5th Wheel System

FEATURES

- 1% of net payload
- Easy to operate
- Extensive self diagnostic
- Easy two-step calibration
- Post calibration
- Weight set-alarm points
- Supervisor lock-out
- Graphic TFT color display with LED backlight
- **Optional:**
  - Remote display using hand-held unit (HHR)
  - Printer
  - Scoreboard

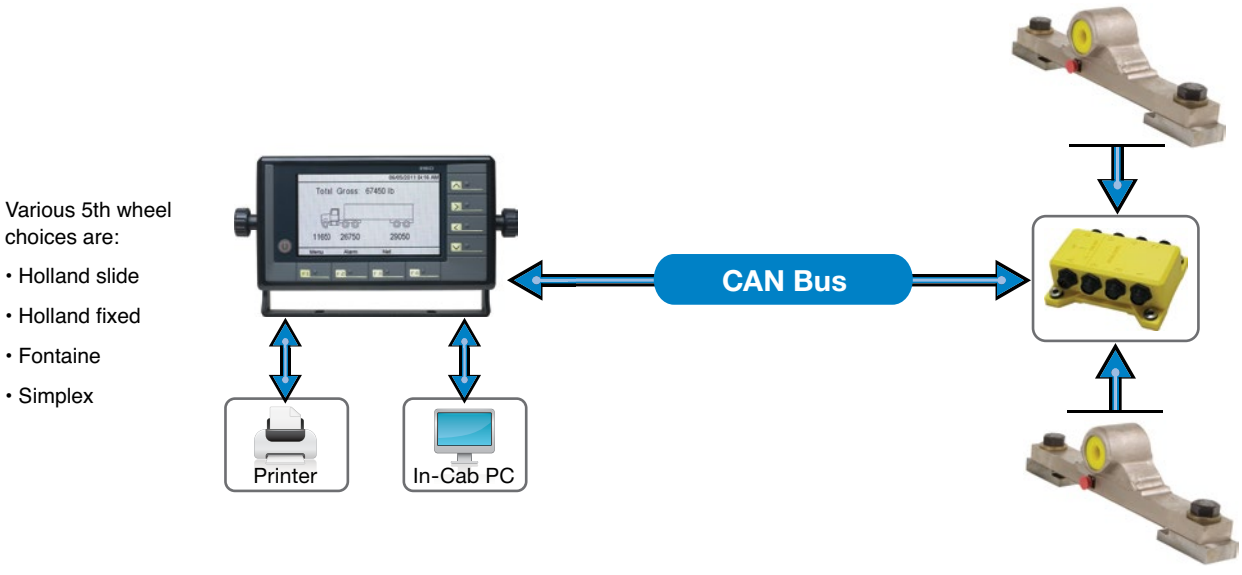
APPLICATIONS

- Bulk hauling
- Forestry/logging
- Aggregate
- Waste
- Agriculture

DESCRIPTION

VPG Onboard offers various 5th wheel solutions, including Holland Fixed or Slide, Fontaine or Simplex. The systems increase profits for haulers. Designed for both OEM and retrofit installations, the system is easy to install and provides years of trouble free operation.

SYSTEM BLOCK DIAGRAM



5th Wheel System

SPECIFICATIONS						
PARAMETERS		DESCRIPTION				
SYSTEM						
Accuracy		1% of net payload				
Capacity (GVW)		unlimited				
Number of load cells		2				
Number of channels		1				
METER						
Display		4.3”, 480x272, graphic color TFT with LED backlight				
Size		160 x 85 x 25 (W x H x D) 6.3 x 3.34 x 1 (W x H x D)				mm inch
Count by (Divisions)		1, 10, 20, 50, 100				
Weighing units		Pounds (lb) or kilograms (kg)				
Communication		RS232, CAN				
Inputs /outputs	Digital inputs	2				
	Digital outputs	2, solid state, short circuit proof. Triggers: • Alarm condition • Programmable set point level reached (overload or target payload)				
Expansion slots		2				
Audible alarm			75			dB
Setup and calibration		Protected by password				
Remote display		Optional, using remote hand-held unit (HHR)				
Power	Operating voltage	10.5		32		VDC
	Current consumption		40	95		mA
Environmental conditions	Shocks and vibration	Suitable for in-cab automotive environment				
	Humidity (non-condensing)	30		85		% R.H.
	Operating temperature	–4 –20		158 70		°F °C
	Storage temperature	–4 –20		185 85		°F °C
	Protection level	IP20				
TRANSMITTER						
Number of load cells		2	4	6		
Sample rate (per load cell)			1			kHz
Load cell excitation voltage			5			VDC
Load cell input range				3		mV/V
Offset drift				10		PPM/°C
Gain drift				5		PPM/°C
Tilt measurement accuracy			2.0			Deg.
Communication		CAN				
Diagnostics		Extensive diagnostics of load cells, hardware and communication				
Power	Input voltage	10.5		32		VDC
	Current consumption with 6 load cells			120		mA
Environmental conditions	Shock and vibrations	Per ISO 16750-3 standard				
	Operating temperature	–40 –40		158 70		°F °C
	Storage temperature	–40 –40		185 85		°F °C
	Humidity	100% condensing				
	Protection level	IP67 and IP69K; NEMA 4X				
	Resistance to solvent	Per automotive requirements for chassis installed units				
Size		114 x 48 x 140 (W x H x D) 4.5 x 1.9 x 5.5 (W x H x D)				mm inch

5th Wheel System

SPECIFICATIONS (Contd)	
PARAMETERS	**DESCRIPTION**
LOAD CELL	
Material	Alloy steel, nickel plated
Weight	52 lb with mounting hardware (standard)
Size	22.5” long
Output	0.5 ±0.01 mV/V @ 18,000 lb
Impedance	350 Ω minimum

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