



# SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006

Version 8.5  
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GENERIC EU MSDS - NO COUNTRY SPECIFIC DATA - NO OEL DATA

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

### 1.1 Product identifiers

Product name : Human Fibroblast Growth Factor-21 (FGF-21)  
ELISA

Product Number : EZHFGF21  
Catalogue No. : 6D9837  
Brand : Millipore  
REACH No. :

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

Identified uses : Reagent for analysis

### 1.3

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### 1.4 Emergency telephone

Emergency Phone # : 000 800 1007 141 (CHEMTREC)

This is a summary SDS for a kit. For the full SDS for each of the components listed in section 16 please visit our website.

## SECTION 2: Hazards identification

### 2.1 Classification of the substance or mixture

|                                                  |                                                        |
|--------------------------------------------------|--------------------------------------------------------|
| Corrosive to Metals, (Category 1)                | H290: May be corrosive to metals.                      |
| Acute toxicity, (Category 4)                     | H302: Harmful if swallowed.                            |
| Acute toxicity, (Category 4)                     | H332: Harmful if inhaled.                              |
| Acute toxicity, (Category 3)                     | H311: Toxic in contact with skin.                      |
| Skin sensitization, (Category 1)                 | H317: May cause an allergic skin reaction.             |
| Long-term (chronic) aquatic hazard, (Category 2) | H411: Toxic to aquatic life with long lasting effects. |

## 2.2 Label elements

### Labelling according Regulation (EC) No 1272/2008

#### Pictogram

|                                |                                                                                                                             |
|--------------------------------|-----------------------------------------------------------------------------------------------------------------------------|
| Signal Word                    | Danger                                                                                                                      |
| Hazard Statements              |                                                                                                                             |
| H290                           | May be corrosive to metals.                                                                                                 |
| H302 + H332                    | Harmful if swallowed or if inhaled.                                                                                         |
| H311                           | Toxic in contact with skin.                                                                                                 |
| H317                           | May cause an allergic skin reaction.                                                                                        |
| H411                           | Toxic to aquatic life with long lasting effects.                                                                            |
| Precautionary Statements       |                                                                                                                             |
| P234                           | Keep only in original packaging.                                                                                            |
| P273                           | Avoid release to the environment.                                                                                           |
| P280                           | Wear protective gloves/ protective clothing.                                                                                |
| P301 + P312                    | IF SWALLOWED: Call a POISON CENTER/ doctor if you feel unwell.                                                              |
| P302 + P352 + P312             | IF ON SKIN: Wash with plenty of water.Call a POISON CENTER/ doctor if you feel unwell.                                      |
| P304 + P340 + P312             | IF INHALED: Remove person to fresh air and keep comfortable for breathing. Call a POISON CENTER/ doctor if you feel unwell. |
| Supplemental Hazard Statements | none                                                                                                                        |

### Reduced Labeling (<= 125 ml)

#### Pictogram

|                                |                                                                                        |
|--------------------------------|----------------------------------------------------------------------------------------|
| Signal Word                    | Danger                                                                                 |
| Hazard Statements              |                                                                                        |
| H311                           | Toxic in contact with skin.                                                            |
| H317                           | May cause an allergic skin reaction.                                                   |
| Precautionary Statements       |                                                                                        |
| P280                           | Wear protective gloves/ protective clothing.                                           |
| P302 + P352 + P312             | IF ON SKIN: Wash with plenty of water.Call a POISON CENTER/ doctor if you feel unwell. |
| Supplemental Hazard Statements | none                                                                                   |

## 2.3 Other hazards - none

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## SECTION 3: Composition/information on ingredients

Refer to component SDS

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## SECTION 4: First aid measures

Refer to component SDS

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## **SECTION 5: Firefighting measures**

Refer to component SDS

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## **SECTION 6: Accidental release measures**

Refer to component SDS

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## **SECTION 7: Handling and storage**

### **7.1 Precautions for safe handling**

#### **Advice on safe handling**

Work under hood. Do not inhale substance/mixture. Avoid generation of vapours/aerosols.

#### **Hygiene measures**

Immediately change contaminated clothing. Apply preventive skin protection. Wash hands and face after working with substance.

For precautions see section 2.2.

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

#### **Storage conditions**

No metal containers.

Tightly closed. Keep in a well-ventilated place. Keep locked up or in an area accessible only to qualified or authorized persons.

Recommended storage temperature see product label.

#### **Storage class**

Storage class (TRGS 510): 6.1C: Combustible, acute toxic Cat.3 / toxic compounds or compounds which causing chronic effects

### **7.3 Specific end use(s)**

Apart from the uses mentioned in section 1.2 no other specific uses are stipulated

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## **SECTION 8: Exposure controls/personal protection**

Refer to component SDS

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## **SECTION 9: Physical and chemical properties**

Refer to component SDS

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## **SECTION 10: Stability and reactivity**

Refer to component SDS

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## **SECTION 11: Toxicological information**

Refer to component SDS

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## SECTION 12: Ecological information

Refer to component SDS

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## SECTION 13: Disposal considerations

Refer to component SDS

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## SECTION 14: Transport information

### 14.1 UN number

ADR/RID: 3316

IMDG: 3316

IATA: 3316

### 14.2 UN proper shipping name

ADR/RID: CHEMICAL KIT

IMDG: CHEMICAL KIT

IATA: Chemical kit

### 14.3 Transport hazard class(es)

ADR/RID: 9

IMDG: 9

IATA: 9

### 14.4 Packaging group

ADR/RID: III

IMDG: III

IATA: III

### 14.5 Environmental hazards

ADR/RID: no

IMDG Marine pollutant: no

IATA: no

### 14.6 Special precautions for user

Tunnel restriction code : (E)

Further information : No data available

### 14.7 Maritime transport in bulk according to IMO instruments

Not applicable for product as supplied.

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## SECTION 15: Regulatory information

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

This material safety data sheet complies with the requirements of Regulation (EC) No. 1907/2006.

Refer to component SDS

### 15.2 Chemical Safety Assessment

For this product a chemical safety assessment was not carried out

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## SECTION 16: Other information

### Kit Components:

Human FGF-21 Detection Sigma-Aldrich E1019

|                                                                       |               |          |                                                                              |
|-----------------------------------------------------------------------|---------------|----------|------------------------------------------------------------------------------|
| Antibody (ELISA) 3ml.<br>Human FGF-21 Quality<br>Controls 1,2 (0.5ml) | Sigma-Aldrich | E6019-K  | Acute Tox. 4; Acute Tox. 3;<br>Aquatic Chronic 2; H302 +<br>H332, H311, H411 |
| Human FGF-21 Standard<br>(0.5 ml)                                     | Millipore     | E8019-K  | Acute Tox. 4; Acute Tox. 3;<br>Aquatic Chronic 2; H302 +<br>H332, H311, H411 |
| Assay Buffer (12ml)                                                   | Millipore     | EABPI    |                                                                              |
| Enzyme Solution (12 ml)                                               | Millipore     | EHRP-4   | Skin Sens. 1; H317                                                           |
| Matrix Solution (0.5 ml)                                              | Millipore     | EMTX-PS5 |                                                                              |
| ELISA                                                                 |               |          |                                                                              |
| Human FGF-21 ELISA                                                    | Millipore     | EP19     |                                                                              |
| Microtiter Plate                                                      |               |          |                                                                              |
| Substrate (TMB) (12 ml)                                               | Millipore     | ESS-TMB2 |                                                                              |
| Stop Solution (12 ml)                                                 | Millipore     | ET-TMB-M | Met. Corr. 1; H290                                                           |
| 10X HRP Wash Buffer                                                   | Millipore     | EWB-HRP  | Skin Sens. 1; H317                                                           |

### Full text of other abbreviations

ADN - European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways; ADR - Agreement concerning the International Carriage of Dangerous Goods by Road; AIIC - Australian Inventory of Industrial Chemicals; ASTM - American Society for the Testing of Materials; bw - Body weight; CMR - Carcinogen, Mutagen or Reproductive Toxicant; DIN - Standard of the German Institute for Standardisation; DSL - Domestic Substances List (Canada); ECx - Concentration associated with x% response; ELx - Loading rate associated with x% response; EmS - Emergency Schedule; ENCS - Existing and New Chemical Substances (Japan); ErCx - Concentration associated with x% growth rate response; GHS - Globally Harmonized System; GLP - Good Laboratory Practice; IARC - International Agency for Research on Cancer; IATA - International Air Transport Association; IBC - International Code for the Construction and Equipment of Ships carrying Dangerous Chemicals in Bulk; IC50 - Half maximal inhibitory concentration; ICAO - International Civil Aviation Organization; IECSC - Inventory of Existing Chemical Substances in China; IMDG - International Maritime Dangerous Goods; IMO - International Maritime Organization; ISHL - Industrial Safety and Health Law (Japan); ISO - International Organisation for Standardization; KECI - Korea Existing Chemicals Inventory; LC50 - Lethal Concentration to 50 % of a test population; LD50 - Lethal Dose to 50% of a test population (Median Lethal Dose); MARPOL - International Convention for the Prevention of Pollution from Ships; n.o.s. - Not Otherwise Specified; NO(A)EC - No Observed (Adverse) Effect Concentration; NO(A)EL - No Observed (Adverse) Effect Level; NOELR - No Observable Effect Loading Rate; NZIoC - New Zealand Inventory of Chemicals; OECD - Organization for Economic Co-operation and Development; OPPTS - Office of Chemical Safety and Pollution Prevention; PBT - Persistent, Bioaccumulative and Toxic substance; PICCS - Philippines Inventory of Chemicals and Chemical Substances; (Q)SAR - (Quantitative) Structure Activity Relationship; REACH - Regulation (EC) No 1907/2006 of the European Parliament and of the Council concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals; RID - Regulations concerning the International Carriage of Dangerous Goods by Rail; SADT - Self-Accelerating Decomposition Temperature; SDS - Safety Data Sheet; TCSI - Taiwan Chemical Substance Inventory; TECI - Thailand Existing Chemicals Inventory; TSCA - Toxic Substances Control Act (United States); UN - United Nations; UNRTDG - United Nations Recommendations on the Transport of Dangerous Goods; vPvB - Very Persistent and Very Bioaccumulative

### Classification of the mixture

|             |      |
|-------------|------|
| Met. Corr.1 | H290 |
| Acute Tox.4 | H302 |

### Classification procedure:

|                    |
|--------------------|
| Calculation method |
| Calculation method |

|                  |      |                    |
|------------------|------|--------------------|
| Acute Tox.4      | H332 | Calculation method |
| Acute Tox.3      | H311 | Calculation method |
| Skin Sens.1      | H317 | Calculation method |
| Aquatic Chronic2 | H411 | Calculation method |

#### **Further information**

The information is believed to be correct but is not exhaustive and will be used solely as a guideline, which is based on current knowledge of the chemical substance or mixture and is applicable to appropriate safety precautions for the product. It does not represent any guarantee of the properties of the product. Sigma-Aldrich Corporation and its Affiliates shall not be held liable for any damage resulting from handling or from contact with the above product. See [www.sigma-aldrich.com](http://www.sigma-aldrich.com) and/or the reverse side of invoice or packing slip for additional terms and conditions of sale.

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## Kit Components:

| Human FGF-21 Detection Antibody (ELISA) 3ml. |           |             |                   |                          |                                                                                 |
|----------------------------------------------|-----------|-------------|-------------------|--------------------------|---------------------------------------------------------------------------------|
| Product identifier                           | Pictogram | Signal Word | Hazard Statements | Precautionary Statements | Supplemental information                                                        |
| Sigma-Aldrich<br>- E1019                     |           |             |                   |                          | Not a hazardous substance or mixture according to Regulation (EC) No 1272/2008. |

| Human FGF-21 Quality Controls 1,2 (0.5ml) |           |             |                                                                                                                        |                                                                                                                                                                                                                                                                                                                                                                                                                            |                          |
|-------------------------------------------|-----------|-------------|------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------|
| Product identifier                        | Pictogram | Signal Word | Hazard Statements                                                                                                      | Precautionary Statements                                                                                                                                                                                                                                                                                                                                                                                                   | Supplemental information |
| Sigma-Aldrich<br>- E6019-K                |           | Danger      | Harmful if swallowed or if inhaled.<br>Toxic in contact with skin.<br>Toxic to aquatic life with long lasting effects. | Avoid breathing dust/ fume/ gas/ mist/ vapors/ spray.<br>IF SWALLOWED: Call a POISON CENTER/ doctor if you feel unwell. Avoid release to the environment. IF ON SKIN: Wash with plenty of water. Call a POISON CENTER/ doctor if you feel unwell. Wear protective gloves/ protective clothing. IF INHALED: Remove person to fresh air and keep comfortable for breathing. Call a POISON CENTER/ doctor if you feel unwell. |                          |

| <b>Human FGF-21 Standard (0.5 ml)</b> |           |             |                                                                                                                        |                                                                                                                                                                                                                                                                                                                                                                                                                            |                          |
|---------------------------------------|-----------|-------------|------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------|
| Product identifier                    | Pictogram | Signal Word | Hazard Statements                                                                                                      | Precautionary Statements                                                                                                                                                                                                                                                                                                                                                                                                   | Supplemental information |
| Millipore - E8019-K                   |           | Danger      | Harmful if swallowed or if inhaled.<br>Toxic in contact with skin.<br>Toxic to aquatic life with long lasting effects. | Avoid breathing dust/ fume/ gas/ mist/ vapors/ spray.<br>IF SWALLOWED: Call a POISON CENTER/ doctor if you feel unwell. Avoid release to the environment. IF ON SKIN: Wash with plenty of water. Call a POISON CENTER/ doctor if you feel unwell. Wear protective gloves/ protective clothing. IF INHALED: Remove person to fresh air and keep comfortable for breathing. Call a POISON CENTER/ doctor if you feel unwell. |                          |

| <b>Assay Buffer (12ml)</b> |           |             |                   |                          |                                                                                 |
|----------------------------|-----------|-------------|-------------------|--------------------------|---------------------------------------------------------------------------------|
| Product identifier         | Pictogram | Signal Word | Hazard Statements | Precautionary Statements | Supplemental information                                                        |
| Millipore - EABPI          |           |             |                   |                          | Not a hazardous substance or mixture according to Regulation (EC) No 1272/2008. |

| <b>Enzyme Solution (12 ml)</b> |           |             |                                      |                                                                                     |                          |
|--------------------------------|-----------|-------------|--------------------------------------|-------------------------------------------------------------------------------------|--------------------------|
| Product identifier             | Pictogram | Signal Word | Hazard Statements                    | Precautionary Statements                                                            | Supplemental information |
| Millipore - EHRP-4             |           | Warning     | May cause an allergic skin reaction. | Avoid breathing mist or vapors. IF ON SKIN: Wash with plenty of water. Contaminated |                          |

|  |  |  |  |                                                                                                                                                                                                              |  |
|--|--|--|--|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|
|  |  |  |  | work clothing should not be allowed out of the workplace. If skin irritation or rash occurs: Get medical advice/ attention. Wear protective gloves. Take off contaminated clothing and wash it before reuse. |  |
|--|--|--|--|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|

#### **Matrix Solution (0.5 ml) ELISA**

| Product identifier   | Pictogram | Signal Word | Hazard Statements | Precautionary Statements | Supplemental information                                                        |
|----------------------|-----------|-------------|-------------------|--------------------------|---------------------------------------------------------------------------------|
| Millipore - EMTX-PS5 |           |             |                   |                          | Not a hazardous substance or mixture according to Regulation (EC) No 1272/2008. |

#### **Human FGF-21 ELISA Microtiter Plate**

| Product identifier | Pictogram | Signal Word | Hazard Statements | Precautionary Statements | Supplemental information                                                        |
|--------------------|-----------|-------------|-------------------|--------------------------|---------------------------------------------------------------------------------|
| Millipore - EP19   |           |             |                   |                          | Not a hazardous substance or mixture according to Regulation (EC) No 1272/2008. |

#### **Substrate (TMB) (12 ml)**

| Product identifier   | Pictogram | Signal Word | Hazard Statements | Precautionary Statements | Supplemental information                                                                             |
|----------------------|-----------|-------------|-------------------|--------------------------|------------------------------------------------------------------------------------------------------|
| Millipore - ESS-TMB2 |           |             |                   |                          | No hazard pictogram, no signal word, no hazard statement(s), no precautionary statement(s) required. |

#### **Stop Solution (12 ml)**

| Product identifier   | Pictogram | Signal Word | Hazard Statements           | Precautionary Statements                         | Supplemental information |
|----------------------|-----------|-------------|-----------------------------|--------------------------------------------------|--------------------------|
| Millipore - ET-TMB-M |           | Warning     | May be corrosive to metals. | Keep only in original packaging. Absorb spillage |                          |

|  |  |  |  |                             |  |
|--|--|--|--|-----------------------------|--|
|  |  |  |  | to prevent material damage. |  |
|--|--|--|--|-----------------------------|--|

# **10X HRP Wash Buffer**

| Product identifier  | Pictogram | Signal Word | Hazard Statements                    | Precautionary Statements                                                                                                                                                                                                                                                                                              | Supplemental information |
|---------------------|-----------|-------------|--------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------|
| Millipore - EWB-HRP |           | Warning     | May cause an allergic skin reaction. | Avoid breathing mist or vapors.<br>IF ON SKIN:<br>Wash with plenty of water.<br>Contaminated work clothing should not be allowed out of the workplace.<br>If skin irritation or rash occurs:<br>Get medical advice/<br>attention.<br>Wear protective gloves. Take off contaminated clothing and wash it before reuse. |                          |