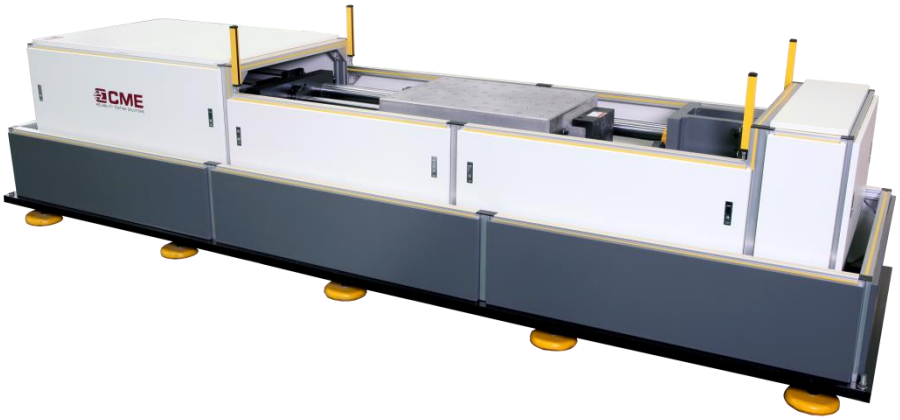
CME
RELIABILITY TESTING SOLUTIONS

Technical Specifications

KRD12 Series Pneumatic Horizontal Shock Test System



CME Technology Co., Ltd.

The KRD12 series shock test system is used to measure and determine the horizontal impact resistance of a product or package, and to evaluate the reliability and structural integrity of the test unit in a horizontal impact environment. The system can perform conventional half-sine wave, post-peak sawtooth wave, or square wave shock test to realize the shock energy that the product is subjected to in the actual environment, thereby improving the product or packaging structure.

- **Pneumatic cylinder driving** with advantages of large driving force, short accelerating stroke, low cost and pollution free.
- **Trapezoidal guide posts**: large supporting force, good lubricity and full-automatic positioning table.
- **Automatic control of shock speed**: the shock overload value is achieved by adjusting the air pressure.
- **Adopts the high strength and hardness cast aluminum table**, which has high first-order resonance frequency, featured with low noise and no clutter
- **The most reliable double-brake system**: effectively avoids secondary rebound collisions, more securely positioning the table, and more reliably guarantees the safety of the operator.
- **Multiple waveforms**: can perform conventional half-sine waves, post-peak sawtooth waves, or square waves.
- **Easy installation**: the device comes with a base, due to short driving stroke of the pneumatic cylinder, the footprint is small.
- **Integrated control & measurement system**: the system comes with a variety of waveform tolerance bands that comply with the MIL-810 standard, automatically generates test reports after the test is completed.
- **System scalability**: the system can be designed as a bidirectional shock according to user needs, saving test time more effectively.

Technical Specifications

Model / Parameters		KRD12-10	KRD12—50	KRD12—100	KRD12—200	KRD12—500	KRD12—1000	KRD12—2000	KRD12—3000
Rated Load (kg)		10	50	100	200	500	1000	2000	3000
Table Size (mm)		200×200	500×500	600×600	800×800	1000×1000	1200×1200	1500×1500	2000×2000
Peak Acc. (g)	Half-Sine	10-3000	10～1000	10～1000	10-600	10-500	10-500	10-200	10-100
	Post-Peak Sawtooth	10～100			10~100				10~50
	Trapezoid	/	15～100	15～100	15-100	15-60	15-60	15-50	30-50
Pulse Durati	Half-Sine	0.5~40	1~60	1.5～60	2～60	3～60	3～60	6～60	11～60

on (ms)	Post-Peak Sawtooth	6~18			6~18			
	Trapezoid	/	6~18		6~18			
Bump Waveform (Optional)		Half sine Waveform						
Bump Peak Acceleration（g）		5-100	5-100		5-80	5-60	/	
Bump Pulse Duration (ms)		2-30			3-30	4-30	/	
Bump Rate (Times/Min)		10 ~ 120	10-80		10-60	10-40	/	
Overall Dimension (mm)		2950×1240×1000	3300×1150×850	3500×1240×1100	3740×1440×1050	4250×1450×1100	4500×1650×850	5500×2000×850	6000×2200×850
Weight (kg)		3700	3600	4800	5856	6500	7000	8000	9000
Working Environment		Temperature range 0～40℃, Humidity ≤ 80% (non-condensing)						
Power		1-phase AC100V-240V, 50Hz/60Hz						
Air source		≤1MPa						
Installation Condition		Special foundation, foundation-free base is optional. The working distance of 800~1000mm shall be reserved around the equipment.						
Standard		MIL-STD-810 IEC68-2-27 MIL-STD-202 MIL-STD-750 MIL-STD-883 UN38.3 IEC62281 IEC62133-2 UL2054 IEEE1625 SAEJ2929 IEC62660-2 ISO12405-3 UL2580						

Note: 1. The parameters in the table are for reference only, and the parameters agreed upon by the supplier and the buyer shall prevail.

2. Bump function, Post-peak Sawtooth and Trapezoid waveforms are optional.