

Sensors

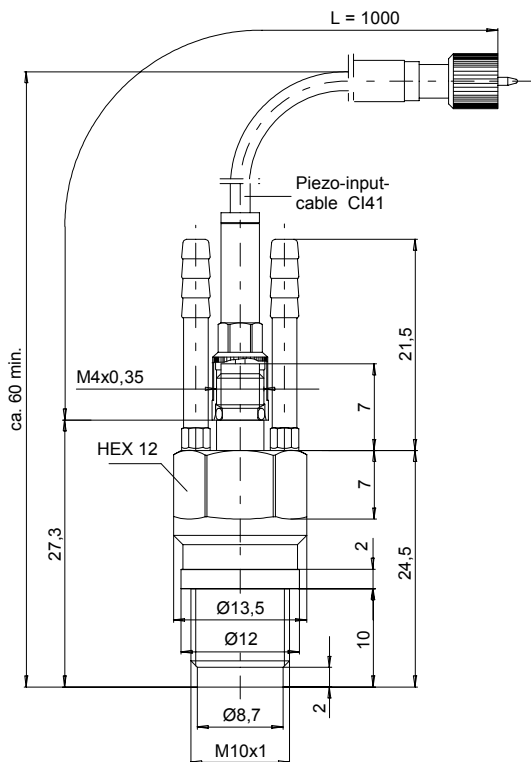


QC34D Quartz Pressure Transducer Art. No. TIGG0869A.01

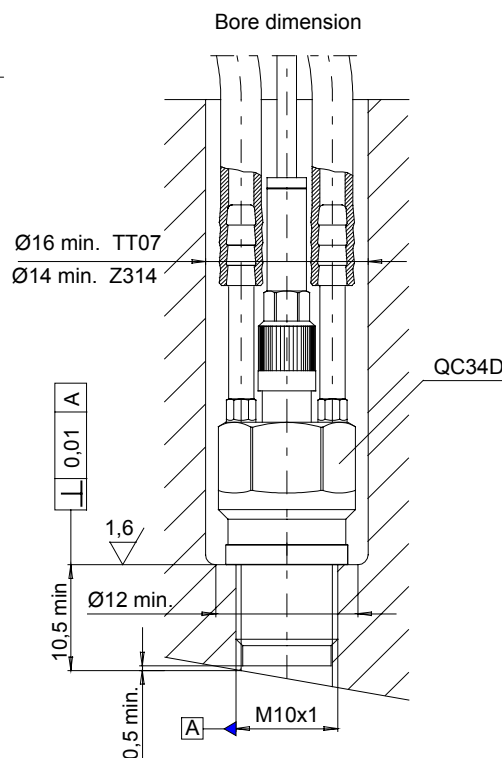
The QC34D offers highest available accuracy in the M10 thread type segment and is therefore suited for all high precision pressure measurement tasks IC-engines.

Due to the M10 mounting thread this transducer can easily be screwed in directly as well as by means of an adaptor sleeve.

A temperature controlled cooling system becomes needless because the sensor shows a high insensibility towards a breakdown of the cooling system. Additional the sensor is working properly up to a temperature of 350 °C.



Dimensions



Example for direct installation

QC34D Quartz Pressure Transducer

Standard Specifications

Measuring Range	0...250 bar (3625 psi), 25 MPa
Lifetime	> 10 ⁸ load changes
Overload	300 bar (4350 psi), 30 MPa
Sensitivity (nominal)	19 pC/bar (1.31 pC/psi), 190 pC/MPa
Linearity	< ±0.2 % FSO
Natural Frequency	69 kHz
Acceleration	< 0.013 bar/g with cooling water
Sensitivity	< 0.003 bar/g without cooling water
Temperature coefficient of sensitivity	0.003 %/°C at 20...80°C (68...176°F)
Insulation Resistance at 20°C (68°F)	> 10 ¹³ Ω
Capacitance	10 pF
Cooling water	rate of flow min. 20l/h pressure max. 2.0 bar (29 psi)
Mass (without cable)	15 grammes
Mounting Torque	10 Nm (for adaptors refer to drawings)

Thermodynamic Specifications

Cyclic Temperature Drift	< ±0.3 bar
Load Change Drift	
Max. Zero-line Gradient dp/dt	4.5 mbar/ms
Permanent Zero-line Deviation	5 bar
IMEP-Stability	< 2 %

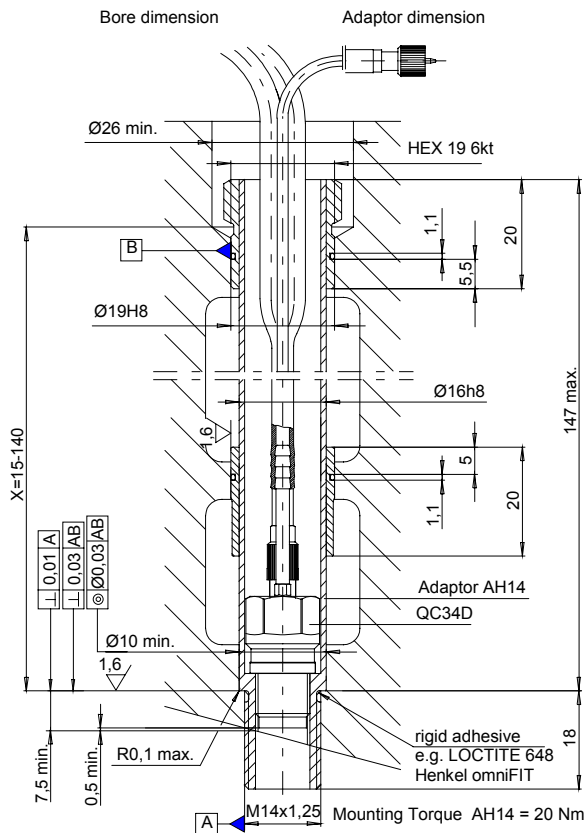
Scope of Supply

1 Transducer QC34D	1 Protection cap
1 Piezo-Input cable CI41 plus coupling CC41, fitted	1 Calibration sheet
2 Spare O-rings for cable	1 Specification sheet
1 Gasket SG20 (fitted)	1 Brief description
1 Spare gasket SG20	

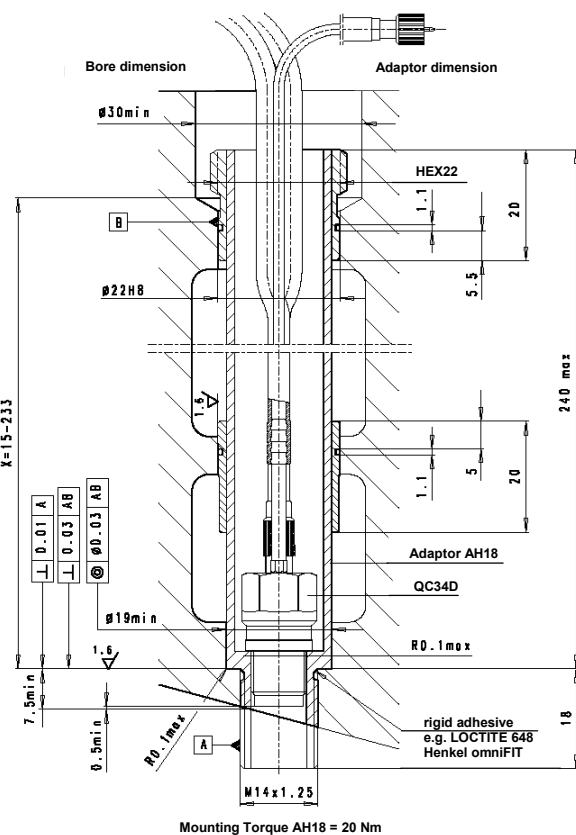
QC34D Quartz Pressure Transducer

Accessories

Cables and Couplings	CI41, CC41, E124-10
Cable-Mounting Tool	TC01
Gasket	SG20
Dismounting Tool for gasket	TT15
Dummy	DG06
Removal Tool	TD01
Adaptor	AH14, AH18
Mounting Tool	TT07, Z314
Mounting Spray	SF01
Cooling System	ZP91.00 / 1-4(8)
Cooling tube	ZP90.40 (2.3 x 0.75 Viton)



Installation by means of Adaptor AH14 and Pin Tool Z314



Installation by means of Adaptor AH18 and Box Spanner TT07