

Safety Data Sheet acc. to OSHA HCS

Printing date 10/02/2019

Reviewed on 10/02/2019

1 Identification

- **Product identifier**
- **Trade name:** Atherogenic Diet For Mice Semipurified, Modified
- **Article number:** 960404
- **Application of the substance / the mixture** For Research Use Only
- **Details of the supplier of the safety data sheet**
- **Manufacturer/Supplier:**
MP Biomedicals, LLC
29525 Fountain Parkway
Solon, OH 44139
United States
www.mpbio.com
- **Information department:** Quality Control Department
- **Emergency telephone number:** CHEMTREC: 1-800-424-9300 (1-703-527-3887)

2 Hazard(s) identification

- **Classification of the substance or mixture**
The product is not classified, according to the Globally Harmonized System (GHS).

- **Label elements**
- **GHS label elements** Void
- **Hazard pictograms** Void
- **Signal word** Void
- **Hazard statements** Void
- **Classification system:**
- **NFPA ratings (scale 0 - 4)**



- **HMIS-ratings (scale 0 - 4)**



- **Other hazards**
- **Results of PBT and vPvB assessment**
- **PBT:** Not applicable.
- **vPvB:** Not applicable.

3 Composition/information on ingredients

- **Chemical characterization:** Mixtures
- **Description:**
Mixture of substances listed below with nonhazardous additions.
Mixture: consisting of the following components.

(Contd. on page 2)

Safety Data Sheet

acc. to OSHA HCS

Printing date 10/02/2019

Reviewed on 10/02/2019

Trade name: Atherogenic Diet For Mice Semipurified, Modified

(Contd. of page 1)

· Dangerous components:

CAS: 57-50-1 EINECS: 200-334-9 RTECS: WN6500000	Sucrose	2.5-10%
CAS: 9004-34-6 EINECS: 232-674-9 RTECS: FJ5691460	Microcrystalline Cellulose Powder	1-2.5%

4 First-aid measures

- **Description of first aid measures**
- **General information:** No special measures required.
- **After inhalation:** Supply fresh air; consult doctor in case of complaints.
- **After skin contact:** Generally the product does not irritate the skin.
- **After eye contact:** Flush eyes with running water as a precaution.
- **After swallowing:** If symptoms persist consult doctor.
- **Information for doctor**
- **Most important symptoms and effects, both acute and delayed** No further relevant information available.
- **Indication of any immediate medical attention and special treatment needed**
No further relevant information available.

5 Fire-fighting measures

- **Extinguishing media**
- **Suitable extinguishing agents:** Use fire fighting measures that suit the environment.
- **Special hazards arising from the substance or mixture** No further relevant information available.
- **Advice for firefighters**
- **Protective equipment:** No special measures required.

6 Accidental release measures

- **Personal precautions, protective equipment and emergency procedures**
Use personal protective equipment. Avoid dust formation. Avoid breathing vapours, mist or gas. Ensure adequate ventilation. Evacuate personnel to safe areas. Avoid breathing dust.
For personal protection see section 8.
- **Environmental precautions:** Do not allow to enter sewers/ surface or ground water.
- **Methods and material for containment and cleaning up:** Pick up mechanically.
- **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 disposal information.
- **Protective Action Criteria for Chemicals**

· PAC-1:		
6100-05-6	Potassium citrate monohydrate	30 mg/m ³
7778-80-5	potassium sulphate	20 mg/m ³
1309-48-4	magnesium oxide	30 mg/m ³
598-62-9	Manganese Carbonate	6.3 mg/m ³
3486-35-9	Zinc Carbonate	12 mg/m ³

(Contd. on page 3)

US

Safety Data Sheet

acc. to OSHA HCS

Printing date 10/02/2019

Reviewed on 10/02/2019

Trade name: Atherogenic Diet For Mice Semipurified, Modified

(Contd. of page 2)

7788-99-0	Chromium Potassium Sulfate Dodecahydrate	14 mg/m ³
12069-69-1	Cupric Carbonate	5.2 mg/m ³
10102-18-8	Sodium Selenite	1.3 mg/m ³
7758-05-6	potassium iodate	0.45 mg/m ³

· PAC-2:

6100-05-6	Potassium citrate monohydrate	330 mg/m ³
7778-80-5	potassium sulphate	220 mg/m ³
1309-48-4	magnesium oxide	120 mg/m ³
598-62-9	Manganese Carbonate	10 mg/m ³
3486-35-9	Zinc Carbonate	130 mg/m ³
7788-99-0	Chromium Potassium Sulfate Dodecahydrate	160 mg/m ³
12069-69-1	Cupric Carbonate	45 mg/m ³
10102-18-8	Sodium Selenite	2.3 mg/m ³
7758-05-6	potassium iodate	4.9 mg/m ³

· PAC-3:

6100-05-6	Potassium citrate monohydrate	2,000 mg/m ³
7778-80-5	potassium sulphate	1,300 mg/m ³
1309-48-4	magnesium oxide	730 mg/m ³
598-62-9	Manganese Carbonate	60 mg/m ³
3486-35-9	Zinc Carbonate	750 mg/m ³
7788-99-0	Chromium Potassium Sulfate Dodecahydrate	950 mg/m ³
12069-69-1	Cupric Carbonate	270 mg/m ³
10102-18-8	Sodium Selenite	3.1 mg/m ³
7758-05-6	potassium iodate	29 mg/m ³

7 Handling and storage

- **Handling:**
- **Precautions for safe handling** No special measures required.
- **Information about protection against explosions and fires:** No special requirements.
- **Conditions for safe storage, including any incompatibilities**
- **Storage:** 2-8°C
- **Requirements to be met by storerooms and receptacles:** No special requirements.
- **Specific end use(s)** No further relevant information available.

8 Exposure controls/personal protection

- **Additional information about design of technical systems:** No further data; see Section 7.
- **Control parameters**

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

57-50-1 Sucrose	
PEL	Long-term value: 15* 5** mg/m ³ *total dust **respirable fraction

(Contd. on page 4)

Safety Data Sheet

acc. to OSHA HCS

Printing date 10/02/2019

Reviewed on 10/02/2019

Trade name: Atherogenic Diet For Mice Semipurified, Modified

(Contd. of page 3)

REL	Long-term value: 10* 5** mg/m ³ *total dust **respirable fraction
TLV	Long-term value: 10 mg/m ³
9004-34-6 Microcrystalline Cellulose Powder	
PEL	Long-term value: 15* 5** mg/m ³ *total dust **respirable fraction
REL	Long-term value: 10* 5** mg/m ³ *total dust **respirable fraction
TLV	Long-term value: 10 mg/m ³

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

· **Exposure controls**

· **Personal protective equipment:**

· **General protective and hygienic measures:**

The usual precautionary measures for handling chemicals should be followed.

· **Breathing equipment:** Not required.

· **Protection of hands:**

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 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:** Not required.

9 Physical and chemical properties

· Information on basic physical and chemical properties	
· General Information	
· Appearance:	
Form:	Pellet
Color:	Dark
· Odor:	Indeterminate
· Odor threshold:	Not determined.
· pH-value:	Not applicable.
· Change in condition	
Boiling point/Boiling range:	Undetermined.
· Flash point:	Not applicable.
· Flammability (solid, gaseous):	Not determined.
· Decomposition temperature:	Not determined.
· Auto igniting:	Product is not selfigniting.
· Danger of explosion:	See section 10

(Contd. on page 5)

Safety Data Sheet

acc. to OSHA HCS

Printing date 10/02/2019

Reviewed on 10/02/2019

Trade name: Atherogenic Diet For Mice Semipurified, Modified

(Contd. of page 4)

· Explosion limits:	
Lower:	Not Applicable
Upper:	Not Applicable
· Vapor pressure:	Not applicable.
· Density:	Not Applicable
· Relative density	Not determined.
· Vapor density	Not applicable.
· Evaporation rate	Not applicable.
· Solubility in / Miscibility with	Not Determined
· Water:	Not determined. Insoluble.
· Partition coefficient (n-octanol/water):	Not determined.
· Viscosity:	
Dynamic:	Not applicable.
Kinematic:	Not applicable.
· Solvent content:	
VOC content:	0.00 %
Solids content:	100.0 %
· Other information	No further relevant information available.

10 Stability and reactivity

- **Reactivity** No further relevant information available.
- **Chemical stability**
- **Thermal decomposition / conditions to be avoided:** No decomposition if used according to specifications.
- **Possibility of hazardous reactions** No dangerous reactions known.
- **Conditions to avoid**
No further relevant information available.
Avoid contact with acids. Contact liberates a toxic gas.
- **Incompatible materials:** No further relevant information available.
- **Hazardous decomposition products:** No dangerous decomposition products known.

11 Toxicological information

- **Information on toxicological effects**
- **Acute toxicity:** Based on available data, the classification criteria are not met.
- **Primary irritant effect:**
- **on the skin:** No irritant effect.
- **on the eye:** Irritant and potentially harmful
- **Sensitization:** No sensitizing effects known.
- **Additional toxicological information:**
The product is not subject to classification according to internally approved calculation methods for preparations:
When used and handled according to specifications, the product does not have any harmful effects according to our experience and the information provided to us.

(Contd. on page 6)

US

Safety Data Sheet

acc. to OSHA HCS

Printing date 10/02/2019

Reviewed on 10/02/2019

Trade name: *Atherogenic Diet For Mice Semipurified, Modified*

(Contd. of page 5)

· **Carcinogenic categories**· **IARC (International Agency for Research on Cancer)**

57-88-5	Cholesterol	3
10102-18-8	Sodium Selenite	3
11032-49-8	Vitamin K2	3

· **NTP (National Toxicology Program)**

None of the ingredients is listed.

· **OSHA-Ca (Occupational Safety & Health Administration)**

None of the ingredients is listed.

12 Ecological information

· **Toxicity**· **Aquatic toxicity:** No further relevant information available.· **Persistence and degradability** No further relevant information available.· **Behavior in environmental systems:**· **Bioaccumulative potential** No further relevant information available.· **Mobility in soil** No further relevant information available.· **Additional ecological information:**· **General notes:**

Water hazard class 1 (Self-assessment): slightly hazardous for water

Do not allow undiluted product or large quantities of it to reach ground water, water course or sewage system.

· **Results of PBT and vPvB assessment**· **PBT:** Not applicable.· **vPvB:** Not applicable.· **Other adverse effects** No further relevant information available.

13 Disposal considerations

· **Waste treatment methods**· **Recommendation:**

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

· **Uncleaned packagings:**· **Recommendation:** Discard must be made according to official regulations.

14 Transport information

· **UN-Number**· **DOT, ADR, ADN, IMDG, IATA** Not regulated· **UN proper shipping name**· **DOT, ADR, ADN, IMDG, IATA** Not regulated· **Transport hazard class(es)**· **DOT, ADR, ADN, IMDG, IATA**· **Class** Not regulated

(Contd. on page 7)

Safety Data Sheet

acc. to OSHA HCS

Printing date 10/02/2019

Reviewed on 10/02/2019

Trade name: *Atherogenic Diet For Mice Semipurified, Modified*

(Contd. of page 6)

- | | |
|--|-----------------|
| · Packing group | |
| · DOT, ADR, IMDG, IATA | Not regulated |
| · Environmental hazards: | |
| · Marine pollutant: | No |
| · Special precautions for user | Not applicable. |
| · Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code | |
| | Not applicable. |
| · UN "Model Regulation": | Not regulated |

15 Regulatory information

- Safety, health and environmental regulations/legislation specific for the substance or mixture
- Sara

· **Section 355 (extremely hazardous substances):**

10102-18-8	Sodium Selenite
------------	-----------------

· **Section 313 (Specific toxic chemical listings):**

598-62-9	Manganese Carbonate
----------	---------------------

3486-35-9	Zinc Carbonate
-----------	----------------

12069-69-1	Cupric Carbonate
------------	------------------

10102-18-8	Sodium Selenite
------------	-----------------

· **TSCA (Toxic Substances Control Act):**

8002-31-1	Cocoa Butter	ACTIVE
-----------	--------------	--------

9000-71-9	Casein	ACTIVE
-----------	--------	--------

57-50-1	Sucrose	ACTIVE
---------	---------	--------

50-99-7	D-(+)-Dextrose, Anhydrous	ACTIVE
---------	---------------------------	--------

9004-53-9	Dextrin	ACTIVE
-----------	---------	--------

57-88-5	Cholesterol	ACTIVE
---------	-------------	--------

9004-34-6	Microcrystalline Cellulose Powder	ACTIVE
-----------	-----------------------------------	--------

7757-93-9	Calcium Phosphate Dibasic	ACTIVE
-----------	---------------------------	--------

361-09-1	Cholic Acid Sodium Salt	ACTIVE
----------	-------------------------	--------

67-48-1	choline chloride	ACTIVE
---------	------------------	--------

7647-14-5	Sodium Chloride	ACTIVE
-----------	-----------------	--------

7778-80-5	potassium sulphate	ACTIVE
-----------	--------------------	--------

1309-48-4	magnesium oxide	ACTIVE
-----------	-----------------	--------

7695-91-2	DL-alpha-Tocopherol Acetate	ACTIVE
-----------	-----------------------------	--------

598-62-9	Manganese Carbonate	ACTIVE
----------	---------------------	--------

59-67-6	nicotinic acid	ACTIVE
---------	----------------	--------

3486-35-9	Zinc Carbonate	ACTIVE
-----------	----------------	--------

137-08-6	D-Pantothenic Acid Calcium Salt	ACTIVE
----------	---------------------------------	--------

79-81-2	Retinyl palmitate	ACTIVE
---------	-------------------	--------

58-56-0	Pyridoxine Hydrochloride	ACTIVE
---------	--------------------------	--------

67-03-8	Thiamine Hydrochloride	ACTIVE
---------	------------------------	--------

(Contd. on page 8)

Safety Data Sheet

acc. to OSHA HCS

Printing date 10/02/2019

Reviewed on 10/02/2019

Trade name: Atherogenic Diet For Mice Semipurified, Modified

(Contd. of page 7)

83-88-5	riboflavin	ACTIVE
12069-69-1	Cupric Carbonate	ACTIVE
67-97-0	Vitamin D3	ACTIVE
59-30-3	Folic Acid	ACTIVE
58-85-5	D-Biotin	ACTIVE
10102-18-8	Sodium Selenite	ACTIVE
7758-05-6	potassium iodate	ACTIVE
68-19-9	Vitamin B12	ACTIVE

· **Hazardous Air Pollutants**

598-62-9	Manganese Carbonate
10102-18-8	Sodium Selenite

· **Proposition 65**

· **Chemicals known to cause cancer:**

None of the ingredients is listed.

· **Chemicals known to cause reproductive toxicity for females:**

None of the ingredients is listed.

· **Chemicals known to cause reproductive toxicity for males:**

None of the ingredients is listed.

· **Chemicals known to cause developmental toxicity:**

None of the ingredients is listed.

· **Carcinogenic categories**

· **EPA (Environmental Protection Agency)**

598-62-9	Manganese Carbonate	D
10102-18-8	Sodium Selenite	D

· **TLV (Threshold Limit Value established by ACGIH)**

57-50-1	Sucrose	A4
1309-48-4	magnesium oxide	A4

· **NIOSH-Ca (National Institute for Occupational Safety and Health)**

None of the ingredients is listed.

· **GHS label elements** Void

· **Hazard pictograms** Void

· **Signal word** Void

· **Hazard statements** Void

· **Chemical safety assessment:** A Chemical Safety Assessment has not been carried out.

16 Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

· **Department issuing SDS:** Quality Control Dept.

· **Date of preparation / last revision** 10/02/2019 / -

· **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

DOT: US Department of Transportation

(Contd. on page 9)

Safety Data Sheet
acc. to OSHA HCS

Printing date 10/02/2019

Reviewed on 10/02/2019

Trade name: Atherogenic Diet For Mice Semipurified, Modified

(Contd. of page 8)

IATA: International Air Transport Association
ACGIH: American Conference of Governmental Industrial Hygienists
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)
NFPA: National Fire Protection Association (USA)
HMIS: Hazardous Materials Identification System (USA)
VOC: Volatile Organic Compounds (USA, EU)
PBT: Persistent, Bioaccumulative and Toxic
vPvB: very Persistent and very Bioaccumulative
NIOSH: National Institute for Occupational Safety
OSHA: Occupational Safety & Health
TLV: Threshold Limit Value
PEL: Permissible Exposure Limit
REL: Recommended Exposure Limit

US