

## EXPLOSIVE ATMOSPHERES –

### Part 0: Equipment – General requirements

#### INTERPRETATION SHEET 1

This interpretation sheet has been prepared by technical committee 31: Equipment for explosive atmospheres, of IEC.

The text of this interpretation sheet is based on the following documents.

ISH	Report on voting
31/1085/ISH	31/1095/RVD

Full information on the voting for the approval of this interpretation sheet can be found in the report on voting indicated in the above table.

#### Interpretation of Annex A

##### Questions:

Is the torque used for the tensile test of A.3.1.4 required to be the same torque as the initial torque determined in A.3.1.1?

At what point in the testing sequence is the thermal endurance to heat test conducted?

##### Interpretation:

In A.3.1.1, a torque is applied to either the screws of a flanged compression element or the nut of a screwed compression element to compress the sealing ring to secure the mandrel. A tensile force is then applied to the mandrel to confirm the securement. The tensile force is applied for not less than 6 h. The test is carried out at an ambient temperature of  $(20 \pm 5) ^\circ\text{C}$ . The torque value needed for clamping to be assured by the sealing ring is acceptable if the slippage of the mandrel or cable sample as a result of the tensile force is not more than 6 mm.

Subsequently, either the complete cable gland and mandrel assembly used for the determination described above, or a new sample prepared using the same torque values, is then to be subjected to the thermal endurance tests. The maximum service temperature is considered to be  $75 ^\circ\text{C}$  unless otherwise specified by the manufacturer.

NOTE 1 The  $75 ^\circ\text{C}$  service temperature is the median of the branching point and entry point temperatures.

NOTE 2 Cable glands employing only metallic sealing rings and metallic parts do not require thermal endurance tests.

The subsequent test conditions and acceptance criteria are given in A.3.1.4. Prior to the application of the tensile force, the gland may be re-tightened in accordance with the manufacturer's instructions.

NOTE The torque applied to the screws or nut during retightening is not required to be the same as the initial torque applied in A.3.1.1.

In A.3.1.5, the “value needed to prevent slipping” is the torque required for A.3.1.4.

*It is intended that this interpretation will be introduced in IEC 60079-0 Edition 7 and therefore an Interpretation Sheet will not be required for this or future editions.*

Withheld

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[IEC 60079-0:2011/ISH1:2013](https://standards.iteh.ai/catalyst/standards/iec/c49243cb-5f17-4746-9391-307c773751f4/iec-60079-0-2011-ish1-2013)

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