

Pipeclean[®]-Ex

for central extraction systems



The function of Pipeclean[®] is to extract the cooling lubricant mist from the machine working area, condense it and immediately feed it back into the machine tool (therefore no carry-over of cooling lubricant).

When oil is used as cooling lubricant or when minimum quantity lubrication is employed, then there is a risk of deflagration or explosion of the aerosol/air/oxygen enrichment that is formed in the working area of the machine tool.

The necessary countermeasures such as pressure release flaps, fire-extinguishing systems, etc. are well-known. An additional hazard exists, when central extraction systems are used that service several machines via branched extraction pipework.

A deflagration/explosion generates a pressure wave (which transports the jet flame), with immediate flash-over into the central extraction

pipework. The pressure wave can therefore spread to the adjacent machines and endanger the entire production hall.

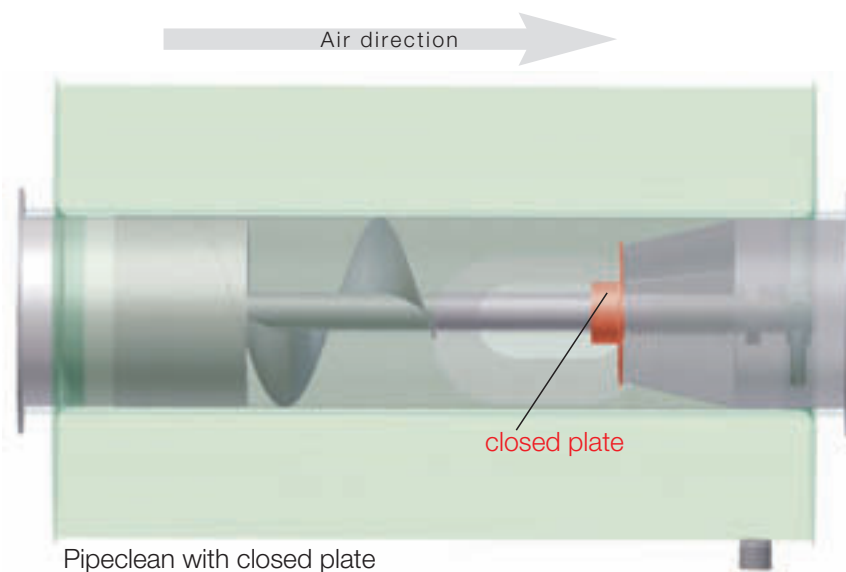
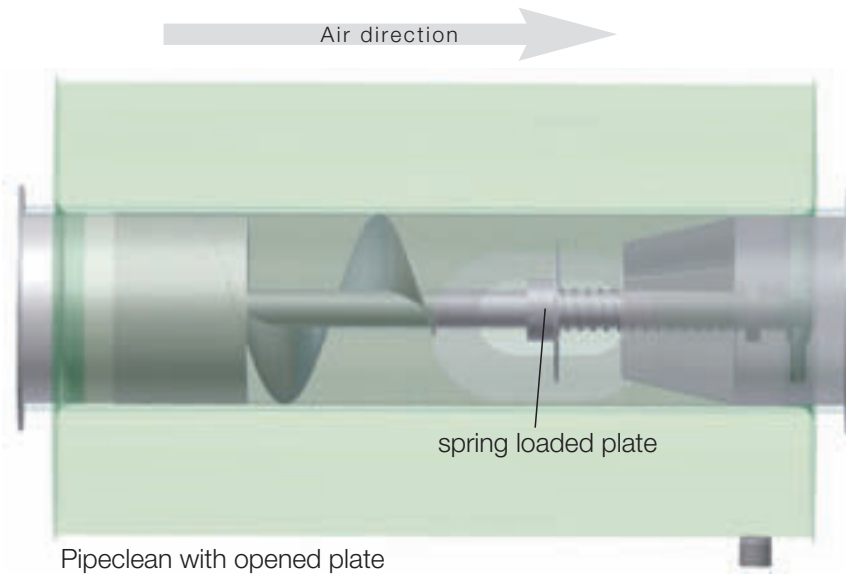
Pipeclean[®]-Ex

In order to eliminate this risk, Rerucha has developed Pipeclean[®]-Ex.

When the pressure wave arrives, the patented system actuates a spring-loaded plate that closes the outlet opening of the Pipeclean[®]-Ex instantly. Flash-over is no longer possible.

The system works purely mechanically, is self-reliant and has been tested for technical safety.

After the over pressure in the Pipeclean[®]-Ex has decreased, the plate opens again automatically.



Necessary accessories: isolation damper with flange

When Pipeclean®-Ex is used, the central extraction system can be operated without danger and all connected machines continue producing without interruption.

With the already familiar "**System Guarantee**", Rerucha assures the specified properties and functions.

Caution: When the pressure has decreased in the Pipeclean®-Ex, the plate opens and the outlet of the Pipeclean® is free again. There is now a risk that a possible fire (when the machine tool is still on fire) or the extinguishing gas of the fire-extinguishing equipment is extracted by the still running central extraction system. This has to be prevented under all circumstances. Therefore it is compulsory to place a shut-off damper behind the Pipeclean®-Ex, which is closed immediately (depending on the response time of the safety devices, e.g. fire-extinguishing equipment) after the pressure wave arrives at the Pipeclean®-Ex.

- = Pipeclean®-Ex prevents flashover
- = Shut-off damper prevents extraction of fire/extinguishing gas

= still questions?

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for machine tools

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**... and also for the
machine manufacturer!**