Compatibility with environment & pumped liquid

There are two primary dangers with incompatibility of pumped liquid or environment.

1. That liquid will escape: *(See the PulseGuard safety difference below)*
   a). Seals and membranes can degrade before the first planned service date.
   b). The velocity of the leak can cause physical injury or death.
   c). The leakage could be of a toxic substance, or dangerous to the environment.
2. Vessel failure:
   Corrosion can cause a violent burst, or over time corrosion stress cracking.

Commonly overlooked examples:
It can be safe to use 316/316L stainless steel for pipes carrying salt water and brine.
This is because at flow velocities above 2 meters per second, the surface is "passivated".

- On the other hand -

Inside a filter or damper, the velocity is lower, stainless can become like Swiss cheese, this is a danger with titanium modified stainless also. Cupro-nickel is a better choice.
Where a ***PipeHugger***, Liquid inside the bladder type of damper is provided, the small end plug or "liquid contact part" could have been made from MONEL.
There is a general belief that PTFE, Dupont TEFLON, & ***LDi Flexflon,*** resist everything.
Exceptions:-**Ex / EG** Nitric acid, Bromine -ides -ics, Chloros & Flouros -ides -ics

So when installing a 316L or DuPont Teflon damper, you still need to double check.

Where substances are toxic, carcinogens, or are pyroforic, check the damper has 2nd-ary containment sealing and double layer membrane with leak detection from between them.

ALTERNATE DAMPER TYPES ARE SHOWN ON THE INSTALLATION BY PUMP TYPE PAGE.

The PulseGuard Safety Difference

Damper with secondary containment sealing, and leak detection port, for hazardous service.

Stainless girth strap covers split line.

Carries stainless data plate.

Deflects any leakage to a downward dribble.

Do Not Remove.
Stainless girth strap