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Test equipment professor with best service

DONGGUAN LIYI ENVIRONMENTAL TECHNOLOGY CO.,LTD



# Our team









# COMPANY INTRODUCTION

DONGGUAN LIYI ENVIRONMENTAL TECHNOLOGY CO.,LTD

Dongguan Liyi Environmental Technology Co., Ltd. Is a solution provider of material and product reliability testing equipments since 2011 and has an associated company 'Dongguan LIYI Test Equipment Co., Ltd' which is a high technology oriented company, designs and manufactures various kinds of test equipment such as Environmental Test Chamber, Industrial Oven, Universal Testing Machine, Adhesive Testing Equipment, Rubber and Plastic Testing Equipment, Paper Package Testing Equipment.

With a group of experienced technology management personnel and efficient professional after-sales service personnel, advanced technology, strong production capacity and perfect pre-sale and after-sales service system. LIYI has sold more than 2000 sets machines to more than 100 Countries and regions in past 7 years. The fast development helps LIYI become a leading company for testing equipment in Southern China which has 4 brother companies, 3 sales subsidiaries and an independent import and export department.

As a technology-based manufacturing enterprise, LIYI pays attention to the cultivation of innovative thinking, increases R&D investment, and enhances the innovative strength of enterprises. Now it has more than 30 intellectual property patents, and has obtained virous awards, ISO9001 certification and CE certification.

"Growing together with customers" is LIYI's working principle. We'll adhere to meet the market demand, insist on product innovation and do our best to serve more customers all over the wolrd.



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# LY-600 Series Industrial Precision Oven

#### Uses:

This equipment can provide a stable test space for pre-heating, drying, changes about physics and chemistry testing. It supplies precision temperature controller with high stability of platinum resistance to temperature that makes temperature well-distribution.





#### Specifications

Model	Inner size W*H*D(cm)	External size W*H*D(cm)	Temperature range(°C)	Accuracy (°E)	Uniformity (°C)	Power	Rate of work(kw)
LY-645	45 × 40 × 40	70×96×54		±0.3	±1%		3.5
LY-660	50 × 60 × 50	74 × 122 × 64		± 0.3	± 1%		4.5
LY-690	60 × 90 × 50	86 × 156 × 65		±0.3	± 1%		5.5
LY-6480	80 × 100 × 60	108×174×73	(A−D) A:200°C	±0.3	± 1%	220V	8
LY-6100	100 × 100 × 100	126 × 174 × 114	B:300°C	± 0.3	± 1%	Or	10
LY-6120	90 × 120 × 60	130×193×86	C:400℃ D:500℃	±0.3	± 1%	380V	10
LY-6140	140 × 120 × 60	200 × 186 × 90		±0.3	±1%		12
LY-6160	160 × 140 × 80	230 × 206 × 110		± 0.3	±1%		14
LY-6180	180 × 140 × 100	250 × 215 × 132		±0.3	± 1%		16

#### All Size Customized Industrial Oven

#### Uses:

Suitable for baking, curing, drying and other processes of various industrial products, can be customized size, laminate, cart, color, appearance, temperature and so on.





#### Characteristics:

- 1. Outside SECC steel, fine powder coating treatment; Inner SUS#304 stainless steel.
- 2. Use new high temperature resistant long shaft motor
- 3 Turbine fan.
- 4. Silicone forced tight
- 5. Overtemperature protection, super load automatic power system.
- 6. Circulation system: air force level cycle.
- 7. Heating system:PID+S.S.R.
- 8. The thermostat: PID microcomputer control, automatic constant temperature, temperature quickly compensation function
- 9. Timer: temperature to time, when the power failure alarm indication.
- 10. According to customer demand matching glass window can be customized according to customer specifications specified.







# LY-280 Programmable Temperature Humidity Test Chamber

#### Uses:

This equipment can simulate different environment condition. It's appropriate for testing material performance, such as resist heat, resist dry, resist humidity and resist cold. That can define performance of material.

Standards: GB/T2423/5170/10586, JIS C60068, ASTM D4714, CNS3625/12565/12566





#### **Specifications**

Model	LY-280	LY-2150	LY-2225	LY-2408	LY-2800	LY-21000		
Inner size W×H×D(cm)	40×50×40	50×60×50	50×75×60	60×85×80	100×100×80	100×100×100		
xternal size W×H×D(cm)	92×138×108	102×146×116	102×162×126	113×172×148	150×186×139	158×188×168		
Volume (L)	80 L	150L	225L	408L	800L	1000L		
Temp & Humi Control Range	State of the state	ange: A:-20℃~150 ange: RH20%-98%	°C B: -40°C~150°C	C: -60°C~150°C	D: -70℃~150℃			
Fluctuation	±0.5℃; ±2.5%RH							
Deviation	±0.5°C-±2°C; ±3%RH (<75%RH); ±5%RH( 75%RH)							
Controller	TEMI880, 990, 1500 or customize brands and models							
Refrigerator	Fully enclos	Fully enclosed piston French Tecumseh compressor(or Semi-closed Bitzer compressor)						
Refrigerants	Dupont (R23+R404)							
Test hole		*50mm, 100mm or customize						
Power	1φ 220V AC±10% 50Hz 3φ 380V AC±10% 50Hz							

# LY-612 Muffle Furnace

Used for special baking process can be used for aging test of electronic components and plastic chemical products together with iron preheat, quenching, burn, stewing, annealing, ashing test, concise and other high fever processing experiment, ect.



#### **Specifications**

Model	Inner size W*H*D(cm)	External size W*H*D(cm)	Temperature range(°C)	Heating Time	Accuracy	Power	Rate of work(kw)
LY-612	12×8×20	48×65×56			±1		3
LY-625	25×16×40	65×74×79	RT ~ 1200℃ Or customize	RT~1200℃ About 50min	± 1	220V or 380V	9
LY-630	30×20×50	69×681×88			±1		12
LY-640	40×40×60	80×95×80			±1		16

# LY-608 Vacuum Drying Oven

LY-608 Vaccum Drying Oven is used for drying and heating test in vacuum condition of objects in scientific research units, specialty universities, industrial and mining enterprises's laboratories together with production field, etc.



#### **Specifications**

Model	Inner size W*H*D(cm)	External size W*H*D(cm)	Temperature range(°C)	Vacuum Degree	Control Mode	Power
LY-608-30	30 × 30 × 30	61×47×47				
LY-608-40	40×40×40	71 × 57 × 57	40~200℃	760~1Torr	Microcomputer PID+S.S.R+Timer	220V or 380V
LY-608-60	60×60×60	96 × 80 × 80				



# LY-ZW UV Accelerated Weathering Tester

This tester can provide reliable aging test data to make the exact prediction of products' weathering fastness(aging resistance)., which is conducive to sift and optimize the formula. It is used in many industries, such as: paint, inks, resin, plastics, printing and packaging, adhesives, auto and motorcycle industry, cosmetics, metal, electronic, electroplating, medicine, etc.

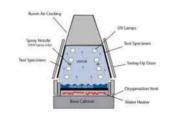
#### Standards:

IEC61215, ASTM D4329, D499, D4587, D5208, G154, G53; ISO 4892-3, ISO 11507;EN 534; EN 1062-4, BS 2782; JIS D0205;SAE J2020,ect.

#### **Specifications**

Inside Dimensions (CM)	45×117×50
Outer Dimensions (CM)	70×135×145
Power consumption	4.0(KW)
Temperature Range	RT+10℃~70℃
Humidity Range	≥95%R.H
Specimen Number	L150mm×W75mm, 48pcs
Ultraviolet Wavelength	290nm~400nm UV-A340、UV-B313、UV-C351
Rate of the Lamp	40W





This machine can provide the simulative heat of the sun and ultraviolet radiation environment of space. It is used for observing the anti-yellowing degree of the sample after a period of time effected by the ultraviolet ray and the temperature. Grey stain can be used for reference standard, to judge it's yellowing degree. Products will change their color when radiated by the sun or influenced by the environment of the container. The machine can also be used as an aging tester or an oven, presenting a multi-function machine.

Standards: GB/T8830, ASTM D1148, ISO8580

LY-605A UV Test Chamber

#### Specifications

Temperature range	RT+5°C~200°C
Internal size W×H×D(cm)	50×60×50
External size W×H×D(cm)	85×129×65
Accuracy of temperature	±0.3°C
Distribution of temperature	±0.5°C
Test rack	Speed of 1~10rpm, adjustable, single-deck rotating stand
Power	1Ф, 220V , 50HZ



# LY-XD Xenon Weathering Aging Chamber

This machine is a comprehensive climate testing machine, can do climatic aging test and the lightfastness test of polymer materials which exposed at simulated sunlight. It simulates the light, temperature, rainfall, condensing, humidity to test the materials; it can be used for choosing new materials, improving existing materials, or assessment of change in material composition.

#### Standards:

GB/T16422-2, GB/T1865-97, GB/T9344-88, ASTMG155, GB/T16422.2, GB/T2423.24-1995, ISO10SB02/B04, SAEJ2527, SAEJ2412

#### Specifications:

Test Chamber Size D×W×H	All size customize				
Temperature range	Blackboard: 40~80°C(adjustable)				
Temperature range	Test chamber: 35~60°C(adjustable)				
Humidity range	Light cycle 20%~65% R.H				
number range	Dark cycle :50%~95%				
Spray time	1 to 9999min, abjustable				
Spray cycle	1-240min, interval adjustable				
Spectral wavelength	290nm to 800nm				
light source	Full spectrum xenon lamp				
Xenon lamp power	2.5 kw (longevity: 1600H)				



# LY-609 Salt Spray Test Machine

Salt spray test machine can determine the corrosion resistance of iron metal or the iron metal inorganic film or organic film test, such as: electroplating, anode processing, conversion coating, painting, ect.

#### Standards:

CNS3627、3885、4159、7669、8886、JIS D-0201、H-8502、H-8610、K-5400、Z-2371、ISO 3768、3769、3770、ASTM B-117、B-268、GB-T2423、GJB 150.



#### Specifications:

Model	LY-609-60	LY-609-90	LY-609-120	LY-609-200		
Test chamber capacity (L)	108L	270L	600L	1440L		
Temperature	Test ch	namber	NSS.ACSS 35℃ ±1℃/CASS 50℃ ±1℃			
remperature	Air cyli	nder	NSS.ACSS 47℃ ±1℃/CASS 63℃ ±1℃			
Test chamber size L × W × D(cm)	60*45*40	90*60*50	120*100*50	200*120*60		
Max volum of test liquid (L)	15	25	40	40		
Volume L × W × D(cm)	107*60*118	141*88*128	190*130*140	270*150*150		
Power	AC220V,10A	AC220V,15A	AC220V,30A	AC220V,30A		

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#### LY-TS Thermal Shock Test Chamber

The thermal shock test chamber is the perfect testing machine of electronic components, metal, chemical materials, automation components, communication module, national defense industry, aerospace industry, BGA, PCB substrate, electronic chip IC, semiconductor ceramic and high polymer materials.

#### Standards

 1.GB/T2423.1-1989
 7.SJ/T10187-91Y73

 2.GB/T2423.2-1989
 8.SJ/T10186-91Y73

 3.GB/T2423.22-1989
 9.IEC68-2-14

 4.GJB150.5-86
 10.GB/T 2424.13-2002

 5.GJB360.7-87
 11.GB/T 2423.22-2002

 6.GJB367.2-87 405
 12.QC/T17-92

 13.EIA 364-32

#### Specifications:

Model	LY-TS-42	LY-TS-80	LY-TS-150	LY-TS-225
Inner Size(mm)	400×350×300	400×500×400	500×600×500	500×750×600
Temperature Range	High temperatu	re chamber:RT~+	150°C Low temper	rature:RT~-40°C
Temperature Deviation	Less than ±2℃			
Temperature Conversion Time	Less than 10:	S		
Temperature Recovery Time	Less than 5m	iin		



# LY-CY Ozone Aging Test Chamber

It is widely used to control products quality in measuring quality control; Rubber & Plastics; automobile production; wire and cable; packing materials; instruments and meters; medical equipment; civilian nuclear energy; civil aviation; colleges and universities; research laboratories; inspection arbitration, and technical supervision departments and other rubber products.

#### Standards

JIS K 6259, ASTM1149, ASTM1171, ISO1431, DIN53509, GB/T13642, GB/T 7762-2003, GB 2951

#### Specifications:

Model	LY-CY-80	LY-CY-150	LY-CY-225	LY-CY408	LY-CY-800	LY-CY-1000		
Inner size W*H*D(cm)	40*50*40	50*60*50	50*75*60	60*85*80	80*100*100	100*100*100		
Outer size W*H*D(cm)	85*140*95	95*150*115	95*165*115	105*175*135	145*190*135	155*195*150		
Temperature range	RT+10°C∼60°C							
Concentration range	10~500pphm (or custom made)							
Concentration deviation	10%	10%						
Ozone flow rate	12~16mm/s							
Power	AC 220V or 380V ±10%, 50/60HZ							



# LY-L80 IPX1-6 Waterproof Test Chamber

#### PX1/2 Vertical Rain Drop Test

Meet the requirement of IEC60529 standard IPX1 vertical rain drop test and IPX2 15°inclination rain drop test.

IPX3/4 Vertical Rain Drop Test and IPX5/6 level strong spray water resistance test.



#### Specifications:

	IPX3			IPX4		- 1	PX5		1	PX6	
DI	Total	Flow	81 1 1		l Flow		Who	le flow		Whole	e flow
Blow hole number	L/min	L/h	Blow hole number	L/min	L/h	Spray nuzzle diameter (mm)	L/min	L/h	Spray nuzzle diameter (mm)	L/min	L/h
25	1.8	108	37	2.6	156	6.3	12.5	750	12.5	100	6000

#### LY-SC Dust Test Chamber

It is maily used for testing control cabinet, household appliances, low voltage electric appliance, automobile, lamps and lanterns, motorcycle parts, ect outer shells. Test chamber pressure can be constant and changed, suitable for indoor low concentration dust pollution test, assessment sample in this environment of sealing and corrosion degree.

#### tandards

GB4706, GB2423, GB7000.1, IEC60529,ect

#### Specifications:

Model	LY-SC
Test chamber dimension	800*800*800mm (H* W*D) All size customize
Metal screen wire diameter	50um
Screen line space	75um
Controller	Touch screen programmable controller
Environment temperature and humidity	15~45℃, 45~75%RH
Dust(talcum powder) concentration	2~4kg/m3
Test time	Dust test time set freely, 0~999.9hr
Test dust	Dry talcum powder or portland cement
Test standards	GB4706、GB2423、GB7000.1、IEC60529
Power	1ψ 220V±10% AC 50HZ



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#### Electronic tensile tester

**Uses:** This machine is designed for quick and reliable tensile, compression, bending, shear, peel, loop tack and fatigue cycling on metals, tape, composites, alloys, rigid plastics and films, elastomers, textiles, paper, board and finished products.

Standards: ASTM D903, GB/T2790/2791/2792, CNS11888, JIS K6854, PSTC7



Model	LY-1065	LY-1068	LY-1075	LY-1070	LY-1100
Accuracy class	0.5	0.5	0.5	1	1
Max load capacity	500KG	500KG	500KG	200KG	50KG
Resolution	1/250,000	1/150,000	1/150,000	1/100,000	1/10,000
Force relative error	±0.5%	±0.5%	±0.5%	±0.5%	±1%
Displacement relative error	±0.5%	±0.5%	±0.5%	±1%	
Test speed relative error	±0.5%	±0.5%	±0.5%	±1%	±1%
Test speed range	0.1~500mm/min	50 ~ 500mm/min	50 ~ 500mm/min	50 ~ 300mm/min	Fix speed
Test stroke(contain clamps)	850mm	850mm	1200mm	850mm	600mm
Driving mode		High accuracy ball screw rodT			type screw
Motor	Panasonic sevor motor	AC Inverter motor	AC Inverter motor	DC motor	AC motor
Operation method	All computer control	All computer control	LCD digital button control	LCD digital button control	LCD digital button contro
Machine size	500×500×1070mm	500×500×1070mm	600×450×1800mm	500×500×1070mm	350×300×1020mm
Power	1PH, AC220V, 50/60Hz				
Weight	75kg	75kg	100kg	70kg	45kg

# LY-1066 Double Column Tensile Testing Machine

Uses: This machine also known as a materials testing machine, is applicable to testing tensile stress, compressive stress, shearing force, peeling force, and elongation of materials, components, and finished product for metal, plastic, rubber, textile, synthetic chemicals, wire and cable, leather, ect.

#### Characteristics:

- 1. The structure is made of the paint-coated aluminium blanking plate. The interior is used the high-accuracy,low-resistance and zero clearance of two ball screw and oriented pole which improve loading efficience and structure rigidity.
- 2. Use Panasonic seveo motor which ensure high efficiency, steady transmission and low noise. The accuracy of speed can be controlled in 2%.
- 3. That Using the business computer as the main control mathine plus the special testing software of our campany can conduct all of testing parameter, work state, collecting data&analysis, result display and printing output.



#### Specifications:

Model	LY-1066A	LY-1066B	LY-1066C
Accuracy class	0.5	0.5	1
Max load capacity	5000KG	2000KG	2000KG
Resolution	1/250,000	1/150,000	1/150,000
Force relative error	±0.5%	±0.5%	±0.5%
Displacement relative error	±0.5%	±0.5%	±1%
Test speed relative error	±0.5%	±0.5%	±1%
Test speed range	0.1 ~ 500mm/min	50 ~ 500mm/min	50 ~ 300mm/min
Test stroke(contain clamps)	1200mm	1200mm	1200mm
Driving mode		High accuracy ball screw rod	
Motor	Panasonic sevor motor	AC Inverter motor	AC Inverter motor
Operation method	All computer control	All computer control	LCD digital button contro
Machine size	800×500×1500mm	800×500×1500mm	800×500×1500mm
Power		1PH, AC220V, 50/60Hz	
Weight	150kg	150kg	130kg





# LY-1067 High-Low Temperature Tensile Testing Machine

Feature: This machine combines high-low temperature tester with peel strength tester wonderfully. It can restrain the error brought by changing environment between testing process. Setting up different fixtures can test 180&90 degree peeling strength, separating force, ect. for the adhesive material in the high-low temperature environment. This machine can be changed into programmable temperature&humidity tester according to your needs.

#### Specifications:

Capacity 2,5,10,20,50,100,200,500,1000kg	
Accuracy	≤0,5%
Testing speed	1~500mm/min
Stroke	400,500,600mm(Height can be customed)

#### Temperature control system:

Temperature range	-40°C~150°C
Temperature method	computer P.I.D.automatic control
Humidity range	20%RH~98%RH
itability of control	±2.5%RH,±1°C
Accuracy of distribution	±3%RH,±1°C



# **Hydraulic Universal Testing Machine**

This machine has the oil cylinder of underneath type and of microcomputer control, electro hydraulic servo. It has the advantage such as high precision, easy to operate and large capacity of keeping record of data as well as indication of kinds of curves. It is suitable for doing testing experiments such as the tensile, compression, bending and shear testing for all kinds of metal materials and nonmetal materials such as plastic, concrete, cement and so on.

#### Specifications:

Spec	WAW-300D	WAW-600D	WAW-1000D	WAW-2000D
Max test force(KN)	300	600	1000	2000
Valid measurement range of test force		2%~100%	FS	
Test accuracy		Better than	±1%	
Max. tension test space (mm)	700	700	700	700
Max. compression test space (mm)	650	650	650	650
Holding thickness of round specimen	ФФ10~Ф32	Ф13~Ф40	Ф13~Ф40	Ф15~Ф70
Height of principle machine(mm)	2150	2280	2510	3330
Weight(kg)	2000	2500	3500	5000



#### LY-RR Melt Flow Indexer

#### Discription

LY-RR melt flow index tester can be used for ABS, polystyrene, polyethylene, polypropylene, polyamide, fiber resin, acrylate, POM, fluorine plastic, polycarbonate and other plastic materials, the melt flow rate (MFR) or the melt volume flow rate (MVR) to be determined.

Standards: GB/T3682-2000,ISO1133-97, ASTM1238

#### Technical parameter:

Barrel parameters	Inner hole 9.55±0.025mm	
Pistons parameters	Piston head: 9.475±0.015mm	
Piston length	H=6.35±0.1mm	
Parameters	Extrusion hole 1=2.095±0.005mm	
Temperature range	400°C	
Weights	0.325kg, 1.kg, 2.1kg, 3.kg, 5.kg, 10.0kg, 12.kg, 21.6kg	



#### LY-3030 Vicat Soft Point Tester

This tester is mainly used to do the HDT test and VICAT test for non-metal materials: such as plastic, rubber, and nylon.

#### Standards:

ISO75,ISO306, ISO 2507, ASTM D648, ASTM D 1525, GB/T 1633, GB/T 1634 and the equivalent.

Temperature range	Room temperature ~ 300°C
Test station	3 、4、6 (please specify)
Heating speed	120±10°C/h(12°C±1°C/6min)
	50± 5°C / h ( 5°C±0.5°C / 6min )
Load range	0.864N —49.03N
Deformation measurement range	0—1.000mm
Test shelf span	60—180mm ( Suitable for thermal deformation test )
Power source	AC220V/50Hz 20A





# LY-XJJD Digital Charpy Impact Tester

Mainly used in hard plastic (including plank, materials, plastic profile), the increase of nylon, glass fiber reinforced plastic, ceramic, and cast stone, electrical insulating materials etc. Nonmetal material impact toughness is determined.

#### Standards:

ISO 179, GB/T 1043 and the equivalent.

#### Specifications:

Туре	LY-XJJD5	LY-XJJD50
Impact energy	0.5 J,1 J,2 J,4 J,5 J	7.5 J,15 J,25 J,50 J
Impact speed	2.9 m/s	3.8 m/s
Distance between shaft and center of specimen	230 mm	395 mm
Dimensions	L x W x H=(420 x 250x 650) mm	LxWxH=(550 x 300 x 890) mm



# LY-XJUD Digital Izod Impact Tester

This tester is mainly used in hard plastic (including plank, materials, plastic profile), the increase of nylon, glass fiber reinforced plastic, ceramic, and cast stone, electrical insulating materials etc. Nonmetal material impact toughness is determined.

#### Standards:

GB/T1843, ISO180, GB/T21189, GB/T2611, JB/T8761

#### Specifications:

Mode	LY-XJUD5.5	LY-XJDU22
Impact speed	3.5n	n/s
Pendulum energy	1.0J、2.75J、5.5 J	11J 22J
Pendulum angle	150°	
Impact center distance	335mm	
Fester size:(LxWxH)	(830x300x	(890)mm
Power	220V 50H	Z 0.1KW



#### LY-ZRS IEC60695 Glow-wire Tester

Glow-wire Test Apparatus is according to IEC60695-2-1 and Glow wire tester is to test glow wire of lighting lamps, electric products and househould appliances basic testing methods of Glow wire.

Standards: UL746A, IEC829, DIN695, VDE0471

#### Specifications:

Glow wire	diameter 4mm±0.04mmNi/Cr(80/20), standard
Temperature range	500-1000°C ±2°C continus adjustable
Ironing into depth	7mm ± 0.5 mm
Sample pressure	1N ± 0.2 N
Test speed	18±3mm/s
Chamber	≥0.5m
Size	W1100mm×D700mm×H1300mm, exhaust hole Ø100mm can customize
Power Supply	800VA ,220V, 48-60Hz



# LY-3095 Leakage Current Tracking Index Tester

The test apparatus is a destructive test of the insulating material case to test and evaluate the relative resistance to traceability of the insulator in the presence of electric and impurity water at a specified voltage. Applicable to electrical and electronic products, household appliances, solid electrical insulation materials and their products, such as: relay socket, switch cover, contactor body.

#### Standards:

IEC 60112, IEC 60745-1, IEC 60335-1, IEC 60598-1, IEC 60884-1 ASTM D 3638-92, UL746A, GBT 4207

#### Specifications:

Inner volume	≥0.5m³, With glass window
Test voltage	100-600V Adjustable
Short circuit max. current	3A±0.1A
electrode	The section is a 2mm*5mm rectangular metal electrode with a 30° bevel edge
The force of two electrodes on the sample	1.0N±0.05N
Electrode spacing	4.0mm
Dropping device	Drop height 30mm-40mm adjustable
Drip interval	Adjustable
power source	AC220V,50Hz



#### LY-3096 Needle Flame Tester

used for lighting, low-voltage electrical appliances, household appliances, machine electrical appliances, electrical, power tools, electronic equipment, electrical instrumentation, electrical connectors, accessories and other electrical and electronic equipment and its components, components of the research, production and quality inspection departments, Needle Flame Tester is also for insulating materials, engineering plastics or other solid combustible materials industry. In line with IEC60695-2-2 test standard.

#### Standards

IEC60695-11-5, IEC60695-2-2, GB/T 5169.5, GB 4706.1

#### Specifications:

Inner volume	≥0.5m³. With glass window
fuel	Butane gas
Fuel device size	Length 35mm and above, inner diameter Φ0.5mm±0.1mm, outer diameter not exceeding Φ0.9mm
Flame height	12mm±1mm Adjustable
Flame temperature	100°C rises to 700°C within 23.5±1S
Timer	0-99M99S Adjustable
power source	AC220V,50Hz



# **PLASTIC PIPES TESTERS**

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# LY-3094 UI94 Flammability Tester

The test equipment apply to the electrical and electronic product components of household appliances, spare parts and components, such as: household appliances insulation shell, Panel switches, printed circuit boards and insulation materials and so on.

Standards: UL94 .GBT2408.IEC60695.GB470

#### Specifications:

Cabinet capacity	≥0.5 cubic meters, with glass watch door
Ignite time	0~99 minutes and 99 seconds can be set
After flame time	0~99 minutes and 99 seconds can be set
Residual burn time	0~99 minutes and 99 seconds can be set
Combustion angle	20°,45°,90°(equal to 0°) can be adjusted
Burner size parameter	Nozzle diameter Ø9.5 $\pm$ 0.3mm, nozzle effective length is 100 $\pm$ 10mm, with air adjust hole.
Power	AC220V±10% 50HZ



# LY-QK01 Motor Type Notch Sample Maker

#### **Technical Function:**

The notch sample maker is the sample maker for making notch sample required by izod and charpy pendulum impact tester in nonmetal material impact toughness test,notch deepth is controlled by micrometer. Completely comply with standard stipulated in IS0179. IS0180. GB / T1043. GB/T1843. GB/T8814,it is a reliable sample maker with simple structure and high precision,it is easy to operate quickly and accurately.

#### **Main Technical Parameters**

- Ø Table travel:> 160mm
- Ø Feed speed: 30mm / min
- Ø Sample types: A, B type, C type
- Ø Dimensions: 600mm imes 270mm imes 300mm
- Ø Power supply voltage: 220V, single-phase three-wire system

# **DSC-500A Differential Scanning Calorimeter**

Touch screen type, Apply to: glass transition temperature, melting point, cold crystallization, crystallization, phase transition, oxidation induction time (OIT).

#### Standards:

ISO/TR10837:1991, ASTM D3895-1998, ASTM E 967, ASTM E 968, ASTM E 793, ASTM D 3895, ASTM D 3417, ASTM D 3418, ISO 11357-6

#### Specifications:

Temperature range	room temperature to 500 °C	
Heating rate	0.1 ~ 80 °C / min	
Temperature resolution	0.1 °C	
DSC range	0 ~ + 200 mw	
DSC resolution:	0.01 mW	
Power supply	AC 220 v, 50 hz	
Product weight	23 kg	



# LY-1078 Ring Stiffness Tester

Ring stiffness tester is applies to determine thermoplastic pipe ring stiffness which with a circular cross section. And it can also be applied to flat experiment, ring flexibility experiment, etc. The instrument meets the requirement of test standards for PE double-wall corrugated pipe, coil pipe and all kinds of plastic.

Standards: ISO 9969,BS EN 1979, ASTM D2122,GB/T9647

#### Specifications:

Load	30KN (or customize)
Suitable diameter (inside diameter)	300mm~2000mm
Move speed	0.5mm/min~200mm/min
Return speed	200 mm/min
Displacement accuracy	0.01mm



# LY-3092 Falling Weight Impact Tester

Falling Weight Impact Testing Machine is specially designed to determine the resistance to external blows of thermoplastic pipes and polymer test samples and components. It is suitable for PVC-U pipe, PVC-C pipe, PP pipe, PE pipe, communication pipeline, etc.

#### Standards:

ISO 4422, ISO 3127, BS EN 1411, BS EN 744

#### Specifications:

Striker weight	0.250~15.00kg (increment: 0.100kg and 0.250kg), selectable	
Striker radius	12.5mm, 50mm, can be customized	
Impact height	50-2000mm±2mm	
Specimen diameter	10-630mm	
Power supply	220V, 50Hz	
Max. striker lifting speed	12m/min	
Dimensions	1100×570×3710mm (L×W×H)	
Weight	approx. 260kg	



# LY-3088 Pipe Hydrostatic Pressure Tester

#### **Product Overview**

The machine is nice in appearance, simple in structure and of high precision and stability as well as easy to operate, it is the it is the necessary testing machine for quality inspection department of kinds of research institutes and pipes manufacturers.

#### Standards:

ISO1167、ISO9080、EN921、ASTMD1598、ASTMD1599 ISO13479



#### **Technical Parameter**

Pressure range of the main engine	0~10MPa / 20MPa / 30MPa
Control range of constant temperature water tank	room temperature ~ 95°C
Pressure resolution	0.001MPa
Temperature control accuracy	±0.5°C
	3 roads (Can customize to max 7 roads
Test stations	for single machine)



# LY-3080 Drop Ball Impact Tester

This tester is used for testing the fastness of plastic, ceramics, glass fiber, ect such materials. Uses certain weight steel ball and adjust to certain height to let it fall freely and impact test sample. Then check the sample damage degree to judge the sample quality.

Standards: JIS-K6754, A5430

# U

#### Specifications:

Max drop height	2m (or custom made)
Drop ball control mode	DC electromagnetic
Steel ball weight	112, 198, 225, 357, 533, 1042, 2280g
Dimension	46*46*2100cm
Test table dimension	300*150mm
Weight	About 30kg
Power	220V/50HZ

# LY-3098 Coefficient of Friction Tester

It can measure the coefficient of static friction and dynamic friction when materials are sliding. It is applicable for the packaging trade, film plants, testing institutions and so on.

Standards: ASTM D4918 ASTM D1894

#### Specifications:

Sample thickness	≤0.2mm
Sliding piece size	63×63mm
Sliding piece mass	200±2g
Slider-speed	100 ± 10mm/min, 125 ± 10mm/min, 150 ± 10mm/min
Working-table board size	200×470mm
Force measurement range	0-5N
Power supply	200V, 50Hz



# LY-XJB30 Falling Dart Impact Tester

Falling Dart Impact Tester is applied to conduct impact test on plastic films ,papers ,sheeting and so on. By testing the impact strength to estimate the material property of impact resistance, widely used in industries of packaging, plastic films, laboratory, research institute, inspection agency and so on.

#### Standards:

ISO7765-1, GB/T 9639, GB/T 15267, ASTM D1709, JIS K7124

#### **Technical Parameter:**

Dart weight	50-2000g, 5g/increase, deviation ≤ 0.5%
Dart diameter	mode A 38±1mm, mode B 50±1mm
Clips diameter	outer 150mm, inner 125mm
Impact height	660mm / 1500mm
Test range	mode A 50~2000g, mode B 300~2000g
Test accuracy	1g
Instrument size	650× 650×(2200~2600)mm
Weight	50kg
Power supply	220V 50Hz



# LY-122B Haze Meter

To test the light transmittance and haze degree of all transparent and semi-transparent parallel plane samples (plastic plate, sheets etc), and turbidity or clarity of liquid samples (water, drinks etc), used in the industries of plastics, membrane, coatings and paints, printing ink, research institute and so on.

Standards: ASTM D1003, and GB/T 2410-2008.

Test range	light transmittance 0 ~ 100.0%, haze degree 0 ~ 30.00%
Minimum reading	light transmittance 0.01%, haze degree 0.01%
Light source	Light source C (6774K)
Size of sample	Solid sample: 50mmx50mm
	Liquid sample: 50mmx50mmx10mm (size of liquid sample cup)
Size of haze plate	Ø40mmx2mm
Power supply	220V±22V, 50Hz±1 Hz
Instrument size	700mmx270mmx300mm
Weight	21kg





# LY-8311 Digital Thickness Tester

Thickness Tester is used to make thickness measuring or comparative measuring of plastic film, thin sheet, paper and so on.

Standards: GB/T 6672, ISO 4593, ASTM F2251

#### Specifications:

Test range	0.001~12.5mm	
Test precision	1µm	
Measure force	0.5~1N	
Measure stick size	Φ5mm (can customize)	
Measure stick roughness	Ra < 0.2µm	



# LY-8312 High Precision Thickness Tester

This instrument is used to make thickness measuring or comparative measuring of plastic film, thin sheet, paper and so on.

Standards: GB/T 6672, GB/T 451.3, ISO 4593, ISO 534, ASTM D645, ASTM F2251

#### Specifications:

Test range	0~1.5mm	
Test precision	0.1µm	
Number of test points	0~10 points	
Spacing of test points	0~1000mm	
Measure force	0.5N	
Measurestick size	Φ5mm (can customize)	
Instrument size	38×36×33cm	



# LY-8315 Heat Shrink Tester

This instrument tests the heat shrinkage of plastic film after heated in liquid medium in higher temperature.

Standards: GB/T 13519, ASTM D2732

#### Specifications:

Sample size	≤140×140mm	
Temperature range	maximum 250°C	
Temperature precision	±0.2°C	
Time range	0.01s~99.99h	
Liquid medium	glycerin	
Instrument size	32×40×22cm	



# LY-MF01 Leak Tester

It is professionally applicable to the leakage tests of packages for food, drugs, medical instruments, daily chemical products, cars, electronic components, stationeries and other industrial products. It also could be used to the determination of seal performance of specimens after falling and compression tests.

Standards: GB/T 15171 -1994, ASTM D 3078 -94.



#### Specifications:

Vacuum degree	0~90kPa
Accuracy	±0.1Kpa
Vacuum chamber size	Φ270mm×200 mm (H), can customize
Air pressure	0.7MPa
Machine size	520×320×600mm
Power source	AC 220V 50Hz
Net weight	15kg

# LY-SL1000Z Elmendorf Tear Strength Tester

It is designed for the tearing test of films, sheets, flexible PVC, PVDC, waterproof films, woven materials, polypropylene, polyester, paper, cardboard, textiles and nonwovens. It is the necessary testing instrument for the packaging, paper industries, quality inspections and quarantine labs.

#### Standards:

ISO 6383-1-1983, ISO 6383-2-1983, ISO 1974, ASTM D1922, ASTM D1424, ASTM D689, TAPPI T414

Pendulum Capacity	200 gf, 400gf, 800gf, 1600 gf, 3200gf, 6400gf	
Resolution	1mN	
Sample Holder	Pneumatic	
Pendulum Release	Pneumatic	
Dimension	470mm×340mm×530mm	
N.W.	30kg	





#### LY-STH-5 Five Point Hot Seal Tester

To test the temperature, pressure, time and strength for heat sealing of various plastic films, composite film, aluminum foil and so on, widely used in industries of plastic films, food, pharmaceuticals, inspection agency, research institute and so on.

Standards: QB/T 2358, ASTM F 2029, YBB 00122003

#### Specifications:

Heat sealing temperature	room temperature ~ 300°C
Temperature accuracy	±1°C
Heat sealing time	0.01s~9999.99h
Heat sealing pressure	0~0.7Mpa
Heat sealing area	300×10mm (can customize size)
Heating mode	≤20°C
Air source pressure	≤0.7MPa
Instrument size	500×330×470mm
Weight	30kg
Power supply	220V, 50Hz



# N530 Gas Permeability Analyzer

This instrument is widely used in food industry, pharmaceutical industry, cosmetics flexible packaging materials industry (plastic film, barrier materials, sheets, metal aluminum, PVC, PVC sheets), college, university and quality institution for gas(O<sub>2</sub>,CO<sub>2</sub>,N<sub>2</sub>, Non-inflammable gas and Non-etchant gases.) permeation test and quality control.

#### Standards

GB/T 1038、ISO 2556、ISO15105-1、ASTM D1434、 YBB00082003、JIS K7126-A

#### **Technical Specification**

Measuring range	0.02~50000cm3/m2 ·day·0.1Mpa 0.02~600000 cm3/m2 ·day·0.1Mpa(by use expansion the mode)	
Testing temperature range	15°C~35°C, (5~50°Cis optional)	
Temperature precision	±0.01℃	
Humidity Range	0%RH, (30~90%RH)	
Vacuum	<10Pa	
Gas Pressuer	-0.1~+0.1MPa	
test gas	O2, CO2, N2	
Sample thickness	≤2mm	
Gas Pressuer	0.2 ~ 0.8MPa	
Sample area	Ф110mm	
Power supply	220V AC , 50HZ	



# LY-3050 Mooney Viscometer

It is used for testing reclaimed rubber or gross rubber viscosity, scorch and vulcanization index, etc. Computer control, data display, automatic calibration, it is a precision labrotary test instrument of rubber industries.

#### Standards:

GB/T1232, GB/T 1233, ISO667, ISO 289, ASTM D 1646, JIS K 6300 ETC.

#### Specifications:

Range of temperature control	Room temperature to 200°C	
Temperature fluctuation in die	≤±0.1°C	
Temperature display resolution	0.1°C	
Rate of temperature increase	25°C/min	
Measurement range of torque	0-200 MV	
Torque resolution	0.01MV	
Frequency of rotor	2±0.02r/min	
Temperature PID Control	+/- 0.1°C	
Power supply	220 V ,1 Phase, 50 Hz	



#### LY-3018 Rubber No Rotor Rheometer

The rubber no rotor rheometer is a widely used tester in rubber processing industry, rubber quality control and basic research rubber, For optimize formula of rubber provide accurate data, It can accurately measure the scorch time, rheometer time, sulfide index, the maximum and minimum torque and other parameters.

Standards:GB/T16584, ISO6502, ATM D5289, ect.

#### Specifications:

Temperature range	room temperature to 200°C	
Heating rate	15°C/min	
Torque range	0-20N.M	
Torque resolution	0.001NM	
Rotor swing angle	±0.5°C , ±1°C , ±2°C	
Swing frequency	100r/min(1.66HZ)	
Power	50HZ, 220V±10%	
Out size	640mm×580mm×1300mm	
Weight	210kg	



# LY-3010 DIN Abration Tester

This machine is suitable for elastic materials, rubber, lose tire, conveyor belt transmission belt, sole, soft leather, synthetic leather such material abrasion test, with the highly efficient, good reproducibility and easy operation properties.

Standards:DIN-53516、ISO-4649、GB/T9867

Specimen	φ16mm,6~15mm ( D )	
Fixture load	2.5N	
Roll diameter	150mm	
Rolling speed	40rpm	
Abrasion speed	0.32m/sec	
Volume	95*66*31cm	
Weight	50kg	
Power	220V 50HZ	



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# LY-3012 NBS Rubber Abration Tester

#### Uses

This machine evaluates resistance to abrasion of vulcanized rubber or other compounds, confirming to ASTM D1630 standards.

#### Specifications:

Capacity	2265g, 3 groups
Roller diameter	150 mm
Roller speed	45±5 times/min
Counter	LCD 0-999999 times 6 status display
Abrasive paper model	40#,60#(optional)
Machine dimension	710mm×440mm×560mm(L×W×H)
Veight	100kg
Power	AC~220V 50HZ



# Shore-A hardness tester

#### Feature

- 1, arch culverts, numerical reading conviently, high accuracy.
- 2, handheld design, convenient to carry.

#### Specification:

- Carved degrees dish: 0 ~ 100HA (A type) 0 ~ 100HW (C type) 0 ~ 100HD (D type);
  presserdisc: 2.5 mm;
  measurement range: 20 ~ 90HD;
  Pressure needles top size: Φ 0.79 mm(Atype) SR 2.5 mm(Ctype)
- SR 0.1 mm(Dtype);
  •Weight: ~ 0.5 kg.



# LY-502 Permanent Compression Slanting Tester

#### Applied range:

The machine is suitable for determination of vulcanized rubber constant deformation compression permanent deformation characteristics of the test method. The provisions of this test is to squeeze the rubber sample into highly, by a certain temperature and time, or after medium infiltration, determination of test specimen compression permanent deformation rate.



# Colorimeter and gloss meter







WG28 Colorimeter



Ns810 Spectrophotometer



HP-200

Wg68 3 Angles Glossmeter



Wr10 Colorimeter



NR200 Colorimeter



LY-GY Color Assessment Cabinet

# QL-300A Plastic Density Meter

#### Suitable for:

Rubber, Plastic, Electric wire, Hard alloy, New materials research lab

#### Specifications:

Model	QL-300A	QL-600A
Measuring range	0.005g - 300g	0.01g - 600g
Value showed	Apparent der	nsity, volume
Testing time	About 5 seconds	
Density Precision	0.001 g/cm3	



# XY-105MW PlasticMoisture Meter

It can display the moisture value, dry percent, measuring time, temperature, and other data. Also can connect the computer, printer connection. Suitable for testing PC, PE, PP, PET, PPS, PVC, PA, etc.

#### Specifications:

Range(g)	110	
Pan size ( mm )	Ф90	
Dimensions(W*L*H)	200*180*380	
Weight(Kg)	5.8	
Heat soure	Halogen lamp	
Temp.range	40°C199°C	
Moisture range	0.00%100%	





# DHB-3000 Electronic Brinell Hardness Tester

Used in hardness measurement for cast iron, steel products, nonferrous metals and soft alloys, etc. Besides it can be also used in hardness measurement for some non-ferrous materials, such as plastics, bakelite, etc.

#### Technical specifications

1. Testing Force:

612.9N(62.5kgf)	4900N(500kgf)	980N(100kgf)	7355N(750kgf)
1226N(125kgf)	9800N(1000kgf)	1839N(187.5kgf)	14700N(1500kgf)
2452N(250kgf)	29400N(3000kgf)		

- 2. Hardness Value Range In Measure: 8~650HBW
- 3. Indicating value precision:

standard hardness test block	Max error of indicating value%	Max allowable variation in indicating value%
≤125	±3	3
125	±2.5	2.5
>225	±2	2

4. Enlargement Factor Of Reading Microscope: 20times 5. Minimum Division Value Of Micrometer Drum Wheel: 0.005mm 6. Maximum height of Sample: 220mm 7. Distance From Indenter's Center To Outer Wall: 135mm

AC220V/50~60HZ 8. Power Source: (753\*542\*205)mm 9. Overall Dimension (L×W×H):

10. Main Body Weight: 130kg



# **HRS-150 Digital Rockwell Hardness Tester**

Can calculate the functions such as the strength, the fatigue, the evolutionary change and the degree of being worn out can be approximately inferred from the hardness shown by the test.

#### **Specifications**

1. The initial test force: 98.07N(10kg)

2. The Total Test force: 588.4N(60kg), 980.7N(100kg), 1471N(150kg)

3. The specifications of the indenter:

3.1 Diamond Rockwell indenter

3.2 Ball indenter: φ1.588mm

4. Rockwell hardness testing range: (20~88) HRA

(20~100) HRB

(20~70) HRC

5. The max height of the specimens: 170mm

6. The distance from the center of the indenter to the instrument body: 165mm

7. Overall dimension: 463×241×660mm

8. The total weight: 78kg



# **Our Customer**

Over the past 15 years, great success services including domestic first-line brand, thousands of enterprises and quality inspection, commodity inspection and scientific research institutions and other unites, to win customer widespread praise; grand is accompanied by forward best full partners. In the future, LIYI will keep growing and offer better service to all of our partners all over the world.













