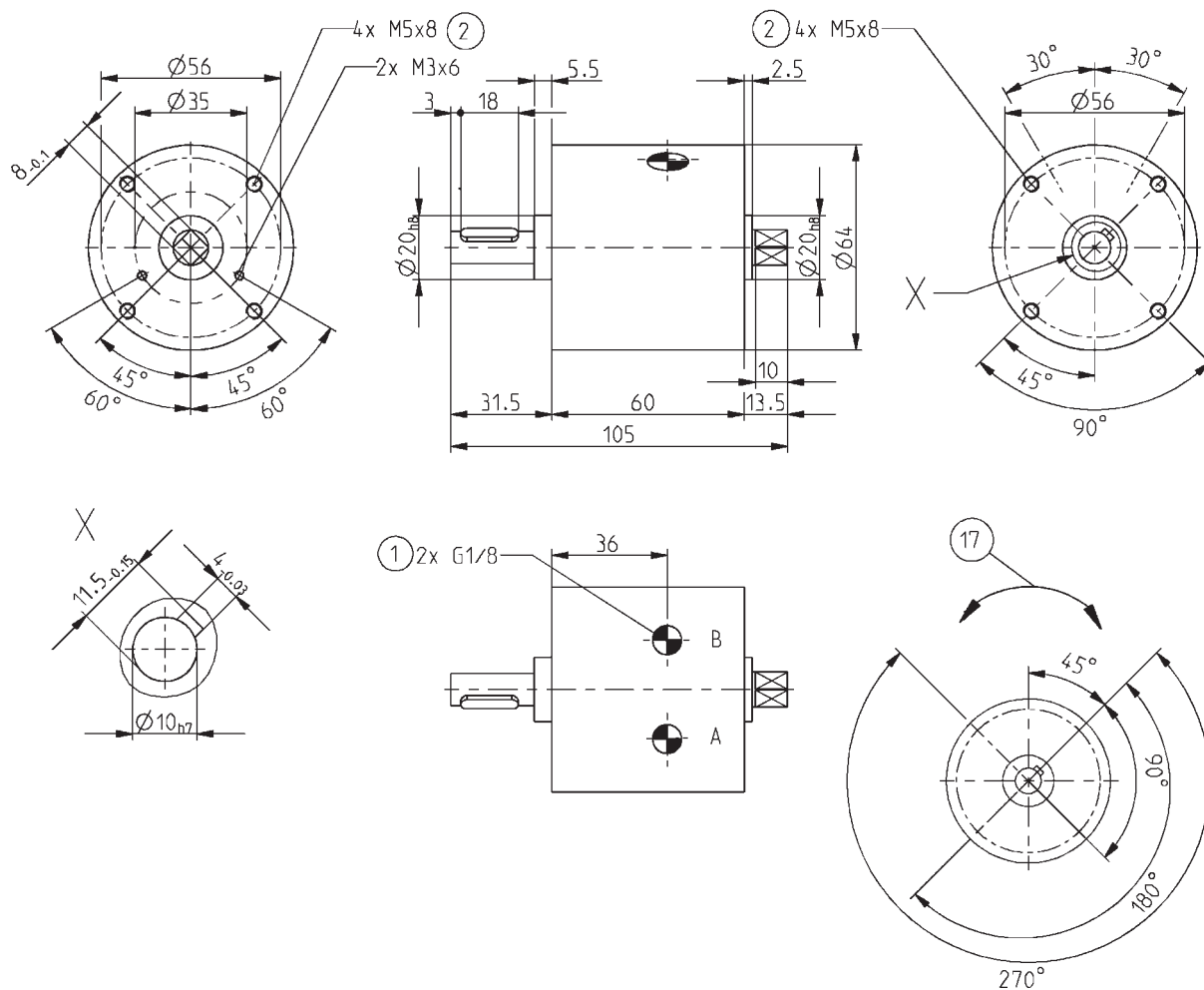
Order no.:	PRN30-90	PRN30-180	PRN30-270
Swivel angle [°]:	90° ⁺³ ₀	180° ⁺³ ₀	270° ⁺³ ₀
Torque [Nm]:	4,1	4,1	4,1
Swivel time [s]:	0,17	0,33	0,5
Min./max. operating pressure [bar]:	2/10	2/10	2/10
Min./max. operating temperature [°C]*:	-5/60	-5/60	5/60
Air volume per cycle [cm³]:	74	74	86
Weight [g]:	500	500	500

All data measured at 6 bar

* At temperature below 5°C, possibility of icing

PRN30-90
PRN30-180
PRN30-270

- ① Energy supply
- ② Fixing Rotor
- ⑰ Rotating direction
- A Air connection 0° – 90°/180°
- B Air connection 90°/180° – 0°



Subject to change without prior notice

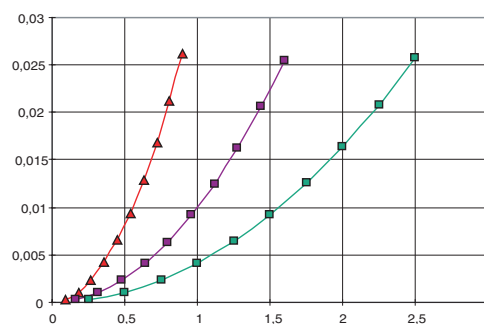
Rotary **Cylinder**



Moment of inertia

Shows the expected swivel time against the calculated moment of inertia.

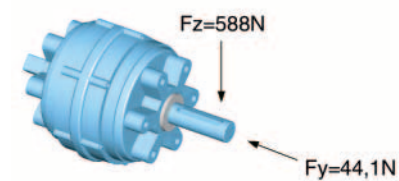
Moment of inertia in [kg cm²]



Data measured at 6 bar and horizontale mounting position

Forces and Moments

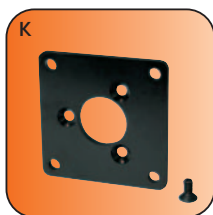
Max. static shaft load



Accessory list



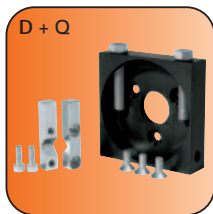
Pneumatic fittings
Order no. WV1/8x8



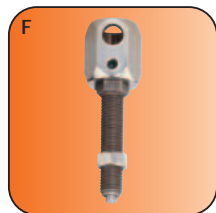
Flange
Order no. F50-P



Angle flange
Order no. F50-LB



Rotation limiter
Order no. DB50



Stop confirm screw
Order no. AI-M8x1-53



Proximity switch
Order no. NJ12-E2S



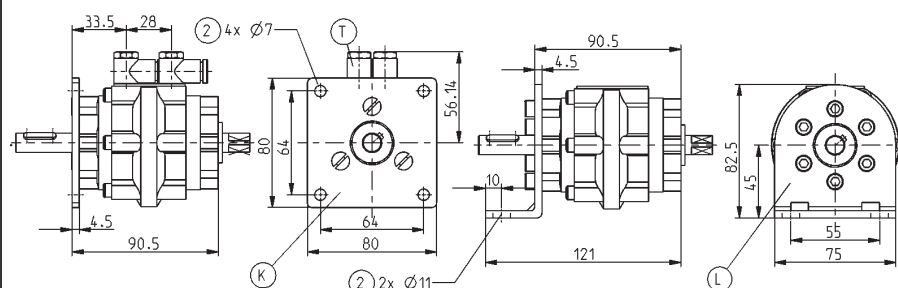
Cable angled plug
Order no. KAW500



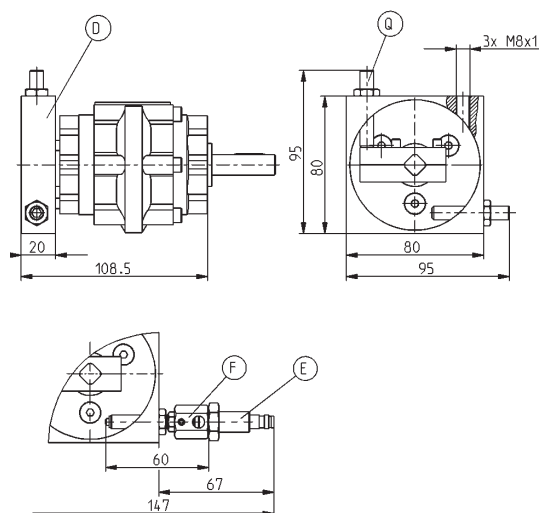
Oil damper and stop lever see page 26/27

Accessories

② Fixing flange



Accessories



Subject to change without prior notice

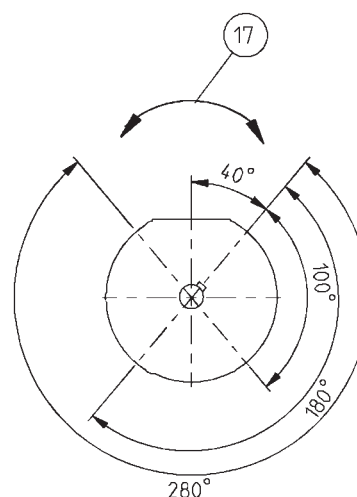
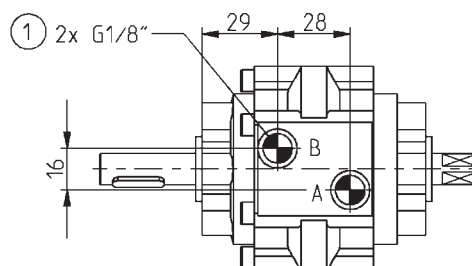
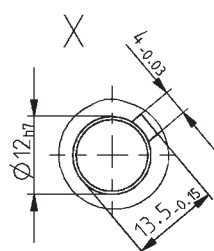
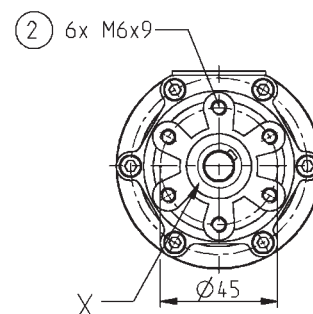
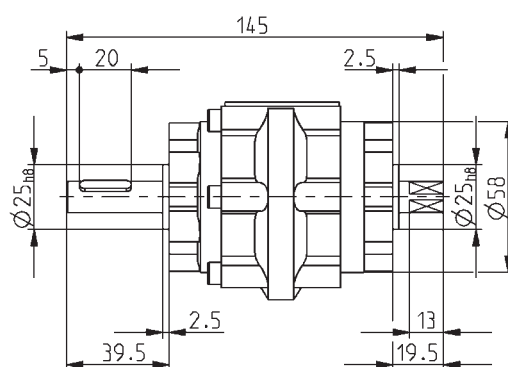
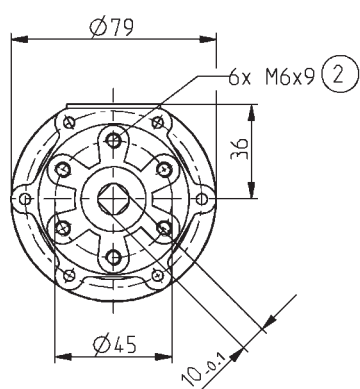


Order no.:	PRN50-100	PRN50-180	PRN50-280
Swivel angle [°]:	100 ⁺³ ₋₀	180 ⁺³ ₋₀	280 ⁺³ ₋₀
Torque [Nm]:	12,8	5,9	5,9
Swivel time [s]:	0,17	0,33	0,5
Min./max. operating pressure [bar]:	2/10	2/10	2/10
Min./max. operating temperature [°C]:	5/60	5/60	5/60
Air volume per cycle [cm³]:	86	102	124
Weight [g]:	800	750	750

All data measured at 6 bar

PRN50-100
PRN50-180
PRN50-280

- ① Energy supply
- ② Fixing Rotor
- ⑰ Rotating direction
- A Air connection 0° – 90°/180°
- B Air connection 90°/180° – 0°



Subject to change without prior notice

Rotary **Cylinder**

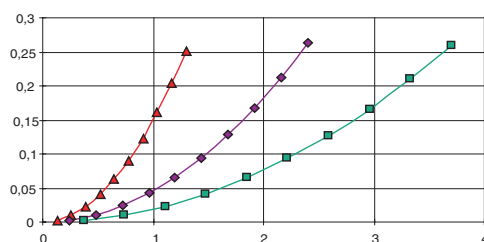


Ø 110 mm

Moment of inertia

Shows the expected swivel time against the calculated moment of inertia.

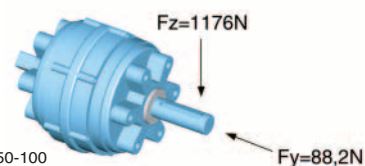
Moment of inertia in [kg cm²]



Data measured at 6 bar and horizontale mounting position

Forces and Moments

Max. static shaft load

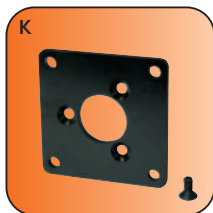


Swivel time in [sec]

Accessory list



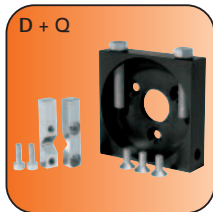
Pneumatic fittings
Order no. WV1/4x8



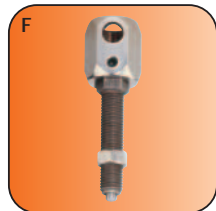
Flange
Order no. F150-P



Angle flange
Order no. F150-LB



Rotation limiter
Order no. DB150



Stop confirm screw
Order no. AI-M10x1



Proximity switch
Order no. NJ12-E2S



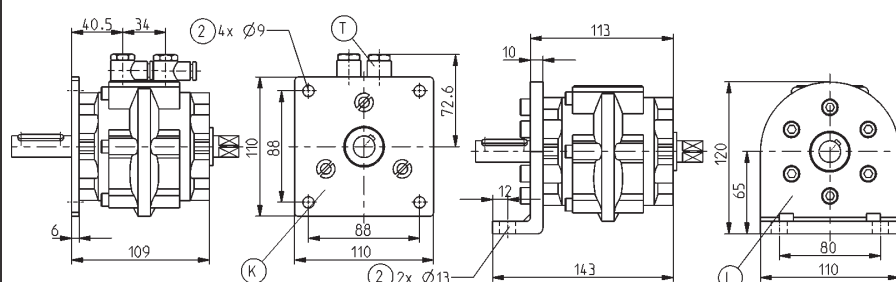
Cable angled plug
Order no. KAW500



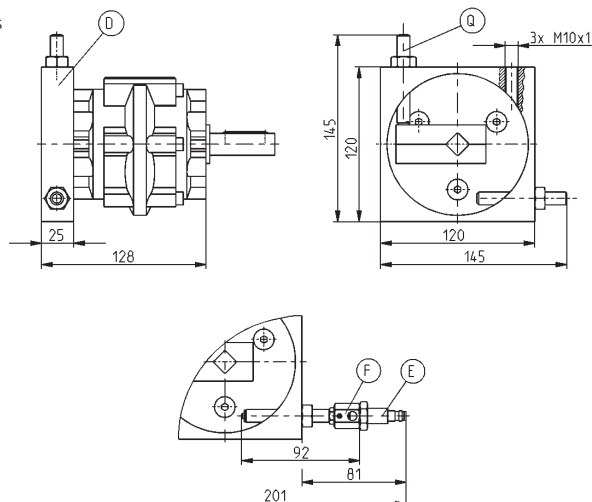
Oil damper and stop lever see page 26/27

Accessories

② Fixing flange



Accessories



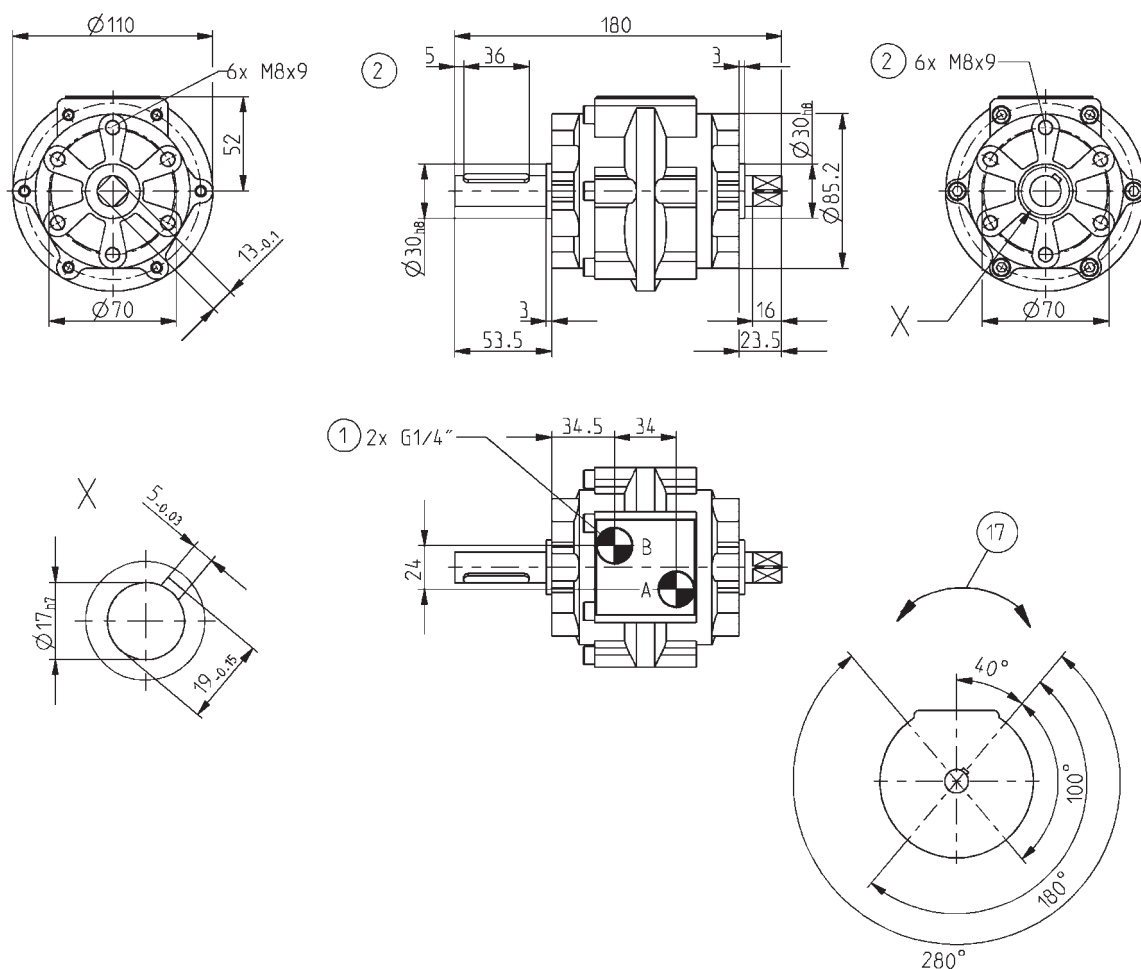
Subject to change without prior notice

Order no.:	PRN150-100	PRN150-180	PRN150-280
Swivel angle [°]:	100 ⁺³ ₀	180 ⁺³ ₀	280 ⁺³ ₀
Torque [Nm]:	41,5	18	18
Swivel time [s]:	0,25	0,38	0,63
Min./max. operating pressure [bar]:	2/10	2/10	2/10
Min./max. operating temperature [°C]:	5/60	5/60	5/60
Air volume per cycle [cm³]:	246	292	370
Weight [kg]:	1,9	1,9	1,6

All data measured at 6 bar

PRN150-100
PRN150-180
PRN150-280

- ① Energy supply
- ② Fixing Rotor
- ①⑦ Rotating direction
- A Air connection 0° – 90°/180°
- B Air connection 90°/180° – 0°



Subject to change without prior notice

Rotary **Cylinder**

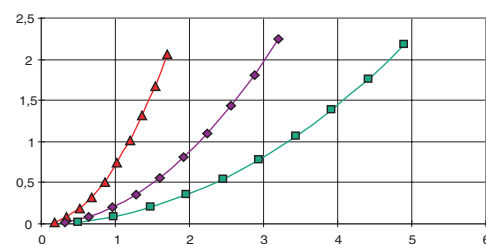


Ø 141,5 mm

Moment of inertia

Shows the expected swivel time against the calculated moment of inertia.

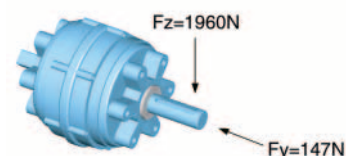
Moment of inertia in [kg cm²]



Data measured at 6 bar and horizontale mounting position

Forces and Moments

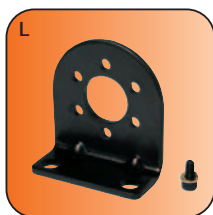
Max. static shaft load



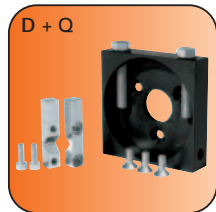
Accessory list



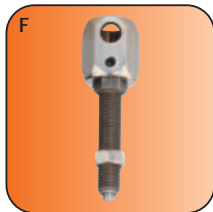
Pneumatic fittings
Order no. GV3/8x13ID



Angle flange
Order no. F300-LB



Rotation limiter
Order no. DB300



Stop confirm screw
Order no. AI-M10x1



Proximity switch
Order no. NJ12-E2S



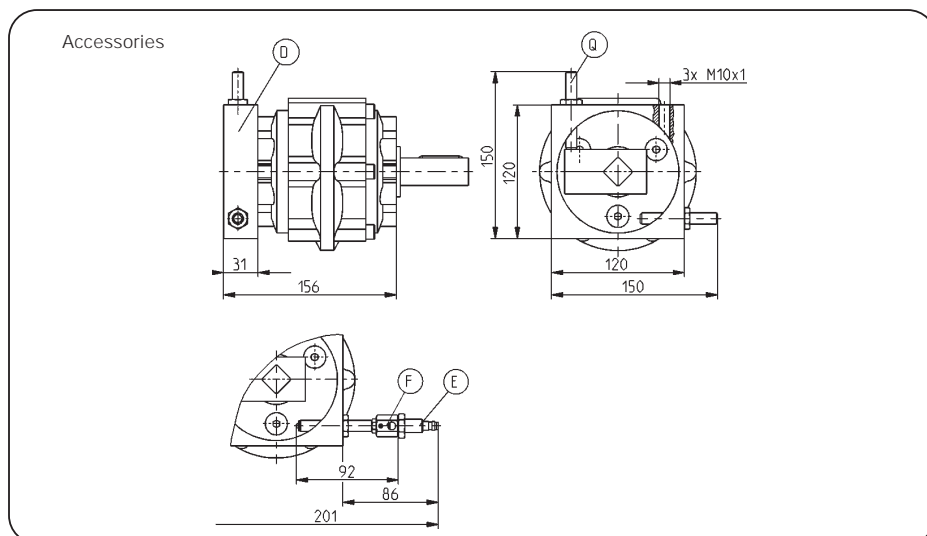
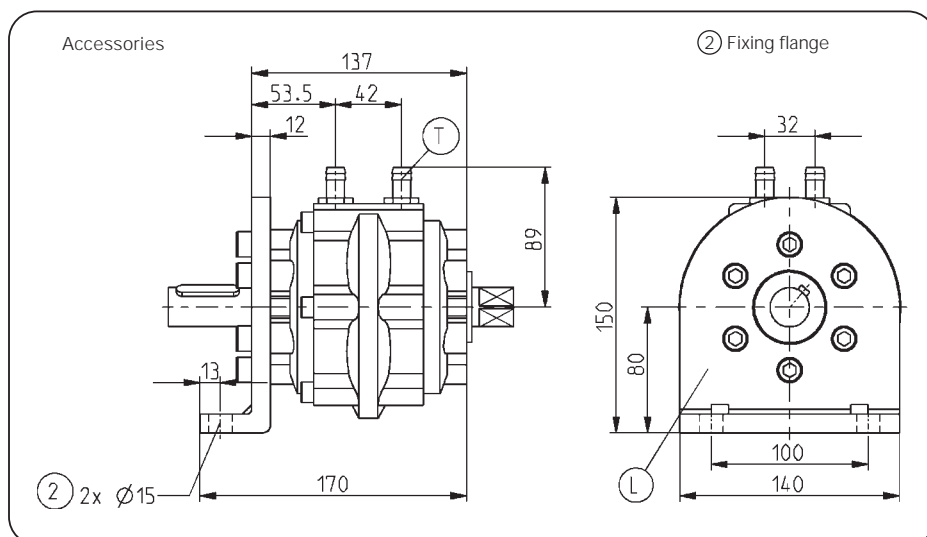
Cable angled plug
Order no. KAW500



One-way flow control valve
Order no. DRV1/4I



Oil damper and stop lever see page 26/27



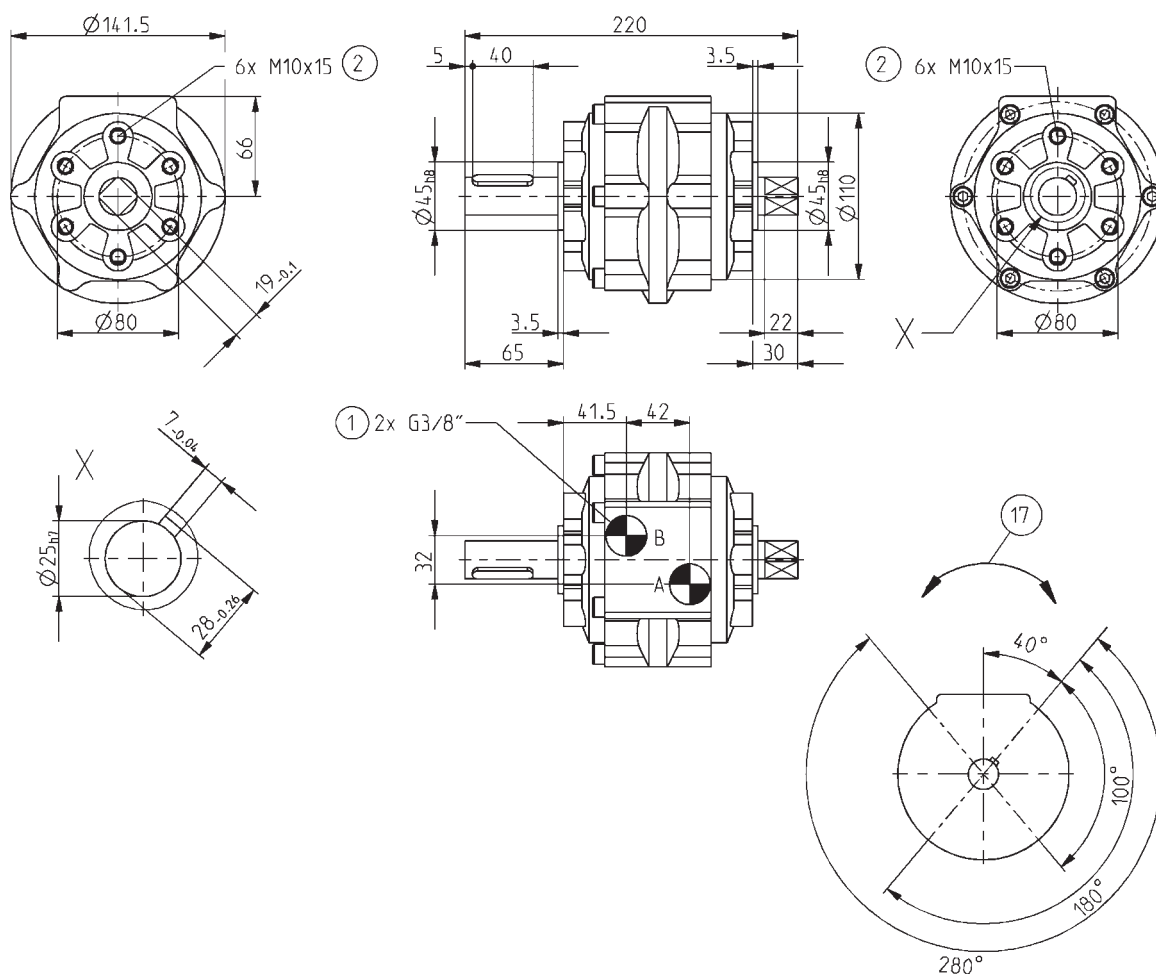
Subject to change without prior notice

Order no.:	PRN300-100	PRN300-180	PRN300-280
Swivel angle [°]:	100 ⁺³ ₀	180 ⁺³ ₀	280 ⁺³ ₀
Torque [Nm]:	83	34,5	34,5
Swivel time [s]:	0,33	0,5	0,71
Min./max. operating pressure [bar]:	2/10	2/10	2/10
Min./max. operating temperature [°C]:	5/60	5/60	5/60
Air volume per cycle [cm³]:	542	566	730
Weight [kg]:	4,1	3,7	3,6

All data measured at 6 bar

PRN300-100
PRN300-180
PRN300-280

- ① Energy supply
- ② Fixing Rotor
- ⑰ Rotating direction
- A Air connection 0° – 90°/180°
- B Air connection 90°/180° – 0°



Subject to change without prior notice

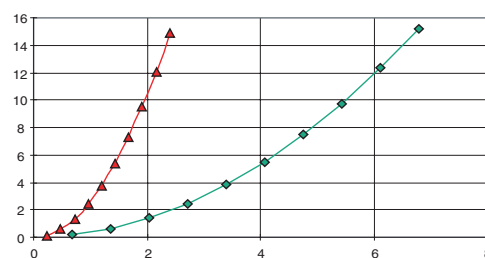
Rotary **Cylinder**



Moment of inertia

Shows the expected swivel time against the calculated moment of inertia.

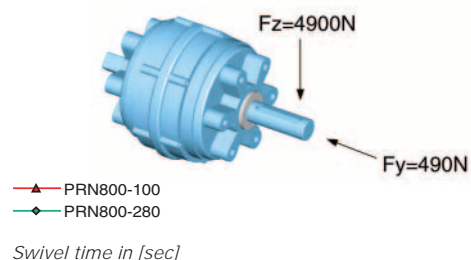
Moment of inertia in [kg cm²]



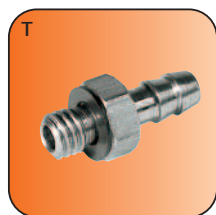
Data measured at 6 bar and horizontale mounting position

Forces and Moments

Max. static shaft load



Accessory list

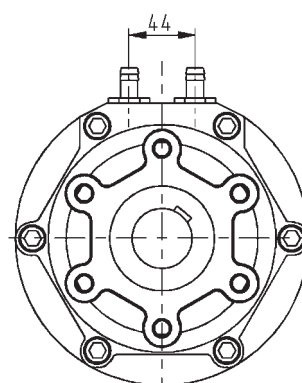
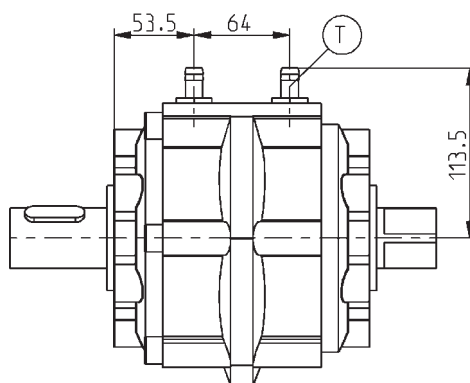


Pneumatic fittings
Order no. GV1/2x13ID



One-way flow control valve
Order no. DRV1/4I

Accessories



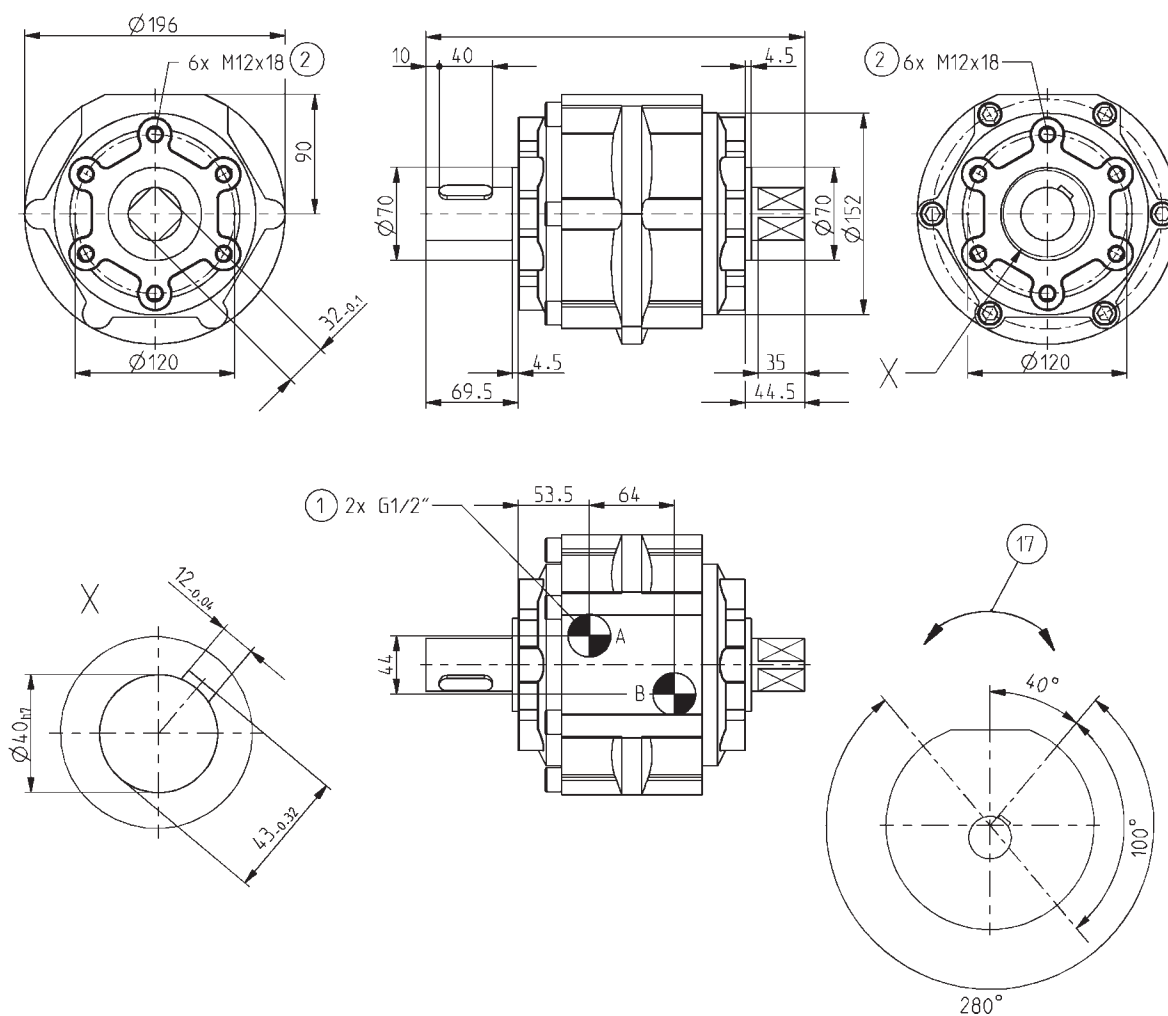
Subject to change without prior notice

Order no.:	PRN800-100	PRN800-280
Swivel angle [°]:	100 ⁺³ ₀	280 ⁺³ ₀
Torque [Nm]:	247	123
Swivel time [s]:	0,45	1,00
Min./max. operating pressure [bar]:	2/10	2/10
Min./max. operating temperature [°C]:	5/60	5/60
Air volume per cycle [cm³]:	1548	2092
Weight [kg]:	12,5	11,0

All data measured at 6 bar

PRN800-100
PRN800-280

- ① Energy supply
- ② Fixing Rotor
- ⑰ Rotating direction
- A Air connection 0° – 90°/180°
- B Air connection 90°/180° – 0°



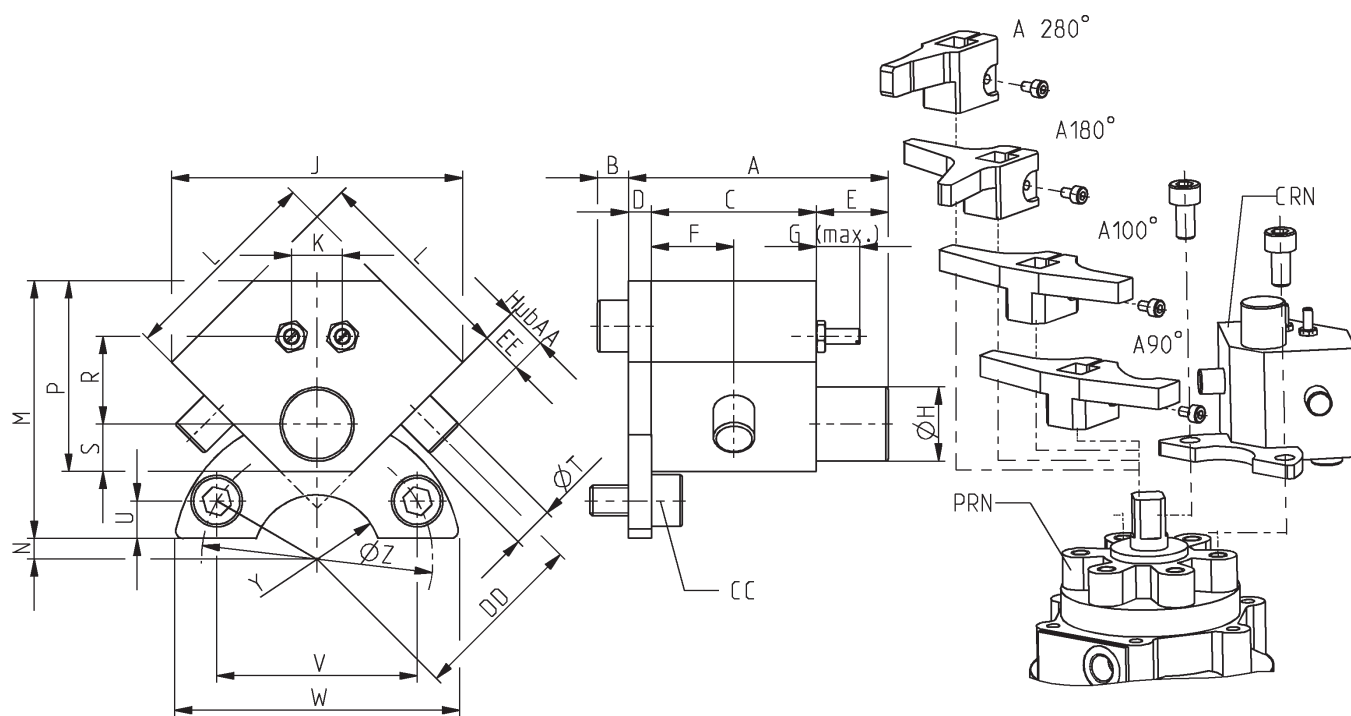
Änderungen vorbehalten

Rotary **Cylinder**

Oil damper for pneumatic rotor

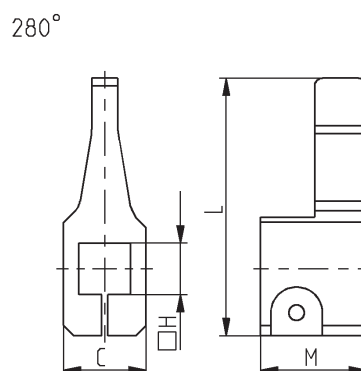
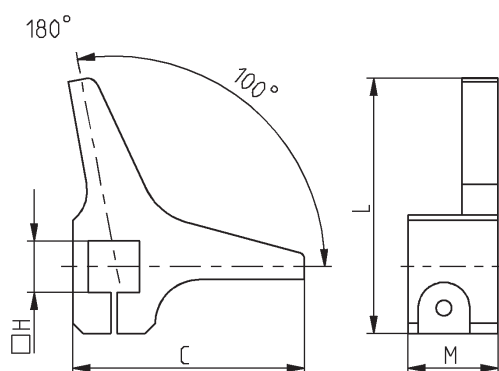
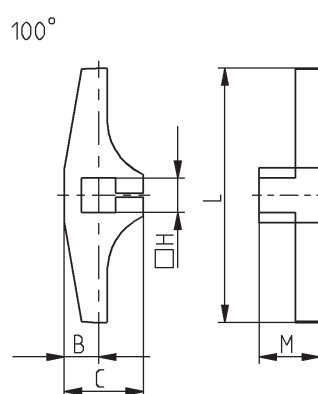
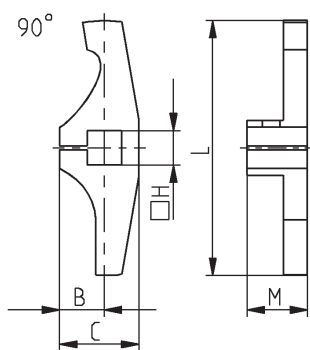
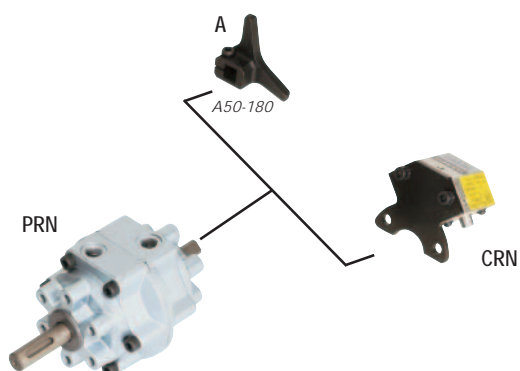


Order no.:	CRN50	CRN150	CRN300
Brake angle [°]:	11	12	14
Energy intake per stroke max. [Nm]:	3	10	20
Energy intake per hour max. [Nm/h]:	12000	43200	84000
Min./max. operating temperature [°C]:	5/50	5/50	5/50
to match:	PRN50	PRN150	PRN300
Weight [g]:	240	420	780



	A	B	C	D	E	F	G	H	J	K	L	M	N	P	R	S	T	U	V	W	Y	Z	AA	CC	DD	EE
CRN50	50,6	6,0	32	4,5	14	16	8,5	Ø14,4	56,6	9,9	40	50	4,0	37	17,0	9,2	Ø8	7,2	39,0	56	R12,5	Ø45	6,5	M6x1x12	34	8
CRN150	56,5	7,2	36	4,5	16	18	8,5	Ø18,4	70,7	11,3	50	62	9,5	49	25,5	11,4	Ø10	8,0	60,6	80	R15,0	Ø70	10,0	M8x1,25x16	46	12
CRN300	62,5	7,2	42	4,5	16	21	12,0	Ø22,5	91,9	12,7	65	87	8,0	61	33,2	14,1	Ø12	12,0	69,2	95	R22,5	Ø80	15,0	M10x1,5x20	62	18

Stop lever for oil damper

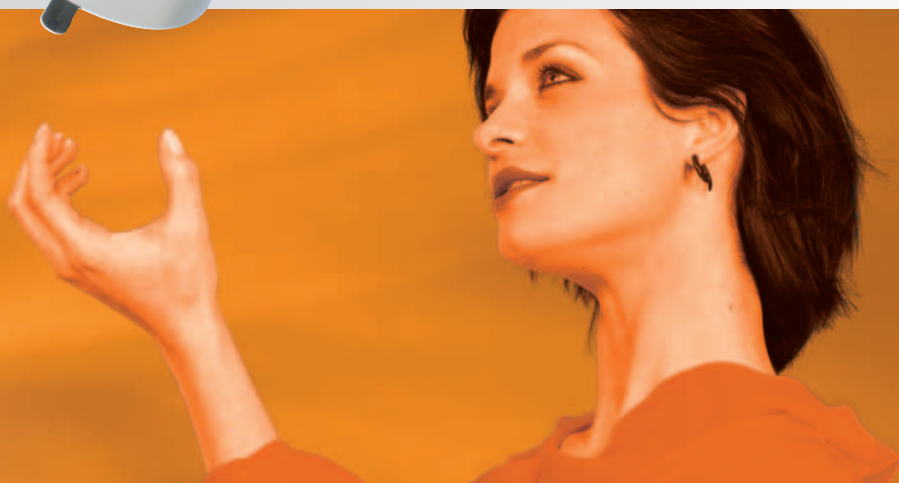


	A50-90	A150-90	A300-90	A50-100	A150-100	A300-100	A50-180	A150-180	A300-180	A50-280	A150-280	A300-280
B	13	16	22	10	12	18	---	---	---	---	---	---
C	23	28	40	23	28	40	45	63	85,5	16	24	35
H	10	13	19	10	13	19	10	13	19	10	13	19
L	74	102	136	74	102	136	50	67	90	50	67	90
M	17,5	20	23,5	17,5	20	23,5	17,5	20	23,5	20	20	24



*Rotary **Cylinders***

pneumatic



SH Series

SOMMER
automatic

Rotary **Cylinder**

➤ Features

- Compact design, light weight in connection with high performance
- High reliability and long durability
- Adjustable swivel angle up to 360° and all end positions with mechanical limit stop



Drive

two independent blade-type cylinder

- compare to the size, high torque up to 7.2 Nm



Force transfer

positive fit by featherkey (SH20)

- safety against slipping through of the drive flange
- ideal force transfer



Step-function

adjustable intermediate position

- over four pneumatic connections, to stop at four positions possible
- with the delivered mechanical limit stop, the swivel angle up to 360° is adjustable

Terms

- Swivel time:** time required to cover a 0° – 90°/180° swivel movement
- Cycle:** distance covered by the blade-type cylinder in one 0°/90°/0° or 0°/180°/0° swivel movement
- Maintenance:** maintenance free up to 1.5 mil. cycles
(please see the owner's manual for conditions, download from www.sommer-automatic.com)
- long maintenance intervals keep costs down
 - long durability

Model Step-rotors

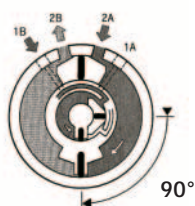
Order no.	Swivel angle [°]	Torque [Nm]	Swivel time [s]
SH-5 Outer blade	180	2,73	0,8
SH-5 Inner blade	180	0,59	0,5
SH-20 Outer blade	180	7,20	1,1
SH-20 Inner blade	180	2,35	0,8

Basic explanations



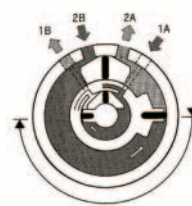
0-position

High-pressure air in 1B and 2B: Internal- and external blades go to the 0-position, see.



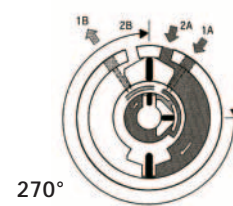
First 90°-intermediate adjustment

High-pressure air 1B and 2A: The external blade swivel up to the external limit stop (Stopper) at 90°.



Second 90°-intermediate setting

High-pressure air 1A and 2B: The external blade swivels with the internal 90° limit stop to the 0-position. The internal blade swivel 180° set opposite each other.



Third 90°-intermediate adjustment

High-pressure air 1A and 2A: The external blade swivels with the internal blade in the movement direction at 90°.

Rotary **Cylinder**

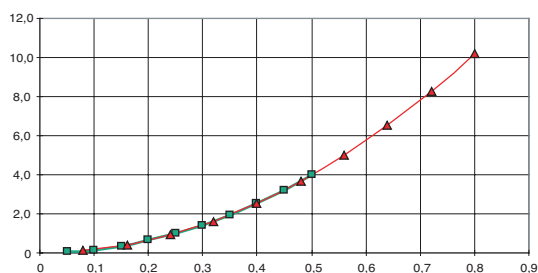


Ø 64 mm

Moment of inertia

Shows the expected swivel time against the calculated moment of inertia.

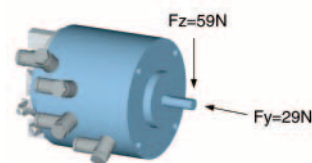
Moment of inertia in [kg cm²]



Data measured at 6 bar and horizontale mounting position

Forces and Moments

Max. static shaft load



Swivel time in [sec]

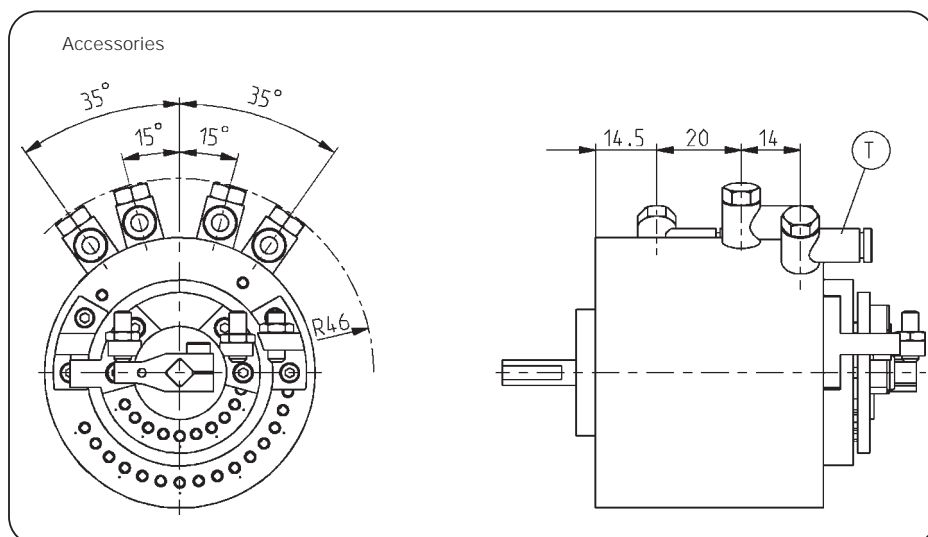
Accessory list



Pneumatic fittings
Order no. WVM5



One-way flow control valve
Order no. DRV1/8I

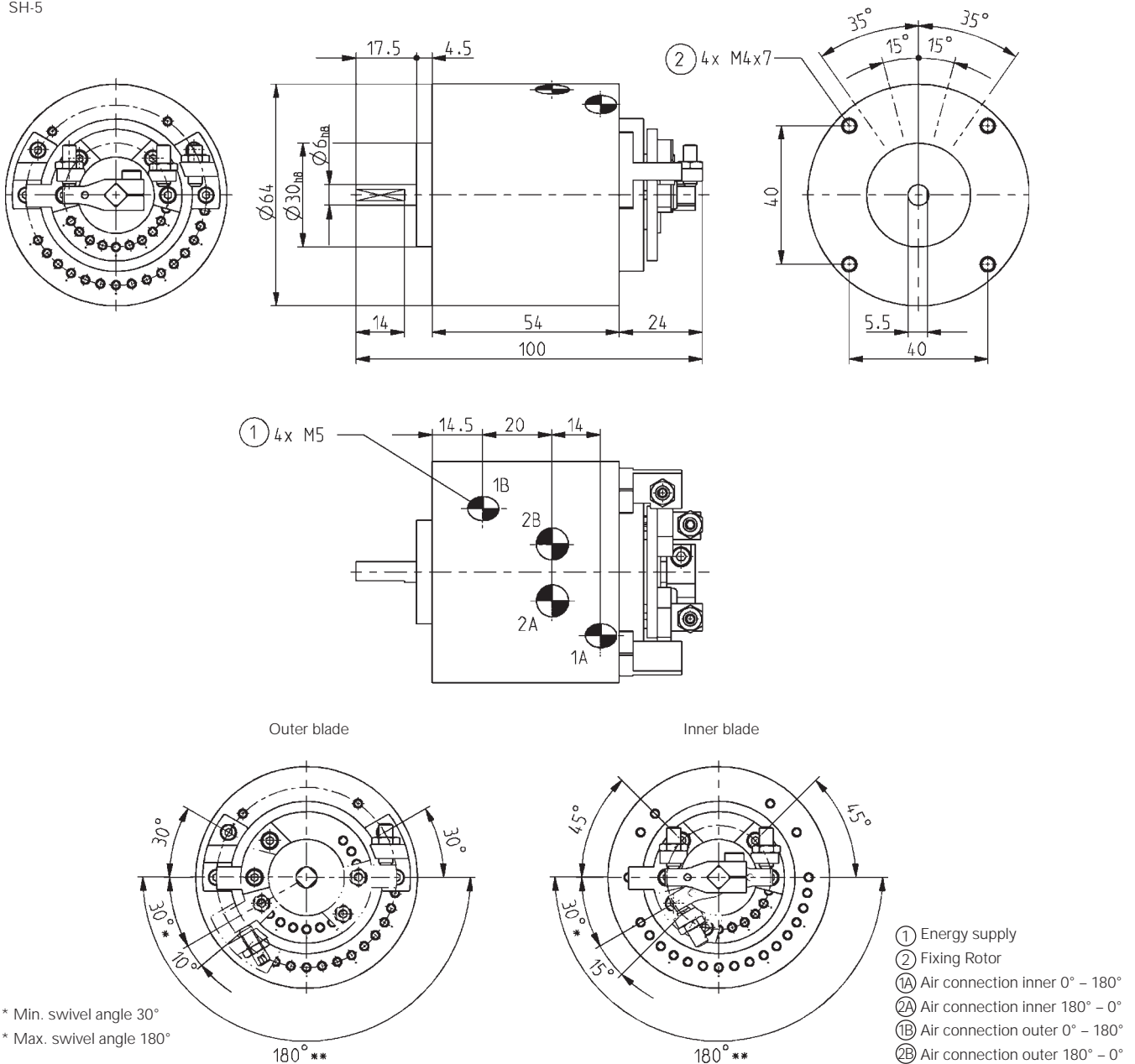


Subject to change without prior notice

Order no.:	SH-5
Swivel angle up to [°]:	360
Torque outer blade [Nm]:	2,73
Torque inner blade [Nm]:	0,59
Swivel time outer blade [s]:	0,8
Swivel time inner blade [s]:	0,5
Repeatability +/- [°]:	3
Min./max. operating pressure [bar]:	3/7
Min./max. operating temperature [°C]:	5/60
Air volume per cycle outer blade [cm³]:	14
Air volume per cycle inner blade [cm³]:	56
Weight [kg]:	0,52

All data measured at 6 bar

SH-5



Subject to change without prior notice

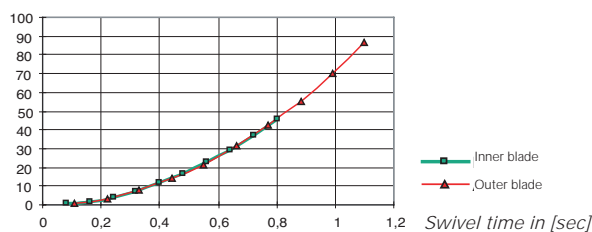
Rotary **Cylinder**



Moment of inertia

Shows the expected swivel time against the calculated moment of inertia.

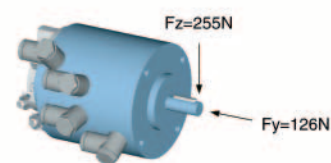
Moment of inertia in [kg cm²]



Data measured at 6 bar and horizontale mounting position

Forces and Moments

Max. static shaft load



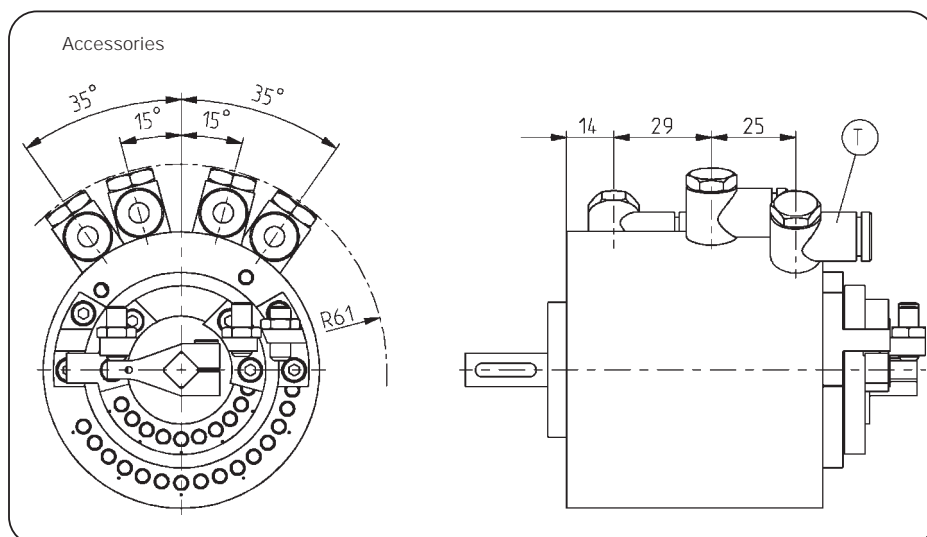
Accessory list



Pneumatic fittings
Order no. WVM5



One-way flow control
valve
Order no. DRV1/8

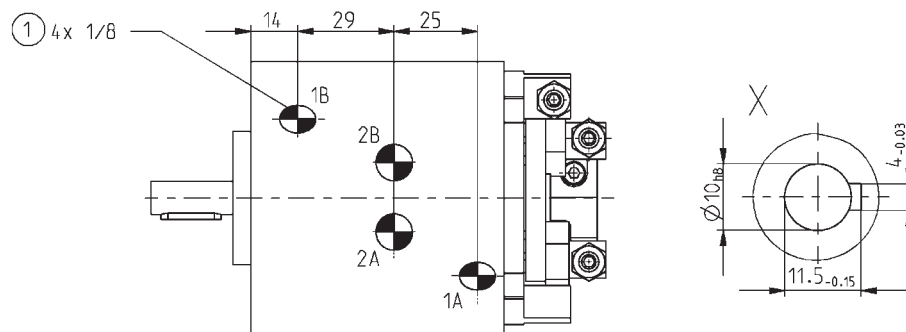
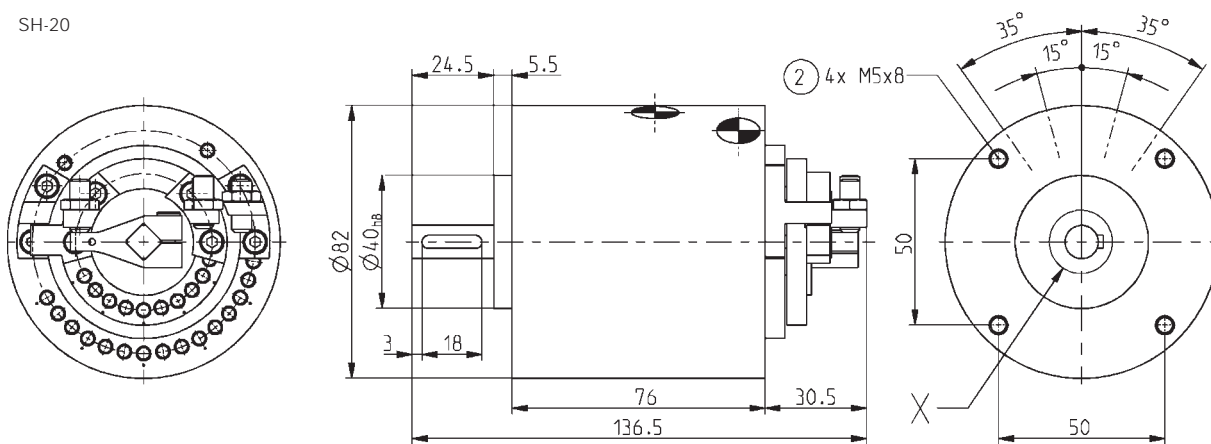


Subject to change without prior notice

Order no.:	SH-20
Swivel angle up to [°]:	360
Torque outer blade [Nm]:	7,20
Torque inner blade [Nm]:	2,35
Swivel time outer blade [s]:	1,1
Swivel time inner blade [s]:	0,8
Repeatability +/- [°]:	3
Min./max. operating pressure [bar]:	3/7
Min./max. operating temperature [°C]:	5/60
Air volume per cycle outer blade [cm³]:	72
Air volume per cycle inner blade [cm³]:	23
Weight [kg]:	1,13

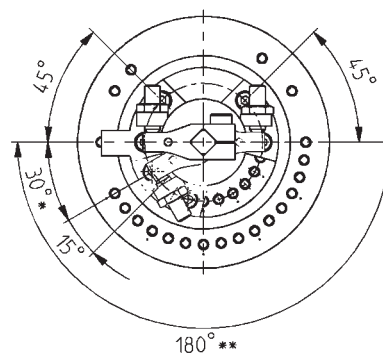
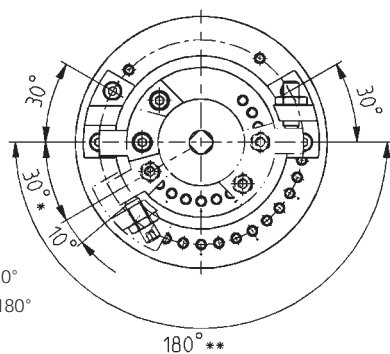
All data measured at 6 bar

SH-20



Outer blade

Inner blade



- ① Energy supply
- ② Fixing Rotor
- ①A Air connection inner 0° – 180°
- ②A Air connection inner 180° – 0°
- ①B Air connection outer 0° – 180°
- ②B Air connection outer 180° – 0°

** Min. swivel angle 30°
** Max. swivel angle 180°

Subject to change without prior notice



➤ Grippers <i>pneumatic</i>	01
➤ Grippers <i>electrical</i>	02
➤ Grippers <i>hydraulic</i>	03
➤ Grippers <i>Special</i>	04
➤ Grip & Rotate Modules <i>pneumatic</i>	05
➤ Separators	06
➤ Swivel Units <i>pneumatic</i>	07
➤ Swivel Units <i>electrical</i>	08
➤ Swivel Units <i>hydraulic</i>	09
➤ Rotation Jaws <i>pneumatic</i>	10
➤ Axial Compensation Modules	11
➤ Tool Changers	12
➤ Robotics Accessories	13
➤ Linear Cylinders	14
➤ Shock Absorber	15
➤ Air Vane Motors	16
➤ Rotary Cylinders	17
➤ Vacuum Components	18
➤ Accessorios	19