Material Safety Data Sheet



WELDBRAZE® Aluminium Brazing Flux Powder

Section 1: Product And Company Information

<u>Product Name</u>: Aluminum Brazing Flux Powder

Working Temperature: 450-600°C

<u>Company Name:</u> Global Welding Supplies, Ltd

Address: 13 Patiki Rd. Avondale, Auckland 1026 New Zealand

<u>Telephone Number</u> +64 9 828 9886

+64 9 828 9888 0800 536 774

Chemical Formula: N/A

<u>Product Use:</u> Exclusively used in torch brazing

User Responsibility: The information in this Material Data Safety Sheet cannot be expected to cover all potential, individual workplace conditions. The user of the product has a responsibility to provide and maintain a safe workplace. All areas of operation should be examined to determine if, or where, safeguards-in addition—to those described in this Material Data Safety Sheet-are required. Health hazards and safety information contained within this document should be passed on to your customers and/or employees as the case may be.

Section 2: Hazardous Ingredients

Mixture of: Potassium bifluoride, potassium chloride, potassium fluorosilicate, lithium chloride

Note: The individual chemical substances that are identified above are known to

react with each other during manufacture of the individual flux products to form new more complex compounds, the nature of which have not been established. The Health and Safety information, EC Material Classification etc. for the products have been determined by means of physical testing, see

Section 11 Toxicological Data.

CAS Numbers For Chemical Substances Identified above.

Substance	CAS Number.
Potassium chloride	7747-40-7
Lithium chloride	7447-41-8
Sodium Chloride	7647-14-5
Zinc Chloride	7646-85-7

Section 3: Hazard Identification

The products identified above are classified as harmful as supplied. The main hazards with these products occur when used as brazing fluxes. On heating the flux will fume slightly, and with overheating the fumes will increase. The fumes produced may include hydrogen fluoride and boron trifluoride, which can cause irritation of the nasal passages, eyes and throat. To minimise evolution of flux fume always use the products with brazing filler metals that have liquidus temperatures 50°C less than the maximum working temperature shown within the table in Section 1 Severe long term exposure to flux fume may result in fluorosis. In acute cases there is a danger of pulmonary oedema although this occurrence could also result from inhalation of brazing filler metal fume or torch gases. Inhalation of flux fume will be irritating to the nose and throat and will cause smarting of the eyes.

Fluxes are harmful by ingestion, and will be irritating to the eyes. Skin contact may cause moderate irritation. Tests carried out on fluxes indicate that they are moderately irritating to the skin and if the skin is broken immediate irritation will occur on contact.

Section 4: First Aid Treatment

Inhalation Remove from source of exposure and allow to rest in fresh air. In acute cases apply

artificial respiration and if necessary summon medical aid.

Ingestion Rinse mouth with water & give patient water or milk mixed with calcium carbonate

(chalk) to drink. Do not induce vomiting. Summon medical aid.

Eyes Irrigate with water or isotonic saline for up to 20 minutes. Seek medical attention if

there is any hint of eye damage.

Skin Remove any contaminated clothing and wash skin with soap and water. Seek

medical attention if sores develop. Launder clothing before re-use.

Section 5: Fire Fighting Measures

Non flammable. Use full protection with breathing apparatus if involved in a fire as harmful fumes may be evolved. Use any extinguishing medium appropriate for surrounding fire.

Section 6: Accidental Release Measures

Powder Carefully sweep up and collect in a suitable container for re-use or disposal.

Section 7: Handling & Storage

Handling Use only under conditions of good local ventilation or efficient extraction systems and

do not inhale fumes or dust evolved during use. Avoid contact with skin and eyes. Do not eat, drink, smoke or apply cosmetics whilst using these materials. Keep away from food, drink and animal feed stuffs and out of reach of children. Observe good

industrial hygiene practices.

Storage Store in a cool, dry place. Keep container closed when not in use.

Section 8: Exposure Controls

PERSONAL PROTECTION

Avoid exposure to fume with good ventilation or local extraction. If risk of inhalation exists, personal respiratory protection should be worn. Safety glasses should be worn as well as gloves if required. Wash hands after using these products. The use of protective clothing is recommended. The use of barrier creams may help prevent skin irritation.

Section 9: Physical & Chemical Properties

Appearance White Powder

Odour No detectable odour

pH 8

Boiling/Melting Point $450-600^{\circ}$ C Flash Point Not applicable Flammability Not flammable Oxidising properties Not oxidising

Solubility Water-low solubility, no specific data.

Section 10: Stability & Reactivity

Containers of powder left open may absorb moisture and become lumpy. Avoid contact with acids and strong oxidising agents. No other adverse reactions are known.

Section 11: Toxicological Information

Toxicological data for these preparations: LD50 (oral-rat) >200mg/Kg Classified as moderately irritating, according to Draize skin test.

Section 12: Ecological Information

Likely to be harmful to all species of animal life. As far as is known no other threat is posed to the environment.

New Zealand National Poisons Centre: 0800 764 766

Section 13: Disposal Considerations

Disposal according to local and national regulations. Registered waste contractors should be aware of the composition and data given in Section 2. of this document.

Section 14: Transport Information

Not classified as hazardous for land, sea or air transport. No UN No's have been issued for fluxes.

Section 15: Regulatory Information

EC Supply	Harmful	
Risk Phrases	R20/22	Harmful by inhalation and if swallowed
	R36/38	Irritating to eyes and skin
Safety Phrases	S20/21	When using do not eat, drink or smoke
	S22	Do not breath dust
	S23	Do not breath fumes
\$26 \$45	S26	In case of eye contact, rinse immediately with
		water and seek medical advice.
	In case of accident or if you feel unwell seek	
		medical advice immediately (show the label
		where possible)
	0.51	
	S51	Use only in well ventilated areas

Section 16: Other Information

This Material Safety Data Sheet avliable on July 18,2013