PETROL(GASOLINE) ENGINE EURO 6 WITH DIRECT MPI SYSTEM EDUCATIONAL TRAINER

A8/L1

Product number
MVMPI04

Fully functional 4-cylinder multi-point injection (MPI) petrol(gasoline) EURO6 engine offers learning experience for understanding the intricacies of gasoline engine systems and automotive electrical circuits. This educational demonstration stand, built on a real Dacia Sandero petrol (gasoline) engine, includes a control panel, stand frame, wiring diagram, ignition system, exhaust system, OBD II diagnostic socket, an accelerator pedal and all other necessary equipment for detailed engine performance understanding.

Features

- A complete, operational 4-cylinder multi-point injection (MPI) EURO6 petrol(gasoline) engine system with automatic transmission, mounted in a transportable metal frame.
- Centralized control for all engine operations, including a detailed electrical diagram and component legend.
- OBD II 16-pin connector for real-time parameter monitoring, fault code management, and performance element activation.
- Access points for measuring and monitoring component and circuit parameters.
- Jumper-based system for simulating various engine faults and operational changes.
- Includes fuel pump, injectors, ignition coils, throttle position sensor, camshaft position sensor, lambda sensor, knock sensor, speed sensor, air mass meter, intake air temperature sensor, coolant temperature sensor, and TCCS control module.
- Plug and play design, requiring no additional mountings, assembly, or special preparation for operation.

Value for instructors

- Offers a complete functional engine with automatic transmission model ideal for teaching and demonstrating modern engine technology, including direct injection systems, turbocharging, and exhaust management.
- Utilize the control panel, electrical diagrams, and component markings to provide detailed explanations and facilitate in-depth understanding of engine systems. The integrated OBD diagnostic connector enables detailed training in fault code management, system parameter analysis, and actuator testing.
- Built with a closed metal frame construction, ensuring durability and ease of maintenance. The compact design integrates an instrument cluster, measurement, and fault simulation panel within a sturdy structure.
- Allows instructors to demonstrate and simulate a wide range of faults, providing students with valuable troubleshooting practice.
- The training stand is designed for simplicity, requiring only small adjustments to reset to default parameters, making it easy to prepare and start each lesson quickly and efficiently.

Value for students

- Fully operating 4-cylinder multi-point injection (MPI) petrol(gasoline) engine gives real experience on multi-point injection fuel injection, exhaust, cooling systems, wiring and other components working principles.
- Use the OBD 16-pin diagnostic connector to perform ECU identification, read and erase fault codes, display live data, and test actuators. Learn to interpret real-time data and understand system parameters.
- Learn to identify and diagnose engine faults by manipulating jumpers to simulate various operational failures, enhancing problem-solving skills.
- Measure and monitor working parameters of key components, such as the fuel pump, injectors, ignition coils, sensors, and control valves, using open contacts and a detailed circuit diagram.
- Understand the function and operation of sophisticated components like the throttle position sensor, camshaft position sensor, lambda sensor, knock sensor, air mass meter, and coolant temperature sensor.
- Work with safety removable panels that protect against hot and rotating parts, enhancing both learning and safety. You can access its components directly through removable panels.

Specifications

- Dimensions: 1200 x 1000 x 1500 mm (47.24x39.37x59.06 in)
- Weight: Approx. 300 kg (~660 lb)
- Power source: Integrated 12 V battery
- Product number: MVMPI04