

HST-MLW-400A Computer Controlled Capillary Rheometer



Picture just for reference

1.Application:

1.1. This machine is suitable for measuring the shear rate of plastics and polymer materials and the fluidity of melts under shear stress under certain temperature conditions, including the apparent viscosity of thermoplastic plastics and the apparent viscosity of thermosetting materials.

1.2. This rheometer is a computer-controlled intelligent capillary rheometer. It can work under constant pressure, constant speed, constant temperature, different heating rates, different temperatures, different shear rates, etc. The software can automatically measure different Detection parameters such as pressure, temperature, speed, etc. of plastics in different die environments. The software automatically draws curves, saves and prints data, etc.

1.3. Machine models with different specifications (low temperature type, high temperature type, different pressures, different material rod diameters, etc.) can be customized according to user requirements. This model is a low-pressure, single-pressure-head, single-dwelling structure;

2. Features:

2.1. The data collection frequency is high (more than 100PPS), which can more accurately record the transformation points of materials in different states without missing key material state transformation points; accurately calculate the apparent viscosity at different shear rates;

2.2. It can realize the superposition of multiple data curves and coordinate display in multiple curve forms.

2.3. The load loading device of this instrument is reasonably designed, using high-precision pressure sensors for data collection, eliminating the traditional load sensor collection; software and hardware double closed loops

to achieve stepless adjustment of speed and loading force; both manual and automatic methods can be used. A kind of loading control, convenient, fast and accurate. Inductive manual displacement adjustment;

2.4. Regarding the coordinate axes of the shear viscosity and shear rate curves: During the test, the coordinate axes are normal coordinate axes. When the laboratory is over, if you want to view the log coordinate axis image, you can directly adjust the log coordinate axis through the mouse, so that you can use Observe the image in two ways, and set the lowest point of the coordinate axis with the mouse after the test.

2.5. The whole machine adopts a single-column swing-head desktop structure, which has a more beautiful appearance, stronger stability, convenient cleaning, and is easier to transport and install.

2.6. Scalability: This instrument can be expanded into a wire drawing instrument without changing the host machine.

3. Main technical parameters and accuracy:

3.1. Temperature range: room temperature ~ 400℃ (can be customized according to user requirements, price negotiable)

3.2. Heating rate: 1-10℃/min, continuously adjustable and capable of rapid heating

3.3. Temperature measurement display accuracy: 0.1℃

3.4. Pressure range: 1-50MPa±0.5%

3.5. Maximum driving force: 5KN

3.6. Pressure measurement accuracy: ±0.5%FS

3.7. Pressure resolution: 0.1Mpa

3.8. Speed range: 0.01-500mm/min

3.9. Deformation measurement accuracy: ±0.5%FS

3.10. Plug head diameter: φ12 mm (can be customized according to user requirements, price negotiable)

3.11. Plug head area: 113.04mm²

3.12. Discharge port mold specifications: Ø 1×5, Ø 1×10, Ø1×20, Ø1×40 (mm×mm)

(Can be customized according to user requirements, price negotiable)

3.13. Discharge die material: tungsten carbide

3.14. Power supply: 220V, 50Hz, power <1000W

3.15. Overall dimensions: 600×410×2100mm

HST GROUP Co., LTD.

NO. 4915, West Jingshi Road, Jinan 250012, PR CHINA.

Tel: +86-159 1008 1986

www.hssdgroup.com - e-mail: admin@hssdtest.com