



## Solid and fluid mechanics set, curved ramp

EQ005

### Function

Study of mechanics (pendulum, springs, thrust, pulleys, movement quantity; moment of inertia, collisions, horizontal launch, work and energy, SHM, dynamics of particle and rigid body, etc).

### Knowledge areas

Physics

### Key Experiments

- The reach of a projectile horizontal launch
- The mechanical advantage of the fixed pulley
- The mechanical advantage of the movable pulley
- The experimental determination of the mechanical advantage of the parallel block and tackle system
- The calibration of a rubber belt, the calibration of a coil spring, the elastic hysteresis
- General conditions of static equilibrium for a supported rigid spherical body
- The amount of linear movement (horizontally) of a sphere in a horizontal launch
- The simple pendulum

