

## Spiratec Type 30 Trap Failure Indicator Installation and Maintenance Instructions

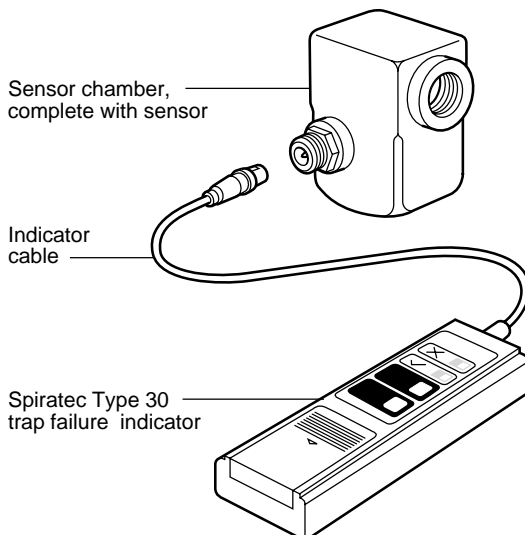


Fig. 1

### 1. General safety information

Please read Safety Information Sheet IM-GCM-10 as well as any national or regional regulations, before installing/using this product.

The product is designed and constructed to withstand the forces encountered during normal use. Use of the product other than as a trap failure indicator could cause damage to the product and may cause injury or fatality to personnel.

**Warning: The Spiratec Type 30 indicator is not approved for use in hazardous areas in the EU.**

### 2. General product information

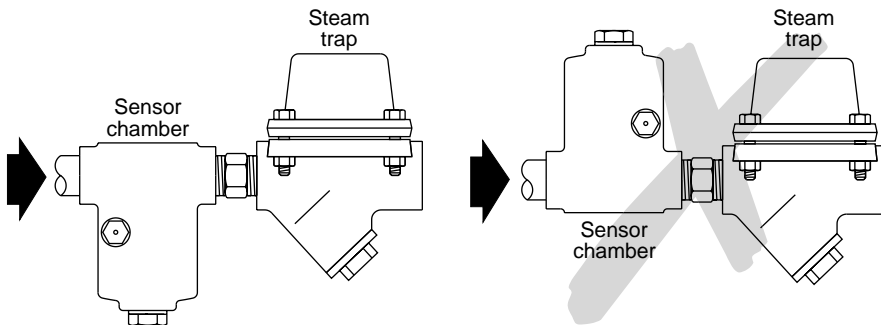
The Spiratec Type 30 trap failure indicator is a hand-held device for the detection of steam leaks through steam traps. It should be used in conjunction with either a sensor chamber, complete with sensor, installed immediately upstream of a steam trap, or a steam trap with a built-in sensor. The system consists of two main components as shown in Figure 1.

1. A sensor chamber, complete with sensor.
2. A Spiratec Type 30 trap failure indicator complete with indicator cable.

Whilst it is necessary to fit a sensor chamber assembly to each of the steam traps to be tested, the Spiratec Type 30 indicator, being portable, can be used to check a number of sensor chamber assemblies as required.

The maximum working condition for the sensor chamber is 32 bar g @ 239°C (464 psi g @ 462°F), a maximum ambient temperature of 40°C (104°F).

**Note:** The sensor chamber **should not** be installed when **superheated steam** conditions can occur at the traps.



**Fig. 2**                      **Correct installation**

**Incorrect installation**

### 3. Installation of sensor chamber

The chamber should be installed immediately upstream of the trap (close-coupled) as shown in Figure 2 in a horizontal position with the flow in the direction of the arrow on the body.

**Note:** Install the sensor chamber only as shown in Figure 2.

### 4. Operation

The instructions on how to use the 'Spiratec Type 30 trap failure indicator' are as follows:

#### To fit the indicator battery:

1. Remove the battery cover by unscrewing the socket head cap screw and sliding the cover downwards.
2. Fit one 9 volt PP3 battery.
3. Replace the battery cover and tighten the screw.
4. Test the indicator.

#### To test the Spiratec Type 30 indicator battery:

1. With the indicator disconnected from the sensor press the upper button (marked with a sensor chamber symbol). The **Red** LED will light.
2. With the indicator disconnected from the sensor press the lower button (marked with an indicator symbol). The **Green** LED will light.
3. If the LED does not light in 1 and 2 above, the battery needs renewing or the indicator is faulty.

#### To operate the Spiratec Type 30:

1. Plug the cable into the indicator socket and the pipeline sensor.
2. Press the button marked with a sensor chamber symbol:  
**Green** LED on - trap passing no live steam.  
**Red** LED on or continuous **Red-Green** flicker indicates the trap is faulty - passing live steam.

#### Special conditions:

**Plant start-up:** Allow time to clear air in the system, consequently avoiding a false **Red** LED signal. Allow the cycle to be completed and recheck.

### 5. Maintenance/available spares

The Spiratec Type 30 trap failure indicator needs no maintenance. However, we recommend the sensor be removed periodically to clean it and to inspect the insulation. Any pitting of the insulation indicates the sensor needs replacement.

Frequency of inspection will depend on the condition of the condensate.

#### Spare parts:

- The Spiratec Type 30 trap failure indicator cable is available as a spare.
- The 9 V PP3 batteries may be purchased through the normal suppliers.