

Weighing Transmitter WT68

FEATURES

- Unique product in the weight transmitter family
- Ideal for all industrial applications
- Easy to install and mount on DIN rail.
- Advanced technology for weighing and measuring systems.
- Converts the mV signal to a high-resolution digital signal (24 bit)
- Displays up to 8 channels separately.
- Integrates as a slave in various network types.
- Supports various serial communication protocols or Fieldbus.
- Removable screw terminal blocks
- VTW PC Software utility



OPTIONS

- Analogue output
- Expanded data storage capacity (memory)
- Multiple fieldbus options available

APPLICATIONS

- Suitable for various industrial systems

DESCRIPTION

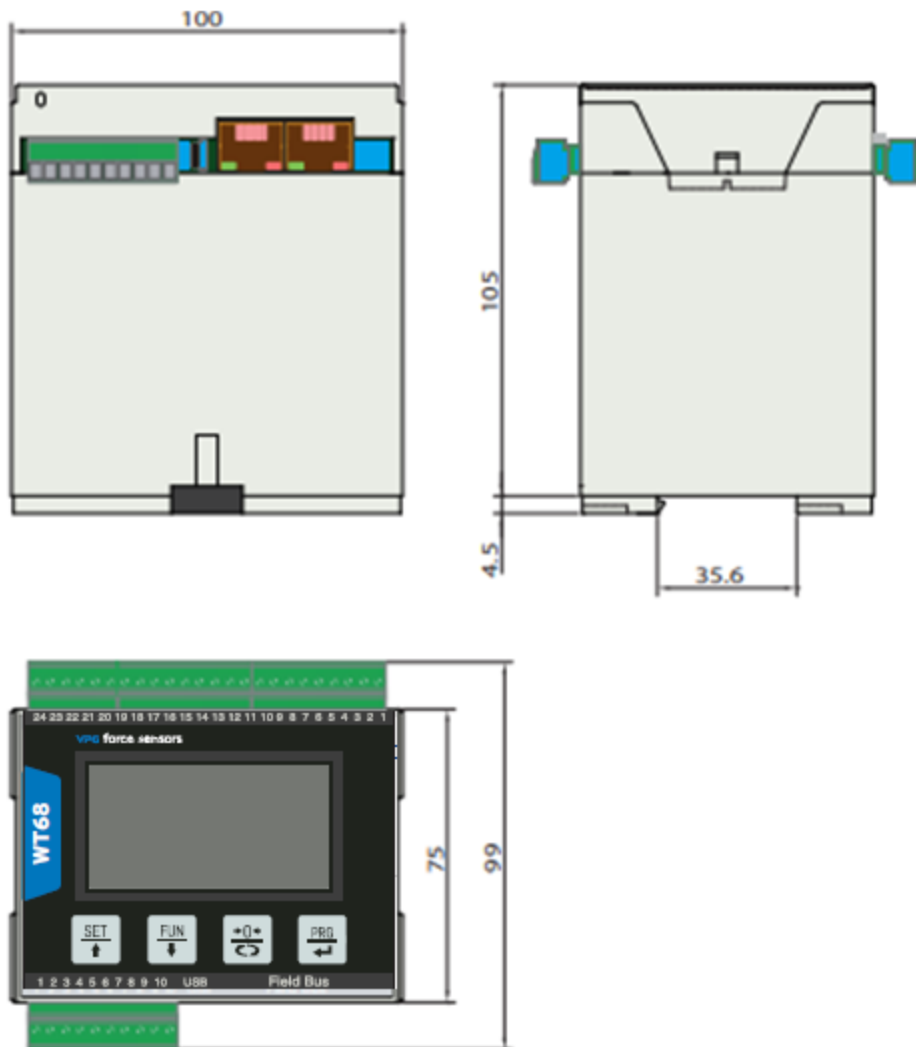
The Model WT68 is an advanced weighing indicator designed for industrial applications where load distribution monitoring is essential. It can oversee all load cells, generating alarms for excessive cell signal drift, missing connections, cell failures, or unbalanced weight distribution.

The model includes standard RS232 and RS485 serial ports and a USB device port. It can be equipped with popular Fieldbus options and interfaces with most supervision devices available on the market.

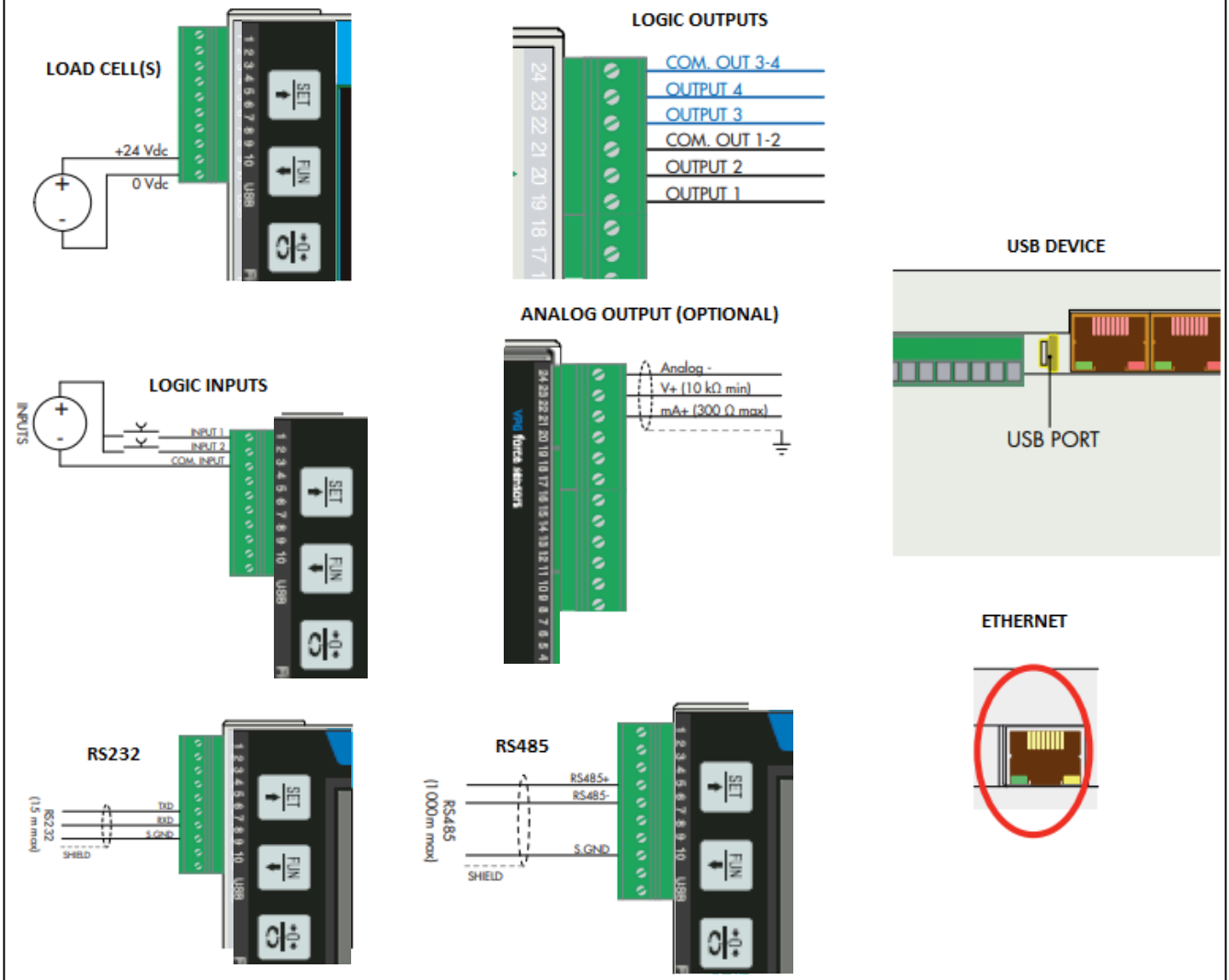


Weighing Instrument WT68

OUTLINE DIMENSIONS



WIRING DIAGRAM



SPECIFICATIONS

PERFORMANCE

Excitation Voltage
5 V (max 230 mA)

Measuring Range
-3.9 to +3.9 mV/V

Input Sensitivity
0.02 μ V/division

Full scale non-Linearity
<0.01% of full scale

Temperature Drift analog output
<0.001% FS/ °C

Gain Drift
<0.001% FS/ °C

A/D Converter
24 bits

Maximum Load Cells
16 at 350 Ω

Internal Resolution
> 16,000,000 Points

Visible Resolution (in divisions)
999,999

Divisions Value (Adjustable)
x 1, x 2, x 5, x 10, x 20, x 50

Decimal figures range
0 ÷ 4

Filter (Adjustable)
5 to 250 Hz

Microcontroller

ARM Cortex M0 + 32-bit 256KB Flash reprogrammable on-board from USB

Data Storage
64 KB expandable up to 1024 KB (optional)

Serial port
1 USB-C device + 1 RS232C and 1 RS485, Fieldbus, ASCII or Modbus RTU

ENVIRONMENTAL

Operating Temperature
-10 to +50 °C (max humidity 85% without condensation)

Storage Temperature
-20 to +70 °C

DISPLAY AND KEYBOARD

Display

Graphic LCD 128 x 64 pixels

Keyboard

4 membrane keys

Weighing Instrument WT68

ELECTRICAL

Power supply
 12 - 24 VDC ±15%
 Power consumption
 4 W

INPUT AND LOGICS

Logic Input
 2 Opto-Isolated 12/24 Vdc PNP (external power supply)
 Logic Output
 2 relays, Max 48 Vdc/Vac 2A each

ANALOG OUTPUT (OPTIONAL)

Resolution
 Opto-isolated 16 bits
 Voltage
 0 to ±5/ ±10 V (min 10 KΩ)
 Current
 0/4 to 20 mA (max 300 Ω)
 Linearity
 0.02% of FS
 Temperature Drift
 0.001% of FS/ °C

SERIAL COMMUNICATION

Serial Output #1
 1 RS232

Serial Output #2
 1 RS485

Serial Output #3
 USB port device complies with USB 2.0; up to 12 Mbps speed.

Maximum cable length
 15m (RS232) and 1000m (RS485)

Baud Rate
 1200, 2400, 4800, 9600, 19200, 38400, 57600, 115200 selectable

Optional Fieldbus
 PROFIBUS, PROFINET, ETHERNET IP, ETHERCAT, ETHERNET

Serial Protocol
 ASCII, Modbus RTU

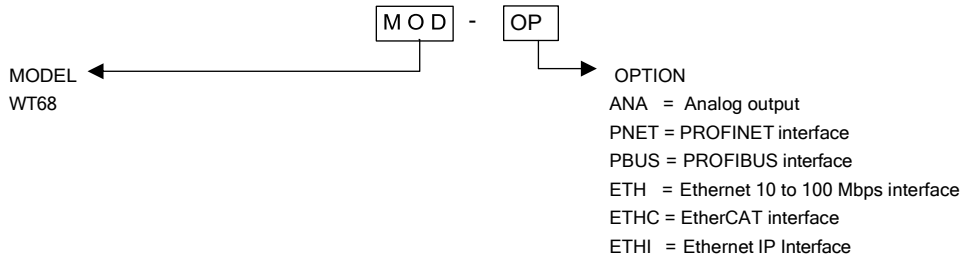
ENCLOSURES

Dimensions
 100 x 75 x 110 mm (L x H x P)
 Mounting
 DIN Rail
 Electrical Connections
 Removable terminal boards pitch 3.81mm

REGULATORY COMPLIANCE

EN61000-6-2, EN61000-6-3 for EMC; EN61010-1 for Electrical Safety, EN45501 for metrology

ORDERING INFORMATION FOR WT68



Example Completed Part Numbers:
 WT68-ETH is the part number for a WT68 with an Ethernet interface.
 WT68-ANA is the part number for a WT68 with an analog output.
 *This is mandatory: customers must select an output option

All specifications subject to change without notice. For inquiries, please contact the VPG Force Sensors Marketing Department directly using the email address vpqfs.marketing@vpgsensors.com.