JLab Instruments







Product Code . JL-TWL-9178

Apparatus for the Study of Harmonic Oscillations

Description

Apparatus for the Study of Harmonic Oscillations

Description:-

The study of the oscillatory motion of a mass hanging from a spring allows students to be introduced to the motion features of an harmonic oscillator JLab and to be acquainted with one of the most powerful models for the physical interpretation of a wide range of phenomena.

Experiments Include:-

Elastic oscillations

Oscillation period of an elastic pendulum depending on the mass of the system

Hooke's law

Oscillation period of an elastic pendulum depending on the elasticity constant of a spring

Study of the motion from an energetic viewpoint

Relation between a torsion pendulum's period and its moment of inertia

Simple pendulum

Period's dependence on the length

Physical pendulum

Torsion pendulum

Relation between a torsion pendulum's period and geometrical and physical sizes which feature

The twisted body in torsion.

Period's independence from the oscillating mass.

The relation between a physical pendulum's period and its moment of inertia.