

System 3R palletizing systems with Spreitzer clamping solutions



Workpiece clamping solutions to increase productivity

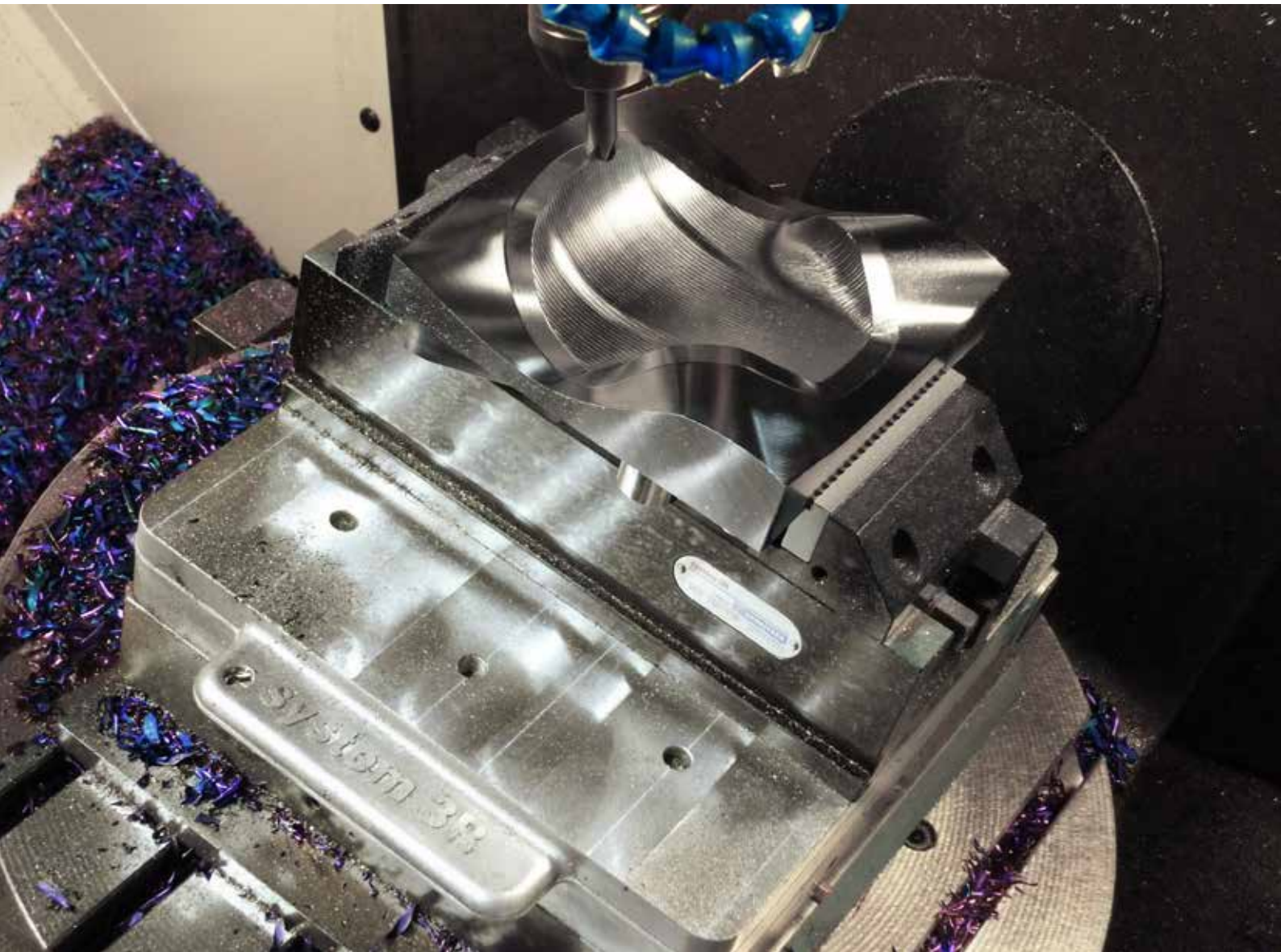
The advantages of a palletable workpiece clamping solution //

These are obvious: This is the only way to equip a pallet with a vise, a special device and a workpiece outside the machine and then quickly change it into the machine and replace it again. You save expensive set-up times and significantly reduce downtime.

However, the prerequisite for this is that all systems are matched to one another. And we offer you: The pallet clamping systems from System 3R and the clamping solutions from Spreitzer are optimally matched to each other and to your workpieces. And not only that: The compact design ensures optimum accessibility to the workpiece.

Use these optimized solutions for palletizing and automation in milling, sinking and measuring, increasing your productivity and reducing costs!

System 3R Dynafix pallet with Spreitzer centre-vise in a 5-axis milling center



Content

The System 3R benefits

- + Standard interface between machine and workpiece
- + Universally applicable in milling, turning, grinding, sinking and measuring
- + Reduced set-up times
- + High precision and quality
- + Indexing 4 x 90°

The advantages of the Spreitzer clamping solutions

- + High centering and repetition accuracy enable highest production quality
- + Less vibration - The stable design allows safe clamping and reduces vibrations on the workpiece
- + In the 5-axis machining, the compact mechanical or pneumatic centre-clamping vises allows exact machining of workpieces to the axis of symmetry or rotation.

The perfect solution

We offer the combination of both systems: Optimized solutions for palletizing and automation. In this catalog you will find a wide range of standardized solutions for different workpiece geometries.

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12 System 3R palletizing systems with Spreitzer clamping solutions

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Legende der Lieferbedingungen

- ✓ Delivery from stock, subject to prior sale
- Delivery within 4-8 working weeks after incoming order
- Special processing. Delivery only on request.

System 3R palletizing systems

Macro 54 x 54 mm

Hardened and precision-cast, with clearance holes for four fixing screws.

Clamping solutions ▢ **page 12**

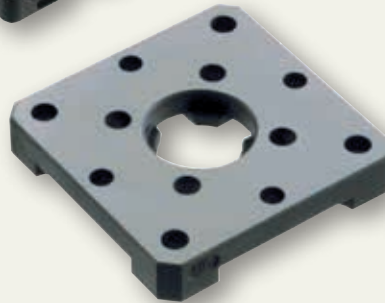


- + Adapted for automatic changing
- + Parallel-ground top and bottom faces
- + Fixed index positions 4x90°
- + Rust-resistant

Macro 70 x 70 mm

Hardened and precision-cast, with clearance holes for eight fixing screws.

Clamping solutions ▢ **page 14**



MacroMagnum

Unhardened Ø156 mm pallet with hardened reference elements and hole markings for eight clearance holes.

- + Adapted for automatic changing
- + Ready for code carrier
- + Weight 4.5 kg

Clamping solutions ▢ **page 16**



GPS 70/120 steel pallet

Workpiece and device holder for precision production. Prepared for automation with protection ring, code carrier fixture and gripper contour, without code carrier.

Clamping solutions GPS 70 ▢ **page 20**

Clamping solutions GPS 120 ▢ **page 26**

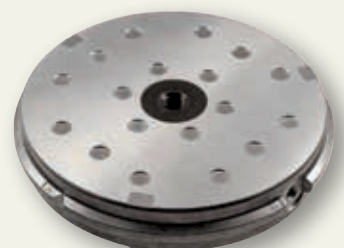


GPS 70/120 aluminium pallet

Work piece and electrode holder. Prepared for automation with gripper contour and M5 thread for code carrier.

Clamping solutions GPS 70 ▢ **page 23**

Clamping solutions GPS 120 ▢ **page 29**

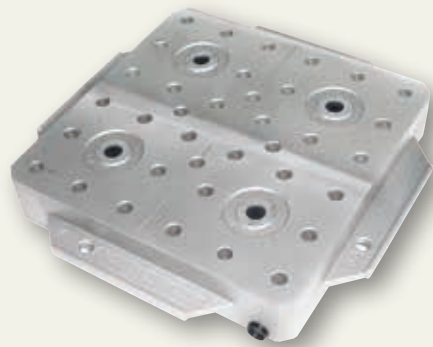


GPS 240

Cast aluminium pallet.
Suitable for high-speed milling and arduous milling operations. Prepared for automation.

- + Construction height: 48.0 ± 0.01 mm
- + X/Y-centring: with coined cam
- + Flatness: 0.02 mm

Clamping solutions ▢ **page 32**



Dynafix

Milled aluminium pallet 280x280 mm

- + Adapted for automatic changing
- + Ready for code carrier
- + Flatness 0.04 mm
- + Thickness tolerance $+0.5/-0$ mm

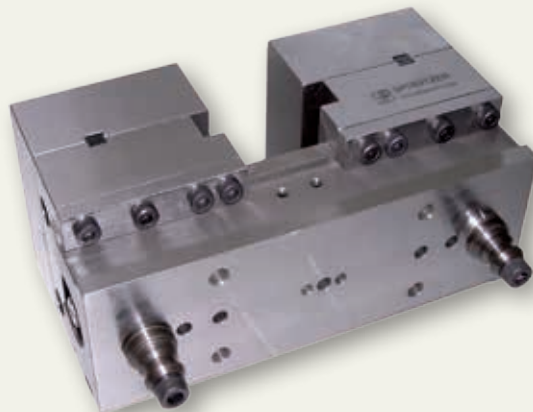
Clamping solutions ▢ **page 37**



Delphin drawbars

Positioning and clamping element for use on the System 3R zero-point clamping system Delphin.

Clamping solutions ▢ **page 42**



Spreitzer clamping solutions

Mechanical centre-clamping vises MZR

- + Attractively priced basic model
- + Powerful raw material clamping without prestamping
- + Reversible jaws for maximum clamping range
- + Repetition accuracy 0.01 mm
- + Pairing accuracy 0.03 mm



Mechanical centre-clamping vises MZE

- + Compact design
- + Wide clamping range
- + Interchangeable clamping jaws for various customer requirements
- + Centering accuracy ± 0.015 mm
- + Repetition accuracy 0.01 mm
- + Pairing accuracy 0.02 mm



Mechanical centre-clamping vises MZU

- + Large clamping range due to reversible top jaws
- + Maximum flexibility
- + Maximum accessibility
- + Centering accuracy ± 0.015 mm
- + Repetition accuracy 0.01 mm
- + Pairing accuracy 0.02 mm



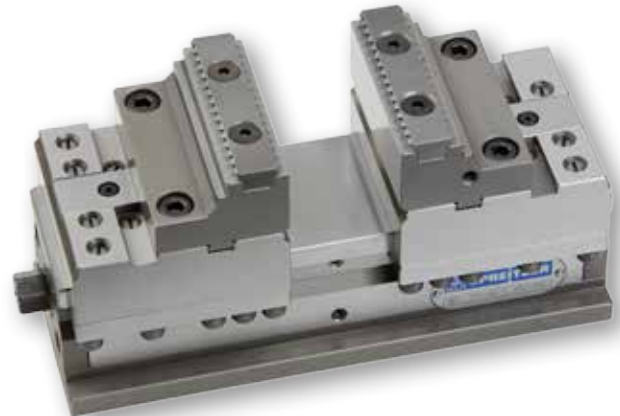
Mechanical centre-clamping vises MZQ

- + Changing jaws within seconds, without using tools!
- + Over 80 % less setup costs
- + Large clamping range due to reversible top jaws
- + Centering accuracy ± 0.015 mm
- + Repetition accuracy 0.01 mm
- + Pairing accuracy 0.02 mm



Mechanical centre-clamping vises MZC

- + First and second setup in the highest quality
- + Unmachined and pre-machined workpieces
- + High clamping and holding force
- + 100 % encapsulated design
- + Pairing accuracy 0.01 mm
- + Centering accuracy ± 0.015 mm (type E)
 ± 0.005 mm (type S)
- + Repetition accuracy 0.01 mm (type E)
0.003 mm (type S)



Mechanical centre-clamping vises MZS

- + High clamping accuracy
- + High centering and repetition accuracy
- + Large variety
- + Centering accuracy ± 0.005 mm
- + Repetition accuracy 0.003 mm
- + Pairing accuracy 0.01 mm



Mechanical compact vises MSU

- + Compact design, maximum accessibility
- + Wide clamping range by reversible top jaws
- + Highest flexibility
- + Pairing accuracy 0.02 mm



Precision vises N xx S

- + Compact design
- + Exchangeable clamping jaws
- + Clamping jaw with pull-down effect
- + Pairing accuracy 0.01 mm



Pneumatic centre-clamping vises PZS

- + Short clamping time
- + Usable for automation
- + High clamping accuracy
- + Centering accuracy ± 0.005 mm
- + Repetition accuracy 0.003 mm
- + Pairing accuracy 0.01 mm



Mechanical three-jaw chucks DBF

- + High precision
- + High clamping force
- + Clamping accuracy better than DIN 6386



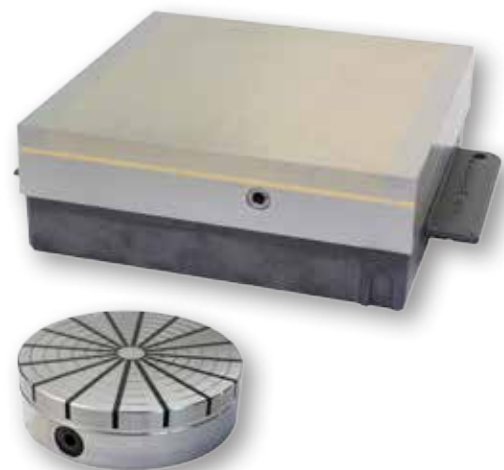
Pneumatic three-jaw chucks DBF-P

- + Short clamping time
- + Usable for automation
- + High clamping accuracy
- + Repetition accuracy $< 0.02 \text{ mm}$



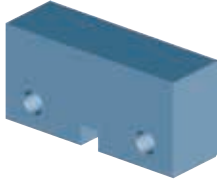
Magnetic chucks

- + High precision plate for grinding and EDM (type SPPF)
Holding force 120 N/cm^2
Pole pitch $1.4 + 0.5 \text{ mm}$
- + Extremely strong magnetic chuck for milling+ (type SPPM)
Holding force 180 N/cm^2
Pole pitch $11 + 4 \text{ mm}$

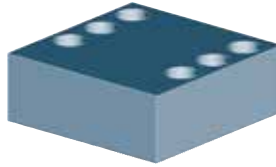


Clamping jaw types

Clamping jaws, soft

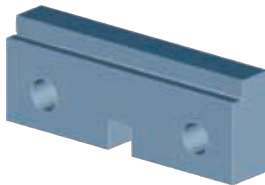


Soft block jaws

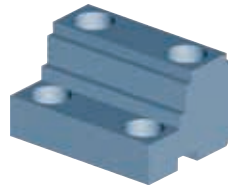


The soft clamping jaws can be machined and fitted on the workpiece.

Step jaws, ground

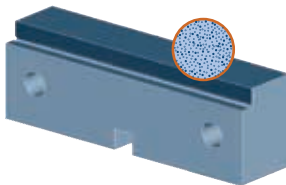


Reversible stepped jaws, ground

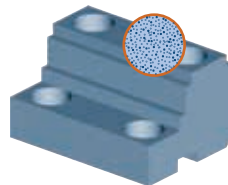


For clamping of finished parts or for use in the second setup.

Step jaws with carbide coating

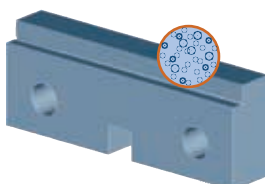


Reversible stepped jaws with carbide coating

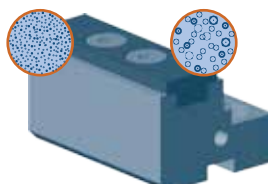


High holding force through increased friction factor. The workpiece surface will not be damaged.

Step jaws, rough with coating

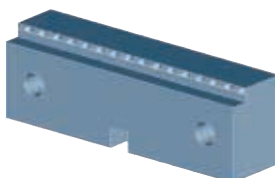


Reversible stepped jaws with clamping insert, rough with coating / carbide coating



For clamping of high-strength raw material. The hardened and coated surface of the clamping jaws deforms the workpiece surface during the clamping process.

Grip jaws

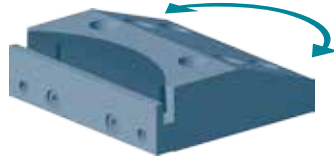
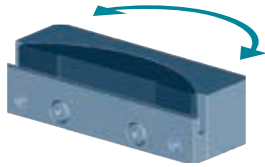


Stepped grip jaws



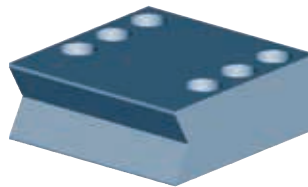
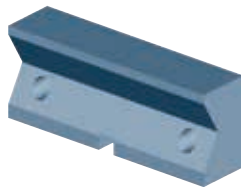
For clamping of raw material. The hardened and coated surface of the clamping jaws deforms the workpiece surface during the clamping process.

Pull-down pendulum jaws



With the pull-down pendulum jaws, angular misalignments of several millimetres can be rectified.

Prism jaws



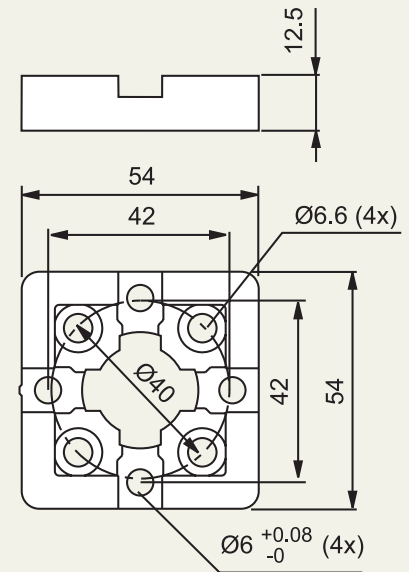
Hardened and ground prism jaws for clamping round workpieces.

Selection criteria

Workpiece material	Workpiece surface				
	rolled, casted, forged	drawn	sawn	milled	ground
Steel e.g.. 90MnCrV8, 21MnCr5, 40CrMnMoS8-6	rough, grip	carbide coating, ground	rough, grip	carbide coating, ground	carbide coating, ground
Heat-treated steel e.g. C45 induction hardened, 21MnCr5 case-hardened, 40CrMnMoS8-6 nitrided	–	–	–	carbide coating, ground	carbide coating, ground
Rough Castings e.g. gray cast iron, gunmetal	rough, grip	–	–	carbide coating, ground	carbide coating, ground
Titanium	HM	carbide coating, ground	rough, grip	carbide coating, ground	carbide coating, ground
Aluminium	rough, grip	–	rough, grip	carbide coating, ground	carbide coating, ground
NE metals	–	–	rough, grip	carbide coating, ground	carbide coating, ground

Macro 54x54 mm

Item number: 3R-651.7E-P

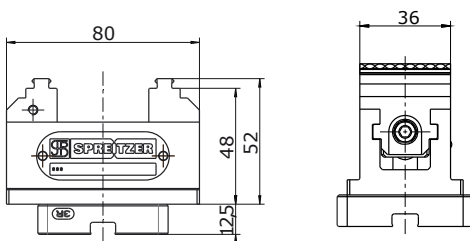


Hardened and precision-cast with clearance holes for four fixing screws.

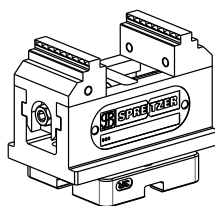
- + Adapted for automatic changing
- + Parallel-ground top and bottom faces
- + Fixed index positions 4x90°
- + Rust-resistant

MZR 80-36 & Macro 54 x 54 mm

Item number: B809500412

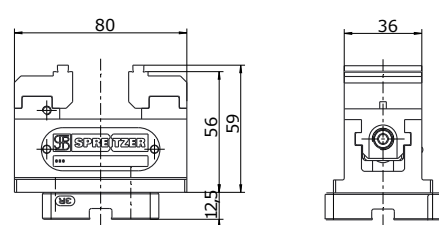


Clamping width	59 mm
Clamping force	16000 N

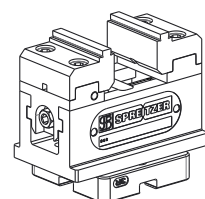


MZU 80-36 & Macro 54x 54 mm

Item number: B809500363

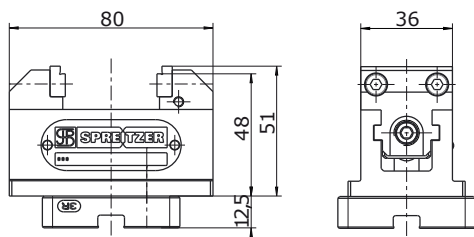


Clamping width	78 mm
Clamping force	16000 N

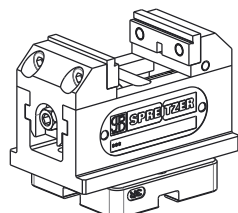


MZE 80-36 & Macro 54 x 54 mm

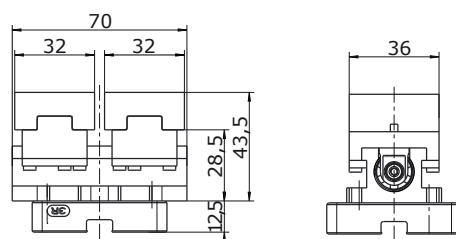
Item number: B809500002



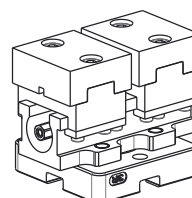
Clamping width	40 mm
Clamping force	16000 N

**MZS 70-36 A & Macro 54 x 54 mm**

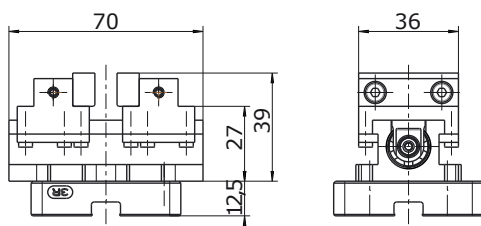
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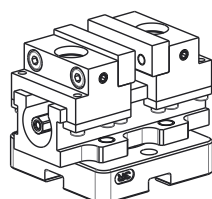
Clamping width	70 mm
Clamping force	10000 N

**MZS 70-36 B & Macro 54 x 54 mm**

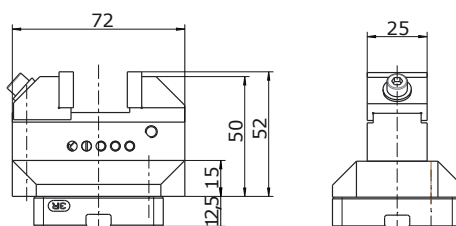
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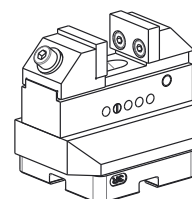
Clamping width	30 mm
Clamping force	10000 N

**N25S & Macro 54 x 54 mm**

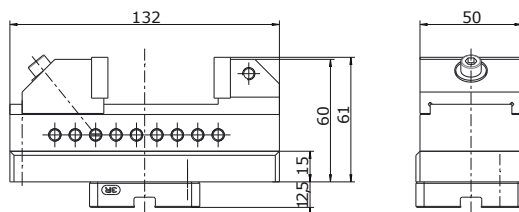
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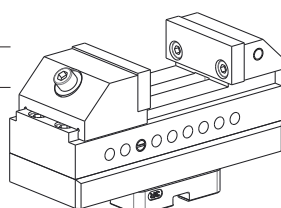
Clamping width	23 mm
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**N50S & Macro 54 x 54 mm**

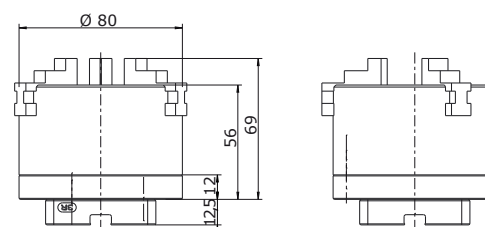
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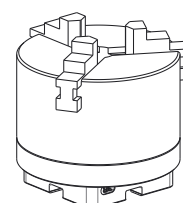
Clamping width	63 mm
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**DBF 80 & Macro 54 x 54 mm**

Item number: B809500065

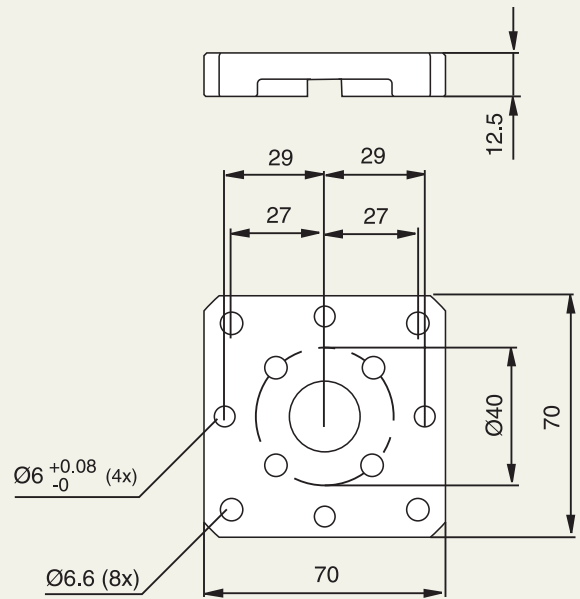


Clamping range	2-27 /
External clamping	25-71 mm
Clamping force	1000 N



Macro 70x70 mm

Item number: 3R-601.7E-P

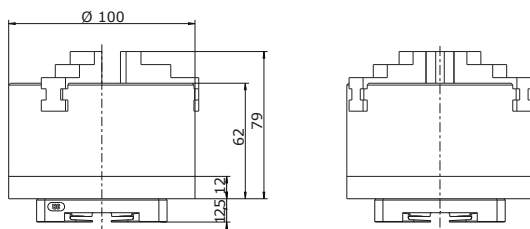


Hardened and precision-cast with clearance holes for four fixing screws.

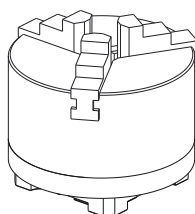
- + Adapted for automatic changing
- + Parallel-ground top and bottom faces
- + Fixed index positions 4x90°
- + Rust-resistant

DBF 100 & Macro 70 x 70 mm

Item number: B809500078

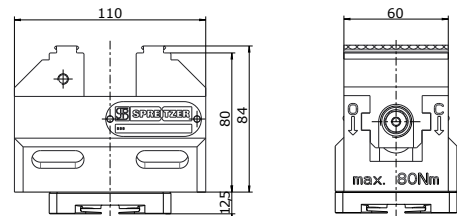


Clamping range	2-33/
External clamping	32-83 mm
Clamping force	17000 N

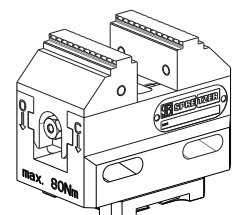


MZR 110-60 & Macro 70 x 70 mm

Item number: B809500435

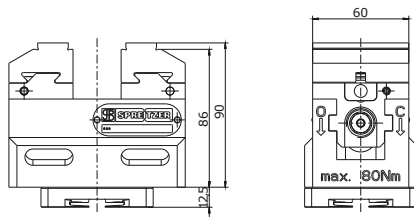


Clamping width	76 mm
Clamping force	30000 N

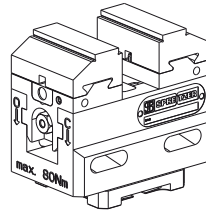


MZQ 110-60 & Macro 70x 70 mm

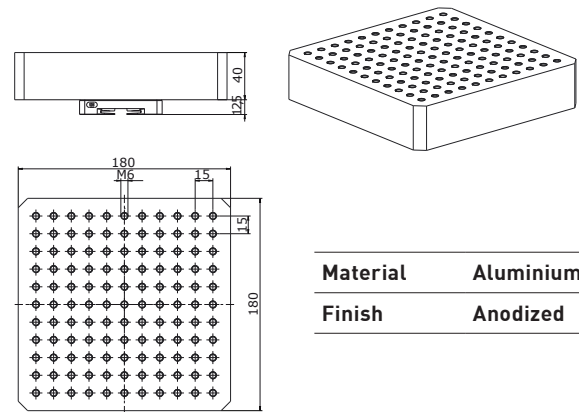
Item number: B809500452



Clamping width	66 mm
Clamping force	30000 N

**Grid Plate & Macro 70 x 70 mm**

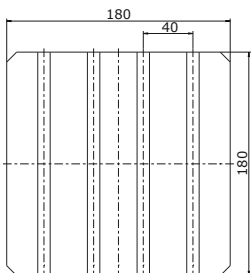
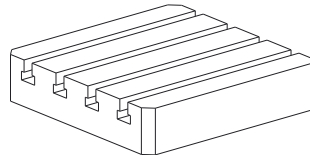
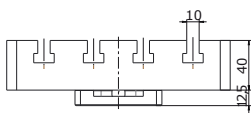
Item number: B809500120



Material	Aluminium
Finish	Anodized

**T-Slot Plate & Macro 70 x 70 mm**

Item number: B809500127

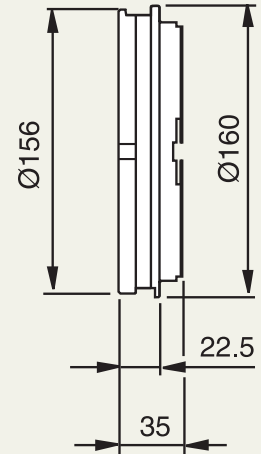
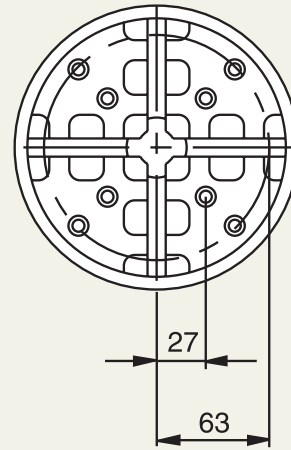


Material	Aluminium
Finish	Anodized



MacroMagnum

Item number: 3R-681.51-SA

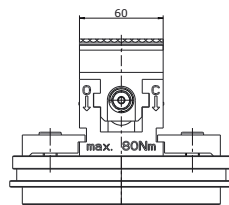
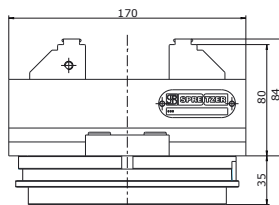


Unhardened pallet with hardened reference and drill marks for eight through holes.

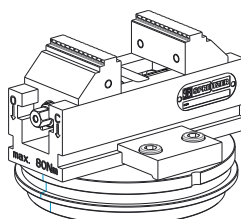
- + Adapted for automatic changing
- + Ready for code carrier
- + Weight 4.5 kg

MZR 170-60 & MacroMagnum

Item number: B809500448

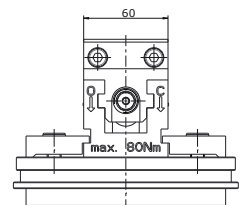
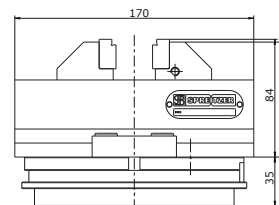


Clamping width	136 mm
Clamping force	30000 N

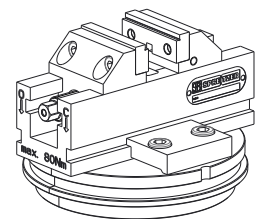


MZE 170-60 & MacroMagnum

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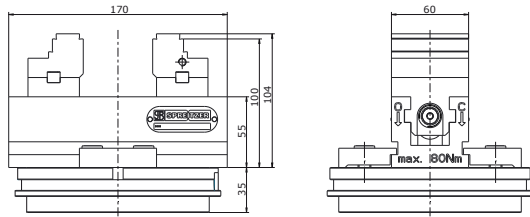


Clamping width	90 mm
Clamping force	30000 N



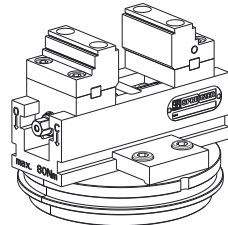
MZU 170-60 & MacroMagnum

Item number: B809500139

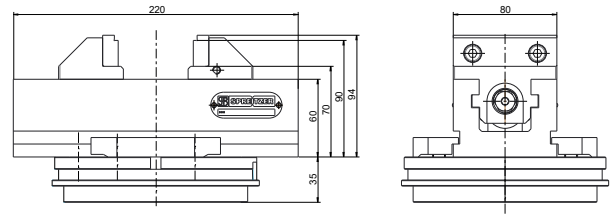


Clamping width 130 mm

Clamping force 30000 N

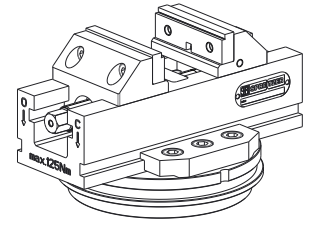
**MZE 220-80 & MacroMagnum**

Item number: B809500140

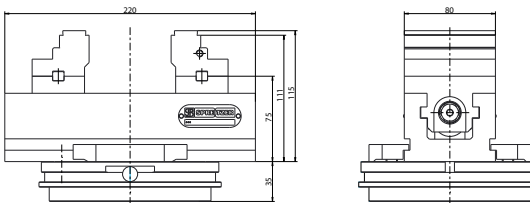


Clamping width 130 mm

Clamping force 40000 N

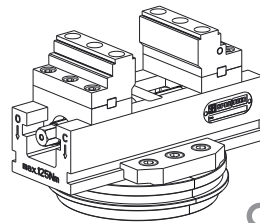
**MZU 220-80 & MacroMagnum**

Item number: B809500141

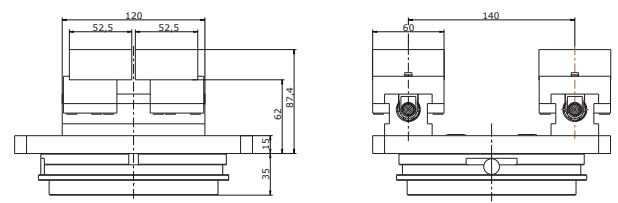


Clamping width 180 mm

Clamping force 40000 N

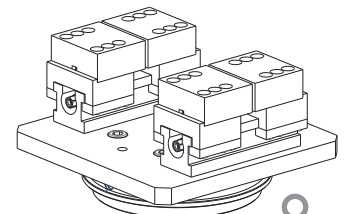
**MZS 120-60 A (2x) & MacroMagnum**

Item number: B809500150

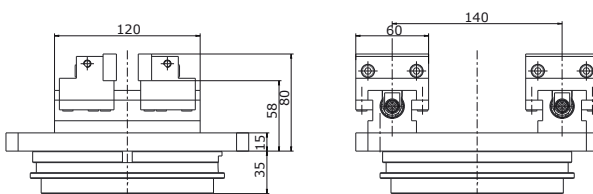


Clamping width 120 mm

Clamping force 16000 N

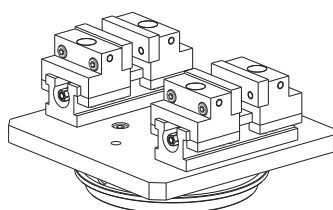
**MZS 120-60 B (2x) & MacroMagnum**

Item number: B809500151

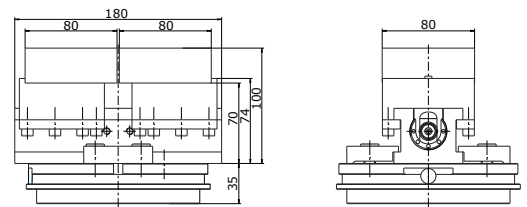


Clamping width 57 mm

Clamping force 16000 N

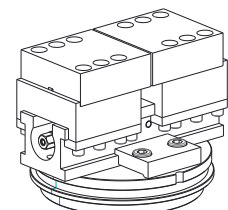
**MZS 180-80 A & MacroMagnum**

Item number: B809500156



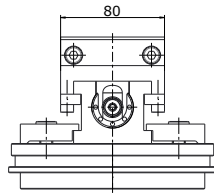
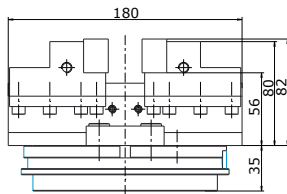
Clamping width 180 mm

Clamping force 30000 N

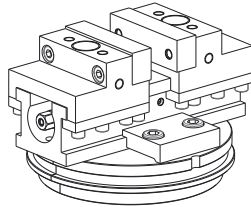


MZS 180-80 B & MacroMagnum

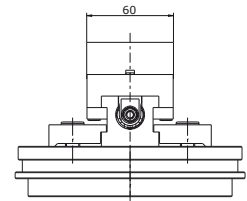
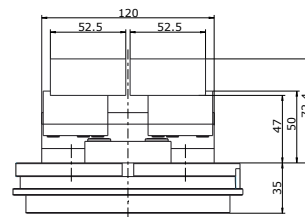
Item number: B809500157



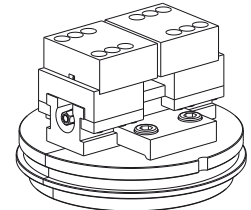
Clamping width	89 mm
Clamping force	30000 N

**MZS 120-60 A & MacroMagnum**

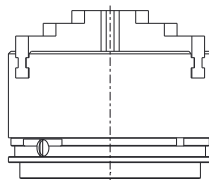
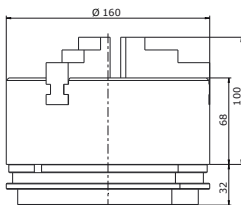
Item number: B809500352



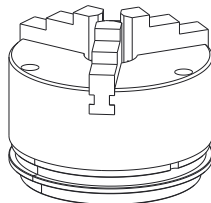
Clamping width	120 mm
Clamping force	16000 N

**DBF 160 & MacroMagnum**

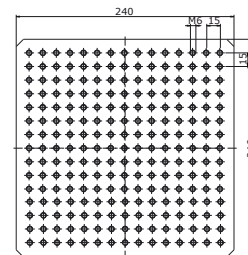
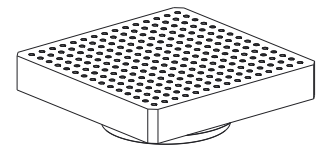
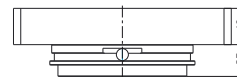
Item number: B809500183



Clamping range	4 - 64 /
External clamping	50 - 160 mm
Clamping force	31000 N

**Grid Plate & MacroMagnum**

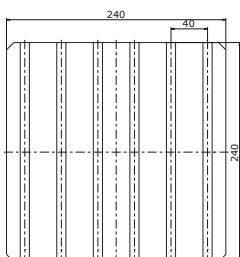
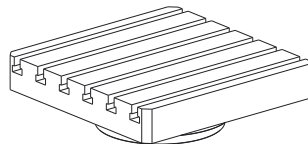
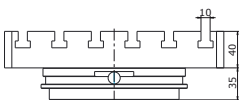
Item number: B809500187



Material	Aluminium
Finish	Anodized

**T-Slot Plate & MacroMagnum**

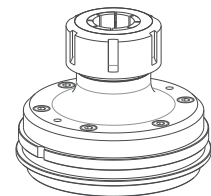
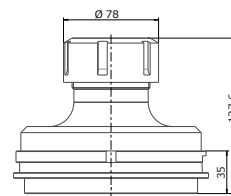
Item number: B809500191



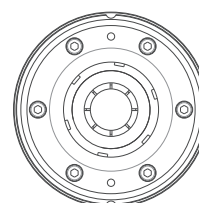
Material	Aluminium
Finish	Anodized

**ER 50 & MacroMagnum**

Item number: B809500336

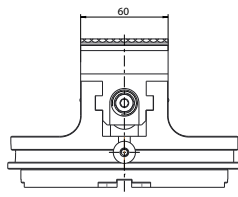
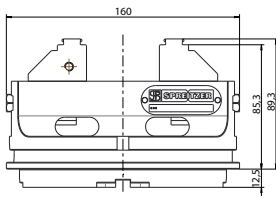


Clamping range	4 - 36 mm
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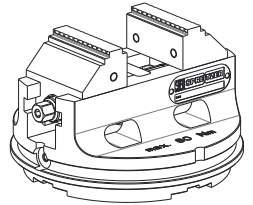


MZR 160-60 PA & MacroMagnum

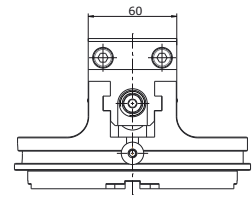
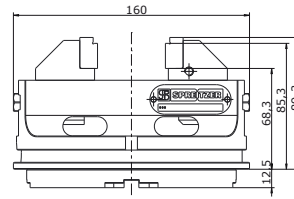
Item number: B809500423



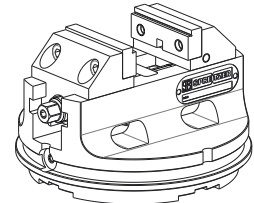
Clamping width	126 mm
Clamping force	30000 N

**MZE 160-60 PA & MacroMagnum**

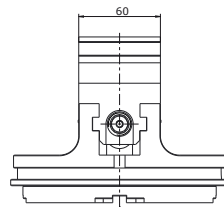
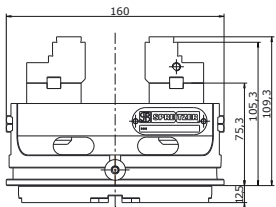
Item number: B809500424



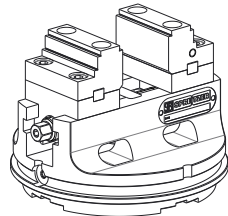
Clamping width	80 mm
Clamping force	30000 N

**MZU 160-60 PA & MacroMagnum**

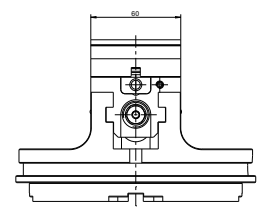
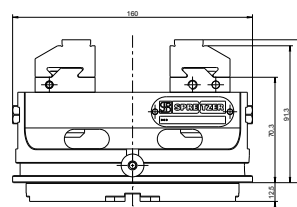
Item number: B809500425



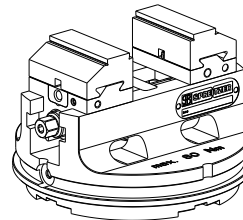
Clamping width	120 mm
Clamping force	30000 N

**MZQ 160-60 PA & MacroMagnum**

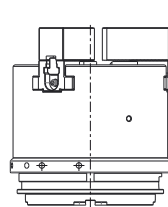
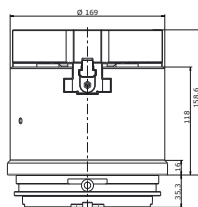
Item number: B809500426



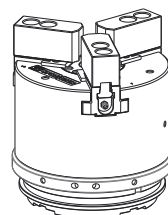
Clamping width	116 mm
Clamping force	30000 N

**DBF-PH 169 & MacroMagnum**

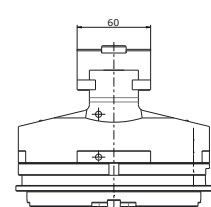
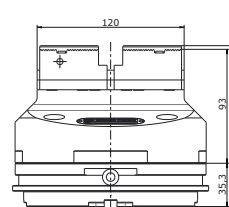
Item number: B809500441



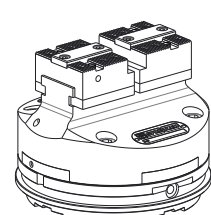
Clamping force	
pneumatic	20000 N
hydraulic	50400 N

**PZS² 120-60 & MacroMagnum**

Item number: B809500440

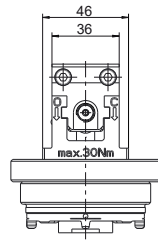
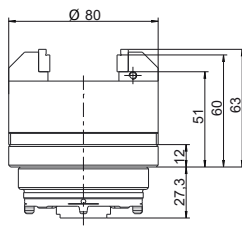


Clamping with	120 mm
Clamping force	16000 N

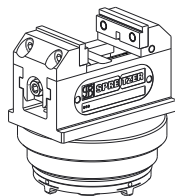


MZE 80-36 & GPS 70

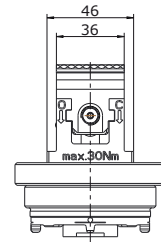
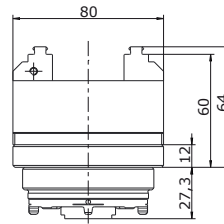
Item number: B809500006



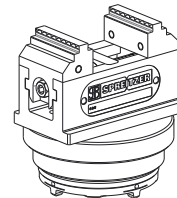
Clamping width	40 mm
Clamping force	16000 N

**MZR 80-36 & GPS 70**

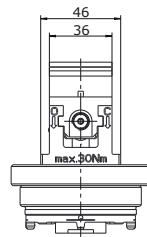
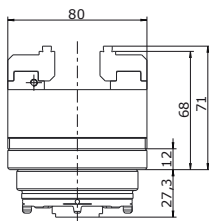
Item number: B809500449



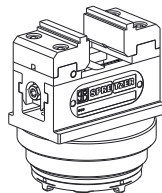
Clamping width	59 mm
Clamping force	16000 N

**MZU 80-36 & GPS 70**

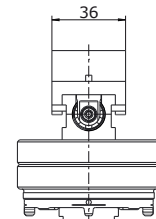
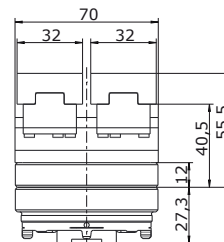
Item number: B809500450



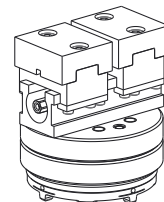
Clamping width	78 mm
Clamping force	16000 N

**MZS 70-36 A & GPS 70**

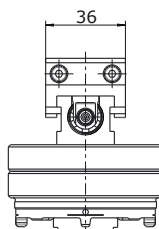
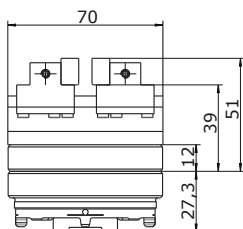
Item number: B809500028



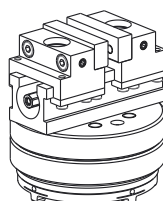
Clamping width	70 mm
Clamping force	10000 N

**MZS 70-36 B & GPS 70**

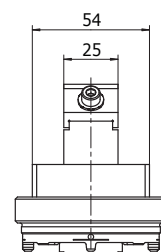
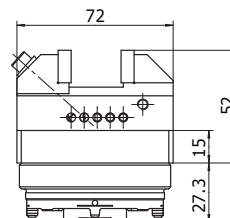
Item number: B809500029



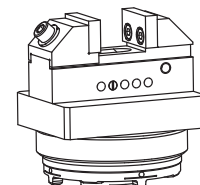
Clamping width	30 mm
Clamping force	10000 N

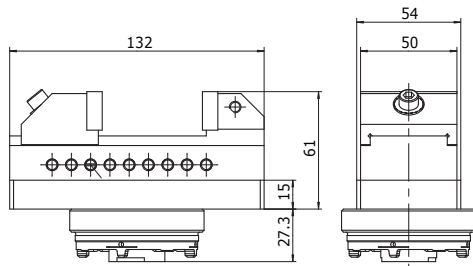
**N25S & GPS 70**

Item number: B809500092

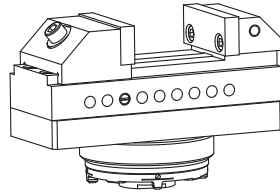


Clamping width	23 mm
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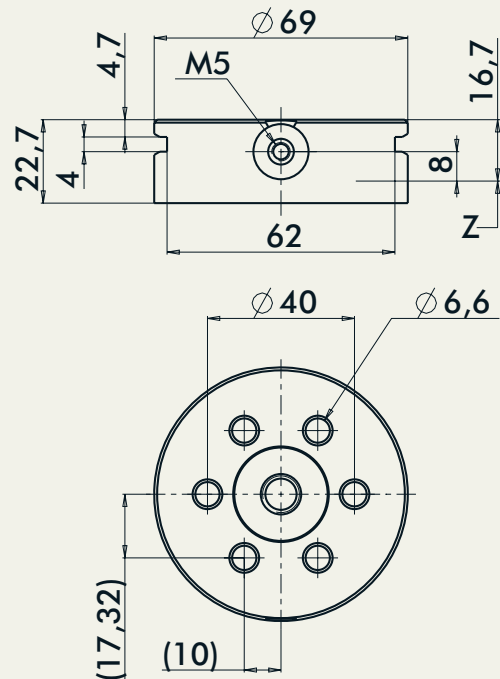
N50S & GPS 70**Item number: B809500114**

Clamping width 63 mm



GPS 70 Aluminium pallet

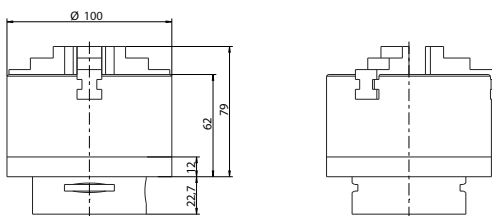
Item number: C 695 040



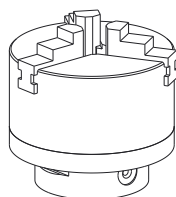
Workpiece and device holder.
Prepared for automation with thread M5 for code carrier.

DBF 100 & GPS 70

Item number: B809500082

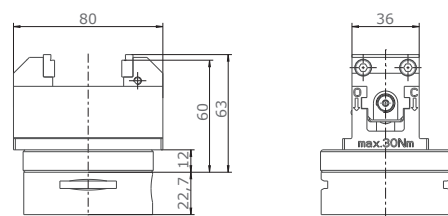


Clamping range	3 - 33 /
External clamping	32 - 83 mm
Clamping force	17000 N

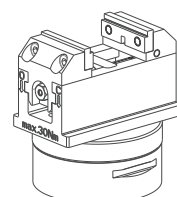


MZE 80-36 & GPS 70

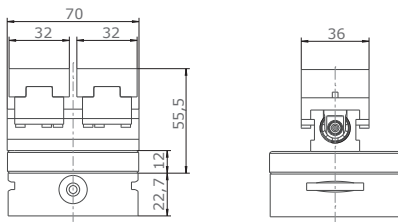
Item number: B809500007



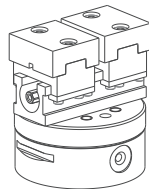
Clamping width	40 mm
Clamping force	16000 N



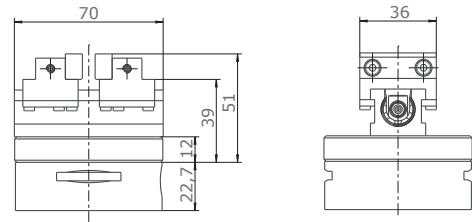
MZS 70-36 A & GPS 70
Item number: B809500232



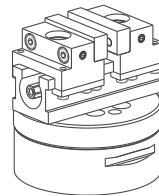
Clamping width 70 mm
Clamping force 10000 N



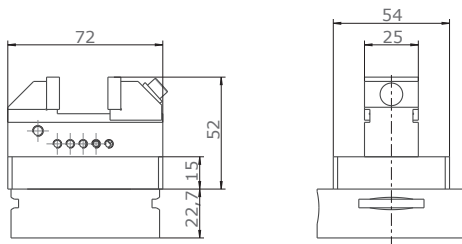
MZS 70-36 B & GPS 70
Item number: B809500231



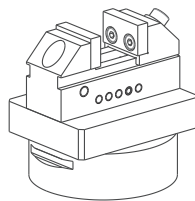
Clamping width 30 mm
Clamping force 10000 N



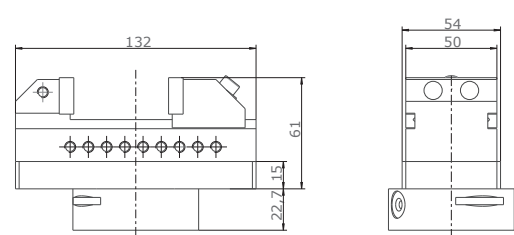
N25S & GPS 70
Item number: B809500093



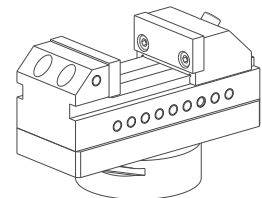
Clamping width 23 mm



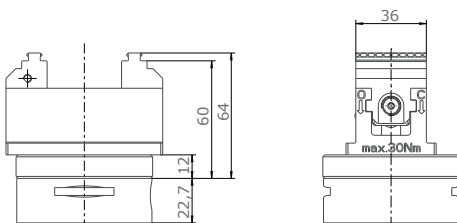
N50S & GPS 70
Item number: B809500115



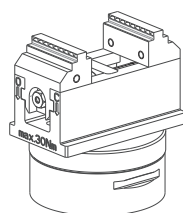
Clamping width 63 mm



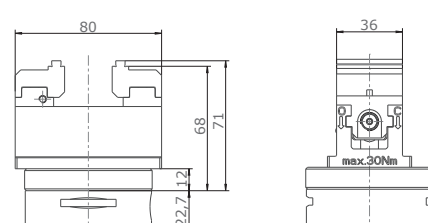
MZR 80-36 & GPS 70
Item number: B809500476



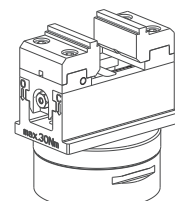
Clamping width 59 mm
Clamping force 16000 N

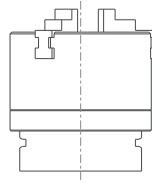
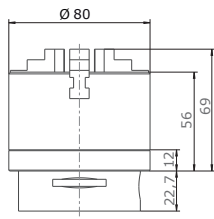


MZU 80-36 & GPS 70
Item number: B809500477



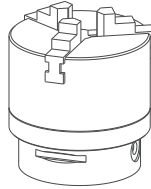
Clamping width 40 mm
Clamping force 16000 N



DBF 80 & GPS 70**Item number: B809500478**

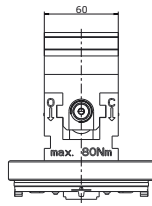
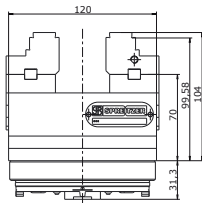
Clamping range	2 - 27 /
External clamping	25 - 71 mm

Clamping force	10000 N
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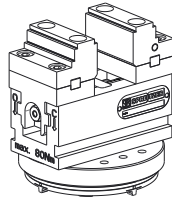


MZU 120-60 & GPS 120

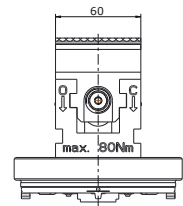
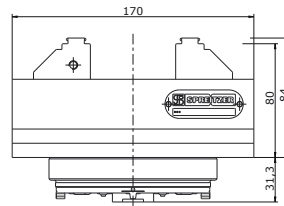
Item number: B809500458



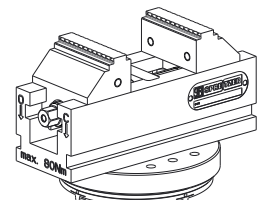
Clamping width	80 mm
Clamping force	30000 N

**MZR 170-60 & GPS 120**

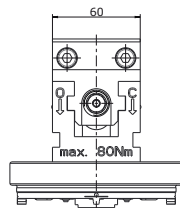
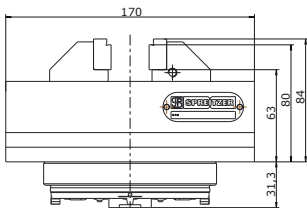
Item number: B809500459



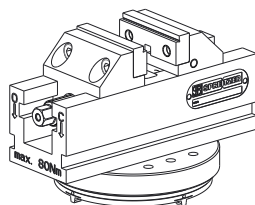
Clamping width	136 mm
Clamping force	30000 N

**MZE 170-60 & GPS 120**

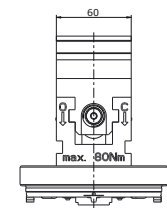
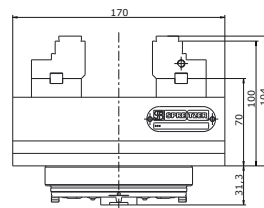
Item number: B809500134



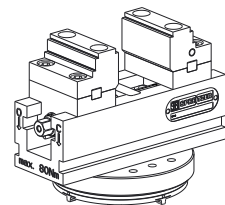
Clamping width	90 mm
Clamping force	30000 N

**MZU 170-60 & GPS 120**

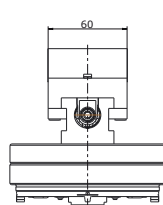
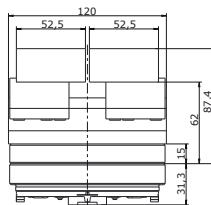
Item number: B809500135



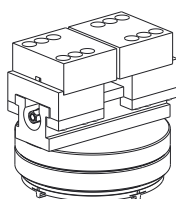
Clamping width	130 mm
Clamping force	30000 N

**MZS 120-60 A & GPS 120**

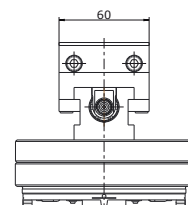
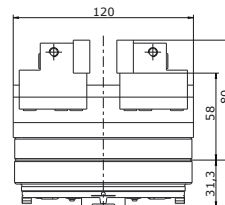
Item number: B809500146



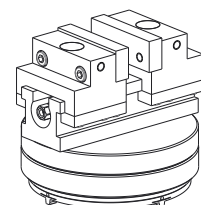
Clamping width	120 mm
Clamping force	16000 N

**MZS 120-60 B & GPS 120**

Item number: B809500147

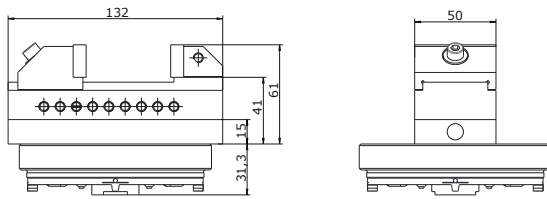


Clamping width	57 mm
Clamping force	16000 N

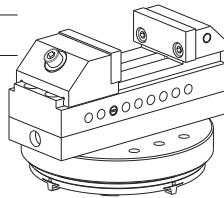


N50S & GPS 120

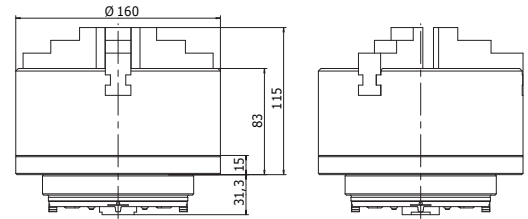
Item number: B809500142



Clamping width 63 mm

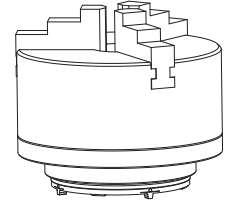
**DBF 160 & GPS 120**

Item number: B809500179



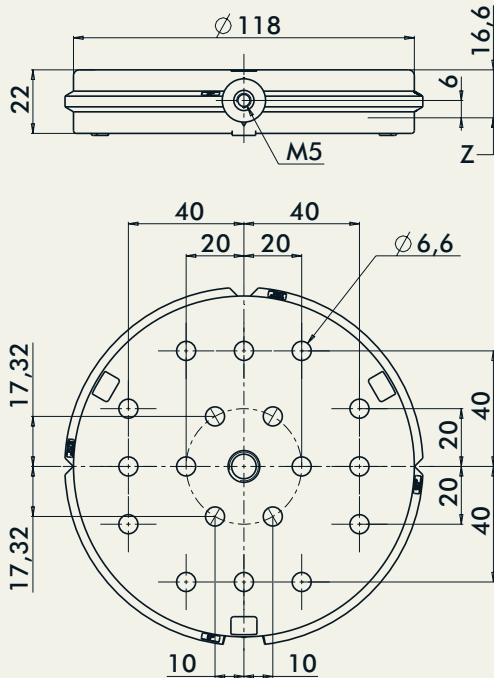
Clamping range	4 - 64 /
External clamping	50 - 160 mm

Clamping force	31000 N
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GPS 120 Aluminium pallet

Item number: C 695 140

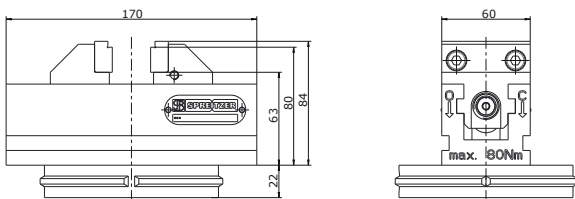


Workpiece or electrode holder.

Prepared for automation with thread M5 for code carrier fixture and gripper contour.

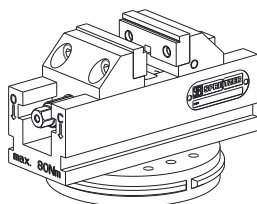
MZE 170-60 & GPS 120

Item number: B809500130



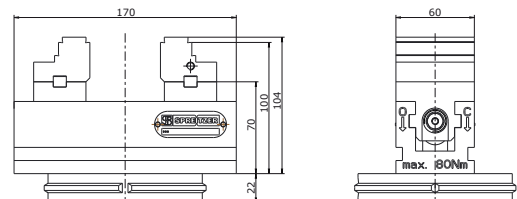
Clamping width 90 mm

Clamping force 30000 N



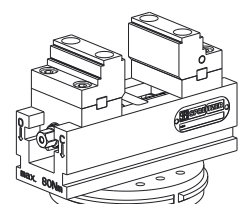
MZU 170-60 & GPS 120

Item number: B809500131



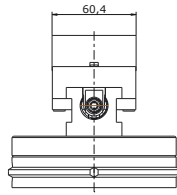
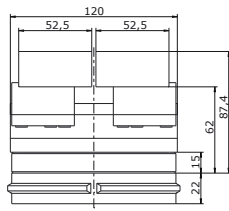
Clamping width 130 mm

Clamping force 30000 N



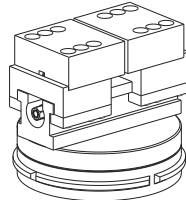
MZS 120-60 A & GPS 120

Item number: B809500148

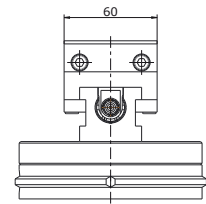
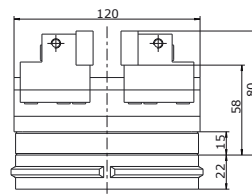


Clamping width 120 mm

Clamping force 16000 N

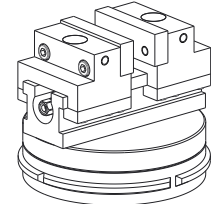
**MZS 120-60 B & GPS 120**

Item number: B809500149

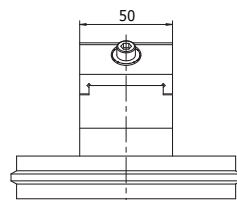
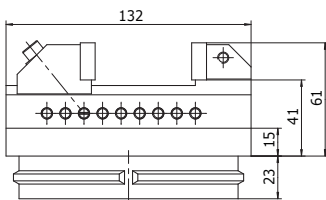


Clamping width 57 mm

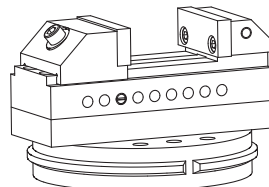
Clamping force 16000 N

**N50S & GPS 120**

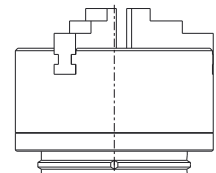
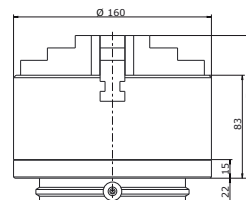
Item number: B809500143



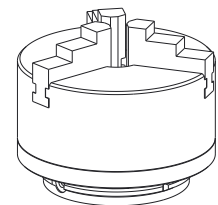
Clamping width 63 mm

**DBF 160 & GPS 120**

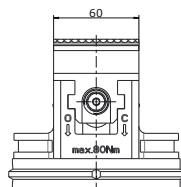
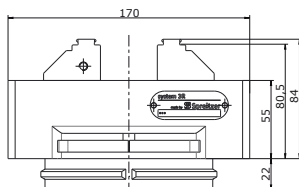
Item number: B809500180

Clamping range 4 - 64 /
External clamping 50 - 160 mm

Clamping force 31000 N

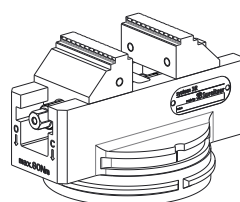
**MZR 170-60 & GPS 120**

Item number: B809500460

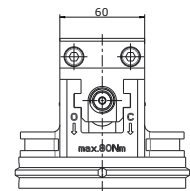
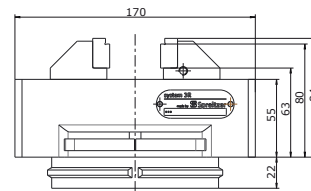


Clamping width 136 mm

Clamping force 30000 N

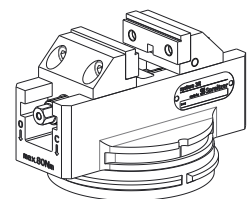
**MZE 170-60 & GPS 120**

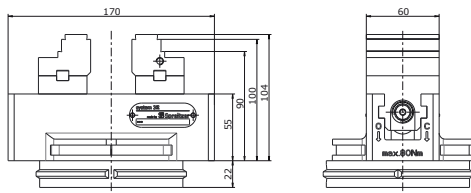
Item number: B809500395



Clamping width 90 mm

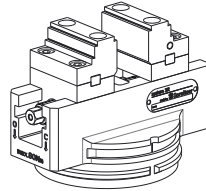
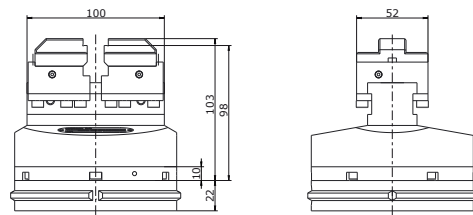
Clamping force 30000 N



MZU 170-60 & GPS 120**Item number: B809500461**

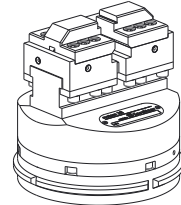
Clamping width	130 mm
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Clamping force	30000 N
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**PZS 100-50 & GPS 120****Item number: B809500467**

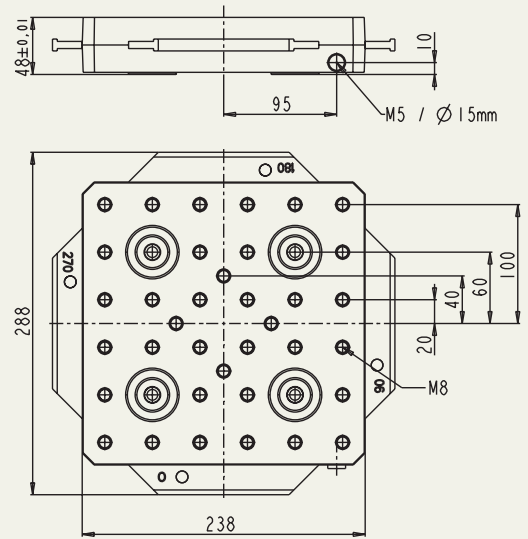
Clamping width	100 mm
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Clamping force	12000 N
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GPS 240

Item number: C 694 400



Aluminum pallet.

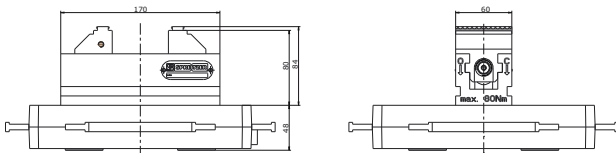
Suitable for high-speed milling and arduous milling operations.

Prepared for automation.

- + Construction height: 48.0 ± 0.01 mm
- + X/Y-centring: with coined cam
- + Flatness: 0.02 mm

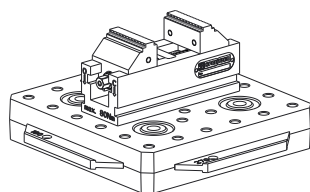
MZR 170-60 & GPS 240

Item number: B809500447



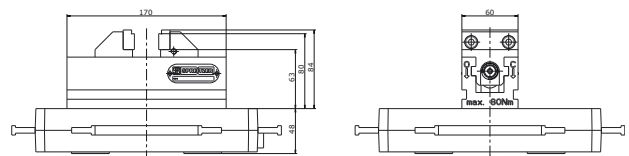
Clamping width 136 mm

Clamping force 30000 N



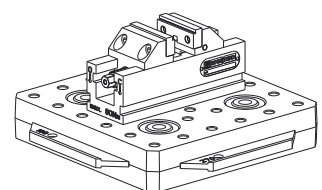
MZE 170-60 & GPS 240

Item number: B809500206

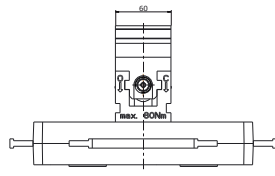
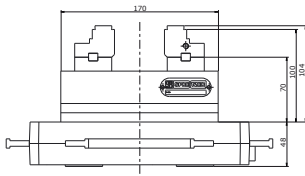


Clamping width 90 mm

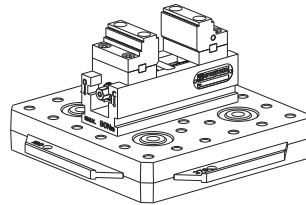
Clamping force 30000 N



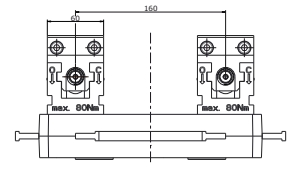
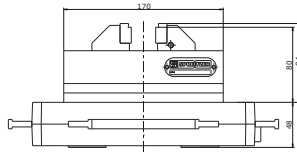
MZU 170-60 & GPS 240
Item number: B809500207



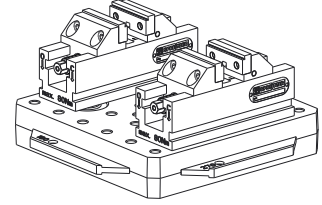
Clamping width	130 mm
Clamping force	30000 N



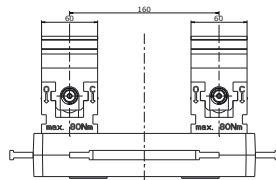
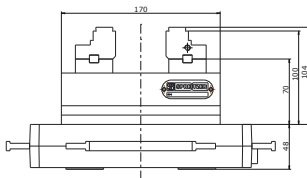
MZE 170-60 (2x) & GPS 240
Item number: B809500213



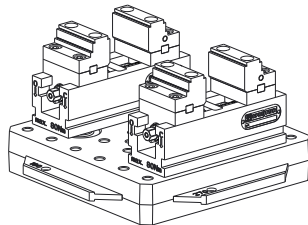
Clamping width	90 mm
Clamping force	30000 N



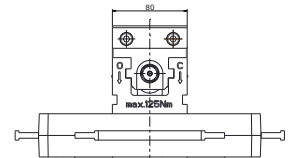
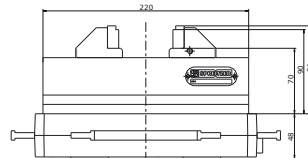
MZU 170-60 (2x) & GPS 240
Item number: B809500214



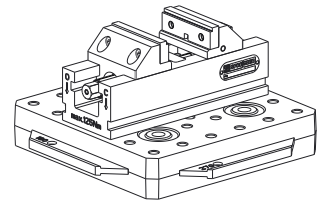
Clamping width	90 mm
Clamping force	30000 N



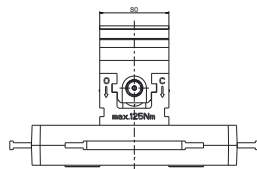
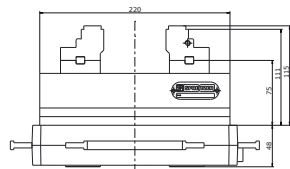
MZE 220-80 & GPS 240
Item number: B809500215



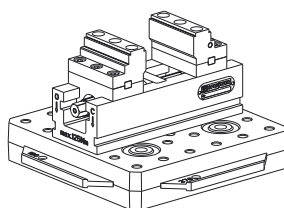
Clamping width	130 mm
Clamping force	40000 N



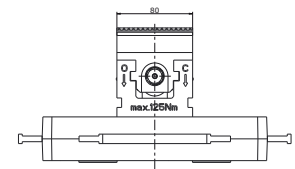
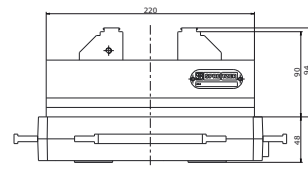
MZU 220-80 & GPS 240
Item number: B809500216



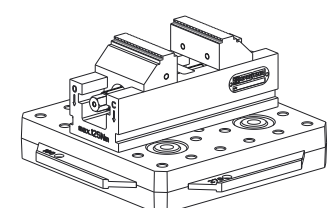
Clamping width	180 mm
Clamping force	40000 N



MZR 220-80 & GPS 240
Item number: B809500451

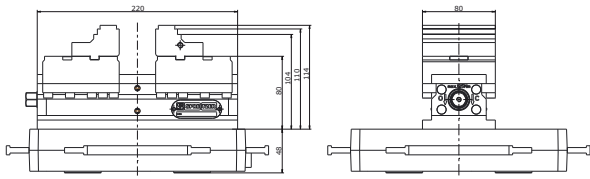


Clamping width	178 mm
Clamping force	40000 N



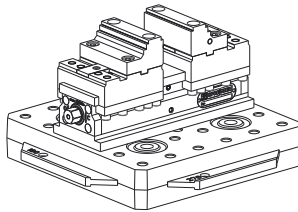
MZC 220-80 E & GPS 240

Item number: B809500376

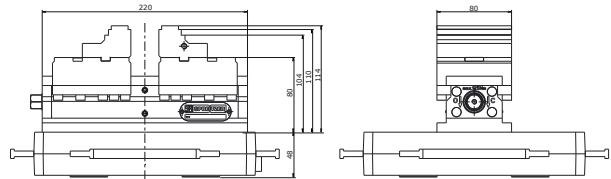


Clamping width 185 mm

Clamping force 40000 N

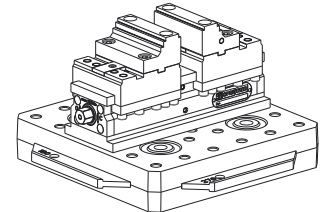
**MZC 220-80 S & GPS 240**

Item number: B809500377

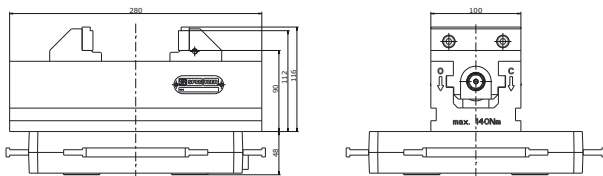


Clamping width 185 mm

Clamping force 40000 N

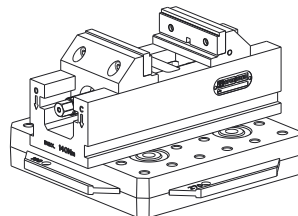
**MZE 280-100 & GPS 240**

Item number: B809500220

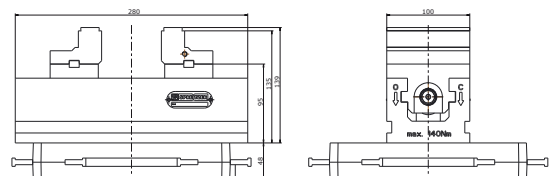


Clamping width 190 mm

Clamping force 50000 N

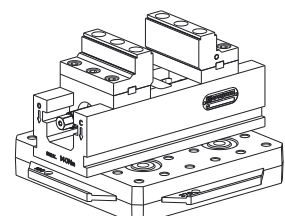
**MZU 280-100 & GPS 240**

Item number: B809500221

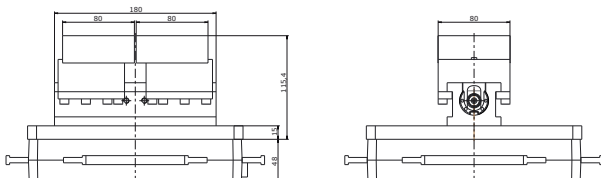


Clamping width 240 mm

Clamping force 50000 N

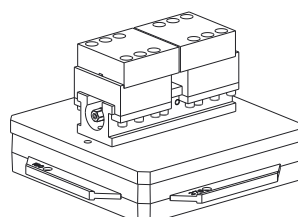
**MZS 180-80 A & GPS 240**

Item number: B809500229

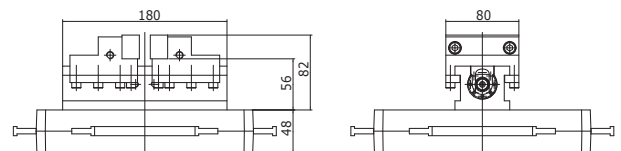


Clamping width 180 mm

Clamping force 30000 N

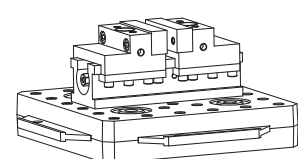
**MZS 180-80 B & GPS 240**

Item number: B809500230



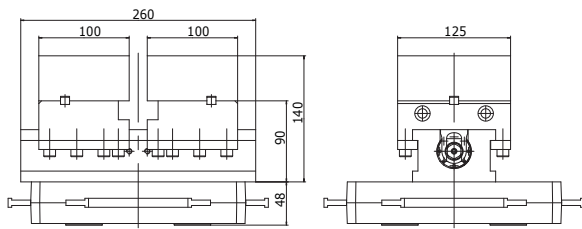
Clamping width 89 mm

Clamping force 30000 N



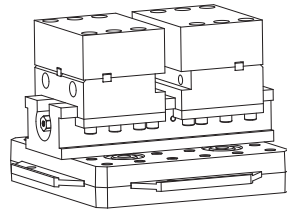
MZS 260-125 A & GPS 240

Item number: B809500243

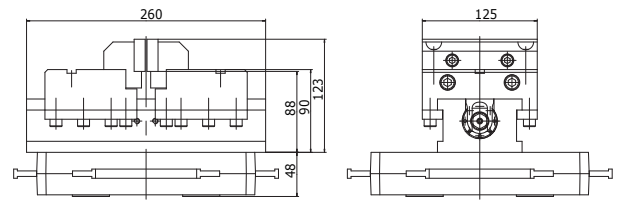


Clamping width 260 mm

Clamping force 50000 N

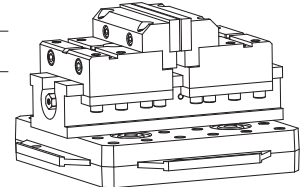
**MZS 260-125 B & GPS 240**

Item number: B809500244

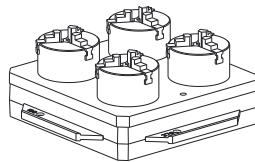
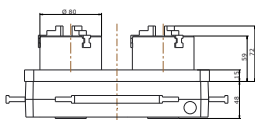


Clamping width 111 (260) mm

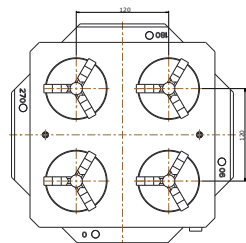
Clamping force 50000 N

**DBF 80 (4x) & GPS 240**

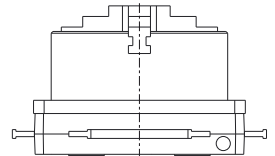
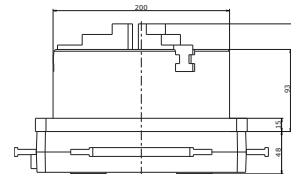
Item number: B809500264

Clamping range 2-27/
External clamping 25-71 mm

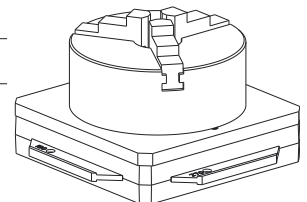
Clamping force 10000 N

**DBF 200 & GPS 240**

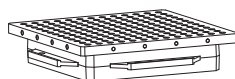
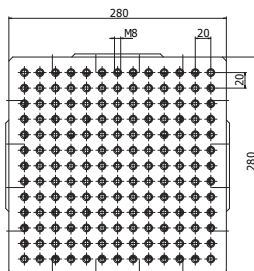
Item number: B809500275

Clamping range 4-90/
External clamping 60-200 mm

Clamping force 37000 N

**Grid Plate & GPS 240**

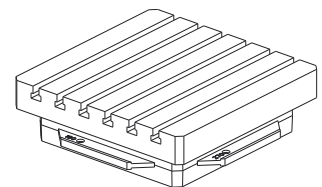
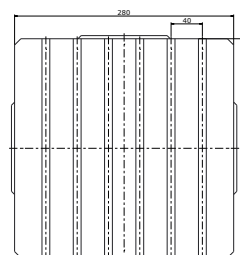
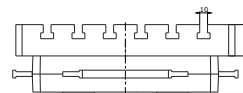
Item number: B809500301



Material Steel

Finish Surface
hardened**T-Slot plate & GPS 240**

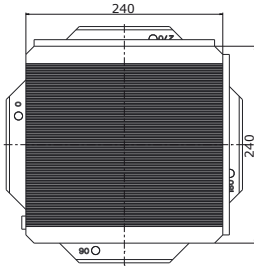
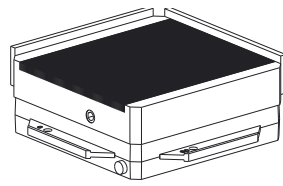
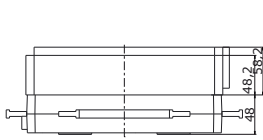
Item number: B809500327



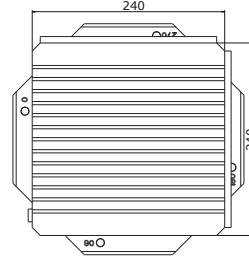
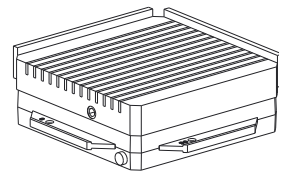
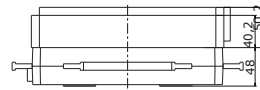
Material Aluminium

Finish Anodized



Fine Pole Magnet SPPF & GPS 240**Item number: B809500250**

Holding force	120 N/cm²
Magnetic field height	5 mm

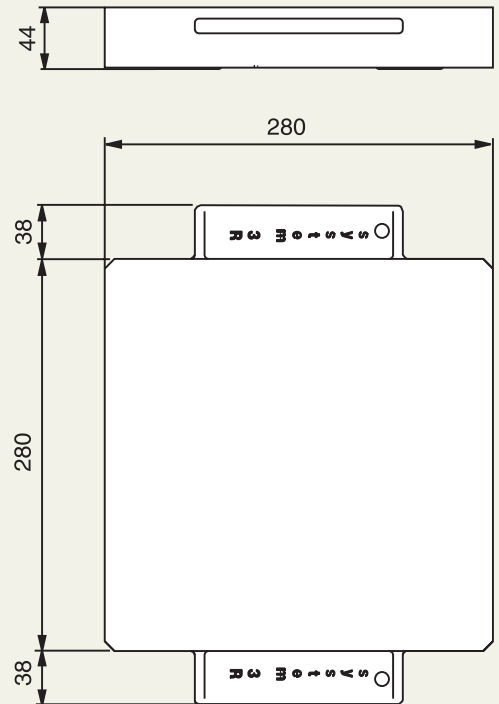
**Standard Pole Magnet SPPM & GPS 240****Item number: B809500251**

Holding force	180 N/cm²
Magnetic field height	10 mm



Dynafix

Item number: 3R-771.2

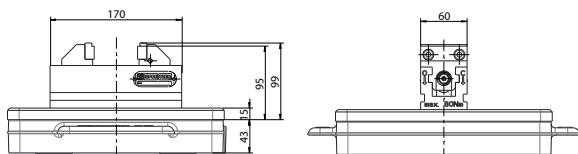


Milled aluminium pallet 280x280 mm

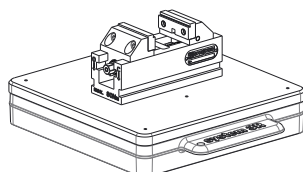
- + Adapted for automatic changing
- + Ready for code carrier
- + Flatness 0.04 mm
- + Thickness tolerance +0.5/-0 mm

MZE 170-60 & Dynafix

Item number: B809500210

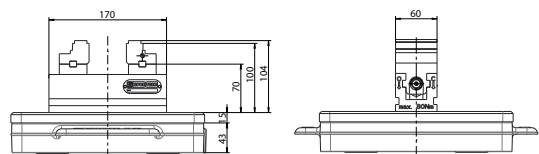


Clamping width	90 mm
Clamping force	30000 N

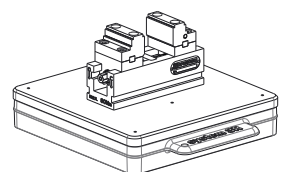


MZU 170-60 & Dynafix

Item number: B809500211

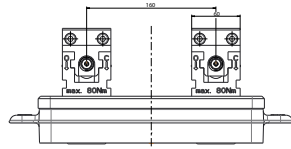
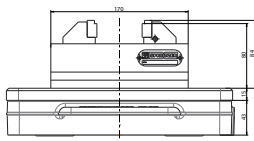


Clamping width	130 mm
Clamping force	30000 N

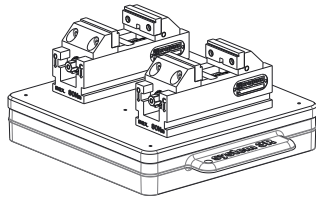


MZE 170-60 (2x) & Dynafix

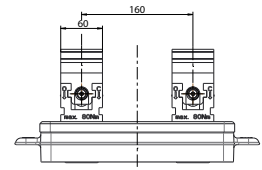
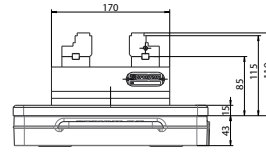
Item number: B809500217



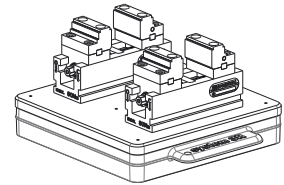
Clamping width	90 mm
Clamping force	30000 N

**MZU 170-60 (2x) & Dynafix**

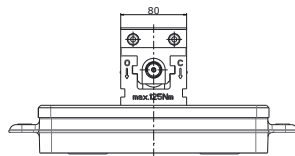
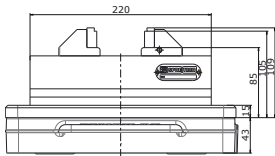
Item number: B809500218



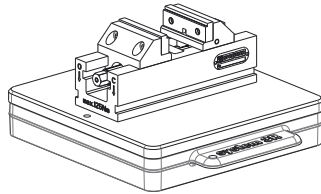
Clamping width	130 mm
Clamping force	30000 N

**MZE 220-80 & Dynafix**

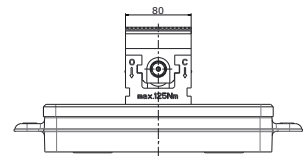
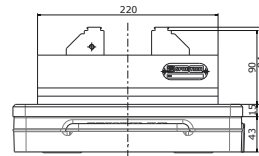
Item number: B809500222



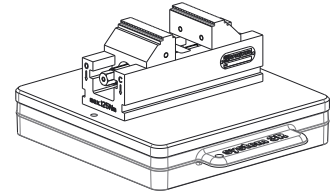
Clamping width	130 mm
Clamping force	40000 N

**MZR 220-80 & Dynafix**

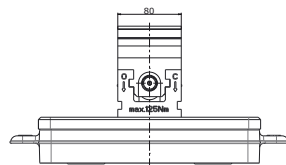
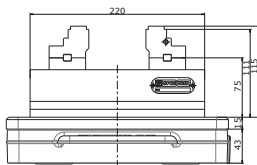
Item number: B809500433



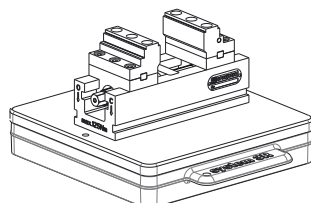
Clamping width	178 mm
Clamping force	40000 N

**MZU 220-80 & Dynafix**

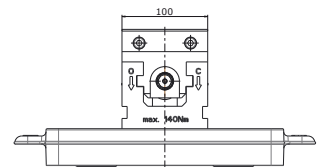
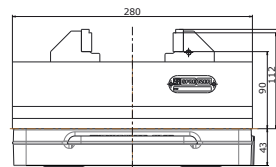
Item number: B809500223



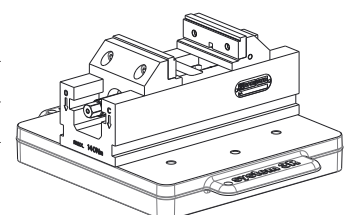
Clamping width	180 mm
Clamping force	40000 N

**MZE 280-100 & Dynafix**

Item number: B809500224

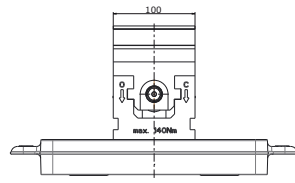
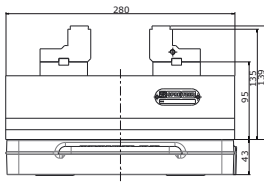


Clamping width	190 mm
Clamping force	50000 N

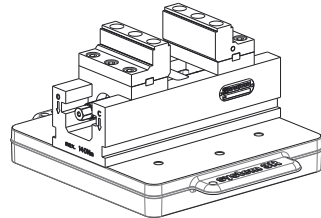


MZU 280-100 & Dynafix

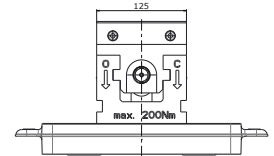
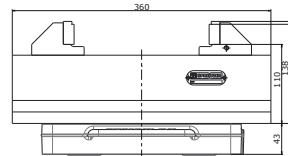
Item number: B809500225



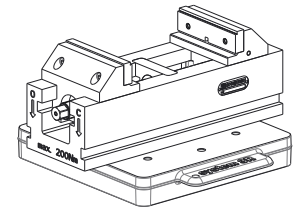
Clamping width	240 mm
Clamping force	50000 N

**MZE 360-125 & Dynafix**

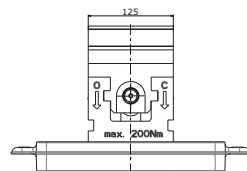
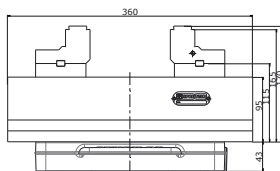
Item number: B809500227



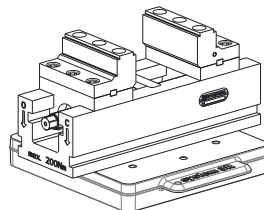
Clamping width	250 mm
Clamping force	70000 N

**MZU 360-125 & Dynafix**

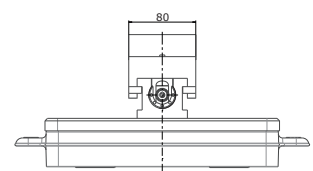
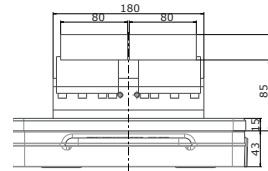
Item number: B809500228



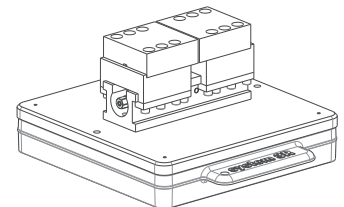
Clamping width	310 mm
Clamping force	70000 N

**MZS 180-80 A & Dynafix**

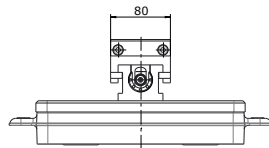
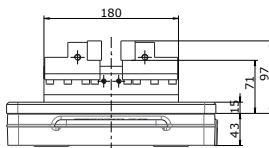
Item number: B809500233



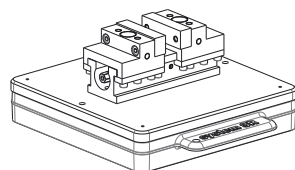
Clamping width	180 mm
Clamping force	30000 N

**MZS 180-80 B & Dynafix**

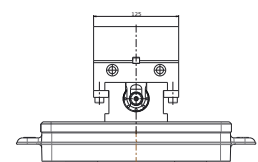
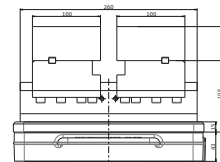
Item number: B809500234



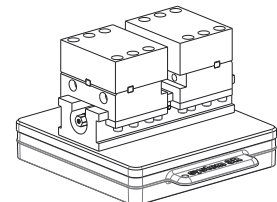
Clamping width	89 mm
Clamping force	30000 N

**MZS 260-125 A & Dynafix**

Item number: B809500247

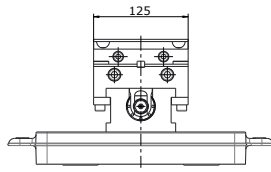
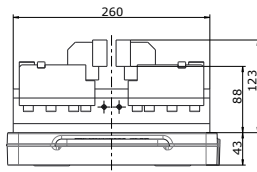


Clamping width	260 mm
Clamping force	50000 N

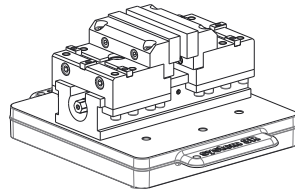


MZS 260-125 B & Dynafix

Item number: B809500248

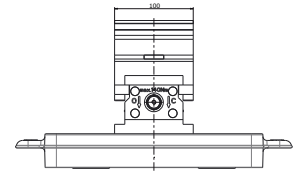
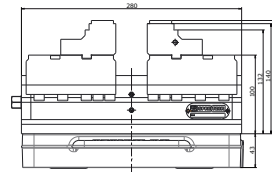


Clamping width	111 (260) mm
Clamping force	50000 N

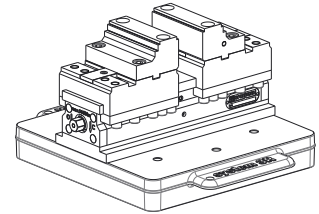


MZC 280-100 E & Dynafix

Item number: B809500378

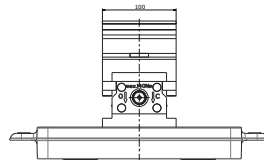
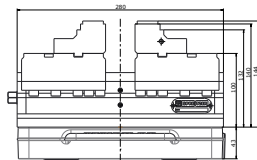


Clamping width	245 mm
Clamping force	50000 N

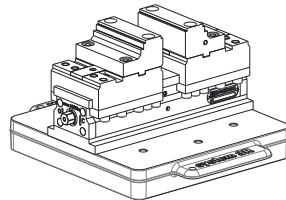


MZC 280-100 S & Dynafix

Item number: B809500379

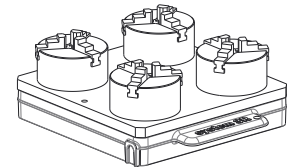
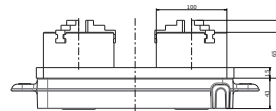


Clamping width	245 mm
Clamping force	50000 N

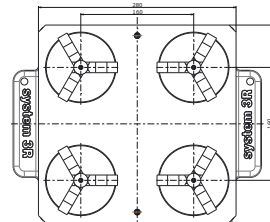


DBF 100 (4x) & Dynafix

Item number: B809500268

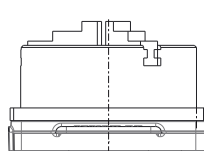
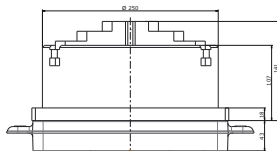


Clamping range	2-33/
External clamping	32-83 mm
Clamping force	17000 N

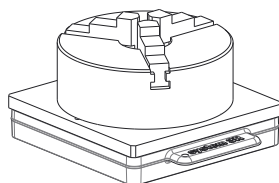


DBF 250 & Dynafix

Item number: B809500281

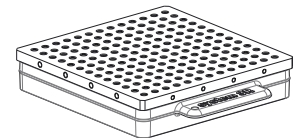


Clamping range	5-118/
External clamping	77-250 mm
Clamping force	46000 N

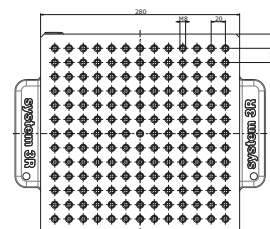


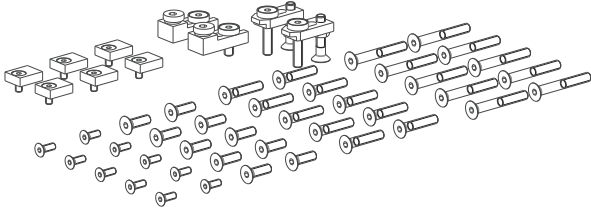
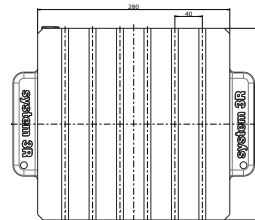
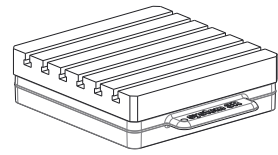
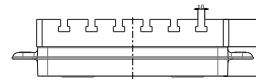
Grid plate & Dynafix

Item number: B809500304

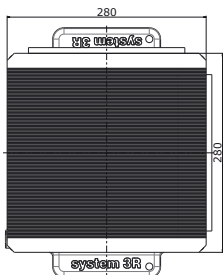
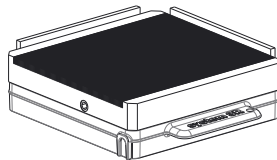


Material	steel
Finish	Surface hardened

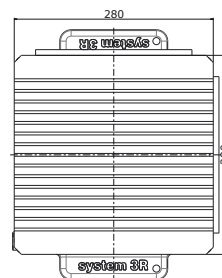
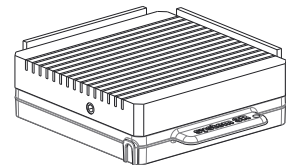


Set of clamping elements for B809500304**Item number: B809500455****T-Slot plate & Dynafix****Item number: B809500330**

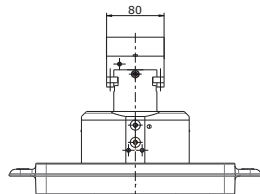
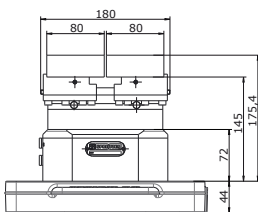
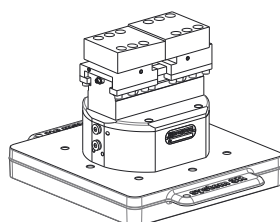
Material	Aluminium
Finish	Anodized

Fine Pole Magnet SPPF & Dynafix**Item number: B809500253**

Holding force	120 N/cm²
Magnetic field height	5 mm

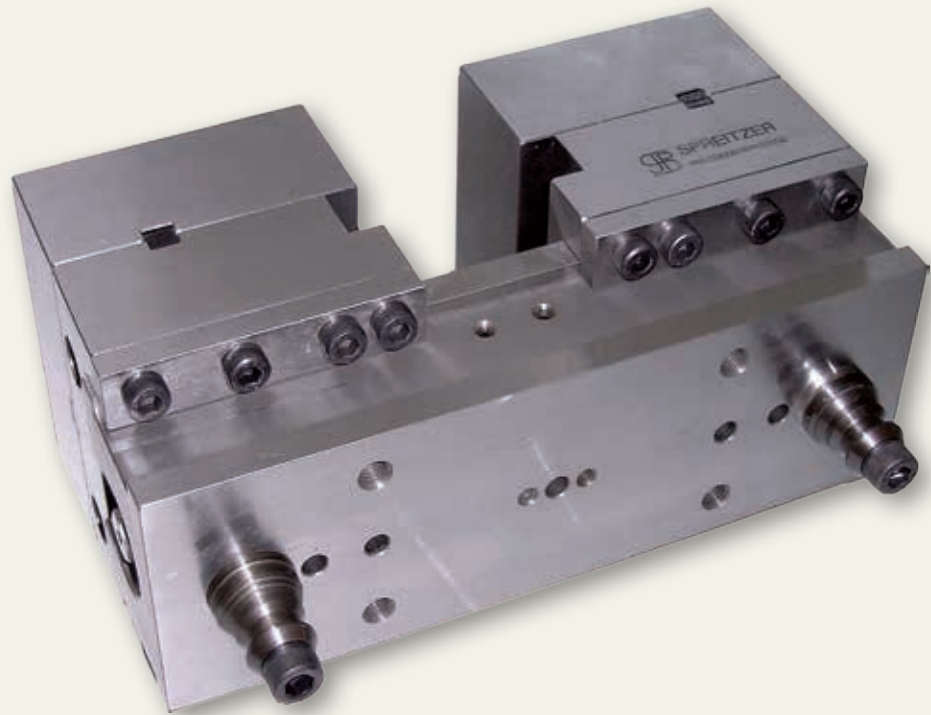
**Standard Pole Magnet SPPM & Dynafix****Item number: B809500255**

Holding force	180 N/cm²
Magnetic field height	10 mm

**PZS 180-80A & Dynafix****Item number: B809500453****Clamping width 180 mm****Clamping force 24000 N**

Delphin

Item number: S 812 000



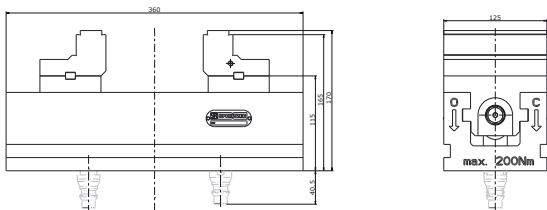
Mechanical centre-clamping vises / Mechanical compact vises

The centre-clamping vises MZU and the compact vises MSU are prepared for mounting the drawbars. They can be used on Delphin base plates with 200 or 250 mm centre distance.

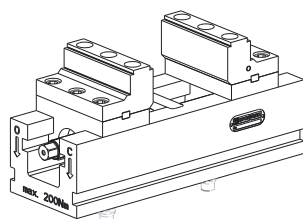
The drawbars are included in the delivery.

MZU 360-125 for Delphin 200 mm

Item number: B809500466

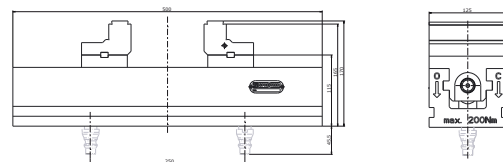


Clamping width	310 mm
Clamping force	70000 N

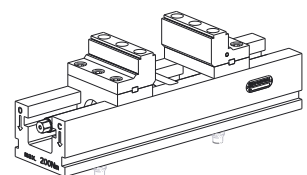


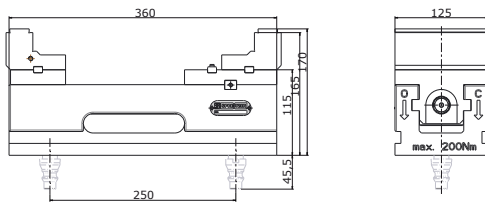
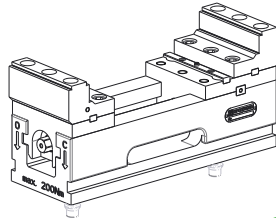
MZU 500-125 for Delphin 250 mm

Item number: B809500462



Clamping width	450 mm
Clamping force	70000 N



MSU 360-125 for Delphin 200 mm**Item number: B809500469****Clamping width 310 mm****Clamping force 50000 N****Note: Required clamping force**

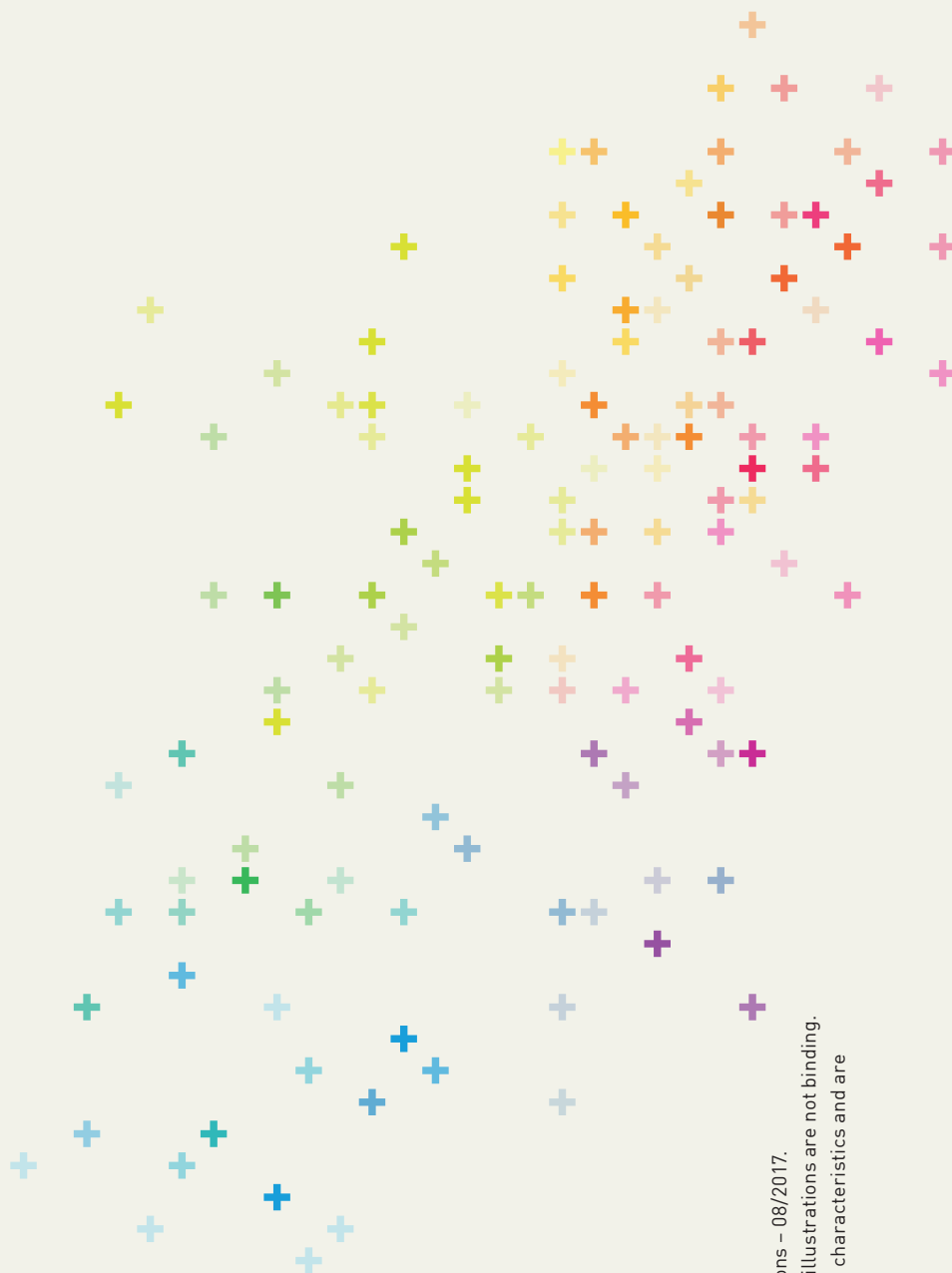
The clamping force of the centre-clamping vises and compact vises depends on tightening torque. We recommend to use a torque wrench. The adjusted tightening torque depends on influencing variables for example workpiece geometry, version of clamping jaws, work material, work conditions and so on. Due to the above mentioned variables it can be necessary to adjust the torque value individually.

The clamping force of the different centre-clamping vise variants in this catalogue is the arithmetic sum of the individual forces occurring at the jaws.

At a glance

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