

# 2



## LENGTH MEASUREMENT

Measuring geometric characteristics is one of the most common tests when carrying out material testing. The most well-known tool is the calliper gauge or the micrometer gauge (micrometer).

In this area of measurement, SAUTER confines itself to integrated calliper gauges which can be used in combination with deforming material testing.

Very often, the issue of material testing relates to a force which is exerted in connection with a specific deformation, i.e. expansion or compression of the test item.

In these cases, the force must be measured or recorded in relation to the distance travelled by the test item during the test.

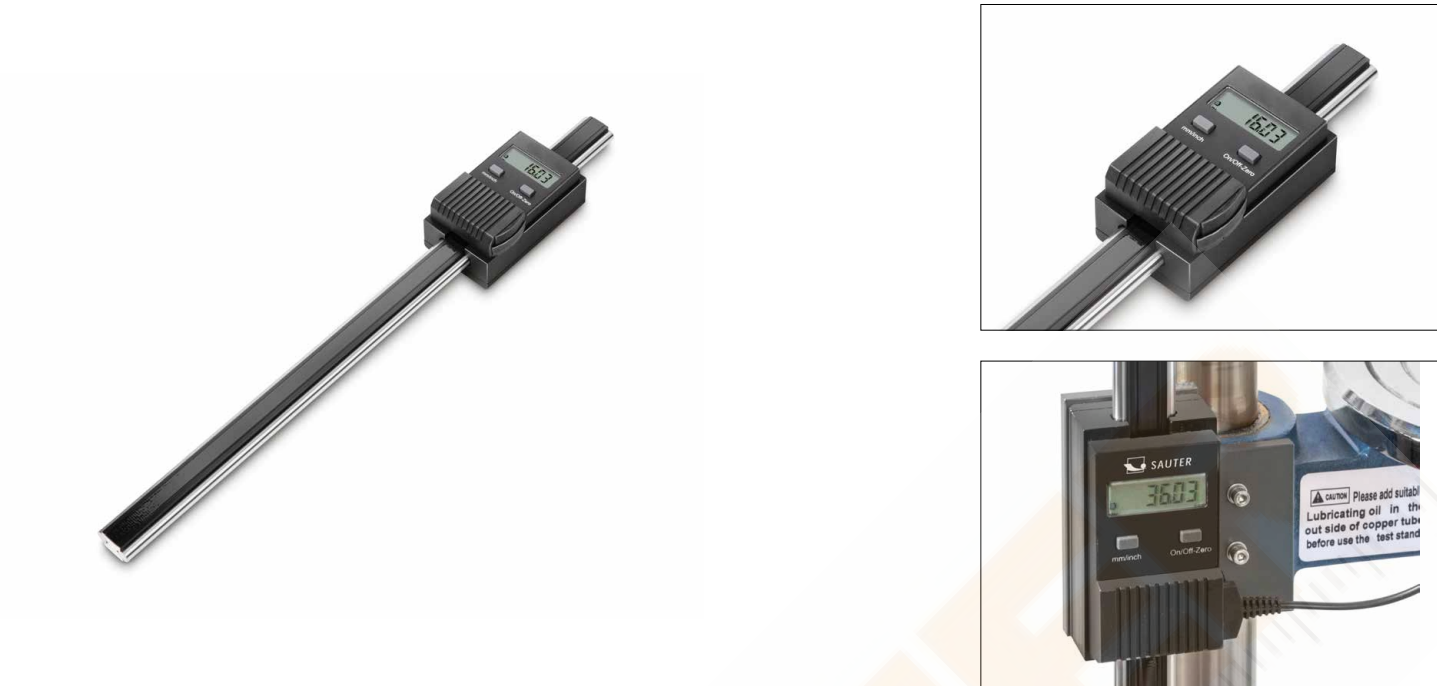
Integrated calliper gauges serve to capture this distance. They are typically fitted in test stands, machines or plant.

As a guide, the following has been assembled as a sample system for a typical material test stand:

- Length measuring device, e.g. LB 300-2
- Calibration length measuring device, e.g. 961-150
- Test stand, e.g. TVM-N
- Fitting to test stand, e.g. LB-A02
- Data transfer software, e.g. AFH FD
- Force gauges, e.g. FH
- Calibration Force gauges, e.g. 961-162
- 2× RS-232/USB adapter, e.g. AFH 12

### Quick Finder

| Readout   | Measuring range [Max] | Model           | Page |
|-----------|-----------------------|-----------------|------|
| [d]<br>mm | mm                    | <b>SAUTER</b>   |      |
| 0,01      | 200                   | <b>LB 200-2</b> | 49   |
| 0,01      | 300                   | <b>LB 300-2</b> | 49   |
| 0,01      | 500                   | <b>LB 500-2</b> | 49   |



Distance measurement directly in machines or sites with RS-232 interface

**Features**

- Digital sliding calliper with a superior precision even at high transversal movement speed
- Easy mounting to machine tools, conveyer, test stands e.g. SAUTER TVL-O, TVL-E, TVL-XLS, TVM-N etc.
- Zeroing, pre-added and pre-reduced length as well as switching the unit can be done manually
- Data interface RS-232 as standard
- Selectable measuring units: mm, inch

**Technical data**

- Overall dimensions W×D×H 350×42×30 mm
- Battery operation, batteries standard (3 V CR2032)

**Accessories**

- RS-232/PC connection cable, SAUTER LB-A01
- Mounting the length measuring device LB onto a SAUTER test stand at the factory, SAUTER LB-A02

STANDARD

RS 232

ZERO

BATT

1 DAY

OPTION

SOFTWARE

ISO

+4 DAYS

| Model    | Measuring range | Readout | Direction of measurement | Option                          |
|----------|-----------------|---------|--------------------------|---------------------------------|
|          | [Max]           | [d]     |                          | Factory calibration certificate |
|          | mm              | mm      |                          | KERN                            |
| SAUTER   |                 |         |                          |                                 |
| LB 200-2 | 200             | 0,01    | vertical/horizontal      | 961-150                         |
| LB 300-2 | 300             | 0,01    | vertical/horizontal      | 961-150                         |
| LB 500-2 | 500             | 0,01    | vertical/horizontal      | -                               |