## For tension tests ≤ 500 N



#### Long clamp for tension and rupture tests up to 50 N, clamping width: 3 mm, thread: M6



AC 01

€ 105,-

2 pieces



# Angle bracket for tension and rupture tests up to 500 N

For tension tests ≤ 5000 N

AC 12 Parallel jaw grip € 78.for tension and rupture tests up to 5 kN, 2 pieces clamping width: 5 mm, thread: M10



# (e.g. for cable tests), clamping width: 22 mm, thread: M6



High capacity small clamp for tension and rupture tests up to 5 kN,

clamping width: 5 mm, thread: M10



2 pieces



AC 10S\* Cable fixture € 65,for tension and rupture tests up to 500 N



AC 18 2 wide jaw grip attachment € 125,for tension and extraction tests up to 5 kN, 2 pieces clamping width: 33 mm, thread: M10



AC 14 Fine point clamp for tension and rupture tests up to 500 € 55,-2 pieces N, width 15 mm, clamping width: 4 mm, thread: M6



AC 11 Rolling-clamp attachment for tension and rupture tests up to 5 kN, € 69,-2 pieces thread: M10



Fine point clamp for tension and rupture tests up to 500 N, width 22 mm, clamping width: 4 mm, thread: M6



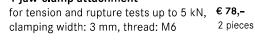




Ring fixture for tension and rupture tests up to 500 N, €65,diameter: 23 mm, thread: M6

2 pieces

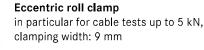
AC 22





Screw tension clamp for 100 N for laboratory tensile force measurements, incl. jaws with pyramid grip, thread: M6

AD 9001 € 990.- 0 2 pieces



AC 41 € 195.-1 piece



Screw tension clamp

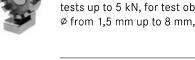
AD 9005 € 570.- **0** 2 pieces

Drum clamp typically for cable connector extraction tests up to 5 kN, for test objects with Ø from 1,5 mm up to 8 mm, thread: M10



for 100 N for laboratory tensile force measurements, incl. jaws with pyramid grip III with adapter structure for AD-system, 2 with M6 thread





AD 9021 € 830.-

AC 42

€ 195,-

1 piece



Screw tension clamp for 100 N for laboratory tensile force measurements with collar joint and jaws with pyramid grip

AD 9016 € 990,- 0 2 pieces

for 1 kN, for tensile force tests, jaws with pyramid grip

10 mm, jaws with pyramid grip

Screw-in tension clamp

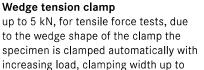


2 pieces



Universal screw tension clamp for tension and compression testing up to 500 N, clamping width: up to 10 mm, jaws with pyramid grips, for

AF 500 € 350.-1 piece



€ 2550,-0 2 pieces



Rope and thread tension clamp up to 1 kN, Suitable for wires up to a diameter of 2 mm, belts up to 7 mm width, incl. jaws with rubberised surface AD 9120 € 900,-

2 pieces



Flat jaw attachment

For tension tests ≤ 5000 N

further details, see page 39

for tension tests up to 5 kN (e.g. textile, paper etc.), clamping width: 4 mm, thread: M6 AC 03 € 115,-2 pieces



Universal screw tension clamp

for tension and compression testing up to 2 kN, clamping width: up to 30 mm, jaws with pyramid grips, rapid adjustment to a variety of test objects thanks to the flexible clamping width, for further details, see page 40

AE 2K € 610,-1 piece



Grip clamp attachment

for insertion and pull tests up to 5 kN, clamping width: 6 mm, thread: M6

AC 09 € 85,-2 pieces

Price reduction

### For tension tests ≤ 5000 N



#### Rope and thread tension clamp

up to 5 kN, for clamping belts, ropes, wires, etc. Suitable for wires up to a diameter of 5 mm, belts up to 8 mm. jaws with pyramid grip



AD 9205

€ 720,-

2 pieces

AD 9206

€ 1080,-

2 pieces



#### Quick clamp

For tension tests > 5000 N

for high capacity tensile tests up to 30 kN, due to the wedge shape of the clamp the specimen is clamped automatically with increasing load,

clamping width: 8 mm, thread: M10

AC 38 € 1010,-1 piece



#### Roller tension clamp

up to 1 kN, can clamp on one side and eccentrically. suitable for tensile force tests with belts or any other soft, flexible, flat material with a maximum sample thickness of 7 mm, incl. rollers with pyramid grip, the opposite clamping surface is smooth.

Suitable for test objects up to 50 mm width



#### Wedge tension clamp

up to 10 kN, for tensile force tests, due to the wedge shape of the clamp the specimen is clamped automatically with increasing load, clamping width 10 mm, jaws with pyramid grip



AD 9085



#### Roller tension clamp

up to 1 kN, can clamp on one side and eccentrically. Suitable for tensile force tests with belts or any other soft, flexible, flat material with a maximum sample thickness of 7 mm, incl. rollers with smooth surface, the opposite clamping surface is rubberised.

Suitable for test objects up to 50 mm width



#### Wedge tension clamp

up to 10 kN, for tensile force tests, due to the wedge shape of the clamp the specimen is clamped automatically with increasing load, clamping width 8 mm, jaws with pyramid grip

AD 9090 € 3030,-

2 pieces





up to 5 kN, symmetrisch und exzentrisch tests with belts or any other soft, flexible,

AD 9200 € 2550,-0

2 pieces





for tension and compression testing up to 10 kN, clamping width: up to 75 mm, jaws with pyramid grips, rapid adjustment to a variety of test objects thanks to the flexible clamping with ball locking pin, for further details, see page 41

Universal screw tension clamp

**AE 10K** € 790,-

1 piece



## Roller tension clamp

spannend. Suitable for tensile force flat material with a maximum sample thickness of 7 mm, incl. rollers with pyramid grip



#### Wedge tension clamp

up to 20 kN, for tensile force tests, builds up tensile force automatically by its wedge shape, clamping width 10 mm, jaws with pyramid grip

AD 9100 € 4320,-

2 pieces



## Roller tension clamp

up to 5 kN, can clamp on one side and eccentrically. Suitable for tensile force tests with belts or any other soft, flexible, flat material with a maximum sample thickness of 7 mm, incl. rollers with pyramid grip, the opposite clamping surface is smooth. Suitable for test objects up to 50 mm width

2 pieces

AD 9207

€ 1060,-0



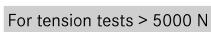
#### Wedge tension clamp

up to 20 kN, for tensile force tests, builds up tensile force automatically by its wedge shape, clamping width 13 mm, jaws with pyramid grip

AD 9095 € 3420,-

2 pieces







Flat clamp with undulated jaws clamping width: 6 mm, thread: M10 up to 10 kN

AC 31\* € 99,- 🛈 1 piece



#### Wedge tension clamp

up to 50 kN, for tensile force tests, builds up tensile force automatically by its wedge shape, clamping width 13 mm, jaws with pyramid grip

AD 9096 € 5040,-2 pieces



### Wide jaw clamp with fixed jaws

with high-performance inner jaws out of steel, jaws with pyramid grip clamping width: 7 mm, thread: M10 up to 10 kN

AC 04 € 199,-1 piece



#### Universal wedge tension clamp

for tension and compression testing up to 50 kN, clamping width: up to 15 mm, jaws with pyramid grips, rapid adjustment to a variety of test objects thanks to the flexible clamping width, for further details, see page 42

**AE 50K-K** € 2150,-1 piece

#### For tension tests > 5000 N



#### Belt tension clamp

up to 20 kN, open at one end, suitable for tensile force tests with belts or any other soft, flexible, flat materials with a maximum sample thickness of 2,5 mm a test object width up to 22 mm







#### Belt tension clamp

up to 20 kN, suitable for tensile force tests with belts or any other soft, flexible, flat materials with a maximum sample thickness of 2,5 mm a test object width up to 80 mm





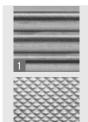


#### Belt tension clamp

up to 50 kN, suitable for tensile force tests with belts or any other soft, flexible, flat materials with a maximum sample thickness of 2,5 mm a test object width up to 80 mm







All premium clamps can be customised and, as an option, are available with the following types of jaw finish: 11 undulating or 22 pyramid-shaped.

For further information, please contact us or have a look on our website at www.sauter.eu

# For compression tests > 500 N



#### Concave force sensor

with optimised radius for the measurement particularly of arms and legs up to 1 kN, thread: M6

AC 45 € 135.-1 piece



#### Flat square-shaped sensor

for lateral power sensing of back, chest or arm up to 1 kN, thread: M6

AC 46 € 90.-1 piece



#### Round sensor

to measure particular muscle groups, such as, for example, the shoulder up to 1 kN. inner thread: M6

AC 47 € 95,-1 piece

## For compression tests > 500 N



#### Pressure disc

out of aluminium, thickness 10 mm, for compression tests up to 5 kN, diam. 110 mm, outer thread: M12

AFH 06 € 110.-2 pieces



#### Pressure disc

for compression tests up to 5 kN (e. g. plastics), Ø 49 mm, inner thread: M10

€ 55,-2 pieces

AC 08



#### Stainless steel ball-shaped head

for compression and fracture tests up to 5 kN, (e.g. foam, glass), thread: M6/M10

AC 02 € 55,-

2 pieces



### Small 3-point bending device (steel)

up to 10 kN, central scale 80-0-80 mm. Consisting of one support beam, two support brackets and a curved fin each with permanently fixed radii, radius of the fin 3,2 mm, radii of the support brackets 3,2 + 5 mm, other radii on request. Gap between the two support brackets

4-150 mm. Width of the brackets 30 mm

AD 9300 € 1530,-

1 piece





#### Small 3-point bending device (anodised aluminium)

up to 2,5 kN, central scale 80-0-80 mm. Consisting of one support beam, two support brackets and a curved fin each with permanently fixed radii, radius of the fin 3,2 mm, radii of the support brackets 3,2 + 5 mm, other radii on request. Gap between the two support brackets

4-150 mm. Width of the brackets 30 mm

AD 9305 € 1350,-

1 piece





## Small 3-point bending device (steel)

up to 10 kN, central scale 80-0-80 mm. Consisting of one support beam, two support brackets and a curved fin with interchangeable radii rollers, radius of the fin 5 mm, radii of the support brackets 5 + 10 mm, other radii on request. Gap between the two support brackets 4-150 mm. Width of the brackets 30 mm AD 9310 € 1530,-1 piece





#### Small 3-point bending device (anodised aluminium) up to 2,5 kN, central scale 80-0-80 mm.

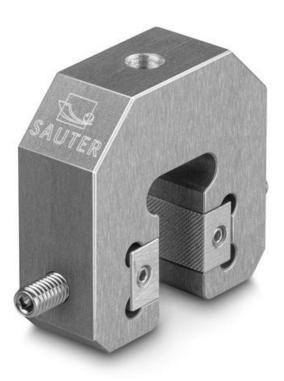
Consisting of one support beam, two support brackets and a curved fin with interchangeable radii rollers, radius of the fin 5 mm, radii of the support brackets 5 + 10 mm, other radii on request. Gap between the two support brackets 4-150 mm. Width of the brackets 30 mm

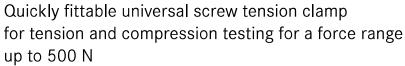


AD 9315

€ 1350,-

1 piece





#### **Features**

- High-quality screw tension clamp in the lower force range with an enormous flexibility for a fast adaptation to a wide variety of test objects
- Solid version for high clamp forces
- Flexible clamping width (width between the jaws) from 0-10 mm
- You can choose between different types of jaws
  - ■ Jaws with pyramid grip as standard, W×H 32×20 mm
  - Jaws with undulating grip, as well as special designs, available as options, please ask for details
- The modular construction enables a quick adaptation and cleaning of the clamp

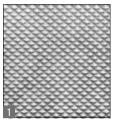
- By means of the threaded rods with a hexagon socket, the clamp can quickly be adapted to someone's own requirements, test objects, operation environment, e.g. test stand or force gauge
- Can be used with all SAUTER force measuring devices or test stand systems
- To fix the clamp on a force gauge, there is a M6 thread on the upper side of the clamp
- For tension and compression testing up to 500 N
- Overload protection: 150 % of [Max]
- Scope of supply: 1 clamp with 2 jaws with pyramid-shaped grip
- For dimensional drawing, see www.sauter.eu

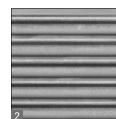














Model	Maximum tensile/compressive force	Range	Scope of supplies	Price excl. of VAT ex works
SAUTER	N	mm		€
AE 500	500	10	1 piece	350,-

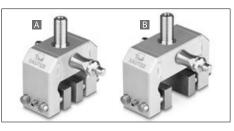




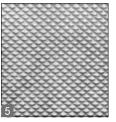


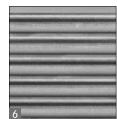












Quickly fittable universal screw tension clamp for tension and compression testing for a force range up to 2 kN

#### **Features**

- High-quality screw tension clamp in the middle force range with an enormous flexibility for a fast adaptation to a wide variety of test objects
- · Solid version for high clamp forces
- Flexible clamping width (width between the jaws) from A 15-30mm (standard) and from
  I5-30mm (in combination with the optional, wide central section: SAUTER AE 2K-A01)
- You can choose between different types of jaws
  - 5 Jaws with pyramid grip as standard, W×H 32×20 mm
- Jaws with undulating grip, as well as special designs, available as options, please ask for details

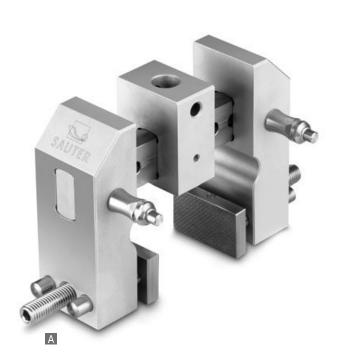
- 1 The modular construction enables a quick adaptation and cleaning of the clamp
- 2 By means of the **practical ball locking pin system**, the clamp can be quickly adapted to ones' own demands, test objects, operational environment, e.g. test stand or force measuring device
- Can be used with all SAUTER force measuring devices or test stand systems
- For tension and compression testing up to 2 kN
- Overload protection: 150 % of [Max]
- Scope of supply: 1 clamp with middle section for widths from 0-15 mm, 1 adapter, 1 locking pin
- · For dimensional drawing, see www.sauter.eu

#### **Accessories**

- Adapter, connection pin between clamp and load cell/measuring device as standard, M12 thread, max. load up to 10 kN, can be reordered at any time,
- SAUTER AE-A01, € 30,-
- Safety pin, stainless steel, with spring system to fix adjustable components, as standard, can be reordered at any time, SAUTER AE-A05, € 45,-
- 4 Wide central section for widths from 15–30 mm, SAUTER AE 2K-A01, € 75,-



Model	Maximum tensile/ compressive force	Range mm		Scope of supplies	Price excl. of VAT
SAUTER	N	A	B (Option)		ex works €
AE 2K	2000	0-15	15–30	1 piece	610,-





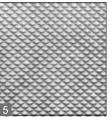


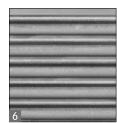












Quickly fittable universal screw tension clamp for tension and compression testing for a force range up to 10 kN

#### **Features**

- High-quality screw tension clamp with enormous flexibility which can be adapted quickly to a wide variety of test objects
- · Solid version for high clamp forces
- Maximum clamping width (width between the jaws): 75 mm, triple lockable A, B, G, can be finely adjusted using threaded rods
- You can choose between different types of jaws
  - Jaws with pyramid grip as standard,
    W×H 49×30 mm
  - Jaws with undulating grip, as well as special designs, available as options, please ask for details

- The **modular design** enables a quick fitting, expansion and cleaning of the clamp
- • By means of the **practical ball locking pin system**, the clamp can be quickly adapted to ones' own demands, test objects, operational environment, e.g. test stand or force measuring device.
- Can be used with all SAUTER force measuring devices or test stand systems
- For tension and compression testing up to 10 kN
- Overload protection: 150 % of [Max]
- Scope of supply: 1 clamp, 1 adapter, 2 safety pins
- · For dimensional drawing, see www.sauter.eu

#### **Accessories**

- 2 Adapter, connection pin between clamp and load cell/measuring device as standard, M12 thread, max. load up to 10 kN, can be reordered, SAUTER AE-A01, € 30,-
- **3 Safety pin,** stainless steel, with spring system to fix adjustable components, as standard, can be reordered, SAUTER AE-AO5, **€ 45,-**
- 4 Long jaws, stainless steel, pyramid grip 2 pcs. W×H 100×30 mm, SAUTER AE-A02, € 70,-

STANDARD

Model	Maximum tensile/ compressive force	Range mm			Scope of supplies	Price excl. of VAT
SAUTER	N	А	В	C		ex works €
AE 10K	10000	43-75	10-43	0-10	1 piece	790,-









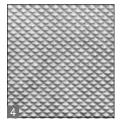












# Quickly adjustable wedge tension clamp for tensile tests for the force range up to 50 kN

#### **Features**

- Quality wedge tension clamp for safe holding of test specimens up to a force of 50 kN, due to the wedge shape of the clamp the test specimen is clamped automatically with increasing load. Thus, longer and protruding objects can be tested
- Thanks to the practical ball locking pin system, the clamp can be quickly adapted to your own requirements, test objects, operating environments, e.g. test bench or measuring device, etc.
- · Solid version for high clamp forces

- Maximum clamping width (width between the jaws): 15 mm
- 4 Jaws with pyramid grip as standard
- Can be used with SAUTER TVS 50K70 and FH 50K
- For train search up to 50 kN
- Overload safety: 150 % of [Max]
- Scope of delivery: 1 clamp, 1 F18 adapter, 1 locking pin
- Dimensioned drawing see www.sauter.eu
- Net weight approx. 12 kg

#### Accessories

- Adapter, connection pin between clamp and load cell/measuring device as standard, F18 thread, max. load up to 50 kN, SAUTER AE-07, € 50,-
- 2 Adapter, connection pin between clamp and load cell/measuring device, M18 thread, max. load up to 50 kN, SAUTER AE-08, € 50,-
- Safety pin, stainless steel, with spring system to fix adjustable components, SAUTER AE-06, € 55,-



Model	Maximum tensile/compressive force	Range	Scope of supplies	Price excl. of VAT ex works
SAUTER	N	mm		€
AE 50K-K	50000	0-15	1 piece	2150,-

#### **Attachments**



Standard attachments kit for all force gauges FA, FH, FL and FC, thread: M6 10-500 N

AC 43 € 45.-6 intems



Standard attachments kit for force gauge FK, thread: M8 10-1000 N

AC 430 € 45,-6 intems



Tensiometer attachment optional for all FK models from FK 10 up to FK 250

FK-A01 € 210,-1 piece



Tensiometer attachment for high-capacity tensile strength tests up for FK 500 and FK 1K

FK-A02 € 295,-

1 piece

## Special solutions



Stainless steel handle bar with rubber grip for safe handling, AFH 04 suitable for FA, FH, FL AFK 02 suitable for FK, FC

AFH 04 € 95,-1 piece

AFK 02 € 95,-1 piece



Stainless steel handle bar with rubber grip for FH, FL with external sensor, thread: M12

AFH 05 € 55,-1 piece



Door tester

Handle (length: 300 mm) and two round force receptor plates (Ø 85 mm) as an option to FH 1K up to FH 5K for the safe testing of clamping forces (not approved to DIN 18650 or similar), up to 5 kN

AFH 03 € 295,-1 piece



Tombstone tester

for testing the stability of tombstones according to VSG 4.7 up to 500 N on the basis of FA (included), Option: ISO calibration 961-161, **€ 135,-**

FA 500G € 350,-1 piece

FL 500G

€ 670,-

1 piece



Tombstone tester

for testing the stability of tombstones according to VSG 4.7 on the basis of FL (included), up to 500 N: FL 500G Option: DAkkS calibration for FL 500G: 963-261, € 135,-

## Interface cables



RS-232/PC connection cable

to connect models from the SAUTER FH range to a PC or a printer

FH-A01 € 46.-1 piece



RS-232/PC connection cable

to connect models from the SAUTER FL, DA range to a PC or a printer

FL-A04 € 46.-1 piece



USB/PC connection cable to connect models from the SAUTER FL,

DA range to a PC or a printer

FL-A01 € 46,-1 piece



RS-232/PC connection cable

to connect models from the SAUTER LB range to a PC

LB-A01 € 360,-1 piece

**AFH 12** € 85,-

1 piece



RS-232/USB adapter

to connect peripherical devices with USB interface, suitable for all balances and measuring instruments with RS 232 output, length 0,95m, scope of supply: adapter, CD with driver



RS-232/PC connection cable

to connect models from the SAUTER FC range to a PC or a printer

€ 46,-1 piece

FC-A01

## Other



Carrying strap

for easy and safe transportation of the tombstone tester during the testings

AC 35\* € 9.-1 piece



Relais module

serves to transmit output signals of an FH force measuring device to control actions directly

€ 340,-1 piece

AFH-02