

Document Information			
Model	V529	Product Type	Handheld OBD-II/EOBD Code Reader
Document Version	v1.0	Last Updated	2026-02-06
Hardware Version	V1.1	Release Date (spec.)	2025-09-01

Overview
 This document provides key specifications, supported functions, and hardware interface information for the V529 handheld OBD-II/EOBD code reader.

Purpose of Document
 Intended for product listings, partner/channel reference, and incoming inspection. Actual function coverage may vary by vehicle and firmware version. MCU: APM32E103VET6.



OBD Diagnosis
 Read/Clear DTCs, Freeze Frame, I/M Readiness, VIN/CALID/CVN, Multi-module

Live Data (600+)
 600+ items with list view and real-time curve/graph view

Special Tests
 Performance, Carbon Deposition, Fuel Test, Air Flow Detection

DTC Library (40,000+)
 Built-in lookup + repair-solution guidance for multiple vehicle series

Quick Report & QR
 Inspection report with VIN, protocol, DTCs, 8 data items, I/M readiness

AutoVIN + Battery
 AutoVIN brand identification; Battery Test/Start Test via BAT key

Physical Specifications
 177 × 95 × 27.3 mm
 Weight: 337 g (product) / 450 g (with pkg)
 2.8" Color Screen | 12 Languages

- Key Functions (Complete List)**
- Read DTC / Clear DTC / turn off MIL
 - Vehicle Info (VIN / CALID / CVN)
 - Mode 6 on-board monitor test
 - DTC Lookup (40,000+ entries)
 - Multi-module (CAN vehicles)
 - Performance Test
 - Quick inspection report & QR
 - Freeze Frame (emissions snapshot)
 - Live Data Stream (600+ items)
 - O2 Sensor test
 - Battery Test / Start Test
 - AutoVIN (brand auto-detect)
 - Carbon Deposition Detection
 - 12-language UI
 - I/M Readiness (OK / ON / N/A)
 - Real-time Curve/Graph view
 - EVAP Test (Mode 8)
 - Shortcut keys: F1, F2, BAT
 - DTC repair-solution guidance
 - Fuel Test / Air Flow Detection

- Supported OBD-II Protocols (9 Protocols)**
- SAE J1850 PWM (41.6 Kbaud)
 - ISO 14230-4 KWP (5 baud init, 10.4 Kbaud)
 - ISO 15765-4 CAN (29-bit ID, 500 Kbaud)
 - SAE J1850 VPW (10.4 Kbaud)
 - ISO 14230-4 KWP (fast init, 10.4 Kbaud)
 - ISO 15765-4 CAN (11-bit ID, 250 Kbaud)
 - ISO 9141-2 (5 baud init, 10.4 Kbaud)
 - ISO 15765-4 CAN (11-bit ID, 500 Kbaud)
 - ISO 15765-4 CAN (29-bit ID, 250 Kbaud)

- Supported Vehicle Data (examples)**
- Diagnostic Trouble Codes (DTC) read
 - Calculated load value
 - Vehicle speed
 - Intake manifold pressure
 - Air flow rate
 - Fuel pressure
 - Clear DTC / turn off MIL
 - Coolant temperature
 - Short-term fuel trim (STFT)
 - Ignition timing advance
 - Throttle absolute position
 - Fuel consumption monitoring
 - Engine RPM
 - Fuel system status
 - Long-term fuel trim (LTFT)
 - Intake air temperature
 - O2 sensor voltage / STFT
- Note: Supported data items vary by vehicle model and model year. Some parameters may display N/A depending on ECU support.*

Interface Definition (OBD-II 16-pin)

Pin	Signal	Pin	Signal
1	Reserved	9	Reserved
2	J1850+	10	J1850-
3	Reserved	11	Reserved
4	Chassis ground	12	Reserved
5	Signal ground	13	Reserved
6	CANH	14	CANL
7	KLINE	15	LLINE
8	Reserved	16	Power

Standard OBD-II 16-pin male connector (DLC). Pin assignment is as listed above.

Technical Specifications

Model	V529
Product type	Handheld OBD-II/EOBD code reader
Hardware version (spec.)	V1.1
Release date (spec.)	2025-09-01
MCU	APM32E103VET6
Display	2.8" color screen
Power supply	DC 9-16 V (vehicle-powered via DLC)
Working current (spec.)	41-63 mA
Standby current (spec.)	53 mA
Live data stream	Up to 600+ items (vehicle-dependent)
DTC database	40,000+ entries (spec.)
Communication	OBD-II via 16-pin DLC; internal serial (spec.)
Operating temperature	-20 to 60°C
Storage temperature	-20 to 60°C
Dimensions	177 × 95 × 27.3 mm
Weight (spec.)	337 g (product); 450 g (with packaging)
UI languages	12 languages (see below)

Supported Languages (UI) – 12 Languages

Full UI support: English, Français, Deutsch, Russian, Español

UI supported (DTC/repair-help content not supported): Italiano, Japanese, Chinese, Dutch, Polish, Portuguese, Arabic

Packaging

Inner: 220 × 125 × 45 mm
Outer carton: 37.5 × 26.5 × 46.2 cm
Qty/carton: 28 pcs
Weight: 337 g / 450 g (with pkg)

Reliability (spec.)

- Power interruption test: **PASS**
- High/low temp (70°C/-30°C, 12h): **PASS**
- 24-hour stability test: **PASS**
- Drop test (1.2 m / 1.6 m): **PASS**

Storage & Transport

- Clean, dry, ventilated; avoid sunlight/high temp.
- Keep from water, oil, corrosive materials, vibration.
- Avoid heavy pressure on product/packaging.

Warnings & Precautions

- ▶ Do not disassemble or modify the product.
- ▶ Do not use abrasive cleaners.
- ▶ Keep away from heat sources and open flames.
- ▶ Avoid long-term direct sunlight exposure.
- ▶ Store in dry environment; avoid extreme temp. and dust.