

## SAFETY DATA SHEET

### Material Safety Data Sheet

*Safety Data Sheet according to regulation No 1907/2006/EU, as it has been adjusted and is currently in vigor.*

## 1 – Identification of the substance/mixture and of the company/undertaking

### 1.1 Product identifier

**Product name:** Dynamic

**Catalogue No.:** PR.026

### 1.2 Relevant identified uses of the substance or mixture and non-indicated uses

**Identified uses:** Fertilizer for foliar use and fertigation

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

**Company Identity:** DEMIRTZOGLOU & ASSOCIATES SA

**Address:** 1 Ermou & Theotokopoulou str.,

ZIP. 144 52, Metamorphosis

**Telephone:** +30 210 284 5891

**email :** info@humofert.gr

### 1.4 Emergency call number:

Poison Center num: +30 210 7793777

## 2 – Hazards identification

### 2.1 Classification of the substance or mixture

According to Regulation (EC) No 1272/2008 (CLP):

**Acute toxicity (oral) (Category 4), H302**

**Serious eye damage (Category 1), H318**

**Reproductive toxicant (Category 1B), H360FD**

### 2.2 Labeling

According to Regulation (EC) No 1272/2008 (CLP):

#### Label elements



Pictogram:

**GHS08**

**GHS05**

**GHS07**

Signal word(s): **DANGER**

Hazard statement(s):

H302: Harmful if swallowed.

H360FD: May damage fertility. May damage the unborn child.

H318: Causes serious eye damage.

Precautionary statement(s) - Prevention:

P264: Wash ... thoroughly after handling.

P270: Do not eat, drink or smoke when using this product.

P280: Wear protective gloves/protective clothing/eye protection/face protection.

P201: Obtain special instructions before use.

P202: Do not handle until all safety precautions have been read and understood.

P281: Use personal protective equipment as required.

Precautionary statement(s) – Response:

P305 + P351 + P338: IF IN EYES: Rinse cautiously with water for several minutes.

Remove contact lenses, if present and easy to do. Continue rinsing.

P308+P313: IF exposed or concerned: Get medical advice/attention.

P310: Immediately call a POISON CENTER or doctor/physician.

P301+P312: IF SWALLOWED: Call a POISON CENTER or doctor/physician if you feel unwell.

P330: Rinse mouth.

Precautionary statement(s) – Storage:

P405: Store locked up

Precautionary statement(s) – Disposal:

P501: Dispose of contents/container to ... in accordance with local/regional/national/international regulation (to be specified).

#### **Other information:**

«For professional use only»

«Contains: **Nitric acid, calcium ammonium double salt, hydrated form, Disodium Octaborate Tetrahydrate** ».

#### **2.3 Other hazards**

*According to Regulation (EC) No 1272/2008 (CLP):*

**Not known.**

### **3 - Composition / Information on ingredients**

#### **3.1 Substance**

Not applicable

#### **3.2 Mixture**

### **4 – First aid measures**

#### **4.1 First aid**

**Inhalation:** Remove the victim to fresh air and let him rest in a position comfortable for breathing. If symptoms persist, seek medical advice.

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**Swallowing:** Drink a lot of water. Do not induce vomiting. If symptoms persist, seek medical advice. Immediately call a POISON CENTER or doctor/physician.

**Skin contact:** Wash with soap and plenty of water. Remove immediately all contaminated clothing. Seek medical advice if necessary.

**Eye contact:** Rinse with water for about 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If symptoms persist, seek medical advice.

#### **4.2 Most significant symptoms and impacts, acute or subsequent**

**Symptoms:** Not known.

#### **4.3 Indication of any required immediate medical treatment and special cure**

Treat symptomatically. No specific antidote is known.

### **5 – Fire fighting measures**

#### **5.1 Extinguishing means**

**Suitable extinguishing means:** Water (spray), dry powder, foam

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

In case of fire, harmful gases may be produced, such as nitrogen oxides.

#### **5.3 Recommendations to the firemen**

In case of fire put on a suitable fire-extinguishing-protective equipment a self-contained breathing apparatus.

**Additional information:** This product is not combustible. During fire extinction take into consideration the local circumstances and the surrounding environment. Contaminated fire-extinguishing water must be discarded according to the official regulations.

### **6 – Accidental release measures**

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

**Personal precautions:** It is recommended to use protective gloves (protection according to EN374). Use work uniform. Avoid contact with eyes, skin and mouth.

#### **6.2 Environmental Precautions**

Restrain spreading of contaminated water/fire-extinction water. Do not allow it to enter the sewage system and contaminate superficial and underground waters.

#### **6.3 Methods and materials for restriction and cleaning**

**Methods for cleaning up:** In case of leakage absorb with a suitable, inactive absorbent material. Sweep. Transfer the waste in suitable (labeled) containers for obliteration. Clean well the whole area with plenty of water.

#### **6.4 Reference to other sections**

More information in sections: 7 for handling, 8 for personal protection and 13 for disposal.

### **7 – Handling and Storage**

### 7.1 Protections for safe handling

**Recommendation for safe handling:** Avoid contact with eyes and skin. Handle in accordance with good industrial hygiene and safety practice.

**Recommendation for fire prevention and explosion protection:** No special precautions are required for fire prevention.

### 7.2 Safe storage conditions, including possible non-compatibilities

**Storage and packaging requirements:** Store the product with its label on it, tightly closed. Store the product in a cool, dry and well-ventilated place. It must be stored separately from food. It is not a hazardous product if transferred according to the proper rules of transport (P405), (P403+P233).

**Storage recommendation:** the product should be stored separately from food.

**Other clues:** it is not a hazardous product if transferred according to the proper rules of transport.

## 8 – Exposure Control

### 8.1 Control parameters

#### **Components with occupational exposure limit values**

Not known occupational exposure limit values. The general limit value for dust should be obeyed.

### 8.2 Exposure controls

#### **Individual protection measures:**

**Eyes/face protection:** Use appropriate protective glasses (EN166)

**Hands protection:** It is recommended to use appropriate protective gloves when using the product (The selected protective gloves must satisfy the specifications of EU Directive 89/689/EEC and the standard EN 374 deriving from it).

**Respiratory system protection:** Be sure to work in a well ventilated area. In case inhalable dust is formed, you should use a dust protective filter mask (EN 143 or 149, type P1 or FFP1)

**Personal hygiene measures:** Avoid contact with eyes, skin and clothing. The use of self-contained work uniform is recommended. It is not allowed to drink or smoke or use smoke in the working area. Work clothes should be stored away from foods and drinks. Handle in accordance with good industrial hygiene and safety practice.

**Environmental exposure controls:** Prevent the material from entering the sewage system.

## 9 – Physical and chemical properties

### 9.1 Basic physical and chemical properties information

<b>Form:</b>	Viscous Liquid
<b>Color:</b>	Light Yellow
<b>Odor:</b>	Almost odorless
<b>pH (10% solution, 25°C):</b>	6.0-7.0

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<b>Viscosity:</b>	Not mentioned
<b>Density (g/cm<sup>3</sup> 25°C):</b>	1.22
<b>Solubility(25°C):</b>	100% water soluble
<b>Boiling point :</b>	Not mentioned
<b>Melting point:</b>	>>
<b>Flammability temperature:</b>	Not flammable
<b>Flash point:</b>	>>
<b>Flammability:</b>	Not combustible
<b>Oxidizing properties:</b>	Not oxidizing
<b>Lower explosion limit:</b>	Not applicable
<b>Upper explosion limit :</b>	>>
<b>Vapor pressure:</b>	>>
<b>Relative vapor pressure:</b>	>>

## 9.2 Other information

### 10 – Stability and reactivity

Stable product under the recommended handling and storage conditions (section 7).

#### 10.1 Reactivity

Stable product

#### 10.2 Chemical Stability

Stable product under the recommended handling and storage conditions (section 7).

#### 10.3 Hazardous reactions possibility

Not known.

#### 10.4 Conditions to avoid

Not known.

#### 10.5 Not compatible materials

Strong reducing agents, inflammable materials, metals, strong acids

#### 10.6 Hazardous decomposition products

In case of fire, hazardous gases may be formed, such as nitrogen oxides.

### 11 – Toxicological information

#### 11.1 Information about toxicological effects

The product has not been tested. The information arises from the hazardous properties of the individual ingredients, considering cut-off values, generic or specific concentration limits, applying cumulative methods and using multiplying factors when required.

##### Acute toxicity

**Inhalation:** There is no information about the product.

**Swallowing:** >>

**Skin contact:** >>

**Eye contact:** >>

##### Irritating Effect

**Inhalation:** There is no information about the product.

**Swallowing:** >>

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**Skin contact:** >>

**Eye contact:** >>

### **Chronic toxicity**

**Carcinogenicity:** There is no information about the product.

**Mutagenicity:** >>

**Teratogenic potential:** >>

**Effects on growth:** >>

**Effects on fertility:** >>

### **Further information related to toxicity**

#### **Nitric acid, calcium ammonium double salt, hydrated form**

**LD<sub>50</sub> (skin) rat:** >2000mg/kg

**LD<sub>50</sub> (oral) rat:** >300-<2000 mg/kg

#### **Boron Disodium Octaborate Tetrahydrate**

**LD<sub>50</sub> (oral) rabbit:** 3143.6mg/kg

**LD<sub>50</sub> (oral) mouse:** 2877.2mg/kg

**LD<sub>50</sub> (skin) rabbit:** >2000 mg/kg

**LC<sub>50</sub> (5h) (inhalation) rabbit:** > 2030mg/ m<sup>3</sup>

**NOAEL for fertility (male rabbit):** 17.5mg Bw/Kg/day

## **12 – Ecological information**

### **12.1 Toxicity**

***Evaluation of the toxicity in aquatic environments:*** It is very likely that the product does not demonstrate acute toxic effect on aquatic organisms. These declarations derive from the hazardous properties of the single ingredients, as well as from their concentrations in the mixture.

***Toxicity on fish:*** The product has not been tested.

***Toxicity on daphnias and other aquatic invertebrates:*** The product has not been tested.

***Toxicity on aquatic plants:*** The product has not been tested.

***Microorganisms/ Effects on activated silt:*** No hampering of the degrading ability of the activated silt is expected when the product enters biological purification premises at adequately low concentrations. The product has not been tested.

***Long-term toxicity on fish:*** The product has not been tested.

***Long-term toxicity on aquatic invertebrates:*** The product has not been tested.

***Earth-toxicity estimation:*** The product has not been tested.

### **12.2 Persistence and degradability**

No information available.

It contains mineral ingredients which are not easily degradable.

### **12.3 Bioaccumulation potential**

The product has not been tested. No bioaccumulation is expected in organisms.

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

The product does not meet the criteria in order to be classified as PBTs (persistent, bioaccumulative and toxic) and vPvBs (very persistent and very bioaccumulative), since the single ingredients do not meet the criteria.

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### 12.5 Other negative effects

The product does not contain substances which are referred in the regulation (EU) 1005/2009 as relevant to the substances which destroy the ozone layer.

## 13 – Information regarding disposal

### 13.1 Waste handling methods

*Product:* Chemical waste material must be disposed according to the directive 2008/98/EC about wastes as well as to the relative national regulations.

*Packages with remaining product:* Packages must be disposed according to the special regulations of each country or must be returned to packages recycling entity (P501).

## 14 – Transport information

	14.1. UN Number	14.2. Familiar expediti on name accordin g UN	14.3. Danger order/orders during transportatio n	14.4. Packaging group	14.5. Environmental hazards
<b>Land transport ADR /RID</b>	It is not classified as dangerous under the transport regulations	-	-	-	-
<b>Sea transport ADN</b>	>>	-	-	-	-
<b>Sea transport IMDG</b>	>>	-	-	-	-
<b>Air transport IATA/ICAO</b>	>>	-	-	-	-

### 14.6 Special precautions for the user

Not known.

### 14.7 Transportation of bulk material according to Appendix II of MARPOL contract 73/78 and of code IBC.

Not applicable.

## 15 – Regulatory information

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This MSDS complies with the Regulation No 1907/2006/EU (REACH) & the Regulation (EU) No.1272/2008 [CLP].

**15.1 Regulations/ legislation concerning safety, health and environment about the substance or the mixture**

There is no information available.

**15.2 Chemical safety evaluation**

There has not been conducted a chemical safety evaluation by the supplier according to Regulation No 1907/2006/EU (REACH).

**16 – Other information**

The Safety data sheet should be used in combination with the technical documentation of the product. The Safety data sheet is prepared based on information collected up to the day that the Safety Data Sheet is written. It is a guide for the safe use, distribution, storage and transport of the product and it does not intend to provide any warning or detailed description. This information is relevant only for the product. If the product is combined with other material or in procedures other than the ones described this safety data sheet may not be applicable. The Safety data sheet meets the risk criteria of the Regulations of the Tested Products according to the directives of the European Union.