

SDS according to Annex of Commission Regulation (EU) No 830/2015 of 28 May 2015 amending Regulation (EC) No 1907/2006 of the European Parliament and of the Council of 18 December 2006 concerning REACH.

Version 1.1      Preparation date: 22 February 2018

Revision date: - .

## **SECTION 1: IDENTIFICATION OF THE SUBSTANCE / MIXTURE AND OF THE COMPANY / UNDERTAKING**

### **1.1 Product identifier**

Trade name: **i-protect N1.1**

### **1.2 Relevant identified uses of the substance or mixture and uses advised against**

**Identified uses:** Product for antibacterial surface protection powered by aXonnite<sup>®</sup> Technology.

**Uses advised against:** None identified.

### **1.3 Details of the supplier of the safety data sheet**

**Manufacturer:**

**Nano-Tech Polska Sp. z o.o. Sp. K.**

Grzybowska Str. 16/22 loc.717, 00-132 Warsaw, Poland

Tel. +48 22 789 44 51

**Contact person:** **Paweł Siejko**, e-mail: [info@nano-tech.pl](mailto:info@nano-tech.pl)

### **1.4 Emergency telephone number**

- **112 Cell phone and landline; 998 State Fire Brigade; Medical emergency 999**

- **+48 22 789 44 51** (office hours of Nano-Tech: 8-16)

## **SECTION 2: HAZARDS IDENTIFICATION**

### **2.1. Classification of the substance or mixture**

Product is not classified as hazardous according to Regulation EC 1272/2008 (CLP)

**Health hazards**                      not classified as hazardous.

**Physicochemical hazards**        not classified as hazardous.

**Environmental hazards**            not classified as hazardous.

**The full texts of H phrases are given in Section 16 of SDS.**

### **2.2 Label elements**

Label elements according to Regulation EC 1272/2008 (CLP)

Product is not classified as hazardous.

**Pictogram:**      does not occur

**Signal word:**    does not occur

**Hazard statements indicating type of danger:**      does not occur

**Precautionary statements indicating conditions of safe use:**      does not occur

**Additional remarks:** none.

### **2.3. Other hazards**

This mixture contains no components considered to be either persistent, bio accumulative and toxic (PBT), or very persistent and very bio accumulative (vPvB) at levels of 0.1% or higher, and they are not included in Annex XVII of Regulation (EC) No 1907/2006.

**SECTION 3: COMPOSITION / INFORMATION ON INGREDIENTS**

**3.1 Substances** Not applicable.

**3.2 Mixtures** Not applicable.

**Composition:** aqueous solution of non-ionic silver and copper nanoparticles.

The full texts of H phrases, hazard classes are given in Section 16 of SDS.

**Ingredients according to the requirements of Regulation (EC) No. 648/2004 on detergents:**

- not present in the formulation

**SECTION 4: FIRST AID MEASURES**

**4.1 Description of first aid measures**

**General Advice:** never give anything by mouth to an unconscious person.

**Inhalation:** no risk.

**Skin contact:** no risk.

**Eye contact:** product does not irritate the eyes, no risk.

**Ingestion:** no risk.

**4.2 Most important symptoms and effects, both acute and delayed**

Not known.

**4.3 Indication of any immediate medical attention and special treatment needed**

No specific indications.

**SECTION 5: FIREFIGHTING MEASURES**

**5.1 Extinguishing media**

Suitable extinguishing media:

Fire extinguishing agents should be appropriate to the size of the fire and burning media.

In case of fire, you can use the following extinguishing media: dry chemical, water, foam and carbon dioxide.

Unsuitable extinguishing media: undefined

**5.2 Special hazards arising from the substance or mixture**

Combustion can result in: mixture is non-combustible.

**5.3 Advice for firefighters**

Use personal protective equipment, depending on the size of the fire and suitable for burning materials.

Dispose of fire debris and contaminated water in accordance with waste regulations.

**SECTION 6: ACCIDENTAL RELEASE MEASURES**

**6.1 Personal precautions, protective equipment and emergency procedures**

Avoid direct contact with eyes. Do not drink, eat or smoke while working.

**6.2 Environmental precautions**

No special requirements, however do not allow big quantities to enter drains spills, surface water, groundwater.

**6.3 Methods and materials for containment and cleaning up**

No special requirements.

#### 6.4 Reference to other sections

Dispose of in accordance with the recommendations set out in Section 13  
Information regarding personal protective equipment specified in Section 8

### **SECTION 7: HANDLING AND STORAGE**

#### 7.1 Precautions for safe handling

Handling of the product: use as directed. Do not eat or drink and do not smoke while using mixture.  
Detailed information on the use of the product can be found on the label and leaflet.

#### 7.2 Conditions for safe storage, including any incompatibilities

Keep out of reach of unauthorized persons. Store in original containers in a separate storage place. Store at room temperature.

#### 7.3 Specific end use(s)

No information about the applications other than those listed in section 1

### **SECTION 8: EXPOSURE CONTROLS / PERSONAL PROTECTION**

#### 8.1 Control parameters

Ingredients harmful to health that require monitoring at the workplace and their limits:  
- not present in the formulation.

#### 8.2 Exposure controls

##### 8.2.1 Appropriate engineering controls

Not required.

##### 8.2.2 Individual protection measures, such as personal protective equipment

Handle in accordance with good hygiene practice when handling chemicals.

**Eye/face protection:** not required.

**Skin protection - hand protection:** not required.

**Skin protection:** not required.

**Respiratory protection:** not required.

##### 8.2.3 Environmental exposure controls

No special requirements.

### **SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES**

#### 9.1 Information on basic physical and chemical properties

- a) Appearance: colorless, clear liquid.
- b) Odour: none.
- c) Odour threshold: no data available.
- d) pH-value (temp. 25°C): 7,0 +/- 0,2
- e) Melting / freezing point: no data available.
- f) Initial boiling point and boiling range: no data available.
- g) Flash point: not applicable.
- h) Evaporation rate: no data available.
- i) Flammability: mixture is non-flammable.
- j) Upper / lower flammability or upper / lower explosive limit: not applicable.
- k) Vapour pressure [hPa]: no data available.
- l) Vapour density: no data available.
- m) Density, temp. 20°C: 1.00 g/cm<sup>3</sup>
- n) Water solubility: completely miscible.

- o) Partition coefficient: n-octanol/water: no data available.
- p) Autoignition temperature: not applicable.
- q) Decomposition temperature: not applicable.
- r) Viscosity [mPa s], temp. 20°C: no data available.
- s) Explosive properties: not applicable.
- t) Oxidising properties: not applicable.

### **9.2 Other Information**

No data available.

## **SECTION 10: STABILITY AND REACTIVITY**

### **10.1 Reactivity**

Under conditions of storage and use as intended - no reactivity.

### **10.2 Chemical stability**

Product is stable under the typical use and storage conditions.

### **10.3 Possibility of hazardous reactions**

Under normal conditions of use, hazardous reactions do not occur.

### **10.4 Conditions to avoid**

No data available. See also section 7.

### **10.5 Incompatible materials**

No dangerous reactions are known with other materials.

### **10.6 Hazardous decomposition products**

Under normal conditions of use no hazardous decomposition products are liberated.  
See also Subsection 5.2.

## **SECTION 11: TOXICOLOGICAL INFORMATION**

### **11.1.1 Information on toxicological effects**

Acute toxicity: no data available for the preparation

## **SECTION 12: ECOLOGICAL INFORMATION**

### **12.1 Toxicity**

Toxicity to the environment: Based on the available data, the classification criteria are not met.

### **12.2 Persistence and degradability**

Biodegradability: no data available for the mixture.

### **12.3 Bio accumulative potential**

Not expected to have bio accumulative potential.

It contains no AOX.

Bio concentration factor (BCF): no data available

### **12.4 Mobility in soil**

No data available.

### **12.5 Results of PBT and vPvB assessment**

The mixture does not meet the criteria for PBT and vPvB.

**12.6 Other adverse effects**

No other available information.

**SECTION 13: DISPOSAL CONSIDERATIONS**

**13.1 Waste treatment methods**

Comply with the provisions of the Waste Act and the Act on packaging and packaging waste.

Classification of waste in accordance with the Decree on the catalog of waste (OJ no. 112, item 1206, 2001 - Polish Law).

**Waste Code:**

07 06: Wastes from the manufacture, formulation, supply and use of fats, grease, soaps, detergents, disinfectants and cosmetics.

**07 06 99:** wastes not otherwise specified.

Dispose according to local regulations.

**SECTION 14: TRANSPORT INFORMATION**

**Transport by road (ADR/RID)**

**14.1 UN number:** not applicable.

**14.2 UN proper shipping name:** not applicable.

**14.3 Transport hazard class(es):** not applicable.

**14.4 Packing group:** not applicable.

**14.5 Environmental hazards:** not applicable.

**14.6 Special precautions for users:** not applicable.

**14.7 Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code:** not applicable.

**SECTION 15: REGULATORY INFORMATION**

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

- Regulation (EC) No **1272/2008** of 16 December 2008. on classification, labeling and packaging of substances and mixtures, amending and repealing Directives 67/548/EEC and 1999/45/EC, and amending Regulation (EC) No 1907/2006 (OJ EU No L 353 of 31 December 2008 ) (CLP).

- Regulation (EC) No **648/2004** of 31 March 2004 on detergents, Acts. EU Laws, 104/1, 04.08.2004.

- Regulation (EC) No **907/2006** of 20 June 2006 amending Regulation EC No 648/2004 on detergents, in order to adapt Annexes III and VII, Coll. Journal EU L No 168 of 21 June 2006

- Regulation (EC) **1907/2006** of 18 December 2006 on the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH), establishing European Chemicals Agency, amending Directive 1999/45/EC and repealing Regulation (EEC) No 793/93 and Regulation (EC) No 1488/94 as well as Directive 76/769/EEC and Directives 91/155/EEC, 93/67/EEC, 93/105/EC and 2000/21/EC (OJ EU L 396 of 30 December 2006, as amended).

- COMMISSION REGULATION (EU) **2015/830** of 28 May 2015 amending Regulation (EC) No 1907/2006 of the European Parliament and of the Council on the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH) (OJ EU L 132 of 29 May 2015)

**Polish legislation:**

- The Act of 25 February 2011. on chemical substances and their mixtures (Journal of Laws (PL) No. 63 of 25 February 2011).

**15.2 Chemical Safety Assessment**

Has not been made.

**SECTION 16: OTHER INFORMATION**

**H-phrases (indicating type of hazard) and hazard class used in Sections 2 and 3 of Safety Data Sheet:**

- does not occur

**The necessary training.**

All persons involved in the sale and use of the product should be trained in hygiene and safe handling and use of chemical mixtures.

The information contained in this data sheet are based on literature data and Internet, raw material safety data sheets and safety data sheets of similar products. The manufacturer is not liable for any damage, loss, damage resulting from misuse of the product or omissions appropriate action.

The above information is based on current state of art and apply to product as it is used. Data concerning this product are presented in order to take into account the security requirements and not to guarantee its special properties.

This product is intended for professional use, detailed information on the use of the product is preset on the label and leaflet. Read label before use.

**List of abbreviations used in this document:**

**ADR** – European Agreement concerning the international carriage of dangerous goods by road.

**AOX** – Absorbable organic halogen compounds.

**BCF** – Bio concentration factor.

**CAS** – Chemical Abstract Service.

**CLP** – Classification Labelling Packaging - simplified reference to EC Regulation 1272/2008.

**ECHA** – European Chemical Agency

**EN** – European Norms.

**OECD** – Organization for Economic Co-operation and Development.

**PBT** – Persistent, bio accumulative and toxic.

**REACH** - Registration, Evaluation, Authorization and Restriction of Chemicals - simplified reference to EC Regulation 1907/2006.

**vPvB** – Substance very persistent and very bio accumulative.

**Changes compared to the previous version:**