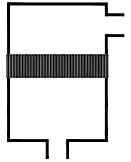




Type sheet

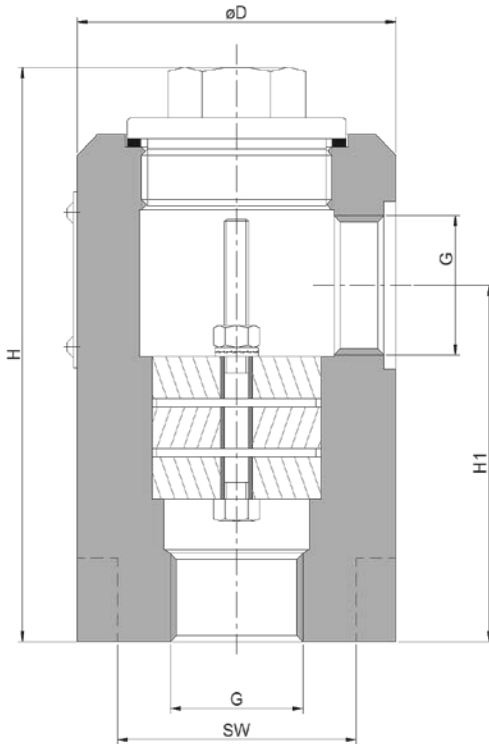
Uni-directional in-line detonation flame arrester
KITO® Rd/C-Det4-IIA-...-1.2



Application

Detonation flame arrester for installation into pipes to protect containers and components against **stable** detonation of flammable liquids and gases. Tested and approved as detonation flame arrester **type 4**. Approved for all substances of explosion groups IIA1 to IIA with a maximum experimental safe gap (MESG) > 0.9 mm. An operating pressure of 1.2 bar abs. and an operating temperature of 60 °C must not be exceeded. Positioning should be as close as possible to the protected object; it is only allowed to connect pipes with the same or a smaller diameter than the diameter (G) of the device. The installation of the detonation flame arrester into horizontal and vertical pipes is permissible.

Dimensions (mm)



| thread | D | H | H1 | SW | ~kg |
|--------|----|-----|----|----|-----|
| G 1/8" | 80 | 137 | 85 | 60 | 4.5 |
| G 1/4" | | | | | |
| G 3/8" | | | | | |
| G 1/2" | | | | | |
| G 3/4" | | | | | |
| G 1" | | | | | |

Weight refers to the standard design

Example for order

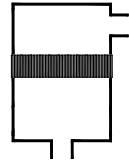
KITO® Rd/C-Det4-IIA-1"-1,2
(design with threaded connections G 1")

Type examination certificate to EN ISO 16852 and CE-marking in accordance to ATEX-Directive 2014/34/EU

Type sheet

Uni-directional in-line detonation flame arrester

KITO® Rd/C-Det4-IIA-...-1.2



Design

| | standard | optionally |
|------------------------------|---------------------------------|---------------------------------|
| housing | steel (St 52-3N) | stainless steel mat. no. 1.4571 |
| gasket | HD 3822 | PTFE |
| KITO®-flame arrester element | interchangeable | |
| KITO®-grid | stainless steel mat. no. 1.4310 | stainless steel mat. no. 1.4571 |
| connection | thread connection BSP | |

Performance curves

Flow capacity \dot{V} based on air of a density $\rho = 1.29 \text{ kg/m}^3$ at $T = 273 \text{ K}$ and atmospheric pressure $p = 1.013 \text{ mbar}$. For other gases the flow can be approximately calculated by

$$\dot{V} = \dot{V}_b \cdot \sqrt{\frac{\rho_b}{1.29}} \quad \text{or} \quad \dot{V}_b = \dot{V} \cdot \sqrt{\frac{1.29}{\rho_b}}$$

