



# Mitech MJB-B Series Semi - automatic Impact Testing Machine

### Overview

Mitech MJB-B series semi - automatic impact testing machine ,control the pendulum movement by servo motor,can be for metal, non-metallic and composite materials under dynamic load resistance to the performance test. Its use of classic mechanical dial display, brings stable performance, simple operation, strong structure, simple structure, high efficiency. Widely used in steel, steel pipe and other toughness of ferrous metals and alloys of its anti-pendulum impact performance of the accurate measurement. It is the necessary professional precision testing equipment for improving production efficiency and saving production costs.

### **Technical Parameters**

Technical Parameters	MJB-300B	MJB-500B		
Impact energy	150J、300J	250J、500J		
Impact speed	5.2m/s 5.4m/s			
The angle of raising	15	50°		
Bearing span	40r	mm		
Inclination of supporting surface of sample bearing	C	0°		
The angle of impact knife	30:	30±1°		
The thickness of impact knife	16r	16mm		
Bearing fillet radius	R1∼1.5mm			
Impact knife radius	R2~2	2.5mm		
Angle resolution	≤	6'		
Pendulum torque	80.3848N.m、	160.7695N.m		
Pendulum rotation center to the impact point (test center) distance	750mm	800mm		
Sample size	10×10(7.5、5	10×10 (7.5、5、2.5) ×55mm		
Power factor	180W			
Power supply	380V			
Dimensions	2124×725	2124×725×1340mm		
Total Weight	450	450kg		

**Working Principle** 

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The hemispherical punches of the impact testing machine impact and pass through the specimen at a certain speed and measure the energy consumed by the punch to evaluate the impact resistance of the specimen.

#### **Features**

- It is widely used in the fields of metal and nonmetal processing, manufacturing, quality inspection, quality inspection, scientific research and experiment in Institutions of higher learning and so on;
- Semi automatic control, swing, pendulum, impact, pendulum are electrical control, and automatic swing, high efficiency, especially for continuous impact test;
- Novel shape, strong construction, high reliability, simple operation;
- Classic mechanical dial, intuitive reading, high testing efficiency;
- Using single support column structure, cantilever pendulum and U pendulum hammer, the performance is stable and the measurement accuracy is high;
- The impact knife is fixed and fixed by screws, and it is simple and convenient to replace;
- Specimen simple supported, can quickly replace the sample, easy to operate;
- Equipped with safety protection pin and safety protection net to ensure test safety;
- Consistent with GB, ISO, ASTM and other relevant domestic and foreign standards.

## Scope of application

It is widely used in the accurate determination of pendulum impact resistance of ferrous metals and alloy materials, such as steel, steel pipe, etc..

#### **Applications**

- Quality control link of Metal processing manufacturing
- Quality control link of nonmetal manufacturing industry
- Teaching experiment of scientific research in Institutions of higher learning
- Material analysis test of scientific research institutions
- Quality inspection link of Quality inspection department

## **Working Conditions**

- Operation Temperature: Ambient temperature ~45°C;
- Relative humidity:20%~80%;
- No vibration, no corrosive medium, no high magnetic field interference;
- Horizontal installation on a solid basis:
- Power supply voltage fluctuation does not exceed 10% of rated voltage.

## **Configurations**

Configuration instructions	NO.	Name	QTY.	Remarks
Standard Configuration	1	Testing machine host	1	
	2	Pendulum	2	
	3	Blade and jaw span alignment plate	1	L=40

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4	Sample alignment block	1	
5	Puller	1	
6	Electric control box	1	
7	Protective net	1	
8	Inside the hex wrench	1	S=12
9	Attached files	1	/

#### Maintenance and care

- Read the manual carefully before using the instrument. Learn the operation steps and attentions to avoid damage the instrument or personal safety accidents caused by improper operation;
- Test machine is a large precision instruments, should pay attention to water, moisture. Exposed workstations, upper and lower beam parts and attached parts should be coated with anti-rust oil to prevent rust;
- It is forbidden to put samples before the pendulum hangs. Before placing the sample, make sure that the pendulum is stable and the safety pin has been ejected;
- When using, should pay attention to check the jaw support, pendulum hammer, whether reliable fastening, in order to prevent the test results inaccurate or accident;
- The pendulum shaft bearings on both ends of the factory has been the use of units without refueling, refueling, such as repairing after cleaning with 1-2 drop of sewing machine oil or watch oil, Vaseline or other power bearing grease;
- If at a long time idle, at least once a week to prevent rust;
- After the test, the pendulum should be placed in the vertical position, and the handle push rod is placed in the braking position;
- Don't disassemble the instrument without authorization, maintenance related matters please contact MITECH after-sale service department with 4000600280.

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