



### TECHNOLOGY DESCRIPTION

The normally closed 2/2-way valve uses an innovative actuator technology based on shape memory alloys. This enables an extremely light and compact design while maintaining high-performance fluidic specifications. The media-separated valve can be used for both gas and liquid applications.

The valve is only 5 mm wide, 8 mm high, 20 mm long and weighs less than 1 gram. Despite this miniaturisation, the valve has a nominal valve width of 0.8 mm and is designed for pressures of up to 3 bar – an optimum compromise between compactness and performance.



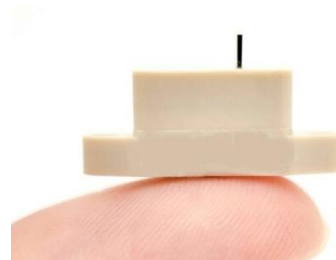
### INNOVATIVE ASPECTS

- ultra-compact with a low internal volume < 6.5 µl
- powerful with switching pressures up to 3 bar
- easy electrical and mechanical integration
- low power consumption
- biocompatible materials and media-separated
- controllable and noiseless operation
- up to 10 million switching cycles
- autoclavable and customisable
- suitable for liquids with magnetic beads
- works for fast flow movement sensitive applications



### TECHNOLOGY READINESS (in space application)

TRL 9 (2024)



COUNTRY OF ORIGIN

Germany

LATEST UPDATE

06/2024

TAGS

#valve

#miniature

#shape memory

#gas & liquid

#customisable

#noise-free

### APPLICATION AREAS

Aviation

Health

Chemical  
Engineering &  
Biotechnology

Energy

Construction &  
Civil Engineering

Mechanical  
Engineering

Space  
technologies

SPACE  
FOR BUSINESS  
BUSINESS  
FOR SPACE

TECH CARD

