



MOBILE TEST DEVICE

The mobile test device MI-8 Transformer BSK is designed for testing brake systems on railway vehicles in a stationary position.

CUSTOMER BENEFITS

- Automatic testing protocol acc. to UIC543-1, VPI07 or RiL900.0080 standard for freight wagons
- Custom-made protocols defined by the customer
- Manual testing
- Light and modular design suitable for field testing
- Option for additional equipment
- Integrated brake force measurement
- Two operational positions (standing/sitting)
- Software update on demand from customer
- Operator cannot influence the results
- Minimum 5 hours operation in battery mode
- Multi-language (i.e. EN/DE/HU)
- Pneumatic characteristic fully satisfies the UIC543-1 protocol

APPLICATIONS

- Solution for all types of railroad vehicles
 - Freight wagons
 - Passenger coaches
 - EMU/DMU trains
 - Locomotives
 - Railroad maintenance vehicles



The test device has a built-in battery which provides minimum 5 hours continuous operating in the field without additional power supply. All modules are packed in special suitcases, placed in a movable trolley which provides easy and fast field testing. The software provides real-time monitoring and analysis of the most important parameters of the braking process – pressure on the measuring points, brake force on tread or disk brakes as well as control of the braking process itself. The electronic brake device operated by computer provides a fully automated run of brake system tests according to UIC543-1 and VPI07 standards and custom-made protocol on demand from the customer.

The MI-8 Transformer BSK test device for railroad systems is part of the range of test benches manufactured at EKA D.O.O.E.L. and is designed for testing the key parameters of a railroad vehicle's brake process: pressures in the pneumatic system, brake forces, temperatures due to braking, and velocity. It is used for fully automated tests of the braking process, in accordance with the UIC standards. The MI-8 Transformer BSK test device obtains signals from sensors connected to the entry ports and controls the pressure in the brake pipe and independently in two T-pipes through the measuring regulation valve (MRV). The MRV controls the pressure in the brake pipe and simulates different wagon loads by changing the pressure in the measuring valve.

CHARACTERISTICS

- Adjusted for field testing
- 12 V / 7Ah accumulator battery
- 9 analog current inputs
- 3 analog voltage inputs
- 7 digital transistor outputs

TECHNICAL DATA

Basic characteristics

Housing Plastic, metal

Mass 76 kg

Operating

temperature -10 °C to +45 °C

- Pressure sensor accuracy 0.5%
- Force sensor accuracy 1%

Electric characteristics

Supply voltage 220 V AC

Current consumption 0.5-1.5 A (max.)

RS232 Asynchronous optical isolated

RS232 baud rate 38,400 bit/s

A/D conversion 12 bit



Pressure sensors and force sensors for disk and tread brake

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