



KONTEC KSG

**Modular designed machine
vise**

Power-amplified single-acting vise with unique quick lever clamping and continuously adjustable clamping force

KONTEC KSG are modular machine vises with unique, patented quick lever clamping and continuously adjustable clamping force. Thanks to a wide range of systems and top jaws, the vise can be adapted to any clamping task. Workpieces are clamped under tension within seconds thanks to the quick lever clamping, which also prevents bending of the base body. Thanks to the interface for quick-change pallet system, the machine vise can be optimally combined with the large NSE3 and GFD modular system to greatly reduce set-up times on machine tools.

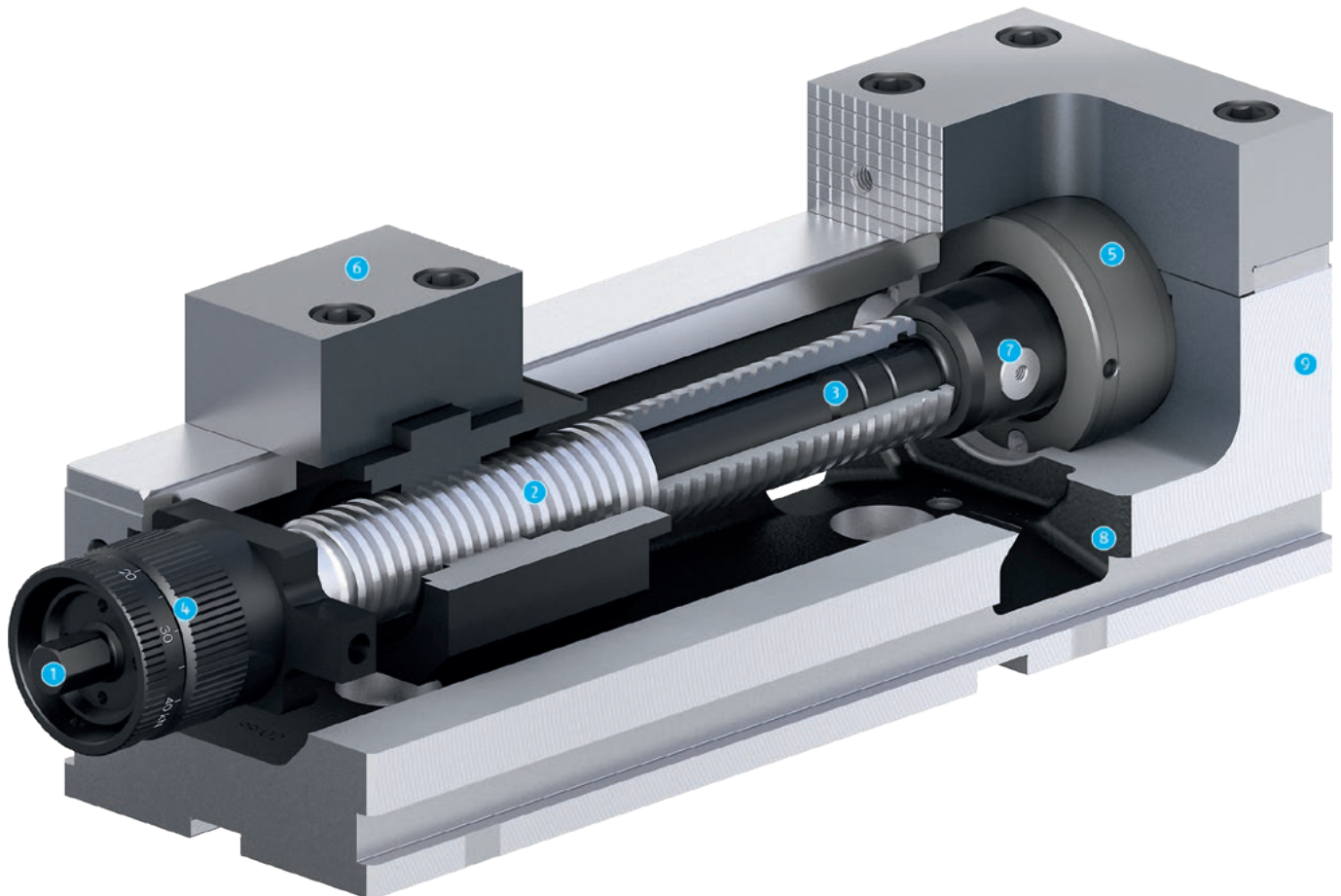


Advantages – Your benefits

- + Quick lever clamping**
Simple, fast, and reliable workpiece clamping
- + Continuous adjustment of the clamping force**
Suitable for machining both finished and raw parts
- + Spindle drive adjustable by hand**
Adjustment of clamping range without tools
- + Encapsulated force transmission box**
No maintenance of force transmission unit required
- + Easy handling**
Fast disassembly and cleaning
- + Integrated NSE3 and GFD interface**
Minimization of set-up times. Can be flexibly combined with the large modular quick-change pallet system
- + Clamping by tension – prevents the base body from bending**
Maximum machining precision
- + Standard jaw interface with comprehensive range of jaws**
Optimal adaptation to new clamping tasks

Function KSG

Turning the spindle advances the moving jaw to the workpiece. The "trick with the handle" then occurs. A 160° rotary movement of the sprinter lever brings the internal draw bar into use. The force transmission box located close to the fixed jaw draws the draw bar backwards using a mechanical transmission system.



- 1 Actuation via hexagon connection**
This ensures easy operation
- 2 Spindle drive**
For the highest of clamping forces
- 3 Completely encapsulated drawbar**
Offers optimal protection against coolant and chips
- 4 Continuous adjustment of the clamping force**
For highest repeat accuracy
- 5 Mechanical force transmission**
For self-locking and vibration-resistant clamping
- 6 Standard jaw interface**
For the use of standard jaws from SCHUNK
- 7 Easy removal of spindle assembly group**
For easy cleaning and fast assembly without clamping brackets
- 8 Drainage slots**
For coolant and chips
- 9 Wear-resistant base body**
Therefore a longer service life at highest precision. Even with maximum clamping force

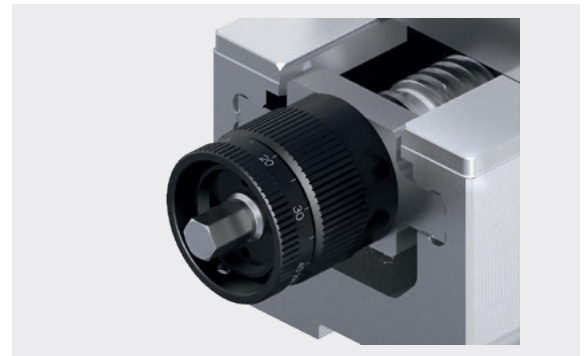
Quick lever clamping

With the quick clamping lever, force can be transmitted to the spindle entirely without a torque wrench. The clamping procedure is performed by turning the sprinter lever by 160° degrees. The workpiece can be clamped in less than a second.



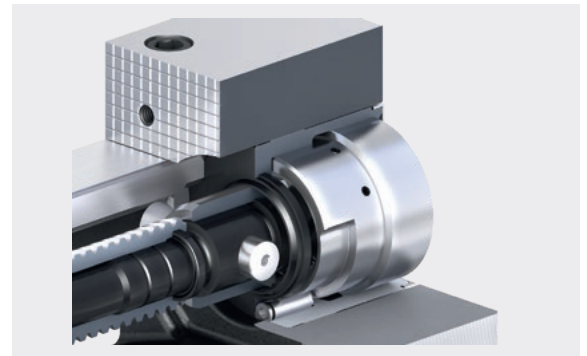
Continuously adjustable clamping force

The clamping force can be easily adjusted without a tool using a hand wheel. The force on the workpiece can be preset from 4 kN up to a maximum of 40 kN. The advantage is clamping with extremely high repeat accuracy.



Completely encapsulated force transmission box

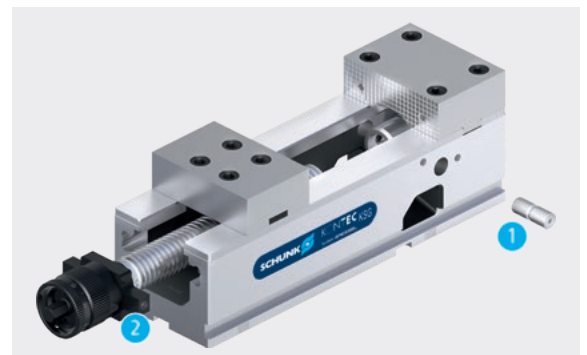
The force transmission box is protected against the ingress of coolant and chips. This ensures continuously reliable functioning and clamping force.



Cleaning and disassembling in just a few seconds

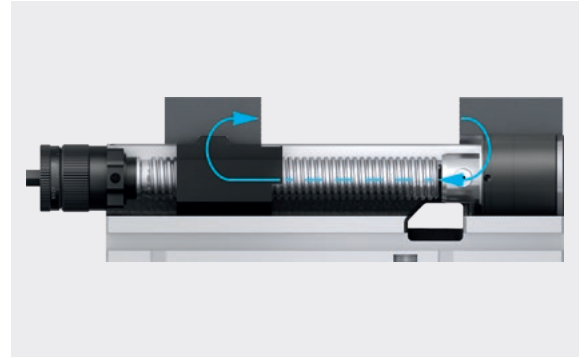
The spindle assembly can be removed from the power-amplified single-acting vise simply by pulling out the coupling pin. This allows for quick and direct positioning of the KSG without clamping claws or preparation for setup via the NSE3 or GFD quick-change pallet systems. It also makes cleaning the vise fast and easy.

- ❶ Coupling pin
- ❷ Spindle assembly group



Clamping by tension

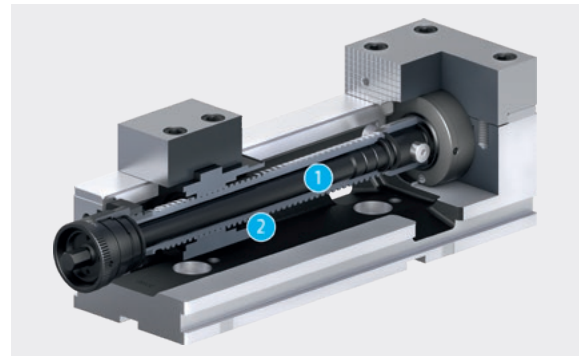
The spindle is subjected to tensile force during the clamping process. The closed force system prevents the base body from bending. This makes the KSG ideal for the use with quick-change pallet systems.



Completely encapsulated drawbar

The integrated tension rod in the outer spindle is protected to prevent cooling lubricant and chips from getting inside it. This ensures continuously reliable functioning and clamping force at all times.

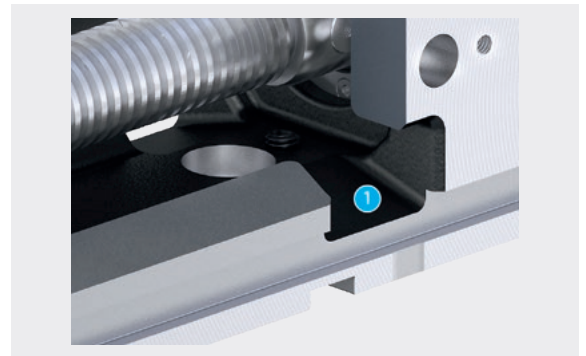
- 1 Drawbar
- 2 Outer spindle



Drainage slots

Coolant and chips can be drained out easily via inclined drainage slots.

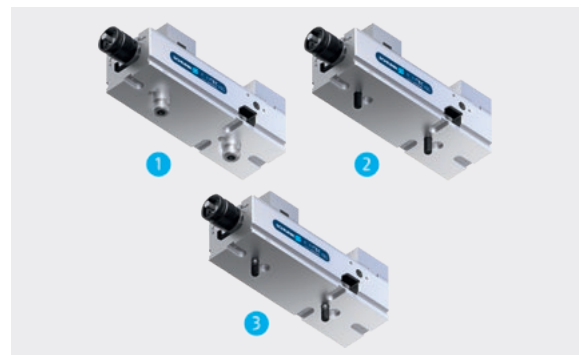
- 1 Drainage slot

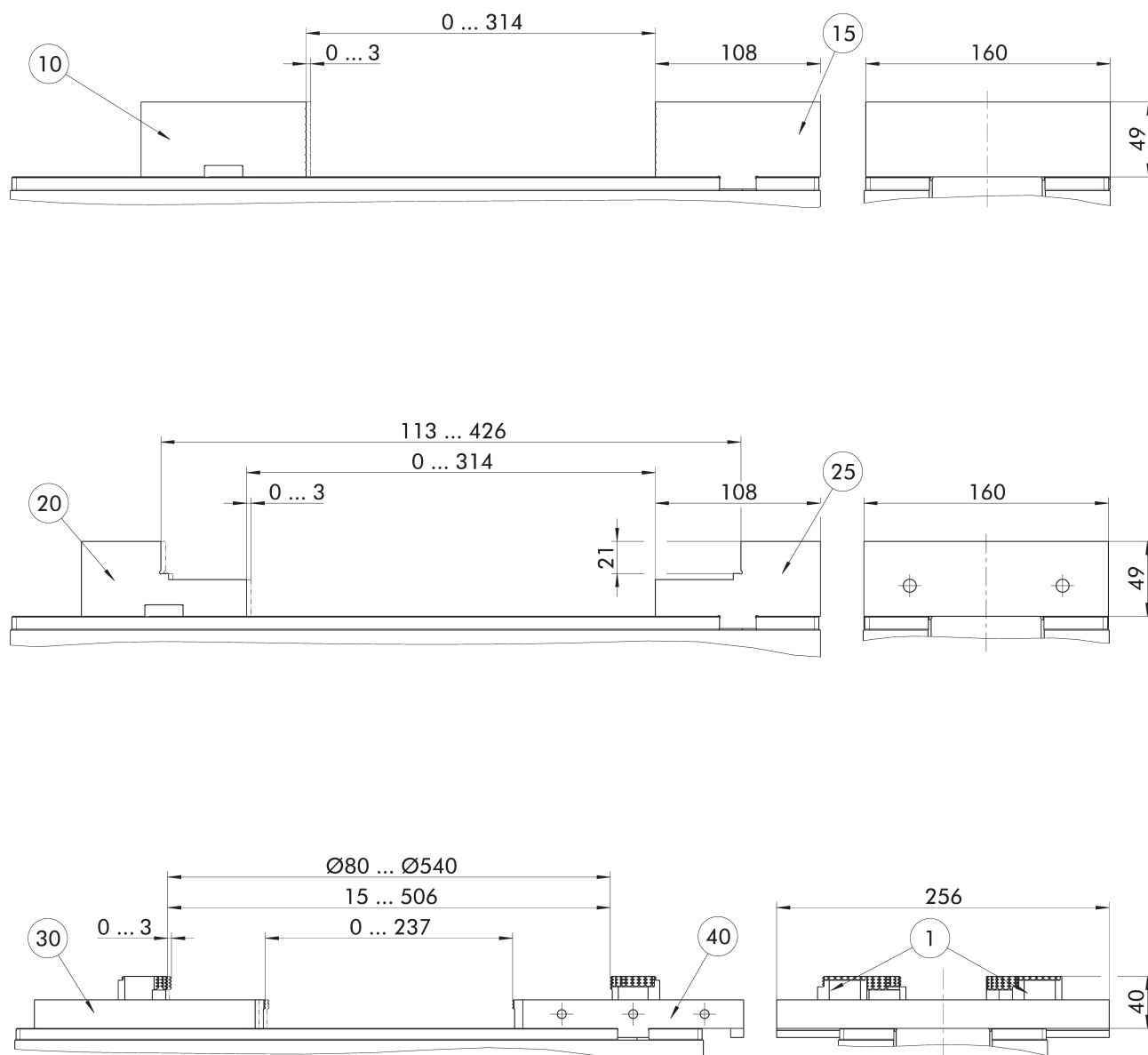


Mounting options

The KSG offers several options for mounting on the machine table, all of which are built into the clamping vise. The vise can be used for minimizing the set-up time. It can be mounted on the NSE3 or GFD quick-change pallet modules using the previously prepared quick-change interface. Alternatively, the vise can be build up using two screws, or for positional orientation using set screws.

- 1 Mounting via quick-change pallet system
- 2 Mounting via two screws
- 3 Mounting for positional orientation using fitting screws





Suitable system jaws with position number on the next page.
Subject to technical changes.

- ① 6-way reversal grip jaw (ID 0430803), 6-way reversal carbide grip jaw (ID 1395550)

Technical data

Description	ID	Vise included	Width of the clamping vise [mm]	Clamping force [kN]	Weight [kg]
KSG 160	0430315	Monoblock jaws	160	4 - 40	70
KSG VS 160	0430316	Reversal jaws	160	4 - 40	68
KSG R 160	0430809	Swivel and adapter plates	160	4 - 40	68

Scope of delivery

Vise, system jaws, clamping claws, clamping lever, operating manual

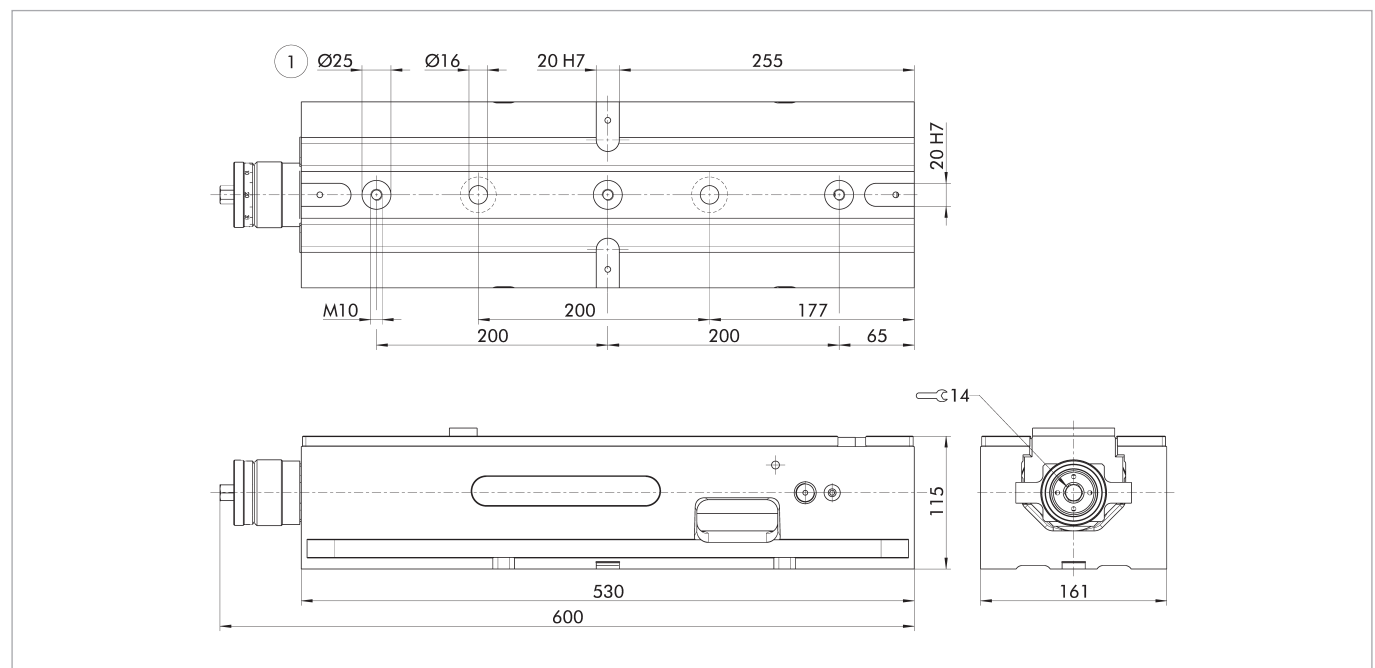
Note

System jaws

The clamping devices are always equipped with the corresponding system jaws.

Suitable system jaws

Description	Pos.	Description	ID	Width [mm]	Depth [mm]	Height [mm]	Weight [kg]
Monoblock jaw	10	SGBB-B 160-108-49	0430166	160	108	49	5.9
Monoblock jaw	15	SGBB-F 160-108-49	0430165	160	108	49	6.7
Reversible jaw	20	SGWB-B 160-108-49	0430044	160	108	49	4.2
Reversible jaw	25	SGWB-F 160-108-49	0430043	160	108	49	4.6
Swivel plate	30	SGP-1 256-170-22	0430173	256	170	22	7.2
Adapter plate	40	SGA-1 256-170-22	0430172	256	170	22	7.6



① Prepared for NSE3 and GFD clamping pins

System jaws

Monoblock jaw

Design as movable jaw.
One side smooth, one side slotted.



Suitable for	Description	Interface	ID
KSG 160	SGBB-B 160-108-49	W-160	0430166

Monoblock jaw

Design as fixed jaw.
One side smooth, one side slotted.



Suitable for	Description	Interface	ID
KSG 160	SGBB-F 160-108-49	W-160	0430165

Reversible jaw

Design as movable jaw.
One side smooth, one side with step for an enlarged clamping range.



Suitable for	Description	Interface	ID
KSG 160	SGWB-B 160-108-49	W-160	0430044

Reversible jaw

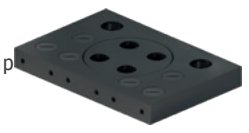
Design as fixed jaw.
One side smooth, one side with step for an enlarged clamping range.



Suitable for	Description	Interface	ID
KSG 160	SGWB-F 160-108-49	W-160	0430043

Swivel plate

Used – in combination with adapter plates and 6-way reversal jaws – to clamp bulky workpieces.



Suitable for	Description	Interface	ID
KSG 160	SGP-1 256-170-22	W-38	0430173

Adapter plate

Used – in combination with swivel plates and 6-way reversal jaws – to clamp bulky workpieces.



Suitable for	Description	Interface	ID
KSG 160	SGA-1 256-170-22	W-38	0430172

Top jaws

6-way reversible jaws grip

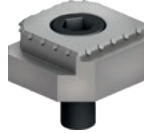
With five grip steps as well as a coated clamping face.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBG-6W 38-38-18	38.5	18	38.2	W-38	0430803

6-way reversible jaw carbide grip

With five carbide grip steps as well as a smooth clamping face.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBCG-6W 38-38-18	38.5	18	38.2	W-38	1395550

Jaw profiled

For increasing the friction between jaw and workpiece without clamping impressions.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBD 160-50-13.5	160	50	13.5	W-160	1373350

Serrated jaw

For increasing the friction between jaw and workpiece with minimal clamping impressions.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBC 160-50-14.4	160	50	14.4	W-160	1373269

Ground jaw

With a completely ground clamping face.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBP 160-50-13.5	160	50	13.5	W-160	1373281

Soft jaw

Hardenable jaws for rework at the customer site, e.g. for incorporating contours or special shapes.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBW 160-50-20	160	50	20	W-160	1373289

Stepped jaw

With ground step, 8 mm.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBS 160-50-13.5-8	160	50	13.5	W-160	1373328

Stepped jaw

With coated step, 5 mm.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBS-W 160-50-13.5-5	160	50	13.5	W-160	1395511

Stepped jaw

With grip step, 3 mm.
For embossed clamping of unhardened materials up to 22 HRC.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBS-G3 160-50-13.5	160	50	13.5	W-160	1373332

Stepped jaw

With grip step, 5 mm.
For embossed clamping of unhardened materials up to 22 HRC.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBS-G5 160-50-13.5	160	50	13.5	W-160	1373335

Stepped jaw

With grip step, 8 mm.
For embossed clamping of unhardened materials up to 22 HRC.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBS-G8 160-50-13.5	160	50	13.5	W-160	1373340

Stepped jaw

With carbide grip step, 3 mm.
For embossed clamping of hardened materials up to 58 HRC.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBS-CG3 160-50-13.5	160	50	13.5	W-160	1431232

Stepped jaw

With carbide grip step, 5 mm.
For embossed clamping of hardened materials up to 58 HRC.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBS-CG5 160-50-15.5	160	50	15.5	W-160	1431233

Stepped jaw with T-slot

With grip step, 5 mm.
T-slot for mounting the positioning strip.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBS-G5-T 160-50-20	160	50	20	W-160	0430250

Stepped jaw with T-slot

With grip step, 8 mm.
T-slot for mounting the positioning strip.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBS-G8-T 160-50-20	160	50	20	W-160	0430249

Positioning bar

To suit all stepped jaws with T-slot.



Description	Width mm	Height mm	Depth mm	Interface	ID
GPL 160-32-13.5	160	32	13.5	W-160	0430251

Grip jaw

For embossed clamping of unhardened materials up to 22 HRC.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBG 160-50-13.5	160	50	13.5	W-160	1373285

Prism jaw, ground

For precise clamping of round workpieces.
100 = Ø11 - Ø41 mm.
125 = Ø14 - Ø48 mm.
160 = Ø16 - Ø60 mm.



Description	Width mm	Height mm	Depth mm	Interface	ID
GVA 160-50-19.5	160	50	19.5	W-160	1373345

Intermediate jaw with slot

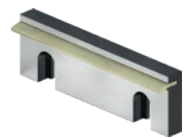
Floating version for clamping of two workpieces in one set-up. Both sides are prepared for mounting spring plates or top jaws.



Description	Width mm	Height mm	Depth mm	Interface	ID
GFA-Z 160-50-20	160	50	20	W-160	0430162

Spring leaf pull-down jaw

For an active jaw pull-down function with a light clamping impression on the workpiece for more precise machining results.



Description	Width mm	Height mm	Depth mm	Interface	ID
GFA 160-50-13.5	160	50	13.5	W-160	1373306

Spring plate pull-down jaw

For an active jaw pull-down function without clamping impressions on the workpiece for more precise machining results.



Description	Width mm	Height mm	Depth mm	Interface	ID
GFB 160-49-12	160	49	12	W-160	0430266

Precision pull-down jaw

For an active jaw pull-down function without clamping impressions on the workpiece for more precise machining results.



Description	Width mm	Height mm	Depth mm	Interface	ID
GBN-P 160-50-27.5	160	50	27.5	W-160	0430148

Accessories

Clamping force tester

For measuring the jaw clamping force of stationary clamping devices.



Suitable for	Description	ID
KSG 160	IFT SST Set	1475766

Standard clamping pins

Clamping pin for positive connection with NSE3 clamping modules.
With shortened fastening screw.



Suitable for	Description	ID
KSG 160	SPA 40-K	0432369
KSG 160	SPB 40-K	0432370
KSG 160	SPC 40-K	1327450

Clamping pin GFD-SP

Clamping pin for positive connection with GFD set-up stations.



Suitable for	Description	ID
KSG 160	GFD-SP 40	0433600

Clamping lever

For convenient actuation of KONTEC vises.



Suitable for	Description	ID
KSG 160	GSH-1 SW14	0430201

Quick adjustment

For fast and convenient adjustment of the clamping range.



Suitable for	Description	ID
KSG 160	GSV-KSG 125/160	0430170

Spindle nut

For fast and easy exchange of already existing spindle nuts.



Suitable for	Description	ID
KSG 160	GSDM-KSG 160	0430807

Force box

Mechanical force box for quick and easy replacement of force boxes that are already present.



Suitable for	Description	ID
KSG 160	GKK-KSG 160	0430222

Spindle assembly group

For fast and easy exchange of already existing spindles.



Suitable for	Description	ID
KSG 160	GSBG-KSG 160	1377162

Coupling pin

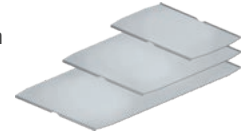
Used for quickly and easily connecting the spindle assembly group to the force box.



Suitable for	Description	ID
KSG 160	GKB-KSG 125/160	0430564

Cover plates

To protect the open spindle opening from falling chips.



Suitable for	Description	ID
KSG 160	GAB-KSG 160	0430557

Workpiece stop

Workpiece stop with minimum space requirements and continuously adjustable stop slide.
Including stop slider 40 and 80 mm.



Suitable for	Description	ID
KSG 160	GWSA M8-46	1645260

Magnetic workpiece stop, small

For quick and easy attachment to system jaws or vises.



Suitable for	Description	ID
KSG 160	GWSA-M 60 x 15	1391293

Magnetic workpiece stop, large

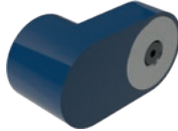
For quick and easy attachment to system jaws or vises.



Suitable for	Description	ID
KSG 160	GWSA-M 115 x 15	1391331

Extensions

As an accessory for the magnetic workpiece stops.



Suitable for	Description	ID
KSG 160	GWSA-V Ø68 x 30	1394477

Clamping screws for clamping claws

Used in combination with clamping claws for fastening clamping devices.



Suitable for	Description	T-slot	ID
KSG 160	GSC-S M10-T12	12 mm/M10	0432043
KSG 160	GSC-S M12-T14	14 mm/M12	0432044
KSG 160	GSC-S M14-T16	16 mm/M14	0432045
KSG 160	GSC-S M16-T18	18 mm/M16	0432046
KSG 160	GSC-S M16-T20	20 mm/M16	1550423
KSG 160	GSC-S M16-T22	22 mm/M16	1550424

Fitting screws

For precise position orientation and mounting of manual clamping vises on the machine table.



Suitable for	Description	ID
KSG 160	GPSC-1 Ø16g5-M16	0490640

Fitting shoulder screws

For precise position orientation and mounting of manual clamping vises on the machine table.



Suitable for	Description	ID
KSG 160	GPSC-S Ø16k7-Ø12f7-M12	0430243

Precision T-nuts

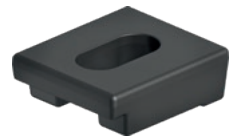
Suitable for all conventional T-groove widths of machine tables.



Suitable for	Description	T-slot	ID
KSG 160	GPN M6-T12	12 mm/M6	0490590
KSG 160	GPN M6-T14	14 mm/M6	0490547
KSG 160	GPN M6-T16	16 mm/M6	0490548
KSG 160	GPN M6-T18	18 mm/M6	0490587
KSG 160	GPN M6-T20	20 mm/M6	1359734
KSG 160	GPN M6-T22	22 mm/M6	0490621

Clamping claws

For quick and easy mounting of SCHUNK clamping devices.



Suitable for	Description	ID
KSG 160	GSPR-A 50-57	0490604

Cover screw

Used to cover unused clamping insert mounting holes on pendulum and adapter plates.



Suitable for	Description	ID
KSG 160	GCS Ø22-M12	1307880

Workpiece Supports Set**Set of workpiece supports – width 160 mm**

Suitable for system jaws H = 50 mm. Heights = 15, 30, 40, 45, and 47 mm.



Suitable for	Description	ID
KSG 160	GWU-S 160-50	1394231

Workpiece supports

Workpiece supports – width 160 mm

In different heights.

1 Set = 2 pieces



Suitable for	Description	Height mm	ID
KSG 160	GWU-M 160-15	15	1464957
KSG 160	GWU-M 160-22	22	1461402
KSG 160	GWU-M 160-30	30	1538303
KSG 160	GWU-M 160-37	37	1443672
KSG 160	GWU-M 160-40	40	1504993
KSG 160	GWU-M 160-41	41	1597020
KSG 160	GWU-M 160-42	42	1410170
KSG 160	GWU-M 160-43	43	1534944
KSG 160	GWU-M 160-44	44	1484499
KSG 160	GWU-M 160-45	45	1410169
KSG 160	GWU-M 160-46	46	1497132
KSG 160	GWU-M 160-47	47	1410166



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