

The BYK-Gardner paint inspection gage PIG is a universal instrument for:

- Measuring film thickness in the range of 2 - 2000 µm (1/8 - 80 mils) on every substrate (steel, non-ferrous metal, plastics, wood, etc.)
- Adhesion test by means of cross-cut test in accordance with ASTM D 3359; DIN 53 151
- Indentation hardness test in accordance with DIN EN ISO 2815 (Buchholz)
- Microscopic research for pores, pits, cracks, blisters, flaking, intercoat adhesion of the individual film in coat systems, and quality control of the pretreatment of the substrate

Portable instrument providing sufficient accuracy for laboratory use but also usable at construction sites and in workshops. Ideal for customer service technicians and demonstrations.



For more information on Buchholz hardness see chapter "Hardness" page 174.

### Standards

ASTM	D 3002	D 3359
DIN	50 986	53 151
DIN EN ISO	2409	2815
NCCA	II-13	X-1
VTLA-003	Item 9	

### Ordering Information

Cat. No.	Description
E-3410	PIG-Universal with blades
E-3412	PIG-Universal without blades

#### Comes complete with:

- PIG-Universal
- Revolving rotary head with 3 cutters for film thickness (# 1-3)
- Built-in microscope (scale 0 - 2 mm)
- Lamp to illuminate measurement spot
- Battery
- Operation manual

**Note:** Cutters must be ordered separately for Cat. No. 3412  
Tools for cross-cut and hardness must be ordered separately

### Technical Specifications

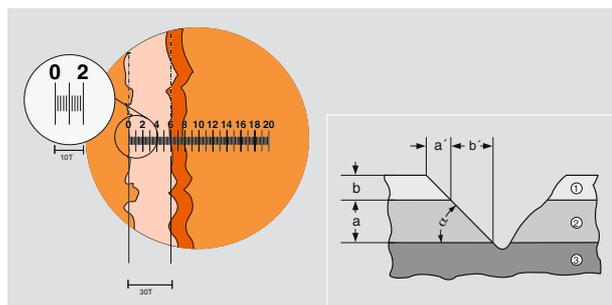
Lamp	Batteries	Microscope	Dimensions
1 Volt / 0.22 A	1.5 Volts Mignon type	50-fold magnification	110 x 80 x 75 mm (4.3 x 3.2 x 2.9 in)
1 Volt / 0.22 A	1.5 Volts Mignon type	50-fold magnification	110 x 80 x 75 mm (4.3 x 3.2 x 2.9 in)



For Recertification Services see page 171.

## Destructive Film Thickness Measurement

Create a V-shaped cut through the coating down to the substrate and measure width of  $a'$  ( $b'$ ), which is proportional to the thickness  $a$  ( $b$ ).

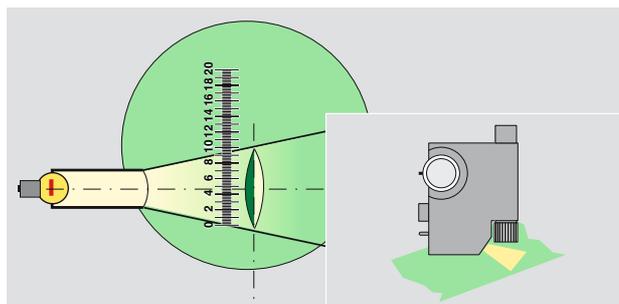


### Ordering Information

Cat. No.	Description
E-3419	Special Cutter
E-3420	Special Cutter
SAB-3421	Cutter No. 1
SAB-3422	Cutter No. 2
SAB-3423	Cutter No. 3

### Replacement Film Thickness Cutters

Film Thickness
0 to 100 $\mu\text{m}$ (1-4 mils)
0 to 3000 $\mu\text{m}$ (0-120 mils)
20 to 2000 $\mu\text{m}$ (from 1 - 80 mils)
10 to 1000 $\mu\text{m}$ (from 0.5 - 40 mils)
2 to 200 $\mu\text{m}$ (from 1/8 - 8 mils)



## Buchholz Hardness Test

Place the PIG equipped with tool (Cat. No. 3427) and slip-on weight (Cat. No. 3428) on measuring position in accordance with standard. After 30 seconds measure indentation length using the built-in microscope. See pages 120 and 122.

### Ordering Information

Cat. No.	Description
E-3427	Buchholz Indentation Device
E-3428	Slip-on Weight

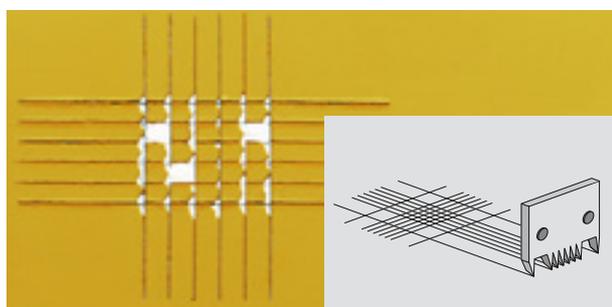
### Accessories for Buchholz Hardness Test

In accordance with DIN 53153 and ISO 2815  
Increases weight of PIG to the standard weight of 500 g  $\pm$  5 g

## Multi-Cut Tools for Cross-Cut Test



Cross-Cut Test  
see pages 83-85.



### Ordering Information

Cat. No.	Description
SAB-3425	Multi-Cut Tool 1 mm
SAB-3426	Multi-Cut Tool 2 mm
SAB-3429	Multi-Cut Tool 1 mm
SAB-3424	Multi-Cut Tool 1.5 mm

### Technical Specifications

Standard	Cutter Spacing	No. Of Cutters
DIN, ISO	1 mm (0.04 in)	6
ASTM, DIN ISO	2 mm (0.08 in)	6
ASTM	1 mm (0.04 in)	11
ASTM	1.5 mm (0.06 in)	11