HYDRAULIC GRIPS

# Hydraulic Wedge Grips 400-600 kN

Heavy-duty hydraulic wedge grips for tension, compression and dynamic tests



## OVERVIEW

Heavy-duty hydraulic wedge grips for high-load tension, compression and dynamic tests on flat and round metal specimens. Hydraulic pressure drives wedge jaws that self-tighten under load, with clamping forces well above the rated tensile capacity of 400 kN or 600 kN. Wedge jaw sets cover flat specimens up to 60 mm thick and round specimens up to 60 mm diameter.

## KEY FEATURES

- 400 kN or 600 kN tensile capacity
- Wedge action for tension, compression and dynamic tests
- Pyramid wedge jaws for flat specimens 0–60 mm
- V wedge jaws for round specimens 5–60 mm Ø
- Closing pressure max. 250 bar; enclosed jaw area with door
- Air-hydraulic pump with adjustable clamping force

## TECHNICAL SPECIFICATIONS

| | |
|---|---|
| **Max. load** | 400 kN or 600 kN, tension and compression |
| **Clamping force** | Up to 860–1000 kN (400 kN) or 1200–1500 kN (600 kN) |
| **Specimen size** | Flat up to 80 × 60 mm, 0–60 mm thick; round up to 60 mm Ø |
| **Jaw surface** | Pyramid 1.2 × 45° and V wedge jaws |
| **Closing pressure** | Max. 250 bar |
| **Coupling** | Flange, 16 x M30 on Ø 200 mm bolt circle; others on request |
| **Temperature range** | 0 to +40 °C |
| **Weight** | Approx. 100 kg (400 kN) or 120 kg (600 kN) per pair |
| **Dimensions (400 kN)** | Ø 296 mm x 300 mm height |

## AVAILABLE VERSIONS

| | |
|---|---|
| **400 kN** | Hydraulic wedge grip, 1 pair |
| **600 kN** | Hydraulic wedge grip, 1 pair |
| **Pyramid wedge jaws** | Flat 0–15, 5–20, 15–30, 30–45, 45–60 mm |
| **V wedge jaws** | Round 5–15, 15–30, 30–45, 45–60 mm Ø |
| **Curved jaws** | For tube sections, max. 20 mm wall, 200 mm tube Ø |
| **Air-hydraulic pump** | Remote open/stop/close, force set by potentiometer or 0–10 V |

## APPLICATIONS

- Reinforcing bar and steel rod
- Heavy plate and flat bar
- Fatigue and cyclic testing
- Pipe and tube sections

**Ordering & customization:** Specify capacity (400 or 600 kN), machine flange or coupling, jaw type and specimen range, and whether the air-hydraulic pump is required.

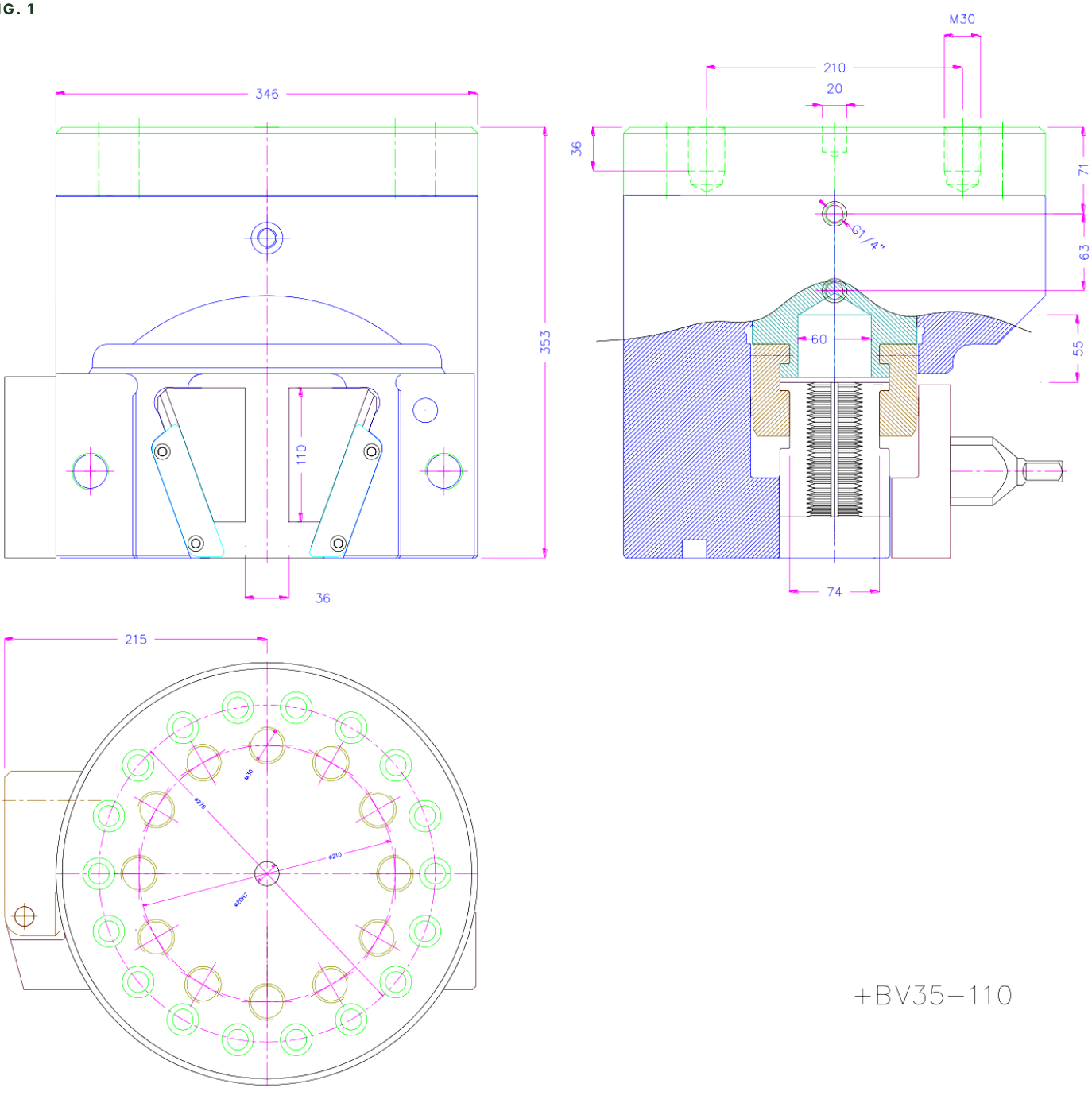
**Dimensional drawings**
See page 2. Certified drawings and 3D models available on request.

Specifications are typical and may vary by configuration; confirm at time of quote. Custom versions, couplings and adapters available on request. Part ref. UGC-HG-070

# Hydraulic Wedge Grips 400-600 kN

DIMENSIONAL DRAWINGS

FIG. 1




Dimensions in mm. Drawings are representative of the product family and may show optional versions or accessories; dimensions are for reference only and may change without notice. Certified dimensional drawings and 3D models are available on request.