

# Z SERIES

10 Tension ranges  
from 1 - 5 cN to 20 - 300 cN

Economical low tension measuring instruments  
for checking fibers, yarns and fine wires



**Model ZF2-12**  
Actual size

**Model ZD2-100**  
Actual size

**Special features:**

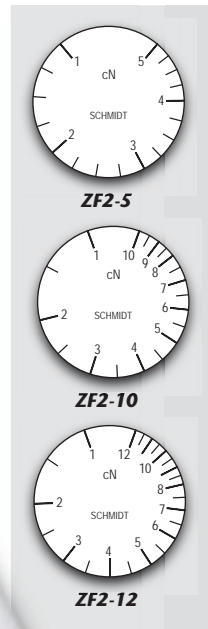
- + Light weight
- + Large, easy to read scale (54 mm Ø)
- + Filament guide and roller shifting mechanism ensure easy acquisition of the running material

**Standard features:**

- Everything in operator's view:
  - the guide rollers
  - the measured material
  - the readings
- Ball-bearing mounted, V-grooved guide rollers
  - Each instrument is individually calibrated for highest accuracy
  - Housing made of high-strength plastic
  - Inspection Certificate with calibration report optionally available

**Slim filament guide with small guide rollers – ideal for limited access space**

**With bigger rollers for universal use**

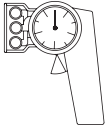


Subject to change without notice.

**1<sup>st</sup> IN TENSION METERS WORLDWIDE®**

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## Model ZF2

Most popular tension meter in the textile industry with small rollers!

### Available Models

MODEL	Tension Ranges cN	Measuring Head Width* mm	SCHMIDT Calibration Material**
ZF2-5	1 - 5	43	Filament: 25 tex
ZF2-10	1 - 10	43	Filament: 25 tex
ZF2-12	1 - 12	43	Filament: 25 tex
ZF2-20	2 - 20	43	Filament: 25 tex
ZF2-30	3 - 30	43	PA: 0.12 mm Ø
ZF2-50	5 - 50	43	PA: 0.12 mm Ø
ZF2-100	10 - 100	43	PA: 0.12 mm Ø

Other tension ranges available on request. Other units of measure available, such as g.

\* Width of filament guide

\*\* Suitable for 95 % of applications (see also chart on page 11)

PA = Polyamide Monofilament

### Guide Rollers

V-grooved	Line Speed v <sub>max</sub> ... m/min	Roller Material
Standard	900	Hard-coated aluminium
Code K	2000	Hard-coated aluminium
Code T	450	Plastic (POM) black
Code W	450	Nickel-plated steel

→ see page F →

### Specifications

#### ZF2 Series

Calibration:	According to SCHMIDT factory procedure
Accuracy:	±1 % full scale or ±1 graduation on scale
Scale diameter:	54 mm
Temperature range:	10 - 45 °C
Air humidity:	85 % RH, max.
Housing material:	Plastic (POM)
Housing dimensions:	157 x 85 x 32 mm (L x W x H)
Weight, net (gross):	approx. 200 g (600 g)

Special calibration using customer supplied samples is available:  
Please supply a sample of at least 5 m in length.

## Model ZD2

Universal tension meter for a variety of applications in the textile and wire industries

### Available Models

MODEL	Tension Ranges cN	Measuring Head Width* mm	SCHMIDT Calibration Material**
ZD2-30	3 - 30	63	PA: 0.12 mm Ø
ZD2-50	5 - 50	63	PA: 0.12 mm Ø
ZD2-100	10 - 100	63	PA: 0.12 mm Ø
ZD2-150	20 - 150	63	PA: 0.12 mm Ø
ZD2-200	20 - 200	63	PA: 0.12 mm Ø
ZD2-300	20 - 300	63	PA: 0.20 mm Ø

Other tension ranges available on request. Other units of measure available, such as g.

\* Width of filament guide

\*\* Suitable for 95 % of applications (see also chart on page 11)

PA = Polyamide Monofilament

### Guide Rollers

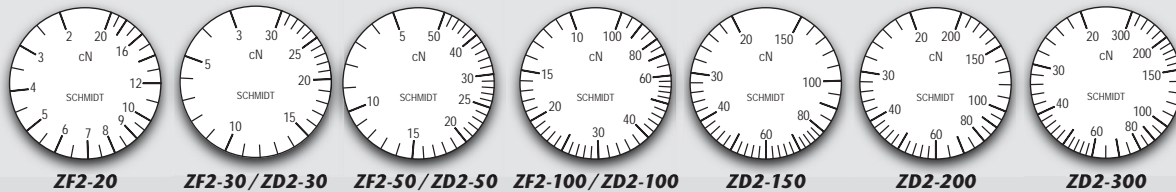
V-grooved	Line Speed v <sub>max</sub> ... m/min	Roller Material
Standard	2000	Hard-coated aluminium
Code K	3500	Hard-coated aluminium
Code H	5000	Plasma-coated aluminium (for Model ZD2-100 and higher ranges)
Code T	1000	Plastic (POM) black
Code W	1000	Nickel-plated steel
Code ST	1000	Hardened steel
Code CE2	1000	Aluminium ceramic-coated

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### Specifications

#### ZD2 Series

Calibration:	According to SCHMIDT factory procedure
Accuracy:	±1 % full scale or ±1 graduation on scale
Scale diameter:	54 mm
Temperature range:	10 - 45 °C
Air humidity:	85 % RH, max.
Housing material:	Plastic (POM)
Housing dimensions:	157 x 85 x 32 mm (L x W x H)
Weight, net (gross):	approx. 220 g (620 g)



SCHMIDT scales are manufactured according to the most stringent quality requirements. Printed scales are not used. Instead, each scale is individually marked for the instrument involved. This ensures highest quality. Our special procedure makes it possible to provide tension meters fine tuned to a specific tension range, or calibrated to custom supplied material, or units of measure such as g.

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To place an order  
please indicate the complete model number, e.g.:

Model with tension range

Code for guide rollers  
(if not standard)

Complete Order No.

ZD2-100 + K = ZD2-100-K