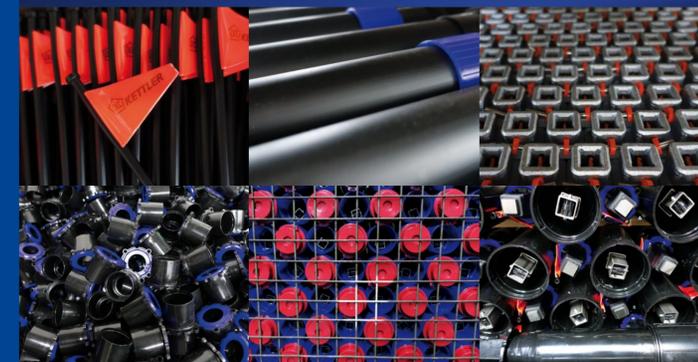


KIT

TELESCOPIC-SPINDLE-SYSTEM

- ▶ Suitable for all types of valves
- ▶ Applicable to nominal sizes up to DN 300
- ▶ For cover depths between 1 m and 6 m
- ▶ Enclosed, dirt tight system
- ▶ Steplessly adjustable in height
- ▶ Retroactive extension possible
- ▶ Lateral moveability by use of angle-modules
- ▶ Optional valve position indicator



- ▶ Significantly less storage capacities needed due to less types of telescopes
- ▶ Maximised flexibility by using a modularised system
- ▶ Steady advancement in construction due to individual customisation
- ▶ Maximised longevity due to high quality material and production



KIT TELESCOPIC-SPINDLE-SYSTEM



Phone +49 (0)2369 9182-0 • Fax +49 (0)2369 9182-91

KETTLER GmbH • Köhlerstraße 8 • D-46286 Dorsten-Wulfen • info@kettlerweb.de • www.kettlerweb.de/en/



KIT-Extensions

To extend service and gate valve KIT-Telescopes

By simply mounting KIT-Extension on the head of the KIT-Telescope and locking it, cover depth can be adjusted retroactively and quickly by up to 500 mm without the use of any tools.

KIT-MEMO-Extensions

Mechanical open/shut indicator

At the top of KIT-Extension, mechanics indicate the open or shut position of the valve by colour and are protected against manipulation after assembly. KIT-MEMO is available for valves with a minimum of 5 and a maximum of 56 revolutions.

KIT-MEMO-Telescopes

Mechanical open/shut indicator

At the top of KIT-MEMO-Telescope, mechanics indicate the open or shut position of the valve by colour and are protected against manipulation after assembly. KIT-MEMO is available for valves with a minimum of 5 and a maximum of 56 revolutions.

KIT-Telescope for service valves

Telescopic spindle extension to operate tapping bridges

KIT-Standard-Telescopes, as well as KIT-Multi-Telescopes, feature a detachable bell tube and a spring connection piece at the bottom end of the spindle extension. This system enables the use of a variety of coupling sockets of different shapes and nominal sizes, as well as a range of coupling and/or angle-modules. By use of dirt disks and adaptors the system is applicable to most valve designs.

KIT-Quality attributes

Guarantee of great resilience and longevity

All pipes and rods of structural steel used in the construction of KIT-Telescopes, coupling modules and extensions are covered in molten zinc applied at a temperature of 450°C which prevents premature corrosion. For valves with higher torque demands stainless steel material is used. The special geometry of all malleable cast iron components secure a reliable and durable torque transmission. PE, PP, PA and other plastic components are produced from virgin material. Each and every one of those attributes guarantee maximum resilience and longevity far beyond the minimum requirements demanded by law.

KIT-Coupling-Modules

For extending the total length of all KIT-Telescopes

By use of coupling modules, all KIT-Telescopes can be extended beyond their maximum length to fit every desired cover depth. There are three different coupling module sizes available which are combinable with each other by simply plugging them together. Tool-free. With this system even the most extreme construction situations can be overcome with ease. By keeping a number of different coupling module sizes in stock the variety of telescopes can be reduced significantly, maximising your stock turnover rate and flexibility at the construction site. For quick disassembly, a dismantling tool can be provided. All KIT modules are then reusable.

KIT-Angle-Modules

For lateral alignment of KIT-Telescopes in complicated construction situations

Where valves were laid over by pipes or cables, centred positioning of a telescopic spindle extension may be hindered. KIT-Angle-Module allows for convenient lateral alignment (s. fig.). A variety of operating heads allow direct operation, even without combination with a telescope for shallow cover depths.

KIT-Coupling-Sockets

Connection between KIT operating rods and valves of different design and nominal sizes

Each KIT-Coupling-Socket and connection piece is designed with a 25 mm square drive and 7 mm bore holes to match all KIT-Telescopes, KIT-Multi-Telescopes as well as all available KIT-Angle and KIT-Coupling modules. For convenient disassembly, a dismantling tool can be provided. All KIT modules are then reusable.

KIT-Dirt disks and bell tube adaptors

Valve specific 100% dirt tight fit

Dirt disks and adaptors match the valve in an ideal way and additionally stabilise the spindle extension. Both are assembled with ease by simply locking them onto the KIT universal bell tube.

KIT-Duplex-Sockets

Quick-release system

Tool-free assembly and disassembly of KIT-Coupling-Sockets onto all square valve spindles up to DN 300 by simple plug-on mechanics.

KIT-Marking-Clip

Colourised clips to mark different carrier pipes. Also available in black and magnetic for easier ranging of KIT-Telescopes using a metal detector.

KIT-Drive plates and fixation clips

To centre and lock KIT-Telescopes into position on carrier plates and in surface boxes.

KIT-Marking-Flag

Orange reflective flag

Prevent the telescopes from being accidentally run over by construction vehicles and ease localisation of KIT-Telescopes during construction of roads and pavements before completion.

KIT-Locking ring

Securely fasten KIT telescopes at any extension height

By turning the locking ring 180° the KIT-Telescope can be secured at every desired length. This also prevents an unintentional drop of the telescopic spindle extension in an unsecured state.

KIT-Telescope for gate valves

Telescopic spindle extension to operate heavy gate valves, butterfly valves and ball valves

KIT-Standard-Telescopes, as well as KIT-Multi-Telescopes, feature a detachable bell tube and a spring connection piece at the bottom end of the spindle extension. This system enables the use of a variety of coupling sockets of different shapes and nominal sizes, as well as a range of coupling and/or angle-modules. By use of dirt disks and adaptors the system is applicable to most valve designs.

KIT-Multi-Telescope for service valves & gate valves

Telescopic spindle extension for extremely shallow cover depths

In their shortest position KIT-Multi-Telescopes may be applied to shallow cover depths of about 60cm. However by using a 3-piece spindle and a 4-piece protective tube it can be extended to cover depths of 1m and longer, depending on valve design. The universal bell tube that is included with each KIT-Telescope as well as each KIT-Multi-Telescope allows easy application of a wide range of dirt disks and adaptors, enabling an ideal fit to most valve designs. Customised to your situational requirements.

KIT-Flex-Angle-Modules

For axial alignment of KIT-Telescopes

Where a valve is located on a slope or laid at an angle, perpendicular positioning of a telescopic spindle extension may be hindered. KIT-Flex-Angle overcomes this problem by enabling axial alignment to balance skew positioning by up to 40°.

KIT-Extensions

for service valves	Structural Steel	Sales No.
Extension up to 140 mm	VTV 00 001	
Extension up to 140 mm	VTV 00 002	
Extension up to 140 mm	VTV 00 003	
Extension up to 140 mm	VTV 00 004	

KIT-MEMO-Extensions

Extension	Structural Steel	Sales No.
bis 140 Nm	VTV 00 008	
bis 300 Nm	VTK 00 029	
bis 140 Nm	VTV 00 010	
bis 300 Nm	VTK 00 030	

KIT-Marking-Clip

for service valves	Magnetic	Blue	Yellow	Red
TSE 00 155	TSE 00 017	TSE 00 018	TSE 00 019	

KIT-Telescopes

for service valves	Structural Steel	Sales No.
KIT-Multi-Telescope TL 0.37 - 0.76 m CD 0.60 - 1.00 m	TSV 00 001	
KIT-Telescope TL 0.59 - 0.93 m CD 0.90 - 1.20 m	TSV 00 004	
KIT-Telescope TL 0.74 - 1.23 m CD 1.00 - 1.50 m	TSV 00 002	
KIT-Telescope TL 0.89 - 1.52 m CD 1.20 - 1.80 m	TSV 00 003	

KIT-Telescopes

for gate valves	Structural Steel	Sales No.
KIT-Telescope TL 0.47 - 0.72 m CD 0.90 - 1.20 m	TSK 00 010	
KIT-Telescope TL 0.62 - 1.03 m CD 1.00 - 1.50 m	TSK 00 009	
KIT-Telescope TL 0.77 - 1.32 m bis 300 Nm CD 1.20 - 1.80 m	TSK 00 018	

KIT-MEMO-Telescopes

for gate valves	Stainless Steel	Model A for adaptor	Model B with locking strap
KIT-MEMO-Telescope GL 0.55 - 0.73 m RD 0.70 - 0.95 m RD 1.10 - 1.35 m	MSK 00 061	MSK 00 062	
KIT-MEMO-Telescope GL 0.66 - 1.06 m RD 0.80 - 1.20 m RD 1.25 - 1.65 m	MSK 00 063	MSK 00 064	
KIT-MEMO-Telescope GL 0.90 - 1.35 m RD 1.10 - 1.55 m RD 1.55 - 2.00 m	MSK 00 065	MSK 00 066	
KIT-MEMO-Telescope GL 1.04 - 1.62 m RD 1.20 - 1.80 m RD 1.65 - 2.25 m	MSK 00 067	MSK 00 068	

KIT-Coupling-Modules

for service & gate valves	Structural Steel	Sales No.
large, TL 1.10 m	up to 500 Nm	TSE 00 111
medium, TL 0.73 m	up to 500 Nm	TSE 00 110
small, TL 0.36 m	up to 500 Nm	TSE 00 109

KIT-Angle-Modules

Model A - Dirt disk and fix bell tube	Stainless Steel	Sales No.
large, H 750 mm / R 340 mm	300 Nm up to DN 150	TSE 00 180
medium, H 630 mm / R 220 mm	300 Nm up to DN 150	TSE 00 181
small, H 515 mm / R 110 mm	300 Nm up to DN 150	TSE 00 179

KIT-Angle-Operating-Heads

For testing functionality	Stainless Steel	Sales No.
for service valves H 130 mm	without spring connection piece	TSE 00 236
for gate valves H 140 mm	without spring connection piece	TSE 00 331

KIT-Coupling-Sockets

tool-free	External square, conical	Sales No.
for service valves DN 40/50	□ = 12.3 mm	TSE 00 250
DN 65/80	□ = 14.3 mm	TSE 00 251
DN 100/150	□ = 17.3 mm	TSE 00 252
DN 175/200	□ = 19.3 mm	TSE 00 253
DN 250/300	□ = 24.3 mm	TSE 00 254
	□ = 27.3 mm	TSE 00 255

KIT-Butterfly-Casting

with notch, for drive shaft	Sales No.
16 mm	KPM 00 066
18 mm	KPM 00 244
20 mm	KPM 00 287
22 mm	KPM 00 246
25 mm	KPM 00 245
30 mm	KPM 00 344

KIT-Galvanic Isolator

External square	Sales No.
20 mm	TSE 00 034
25 mm	TSE 00 035
30 mm	TSE 00 170

KIT-Universal-Dirt-Disks A

Sales No. EKE 01 000

VAS | AVK: Mittelmann Tapping Saddle EWE: Ball Valve Tapping Fitting, Valve Tapping Fitting, Kera Tapping Fitting FOMM: FD410V, FD413V, SG1.3, SG2.1, SP4.2, SP4.3, SP 4.5, SK5.2, SH6.2 HAWLE: Service Valves, Hawlinger, HAKU Keulahütte GmbH: KH210GR, KH220GR, KH221GR, KH230GR, KH310, KH310F, KH321, KH321F RC Mannesmann (Mamibs): Screw Angle Valve (110, 113, 130, 310, 313, 410, 413, 430) Rehbein: Renikrust Valve Top type RV, RVK, MV Talis-Schmieding: Z,ZK, ZK-P, ZG, ZG-P, Z-Flex, Z-Flex-P VAG: Terra-K, Terra-M Voigt: Model 05.01, 05.02 von Roll hydro: AWP, all without screw thread top Talis Erhard: ABS-P Premium

KIT-Goblet-Socket

Hexagon TSE 00 027

KIT-Extension Adaptor

Sales No. TSE 00 287

for galvanic isolator (installation height 80 mm)

Required when using KIT-Galvanic Isolator.

KIT-Universal-Dirt-Disks B

Sales No. EKE 01 002

VAS | AGRU-FRANK: Pressure Tapping Valve Beulcor: Gate Valve Model 8010, 8020, 8030, 8040, 8350, 8111, 8121, 8141, 8012 Dükers: Type 1004, 04.09, TOP1014, Friatesc DN 110, Friatesc Pressure Tapping Valve 90-225, Pressure Tapping Valve, Friatesc 63/40, Friatesc Pressure Tapping Valve D50-75 Georg Fischer: GF-Pressure Tapping Valve Plasson: Plass 360 VAG Pressure Tapping Valve

KOS DN 40 - DN 150 | AVK Mittelmann: Series 01, 02, 06, 12, 20, 32, 33, 36 Dükers: Type 2004, 3004, 4004 HAWLE: E2 Keulahütte GmbH: Keul-Valve softsealing Talis-Erhard: Multamed Premium VAG: Beta 200, Beta 300 von Roll hydro: AWP 5007, 5021, 5329, 5228, 5272, 5050, 5054, 5455, 5299, 5460, 5462, 5417, 5420, 5327

AWP Screw Ring for service & gate valves

Sales No. EKE 01 075

Friatesc Ball Valve Adaptor

D 109 mm	Unlocked	Sales No.
DA 40/50	W 60 H 35	EKE 00 155
DA 63/200	W 16 H 5	EKE 00 156

KIT-Universal-Dirt-Disks B

Sales No. EKE 01 002

VAS | AGRU-FRANK: Pressure Tapping Valve Beulcor: Gate Valve Model 8010, 8020, 8030, 8040, 8350, 8111, 8121, 8141, 8012 Dükers: Type 1004, 04.09, TOP1014, Friatesc DN 110, Friatesc Pressure Tapping Valve 90-225, Pressure Tapping Valve, Friatesc 63/40, Friatesc Pressure Tapping Valve D50-75 Georg Fischer: GF-Pressure Tapping Valve Plasson: Plass 360 VAG Pressure Tapping Valve

KOS DN 40 - DN 150 | AVK Mittelmann: Series 01, 02, 06, 12, 20, 32, 33, 36 Dükers: Type 2004, 3004, 4004 HAWLE: E2 Keulahütte GmbH: Keul-Valve softsealing Talis-Erhard: Multamed Premium VAG: Beta 200, Beta 300 von Roll hydro: AWP 5007, 5021, 5329, 5228, 5272, 5050, 5054, 5455, 5299, 5460, 5462, 5417, 5420, 5327

Erhard DSV Disk

Sales No. EKE 01 077

Friatesc Pressure Tapping Valve Disk

for service valves 90-225

Sales No. EKE 01 102

ATTENTION! This list does not claim to be definitive. Before use, accuracy of fit of dirt disk and valve should be examined.

KIT-Multi-Telescopes for service valves CD 0.60 - 1.00 m

with coupling-module	with angle-module
small	medium
medium	large

KIT-Multi-Telescopes for gate valves CD 0.70 - 1.10 m

with coupling-module	with angle-module
small	medium
medium	large

KIT-Telescopes for service valves CD 0.80 - 1.1 m

with coupling-module	with angle-module
small	medium
medium	large

KIT-Telescopes for gate valves CD 0.90 - 1.20 m

with coupling-module	with angle-module
small	medium
medium	large

KIT-Telescopes for service valves CD 1.0 - 1.5 m

with coupling-module	with angle-module
small	medium
medium	large

KIT-Telescopes for gate valves CD 1.0 - 1.5 m

with coupling-module	with angle-module
small	medium
medium	large

KIT-Telescopes for service valves CD 1.2 - 1.8 m

with coupling-module	with angle-module
small	medium
medium	large

KIT-Telescopes for gate valves CD 1.2 - 1.8 m

with coupling-module	with angle-module
small	medium
medium	large

KIT-Angle-Module for service valves incl. operating head

CD = Low tapping bridge built (e.g. swivel plate valve)	CD = High tapping bridge built (e.g. tapping valve)
110 mm small	220 mm medium
220 mm medium	340 mm large

KIT-Angle-Module for gate valves incl. operating head

CD = Valves DN 40 - DN 150	CD = Valves DN 175 - DN 300
110 mm small	220 mm medium
220 mm medium	340 mm large

ATTENTION! All cover depths (CD) are approx. dimensions and depend on the built of the valve. This means they can vary up to 20 cm within nominal sizes.

Assembly instructions can be found at: www.kettlerweb.de

As of 10.2022 Technical revision and misapprehensions reserved