

SAFETY DATA SHEET

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

1.1. Product identifier

Product name. Lead Bisilicate Powdered Frit.

Product No. P2950

Chemical characterization:
Mix of ceramic frit and raw materials.

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

1.3. Details of the supplier of the safety data sheet

Supplier PotteryCrafts Ltd
Campbell Road,
Stoke on Trent
Staffordshire.
ST4 4ET
Tel 44 (0)1782 745000
sales@potteryCrafts.co.uk

1.4. Emergency telephone number

+44 (0)1782 745000 Office Hours)

SECTION 2: HAZARDS IDENTIFICATION

2.1. Classification of the substance or mixture

Classification (EC 1272/2008)	Physical and Chemical Hazards	Not classified.
	Human health	Not classified.
	Environment	Not classified.

Classification (1999/45/EEC) Not classified.

The Full Text for all R-Phrases and Hazard Statements are Displayed in Section 16.

Human health

May cause minor irritation on eye contact. Frequent inhalation of dust over a long period of time increases the risk of developing lung diseases. May cause minor irritation on skin contact.

Environment

The product is not expected to be hazardous to the environment.

Physical and Chemical Hazards

The product is not classified according to CLP regulation 1272/2008

2.2. Label elements

Label In Accordance With (EC) No. 1272/2008

No pictogram required.

2.3. Other hazards

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

3.2. Mixtures

China Clay/Kaolin	2.5-5%
CAS-No ; 1332-58-7	EC No ; 310-127-6
Classification (EC 1272/2008) Not classified	Classification (67/548/EEC) Not classified

The Full Text for all R-Phrases and Hazard Statements are Displayed in Section 16.

SECTION 4: FIRST AID MEASURES

4.1. Description of first aid measures

Inhalation

Move the exposed person to fresh air at once. Get medical attention if any discomfort continues.

Ingestion

Do not induce vomiting. Drink a few glasses of water or milk. Get medical attention if any discomfort continues.

Skin contact

Remove contaminated clothing. Wash skin thoroughly with soap and water.

Eye contact

Immediately flush with plenty of water or eyewash solution for up to 10 minutes. Get medical attention if any discomfort continues.

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

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

No specific first aid measures noted.

SECTION 5: FIREFIGHTING MEASURES

5.1. Extinguishing media

Extinguishing media

Use fire-extinguishing media appropriate for surrounding materials.

5.2. Special hazards arising from the substance or mixture

Unusual Fire & Explosion Hazards

No unusual fire or explosion hazards noted.

Specific hazards

Dust may form an explosive mixture in the atmosphere.

5.3. Advice for firefighters

Special Fire Fighting Procedures

Keep run-off water out of sewers and water sources. Dike for water control.

Protective equipment for fire-fighters

Use protective equipment appropriate for surrounding materials.

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1. Personal precautions, protective equipment and emergency procedures

Wear protective clothing as described in Section 8 of this safety data sheet.

6.2. Environmental precautions

Avoid spreading dust or contaminated materials.

6.3. Methods and material for containment and cleaning up

Remove spillage with vacuum cleaner. If not possible, collect spillage with shovel, broom or the like.

6.4. Reference to other sections

SECTION 7: HANDLING AND STORAGE

7.1. Precautions for safe handling

Do not eat, drink or smoke when using the product. Good personal hygiene is necessary. Wash hands and contaminated areas with water and soap before leaving the work site. Avoid handling which leads to dust formation.

7.2. Conditions for safe storage, including any incompatibilities

Keep away from food, drink and animal feeding stuffs. Store in tightly closed original container in a dry, cool and well-ventilated place.

7.3. Specific end use(s)

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1. Control parameters

Name	STD	TWA - 8 Hrs	STEL - 15 Min	Notes
Lead Bisilicate Dry Powder		4 mg/m3 resp.dust		

Ingredient Comments

Total Inhalable Dust 10mg/m³ - 8hr TWA Total respirable Dust 4mg/m³ - 8hr TWA

8.2. Exposure controls

Protective equipment



Engineering measures

Provide adequate ventilation, including appropriate local extraction, to ensure that the defined occupational exposure limit is not exceeded.

Respiratory equipment

No specific recommendation made, but protection against nuisance dust must be used when the general level exceeds 10 mg/m³.

Hand protection

For prolonged or repeated skin contact use suitable protective gloves.

Eye protection

Use tight fitting goggles if dust is generated.

Hygiene measures

Wash hands at the end of each work shift and before eating, smoking and using the toilet. When using do not eat, drink or smoke.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1. Information on basic physical and chemical properties

Appearance	Powder, dust
Colour	White.
Odour	Odourless.
Solubility	Insoluble in water
Initial boiling point and boiling range (°C)	>1000
Melting point (°C)	>500
Bulk Density	1500-3000 kg/m ³
Vapour density (air=1)	Not relevant
Evaporation rate	Not applicable.
pH-Value, Conc. Solution	Not determined. 6-8
Explosive properties	Not applicable.
Oxidising properties	Not applicable.

9.2. Other information

SECTION 10: STABILITY AND REACTIVITY

10.1. Reactivity

No specific reactivity hazards associated with this product.

10.2. Chemical stability

Stable under normal temperature conditions and recommended use.

10.3. Possibility of hazardous reactions

Hazardous Polymerisation

Not relevant

10.4. Conditions to avoid

Not known.

Campbell Road - Stoke on Trent, ST4 4ET - United Kingdom

Tel: +44 (0)1782 745000 - Fax: +44 (0)1782 746000 - Web: www.potterycrafts.co.uk ;

10.5. Incompatible materials

10.6. Hazardous decomposition products

Not known.

SECTION 11: TOXICOLOGICAL INFORMATION

11.1. Information on toxicological effects

Toxicological information

The product contains no toxic substances.

General information

No specific health warnings noted.

Eye contact

No specific health warnings noted.

SECTION 12: ECOLOGICAL INFORMATION

Ecotoxicity

The product contains a substance which is toxic to bees.

12.1. Toxicity

12.2. Persistence and degradability

Degradability

The product solely consists of inorganic compounds which are not biodegradable.

12.3. Bioaccumulative potential

Bioaccumulative potential

Bioaccumulation is unlikely to be significant because of the low water solubility of this product.

12.4. Mobility in soil

Mobility:

Not relevant, due to the form of the product.

12.5. Results of PBT and vPvB assessment

12.6. Other adverse effects

SECTION 13: DISPOSAL CONSIDERATIONS

General information

When handling waste, consideration should be made to the safety precautions applying to handling of the product.

13.1. Waste treatment methods

Dispose of waste and residues in accordance with local authority requirements.

SECTION 14: TRANSPORT INFORMATION

General

The product is not covered by international regulation on the transport of dangerous goods (IMDG, IATA, ADR/RID).

14.1. UN number

14.2. UN proper shipping name

14.3. Transport hazard class(es)

14.4. Packing group

14.5. Environmental hazards

14.6. Special precautions for user

14.7. Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code

SECTION 15: REGULATORY INFORMATION

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

Uk Regulatory References

Health and Safety at Work Act 1974.

Statutory Instruments

The Chemicals (Hazard Information and Packaging for Supply) Regulations 2009 (S.I 2009 No. 716).

Campbell Road - Stoke on Trent, ST4 4ET - United Kingdom

Tel: +44 (0)1782 745000 - Fax: +44 (0)1782 746000 - Web: www.potterycrafts.co.uk ;

Guidance Notes

Workplace Exposure Limits EH40. Introduction to Local Exhaust Ventilation HS(G)37.

EU Legislation

Dangerous Substance Directive 67/548/EEC. Dangerous Preparations Directive 1999/45/EC. Regulation (EC) No 1907/2006 of the European Parliament and of the Council of 18 December 2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH), establishing a European Chemicals Agency, amending Directive 1999/45/EC and repealing Council Regulation (EEC) No 793/93 and Commission Regulation (EC) No 1488/94 as well as Council Directive 76/769/EEC and Commission Directives 91/155/EEC, 93/67/EEC, 93/105/EC and 2000/21/EC, including amendments.

National Regulations

Workplace Exposure Limits 2005 (EH40)

15.2. Chemical Safety Assessment**SECTION 16: OTHER INFORMATION****General information**

(EN) Examples of ceramic frits belonging to various groups:

Group 1 - frits usually containing elements not included in Annex I of Directive 67/548/EEC and without Pb, Ba, Zn and Cd.

Group 2 - frits usually containing elements not included in Annex I of Directive 67/548/EEC, with Zn and without Pb, Ba or Cd.

Group 3 - frits usually containing elements not included in Annex I of Directive 67/548/EEC, with Ba and without Pb, Zn or Cd.

Group 4 - frits usually containing elements not included in Annex I of Directive 67/548/EEC, with Zn and Ba but without Pb or Cd.

Group 5 - frits usually containing elements not included in Annex I of Directive 67/548/EEC, with Pb or Cd.

Subgroup 5.1 - lead bisilicate frits ($0\% < \text{PbO} \leq 69\%$, $\text{SiO}_2 \geq 30\%$, $\text{Al}_2\text{O}_3 \geq 1\%$).

Subgroup 5.2 - lead borosilicate frits ($40\%-60\% \text{PbO}$, $\text{SiO}_2 > 30\%$, $1\%-20\% \text{B}_2\text{O}_3$).

Group 6 - frits usually containing elements not included in Annex I of Directive 67/548/EEC, with Pb and Zn and/or Ba ($0\% < \text{PbO} \leq 69\%$, $\text{SiO}_2 \geq 30\%$, $\text{Al}_2\text{O}_3 \geq 1\%$).

Group 7 - frits usually containing elements not included in Annex I of Directive 67/548/EEC, with Cd and other elements such as Zn, Ba and Pb ($0\% < \text{PbO} \leq 69\%$, $\text{CdO} \leq 5\%$, $\text{SiO}_2 \geq 30\%$, $\text{Al}_2\text{O}_3 \geq 1\%$).

Group 8 - frits with lead expressed as PbO percentage, frits usually containing elements not included in Annex I of Directive 67/548/EEC, without a minimum of 30% of SiO₂ and/or without a minimum of 1% of Al₂O₃.

Group 9 - coloured frits usually containing elements not included in Annex I of Directive 67/548/EEC and metallic oxides in Annex I of Directive 67/548/EEC.

Revision Comments

Reclassified based on REACH toxicity reports & consortia information.

Issued By	Product Regulations Dept
Revision Date	20/05/2015
Revision	7
Supersedes date	18/06/2012
SDS No.	000
Safety Data Sheet Status	Approved.
Date	05.10.2004

Disclaimer

This information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process. Such information is, to the best of the company's knowledge and belief, accurate and reliable as of the date indicated. However, no warranty guarantee or representation is made to its accuracy, reliability or completeness. It is the user's responsibility to satisfy himself as to the suitability of such information for his own particular use.