

# 3PXM

## 3 jaws self-centering grippers Ø125-160-200

### ALUMINIUM

### Pneumatics - Protected



#### Technical features

- Aluminium body to contain the gripper weight
- Functional parts heat-treated for high precision and long life
- Jaws with calibrated bushings
- Protection class IP64
- Highest rigidity and Repeatability: 0,02 mm
- Prepared for Air purge

#### OPTIONAL:

- Spring workstop
- Inductive/Analogic stroke control sensor ON/OFF or linear
- Magnetic stroke control sensor ON/OFF or linear

#### Applications /Customer benefits

- Compact and light design
- O.D. and I.D. (also with springs versions)
- Interchangeable with most existing universal grippers

#### Standard equipment

Grippers without fingers and without sensors.  
All screws for the double mounting, all centering bushings and all interface OR included.

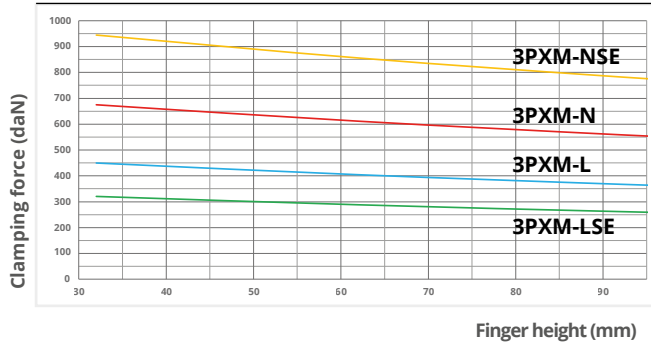
SMW-Autoblok Type	Id. No.	Clamping force (daN) at 6 bar	Spring force min. (daN)	U (mm) jaw stroke	Air volume (cm³)	Pressure (bar) min./max.	Closing/Opening time (s) at 6 bar	Weight (Kg)	Workpiece weight recommended (Kg)	e (mm) min./max.	R1 (mm) min./max.	R2 (mm) min./max.
3PXM-N 125	77920413	675	----	6	200,5	2/8	0,2/0,2	2,7	33,5	35/41	76/82	28/34
3PXM-NSE 125	77920513	945	270	6	357	4/6,5	0,32/0,17	3,3	33,5	35/41	76/82	28/34
3PXM-NSI 125	77920613	990	270	6	366,5	4/6,5	0,17/0,32	3,3	33,5	35/41	76/82	28/34
3PXM-L 125	77920113	320	----	13	200,5	2/8	0,2/0,2	2,7	16,0	35/48	69/82	28/41
3PXM-LSE 125	77920213	450	130	13	357	4/6,5	0,32/0,17	3,3	16,0	35/48	69/82	28/41
3PXM-LSI 125	77920313	470	130	13	366,5	4/6,5	0,17/0,32	3,3	16,0	35/48	69/82	28/41
3PXM-N 160	77920417	1270	----	8	480	2/8	0,44/0,44	5,2	63,5	45/53	96,5/104,5	36/44
3PXM-NSE 160	77920517	1750	480	8	833	4/6,5	0,66/0,36	6,5	63,5	45/53	96,5/104,5	36/44
3PXM-NSI 160	77920617	1800	480	8	847,5	4/6,5	0,36/0,66	6,5	63,5	45/53	96,5/104,5	36/44
3PXM-L 160	77920117	600	----	16	480	2/8	0,44/0,44	5,2	30,0	45/61	88,5/104,5	36/52
3PXM-LSE 160	77920217	830	230	16	833	4/6,5	0,66/0,36	6,5	30,0	45/61	88,5/104,5	36/52
3PXM-LSI 160	77920317	855	230	16	847,5	4/6,5	0,36/0,66	6,5	30,0	45/61	88,5/104,5	36/52
3PXM-N 200	77920421	1220	----	14	866	2/8	1,05/1,05	10,1	60,0	49/63	116/130	39,5/53,5
3PXM-NSE 200	77920521	1630	410	14	1476,5	4/6,5	1,38/0,9	12,2	60,0	49/63	116/130	39,5/53,5
3PXM-NSI 200	77920621	1680	410	14	1502	4/6,5	0,9/1,38	12,2	60,0	49/63	116/130	39,5/53,5
3PXM-L 200	77920121	810	----	25	866	2/8	1,05/1,05	10,1	40,5	49/74	105/130	39,5/64,5
3PXM-LSE 200	77920221	1085	275	25	1476,5	4/6,5	1,38/0,9	12,2	40,5	49/74	105/130	39,5/64,5
3PXM-LSI 200	77920321	1120	275	25	1502	4/6,5	0,9/1,38	12,2	40,5	49/74	105/130	39,5/64,5

#### Note:

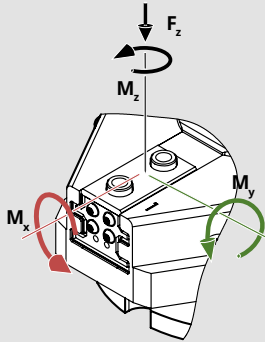
3PXM-N: Normal stroke 3PXM-L: Long stroke 3PXM-NS: Normal stroke with springs 3PXM-LS: Long stroke with springs 3PXM-..E/I: OD / ID Clamping

# 125

# 3PXM

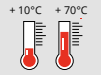


Clamping force calculated at **6 bar**.  
 Max. recommended fingers height: **95 mm**  
 Max. Fingers weight: **2 Kg**  
 For I.D. clamping consider **+5%** of the clamping force shown in the diagram.  
 Use connecting screws **class 12.9**

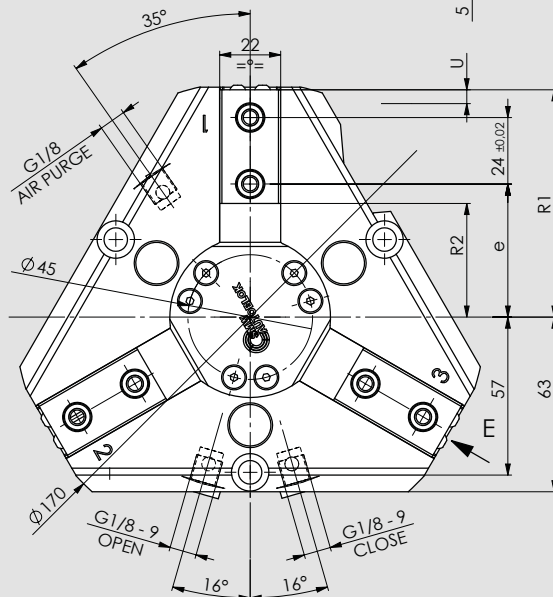
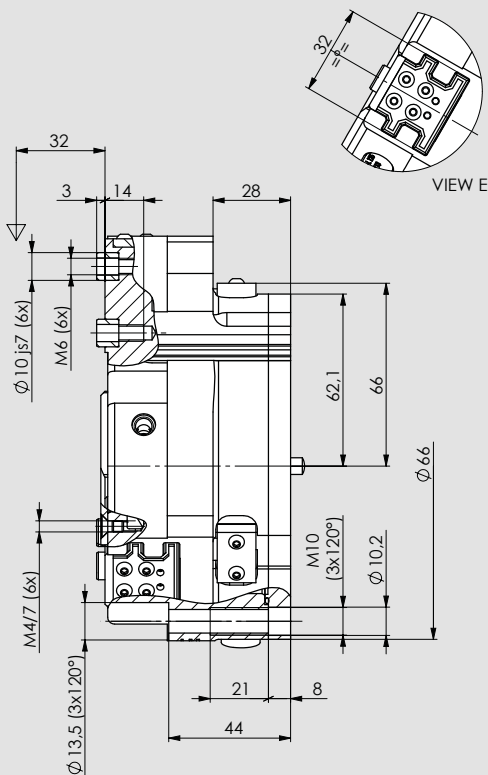
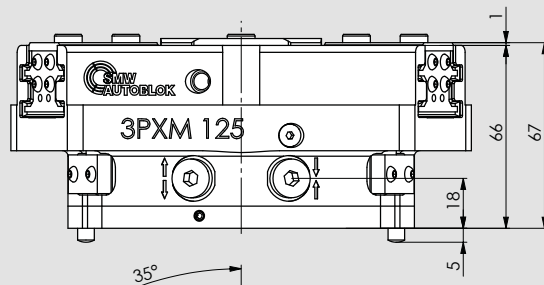
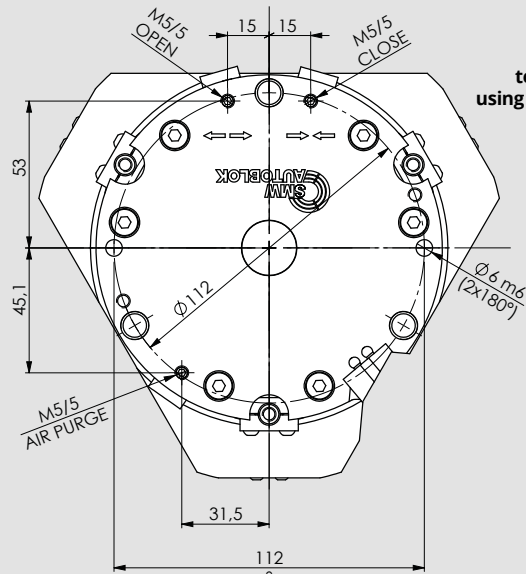
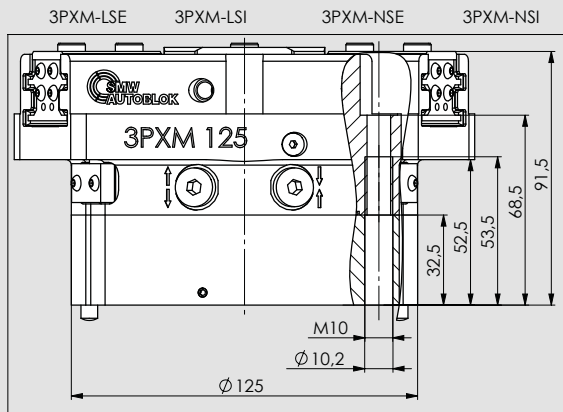


- $M_x$  max. 120 Nm\*
- $M_y$  max. 145 Nm\*
- $M_z$  max. 100 Nm\*
- $F_z$  max. 2800 N\*

\* THE MOMENTS OF INERTIA INDICATED REFER TO ONE JAW AND CAN BE OCCUR SIMULTANEOUSLY. THE  $M_y$  MOMENT CAN BE ADDED TO THE CLAMPING FORCE MOMENT.

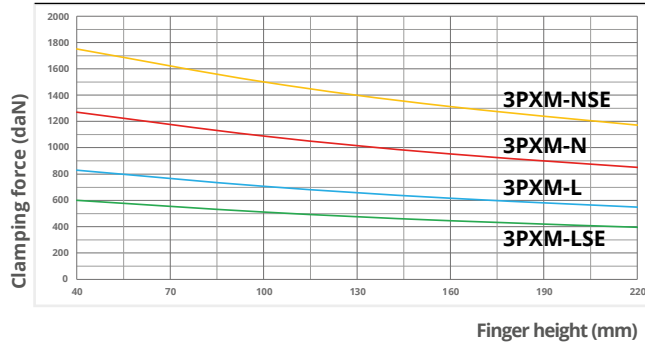


maximum allowed temperature using proximities is **60°C**

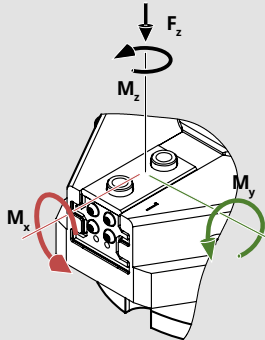


# 160

# 3PXM

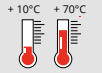


Clamping force calculated at **6 bar**.  
 Max. recommended fingers height: **220 mm**  
 Max. Fingers weight: **3,5 Kg**  
 For I.D. clamping consider **+3%** of the clamping force shown in the diagram.  
 Use connecting screws **class 12.9**

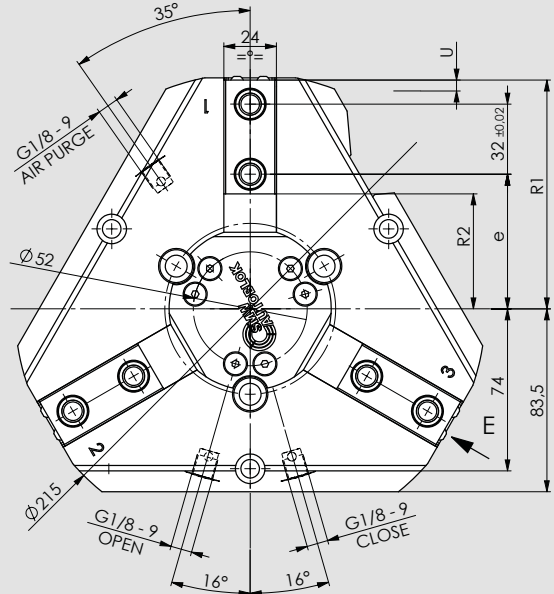
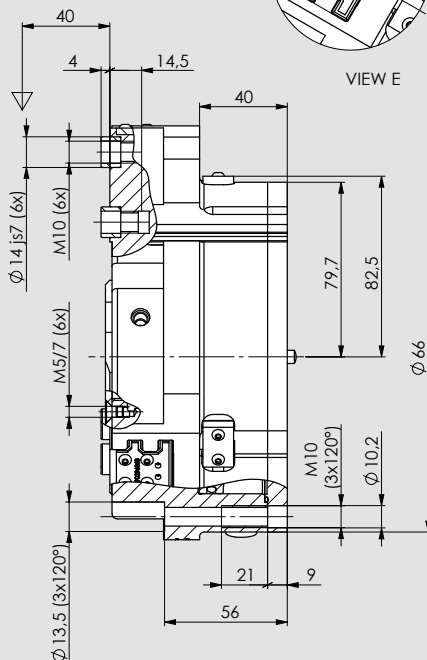
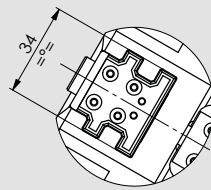
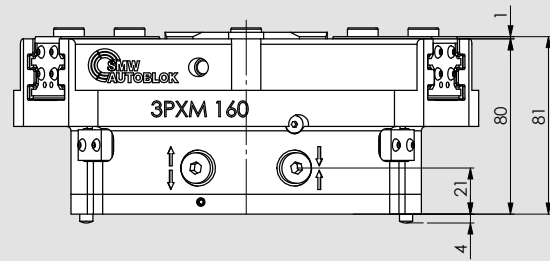
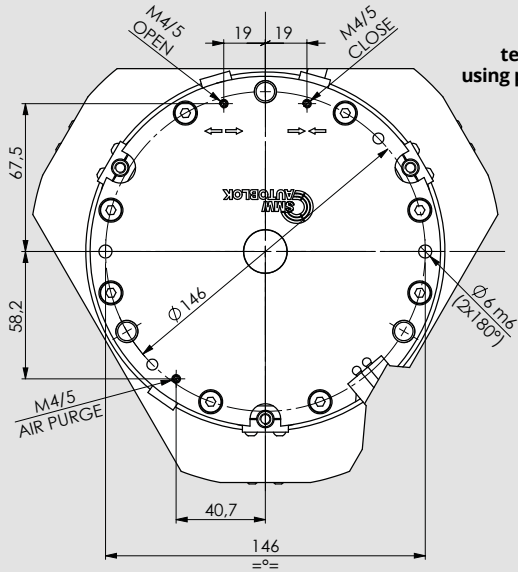
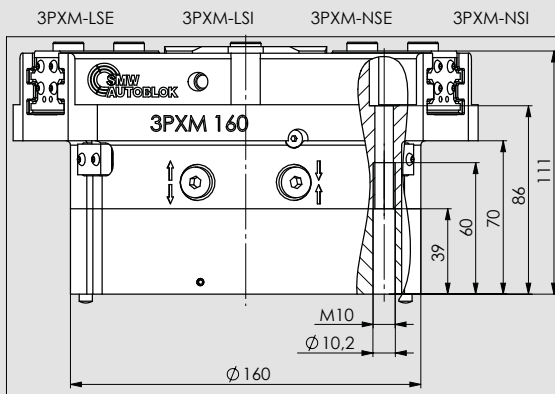


- $M_x$  max. 170 Nm\*
- $M_y$  max. 180 Nm\*
- $M_z$  max. 140 Nm\*
- $F_z$  max. 4400 N\*

\* THE MOMENTS OF INERTIA INDICATED REFER TO ONE JAW AND CAN BE OCCUR SIMULTANEOUSLY. THE  $M_y$  MOMENT CAN BE ADDED TO THE CLAMPING FORCE MOMENT.

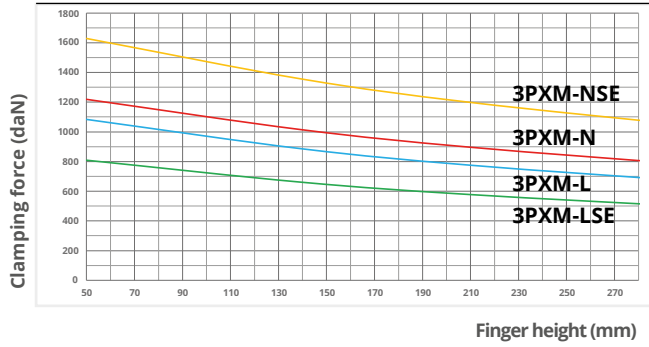


maximum allowed temperature using proximities is **60°C**



# 200

# 3PXM



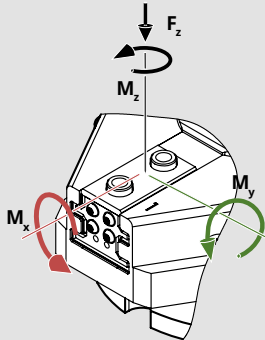
Clamping force calculated at **6 bar**.

Max. recommended fingers height: **280 mm**

Max. Fingers weight: **6,5 Kg**

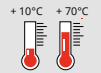
For I.D. clamping consider **+3%** of the clamping force shown in the diagram.

Use connecting screws **class 12.9**

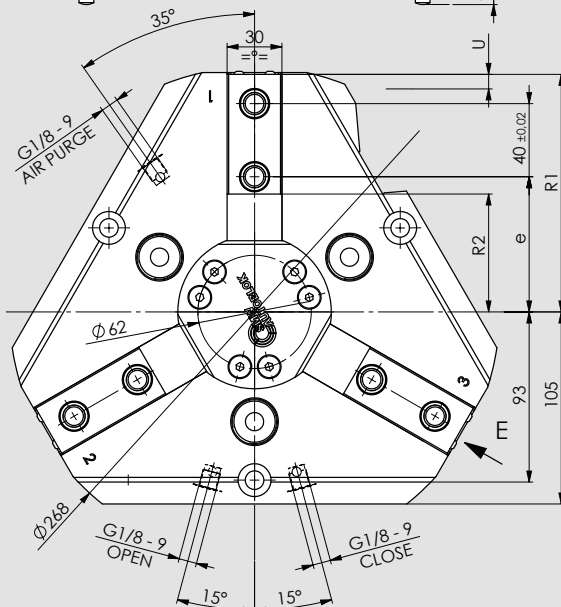
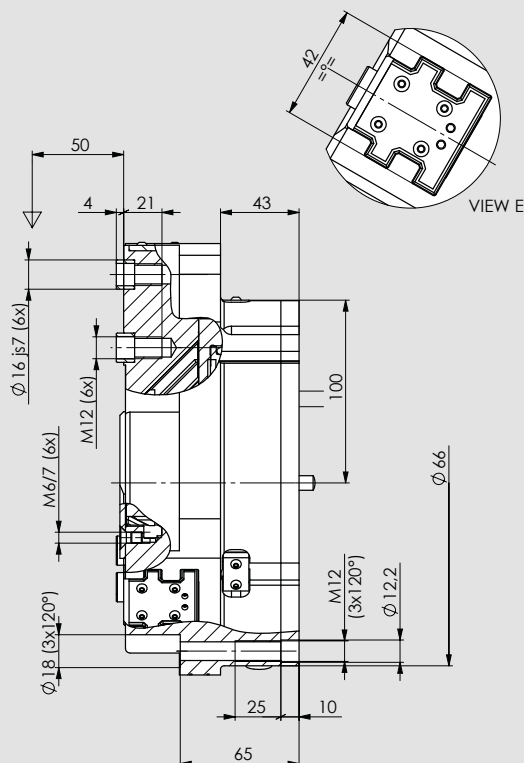
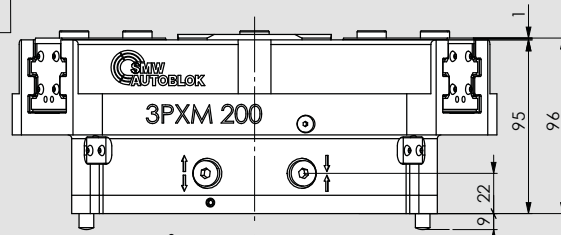
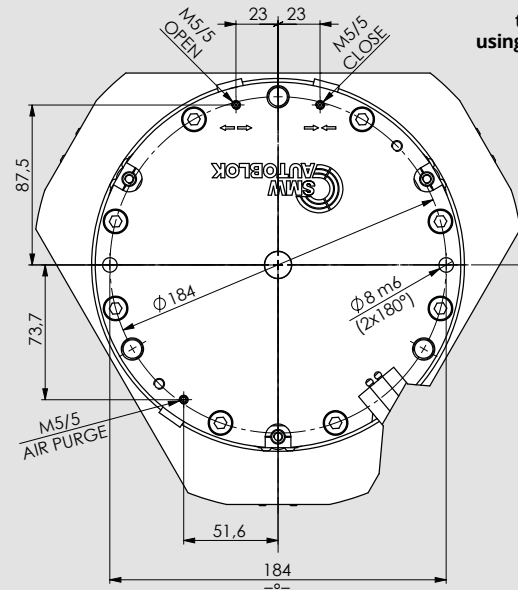
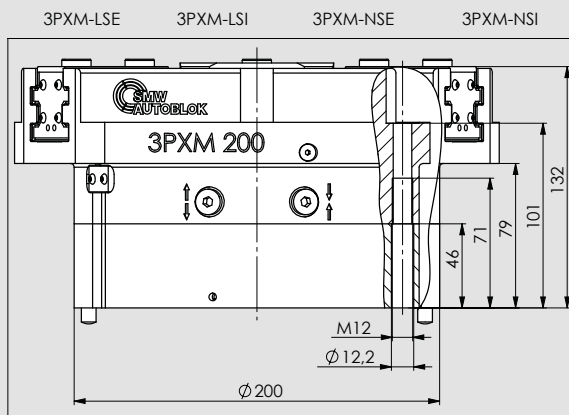


- $M_x$  max. 180 Nm\*
- $M_y$  max. 200 Nm\*
- $M_z$  max. 155 Nm\*
- $F_z$  max. 5500 N\*

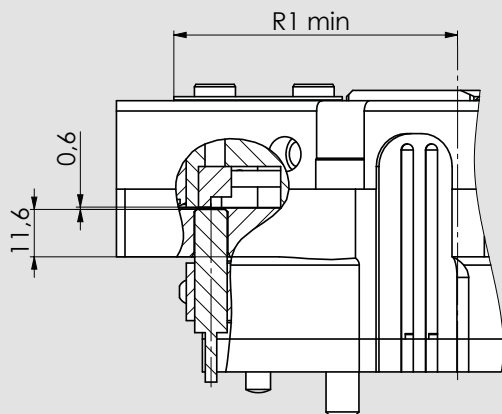
\* THE MOMENTS OF INERTIA INDICATED REFER TO ONE JAW AND CAN BE OCCUR SIMULTANEOUSLY. THE  $M_y$  MOMENT CAN BE ADDED TO THE CLAMPING FORCE MOMENT.



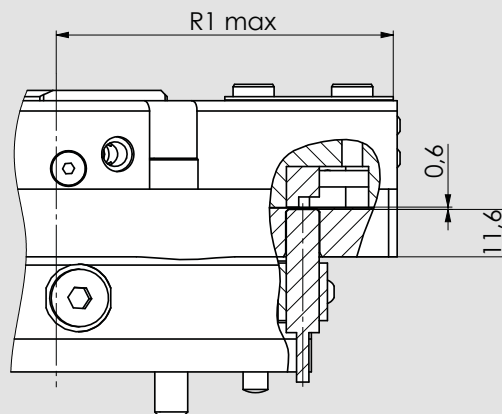
maximum allowed temperature using proximities is **60°C**



### CLOSED ON/OFF



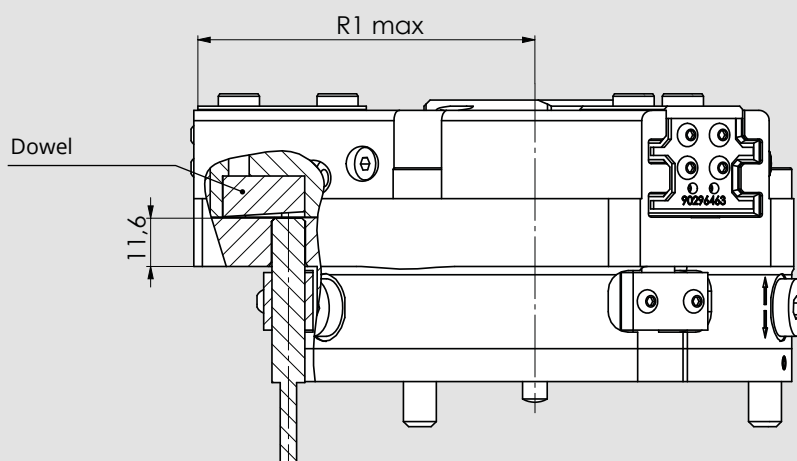
### OPEN ON/OFF



MOUNTED ON JAWS nr.2 and 3

SMW-AUTOBLOK Type	SENSOR Id.N. (*)
CYLINDRICAL SENSOR M8x1 L=30	0E012802

(\*) Id.n. refers to n.1 sensor. For more details ask the data sheet.



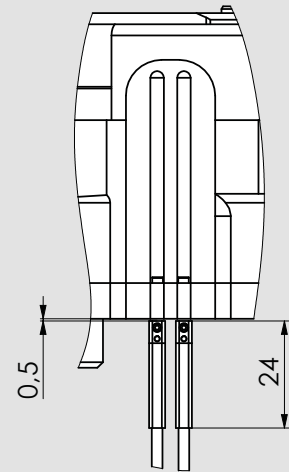
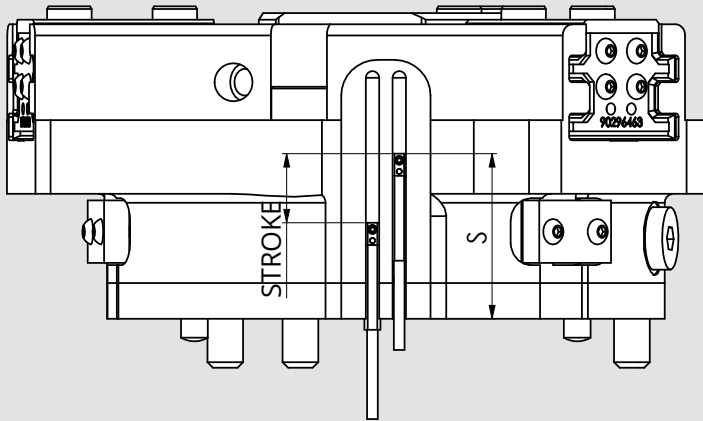
MOUNTED ON JAW nr.1

SMW-AUTOBLOK Type	SENSOR Id.N. (*)	DOWEL Id.N.
CYLINDRICAL SENSOR M8x1 L=40	0E012810	92262163

(\*) For more details ask the data sheet.

# SENSORS for 3PXS 3PXM 3PXL GRIPPERS

## MAGNETIC ON/OFF SENSOR



SMW-AUTOBLOK Type

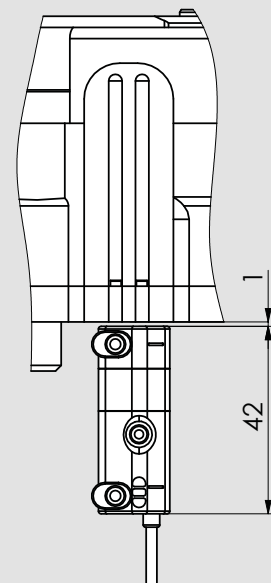
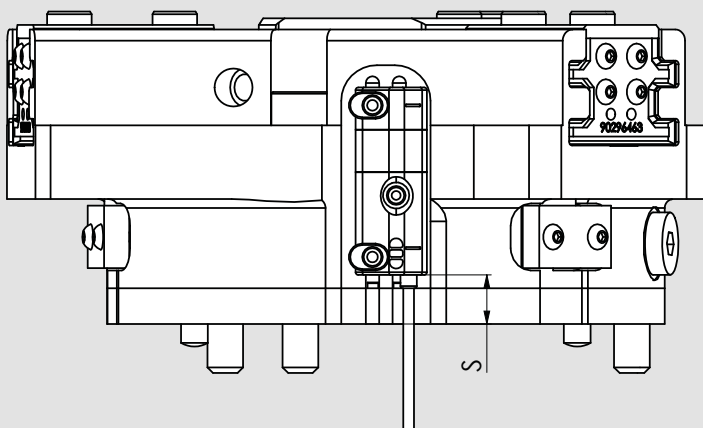
MAGNETIC SENSOR Balluff\*\*

SENSOR Id.N. (\*)

BMF00P0

(\*) Id.n. refers to n.1 sensor. For more details ask the data sheet.  
 (\*\*) or similars

## MAGNETIC LINEAR SENSOR



SMW-AUTOBLOK Type

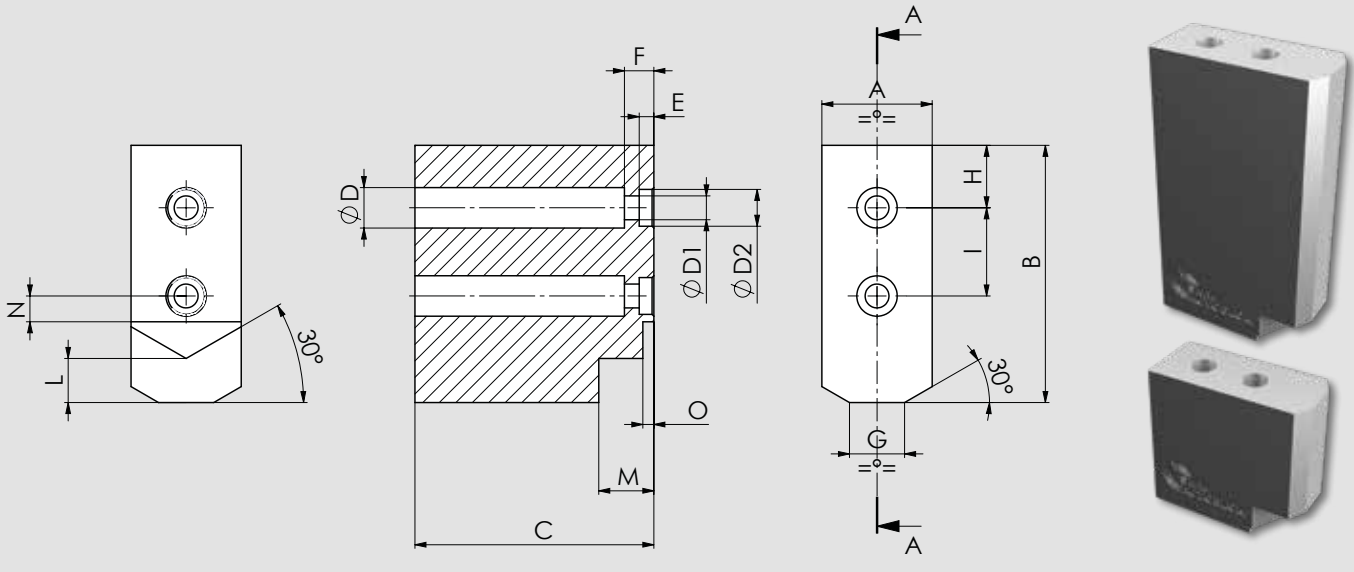
ANALOGIC MAGNETIC SENSOR Balluff\*\*

SENSOR Id.N. (\*)

BMP0008

(\*) For more details ask the data sheet.  
 (\*\*) or similars

# ALUMINIUM FINGERS for grippers



GRIPPER SIZE	ID. NO.	MAT.	A	B	C	Ø D	Ø D1	Ø D2	E	F	G	H	I	L	M	N	O	CLAMPING RANGE		WEIGHT (kg)	
																		NORMAL STROKE	LONG STROKE		
PL 64 2PXS 64	92720663	AL	20	40	35	8	4,5	6	3,5	6	1	11	13	8	11	4	3		0 - 2,5	0 - 8,5	0,057
	64				0,108																
3MN 64 3PXS 64	92720663				35																0,057
	92730663				64																0,108
PL 80 2PXS 80	92720863	AL	25	45	45	9	5,5	8	3,5	7	6	10	16	8	11	5	3		0 - 7	0 - 15	0,108
	80				0,2																
3MN 80 3PXS 80	92720863				45																0,108
	92730863				80																0,2
PL 100 2PXS 100	92721063	AL	25	55	55	11	6,5	10	4	8	10	12	20	8	11	6	3		1 - 11	1 - 21,5	0,16
	100				0,3																
3MN 100 3PXS 100	92721063				55																0,16
	92731063				100																0,3
2PXM 125	92721263	AL	30	70	65	11	6,5	10	4	8	15	17	24	12	15	7	3		3 - 15,5	3 - 29,5	0,31
	125				0,61																
3MN 125 3PXM 125	92721263				65																0,31
	92731263				125																0,61
2PXM 160	92721663	AL	30	80	80	17	11	14	5	11	15	11	32	10	14	9	4		3 - 19	3 - 36,5	0,4
	160				0,81																
3MN 160 3PXM 160	92721663				80																0,4
	92731663				160																0,81
2PXM 200	92722063	AL	40	100	100	20	13	16	5	13	20	20	40	15	18	9,5	4		0 - 25	0 - 46	0,87
	200				1,76																
3MN 200 3PXM 200	92722063				100																0,87
	92732063				200																1,76
2PXL 250	92722563	AL	40	120	120	20	13	16	5	13	20	26	44	15	18	10	4		0 - 28	0 - 53,5	1,3
	220				2,4																
3MN 250 3PXL 250	92722563				120																1,3
	92732563				220																2,4

Drawings and data are subject to change by SMW-Autoblok.