SECTION 1: Identification

1.1 Product identifier used on the label

Sugru (all colours)

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

Mouldable self-adhesive silicone.

Uses advised against: not available.

1.3 Details of the supplier of the safety data sheet

FormFormForm Ltd, Unit 2, 47-49 Tudor Road, London E9 7SN, UK
Tel: +44 (0) 20 7998 0022

1.4 Emergency phone number

+44 (0) 20 7998 0022 (UK business hours)
France: + 33 (0)1 45 42 59 99 numéro ORFILA (INRS).
Denmark: 82 12 12 12 (Giftlinjen, Bispebjerg Hospital).
Norway: 22 59 13 00 (Helsedirektoratet, Norweigen Directorate of Health).
Finland: (09) 4711 (Poison Information Centre, Hospital District of Helsinki and Uusimaa).
Sweden: 112 (Giftinformationscentralen; Swedish Poison Information Centre).
Spain: + 34 91 562 04 20 (only toxicological emergencies); Toxicological Information Service.
Portugal: 808 250 143 (Centro de Informação Antivenenos).

SECTION 2. Hazard(s) identification

2.1 Classification of the substance or mixture

Classification according to Regulation (EC) No. 1272/2008
This product does not meet the criteria for classification in any hazard class.

Classification according to Directive 1999/45/EC
This product does not meet the criteria for classification in any hazard class.

2.2 Label elements

Pictogram
None.

Signal word
None.

Hazard statements
None.

Precautionary statements
None.

Supplemental information
None.

2.3 Other hazards

25–50% of the mixture consists of ingredients of unknown acute toxicity. Contains 25–50% of components with unknown hazards to the aquatic environment.
Section 3. Composition/information on ingredients

3.1 Mixtures

<table>
<thead>
<tr>
<th>Declarable components</th>
<th>Conc (wt%)</th>
<th>EC No.</th>
<th>CAS No.</th>
<th>REG No.</th>
<th>Classification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Methyltris(methylthylketoxime) silane</td>
<td>1 to 5</td>
<td>245-366-4</td>
<td>22984-54-9</td>
<td>NA</td>
<td>67/548/EEC 1272/2008</td>
</tr>
<tr>
<td>3-Aminopropyltriethoxy-silane</td>
<td>0.01 to 1</td>
<td>213-048-4</td>
<td>919-30-2</td>
<td>NA</td>
<td>67/548/EEC 1272/2008</td>
</tr>
</tbody>
</table>

Other components

<table>
<thead>
<tr>
<th>Conc (wt%)</th>
<th>EC No.</th>
<th>CAS No.</th>
<th>REG No.</th>
<th>Classification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Talc</td>
<td>25-50</td>
<td>14807-96-6</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Additives</td>
<td>25-50</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

NA: not available.
See Section 16 "Other information" for full text of the R- and H-phrases

Section 4. First-aid measures

4.1 Description of first aid measures

Inhalation
If inhalation of the product is suspected, remove exposed person to fresh air, and give rest. If the patient continues to feel unwell, get prompt medical attention.

Skin
Remove contaminated clothing and wash affected area with soap and water. Get medical attention if irritation or other symptoms occur. Launder contaminated clothing before re-use.

Eye
In case of contact with eyes, irrigate with water for 15 minutes, occasionally lifting eyelids. Remove any contact lenses if easy to do. Get prompt medical advice if irritation occurs.

Ingestion
If swallowed, give water to drink. Get prompt medical attention if symptoms occur. Do not induce vomiting, unless instructed by medical personnel.

4.2 Most important symptoms/effects, acute and delayed
May cause sensitization by skin contact in some individuals.

4.3 Indication of immediate medical attention and special treatment needed
Treat symptoms as they occur.

Section 5. Fire-fighting measures

5.1 Extinguishing media

Suitable
General fire-extinguishing agents such as water, carbon dioxide, and dry chemicals.

Unsuitable
Not available.

5.2 Special hazards arising from the substance or mixture
The product is not flammable, but will decompose if involved in a fire, producing smoke, and toxic fumes and gases.

5.3 Advice for firefighters
Remove containers from fire or cool them with water spray. Firefighters should wear self-contained breathing apparatus and full protective clothing.
Section 7. Handling and storage

7.1 Precautions for safe handling
For industrial or commercial use, avoid contact with skin and eyes. Wear protective clothing as in Section 8. Good general ventilation is recommended.

7.2 Conditions for safe storage, including any incompatibilities
Keep containers in a cool, dry place away from direct sunlight. Store in sealed containers. Keep containers closed when not in use.

7.2 Specific end use(s)
Not available.

Section 8. Exposure controls/personal protection

8.1 Control parameters

<table>
<thead>
<tr>
<th>EU limit values</th>
<th>None.</th>
</tr>
</thead>
<tbody>
<tr>
<td>UK limit values</td>
<td>Talc, respirable dust: WEL: TWA 1 mg/m3. Barium sulphate: WEL: TWA 10 mg/m3 (inhaled fraction), 4 mg/m3 (respirable fraction). Silica, amorphous: WEL: 8 h TWA, 6 mg/m3 (inhaled), 2.4 mg/m3 (respirable).</td>
</tr>
<tr>
<td>Other limit values</td>
<td>Talc: Denmark TWA 0.3 mg/m3, STEL, 0.6 mg/m3 (respirable aerosol); The Netherlands TWA 0.25 mg/m3 (respirable aerosol); Finland TWA 0.5 fibres/cm3; Sweden TWA 2 mg/m3 (inhaled aerosol), 1 mg/m3 (respirable aerosol); Hungary 2 mg/m3 (respirable aerosol); Spain 2 mg/m3 (respirable aerosol). Barium sulphate: Germany TWA 4 mg/m3 (inhaled fraction), 1.5 mg/m3 (respirable fraction); Spain TWA 10 mg/m3 (inhaled fraction). Silica, amorphous: Germany TWA 4 mg/m3 (inhaled aerosol); Denmark TWA 2 mg/m3 (inhaled aerosol), STEL 4 mg/m3 (inhaled aerosol). 2-Butanone oxime: Germany TWA 1 mg/m3 (0.3 ppm), STEL 8 mg/m3 (2 ppm); Denmark TWA 25 ppm (provisional). (3-Aminopropyl)triethoxysilane: Finland TWA 28 mg/m3 (3 ppm), STEL 55 mg/m3 (6 ppm).</td>
</tr>
</tbody>
</table>

Monitoring procedure
BS EN 14042:2002; Workplace Atmospheres; Guide for the Application and Use of Procedures for the Assessment of Exposure to Chemical and Biological Agents, or specific national equivalent.

Other: human health (DNELs, DMELs)
Barium sulphate: workers, long-term exposure, systemic effects, inhalation, 10 mg/m3; workers, long-term exposure, local effects, inhalation, 10 mg/m3. General population, long-term exposure, systemic effects, inhalation, 10 mg/m3; general population, long-term exposure, systemic effects, oral, 13 000 mg/kg/day. Silicon dioxide: DNEL: worker, long-term exposure, systemic effects, inhalation, 4 mg/m3.

Other: environmental (PNEC)
Barium sulphate: PNECs: freshwater, 227.8 mg/L; intermittent release, 21 mg/L; sewage treatment plant, 50.1 mg/L; freshwater sediment, 792.7 mg/kg dry sediment; soil, 207.7 mg/kg dry soil.
8.2 Exposure controls

Engineering controls
For industrial and commercial use, good general ventilation is recommended.

Personal protective equipment
For industrial and commercial use, the need for personal protective equipment should be based on a workplace risk assessment for the particular use. Avoid skin and eye contact by wearing chemical resistant gloves (eg nitrile, neoprene, PVC) and safety goggles. Where more extensive contact may occur, wear suitable protective clothing (eg overalls). Wear respiratory protective equipment if exposure to dusts or vapours is possible during product processing. PPE should be to European (EN) standards. Consult manufacturers concerning breakthrough times. After work, wash hands before smoking, eating, or drinking.

Environmental exposure controls
Not available.

Section 9. Physical and chemical properties

9.1 Information on basic physical and chemical properties

<table>
<thead>
<tr>
<th>Property</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appearance</td>
<td>Highly coloured paste</td>
</tr>
<tr>
<td>Odour</td>
<td>Characteristic</td>
</tr>
<tr>
<td>Odour threshold</td>
<td>Not available</td>
</tr>
<tr>
<td>pH</td>
<td>Not available</td>
</tr>
<tr>
<td>Melting/freezing point</td>
<td>Not available</td>
</tr>
<tr>
<td>Initial boiling point/range</td>
<td>Not available</td>
</tr>
<tr>
<td>Flash point</td>
<td>Not available</td>
</tr>
<tr>
<td>Evaporation rate</td>
<td>Not available</td>
</tr>
<tr>
<td>Flammability (solid, gas)</td>
<td>Not applicable</td>
</tr>
<tr>
<td>Flamm. or expl. limits</td>
<td>Not available</td>
</tr>
<tr>
<td>Vapour pressure</td>
<td>Not available</td>
</tr>
<tr>
<td>Vapour density</td>
<td>Not available</td>
</tr>
<tr>
<td>Relative density</td>
<td>Not available</td>
</tr>
<tr>
<td>Solubilities</td>
<td>Insoluble in water</td>
</tr>
<tr>
<td>Partition coeff. (Kow)</td>
<td>Not available</td>
</tr>
<tr>
<td>Auto-ignition temp.</td>
<td>Not available</td>
</tr>
<tr>
<td>Decomposition temp.</td>
<td>Not available</td>
</tr>
<tr>
<td>Viscosity</td>
<td>Not available</td>
</tr>
<tr>
<td>Explosive properties</td>
<td>Not available</td>
</tr>
<tr>
<td>Oxidising properties</td>
<td>Not available</td>
</tr>
</tbody>
</table>

9.2 Other information
Not available

Section 10. Stability and reactivity

10.1 Reactivity
Not available

10.2 Chemical stability
Product is supplied in sealed containers. Opening the container and exposing the product to air will cause the product to self-react to form cured polymer. The polymerisation reaction is not hazardous.

10.3 Possibility of hazardous reactions
Not available

10.4 Conditions to avoid
Avoid prolonged storage at high temperature or exposure to sunlight.

10.5 Incompatible materials
Acids, bases, and oxidising agents.

10.6 Hazardous decomposition products
Not available

Section 11. Toxicological information

11.1 Information on toxicological effects

Acute toxicity
Based on available data, the classification criteria are not met.

Skin corrosion/irritation
Based on available data, the classification criteria are not met. Some ingredients present at low concentration have been identified with irritant properties.

Serious eye damage / irritation
Based on available data, the classification criteria are not met. Some ingredients present at low concentration have been identified with irritant properties.

Respiratory or skin sensitization
Based on available data, the classification criteria are not met. Some ingredients present at low concentration have been identified with irritant properties. May cause sensitization in some individuals.
Incineration or landfill are the recommended methods of disposal for the product, or the polymer it forms on reaction with air. Dispose of contaminated product, empty containers and materials used in cleaning up spills or leaks in accordance with current national and local regulations. Chemical residues generally count as special waste. General EU requirements are given in Directive 2008/98/EC.

**UK:** Workplace Exposure Limits EH40/2005, with 2007 supplement, Health and Safety Executive; Control of Substances Hazardous to Health Regulations 2002 (COSHH), as amended.

**Germany:** WGK (Wassergefährdungsklassen) Regulation: Verwaltungsvorschrift wassergefährdende Stoffe (VwVwS), designating water hazard classes. Product WGK, 1 (self-classification). Occupational exposure limits: List of MAK and BAT Values 2013, Commission for the Investigation of Health Hazards of Chemical Compounds in the Work Area, Report No. 49, Wiley-VCH.

**France:** Valeurs limites d’exposition professionnelle aux agents chimiques en France (professional exposure limit values to chemical agents in France); Institut National de Recherche et de Sécurité, Document ED 984.

**Denmark:** Limit Values for Substances and Materials; Grænseværdier for stoffer og materialer; C.0.1; Arbejdstilsynet; August 2007.

**The Netherlands:** Occupational exposure limits: Appendix XIII of the Working Conditions Regulations; Government Gazette (Staatscourant) of 28 December 2006, no. 252.

**Norway:** Occupational Exposure Limits: Veiledning om Administrative normer for forurensning i arbeidsetatmosfærer, 2010; Arbeidstilsynet; best. nr. 361.

**Finland:** Occupational exposure limit values: Sosiaali- ja terveysministeriön julkaisuja 2007/4, HTP-avot 2007.

**Sweden:** Occupational Exposure Limit Values and Measures Against Air Contaminants; AFS 2005:17; Statute Book of the Swedish Work Environment Authority.

**Germ cell mutagenicity**
Not classified due to lack of data

**Carcinogenicity**
Not classified due to lack of data

**Reproductive toxicity**
Not classified due to lack of data

**STOT-single exposure**
Not classified due to lack of data

**STOT-repeated exposure**
Not classified due to lack of data

**Aspiration hazard**
Not classified due to lack of data

### Section 12. Ecological information

12.1 **Toxicity**
Not available.

12.2 **Persistence and degradability**
In the environment, the product will react with moisture to form a polymer, which is expected to persist in the environment.

12.3 **Bioaccumulative potential**
Not available.

12.4 **Mobility in soil**
The polymer is insoluble in water and involatile, and will persist in the soil compartment.

12.5 **Results of PBT and vPvB assessment**
Not available.

12.6 **Other adverse effects**
Not available.

### Section 13. Disposal considerations

13.1 **Waste treatment methods**
Incorporation or landfill are the recommended methods of disposal for the product, or the polymer it forms on reaction with air. Dispose of contaminated product, empty containers and materials used in cleaning up spills or leaks in accordance with current national and local regulations. Chemical residues generally count as special waste. General EU requirements are given in Directive 2008/98/EC.

### Section 14. Transport information

14.1 **UN Number**
Not classified as dangerous goods for transport.

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 marine pollutant/environmentally hazardous.

14.6 **Special precautions for user**
Not available.

14.7 **Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code**
Not applicable.

### Section 15. Regulatory information

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

**UK:** Workplace Exposure Limits EH40/2005, with 2007 supplement, Health and Safety Executive; Control of Substances Hazardous to Health Regulations 2002 (COSHH), as amended.

**Germany:** WGK (Wassergefährdungsklassen) Regulation: Verwaltungsvorschrift wassergefährdende Stoffe (VwVwS), designating water hazard classes. Product WGK, 1 (self-classification). Occupational exposure limits: List of MAK and BAT Values 2013, Commission for the Investigation of Health Hazards of Chemical Compounds in the Work Area, Report No. 49, Wiley-VCH.

**France:** Valeurs limites d’exposition professionnelle aux agents chimiques en France (professional exposure limit values to chemical agents in France); Institut National de Recherche et de Sécurité, Document ED 984.

**Denmark:** Limit Values for Substances and Materials; Grænseværdier for stoffer og materialer; C.0.1; Arbejdstilsynet; August 2007.

**The Netherlands:** Occupational exposure limits: Appendix XIII of the Working Conditions Regulations; Government Gazette (Staatscourant) of 28 December 2006, no. 252.

**Norway:** Occupational Exposure Limits: Veiledning om Administrative normer for forurensning i arbeidsetatmosfærer, 2010; Arbeidstilsynet; best. nr. 361.

**Finland:** Occupational exposure limit values: Sosiaali- ja terveysministeriön julkaisuja 2007/4, HTP-avot 2007.

**Sweden:** Occupational Exposure Limit Values and Measures Against Air Contaminants; AFS 2005:17; Statute Book of the Swedish Work Environment Authority.
**Iceland:** Regulation 154/1999 on pollution levels and measures to reduce pollution in workplaces; Ministry of Social Affairs.

**Poland:** Harmful agents in the working environment – limit values; Central Institute for Labour Protection, National Research Institute.

**Hungary:** Exposure limits are listed in: A munkahelyek kémiai biztonságáról szóló 25/2000. (IX. 30.) EüM-SZCSM rendelet [Ordinance No. 25/2000, of 30 Sept., concerning the chemical safety of workplaces].

**Czech Republic:** Exposure limits are listed in: Hygienické limity latek v ovdováni praosobí a způsoby jejich měření a hodnocení.

**Italy:** Occupational exposure values: Decreto Ministeriale 26/02/04. Definizione di una prima lista di valori limite indicativi di esposizione professionale agli agenti chimici.

**Spain:** Limites de Exposición Profesional Para Agentes Químicos En España 2008; Instituto Nacional de Seguridad e Higiene en el Trabajo (INSHT).

**Portugal:** Decreto-Lei no. 305/2007 de 24-08-2007; Artigo 2.º - Valores limites de exposição profissional indicativos (Decree on occupational exposure limits).

### 15.2 Chemical safety assessment

Not available.

**Section 16: Other information**

**Revisions**

This SDS is the first version in EU format, using classification according to the CLP Regulation.

**Abbreviations**

DNEL, derived no-effect level; DMEL, derived minimum effect level; PBT, persistent, bioaccumulative, and toxic; PNEC, predicted no-effect concentration; TWA, time-weighted average; WEL, UK workplace exposure limit; vPvB, very persistent, very bioaccumulative.

**References**


GESTIS International Limit Values; Institut für Arbeitsschutz der Deutschen Gesetzlichen Unfallversicherung (IFA); http://www.dguv.de.

EU Indicative Occupational Exposure Limit Values (IOELVs); Directives 2000/39/EC, 2006/15/EC and 2009/161/EU.

**Basis of classification**

The mixture is self-classified on the basis of available information on the ingredients.

**List of R-phrases**

- R22, harmful if swallowed; R34, causes burns; R36, irritating to eyes; R43, may cause sensitisation by skin contact; R48, danger of serious damage to health by prolonged exposure.

**List of hazard statements**

- H302: Harmful if swallowed; H314: Causes severe skin burns and eye damage; H317: May cause an allergic skin reaction; H318: Causes serious eye irritation; H373: May cause damage to organs through prolonged or repeated exposure.