

i-Pendum 5200 Pendulum Impact Tester

- ❖ Online Data Management for Packaging Testing - The ultimate cloud computing technology for test data processing and management
- ❖ Can be used to test pendulum impact resistance of plastic films, sheets, composite films, foils and other materials
- ❖ Conforms to multiple standards



Online data management system for packaging testing

Comes with two versions to meet distinct needs of our clients:

The Cloud Version

- Consist of 6 functional modules: Test Management, Target Management, Instrument Management, File Management, Settings, and Online Support
- Cloud services: storage, calculation, and analysis of mass test data
- Automatically upload original test data to the cloud server to guarantee data security
- Intelligent statistical analysis of test results
- Easily accessible through the internet on PCs, laptops, mobile phones, and other devices anywhere and anytime, to check and review real time test results and historical test reports, as well as analytical graphs and statistical information

The Intranet Version

- Featured with storage space for vast data, correlation analysis, trend analysis, and statistical analysis of test data, as well as report printing and data export functions
- Easily accessible via computers through Intranets
- “One Click Upgrade” to the powerful “Cloud Version”

Functionality

- Adjustable test range and electronic measurement make it possible to perform tests at various test conditions
- Pneumatic specimen clamping, pendulum release mechanism and horizontal adjustment system effectively reduce the errors caused by manual operation
- Automatic statistics of testing data for clients convenient viewing
- The instrument is controlled by micro-computer with menu interface, PVC operation panel and large LCD display
- Equipped with RS232 port and standard micro printer port which is convenient to the data transmission and PC connection
- Sophisticated energy consumption and test environment monitoring and analysis functions for better test accuracy and reliability. The system monitors and displays real-time voltage, current, energy consumption, and inclination angle of instrument as well as ambient temperature and relative humidity during the test, which serves to evaluate test data reliability. (Relevant sensors are needed. For more information, please refer to the configuration in Technical Specifications.)
- Easy calculation for historical results, instrument usage, energy consumption, and vast statistical information

Test Principle

- ❖ Evaluate the dynamic ball burst (Pendulum) impact resistance of film specimen by calculating the energy that causes the film to fail under specified conditions of impact of a hemispheric impact head.
- ❖ This instrument conforms to the following standards:
ASTM D3420, NF T54-116, GB 8809-88

Applications

This instrument can be used to measure the following materials:

Basic Applications	Films	Pendulum impact resistance test of plastic films, sheets and composite films e.g. PE/PP composite films, aluminized films, aluminum plastic composite films, nylon films for food or drug packages
	Foils	Pendulum impact resistance test of foils
	Paper and Paperboard	Pendulum impact resistance test of paper and paperboard e.g. aluminized paper for cigarette packages or aluminum-plastic composite paper for Tetra Pak
Extended Applications	Extended Test Range	Test range could be extended to 5 J

Technical Specifications

Test Specs	Impact Energy	1 J, 2 J, 3 J (Standard)
	Resolution	0.001 J

	Impact Head Size	Φ25.4 mm, Φ19 mm, Φ12.7 mm (Customization is available)
	Specimen Clamp Diameter	Φ89 mm, Φ60 mm
	Specimen Size	100 mm x 100 mm or Φ100 mm
Environment Monitoring Specs (Optional)	Voltage Monitoring Range	AC 0 ~ 250 V, with ±0.5% accuracy
	Current Monitoring Range	0 ~ 15 A, with ±0.5% accuracy
	Energy Analysis Accuracy	±0.5%
	Environmental Temperature Monitoring Range	-10 °C ~ 55 °C, with ±0.1 °C accuracy
	Inclination Angle Monitoring Range	-10°~10°
	Environmental Humidity Monitoring Range	0 ~ 100% RH, with ±2% RH accuracy
Other Specs	Gas Supply Pressure	0.6 MPa (outside of supply scope)
	Port Size	Φ6 mm PU Tubing
	Instrument Dimension	600 mm (L) x 390 mm (W) x 600 mm (H)
	Power Supply	AC (85 ~ 264) V (47 ~ 63) Hz
	Net Weight	65 kg
Configurations	Standard	Mainframe (including Wireless Data Interface), Pendulums of 1 J, 2 J and 3 J, Standard Impact Heads of Φ25.4 mm and Φ19 mm, Standard Clamping Plates of Φ89 mm and Φ60 mm (including O-rings), Micro Printer
	Optional	Environment Monitoring Sensors (including voltage, current, temperature, humidity, and inclination sensors), Customized Impact Head, O-ring
	Online Data Management System for Packaging Testing	Wireless Data Transfer Module, High Gain Antenna

Note: 1. The gas supply port of the instrument is Φ6 mm PU Tubing;
2. Customers will need to provide gas supply.

Please Note:

- ❖ Pictures used are for illustration purposes only and may differ from the actual product received.
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