

Phosphine CiTiceL[®] Specification



4PH-Fast CiTiceL[®]

Performance Characteristics

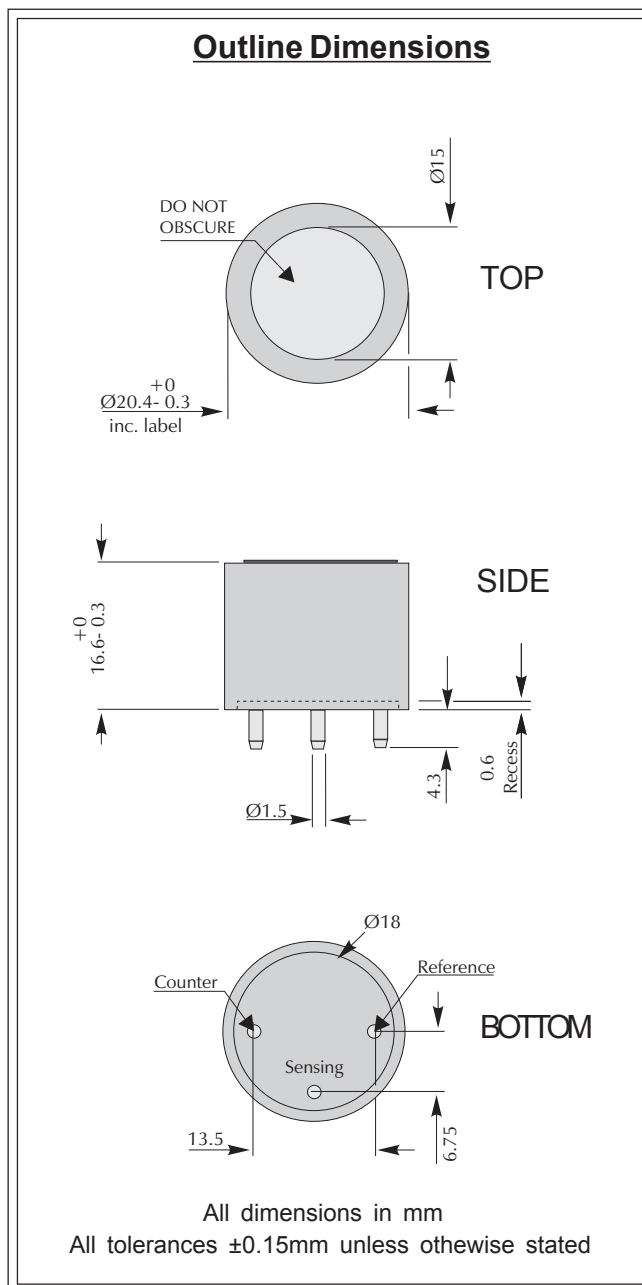
Nominal Range	0-5ppm
Maximum Overload	20ppm
Expected Operating Life	Two years in air
Output Signal	1.7±0.3 µA/ppm
Resolution	<0.05ppm
Temperature Range	-20°C to +50°C
Pressure Range	Atmospheric ± 10%
Pressure Coefficient	No data
T₉₀ Response Time	<60 seconds
Relative Humidity Range	15 to 90% non-condensing
Typical Baseline Range (pure air)	-0.07 to +0.2ppm equivalent
Maximum Zero Shift (+20°C to +40°C)	<0.07 ppm equivalent
Long Term Output Drift	<2% signal loss/month
Recommended Load Resistor	10Ω
Bias Voltage	Not required
Repeatability	2% of signal
Output Linearity	Linear

N.B. All performance data is based on conditions at 20°C, 50%RH, and 1013mBar

Physical Characteristics

Weight	5g (approx.)
Position Sensitivity	None
Storage Life	Six months in CTL container
Recommended Storage Temperature	0-20°C
Warranty Period	12 months from date of despatch

Outline Dimensions



IMPORTANT NOTE: Connection should be made via PCB sockets only. Soldering to the pins will seriously damage your sensor.

Phosphine CiTiceL[®] Specification**Cross-sensitivity Data**

CiTiceLs may exhibit a response to certain gases in a sample other than the target gas. 4PH CiTiceLs have been tested with a number of commonly cross-interfering gases and the results are given below. The table shows the typical response to be expected from a sensor when exposed to a given test gas concentration (relevant to safety, e.g. TLV levels).

<u>Gas</u>	<u>Conc.</u>	<u>4PH</u>	<u>Gas</u>	<u>Conc.</u>	<u>4PH</u>
Arsine:	150ppb	100ppb	Sulphur dioxide:	5ppm	1ppm
Silane:	1000ppb	900ppb	Hydrogen:	1000ppm	1ppm
Diborane:	300ppb	105ppb	Ethylene:	100ppm	1ppm
Germane:	600ppb	550ppb	Carbon monoxide:	1000ppm	5ppm

For details of other possible cross-interfering gases contact City Technology.

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Performance characteristics on this data sheet outline the performance of newly supplied sensors. Output signal can drift below the lower limit over time.