Overview

Find what's important fast

Quick change-over systems

Quick change-over

High speed clamping device change-over

centroteX and mandoteX — ideal for today's highpaced manufacturing environment!

It is feasible to equip the HAINBUCH quick change-over systems on all your machines, giving you the advantage of changing clamping devices in a matter of minutes, thus earning money quicker. This is because these set-up devices allow you to manufacture with job orientation. And, thanks to our unique CENTREX technology, you will achieve a repeatability of ≤ 0.003 mm on the interface.

However, our high speed solutions have even more to offer: As you will experience shorter machine downtimes along with reduced processing and throughput times, your quick change-over systems will pay off in no time. Better yet, you will not have to compromise on quality, rigidity or precision.

Select the spindle connection and the clamping device that is right for you from our extensive assortment. We can even accommodate you if you are already using clamping devices made by other manufacturers. We will simply adapt them to our interface. How people are manufacturing today!

Get the competitive advantages of quick change-over.

Key advantages

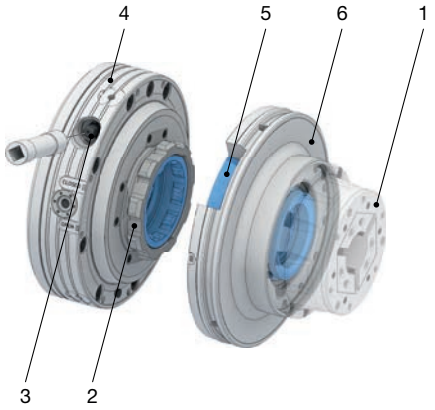
- Clamping device quick change-over system
- Enormous reduction in clamping device change-over times
- Repeatability between machine adapter and clamping device adapter ≤ 0.003 mm – without alignment
- Machine-overlapping utilization of clamping devices
- Power actuation or fluid actuation of the clamping devices are possible
- The Monteq mounting aid for easier handling and optimal change-over accuracy

centroteX S in use

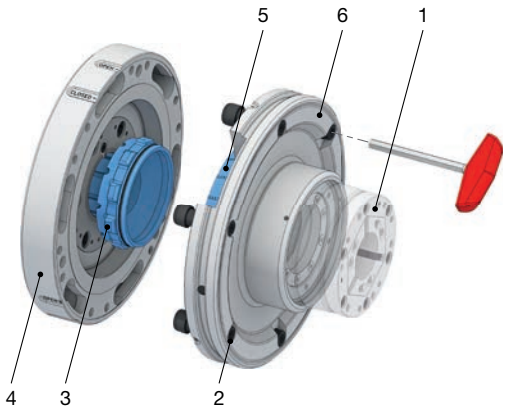
Quick change-over systems in overview

	centroteX S	centroteX M	mandoteX
			
Description	One of the smallest standardized quick change-over interface on the market – particularly for small spindles	Standardized quick change-over interface with an extensive assortment of clamping devices	Standardized quick change-over interface especially for mandrels
Change-over time	Approx. 1 min.	Approx. 5 min.	Approx. 1 min.
Application	■ Lathes and grinding machines up to a through-hole capacity of 52 mm ■ Vertical lathes	■ Lathes up to a through-hole capacity of 110 mm	■ Lathes and grinding machines
Spindle nose	A2-5, A2-6, AP140, AP170	A2-6, A2-8, AP170, AP220	A2-5, A2-6, A2-8, AP140, AP170
Locking	Radial	Axial	Axial
Drawtube connection	Bayonet coupling	Bayonet coupling	Bayonet coupling
Max. clamping device Ø	224 mm	315 mm	139 mm
Max. RPM	Determined by clamping device	Determined by clamping device	Determined by mandrel
Actuation	Draw / pressure	Draw / pressure	Draw
Suitable for	■ TOPlus mini chuck ■ TOPlus premium chuck ■ SPANNTOP mini chuck ■ 3-jaw chuck B-Top ■ 4-jaw chuck InoFlex VT-S ■ Mandrel MANDO T211 ■ Mandrel MANDO T212 ■ Mandrel MANDO T812 ■ Mandrel MAXXOS T211 ■ Third-party clamping devices [weight ≤ 28 kg, stroke ≤ 26 mm, actuating force ≤ 48 kN]	■ TOPlus mini chuck ■ TOPlus chuck ■ SPANNTOP mini chuck ■ SPANNTOP nova chuck ■ 3-jaw chuck B-Top ■ 4-jaw chuck InoFlex VT-S ■ Mandrel MANDO T211 ■ Mandrel MANDO T212 ■ Mandrel MANDO T812 ■ Mandrel MAXXOS T211 ■ Third-party clamping devices [weight ≤ 100 kg, stroke ≤ 28 mm, actuating force ≤ 65 kN]	■ Mandrel MANDO T211 ■ Mandrel MANDO T212 ■ Mandrel MANDO T812 ■ Mandrel MAXXOS T211
Advantages	■ In stock ■ Large selection of standard clamping devices ■ Extra fast change-over	■ In stock ■ Large selection of standard clamping devices ■ Extra rigid design	■ In stock ■ Large selection of standard clamping devices ■ Extra affordable
	Page 372	Page 382	Page 392

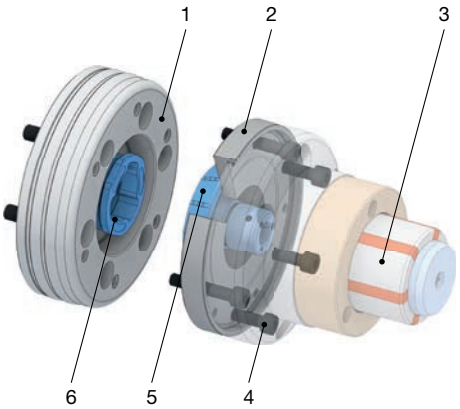
centroteX S in detail

Designation	
1 Clamping device 2 Bayonet coupling 3 One radial quick-acting screw 4 Machine adapter 5 CENTREX system for µm-precise use without adjustment 6 Clamping device adapter	

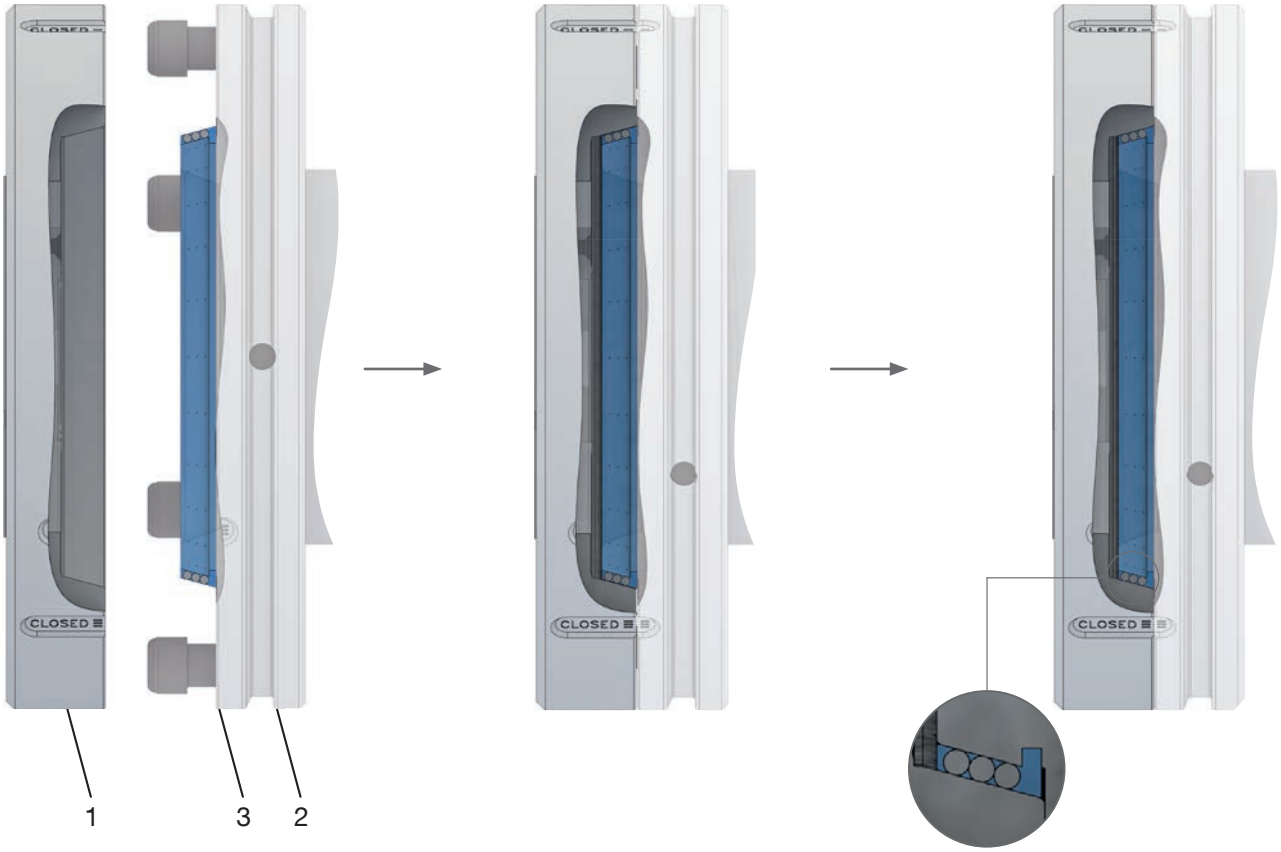
centroteX M in detail

Designation	
1 Clamping device 2 Six axial quick-acting screws 3 Bayonet coupling 4 Machine adapter 5 CENTREX system for µm-precise use without adjustment 6 Clamping device adapter	

mandoteX in detail

Designation	
1 Machine adapter 2 Clamping device adapter 3 Mandrel [not included in the standard scope of delivery] 4 Three axial locking screws 5 CENTREX system for µm-precise use without adjustment 6 Bayonet coupling	

CENTREX – the technology that guarantees maximum precision in our quick-change interfaces

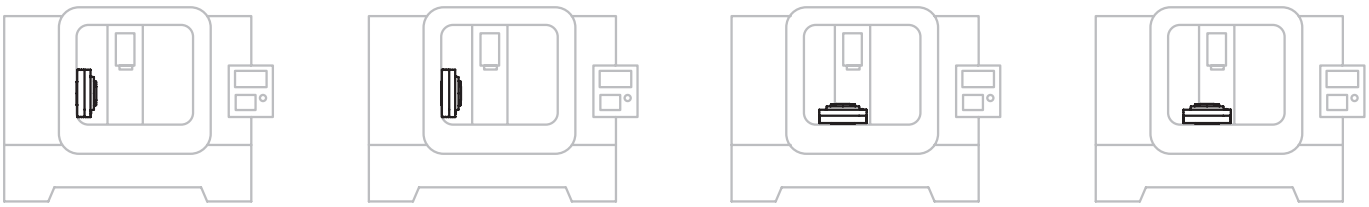


Machine adapter [1] with inner taper and clamping device adapter [2] with precision steel balls embedded in the rubber [3].

Place the clamping device adapter on the machine adapter. The precision steel balls contact the inner taper.

When the clamping device adapter is locked the taper with the precision steel balls is pulled into the inner taper. The overdetermined position of the precision steel balls causes the clamping device adapter to move into the exact same position each time.

One interface for all requirements – versatile use of clamping devices on different machines

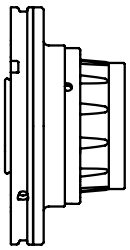


Lathe 1
with centroteX
machine adapter

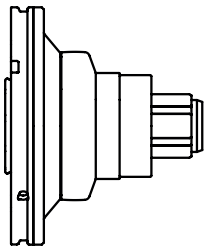
Lathe 2
with centroteX
machine adapter

Milling machine
with centroteX
machine adapter

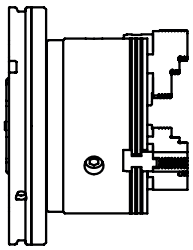
Machining center
with centroteX
machine adapter



Clamping device adapter
with chuck



Clamping device adapter
with mandrel

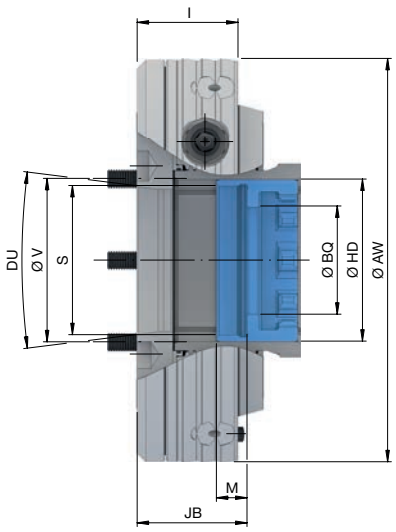


Clamping device adapter
with jaw chuck

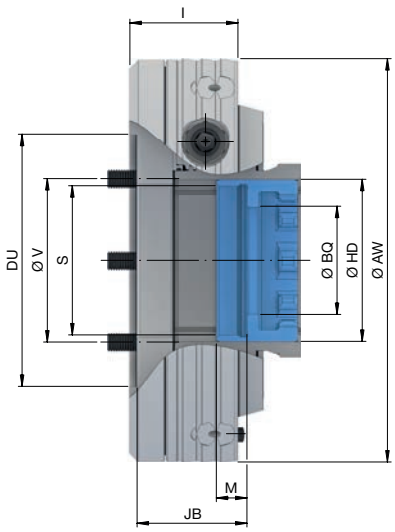
- Always use the optimal clamping device for production.
- Always manufacture the required workpiece.
- You only have to purchase the specific clamping device once.

centroteX S. Machine adapter with short taper / cylinder fit

Short taper A2



Cylinder fit AP



Spindle nose	DU	**A2-5**	**A2-6**	**AP140**	**AP170**
Outer Ø [mm]	AW	**224**			
Ø Capacity [mm]	BQ	52			
Repeatability ≤ [mm]		0,003			
Outer Ø 2 [mm]	HD	90			
Connecting thread inside	S	M85 x 2			
Depth of thread [mm]	M	17			
Thread position in the front end-stop [mm]	JB	61,5			63
Bolt hole circle	V	LK Ø 104,8 [6 x M10]	LK Ø 133,4 [6 x M12]	LK Ø 104,8 [6 x M10]	LK Ø 133,4 [6 x M12]
Total length [mm]	l	56		60	
Weight [kg]		15,8	15,3	16,5	15,8
In stock		✔	✔	✔	✔
Material no.		10015365	10015370	10015373	10015374

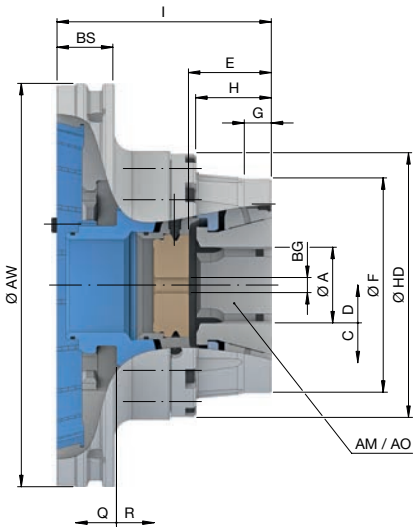
A2-5 / A2-6: Machine spindle standard DIN 702-1.

Scope of delivery

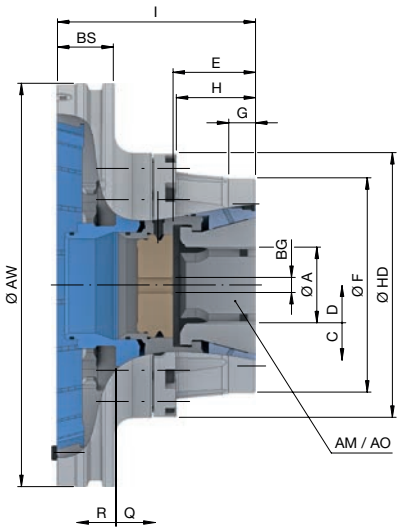
- Machine adapter
- Bayonet coupling
- Fit-on wrench socket for actuation tool

centroteX S. Clamping device adapter + TOPlus mini

Pull-back



Deadlength



Variant		Pull-back				Deadlength			
Size		**26**	**40**	**52**	**65**	**26**	**40**	**52**	**65**
Max. radial clamping force [kN]		35	103	108	120	35	103	108	120
Max. axial drawtube force [pull / push] [kN]		16	33	40	45	16	33	40	45
RPM n max. [1/min.]		6000							
Clamping range [mm]	A	3 – 26	3 – 40	3 – 52	3 – 65	3 – 26	3 – 40	3 – 52	3 – 65
Release stroke in Ø [mm]	C	1	0,6			1	0,6		
Reserve stroke in Ø [mm]	D	0,6	0,8		1	0,6	0,8	1	
Range / recommended workpiece tolerance [mm]		± 0,3	± 0,5			± 0,3	± 0,5		
End-stop depth [mm]	E	33,8	48,1	46	54	33,8	47,7	45,8	54
End-stop thread size [M]	BG	8	10		12	8	10		12
Location front end-stop	F	Ø 67 f7	Ø 91 f7	Ø 119 f7	Ø 129 f7	Ø 74 f7	Ø 99 f7	Ø 119 f7	Ø 137 f7
Centering length [mm]	G	15	20	15		20		15	20
Length [mm]	H	31	47	42	49	31	47	44	50
Length 2 [mm]	BS	32							
Total length [mm]	I	100,5	115	119	125	107	117,5	110	124
Reserve stroke axial [mm]	Q	1	2			1	2		
Release stroke axial [mm]	R	2		2,5		2		2,5	
Clamping head serrated	AM	TOP 26	TOP 40	TOP 52	TOP 65	TOP 26	TOP 40	TOP 52	TOP 65
Clamping head smooth	AO	TOP 26 G	TOP 40 G	TOP 52 G	TOP 65 G	TOP 26 G	TOP 40 G	TOP 52 G	TOP 65 G
Outer Ø [mm]	AW	224							
Outer Ø 2 [mm]	HD	113	131	147	160	113	132	147	166
Weight [kg]		10	11	13	14	10	12	13	15
In stock		✔	✔	✔	✔	✔	✔	✔	✔
Material no.		10015296	10015297	10015298	10015301	10015303	10015305	10015306	10015308

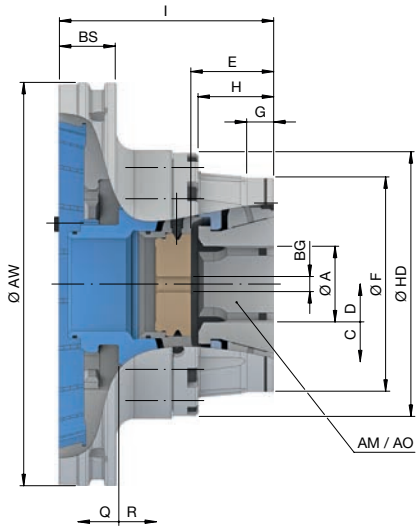

Clamping heads
Page 422

Accessory overview
Page 478

Scope of delivery

- Clamping device adapter
- Chuck
- Base end-stop

centroteX S. Clamping device adapter + TOPlus premium



Variant		Pull-back			
Size		**26**	**40**	**52**	**65**
Max. radial clamping force [kN]		35	103	108	120
Max. axial drawtube force [pull / push] [kN]		16	33	40	45
RPM n max. [1/min.]		6000			
Clamping range [mm]	A	3 – 26	3 – 40	3 – 52	3 – 65
Release stroke in Ø [mm]	C	1	0,6		
Reserve stroke in Ø [mm]	D	0,6	0,8		1
Range / recommended workpiece tolerance [mm]		± 0,3	± 0,5		
End-stop depth [mm]	E	33,8	48,1	46	54
End-stop thread size [M]	BG	8	10		12
Location front end-stop	F	Ø 67 f7	Ø 91 f7	Ø 119 f7	Ø 129 f7
Centering length [mm]	G	15	20	15	20
Length [mm]	H	31	47	42	49
Length 2 [mm]	BS	32			
Total length [mm]	I	100,5	115	119	125
Reserve stroke axial [mm]	Q	1	2		
Release stroke axial [mm]	R	2		2,5	
Clamping head serrated	AM	TOP 26	TOP 40	TOP 52	TOP 65
Clamping head smooth	AO	TOP 26 G TOP 26 G premium	TOP 40 G TOP 40 G premium	TOP 52 G TOP 52 G premium	TOP 65 G TOP 65 G premium
Outer Ø [mm]	AW	224			
Outer Ø 2 [mm]	HD	113	131	147	160
Weight [kg]		10	11	13	14
In stock		✔	✔	✔	✔
Material no.		10017796	10017797	10017798	10017799


Clamping heads
Page 422

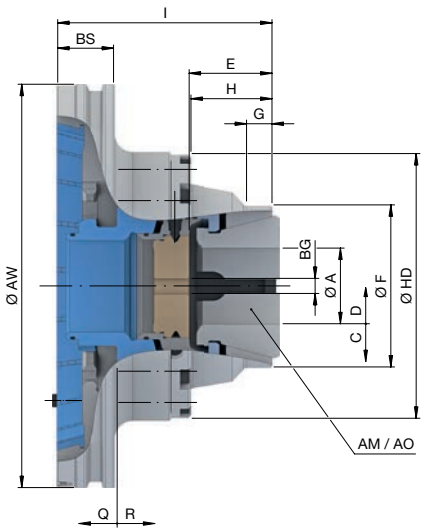

Accessory overview
Page 478

Scope of delivery

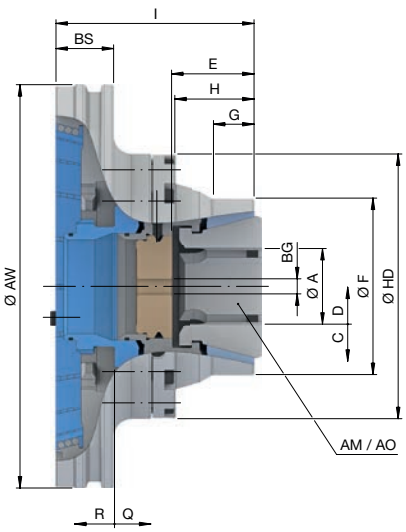
- Clamping device adapter
- Chuck
- Base end-stop

centroteX S. Clamping device adapter + SPANNTOP mini

Pull-back



Deadlength



Variant		Pull-back				Deadlength			
Size		**32**	**42**	**52**	**65**	**32**	**42**	**52**	**65**
Max. radial clamping force [kN]		70	80	94	105	70	80	94	105
Max. axial drawtube force [pull / push] [kN]		25	35	40	45	25	35	40	45
RPM n max. [1/min.]		6000							
Clamping range [mm]	A	3 – 32	3 – 42	3 – 52	3 – 65	3 – 32	3 – 42	3 – 52	3 – 65
Release stroke in Ø [mm]	C	0,6							
Reserve stroke in Ø [mm]	D	0,8	1			0,8	1		
Range / recommended workpiece tolerance [mm]		± 0,3	± 0,5			± 0,3	± 0,5		
End-stop depth [mm]	E	45	42	46	54	45	42	46	54
End-stop thread size [M]	BG	10			12	10			12
Location front end-stop	F	Ø 66 f7	Ø 90 f7		Ø 111 f7	Ø 74 f7	Ø 90 f7	Ø 98 f7	Ø 119 f7
Centering length [mm]	G	17	15		18	15	25	23	22
Length [mm]	H	43	42	45	47	43	44		50
Length 2 [mm]	BS	31							
Total length [mm]	I	115,5	114	119	125	120	118	110	124
Reserve stroke axial [mm]	Q	2,5	2			3	2		
Release stroke axial [mm]	R	3	2,5						
Clamping head serrated	AM	SK 32 BZI	SK 42 BZI	SK 52 BZI	SK 65 BZI	SK 32 BZI	SK 42 BZI	SK 52 BZI	SK 65 BZI
Clamping head smooth	AO	SK 32 BZIG	SK 42 BZIG	SK 52 BZIG	SK 65 BZIG	SK 32 BZIG	SK 42 BZIG	SK 52 BZIG	SK 65 BZIG
Outer Ø [mm]	AW	224							
Outer Ø 2 [mm]	HD	129	127	147	160	127	137	147	166
Weight [kg]			11		13	11	12	11	13
In stock		✔	✔	✔	✔	✔	✔	✔	✔
Material no.		10015286	10015287	10015289	10015290	10015291	10015293	10015294	10015295

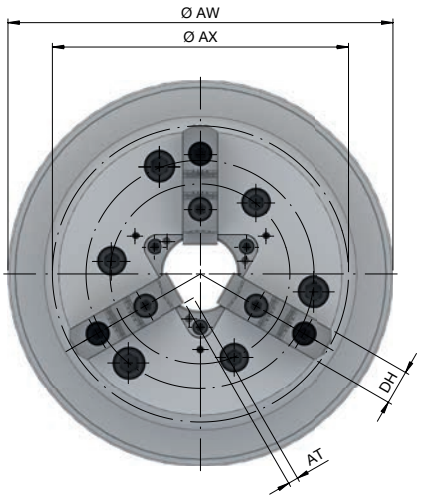
Clamping heads
Page 430

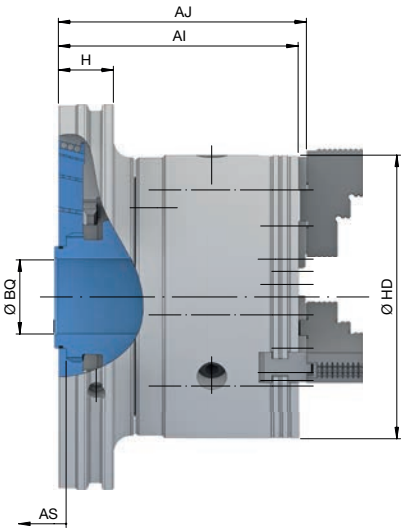

Accessory overview
Page 478

Scope of delivery

- Clamping device adapter
- Chuck
- Base end-stop

centroteX S. Clamping device adapter + jaw chuck B-Top





Size		165	215
Max. radial clamping force [kN]		**41**	**74**
Max. axial drawtube force [pull / push] [kN]		30	46
RPM n max. [1/min.]		6000	5400
Stroke per jaw [mm]	AT	5,9	7,4
Jaw width [mm]	DH	20	22
Piston stroke [mm]	AS	20	25
Swing Ø	AX	191	
Length [mm]	H	32	
Outer Ø [mm]	AW	224	
Outer Ø 2 [mm]	HD	165	215
Length without jaws [mm]	AI	139,5	143,1
Length with jaws [mm]	AJ	144,9	148,5
Ø Capacity [mm]	BQ	43	55
Weight [kg]		22	34
In stock		✔	✔
Material no.		10016705	10015364

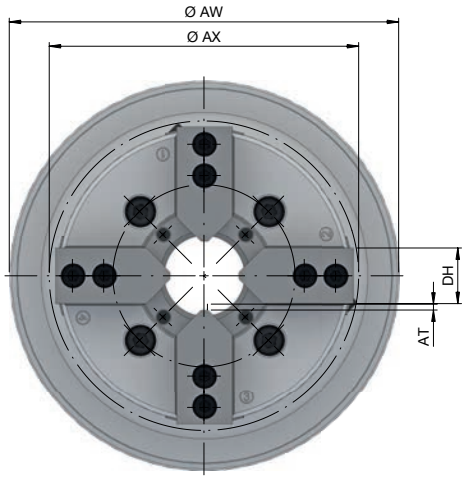
Jaws
Page 454

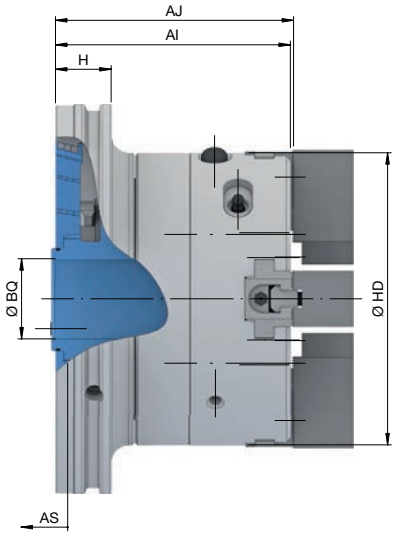
Accessory overview
Page 478

Scope of delivery

- Clamping device adapter
- Jaw chuck
- Master jaws
- Jaw release wrench

centroteX S. Clamping device adapter + InoFlex VT-S





Size		165	215
Variant		**VT-S**	
Max. radial clamping force [kN]		52	100
Max. axial drawtube force [pull / push] [kN]		20	40
RPM n max. [1/min.]		5000	3900
Stroke per jaw [mm]	AT	3,4	4,3
Jaw width [mm]	DH	32	34
Piston stroke [mm]	AS	15	19
Swing Ø	AX	178	222
Length [mm]	H	32	
Outer Ø [mm]	AW	224	
Outer Ø 2 [mm]	HD	168	218
Length without jaws [mm]	AI	135,1	161,7
Length with jaws [mm]	AJ	136,6	163,2
Ø Capacity [mm]	BQ	46	52
Compensating stroke for each jaw [mm]		2,3	3,3
Weight [kg]		21	33
In stock		✔	✔
Material no.		10016706	10016708

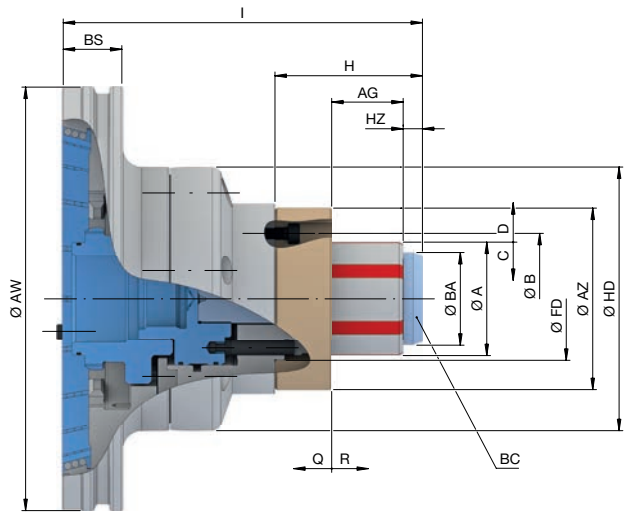

Jaws
Page 458


Accessory overview
Page 478

Scope of delivery

- Clamping device adapter
- Jaw chuck
- Top jaws, soft
- T-slot nuts
- Grease cartridge
- Assembly wrench for revolving threaded ring

centroteX S. Clamping device adapter + mandrel MANDO T211



Size		0	1	2	3	4	5
Clamping range [mm]	A	**20 – 28**	**26 – 38**	**36 – 54**	**50 – 80**	**69 – 120**	**100 – 130**
Max. radial clamping force [kN]		42		85	105	150	170
Max. axial drawtube force [pull / push] [kN]		10		20	25	35	40
Max. clamping length [mm]	AG	22	26	43	49	59	86
RPM n max. [1/min.]				6000			5000
Draw bolt Ø [mm]	BA	19	25	35	49	68	97
Draw bolt head height [mm]	HZ	7,5	11	10	11	16	
Reserve stroke in Ø [mm]	D	0,3			0,4		0,5
Release stroke in Ø [mm]	C	0,3			0,4		0,5
Reserve stroke axial [mm]	Q	1,5			2	2,5	3
Release stroke axial [mm]	R	2			2,5	3	
Reception workpiece end-stop	FD	Ø 32 f7	Ø 41 f7	Ø 50 f7	Ø 65 f7	Ø 78 f7	Ø 102 f7
Bolt hole circle end-stop	B	LK Ø 50 [3 x M6]	LK Ø 55 [3 x M6]	LK Ø 78 [3 x M6]	LK Ø 80 [3 x M6]	LK Ø 90 [3 x M6]	LK Ø 117 [3 x M6]
End-stop outer Ø [mm]	AZ	65	69	93	96	100	150
Length [mm]	H	40	51	71	78	98	120
Length 2 [mm]	BS			31			37,5
Total length [mm]	I	150	160	180	190	205	236
Outer Ø [mm]	AW			224			230
Outer Ø 2 [mm]	HD			139			230
Max. actuating torque [Nm]	BC	10	20	25	55		65
Weight [kg]		13	12	13	14	15	32
In stock		✔	✔	✔	✔	✔	✔
Material no.		10015309	10015310	10015319	10015320	10015321	10015322

For size 4, clamping range 101 - 120 mm, a max. speed of 4,200 RPM applies.

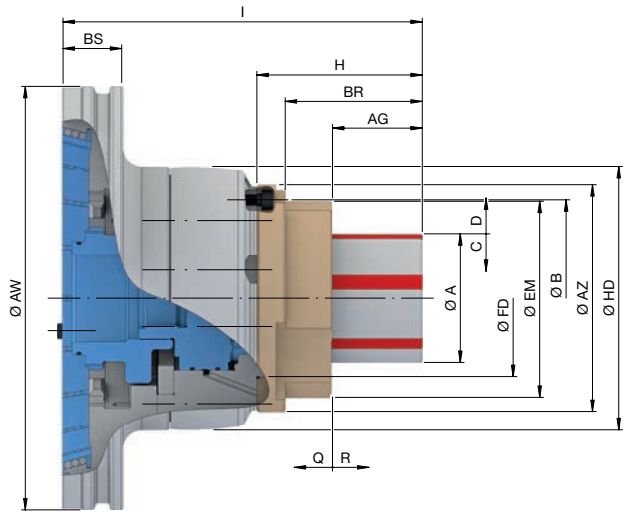

Segmented clamping bushings
Page 442


Accessory overview
Page 478

Scope of delivery

- Clamping device adapter
- Mandrel without air sensing adapter
- Draw bolt

centroteX S. Clamping device adapter + mandrel MANDO T212



Size		XXS	XS	S	0	1	2	3	4	5
Clamping range [mm]	A	8 – 13	13 – 19	16 – 21	20 – 28	26 – 38	36 – 54	50 – 80	69 – 100	100 – 130
Max. radial clamping force [kN]		42					85	105	150	170
Max. axial drawtube force [pull / push] [kN]		10					20	25	35	40
Max. clamping length [mm]	AG	12,9	14	15	21	25	40	44,5	52,5	53
Reserve stroke in Ø [mm]	D	0,2	0,3					0,4		0,5
Release stroke in Ø [mm]	C	0,2	0,3					0,4		0,5
RPM n max. [1/min.]		6000								5000
Reserve stroke axial [mm]	Q	1,5						2,5		3
Release stroke axial [mm]	R	1,5	2					3		
Reception workpiece end-stop	FD	Ø 34 f7	Ø 36 f7	Ø 39 f7	Ø 47 f7	Ø 55 f7	Ø 65 f7	Ø 83 f7	Ø 103 f7	Ø 140 f7
Bolt hole circle end-stop	B	LK Ø 53 [3 x M5]		LK Ø 57 [3 x M5]	LK Ø 70 [3 x M6]	LK Ø 75 [3 x M6]	LK Ø 90 [3 x M6]	LK Ø 104 [3 x M6]	LK Ø 124 [3 x M6]	LK Ø 167 [3 x M8]
End-stop outer Ø [mm]	AZ	65		70	90		104	120	138	195
End-stop outer Ø 2 [mm]	EM	41	42	45	54	62	76	105	124	160
Length [mm]	H	46	40	48	59	65	81	88	98	112
Length 2 [mm]	BS	31								32
Depth [mm]	BR	36,5		38	44	47	62	77,5		92
Total length [mm]	I	150,5	145	147	158	164	182	190	198,5	224
Outer Ø [mm]	AW	224								230
Outer Ø 2 [mm]	HD	139								230
Weight [kg]		13					14	15	16	34
In stock		✔	✔	✔	✔	✔	✔	✔	✔	✔
Material no.		10015332	10015334	10015336	10015337	10015353	10015359	10015360	10015362	10015363

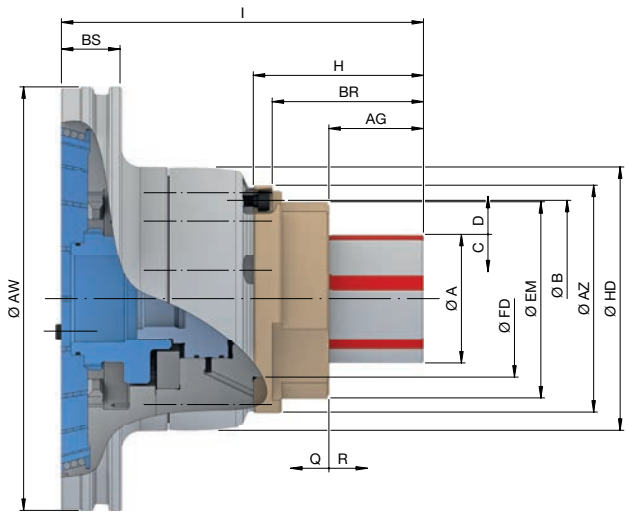
Segmented clamping bushings
Page 442

Accessory overview
Page 478

Scope of delivery

- Clamping device adapter
- Mandrel without air sensing adapter
- Coupling ring
- Support sleeve for SAD segmented clamping bushings
- Mounting aid depending on size

centroteX S. Clamping device adapter + mandrel MANDO T812



Size		XXS	XS	S	0	1	2	3	4
Clamping range [mm]	A	**8 – 13**	**13 – 19**	**16 – 21**	**20 – 28**	**26 – 38**	**36 – 54**	**50 – 80**	**69 – 100**
Max. radial clamping force [kN]		42					85	105	150
Max. axial drawtube force [pull / push] [kN]		10					20	25	35
Max. clamping length [mm]	AG	8,2	14	15	21	25	40	44,5	52,5
Reserve stroke in Ø [mm]	D	0,1	0,2					0,3	0,4
Release stroke in Ø [mm]	C	0,2	0,4					0,5	0,6
RPM n max. [1/min.]		6000							
Reserve stroke axial [mm]	Q	1						1,5	2
Release stroke axial [mm]	R	1,5	2					2,5	
Reception workpiece end-stop	FD	Ø 34 f7	Ø 36 f7	Ø 39 f7	Ø 47 f7	Ø 55 f7	Ø 65 f7	Ø 83 f7	Ø 103 f7
Bolt hole circle end-stop	B	LK Ø 53 [3 x M5]		LK Ø 57 [3 x M5]	LK Ø 70 [3 x M6]	LK Ø 75 [3 x M6]	LK Ø 90 [3 x M6]	LK Ø 104 [3 x M6]	LK Ø 124 [3 x M6]
End-stop outer Ø [mm]	AZ	65		70	90		104	120	138
End-stop outer Ø 2 [mm]	EM	41	42	45	54	62	76	105	124
Length [mm]	H	44	47,5	49,5	60,5	66,5	82,5	89,5	
Length 2 [mm]	BS	31							
Depth [mm]	BR	35,0	39,5	41,5	51,5	57,5	73,5	80,0	90,5
Total length [mm]	I	136,3	149	152	164	167,5	183,5	191,5	201,5
Outer Ø [mm]	AW	224							
Outer Ø 2 [mm]	HD	139							
Weight [kg]		13			14			16	17
In stock		✔	✔	✔	✔	✔	✔	✔	✔
Material no.		10016709	10016711	10016712	10016713	10016715	10016716	10016717	10016718

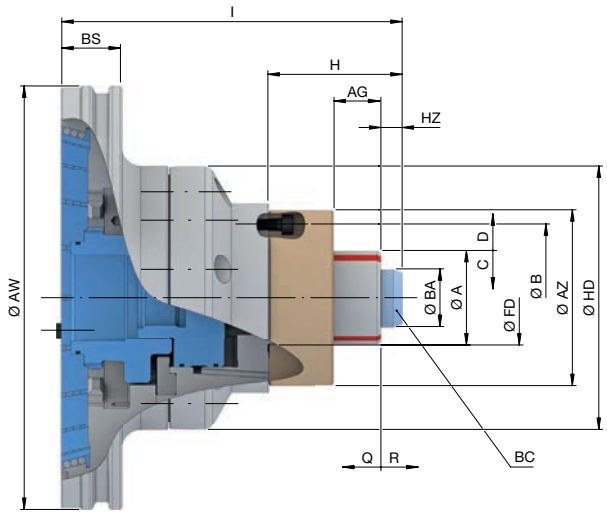

Segmented clamping bushings
Page 442


Accessory overview
Page 478

Scope of delivery

- Clamping device adapter
- Mandrel without air sensing adapter
- Coupling ring
- Support sleeve for SAD segmented clamping bushings
- Mounting aid depending on size

centroteX S. Clamping device adapter + mandrel MAXXOS T211



Size		A	B	C	D	E	F
Clamping range [mm]	A	**18 – 24**	**20 – 32**	**24 – 39**	**32 – 50**	**39 – 68**	**50 – 100**
Max. radial clamping force [kN]		27	36	51	70	86	143
Max. axial drawtube force [pull / push] [kN]		7,5	10	16	22	27	45
Max. clamping length [mm]	AG	20	22,5	24	35,3	45,3	
RPM n max. [1/min.]		6000					
Draw bolt Ø [mm]	BA	17	19	23	31	38	49
Draw bolt head height [mm]	HZ	7,5		11	11,2		11,7
Reserve stroke in Ø [mm]	D	0,3		0,4			
Release stroke in Ø [mm]	C	0,2		0,3			
Reserve stroke axial [mm]	Q	2					
Release stroke axial [mm]	R	2			2,5		
Reception workpiece end-stop	FD	Ø 32 f7		Ø 41 f7	Ø 50 f7	Ø 65 f7	
Bolt hole circle end-stop	B	LK Ø 50 [3 x M6]		LK Ø 55 [3 x M6]	LK Ø 78 [3 x M6]	LK Ø 80 [3 x M6]	
End-stop outer Ø [mm]	AZ	65		69	93	96	
Length [mm]	H	40	40,5	53,5	71	78	80
Length 2 [mm]	BS	31					
Total length [mm]	I	150	150,5	160	180	190	
Outer Ø [mm]	AW	224					
Outer Ø 2 [mm]	HD	140					
Max. actuating torque [Nm]	BC	7	10	15	20	25	55
Weight [kg]		12		13		14	
In stock		✔	✔	✔	✔	✔	✔
Material no.		10015325	10015326	10015327	10015328	10015329	10015330

Segmented clamping bushings
Page 448

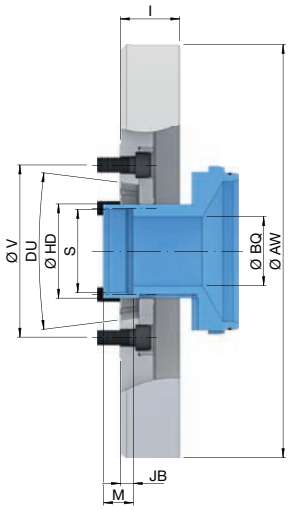
Accessory overview
Page 478

Scope of delivery

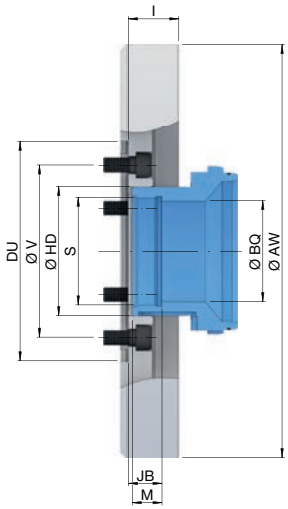
- Clamping device adapter
- Mandrel without air sensing adapter
- Draw bolt

centroteX M. Machine adapter with short taper / cylinder fit

Short taper A2



Cylinder fit AP



Spindle nose	DU	A2-6			A2-8			AP170	AP220
Outer Ø [mm]	AW	320							
Ø Capacity [mm]	BQ	53	58	68	75	84	94	78	105,5
Repeatability ≤ [mm]		0,005							
Outer Ø 2 [mm]	HD	73 g7	76 g7	85 g7	91 g7	101 g7	110 g7	100 g7	129 g7
Connecting thread inside	S	M66 x 1,5	M70 x 1,5	M79 x 1,5	M85 x 1,5	M95 x 1,5	M105 x 1,5	M85 x 1,5	M116 x 2
Depth of thread [mm]	M	23							32
Thread position in the front end-stop [mm]	JB	10			19			26	31
Bolt hole circle	V	LK Ø 133,4 [6 x M12]			LK Ø 171,4 [6 x M16]			LK Ø 133,4 [6 x M12]	LK Ø 171,4 [6 x M16]
Total length [mm]	l	46			53			39	44
Weight [kg]		22	21	22	25	24		21	22
In stock		✔	✔	✔	✔	✔	✔	✔	✔
Material no.		10000656	10000655	10000654	10000660	10000659	10000658	10000662	10000664

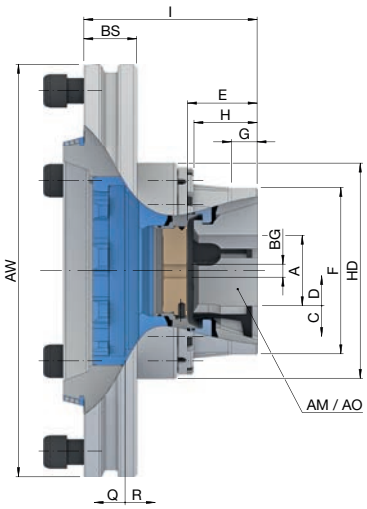
A2-6 / A2-8: Machine spindle standard DIN ISO 702-1.

Scope of delivery

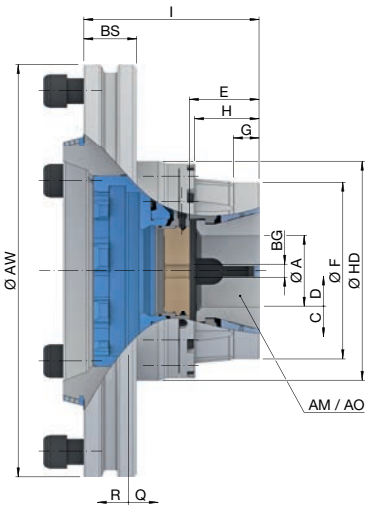
- Machine adapter
- Bayonet coupling

centroteX M. Clamping device adapter + TOPlus mini

Pull-back



Deadlength



Variant		Pull-back		Deadlength	
Size		**65**	**100**	**65**	**100**
Max. radial clamping force [kN]		120	172	120	172
Max. axial drawtube force [pull / push] [kN]		45	65	45	65
RPM n max. [1/min.]		6000	5000	6000	5000
Clamping range [mm]	A	3 – 65	15 – 100	3 – 65	15 – 100
Release stroke in Ø [mm]	C	0,6	2	0,6	2
Reserve stroke in Ø [mm]	D	1	1,5	1	1,5
Range / recommended workpiece tolerance [mm]		± 0,5	± 1,0	± 0,5	± 1,0
End-stop depth [mm]	E	54	72	54	74
End-stop thread size [M]	BG	12			
Location front end-stop	F	Ø 129 f7	Ø 183 f7	Ø 137 f7	Ø 191 f7
Centering length [mm]	G	20		22	
Length [mm]	H	49	64	50	64
Length 2 [mm]	BS	41			
Total length [mm]	I	134,5	159	136	166
Reserve stroke axial [mm]	Q	2	3	2	3
Release stroke axial [mm]	R	2,5	5	2,5	5
Clamping head serrated	AM	TOP 65	TOP 100	TOP 65	TOP 100
Clamping head smooth	AO	TOP 65 G	TOP 100 G	TOP 65 G	TOP 100 G
Outer Ø [mm]	AW	320			
Outer Ø 2 [mm]	HD	167	216	170	220
Weight [kg]		29	41	29	43
In stock		✔	✔	✔	✔
Material no.		10016184	10016185	10000678	10000679


Clamping heads
Page 422

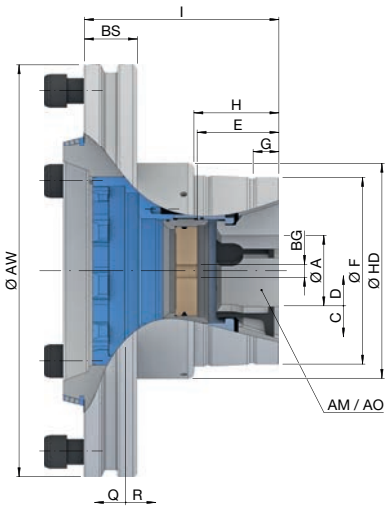
Accessory overview
Page 478

Scope of delivery

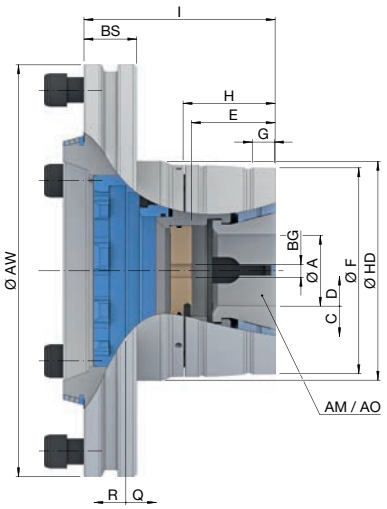
- Clamping device adapter
- Chuck
- Base end-stop

centroteX M. Clamping device adapter + TOPlus

Combi pull-back



Combi deadlength



Variant		Combi pull-back		Combi deadlength	
Size		**65**	**100**	**65**	**100**
Max. radial clamping force [kN]		120	172	120	172
Max. axial drawtube force [pull / push] [kN]		45	65	45	65
RPM n max. [1/min.]		6000	5000	6000	5000
Clamping range [mm]	A	3 – 65	15 – 100	3 – 65	15 – 100
Release stroke in Ø [mm]	C	0,6	2	0,6	2
Reserve stroke in Ø [mm]	D	1	1,5	1	1,5
Range / recommended workpiece tolerance [mm]		± 0,5	± 1,0	± 0,5	± 1
End-stop depth [mm]	E	63,5	73	65	85,5
End-stop thread size [M]	BG	12			
Location front end-stop	F	Ø 145 f7	Ø 215 f7	Ø 160 f7	Ø 215 f7
Centering length [mm]	G	20	23	17	23
Length [mm]	H	66	78,5	71,5	94
Length 2 [mm]	BS	41			
Total length [mm]	I	154	161,5	148,5	173
Reserve stroke axial [mm]	Q	2	3	2	3
Release stroke axial [mm]	R	2,5	5	2,5	5
Clamping head serrated	AM	TOP 65	TOP 100	TOP 65	TOP 100
Clamping head smooth	AO	TOP 65 G	TOP 100 G	TOP 65 G	TOP 100 G
Outer Ø [mm]	AW	320			
Outer Ø 2 [mm]	HD	167	233	170	219
Weight [kg]		31	45	33	48
In stock		✔	✔	✔	✔
Material no.		10000672	10000673	10000674	10000675


Clamping heads
Page 422

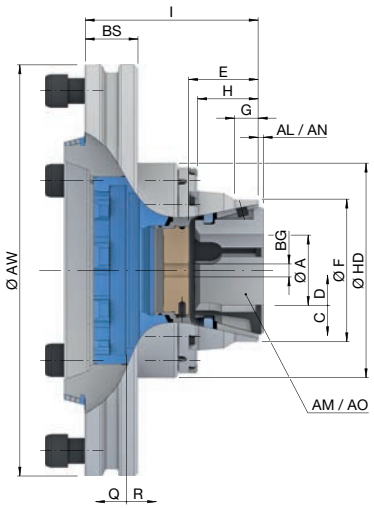

Accessory overview
Page 478

Scope of delivery

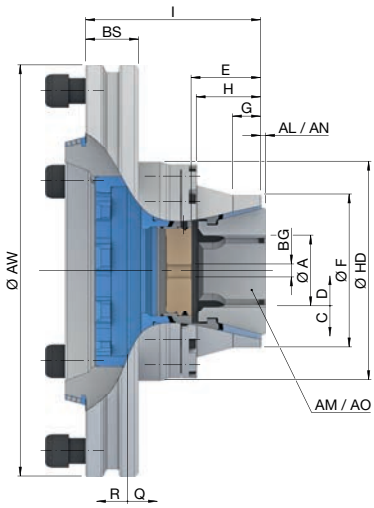
- Clamping device adapter
- Chuck
- Base end

centroteX M. Clamping device adapter + SPANNTOP mini

Pull-back



Deadlength



Variant		Pull-back		Deadlength	
Size		**65**	**100**	**65**	**100**
Max. radial clamping force [kN]		105	150	105	150
Max. axial drawtube force [pull / push] [kN]		45	65	45	64
RPM n max. [1/min.]		6000	5000	6000	5000
Clamping range [mm]	A	3 – 65	15 – 100	3 – 65	15 – 100
Release stroke in Ø [mm]	C	0,6	2	0,6	2
Reserve stroke in Ø [mm]	D	1	1,5	1	1,5
Range / recommended workpiece tolerance [mm]		± 0,5	± 1,0	± 0,5	± 1,0
End-stop depth [mm]	E	54	72	54	74
End-stop thread size [M]	BG	12			
Location front end-stop	F	Ø 111 f7	Ø 160 f7	Ø 119 f7	Ø 168 f7
Centering length [mm]	G	20		22	
Length [mm]	H	47	64	50	64
Length 2 [mm]	BS	41			
Total length [mm]	I	134,5	159	136	166
Reserve stroke axial [mm]	Q	2	3	2	3
Release stroke axial [mm]	R	2,5	5	2,5	5
Clamping head serrated	AM	SK 65 BZI	SK 100 BZ	SK 65 BZI	SK 100 BZ
Clamping head protrusion length serrated [mm]	AL	9		9	
Clamping head smooth	AO	SK 65 BZIG	SK 100 BZG	SK 65 BZIG	SK 100 BZG
Clamping head protrusion length smooth [mm]	AN	4		4	
Outer Ø [mm]	AW	320			
Outer Ø 2 [mm]	HD	167	216	170	220
Weight [kg]		28	39	28	40,5
In stock		✔	✔	✔	✔
Material no.		10016186	10016187	10016188	10016190

Clamping heads
Page 430

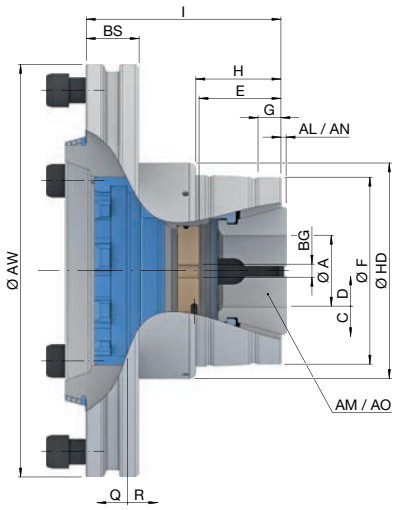
Accessory overview
Page 478

Scope of delivery

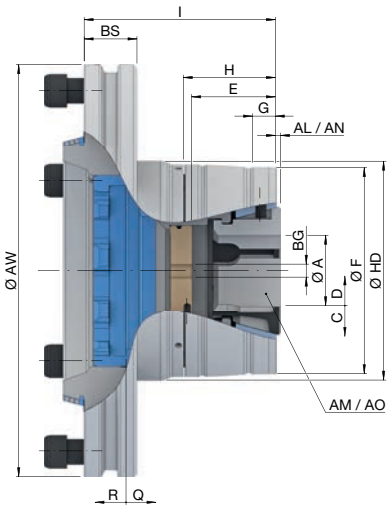
- Clamping device adapter
- Chuck
- Base end

centroteX M. Clamping device adapter + SPANNTOP nova

Combi pull-back



Combi deadlength



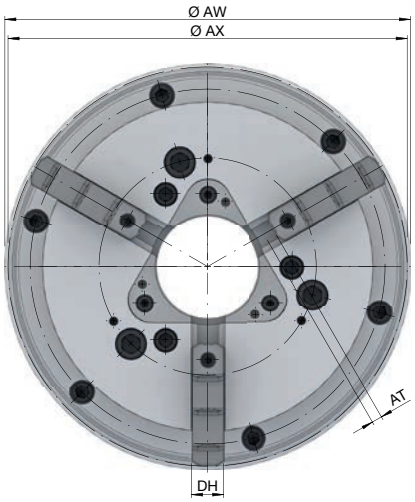
Variant		Combi pull-back		Combi deadlength	
Size		**65**	**100**	**65**	**100**
Max. radial clamping force [kN]		105	150	105	150
Max. axial drawtube force [pull / push] [kN]		45	65	45	65
RPM n max. [1/min.]		6000	5000	6000	5000
Clamping range [mm]	A	3 – 65	15 – 100	3 – 65	15 – 100
Release stroke in Ø [mm]	C	0,6	2	0,6	2
Reserve stroke in Ø [mm]	D	1	1,5	1	1,5
Range / recommended workpiece tolerance [mm]		± 0,5	± 1,0	± 0,5	± 1
End-stop depth [mm]	E	63,5	73	65	85,5
End-stop thread size [M]	BG	12			
Location front end-stop	F	Ø 145 f7	Ø 215 f7	Ø 160 f7	Ø 215 f7
Centering length [mm]	G	17	20	17	20
Length [mm]	H	66	78,5	71,5	94
Length 2 [mm]	BS	41			
Total length [mm]	I	151	157,5	148,5	173
Reserve stroke axial [mm]	Q	2	3	2	3
Release stroke axial [mm]	R	2,5	5	2,5	5
Clamping head serrated	AM	SK 65 BZI	SK 100 BZ	SK 65 BZI	SK 100 BZ
Clamping head protrusion length serrated [mm]	AL	9		9	
Clamping head smooth	AO	SK 65 BZIG	SK 100 BZG	SK 65 BZIG	SK 100 BZG
Clamping head protrusion length smooth [mm]	AN	4		4	
Outer Ø [mm]	AW	320			
Outer Ø 2 [mm]	HD	167	233	170	219
Weight [kg]		31	46	33	48
In stock		✔	✔	✔	✔
Material no.		10000668	10000669	10000670	10000671

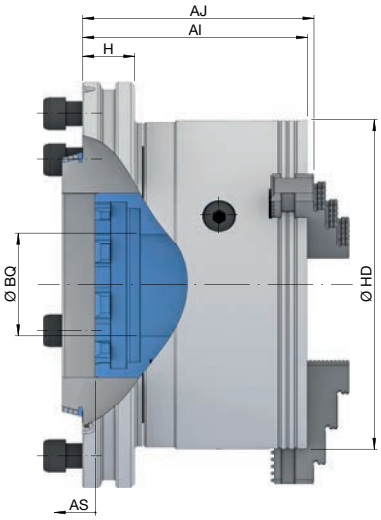

Clamping heads	Accessory overview
Page 430	Page 478

Scope of delivery

- Clamping device adapter
- Chuck
- Base end

centroteX M. Clamping device adapter + jaw chuck B-Top





Size		165	260	315
Max. radial clamping force [kN]		**41**	**115**	**160**
Max. axial drawtube force [pull / push] [kN]		30	65	90
RPM n max. [1/min.]		6000	4000	3600
Stroke per jaw [mm]	AT	5,9	8,2	8,6
Jaw width [mm]	DH	20	26	32
Piston stroke [mm]	AS	20	28	
Swing Ø	AX	191,4	315	375,4
Length [mm]	H	41		
Outer Ø [mm]	AW	320		
Outer Ø 2 [mm]	HD	165	260	315
Length without jaws [mm]	AI	159,3	177,3	201,6
Length with jaws [mm]	AJ	164,7	183,5	212,3
Ø Capacity [mm]	BQ	43	81	104
Weight [kg]		38	73	103
In stock		✔	✔	✔
Material no.		10000666	10000665	10000667

For size 315, please note: For machine spindles <A2-8 / AP220, we recommend that your machine builder check the max. spindle bearing load.

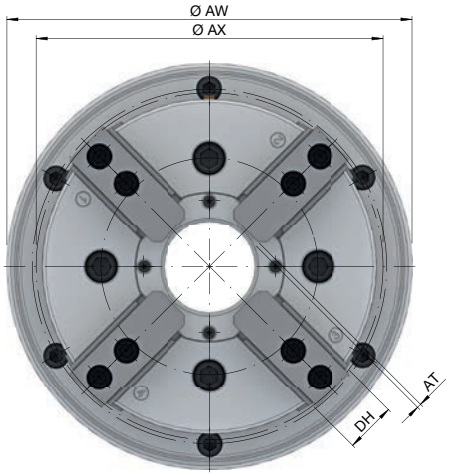
Jaws
Page 454

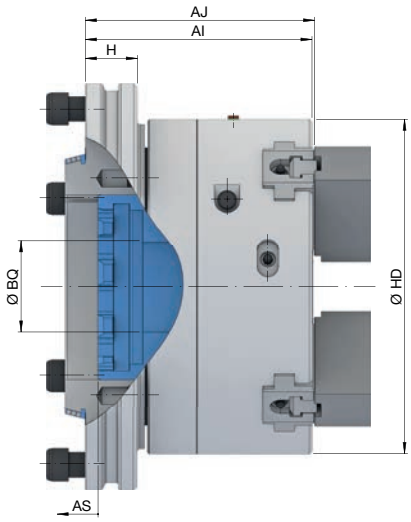
Accessory overview
Page 478

Scope of delivery

- Clamping device adapter
- Jaw chuck
- Master jaws
- Jaw release wrench

centroteX M. Clamping device adapter + InoFlex VT-S





Size		165	260	315
Variant			**VT-S**	
Max. radial clamping force [kN]		52	125	150
Max. axial drawtube force [pull / push] [kN]		20	50	60
RPM n max. [1/min.]		5000	3750	2800
Stroke per jaw [mm]	AT	3,4	5	5,5
Jaw width [mm]	DH	32	45	46
Piston stroke [mm]	AS	15	22	24
Swing Ø	AX	178	274	326
Length [mm]	H		41	
Outer Ø [mm]	AW		320	
Outer Ø 2 [mm]	HD	168	264	315
Length without jaws [mm]	AI	154,9	179	202
Length with jaws [mm]	AJ	156,4	181	204
Ø Capacity [mm]	BQ	46	72	91
Compensating stroke for each jaw [mm]		2,3	4	4,4
Weight [kg]		37	70	98
In stock		✔	✔	✔
Material no.		10015206	10015207	10015208

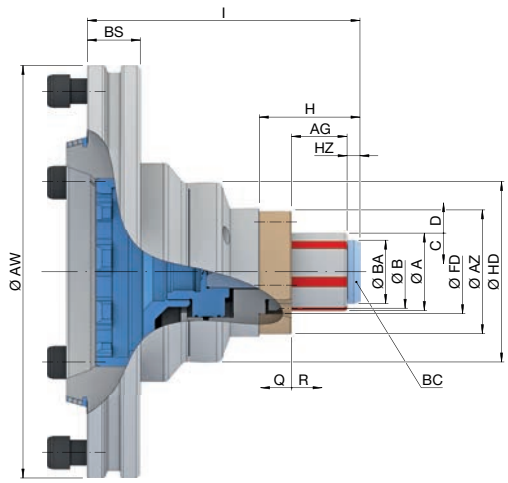

Jaws
Page 458


Accessory overview
Page 478

Scope of delivery

- Clamping device adapter
- Jaw chuck
- Top jaws, soft
- T-slot nuts
- Grease cartridge
- Assembly wrench for revolving threaded ring

centroteX M. Clamping device adapter + mandrel MANDO T211



Size		0	1	2	3	4
Clamping range [mm]	A	**20 – 28**	**26 – 38**	**36 – 54**	**50 – 80**	**69 – 120**
Max. radial clamping force [kN]		42		85	105	150
Max. axial drawtube force [pull / push] [kN]		10		20	25	35
Max. clamping length [mm]	AG	22	26	43	49	59
RPM n max. [1/min.]		7000			6000	
Draw bolt Ø [mm]	BA	19	25	35	49	68
Draw bolt head height [mm]	HZ	7,5	11			16
Reserve stroke in Ø [mm]	D	0,3			0,4	
Release stroke in Ø [mm]	C	0,3			0,4	
Reserve stroke axial [mm]	Q	1,5			2	2,5
Release stroke axial [mm]	R	2		2,5		3
Reception workpiece end-stop	FD	Ø 32 f7	Ø 41 f7	Ø 50 f7	Ø 65 f7	Ø 78 f7
Bolt hole circle end-stop	B	LK Ø 50 [3 x M6]	LK Ø 55 [3 x M6]	LK Ø 78 [3 x M6]	LK Ø 80 [3 x M6]	LK Ø 90 [3 x M6]
End-stop outer Ø [mm]	AZ	65	69	93	96	100
Length [mm]	H	40	51	71	78	95
Length 2 [mm]	BS	41				
Total length [mm]	I	171,5	181,5	201,5	211,5	226,5
Outer Ø [mm]	AW	320				
Outer Ø 2 [mm]	HD	139				
Max. actuating torque [Nm]	BC	10	20	25	55	
Weight [kg]		29			30	31
In stock		✔	✔	✔	✔	✔
Material no.		10000680	10000681	10000682	10000683	10000684

For size 4, clamping range 101 - 120 mm, a max. speed of 4,200 RPM applies.

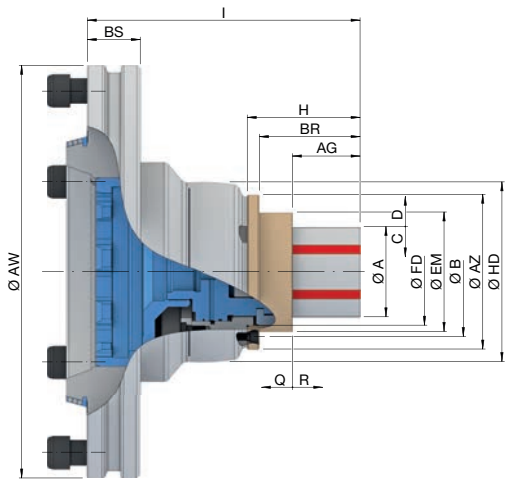

Segmented clamping bushings
Page 442


Accessory overview
Page 478

Scope of delivery

- Clamping device adapter
- Mandrel without air sensing adapter
- Draw bolt

centroteX M. Clamping device adapter + mandrel MANDO T212



Size		XXS	XS	S	0	1	2	3	4
Clamping range [mm]	A	**8 – 13**	**13 – 19**	**16 – 21**	**20 – 28**	**26 – 38**	**36 – 54**	**50 – 80**	**69 – 100**
Max. radial clamping force [kN]		42					85	105	150
Max. axial drawtube force [pull / push] [kN]		10					20	25	35
Max. clamping length [mm]	AG	8,2	15		21	25	40	44,5	52,5
Reserve stroke in Ø [mm]	D	0,2	0,3					0,4	
Release stroke in Ø [mm]	C	0,2	0,3					0,4	
RPM n max. [1/min.]		7000						6000	
Reserve stroke axial [mm]	Q	1,5						2	2,5
Release stroke axial [mm]	R	1,5	2				2,5		3
Reception workpiece end-stop	FD	Ø 34 f7	Ø 36 f7	Ø 39 f7	Ø 47 f7	Ø 55 f7	Ø 65 f7	Ø 83 f7	Ø 103 f7
Bolt hole circle end-stop	B	LK Ø 53 [3 x M5]		LK Ø 57 [3 x M5]	LK Ø 70 [3 x M6]	LK Ø 75 [3 x M6]	LK Ø 90 [3 x M6]	LK Ø 104 [3 x M6]	LK Ø 124 [3 x M6]
End-stop outer Ø [mm]	AZ	65		70	90		104	120	138
End-stop outer Ø 2 [mm]	EM	41	42	45	54	62	76	105	124
Length [mm]	H	45,5		47,5	58,5	64,5	80,5	87,5	97,5
Length 2 [mm]	BS	41							
Depth [mm]	BR	36,5		38	44	47	62	66,5	77,5
Total length [mm]	I	172	166,5	168,5	179,5	185,5	211,5		220
Outer Ø [mm]	AW	320							
Outer Ø 2 [mm]	HD	139							
Weight [kg]		29			30		31	32	33
In stock		✔	✔	✔	✔	✔	✔	✔	✔
Material no.		10000685	10000686	10000687	10000688	10000689	10000690	10000691	10000692

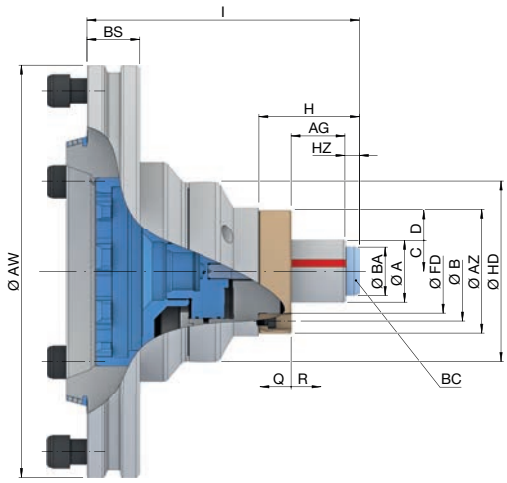

Segmented clamping bushings
Page 442

Accessory overview
Page 478

Scope of delivery

- Clamping device adapter
- Mandrel without air sensing adapter
- Coupling ring
- Support sleeve for SAD segmented clamping bushings
- Mounting aid depending on size

centroteX M. Clamping device adapter + mandrel MAXXOS T211



Size		A	B	C	D	E	F
Clamping range [mm]	A	**18 – 24**	**20 – 32**	**24 – 39**	**32 – 50**	**39 – 68**	**50 – 100**
Max. radial clamping force [kN]		27	42	51	70	86	143
Max. axial drawtube force [pull / push] [kN]		7,5	10	16	22	27	45
Max. clamping length [mm]	AG	20	22,5	24	35,3	45,3	
RPM n max. [1/min.]		7000					
Draw bolt Ø [mm]	BA	17	19	23	31	38	49
Draw bolt head height [mm]	HZ	7,5		11		11,2	11,7
Reserve stroke in Ø [mm]	D	0,3		0,4			
Release stroke in Ø [mm]	C	0,2		0,3			
Reserve stroke axial [mm]	Q	2					
Release stroke axial [mm]	R	2			2,5		
Reception workpiece end-stop	FD	Ø 32 f7		Ø 55 f7	Ø 50 f7	Ø 65 f7	
Bolt hole circle end-stop	B	LK Ø 50 [3 x M6]		LK Ø 41 [3 x M6]	LK Ø 78 [3 x M6]	LK Ø 80 [3 x M6]	
End-stop outer Ø [mm]	AZ	65		69	93	96	
Length [mm]	H	40		53,5	71	78	
Length 2 [mm]	BS	32,5		40	51,5	61,5	62
Total length [mm]	I	171,5	172	181,5	201,5	211,5	
Outer Ø [mm]	AW	320					
Outer Ø 2 [mm]	HD	139					
Max. actuating torque [Nm]	BC	7	10	15	20	25	55
Weight [kg]		28,5	29	28,5	29,2	30	
In stock		✔	✔	✔	✔	✔	✔
Material no.		10001381	10001382	10001383	10001384	10001385	10001386


Segmented clamping bushings
Page 448

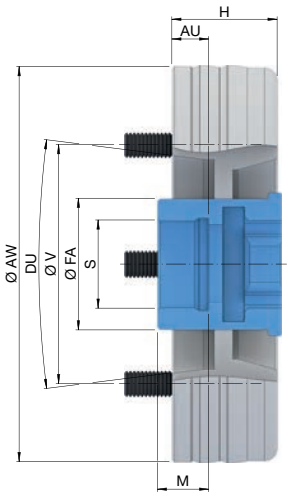

Accessory overview
Page 478

Scope of delivery

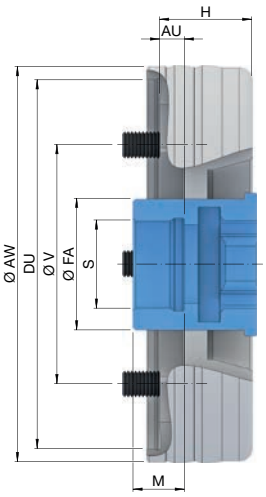
- Clamping device adapter
- Mandrel without air sensing adapter
- Draw bolt

mandoteX. Machine adapter with short taper / cylinder fit

Short taper A2



Cylinder fit AP



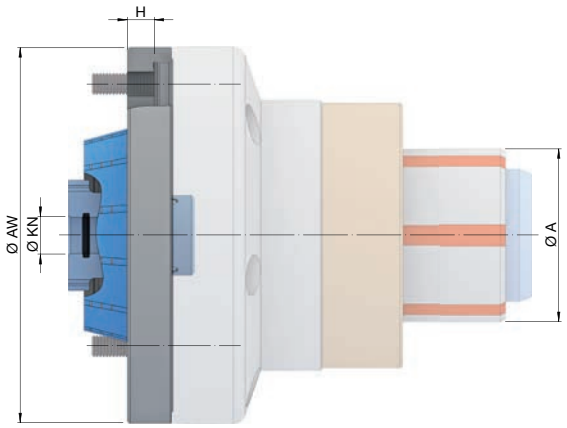
Spindle nose	DU	**A2-5**	**A2-6**	**A2-8**	**AP140**	**AP170**
Outer Ø [mm]	AW	**150**	**165**	**235**	**150**	**180**
Repeatability ≤ [mm]		0,003				
Outer Ø 2 [mm]	FA	50				
Connecting thread inside	S	M35 x 1,5				
Depth of thread [mm]	M	19,5				
Bolt hole circle	V	LK Ø 104,8 [6 x M10]	LK Ø 133,4 [6 x M12]	LK Ø 171,4 [6 x M16]	LK Ø 104,8 [6 x M10]	LK Ø 133,4 [6 x M12]
Length [mm]	H	40			35	
Position in clamped position [mm]	AU	14			9	
In stock		✔	✔	✔	✔	✔
Material no.		10000592	10000593	10000595	10000594	10000596

A2-5 / A2-6 / A2-8: Machine spindle standard DIN ISO 702-1.

Scope of delivery

- Machine adapter
- Bayonet coupling

mandoteX. Clamping device adapter

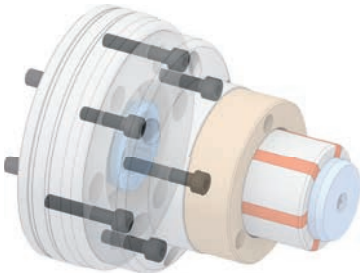


Size		**MANDO XXS – 4 / MAXXOS A – F**
Clamping range [mm]	A	**8 – 120**
Length [mm]	H	10
Air sensing control bore Ø [mm]	KN	14
Outer Ø [mm]	AW	139
In stock		✔
Material no.		10000590

Scope of delivery

- Clamping device adapter
- Bayonet coupling

Mounting screws mandoteX

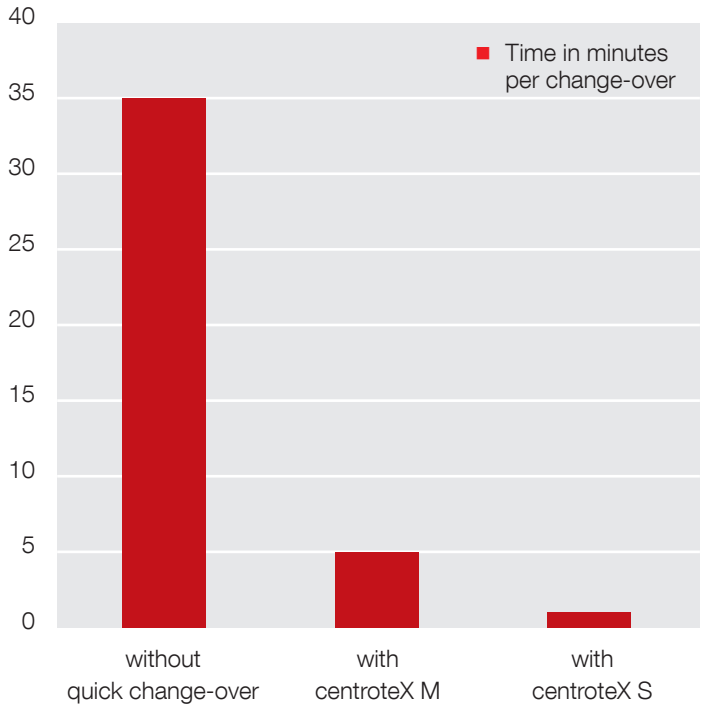


Product	Suitable for	Scope of delivery	In stock	Material no.
Mounting screws	MANDO T211 size 0 – 3 MAXXOS T211 size A – F	3 x M8x30-1, 3 x M8x45-1	✔	10001398
	MANDO T211 size 4 MANDO T212 size XXS – 2 MANDO T812 size XXS – 2	3 x M8x35-1, 3 x M8x50-1	✔	10001399
	MANDO T212 size 3 MANDO T812 size 3	3 x M8x45-1, 3 x M8x60-1	✔	10001400
	MANDO T212 size 4 MANDO T812 size 4	3 x M8x50-1, 3 x M8x65-1	✔	10001401

Savings possibilities

Initial conditions:

- 1 x clamping device change-over / day
- Conventional clamping device change-over incl. adjustment = 35 minutes
- Clamping device change-over with centroteX M = 5 minutes
- Clamping device change-over with centroteX S = 1 minute
- Hourly rate, including machine: 60.00 EUR



Clamping device change	Costs per month	Costs per year	**Savings per year***
without quick change-over interface	752.50 EUR [35 min. x 21.5 workdays]	9,030.00 EUR [752.50 EUR x 12 months]	–
with centroteX M quick change-over interface	107.50 EUR [5 min. x 21.5 workdays]	1,290.00 EUR [107.50 EUR x 12 months]	**7,740.00 EUR** + an additional 129 work hours [= 16 shifts]
with centroteX S quick change-over interface	21.50 EUR [1 min. x 21.5 workdays]	258.00 EUR [21.50 EUR x 12 months]	**8,772.00 EUR** + an additional 146 work hours [= 18 shifts]

*Based on one change-over per day. The more the change-overs the greater the savings!

Accessories:
Monteq mounting aid for centroteX

A practical support is now available for everyone who must set up heavy clamping devices: the Monteq chuck mounting aid for the centroteX quick change-over system. With the Monteq mounting aid, alignment and handling are easy. Thanks to the spring-loaded bearing arrangement the clamping device can even be lifted by hand, the swiveling holder makes it easy to lock the clamping device in the machine-side bayonet, and with an adjustable screw the clamping device can be adjusted onto the spindle.

Key advantages

- Easy and safe handling of heavy clamping devices
- Short changing times thanks to quick-acting screws
- The clamping device is not suspended diagonally

Monteq in detail

Designation	
1 Weight transference 2 Swivel mechanism for the bayonet 3 Quick-acting bolt for clamping device adapter 4 Spring package for fine height adjustment to the spindle	

Product	Description	In stock	Material no.
Monteq S changing fixture	For fast, easy, safe, and accurate centroteX S clamping device mounting	✔	10015378
Monteq M changing fixture	For fast, easy, safe, and accurate centroteX M clamping device mounting	✔	10000647

The storage container may vary from the image.

Accessories: Storage container

Quick change-over of the clamping device starts with optimal preparation. With our practical storage container you always have everything right at hand. Your clamping devices are safely stored and thus maintain their accuracy.

Key advantages

- All clamping devices are immediately on hand
- Safe storage maintains accuracy and prevents contamination
- The storage container is optimally configured for your clamping devices

CENTREX duo

Centering element for reliable processes

CENTREX duo

Positioning repeatability of the manufactured parts and high process reliability are the top priorities in production. With the CENTREX duo centering system you can easily set up your components. Tedious and time-consuming alignment in the machining of components is therefore a thing of the past. CENTREX duo can be used universally for a wide range of applications.

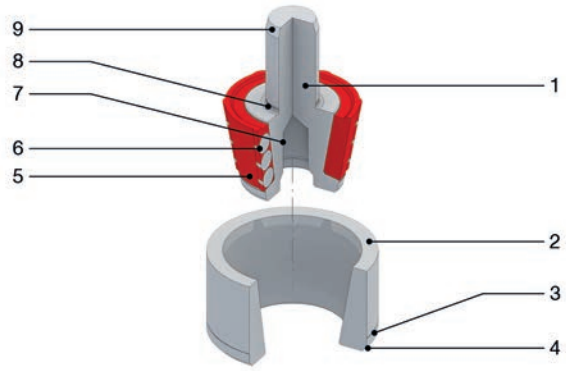
Key advantages

- Centering element for high-precision positioning of two components
- Extremely high repeatability [≤ 0.003 mm]
- Insensitive to swarf and chips
- Can be flexibly integrated into your own designs, even in the smallest installation space
- Installed in thousands of designs
- Simple handling

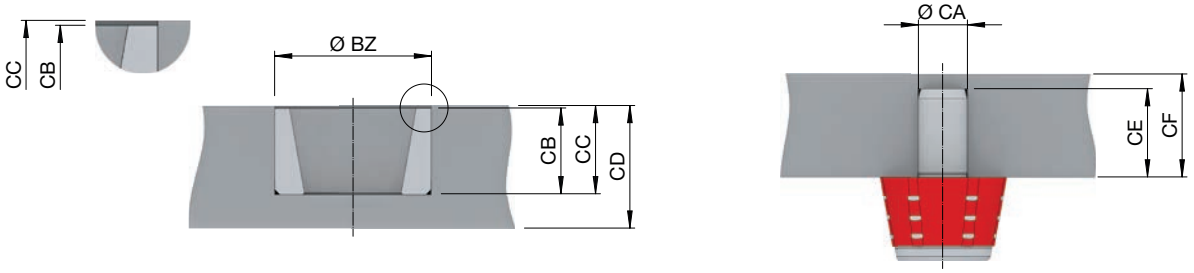
Your benefits

- Suitable for a very small installation space
- Can be flexibly integrated in your own designs
- Complex maintenance is not required
- Medium is not required
- Saves time when setting up

CENTREX duo in detail

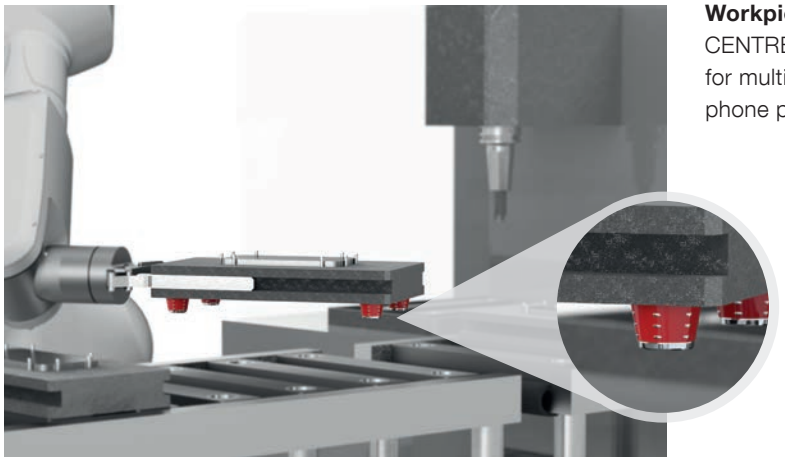
Designation	
1 Positioning taper 2 Positioning bushing 3 Setting diameter for easy mounting 4 Insertion bevel for easy mounting 5 Rubber for positioning the precision balls 6 Precision balls as centering element 7 Disassembling thread 8 Neck for plane-parallel installation of the positioning taper 9 Insertion bevel for easy mounting	

CENTREX duo centering element. Technical data and order overview



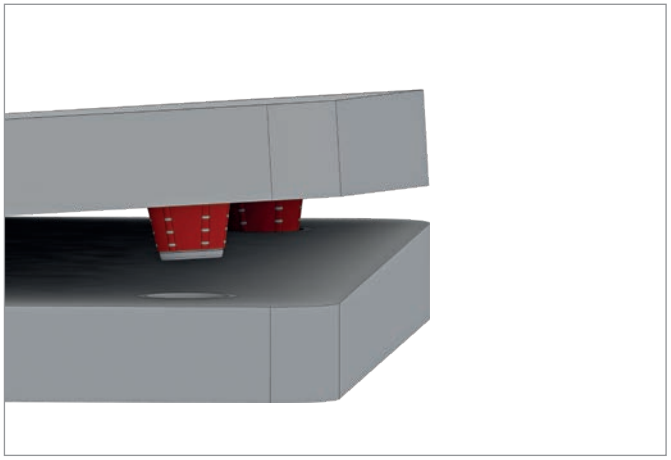
Description		Positioning bushing		Positioning taper	
Size		1	3	1	3
Repeatability ≤ [mm]		0,003			
Weight [kg]		0,01	0,05	0,01	0,04
Bore bushing Ø [mm]	BZ	Ø 16 H7	Ø 32 H7		
Bushing height [mm]	CB	8,5	17,5		
Bore depth	CC	9 [+0,0 | -0,1]	18 [+0,0 | -0,1]		
Min. plate thickness 1 [mm]	CD	12,5	25		
Bore bolt Ø [mm]	CA			Ø 6 H7	Ø 10 H7
Bolt length [mm]	CE			9	18
Min. plate thickness 2 [mm]	KS			12	21
In stock		✔	✔	✔	✔
Material no.		10001504	10001503	10001515	10001514

CENTREX duo application examples

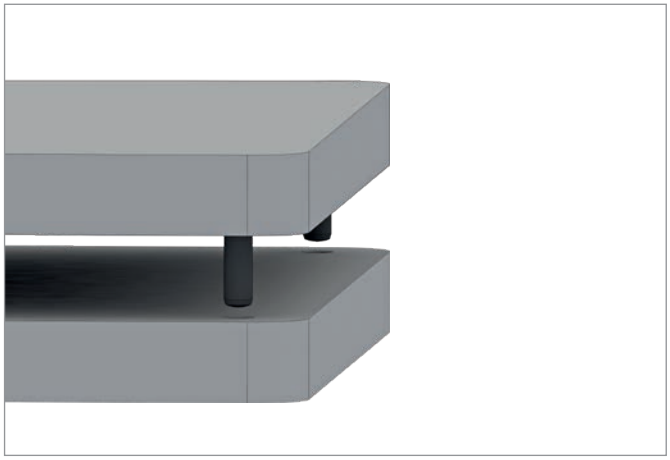


Workpiece carriers
CENTREX duo as a positioning element of workpiece carriers for multiple manu-facturing and assembly stations [e.g. smart-phone production].

User example: Pallet system



CENTREX duo
- Extremely easy handling
- No tilting when joining and no wear



Off-the-shelf centering pin
- Difficult handling, only parallel joining possible
- Tilted and worn out