Tensile Grips

**Grip Reference HT22**

**Description:** Light scissor grip. Self tightening and self aligning grips that use two knurled rollers; the grip is particularly efficient for testing flexible dumbbell specimens. The center line of the specimen remains constant in relation to the test machine, irrespective of the specimen thickness.

**Used On:** Benchtop materials testing machines

**Applications:** Suitable for gripping foil, rubber, and flexible polymers

**Specifications:**
- Max. Capacity: 2 kN/450 lbf
- Min. Loadcell: 50 N/10 lbf
- Max Specimen Width: 25 mm/1 in
- Max Specimen Thickness: 12 mm/0.5 in
- Length Each: 110 mm/4.3 in
- Weight Each: 150 g/0.33 lb
- Temperature Limits: -30 to 70 °C

**Note:** Hook profile and required dimensions must be considered and included on order

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**Grip Reference HT23**

**Description:** Tension hooks for use in component testing often used individually in conjunction with other gripping devices. Variations of the hook profile are available to suit the component under test as well as a self-aligning option.

**Used On:** Benchtop materials testing machines

**Applications:** Tension springs, zip components, canned drink ring pulls, and medical components

**Specifications:**
- Max. Capacity: 2.5 kN/500 lbf
- Min. Loadcell: 50 N/10 lbf
- Length Each: 82 mm/3.2 in
- Weight Each: 300 g/0.66 lb
- Temperature Limits: -30 to 70 °C

**Note:** Hook profile and required dimensions must be considered and included on order

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**Grip Reference HT24**

**Description:** Dumbbell grip. Designed for holding thick rigid dumbbells. The curved shoulder of the dumbbell is located between two bollards. With no clamping necessary, specimens can be loaded into the grip very quickly.

**Used On:** Benchtop materials testing machines

**Applications:** Rigid polymer dumbbells typically cut from section of gas and water pipe

**Specifications:**
- Max. Capacity: 10 kN/2,000 lbf
- Min. Loadcell: 50 N/1,000 lbf
- Gripping Length: See Note
- Max Specimen Width: 16 mm/0.63 in
- Max Specimen Thickness: 16 mm/0.63 in
- Length Each: 110 mm/4.3 in
- Weight Each: 800 g/1.7 lb
- Temperature Limits: -30 to 70 °C

**Note:** Dumbbell conforms to ASTM D638 type iv, BS2782 Part 3 Method 320A Fig 1., DIN53455 No 4 Fig 3
**Description:** Cement briquette chucks. A non clamping chuck with an internal profile conforming to the British Standard for the cast cement test.

**Used On:** Benchtop materials testing machines

**Applications:** Cast cement briquettes and resin bonded sand briquettes

**Specifications:**
- Max. Capacity: 10 kN/2,000 lbf
- Min Loadcell: 100 N/20 lbf
- Max Specimen Width: See Note
- Max Specimen Thickness: See Note
- Length Each: 90 mm/3.5 in
- Weight Each: 1 kg/2.2 lb
- Temperature Limits: -30 to 70 °C

**Note:** Specimen conforms to BS6319 Part B.

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**Description:** Hardened split collet chucks for holding turned dumbbell test pieces. Precise shoulder radius to prevent premature test piece breaking within the grip. Internal profile options must be considered and ordered to accommodate specific test specimen dimensions.

**Used On:** Benchtop materials testing machines

**Applications:** Metals round turned test specimens used especially where only a limited amount of material is available to produce the specimen — for example from an alloy automobile wheel; also widely used in education for demonstration of materials performance and behavior

**Specifications:**
- Max. Capacity: 20 kN/4,000 lbf
- Min Loadcell: 50 N/10 lbf
- Serrated Die Diameter: See Note
- Bolt Diameter: 7.9 mm/0.31 in
- Max Specimen Thickness: See Note
- Length Each: 40 mm/1.6 in
- Weight Each: 50 g/1.1 lb
- Temperature Limits: -30 to 70 °C

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**Description:** Dumbbell grips designed for flat rigid dumbbells. The prepared testpiece, with an 8 mm diameter hole drilled in each end, is located between two serrated dies. The dies are clamped on the testpiece with a high tensile bolt.

**Used On:** Benchtop materials testing machines

**Applications:** Sheet metal or plywood dumbbell test pieces.

**Specifications:**
- Max. Capacity: 20 kN/4,000 lbf
- Min Loadcell: 50 N/10 lbf
- Serrated Die Diameter: 38 mm/1.5 in
- Bolt Diameter: 7.9 mm/0.31 in
- Max Specimen Thickness: 86 mm/3.39 in
- Weight Each: 650 g/1.43 lb
- Temperature Limits: -30 to 70 °C

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High and low temperature options available for use in temperature chambers.

Specifications subject to change without notice.

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