veratron V

VL FLEX SERIES

Easy to install, easy to customize, easy to use.

VL FLEX SERIES

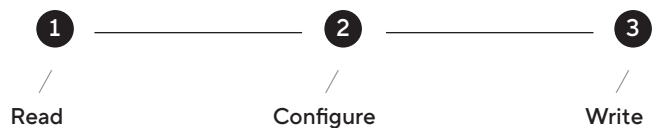## All-in-one / universal / contactless device configuration / all-rounder

The **VL Flex** device can easily be configured to be the instrument you need – thanks to its sun-readable 1.44" TFT display embedded into a standard 52 mm instrument housing. The supported analog inputs allow you to directly read from your engine sensors, and the NMEA 2000® or J1939 interface expands this possibility by allowing the device to read from the digital network. The simple but effective graphic design can be set up in a single or dual layout, presenting the data in a clear and intuitive form, while the colored bar graph and the alarm display allow you to visually understand your data.

GENERAL FEATURES

- ▼ 52 mm instrument with 1.44" TFT display
- ▼ 2 instruments in 1 with dual screen
- ▼ Wireless configurable with your smartphone
- ▼ Powerless configuration
- ▼ Custom alarms setup
- ▼ Color bar graphs for visual data display
- ▼ 9 different styling rings available

WIRELESS CONFIGURATION IN JUST 3 STEPS:

AIRWAVE READY

1 —— **2** —— **3**

Read   Configure   Write

CONFIGURATOR SMARTPHONE APP

- ▼ To configure the **VL FLEX**, some parameters must be calibrated, like the gauge type, the sensor and its calibration or the warning threshold. This is possible through the **»VL FLEX CONFIGURATOR«** smartphone App.
- ▼ A simple and detailed explanation of the configuration process is also available as in-app instructions.
- ▼ Thanks to the passive embedded AirWave receiver, the VL Flex 52 can be configured without power supply.

TECHNICAL DATA

Display	1.44" sun-readable color TFT display
Resolution	125 x 125 pixels
Nominal Voltage	12 V / 24 V
Operating Voltage	9 – 32 V with overvoltage and reverse polarity protection
Current consumption	Typ. 50 mA with max. backlight intensity
Analog ports	Resistive (0 – 400 Ω), Frequency (W, Ind, Hall, Generator)
Digital ports	NMEA 2000® or J1939, LIN bus
Wireless interface	AirWave (NFC-Based)
Protection class	IP 67 front side acc. IEC60529
Lens	PMMA with anti-glare and anti-fog
Housing	Ø 52 mm – Polycarbonate (PC), flame retardant acc. UL94-V0
Operating temperature	-20°C to +70°C
Storage temperature	-30°C to +80°C
Connector	Tyco / Hirschmann MQS connector 8 pin

REACH COMPLIANT   RoHS COMPLIANT   IPX7 COMPLIANT   NMEA 2000   CE   UKCA   UL

SUN-READABLE

Single layout   Dual layout

» DOWNLOAD CONFIGURATOR APPS

Get it on Google play   Available on the App Store

NMEA 2000®

The supported analog inputs allow you to directly read from your engine sensors. In addition NMEA 2000® and LIN 2.0 interface enables the device to read from the digital network.

FEATURES

- ▼ **NMEA 2000® gateway included**
- ▼ Configurable Resistive and frequency inputs
- ▼ IBS port for battery monitoring
- ▼ Custom alarm setup
- ▼ 23 data available in different units
- ▼ Wireless configurable via smartphone App

SUPPORTED DATA

Fuel Level	Speedometer
Fresh Water Level	Ammeter
Waste Water Level	Voltmeter
Trim Level	Battery SOC
Rudder Angle	Battery SOH
Coolant Temperature	Battery Temperature
Boost Pressure	Battery Autonomy
Engine Oil Temperature	Engine Hours
Engine Oil Pressure	Speed Over Ground (SOG)
Transmission Oil Pressure	Course Over Ground (COG)
Depth	Clock
Tachometer	Exhaust Temperature

ARTICLE NR.

NMEA 2000® Black	B00043501
NMEA 2000® White	B00111301

IBM

The Intelligent Battery Monitoring System informs you about the current energy status, allowing you to plan your energy supply making it the key element of the vehicle's energy management.

FEATURES

- ▼ Flex display kit for Battery monitoring
- ▼ 1x Resistive input for Fuel or Fresh Water level
- ▼ Dedicated harness with pushbutton for screen scrolling
- ▼ Battery charge notification

VL FLEX IBM KIT

- ▼ **Includes:** VL Flex 52 instrument, Intelligent Battery Sensor (IBS) (incl. Battery pole adapter), 6m wiring harness
- ▼ **Delivered Data:** Voltage, Current, Battery temperature, State of charge, Battery health, Autonomy
- ▼ **Benefits:** Ready for connecting to Veratron dip-pipe liquid level sensors, Continuous monitoring of battery status, Support of battery maintenance, Easy configuration with the mobile app

ARTICLE NR.

IBM 12 V	B00084701
IBM 24 V	B00084801

J1939

The supported analog inputs allow you to directly read from the sensors. In addition, the J1939 and the LIN 2.0 interfaces make it possible for the VL Flex to read from the digital networks as well.

FEATURES

- ▼ SAE J1939 compatible
- ▼ Configurable Resistive and frequency inputs
- ▼ IBS port for battery monitoring
- ▼ Custom alarm setup
- ▼ 29 data available in different units
- ▼ Wireless configurable via smartphone App

J1939 SPNS

Wheel Speed	84	Exhaust Temp	173
Engine Load	92	Oil Temperature	175
Fuel Level	96	Gear Oil Temp	177
Oil Level	98	Fuel Rate	183
Oil Pressure	100	Fuel Economy	184
Boost Pressure	102	Engine Speed	190
Coolant Press	109	Odometer	245
Coolant Temp	110	Engine Hours	247
Battery Current	114	Total Fuel	250
Brake Pressure	117	Clock	959
Gear Oil Level	124	DEF/BLUE Level	1761
Gear Oil Pressure	127	Batt SOC / SOH	
Battery Potential	168	Battery Temp	
Air Temperature	171	Batt Autonomy	

ARTICLE NR.

J1939 Black	B00086001
J1939 White	B00110901

OUTDOOR INSTRUMENTATION
ENGINEERED IN SWITZERLAND