

# Sensor Data Sheet

## Refined fuels in water / BTEX sensor

DOC 461 6750-E-1.2-DS

### Article-No. 461 6750

Configured and factory scaled for the specified analysis, see Identification Letter:

| C=Chlorophyll | R=Rhodamine | F=Fluorescein | P=Phycocyanin | E=Phycocerythrin | U=CDOM/FDOM | O=Crude Oil | B=Optical Brighteners | T=Turbidity | G=Refined Fuels | A=PTSA |



G = Refined Fuels



#### Properties

- measurement range adjustable
- low energy use
- small body
- very low voltage offset, therefore no adaption necessary
- robust, corrosion-free material
- insusceptible against ambient light
- heigh compressive strength

#### Applications

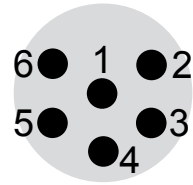
- real time control of contamination
- water and waste water monitoring
- river monitoring

#### Technical data

Measuring principle	fluorescence measurement light source < 300 nm reading between 300 nm and 400 nm
Minimum detection limit	0.1 ppm
Measuring accuracy	2% FS
Measuring range	0.1 – 30 ppm   30 – 300 ppm   300 – 3000 ppm
Measuring interval	< 5 s
Signal output	0 - 5 VDC
Supply voltage	3 - 15 VDC
Power requirements	< 300 mW typical
Material	316 stainless steel (optional titanium)
Temperature ambient	0 °C to +50 °C
Temperature water	-2 °C to +50 °C
Max submerge depth	600 m
Weight	0.16 kg
Dimensions	Length: 14 cm; Diameter: 2.2 cm

# Sensor Data Sheet

## PIN assignment



Top view sensor

### Cable Type I

Wire	PIN	Function	Connection
RD (red)	1	Supply Voltage 3 – 15 VDC	Power Supply Positive Connection
BK (black)	2	Supply Ground, 0 VDC	Power Supply Ground Connection
WH (white)	3	Signal Out to data logger, "+", 0 – 5 VDC	Signal Positive Connection
GN (green)	4	Analogue Ground "-", 0 VDC	Signal Negative Connection
BU (blue)	5	X10 Gain, (Medium Sensitivity)	See Gain Switching Table
BN (brown)	6	X100 Gain, (High Sensitivity)	See Gain Switching Table

### Cable Type II

Wire	PIN	Function	Connection
BK (black)	1	Supply Voltage 3 – 15 VDC	Power Supply Positive Connection
WH (white)	2	Supply Ground, 0 VDC	Power Supply Ground Connection
RD (red)	3	Signal Out to data logger, "+", 0 – 5 VDC	Signal Positive Connection
GN (green)	4	Analogue Ground "-", 0 VDC	Signal Negative Connection
OG (orange)	5	X10 Gain, (Medium Sensitivity)	See Gain Switching Table
BU (blue)	6	X100 Gain, (High Sensitivity)	See Gain Switching Table

### GAIN Switching (depends on an application-specific calibration)

GAIN 10 PIN 5	GAIN 100 PIN 6	Gain
Not connected	Not connected	X1
Connected to analogue ground	Not connected	X10
Not connected	Connected to analogue ground	X100