

Safety data sheet
 according to 1907/2006/EC, Article 31

Printing date 07.10.2015

Version number 1

Revision: 07.10.2015

SECTION 1: Identification of the substance/mixture and of the company/undertaking

- **1.1 Product identifier**
 - **Trade name: 227ea+21711: ACTOK Pyrosticker models ACT P, ACT 15, ACT 25, ACT 45, ACT 60**
- **1.2 Relevant identified uses of the substance or mixture and uses advised against**

No further relevant information available.

 - **Application of the substance / the mixture**

Article
 Extinguishing agent
 Suitable for extinguishing fires of classes A2, B, C.
 - **Uses advised against**

Not suitable for extinguishing metal fires.
 Not suitable for extinguishing of smoldering of solid combustible substances.
- **1.3 Details of the supplier of the safety data sheet**
 - **Manufacturer/Supplier:**

PyroChemica-Center LLC
 RU-125412, Moscow
 Korovinskoe highway 35 a
 Tel. +7(495)783-68-00
 Russian Federation
 info@actokpro.com
 www.actokpro.com
 - **Informing department:**

Technical Service:
 Tel. +7(495)783-68-00
- **1.4 Emergency telephone number:** Tel. +7(495)783-68-00

SECTION 2: Hazards identification

- **2.1 Classification of the substance or mixture**
 - **Classification according to Regulation (EC) No 1272/2008**

The product is not classified according to the CLP regulation.
- **2.2 Label elements**
 - **Labelling according to Regulation (EC) No 1272/2008** Void
 - **Hazard pictograms** Void
 - **Signal word** Void
 - **Hazard statements** Void
 - **Additional information:**

For this product (substance/mixture/article) there is not obligatory requirement to prepare a safety data sheet according article 31 of the regulation (EC) 1907/2006. This information sheet gives relevant details according article 32 of the mentioned regulation.
 - **Information pertaining to particular dangers for man and environment**

Contains a component, which is subject to EC regulation 1005/2009 on substances that deplete the ozone layer.
- **2.3 Other hazards**
 - **Results of PBT and vPvB assessment**
 - **PBT:** Not applicable.
 - **vPvB:** Not applicable.

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SECTION 3: Composition/information on ingredients

3.2 Chemical characterisation: Mixtures

- **Description:** Foil containing thermically activatable, micro encapsulated fire extinguishing media.

· Dangerous components:

CAS: 677-69-0 EINECS: 211-643-3	1,1,1,2,3,3,3-heptafluoro-2-iodopropane ⚠ Acute Tox. 4, H332; Skin Irrit. 2, H315; Eye Irrit. 2, H319; STOT SE 3, H335	10-<25%
CAS: 431-89-0 EINECS: 207-079-2 Reg.nr.: 01-2119485489-18-X	1,1,1,2,3,3,3-heptafluoropropane ⚠ Press. Gas L, H280	10-<25%

- **Additional information** For the wording of the listed risk phrases refer to section 16.

SECTION 4: First aid measures

4.1 Description of first aid measures

- **General information** Measures are valid for damaged products and leaking components.
- **After inhalation** Supply fresh air; consult doctor in case of symptoms.
- **After skin contact**
Rinse with water.
If skin irritation continues, consult a doctor.
- **After eye contact**
Rinse opened eye for several minutes under running water.
In case of permanent aches and pains please go and see the doctor.
- **After swallowing**
Swallowing is not considered to be a possible way of exposure.
Rinse out mouth and then drink plenty of water.
In case of persistent symptoms consult doctor.
- **4.2 Most important symptoms and effects, both acute and delayed** Anaesthetic effects
- **4.3 Indication of any immediate medical attention and special treatment needed**
No further relevant information available.

SECTION 5: Firefighting measures

5.1 Extinguishing media

· Suitable extinguishing agents

- The product itself does not burn.
- Use fire fighting measures that suit the environment.

5.2 Special hazards arising from the substance or mixture

- Formation of poisonous gases during heating or in fires.
- Can be released in case of fire:

Fluorohydrocarbons
Iodised hydrocarbons

5.3 Advice for firefighters

- **Protective equipment:** Wear self-contained breathing apparatus.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Ensure adequate ventilation

6.2 Environmental precautions:

Prevent material from reaching sewage system, holes and cellars.

6.3 Methods and material for containment and cleaning up:

Collect mechanically.

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Absorb liquid components with liquid-binding material.
Dispose of the material collected according to regulations.
Ensure adequate ventilation.

· **6.4 Reference to other sections**

See Section 7 for information on safe handling
See Section 8 for information on personal protection equipment.
See Section 13 for information on disposal.

SECTION 7: Handling and storage

· **7.1 Precautions for safe handling**

No special precautions necessary if used correctly.
Ensure sufficient ventilation.
Do not inhale gases/vapours/aerosols.
Avoid contact with eyes and skin.

· **Information about protection against explosions and fires:**

Store it away from ignition sources or open fire.

· **7.2 Conditions for safe storage, including any incompatibilities**

· **Storage**

· **Requirements to be met by storerooms and containers:**

Store only undamaged original packaging drums.

· **Information about storage in one common storage facility:** Not required.

· **Further information about storage conditions:** Protect from heat and direct sunlight.

· **7.3 Specific end use(s)** No further relevant information available.

SECTION 8: Exposure controls/personal protection

· **8.1 Control parameters**

· **Components with limit values that require monitoring at the workplace:**

The product does not contain any relevant quantities of materials with critical values that have to be monitored at the workplace.

· **CAS No. Designation of material % Type Value Unit**

· **Additional Occupational Exposure Limit Values for possible hazards during processing:**

The embedded extinguishing agent has narcotic properties in case of release.

· **Additional information:** The lists that were valid during the compilation were used as basis.

· **8.2 Exposure controls**

· **Personal protective equipment**

· **General protective and hygienic measures**

Wash hands during breaks and at the end of the work.

· **Breathing equipment:**

Not necessary if room is well-ventilated.

Use a breathing protection if high concentrations are present.

Filter Type A.

· **Protection of hands:**

No chemical-protective gloves required.

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.

Due to missing tests no recommendation to the glove material can be given for the product/ the preparation/ the chemical mixture.

Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

· **Material of gloves**

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer. As the product is a preparation of several substances, the resistance of the glove material can not be calculated

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- in advance and has therefore to be checked prior to the application.
- **Penetration time of glove material**
The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.
- **Eye protection:** Safety glasses recommended during refilling.

SECTION 9: Physical and chemical properties

· 9.1 Information on basic physical and chemical properties

· General Information

· Appearance:

- **Form:** Foil
- **Colour:** Different according to colour
- **Odour:** odourless
- **Odour threshold:** Not determined.

· **pH-value:** Not determined.

· Change in condition

- **Melting point/Melting range:** Not determined
- **Boiling point/Boiling range:** Not determined

· **Flash point:** Not applicable

· **Inflammability (solid, gaseous)** Not applicable.

· Ignition temperature:

· **Decomposition temperature:** Not determined.

· **Self-inflammability:** Product is not selfigniting.

· **Danger of explosion:** Product is not explosive.

· Critical values for explosion:

- **Lower:** Not determined.
- **Upper:** Not determined.

· **Vapour pressure:** Not applicable.

- **Density** Not determined
- **Relative density** Not determined.
- **Vapour density** Not determined.
- **Evaporation rate** Not determined.

· Solubility in / Miscibility with

· **Water:** Not miscible or difficult to mix

· **Partition coefficient (n-octanol/water):** Not determined.

· Viscosity:

- **dynamic:** Not determined.
- **kinematic:** Not determined.

· **9.2 Other information** No further relevant information available.

SECTION 10: Stability and reactivity

· **10.1 Reactivity** No further relevant information available.

· 10.2 Chemical stability

· Thermal decomposition / conditions to be avoided:

No decomposition if used and stored according to specifications.
Thermal decomposition > 400 °C.

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- **10.3 Possibility of hazardous reactions** No dangerous reactions known
- **10.4 Conditions to avoid** Temperatures greater than 80 °C.
- **10.5 Incompatible materials:** No further relevant information available.
- **10.6 Hazardous decomposition products:**
None in case of intended use and storage in compliance with instructions.

SECTION 11: Toxicological information

- **11.1 Information on toxicological effects**
 - **Acute toxicity** Based on available data, the classification criteria are not met.
 - **Primary irritant effect:**
 - **Skin corrosion/irritation** Based on available data, the classification criteria are not met.
 - **Serious eye damage/irritation**
Based on available data, the classification criteria are not met.
 - **Respiratory or skin sensitisation**
Based on available data, the classification criteria are not met.

- **Repeated dose toxicity**

677-69-0 1,1,1,2,3,3,3-heptafluoro-2-iodopropane		
Oral	NOAEL (28d)	433 mg/kg bw/day (mouse)
431-89-0 1,1,1,2,3,3,3-heptafluoropropane		
Inhalative	NOAEC (90d)	731690 mg/m ³ (rat)

- **CMR effects (carcinogenicity, mutagenicity and toxicity for reproduction)**

- **Germ cell mutagenicity** Based on available data, the classification criteria are not met.
- **Carcinogenicity** Based on available data, the classification criteria are not met.
- **Reproductive toxicity** Based on available data, the classification criteria are not met.
- **STOT-single exposure** Based on available data, the classification criteria are not met.
- **STOT-repeated exposure** Based on available data, the classification criteria are not met.
- **Aspiration hazard** Based on available data, the classification criteria are not met.

SECTION 12: Ecological information

- **12.1 Toxicity**
 - **Aquatic toxicity:** No further relevant information available.
- **12.2 Persistence and degradability** No further relevant information available.
 - **Other information:** There are no data available about the preparation.
- **12.3 Bioaccumulative potential** No further relevant information available.
- **12.4 Mobility in soil** No further relevant information available.
 - **Additional ecological information:**
 - **General notes:**
Water hazard class 1 (German Regulation) (Self-assessment): slightly hazardous for water.
Do not allow undiluted product or large quantities of it to reach ground water, water bodies or sewage system.
Avoid emission into atmosphere. Product shows a highatmospheric residence time and is justified suspected to influence the O₂/O₃ balance in the stratosphere.
- **12.5 Results of PBT and vPvB assessment**
 - **PBT:** Not applicable.
 - **vPvB:** Not applicable.
- **12.6 Other adverse effects**
This product contains a fluorinated hydrocarbon with a high greenhouse warming potential.

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SECTION 13: Disposal considerations

· **13.1 Waste treatment methods**

· **Recommendation**

Must not be disposed of together with household garbage. Do not allow product to reach sewage system.

Contact manufacturer for recycling information.

· **European waste catalogue**

14 00 00	WASTE ORGANIC SOLVENTS, REFRIGERANTS AND PROPELLANTS (except 07 and 08)
14 06 00	waste organic solvents, refrigerants and foam/aerosol propellants
14 06 02*	other halogenated solvents and solvent mixtures
16 00 00	WASTES NOT OTHERWISE SPECIFIED IN THE LIST
16 03 00	off-specification batches and unused products
16 03 05*	organic wastes containing dangerous substances

· **Uncleaned packagings:**

· **Recommendation:**

Dispose of packaging according to regulations on the disposal of packagings.

SECTION 14: Transport information

· **14.1 UN-Number**

· **ADR, ADN, IMDG, IATA**

Void

· **14.2 UN proper shipping name**

· **ADR, ADN, IMDG, IATA**

Void

· **14.3 Transport hazard class(es)**

· **ADR, ADN, IMDG**

· **Class**

Void

· **IATA**

· **Class**

Void

Not Restricted.

· **14.4 Packing group**

· **ADR, IMDG, IATA**

Void

· **14.5 Environmental hazards:**

Not applicable.

· **14.6 Special precautions for user**

Not applicable.

· **14.7 Transport in bulk according to Annex II of Marpol and the IBC Code**

Not applicable.

· **UN "Model Regulation":**

Void

SECTION 15: Regulatory information

· **15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture**

· **Labelling according to Regulation (EC) No 1272/2008** Void

· **Hazard pictograms** Void

· **Signal word** Void

· **Hazard statements** Void

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- **Directive 2012/18/EU**
 - **Named dangerous substances - ANNEX I** None of the ingredients is listed.
 - **National regulations**
 - **Water hazard class:** Water hazard class 1 (Self-assessment): slightly hazardous for water.
- **Substances of very high concern (SVHC) according to REACH, Article 57**
- None of the ingredients is contained.
- **15.2 Chemical safety assessment:** A Chemical Safety Assessment has not been carried out.

SECTION 16: Other information

These data are based on our present knowledge. However, they shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

- **Relevant phrases**
 - H280 Contains gas under pressure; may explode if heated.
 - H315 Causes skin irritation.
 - H319 Causes serious eye irritation.
 - H332 Harmful if inhaled.
 - H335 May cause respiratory irritation.
- **Department issuing data specification sheet:**

This Material Safety Data Sheet has been drawn up in cooperation with:
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- **Abbreviations and acronyms:**
 - ADR: Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)
 - IMDG: International Maritime Code for Dangerous Goods
 - IATA: International Air Transport Association
 - GHS: Globally Harmonised System of Classification and Labelling of Chemicals
 - EINECS: European Inventory of Existing Commercial Chemical Substances
 - ELINCS: European List of Notified Chemical Substances
 - CAS: Chemical Abstracts Service (division of the American Chemical Society)
 - PBT: Persistent, Bioaccumulative and Toxic
 - SVHC: Substances of Very High Concern
 - vPvB: very Persistent and very Bioaccumulative
 - Press. Gas L: Gases under pressure: Liquefied gas
 - Acute Tox. 4: Acute toxicity, Hazard Category 4
 - Skin Irrit. 2: Skin corrosion/irritation, Hazard Category 2
 - Eye Irrit. 2: Serious eye damage/eye irritation, Hazard Category 2
 - STOT SE 3: Specific target organ toxicity - Single exposure, Hazard Category 3

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