

## Product Information

### roboTest L (Linear) robotic testing system for metals

CTA: 146177



roboTest L robotic testing system for metals

#### Range of application

The system is used for the following fully automatic tests:

- tensile tests on metal specimens (e.g. to EN 10002-1, ISO 6892, ASTM E8, JIS Z2201)

#### System configuration

- 5kN or 250kN materials testing machine with symmetrically closing pneumatic or hydraulic grips and optional extensometer
- roboTest L automatic specimen feed system
- Cross-section measuring device (optional)
- Industrial controller with testXpert testing software and autoEdition3 automation software

#### Benefits

- ZwickRoell has over 35 years of experience and expertise, gained while supplying more than 700 automated testing systems worldwide.
- Operator influences (hand temperature/moisture, off-center or angled specimen insertion, etc.) are eliminated for high test-result reproducibility.
- Qualified laboratory staff are relieved of routine activities, making them available for more complex tasks.
- The machine can be used during idle times (lunch breaks and night shifts), which increases capacity and produces faster results.

- The testing system reduces the testing costs per specimen and typically pays for itself within one to two years.
- Manual tests can be performed whenever required—the specimen feeder simply slides out of the way for access.

#### Test sequence

- The operator fills the removable specimen magazine during specimen preparation or directly on the system. The magazine is then placed on the magazine table.
- Specimen data (identification number, width, thickness etc.) are entered on the PC. This step can be omitted when using barcodes.
- Once the system has been started, specimen feed, tensile testing and disposal of specimen remains are performed automatically.
- Once all the specimens in the magazine have been tested it can be refilled or replaced with a magazine insert which has already been filled. Alternatively magazines can be 'topped up' with specimens during the automatic sequence.

## Product Information

### roboTest L (Linear) robotic testing system for metals

#### Technical data

Type	roboTest L	
<b>Mechanics</b>		
Attachment	Can be docked to the load frame	
Dimensions (H x W x D)		
roboTest L, metals	1600 <sup>1)</sup> x 1330 <sup>2)</sup> x 1500 <sup>3)</sup>	mm
roboTest L, plastics	1200 <sup>1)</sup> x 1230 <sup>2)</sup> x 1600 <sup>3)</sup>	mm
Weight (without specimens, with cross-section measuring device and magazine)		
roboTest L, metals	250	kg
roboTest L, plastics	200	kg
<b>Power specifications</b>		
Nominal supply voltage	230	V AC
Power consumption	200	Procedure Instruction
Power frequency	50/60	Hz
Compressed air, filtered, not oiled	5 ... 6	bar
Compressed air consumption, approx.	30	l/h
<b>Controller</b>		
Automation	autoEdition3	
Peripheral connection	Profinet	

1) Dependent on the testing machine

2) Incl. movable magazine table; additional travel distance: 990 mm

3) With linear axis

Description	Value	
Test	metals	
Type of test	tensile tests	
<b>Specimens</b>		
Specimen shape	dumbbell, strip	
Specimen gripper	pincer gripper	
Magazine slots	max. 160	
Material	dimensionally stable, non-tacky	
Weight	max. 1	kg
Length	max. 300	mm
Shoulder width (flat)	20 to 40	mm
Diameter (round)	2 to 20	mm
Thickness	0.1 to 18	mm

Description	ArticleNumber
Automatic specimen feeding system roboTest L for tensile tests	<b>3008305</b>
<ul style="list-style-type: none"> <li>• Base unit with power supply</li> <li>• Linear feed axis</li> <li>• Pneumatically actuated pincer gripper with rotation unit</li> <li>• Buffer tray position for alignment of the specimen</li> </ul>	

## Product Information

### roboTest L (Linear) robotic testing system for metals

Description	ArticleNumber
<ul style="list-style-type: none"><li>• Magazine table with centering pins for specimen magazine</li><li>• Sliding table for expansion of the magazine capacity</li><li>• Sliding table stroke: max. 990 mm</li><li>• CE-compliant protective cover</li><li>• For four magazines with <b>310 mm max. specimen length each</b></li></ul>	

#### Options

- Specimen identification
- Cross-section measurement No. measurements/specimen: 1/3
- Specimen disposal
- Good/bad sorter
- Data exchange: Higher-level computer system (e.g. LIMS) via upload/download of ASCII files or ODBC
- Visual status display: 3-aspect lights (running, refill magazine/finished, error)