

DEMO advanced Physics Set Linear Motion (Dynamics)

Article no: 15514-88



Function and Applications

Equipment set allowing the performance of 13 demonstration experiments about the following topics:

- uniform and uniformly accelerated and decelerated motion
- Newton's laws
- potential and kinetic energy
- momentum (elastic and inelastic collisions)

Benefits

- Extremely robust demonstration track with a length of 1.5 m included
- Sunken scale in the track with mm graduation
- Adjustable feet over the entire track length for a very simple alignment of the track on small tables
- Cart for demonstration tracks with low friction sapphire bearings
- No overloading due to elastic bearing of base plate
- Rolling on flat planes prevented as wheels are covered by overlapping side walls
- Multiple time measuring instrument with 4 measuring inputs and 1 trigger input and four 4-digit digital displays
- 6 different operating modes allow the timer unit to be adjusted to suit almost any experimental requirement: distance-time law for four tracks, measurement of speed at four positions, principles of collisions, measurement of the orbiting time of a rotary movement, the direct measurement of the duration of a complete swing of a mechanical pendulum and for short or long-term measurements with two 8-digit displays by connecting each of 2 timers (0000.0000 to 9999.9999 seconds)
- Matched with international Curriculum: all topics are covered
- Complete equipment set: simple execution of the experiments
- The equipment is stored in a robust aluminum case with removable lid
- Foam insert for a quick control of completeness and secure transport of the set
- Experimenting literature for all teacher experiments are delivered as PDF documents on a DVD

Equipment and Technical Data

- the equipment set consists of all necessary components for the experiments
- robust storage case with foam insert fitting to the contained equipment
- includes DVD with experiment descriptions

Scope of delivery

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| Slotted weight, silver bronze, 10 g | 02205-03 | 4 |
| Slotted weight, silver bronze, 10 g | 02205-03 | 4 |
| Slotted weight, silver bronze, 50 g | 02206-03 | 3 |
| Slotted weight, silver bronze, 50 g | 02206-03 | 3 |
| Weight holder, silver bronze, 1 g | 02407-00 | 1 |
| Silk thread, l = 200 m | 02412-00 | 1 |
| Slotted weight, blank, 1 g | 03916-00 | 20 |
| Pulley, movable, dia. 40 mm, w. hook | 03970-00 | 1 |
| Connecting cable, 32 A, red, various lengths | 07363-01 | 4 |
| Connecting cable, 32 A, yellow, various lengths | 07363-02 | 5 |
| Connecting cable, 32 A, blue, various lengths | 07363-04 | 5 |
| Measuring tape, l = 2 m | 09936-00 | 1 |
| Tube with plug | 11202-05 | 2 |
| Needle with plug | 11202-06 | 2 |
| Fork with plug | 11202-08 | 1 |
| Rubber bands for fork with plug, 10 pcs | 11202-09 | 1 |
| Plate with plug | 11202-10 | 1 |
| Magnet w. plug f. starter system | 11202-14 | 1 |
| Light barrier, compact | 11207-23 | 4 |
| Demonstration track, aluminium, 1.5 m | 11305-00 | 1 |
| Pulley for demonstration track | 11305-10 | 1 |
| Holder for pulley | 11305-11 | 1 |
| End holder for demonstration track | 11305-12 | 2 |
| Cart, low friction sapphire bearings | 11306-00 | 2 |
| Weight for low friction cart, 400 g | 11306-10 | 2 |
| Holder for light barrier | 11307-00 | 4 |
| Shutter plate for low friction cart, width: 100 mm | 11308-00 | 2 |
| Starter system for demonstration track | 11309-00 | 1 |

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| Friction accessory for low friction cart | 11310-00 | 1 |
| Equipforce launcher | 11311-00 | 1 |
| PHYWE Timer 4-4 | 13604-99 | 1 |
| Support clamp for small case | 02043-10 | 1 |
| Portable Balance, OHAUS CR2200 | 48914-00 | 1 |

Recommended accessories

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| DEMO advanced Mechanics optional accessories for set MT-DYN | 15515-88 |
| Moveable experimental table 90 x 75 cm, 30 mm table top with PP edge, with shelf for 3 boxes and socket board | 15500-00 |
| Car, motor driven | 11061-00 |
| Shutter plate for car, motor driven | 11061-03 |