

LOGIS-TECH ASSOCIATES



Fault detection on Steam Valve & Trap



Installation with steam / condensate trap



A steam trap is a device used to discharge condensate and non-condensable gases with a negligible consumption or loss of steam. Most steam traps are nothing more than automatic valves. They open, close or modulate automatically. Steam trap failures can affect process operations and reduce profits.

The movement of fluid in a closed system develops ultrasonic noise. Our ultrasonic testing camera LEAKSHOOTER LKS1000 recognize the noise created by flowing condensate or steam, and can be used to check a trap operating condition.

Defaults results in a Steam Trap:

Defaults (mechanical blocking, wear, obstruct...) in Steam Trap can generate:

- Harmful water hammer for plants and people working nearby (explosion of pipe, valve, trap ...!)
- Regulation process problem: temperature, pressure...
- Rust and corrosion problem due to a bad condensates discharge
- Energetic performance loss (financial loss of several thousand of € per year and per faulty trap)

How to detect these defaults in a steam trap? :

With the new ultrasonic vision/detection combined technology LEAKSHOOTER LKS1000 and with a special contact probe, it is possible to detect and listen to these defaults (open, closed, leak...) which create ultrasonic wave due to presence of steam and condensate flow during the running cycle.

It is then possible to detect and listen to the normal condition (almost cycling) of the steam trap and detects anomalies (permanent leak of steam for example). When the default is detected, it is possible to take a photo to make a report on PC for future reparation.

All this procedure can be done with or without the headphone, thanks to a colored barograph showing the RMS and MAX RMS ultrasonic values.



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