

Ref: 105 Brush Restorer

## 1. IDENTIFICATION OF THE SUBSTANCE / PREPARATION AND COMPANY:

- 1.1 Product Name:** **BRUSH RESTORER**  
632900
- 1.2 Applications:** Breaks down & helps remove dried paint from brushes.
- 1.3 Supplier:** Palace Chemicals Ltd; Speke Hall Industrial Estate; Speke; Liverpool; L24 1YA  
Tel: 0151 486 6101; Fax 0151 448 1982  
e-mail: [sales@palacechemicals.co.uk](mailto:sales@palacechemicals.co.uk); web: [www.palacechemicals.co.uk](http://www.palacechemicals.co.uk)
- 1.4 Emergency Telephone No.** Tel: 0151 486 6101 – Mon-Fri: 0800 - 1800

## 2. HAZARDS IDENTIFICATION:

**Classification :** **Carc. 2, Skin Irrit. 2 , Eye Irrit. 2 , STOT SE 3 , STOT RE 2**  
**(EC 1272/2008)** **H226 - Physical Flam. Liquid & vapour - Category 3**  
**H304 - Health EUH066; Asp. Tox. 1**  
**H411 - Environmental Aquatic Chronic 2**

**2.2**

**Label elements:**

**Key Word:** **DANGER**



- Hazard statements:** H226 - Flammable liquid and vapour.  
H332+H312+H302: Harmful if inhaled, in contact with skin & if swallowed  
H315, H319: Causes skin irritation & eye irritation.  
H351: Suspected of causing cancer  
H304 - May be fatal if swallowed and enters airways.  
H372 - Causes damage to organs Central nervous system through prolonged or repeated exposure if inhaled  
H411 - Toxic to aquatic life with long lasting effects.  
H066 - Repeated exposure may cause skin dryness or cracking.
- Precautionary statements:** H336 - May cause drowsiness or dizziness.  
H335: May cause respiratory irritation.  
P101 - If medical advice is needed, have product container or label at hand.  
P210 - Keep away from heat/sparks/open flames/hot surfaces. - No smoking.  
P102 - Keep out of reach of children.  
P103 - Read label before use.  
P301 - IF SWALLOWED: Immediately call a POISON CENTRE or doctor. Do NOT induce vomiting.  
P302/352 - IF ON SKIN: Wash with plenty of soap and water.  
P304/340 - IF INHALED: Remove victim to fresh air and keep in a position comfortable for breathing.  
P260 - Do not breathe vapours.  
P271: Use only outdoors or in a well-ventilated area.  
P280 Wear protective gloves/protective clothing/eye protection/face protection.  
P262 - Do not get in eyes, on skin, or on clothing.
- 2.3 Other hazards:** P233 Keep container tightly closed.  
P240 Ground/bond container and receiving equipment.  
P242 Use only non-sparking tools.  
P243 Take precautionary measures against static discharge.  
P273 Avoid release to the environment.  
P280 Wear protective gloves/protective clothing/eye protection/face protection.  
P303/361/353 IF ON SKIN Remove immediately all contaminated clothing.  
P403/235 Store in a well-ventilated place. Keep cool.

## 3. COMPOSITION / INFORMATION ON INGREDIENTS:

**3.2 Mixtures:** NAPHTHA (PETROLEUM), HYDRODESULFURIZED HEAVY & DICHLOROMETHANE

Name:	CAS / EC No.:	Concentration:	Classification:
WHITE SPIRIT	64742-82-1	>50.0%	H226; H304; H411
DICHLOROMETHANE	000075-09-2	< 30%w/w	Carc. 2, Skin Irrit. 2 , Eye Irrit. 2 , STOT SE 3 , STOT RE 2
C12-15, ethoxylated alcohol	68551-13-3	< 2.0%	

## 4. FIRST AID MEASURES:

### 4.1 Description of measures:

- EYE CONTACT:** Irrigate thoroughly for 15 minutes with clean running water or a boric saline eye wash bottle. Seek medical attention should eye irritation persist or become inflamed.
- INHALATION:** Avoid working in a poorly ventilated, confined space. Remove to fresh air and rest. If irritation or breathing difficulties persist, seek medical attention.
- SKIN CONTACT:** Wash off skin with warm soapy water. Remove contaminated clothing and launder regularly. Prolonged and unattended contact should be avoided. Where irritation to skin is apparent seek medical attention.
- INGESTION:** Clean out mouth with copious volumes of water and drink plenty. Do not induce vomiting. Beware of aspiration if vomiting occurs. Seek prompt medical attention and show this data sheet

### 4.2 Acute & Chronic symptoms:

- Inhalation:** Vapours inhaled in strong concentration have a narcotic effect on the central nervous system. Irritation of the respiratory tract due to excessive fumes causes headache, drowsiness or other effects to the central nervous system, loss of consciousness.
- Ingestion:** Nausea, vomiting, abdominal pain.
- Skin contact:** Prolonged or repeated contact may cause irritation and dry skin.
- Eye Contact:** Burning feeling and temporary redness.

- 4.3 Immediate medical attention:** This will be needed to resolve the most severe risk which is through ingestion as the product may enter the lungs due to its low viscosity and lead to the rapid development of very serious inhalation pulmonary lesions (medical survey during 48 hours).

## 5. FIRE FIGHTING MEASURES:

- 5.1 Extinguishing media:** Dry powder; Foam, CO<sub>2</sub> – Do not use water jets.
- 5.2 Combustion Hazards:** Hazardous decomposition when subject to combustion – will produce noxious, irritating fumes.
- 5.3 Advice for fire-fighters:** Use approved self-contained breathing apparatus. Only use a fine water spray to cool down heat affected containers – not burning product. Cool containers exposed to flames with water until well after the fire is out. Keep run-off water out of sewers and water sources. Dike for water control.

## 6. ACCIDENTAL RELEASE MEASURES:

- 6.1 Personal protection:** Ventilate area and eliminate all sources of ignition. Wear personal protective equipment recommended in section 8.
- 6.2 Environmental precautions:** Do not allow spill to enter drains or watercourses. Form a dam with sand, earth or a boom. Absorb, bund and scrape spillages onto sand, sawdust or absorbent granules.
- 6.3 Spill removal methods:** Confine residues in clearly marked sealed containers for disposal in accordance with Local Authority regulations for flammable products – subject to special waste management controls.
- 6.4 References to other sections:** Wear protective clothing as described in Section 8 of this safety data sheet. See section 11 for additional information on health hazards. For waste disposal, see section 13.

## 7. HANDLING & STORAGE:

- 7.1 Safe handling precautions:** Eliminate all sources of ignition. Risk of vapour concentration on the floor and in low-lying areas. Static electricity and formation of sparks must be prevented. Use explosion proof electric equipment. Wear full protective clothing for prolonged exposure and/or high concentrations. Contaminated clothing and shoes must be discarded. Contaminated rags and cloths must be put in fireproof containers for disposal. Ventilate well, avoid breathing vapours. Use approved respirator if air contamination is above accepted level.
- 7.2 (a) Safe storage conditions:** Store in tightly closed original container in a dry, cool and well-ventilated place. Keep in original container. Take precautionary measures against static discharges. Keep only in the original container in a cool, well-ventilated place. Keep away from direct sunlight. All storage vessels should be made of steel, ceramic or glass and require a suitable vent or pressure relief valve and secondary containment to prevent uncontrolled losses from accidental release.

**7.2 (b) Incompatible materials:** Keep away from oxidisers, heat and flames. Will attack plastics, rubber and coatings. Forms a detonable mixture with nitric acid. May react with certain amines, e.g. polyurethane catalysts. Prolonged contact with aluminium or light alloys may cause a reaction resulting in the generation of hydrogen chloride gas and heat.

**7.3 Specific end uses:** The identified uses for this product are detailed in Section 1.2.

## 8. EXPOSURE CONTROLS & PERSONAL PROTECTION:

### 8.1 Control parameters

Substance:	8 hour exposure limit	15 minute exposure limit	Source. Type
White Spirit:	WEL- 350 mg/M3	STEL- 600mg/M3	
Dichloromethane:	100ppm / 350mg/m3 (Sk)	300ppm / 1050mg/m3 (Sk)	WEL

### DNEL's - (Derived No effect levels) for workers:

Exposure pattern:	Route	DNEL	Dose descriptor
Acute systemic effects -	Dermal		
Acute systemic effects -	Inhalation	330 per 8 hours mg/m3	Industry
Acute Local effects -	Dermal		
Acute Local effects -	Inhalation	71 per 24 hours mg/m3	Consumer
Long term systemic effects -	Dermal	44 mg/kg/day	Industry
Long term systemic effects -	Inhalation		
Long term local effects -	Dermal	26 mg/kg/day	Consumer
Long term local effects -	Inhalation		

### PNEC's - Predicted No effect concentration (Environment):

Compartment:	PNEC	Dose Descriptor
Fresh water -		
Sewage treatment -		

### 8.2 Exposure controls:

**Engineering controls:** Provide adequate ventilation (FORCED & NATURAL) to ensure that the occupational exposure limit is not exceeded and exhaust fumes pose no threat to non users in adjacent areas, particularly in low level enclosures

**Respiratory protections:** No specific recommendation is made, but appropriately specified respiratory protection must be used if the general level exceeds the recommended occupational exposure limit.

**Hand protection:** Protective gloves must be used. The most suitable glove must be chosen in consultation with the gloves supplier, who can inform about the breakthrough time of the glove material. Use protective gloves made of nitrile.

**Eye protection:** BS 2092 Goggles should be worn for all applications to help prevent accidental face/eye contact and a full face visor where there is a risk of splashing or drips, along with head protection (PVC helmet) when working overhead.

**Other Protection:** Wear suitable protective clothing and gloves. Gloves should be changed when permeation is likely. PVC has a breakthrough time of approximately 5 minutes for methylene chloride. Check with protective equipment manufacturer's data.

**Hygiene measures:** **DO NOT SMOKE IN WORK AREA!**

Wash at the end of each work shift and before eating, smoking and using the toilet. Promptly remove any clothing that becomes contaminated. Wash promptly with soap & water if skin becomes contaminated. Use appropriate skin cream to prevent drying of skin. When using do not eat, drink or smoke.



## 9. PHYSICAL & CHEMICAL PROPERTIES:

<b>Appearance:</b>	Transparent green liquid	<b>Relative density:</b>	1.03 – 1.05
<b>Odour:</b>	Distinctive of DCM	<b>Water solubility:</b>	Partial by emulsification
<b>Odour threshold:</b>	Lower	<b>Solubility in oils:</b>	100%
<b>pH:</b>	n/a	<b>Partition coefficient (Kow):</b>	n/a
<b>Flash point:</b>	42°C	<b>Auto-ignition temperature:</b>	>230
<b>Melting point:</b>	n/a	<b>Decomposition temperature:</b>	n/a
<b>Boiling point:</b>	39 – 200°C	<b>Surface tension:</b>	0.0245 N/m @ 25 °C
<b>Evaporation rate:</b>	< 1.5% w/w in 30 minutes	<b>Viscosity:</b>	0.95 m2/s 40
<b>Upper/Lower Flam limits:</b>	7.0% - 0.7%	<b>Explosive properties:</b>	May form explosive mixtures with air.
<b>Vapour pressure:</b>	< 5 kPa 20	<b>Oxidising properties:</b>	n/a
<b>Vapour density:</b>	n/a	<b>Particle size:</b>	n/a

## 10. STABILITY & REACTIVITY:

<b>10.1 Conditions to avoid:</b>	Sources of ignition. Avoid static discharge.	<b>10.4 Reactivity:</b>	Stable except when ignited
<b>10.2 Incompatible Materials:</b>	Acids & Oxidising agents	<b>10.5 Chemical reactivity:</b>	Stable under the prescribed storage conditions.
<b>10.3 Decomposition hazards:</b>	Fire creates toxic fumes, incl. hydrogen chloride & phosgene.	<b>10.6 Risk of hazardous reaction:</b>	None under normal use.

## 11. TOXICOLOGICAL INFORMATION:

**11.1 Information on toxicological effects:** This product has not been exhaustively tested. Judgements on the expected toxicity of this product have been made based upon consideration of its' major components.

<b>Routes of exposure:</b>	Inhalation, skin contact and ingestion.	<b>Skin Corrosivity / Irritation:</b>	May cause de-fatting of the skin,
<b>Eye damage/irritation:</b>	Burning feeling and temporary redness – may cause serious damage	<b>Respiratory/skin sensitisation:</b>	Vapour may be irritating to the respiratory tract. High concentrations will lead to adverse effects on the central nervous system.
<b>Reproductive toxicity:</b>	n/a	<b>Germ cell Mutagenicity:</b>	n/a
<b>STOT single exposure:</b>	Toxic dose 1 - LD 50 >2000 mg/kg bw	<b>Carcinogenicity:</b>	Carcinogenic effects are specific to the mouse and are not relevant to human health.
<b>STOT repeat exposure:</b>	Target Organs - Central nervous system Respiratory system, lungs	<b>Aspiration hazard:</b>	The fluid can enter the lungs and cause damage (chemical pneumonitis, potentially fatal).

## 12. ECOLOGICAL INFORMATION:

<b>12.1 Ecotoxicity:</b>	LC50 (96 hour) (Fish) Fresh water 193mg/l LC50 (96 hour) (Fish) Marine water 97mg/l	<b>12.4 Mobility in soil:</b>	75% degradable in 28 days
<b>12.2 Bio-accumulative potential:</b>	Negligible due to high volatility	<b>12.5 PBT and vPvB result:</b>	Not Classified as PBT/vPvB
<b>12.3 Persistence &amp; degradability:</b>	The substance is readily biodegradable.	<b>12.6 Other adverse effects:</b>	n/a

## 13. DISPOSAL CONSIDERATIONS:

**13.1 Waste treatment Methods:** Disposal to licensed waste disposal site in accordance with the local Waste Disposal Authority. Waste is suitable for incineration. Rags and the like, moistened with flammable liquids, must be discarded into designated fireproof bucket. Where possible packaging should be collected for reuse or recycling.

When this product, in its liquid state, as supplied becomes waste it should be disposed of as hazardous waste using the waste code 08 01 11 waste paint and varnish containing organic solvents or other dangerous substances. Empty used containers should be disposed of as waste code 15 01 10 packaging containing residues of or contaminated by dangerous substances. When used the removed sludge should be disposed of using waste code 08 01 13 for paint & varnish sludge materials. Any absorbents used for clearing up soils should be disposed of using waste code 15 02 02, for absorbents contaminated by dangerous substances.

## 14. TRANSPORT INFORMATION:

Transport Labels:



Regulatory Code (Land, Sea & Air):	ADR	IMDG	ICAO
14.1 UN No.:	1993	1993	1993
14.2 Proper shipping name:	FLAMMABLE Liquid N.O.S. (Contains White Spirit)	FLAMMABLE Liquid N.O.S. (Contains White Spirit)	FLAMMABLE Liquid N.O.S. (Contains White Spirit)
14.3 ADR Packing Group:	III	III	III
14.4 Transport Hazard Class:	3	3	3
14.5 Environmental hazards:	Marine pollutant	Marine pollutant	Marine pollutant
14.6 Special user precautions:	Emergency Action Code 3Y	EMS F-E, S-E	HAZCHEM CODE 3YE
14.7 Transport in bulk – IBC code:	HAZARD No. (ADR) 33	Tunnel Restriction Code (D/E)	

## 15. REGULATORY INFORMATION:

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

All components are listed as existing substances in Europe

#### UK Regulatory References:

Health and Safety at Work Act 1974. The Control of Substances Hazardous to Health Regulations 2002 (S.I 2002 No. 2677) with amendments. Chemicals (Hazard Information & Packaging) Regulations.

Environmental Listing - Control of Pollution Act 1974. Control of Pollution (Special Waste Regulations) Act 1980.

#### Statutory Instruments:

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

Approved Code Of Practice Classification and Labelling of Substances and Preparations Dangerous for Supply.

#### Guidance Notes:

Workplace Exposure Limits EH40. Introduction to Local Exhaust Ventilation HS(G)37. CHIP for everyone HSG(108).

#### EU Legislation:

Dangerous Substance Directive 67/548/EEC.

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. Regulation (EC) No 1272/2008 of the European Parliament and of the Council of 16 December 2008 on classification, labelling and packaging of substances and mixtures, amending and repealing Directives 67/548/EEC and 1999/45/EC, and amending Regulation (EC) No 1907/2006 with amendments.

#### National Regulations:

Users of this product are reminded of their duties under the current Control of Substances Hazardous to Health Regulations and a suitable and sufficient assessment of all the risk should be undertaken before using this product. The guidelines given in the HSE publication COSHH ESSENTIALS - Easy Steps To Control Chemicals gives sound advice for deciding safe working control measures.

**Authorisations (Title VII Regulation 1907/2006)** - No specific authorisations are noted for this product.

**Restrictions (Title VIII Regulation 1907/2006)** - No specific restrictions of use are noted for this product.

### 15.2 Chemical safety assessment

A chemical safety assessment has not been carried out for this product.

## 16. OTHER INFORMATION:

Last revision date: 31<sup>st</sup> August 2012

SDS No.: 105

#### List of abbreviations used in this SDS:

CAS	Chemical abstracts service
CLP	Classification, labelling & packaging regulation (EC) No. 1272/2008
DSD	Dangerous substances Directive 67/548/EEC
DPD	Dangerous Products Directive 1999/45/EC
PBT	Persistent, Bio-accumulative & Toxic
REACH	Registration, Evaluation, Authorisation & Restriction of Chemicals Regulation (EC) 1907/2006
vPvB	Very Persistent, very Bio-accumulative

**References:** Volume VII Approved supply list; EH40; Croner; Bulk supplier data sheets



# MATERIAL SAFETY DATA SHEET

VERSION 2 - CLP-GHS CLASSIFICATIONS (EC) No. 1272/2008



## Classification methods:

**H Phrases in section 3:** H226 - Flammable liquid and vapour.  
H332+H312+H302: Harmful if inhaled, in contact with skin & if swallowed  
H315, H319: Causes skin irritation & eye irritation.  
H351: Suspected of causing cancer  
H372 - Causes damage to organs Central nervous system through prolonged or repeated exposure if inhaled  
H304 - May be fatal if swallowed and enters airways.  
H411 - Toxic to aquatic life with long lasting effects.  
H066 - Repeated exposure may cause skin dryness or cracking.  
H336 - May cause drowsiness or dizziness.  
H335: May cause respiratory irritation.

## Training for workers:

### Disclaimer:

The information supplied in this safety data sheet is intended to assist in the use of the above product without risk to safety and health and is based on current knowledge and experience of the associated physico-chemical hazards. The data does not signify any warranty with regard to the product's properties. This information may be used to assist in formulating a COSHH risk assessment if applied at work. This data sheet complies with EC Directive 91/155EC.