

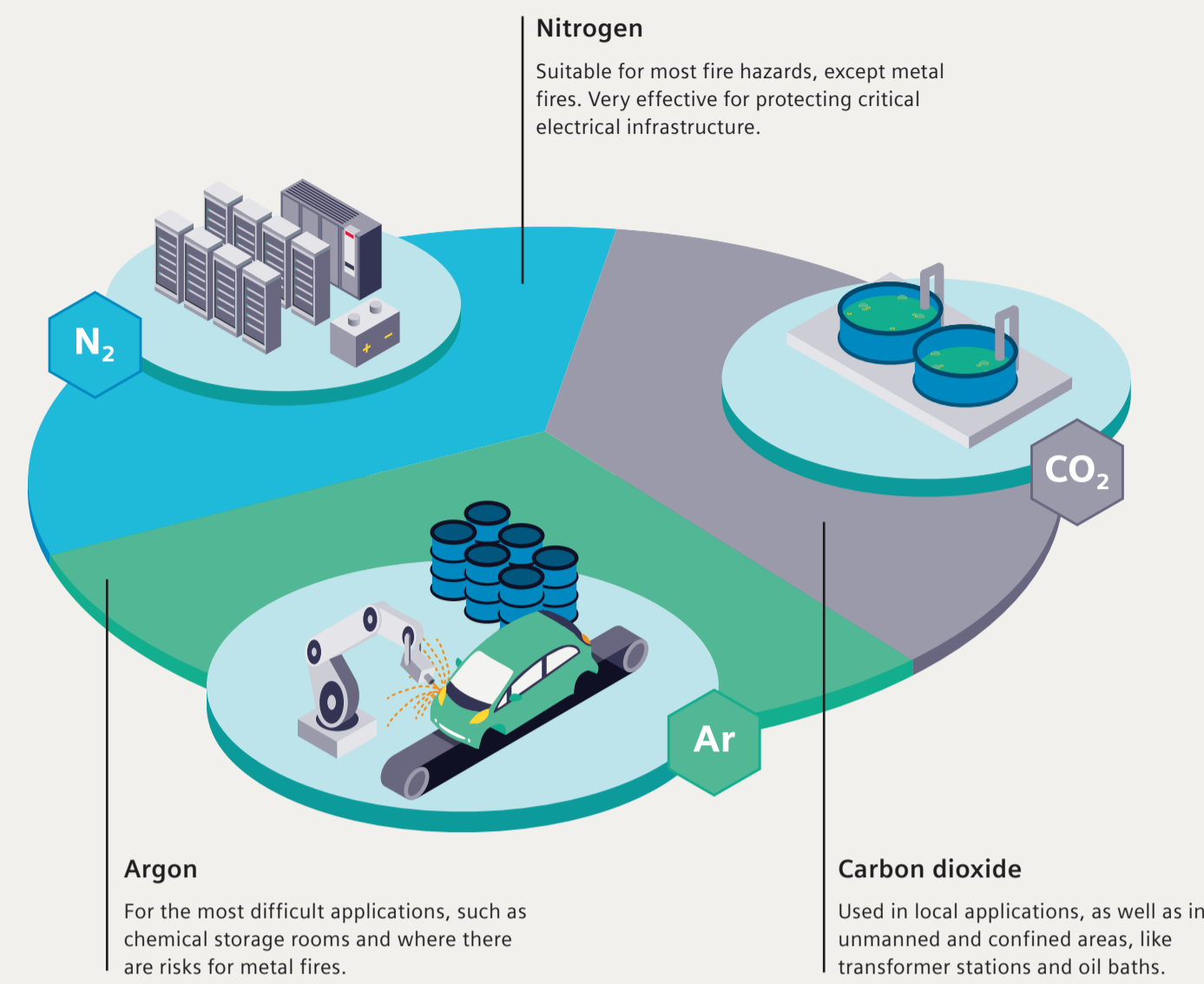


SIEMENS

## Sinorix NXN Natural inert gas extinguishing technology

Sinorix NXN features the latest generation of inert gas extinguishing technology. It is based on the three natural extinguishing agents, Argon, Nitrogen and Carbon dioxide. In pure form or mixed compounds, these natural extinguishing agents provide outstanding properties to combat a wide variety of fire hazards without harming the environment.

Their respective properties give Sinorix NXN great flexibility when designing the appropriate fire safety concept.



The Sinorix extinguishing agents are excellent for fire classes A, B, C, D and E.

### Naturally friendly, residue-free extinguishing

Sinorix NXN only uses agents and compounds which are found naturally in our atmosphere and do not harm the environment. They are neither subject to any regulatory restrictions, nor do they damage the ozone layer, ensuring the sustainability of your extinguishing system.

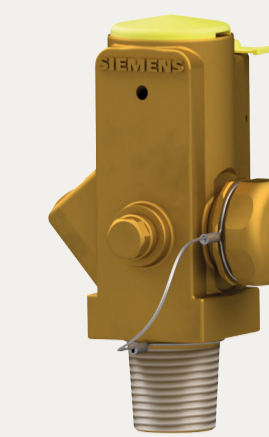
Sinorix extinguishing solutions follow the principle of inertization. When released, the gas displaces the oxygen in the flooding area and thus suppresses the fire within seconds. Fires are extinguished without incurring collateral damage and they do not leave behind any residue for clean up or disposal. This ensures minimal damage and a quick resumption of business operations. Their poor electrical conductivity makes them ideal for the protection of electrical components or systems.

# Sinorix NXN Natural agent extinguishing

Planning Tool

## Sinorix NXN Key portfolio components (Not to scale)

### ADVtechnology



#### Cylinder valve

- ADVtechnology – two ports for pneumatic and electromagnetic actuation
- One valve type for all extinguishing agents
- Seal concept for ports allows pressure-free assembly and disassembly
- Push-button to close valve
- Compact design
- (Re)filling via discharge port
- Fits under standard protection cap

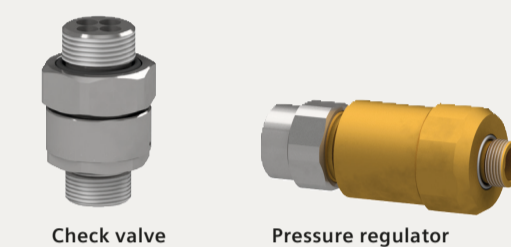
#### Manifold

- One type for all PN360 certified components
- Contactable by hand (no tools)
- O-ring sealing



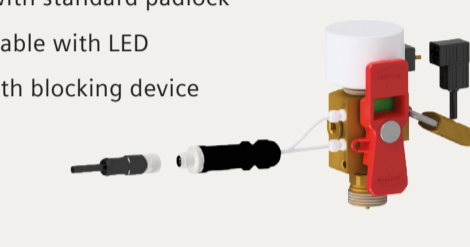
#### Check valve and pressure regulator

- One type for all agents
- Incorrect assembly impossible



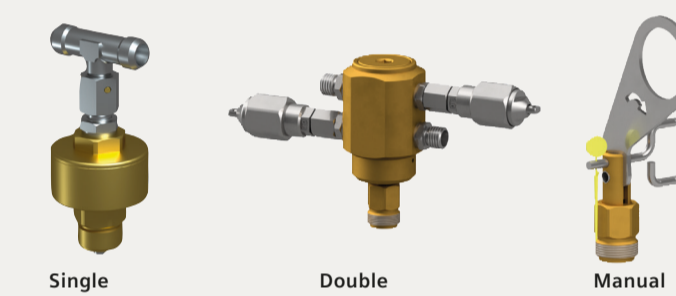
#### Electromagnetic actuator

- All functions monitored such as, unblocked, blocked, actuator installed
- Blocking with standard padlock
- Actuator cable with LED
- Include with blocking device



#### Pneumatic and manual actuator

- Activation range 8 – 360 bar
- Control line remains intact during cylinder replacement



#### Control and discharge hose

- One type for all gases PN360
- Flexible material for easy installation

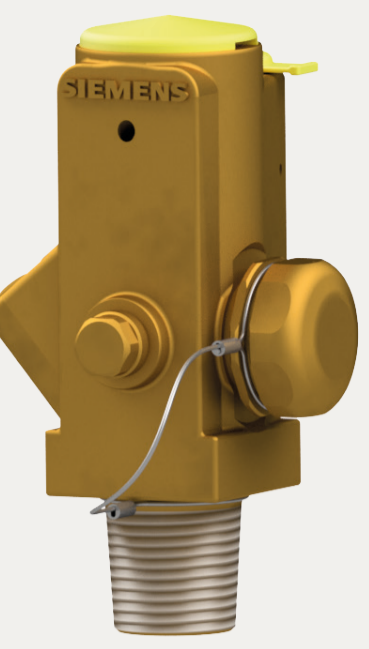


## ADVtechnology A small change with a big impact

By applying ADVtechnology the number of different components has been significantly reduced. This facilitates handling and leaves no room for confusion, as only one type of each component is used. At the same time, the actuators have been reduced in size, making them lighter and easier to handle during installation and maintenance.

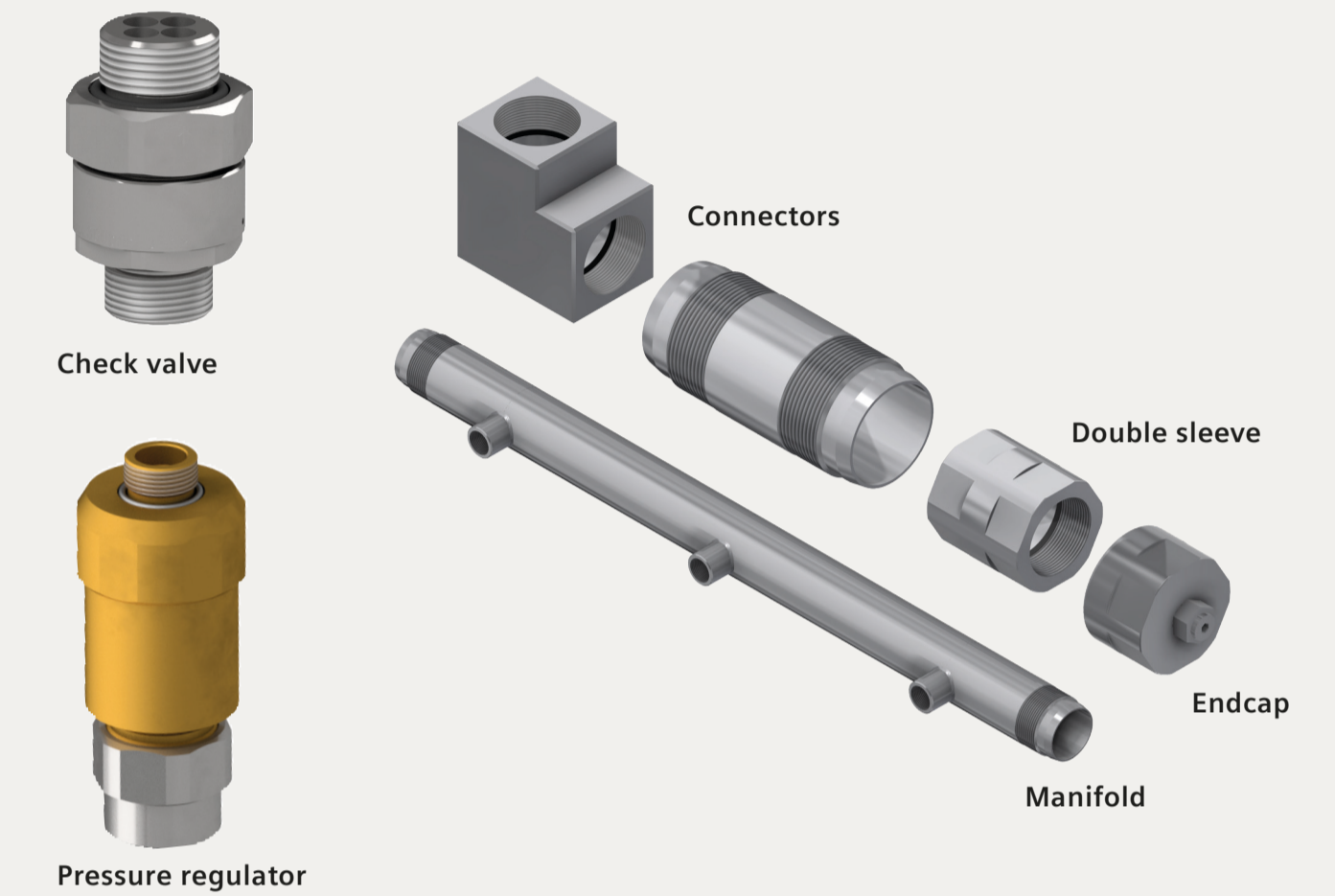
Due to an adaptation in the mechanical design of the cylinder valve, the gas cylinder can open with a lower pneumatic pressure. This means that only one type of manifold, control hose, discharge hose and pneumatic actuator is needed – covering the full pressure range (8 – 360 bar).

Furthermore, this new cylinder valve can accommodate either an electric or a pneumatic actuator, so only one type of valve body is needed.



### Assembly by hand, without additional sealants!

The check valve, pressure regulator, manifolds and connectors are all designed and equipped with the O-ring sealing mechanism. With a few twists of the wrist, and minimal force, all components are assembled by hand without needing special mechanical tools or additional sealants, such as hemp string or teflon tape.



## Sinorix Silent Extinguishing Technology

### Sinorix CDT – Constant Discharge Technology

Sinorix Constant Discharge Technology (CDT) is a technology where the cylinder valve releases the extinguishing agent at a constant mass flow.

But why is this important?

Conventional extinguishing systems are called unregulated, as they do not regulate the flow rate at which the extinguishing agent is released. This means that there is a huge pressure peak at the start of discharge, requiring large overpressure flaps. In addition to overpressure, unregulated systems also generate a lot of noise during discharge. The resulting vibrations can severely impair the operation of hard disks or other sensitive equipment, for example in server rooms and data centers.

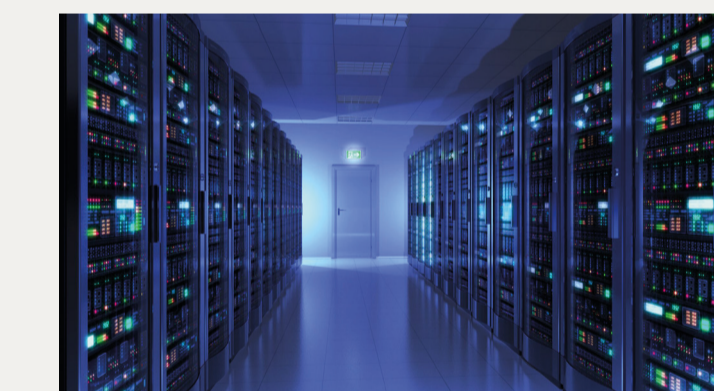
Sinorix CDT eliminates this pressure peak, resulting in lower noise levels and allowing the size of the overpressure flaps to be reduced by up to 70%.

### Sinorix silent nozzle

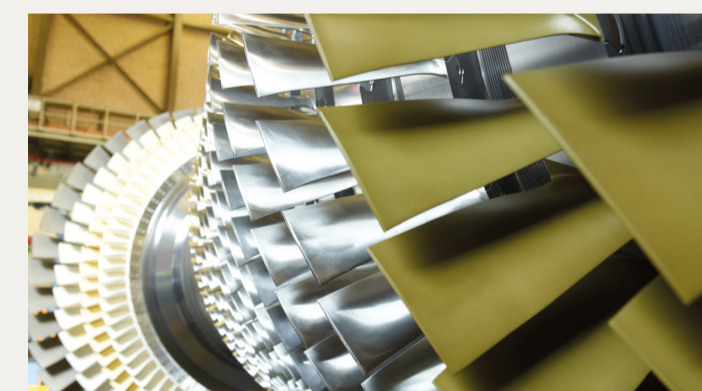
In combination with Sinorix CDT, the Sinorix silent nozzle forms an unbeatable combination for protecting sensitive hard disks. Its ingenious design further reduces the noise level during discharge of the extinguishing agent.



## Sinorix NXN – typical applications



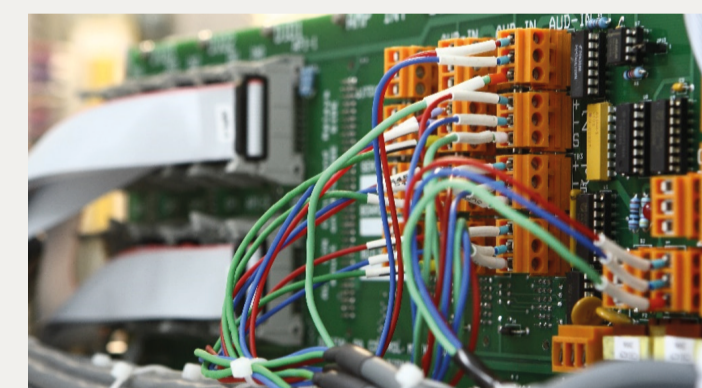
Data centers and server rooms



Gas turbines



Li-ion battery energy storage systems



Telecommunication systems



Power distribution/E-houses



Industrial applications



Cable ducts



Electrical switching rooms

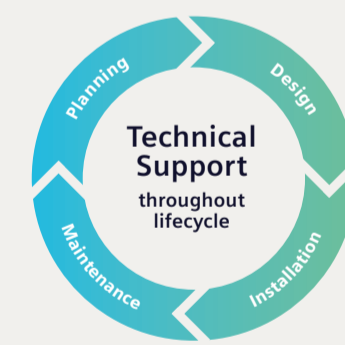
## Our Offering

### Support along the entire lifecycle

Providing extinguishing solutions requires considerable expertise, especially during planning and design. Siemens provides the latest digital planning and design tools, online product catalogue, system configuration, BIM, Step and DWG data including online ordering process, as well as calculation, planning tools and specification texts. Furthermore, Siemens design experience and technical support is invaluable to avoid overengineering. Optimal design can greatly reduce project costs as well as ensuring maximum safety.

#### Online planning

- Product catalogue (HIT)
- Ordering process with iMall
- Calculation tool (HIT Configurator)
- Project documentation: Bill of Material (BOM), data sheets, certificates



#### 3D Modelling data

- BIM data
- DWG
- Step
- CAD

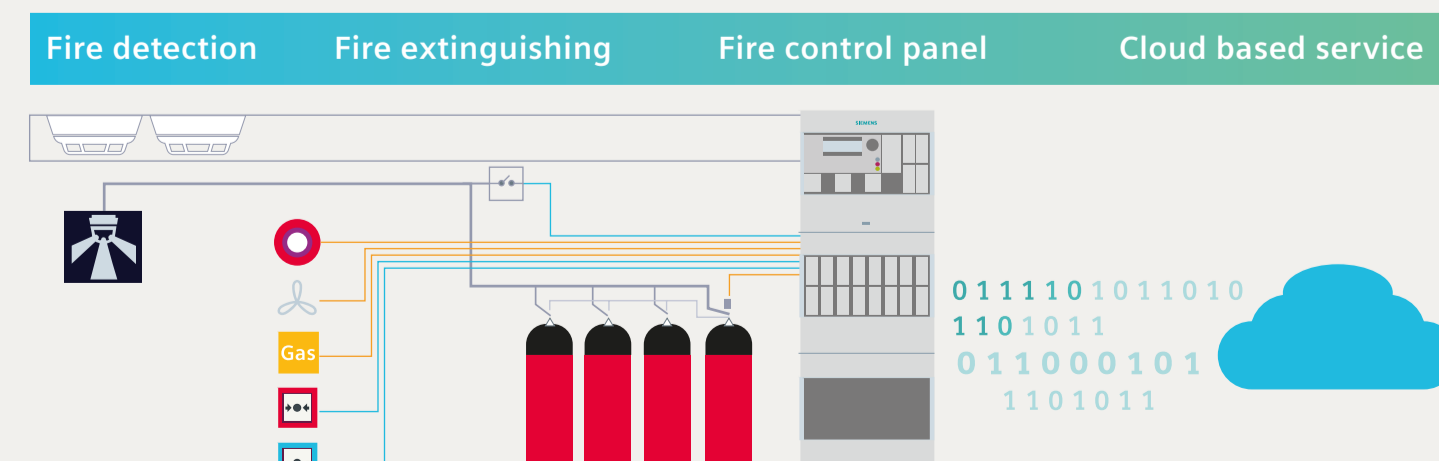
### Local and international representation

In addition to local representation, Siemens provides its customers and partners with optimal technical support via its International Center of Competence in Vienna (Austria), and a test laboratory in Altenrhein (Switzerland), where new application solutions are developed and perfected. With Sinorix NXN, people, assets, business operations and the environment are all perfectly protected.

### Integrated fire protection offering

A complete fire safety system goes beyond fire extinguishing in many projects; and it is important to know that Sinorix extinguishing systems are developed to be easily integrated into complete fire safety solutions, including detection and evacuation. Communication and integration between the various parts of a fire safety system is one of the significant sources of risk unless correctly engineered. Sinorix NXN integrates seamlessly into Siemens fire panels, further increasing safety and reducing risk. This integration also optimizes facility management by enabling cloud-based, digital services that substantially reduce operational and maintenance costs. By choosing Siemens Sinorix NXN, people, assets, business operations and the environment are all perfectly protected.

### All elements working together to provide highest fire safety and minimal operational costs



Scan the QR Code to access the HIT product catalogue:



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are binding only when they are expressly agreed upon in the concluded contract.  
course of further development of the products. The requested performance features  
specifically reflect those described, or which may undergo modification in the  
contains general descriptions and/or performance features which may not always  
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It helps our customers to thrive, communities to progress  
and supports sustainable development.  
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