

## C631H Thermal Shrinkage Tester

**C631H Thermal Shrinkage Tester** is designed and developed in accordance with ISO 14616 and GB/T 34848, for determination of shrinking force, contracting force and shrinkage ratio of heatshrinkable films. Shrinking force greater than 0.01N can be detected.

### Product Features<sup>Note1</sup>

#### Innovative Laser Measurement Technology providing Higher Precision and Efficiency

- Advanced laser measurement technology, measures thermal shrinkage ratio of film precisely
- High precision load cell supplied by global renowned manufacturer, provides testing accuracy higher than 0.5%FS and better repeatability of test results
- Multiple test ranges can be selected to meet various testing requirements
- Global renowned brand operating control system guarantees the accuracy of displacement and speed
- Three speeds (up to 2 seconds) for loading specimen can be selected
- Shrinking force, contracting force and shrinkage ratio are displayed in real time



#### Embedded, Secured and Easy-to-use Computer Controlled System

- Integrated design of instrument and software requires no external computer
- Standard monitor, mouse, keyboard and Window operating interface for simplified operation and data display
- Historical data can be reviewed and printed
- USB ports and net ports for external connection and data transmission
- Intelligent reminder for sensor calibration provides safe data processing environment
- Labthink's unique data security design isolates the test data from computer and prevents data loss caused by computer virus
- Labthink's unique DataShiled™ System for data management and connecting with information system (optional)

### Test Principle

The specimen is placed in the test area for displacement and force measurement, it is then heat to the specified temperature for shrinkage test and cooled down. The system automatically records the shrinking force, temperature and shrinkage ratio in real time and provides analytical results.

### Test Standards<sup>Note1</sup>

GB / T34848, ISO-14616-1997, DIN 53369-1976

### Applications<sup>Note1</sup>

<b>Basic Application</b>	Shrinking Force & Contracting Force	Measure the shrinking force and contracting force of heatshrinkable film under specific conditions
	Shrinkage Ratio	Measure the shrinkage ratio of heatshrinkable film under specific conditions

### Technical Specifications<sup>Note2</sup>

Specification	C631H
<b>Load Cell Capacity</b>	5 N (Standard)
	10 N, 30 N (Optional)
<b>Force Accuracy</b>	Indicated Value $\pm 0.5\%$ (10%-100% of Load Cell Capacity)
	$\pm 0.05\%$ FS (0%-10% of Load Cell Capacity)
<b>Force Resolution</b>	0.001 N
<b>Displacement Range</b>	0.1 ~ 95 mm
<b>Displacement Accuracy</b>	$\pm 0.1$ mm
<b>Shrinkage Ratio Range</b>	0.1% ~ 95%
<b>Temperature Range</b>	Room Temperature ~ 210°C
<b>Temperature Variation</b>	$\pm 0.2$ °C
<b>Temperature Accuracy</b>	$\pm 0.5$ °C (Single Point Calibration)
<b>Number of Stations</b>	1 Group (2 pcs)
<b>Specimen Size</b>	110 mm $\times$ 15 mm (Standard)
<b>Instrument Dimension</b>	480 mm (L) $\times$ 400 mm (W) $\times$ 630 mm (H)
<b>Power Supply</b>	220VAC $\pm 10\%$ 50Hz / 120VAC $\pm 10\%$ 60Hz
<b>Net Weight</b>	26 kg

### Configurations

<b>Standard Configuration</b>	Instrument, Monitor, Mouse, Keyboard, High-temperature Welding Cloth, T-Plate (10 pcs)
<b>Optional Parts</b>	High-temperature Welding Cloth, T-Plate, DataShield <sup>TM</sup> <sup>Note3</sup>

**Note 1:** The described test standards, applications and product features should be in line with Technical Specifications.

**Note 2:** The parameters in the table are measured by professional operators in Labthink laboratory under strictly controlled laboratory conditions.

**Note 3:** DataShield<sup>TM</sup> provides safe and reliable data application support. Multiple Labthink instruments can share one single DataShield<sup>TM</sup> system which can be configured as required.

**Please Note:** Labthink is always dedicated to the innovation and improvement of product performance and function. Therefore, technical specifications are subject to change without further notice. Please visit our website at [www.labthink.com](http://www.labthink.com) for the latest updates. Labthink reserves the rights of final interpretation and revision.