

# SCREW SIDE ACTION GRIPS

Catalog Number 2710-004



Screw side action grips provide a very simple and efficient method for holding flat test specimens in applications where you must easily insert the specimen and quickly apply a clamping force. Jaw faces can be adjusted to accommodate different specimen thicknesses, this ensures that the line of tensile force remains concentric with the grip body. They can be equipped with a selection of interchangeable grip jaw faces in various sizes and choice of surfaces including smooth ground, rubber-coated and serrated. Line contact and special coated faces are also available.

## FEATURES AND BENEFITS

- Rated capacity: 500 N (50 kgf, 112 lbf)
- · Open front design to facilitate specimen loading
- Interchangeable jaw faces suitable for gripping different types of materials
- Suitable for a wide range of specimen thickness without the need to change jaw faces
- Self-aligning, side clamping for different thickness and asymmetrical type specimen, i.e lap shear
- Simple and convenient manual adjustment of clamping force
- Rugged design for minimum maintenance
- Made from stainless steel to provide excellent corrosion resistance
- Designed for use in ambient and non-ambient testing conditions
- Temperature range: 0 to +100 °C (+32 °F to +212 °F)

## APPLICATION RANGE

- Type of loading: Tension. Not suitable for through-zero/ reverse stress or fatigue testing
- Specimen material: Thin sheets, films, foils, threads, plastic tapes, fine wires, fabric and soft materials
- Specimen shapes: Round (wires) and flat specimen with or without shoulder tab ends

## PRINCIPLE OF OPERATION

These screw side action grips are designed with one grip face that is adjustable to compensate for the sample thickness so that the line of tensile force can be made to coincide with the center of the grip. The interchangeable jaw faces are mounted in such a manner that the faces are free to swivel in all directions. This action allows for self-alignment to compensate for small variations in sample thickness.

## 2710-004 SPECIFICATIONS

	N	500		
<b>Maximum Capacity</b>	kgf	50		
	lbf	112		

#### MECHANICAL CONNECTION

Upper Fitting	mm	6 clevis pin (Types Om)		
Lower Fitting	mm	6 clevis pin (Types Om)		
Overell Width (A)	mm	93		
Overall Width (A)	in	3.6		

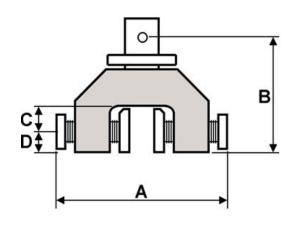
### **EFFECTIVE LENGTH** (B)

Upper Grip	mm	67
	in	2.6
Lower Grip	mm	67
	in	2.6
Throat Depth (C)	mm	13
	in	0.5
Throat Depth (D)	mm	13
	in	0.5

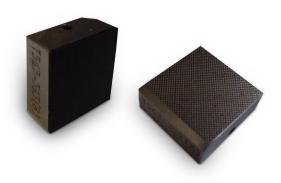
WEIGHT PER GRIP					
Upper Grip	g	490			
	lb	1			
Temperature Range	°C	0 to +100			
	°F	+32 to +212			
Working Principle		Dual screw side action clamping			
Gripping Force		Adjustable, manually applied			

#### Notes:

- 1. Grip catalog number provides two grips.
- 2. Grips may require a coupling to connect to load cell or machine base.
- 3. Upper grip may require a flexible coupling for certain applications.







A selection of interchangeable jaw faces are available to meet a variety of applications  $% \left( 1\right) =\left( 1\right) \left( 1\right)$ 

## **JAW FACES**

Catalog Number	Specimen	Thickness	Surface	Clampii (W		Applications
	mm	in		mm	in	
2702-130	0 - 12	0 - 0.05	Smooth ground	25 × 25	1 × 1	For gripping think sheets, films, foils, paper, and tapes
2702-131	0 - 12	0 - 0.05	Diamond serrated (pitch 1 mm)	25 × 25	1 × 1	For gripping plastic, fabric, and soft materials
2702-132	0 - 12	0 - 0.05	Rubber-coated	25 × 25	1 × 1	For gripping threads, fabrics, plastic tapes, and fine wires

#### Notes:

- 1. Faces catalog number provides four faces.
- 2. All faces are hardened to 60 Rc to 65 Rc, excluding rubber-coated and if otherwise specified.
- 3. Line contact faces are provided with a rubber coated on 2710-004 opposing face.

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