# ELECTRONIC UNIVERSAL TESTING MACHINES (PROFESSIONAL TYPE)
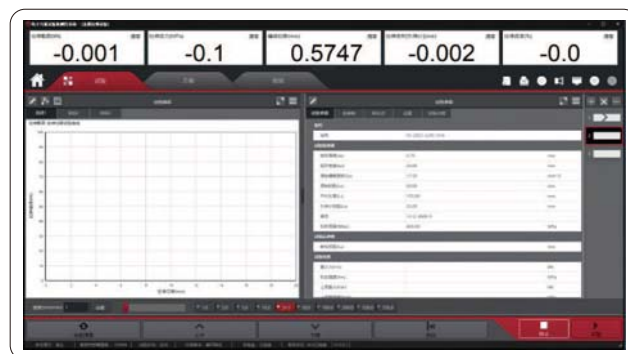


wired hand control box (included)



test interface



test and calibration interface

**UTM-X010-U**

- **UTM-X** series electronic for universal testing machines are equipped with a variety of test software, can be for metal, ceramics, plastics, rubber and composite materials and other related mechanical properties of the test and research. It can also be used for research and quality control of mechanical properties of various products such as mechanical parts, electronic parts, food packaging materials, chemical fibres, films, new energy batteries and so on.
- The rigidity of the host, loading speed and load, deformation measurement accuracy, data reliability, adoption rate and closed-loop control rate are excellent.



security door (**optional**)



tensile fixture (**optional**)



compression fixture (**optional**)



clamp blocks (**optional**)

- Electronic universal testing machines are usually equipped with tensile fixtures, compression fixtures and clamp blocks. In addition, there are dozens of application fixtures for metal materials, resin/plastic materials, soft plastics/rubber/films/adhesives, etc., composite materials, electronic materials and components industry applications, new energy industry applications and so on.

fully automatic extensometer (**optional**) (class 0.5 high-precision fully-automatic extensometer with a wide measuring range for automatic testing and full strain measurement)



high precision axial extensometer (**optional**) (a variety of scales can be selected to fully meet the requirements of a variety of materials, the accuracy meets class 0.5)



width gauge (**optional**) (widely used for r-value and poisson's ratio measurements, meets the requirements of ASTM E517 and ISO10113)



high temperature furnace (**optional**)



constant temperature and humidity box (**optional**)



high and low temperature environment box (**optional**)

## SPECIFICATION

| Part No. | UTM-X001-U | UTM-X005-U | UTM-X010-U |
|---|---|---|---|
| **Maximum test force** | 1kN | 5kN | 10kN |
| **Accuracy class** | 0.5 class | | |
| **Accuracy of test force** | ±0.5% of indicated value | | |
| **Range of test force** | 0.2%~100%FS | | |
| **Test force resolution** | 0.002N | 0.02N | 0.02N |
| **Crossbeam displacement accuracy** | ±0.1% of indicated value | | |
| **Crossbeam displacement resolution** | 4µin | | |
| **Velocity accuracy** | ±0.1% of indicated value | | |
| **Range of speed adjustment** | 0.00004~39.37in/min | | |
| **Effective test width** | 16.54" | | |
| **Vertical test space** standard model | 47.24" | | |
| **Vertical test space** heighten 9.84" | 57.09" | | |
| **Vertical test space** heighten 19.69" | 66.93" | | |
| **Dimension W x D x H** standard model | 29.45×22.91×62.99" | | |
| **Dimension W x D x H** heighten 9.84" | 29.45×22.91×72.83" | | |
| **Dimension W x D x H** heighten 19.69" | 29.45×22.91×82.68" | | |
| **Weight** standard model | 352.74lb | | |
| **Weight** heighten 9.84" | 407.86lb | | |
| **Weight** heighten 19.69" | 462.97lb | | |
| **Power supply** | AC110V, 60Hz, 1kW | | |
| **Environmental requirements** | temp: 41~104˚F humidity level: 5~85%RH non-condensing no vibration | | |

| Part No. | UTM-X050-U | UTM-X100-U | UTM-X300-U |
|---|---|---|---|
| **Maximum test force** | 50kN | 100kN | 300kN |
| **Accuracy class** | 0.5 class | | |
| **Accuracy of test force** | ±0.5% of indicated value | | |
| **Range of test force** | 0.2%~100%FS | | |
| **Test force resolution** | 0.2N | 0.2N | 0.5N |
| **Crossbeam displacement accuracy** | ±0.1% of indicated value | | |
| **Crossbeam displacement resolution** | 4µin | | |
| **Velocity accuracy** | ±0.1% of indicated value | | |
| **Range of speed adjustment** | 0.00004~31.49in/min | | 0.00004~19.68in/min |
| **Effective test width** | 23.62" | | |
| **Vertical test space** standard model | 49.41" | | 57.09" |
| **Vertical test space** heighten 9.84" | 59.25" | | 66.93" |
| **Vertical test space** heighten 19.69" | – | – | – |
| **Dimension W x D x H** standard model | 43.31×28.50×85.04" | | 46.46×29.76×96.06" |
| **Dimension W x D x H** heighten 9.84" | 43.31×28.50×94.88" | | 46.46×29.76×105.91" |
| **Dimension W x D x H** heighten 19.69" | – | – | – |
| **Weight** standard model | 1344.82lb | | 2127.46lb |
| **Weight** heighten 9.84" | 1455.05lb | | 2237.69lb |
| **Weight** heighten 19.69" | – | – | – |
| **Power supply** | AC480V, 3Ø, 60Hz, 4kW | AC480V, 3Ø, 60Hz, 4.5kW | AC480V, 3Ø, 60Hz, 6kW |
| **Environmental requirements** | temp: 41~104˚F humidity level: 5~85%RH non-condensing no vibration | | |

### STANDARD DELIVERY

| Main unit | 1 pc |
|---|---|
| **Control box** | 1 pc |
| **Computer** | 1 pc |
| **Software** | 1 pc |
| **Printer** | 1 pc |

### OPTIONAL ASSESSORY

| Security door* | |
|---|---|
| **Fixture**\* | |
| **Extensometer**\* | |
| **Width gauge**\* | customizable |
| **High temperature furnace**\* | |
| **Constant temperature and humidity box**\* | |
| **High and low temperature environment box**\* | |

\*Selection of specifications according to test requirements