

AUTOMATIC FIRE EXTINGUISHING SYSTEMS

TEST AND VERIFICATION CAPABILITY

ARESFSS Industry provides its customers with 4 different test and simulations for the ARESFSS fire suppression system, designed in accordance with the Nato Stanag 4317 standard, both on the vehicle and in its own cabins in the factory, and provides its customers with the verification and quality control activities of the system they purchased. This activity is done according to NATO Stanag 4317 Level 4, which has the most advanced test procedure in the world. According to this standard, Fireball and HFC concentration tests in this standard are performed on the vehicle or in simulation cabins, according to the customer's request. As a result of these tests, it is observed that the system detects the fire in 3 milliseconds and extinguishes it within 250 milliseconds.

NATO STANAG 4317 HFC227EA CONCENTRATION TEST

This test is performed with reference to NFPA 2001 HFC227ea concentration amount in accordance with the Concentration test section in NATO Stanag 4317 section 4.4.3. The aim here is to determine whether the personnel in the vehicle will be affected by the agent when the system is activated, by measuring the gas concentration in the vehicle.



NRE-227 - HFC227ea Concentration Measurement Sensor

With the measurement of light intensity, it obtains the concentration data at the position where the device is fixed.

Before the cylinder is discharged on the vehicle, the first 30 seconds of measurement and the average data for 5 minutes are obtained from the devices positioned at minimum 3 and maximum 10 different points. (At least 3 sensors must be placed according to STANAG 4317)

• Sampling Rate (>100Hz) (According to the STANAG 4317 document, it is inc-

luded in the fast sensor category.)

- 0% 25% Measurement Range
- 0°C 40°C Operating Temperature
- Ability to take measurements at

10 points



NATO STANAG 4317 Level 4 TEST SCREEN

NATO STANAG-4317 HFC227 FIREBALL TEST

With the fireball test, detection and extinguishing time measurements take place in the vehicle or simulation test cabin. This detection and extinguishing time must not exceed 260 milliseconds in total.

Fireball test capability features

- Injection of 200 milliliters of F-54 jet fuel for 3 seconds
- Fuel tank 85 °C
- Fuel drain line 65 °C
- Ignition mechanism