

AWE-INSPIRING NETWORK ATEX: FILTERS AND SOLENOID VALVES

ATEX is an acronym for “ATmosphere EXplosive” and is a certification that brings together two European Union directives:

- Directive 2014/34 / EU imposes ATEX certification on all products sold in the Union, regardless of the place of production and the regulations in force, if installed in places at risk of explosion. The directive is aimed at manufacturers of equipment intended for use in areas with potentially explosive atmospheres and is manifested by the certification requirement for these products.
- 99/92 / EC for the safety and health of workers in explosive atmospheres.

ATEX products manufactured by Castel are subject to internal controls, according to Annex VIII of Directive 2014/34 / EU (Internal Manufacturing Control).

Castel identifies the ATEX approved product codes with the suffix EX and in addition to identifying them with a special label with the ATEX mark.

Also provides a declaration of conformity which certifies that the product meets the requirements for the design of appliances intended for use in potentially explosive atmospheres (limited to Zone 2).

Castel ATEX approved products are supplied with a specific “safety note” describing the requirements relating to the installation and operation in a dangerous zone.

Hermetic filter driers

Castel filters with the suffix “EX” have been developed for all those refrigeration applications that use HC refrigerant fluids such as R290, R600, R600a, belonging to the Group 1, defined in Article 13, Chapter 1, Point (a) of Directive 2014/68 / EU, with reference to Regulation (EC) No 1272/2008.

Filters with the suffix “EX” comply with the requirements of the European standard EN 13463-1: 2009, therefore comply with the ESR of the Directive 2014/34 / UE - ATEX.

Hermetic filters are devices intended for use on refrigeration systems located in areas classified as explosion hazard Zone 2, as defined in Annex I of Directive 1999/92 / EC.

Castel ATEX filters can be used with HC refrigerants classified as

flammable fluids and belonging to Safety Group A3 according to EN 378-1: 2016.

These products must be used exclusively on refrigeration systems that comply with current regulations on flammable refrigerant fluids (EN 60335 series).

Solenoid valves and coils

The normally closed solenoid valves compliant with the ATEX Directive (valves with the suffix “EX”) are offered by Castel with the following types of coils:

- Series 9100EX
- Series 9110EX

The mentioned coils are classified as Group II equipment: Category 3 according to Directive 2014/34 / EU (ATEX). They are equipment intended for use in potentially explosive atmospheres on refrigeration systems located in areas classified as Zone 2 explosion hazards as defined in Annex I of Directive 1999/92 / EC.

The 9100EX series coils must only be coupled to the 9150EX / R02 connector; the class of protection guaranteed by the coil + connector system is IP65 according to EN 60529.

The connector is a device intended to be used in potentially explosive atmospheres on refrigeration systems located in areas classified as explosion hazard Zone 2 and constitutes a valid system to connect the coil to the electricity network and complies to safety requirements even in environmental conditions with the presence of humidity. Indeed, provided it is used with the special gaskets supplied, it ensures an IP65 degree of protection according to EN 60529.

For more information, download the 2020 General Catalogue from our web site: www.castel.it

