# Ultrasonic, accurate flow measurement

#### COMMERCIAL UNIT

- Market leading step response time
- Flow rate up to 8000 ml/min
- Bi-directional flow measurement in high transient condition



ISO 11898-2 (High speed applications)

Aluminium alloy anodised to ISO 7599 PTFE, PEEK \*

Petroleum, diesel, bio fuels, race fuels (LM24 petrole-

50kPa to 2000kPa operating, 6000kPa survival (8)

Deutsch ASDD006-09-PD-FI-952K

Deutsch ASDD606-09-SD-FI-952K

um, LM24 diesel, F1 petroleum blends)

2.0A (11 bit identifier)

1Mbit/sec

None

235g dry

11 ml

(1) Output availability is subject to calibration procedure.

(3) See manufacture's specification for electrical connector rating.

(2) Limited by some electronic part ratings. All internal materials in contact with fuel

(5) "Multiple Fit" is a configurable feature which allows meters to be dynamically

(6) Resistor: maximum 3V applied, typically fitted within the mating connector. (7) Internal materials in flow path excluding fuel connector/union.

allocated a CAN base ID through the use of different resistor values across Pin 8 and 9.

(8) Cavitation and entrained gas can cause meter damage and spurious measurement

results, this must be avoided by appropriate system design and flow meter operation.

0x190 to 0x193

0x190 to 0x193 22k

0x194 to 0x197 5k6 0x198 to 0x19B 1k8 (6)

#### FLOW MEASUREMENT

Accuracy  $\pm$  0.5% accuracy at flow rates >700ml/min

Measurement range +/- 8000ml/min

Flow measurement e 1.2 kHz internal measurement rate CAN outputs at 100Hz, With filtering (1)

Flow pressure loss ISOPAR C: 5kPa@2000ml/min, 16kPa@4000ml/min.

LM24 Diesel: 75kPa@8000ml/min. All at 25°C

### **TEMPERATURE MEASUREMENT**

Measurement type 2 x PT-1000 immersed sensors at fuel inlet and outlet

**ELECTRICAL** 

Supply voltage 4.75V DC - 22.0V DC <100 mA @ 12 - 17V DC Supply current

<180mA @ 4.75 - 5.5V DC

Supply voltage Reverse polarity -38V protection Over voltage 58V

No surge clamping

#### **CONFIGURATION INTERFACE**

RS-485 Half-Duplex (2-Wire) with networking. Encrypted. Interface type

No termination

#### **ENVIRONMENTAL**

Storage temperature -40° to +85°C Operating -20° to +85°C (2)

temperature Environmental

protection

rating

IP68, 300kPa for 2 hours in water (excluding electrical connector) (3) (4)

**EMC** 

**External pressure** 300kPa (excluding connector) (3)

Intrinsic safety

rating

None. Not IS rated by design.

**ORDERING** 

**CAN COMMUNICATIONS** 

Design standard

Message format

Base message ID

**CAN** termination

**MECHANICAL** 

Wetted materials

Meter connector

Mating connector

**Fuel compatibility** 

Fuel pressure

re rated at 110°C.

(4) Design Standard.

Fuel volume

Mass

**Baud rate** 

'Multiple fit'

message IDs

4142-PK-216

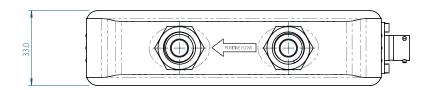
Specifications are subject to change without notice.

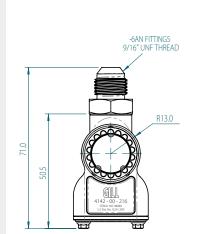


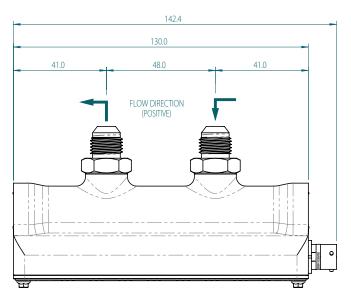


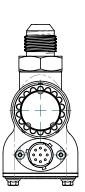


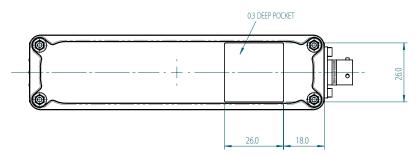
# **DIMENSIONS**











Due to on-going product development specification is subject to change U.S. PAT. NO. 9,269,261,389

## **CONNECTION**

Pin	Function	Connector Pin Numbers
1	Supply (+)	
2	CAN High 1 (CANH1)	5
3	CAN Low 1 (CANL1)	(6)
4	Do not connect	
5	Do not connect	
6	RS-485 (A)	9
7	RS-485 (B)	
8	CAN ID select resistor	8
9	Ground (-)	ASDD006-09-PD-FI-952K





