

# SAFETY DATA SHEET

PRODUCT NAME: "SUMIKON®" EME-G631H  
MSDS NO.: MSDS-EME-2260  
DATE PREPARED: March,22,2013

## 1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME: "SUMIKON®" EME-G631H  
CHEMICAL NATURE: EPOXY MOLDING COMPOUND  
APPLICATION: Encapsulation of Semiconductors (or electronic devices and so forth) for electrical, physical and chemical protection.  
MANUFACTURER: SUMITOMO BAKELITE CO., LTD.  
TENNOZ PARK SIDE BLDG., 5-8, HIGASHI-SHINAGAWA 2-CHOME,  
SHINAGAWA-KU, TOKYO, 140-0002 JAPAN PHONE: 81-3-5462-4267  
SUPPLIER: SUMITOMO BAKELITE CO., LTD.  
TENNOZ PARK SIDE BLDG., 5-8, HIGASHI-SHINAGAWA 2-CHOME,  
SHINAGAWA-KU, TOKYO, 140-0002 JAPAN PHONE: 81-3-5462-4267

EMERGENCY ASSISTANCE (Please contact any of manufacture's following sales offices)

NAME & EMERGENCY PHONE NUMBER	ADDRESS
SUMITOMO PLASTICS AMERICA, INC. PHONE: 408-243-8402 (USA)	900 Lafayette Street Suite#510 Santa Clara, CA 95050
SUMITOMO BAKELITE SINGAPORE PTE.LTD. PHONE: 6755-5550 (SINGAPORE)	1 Senoko South Road Singapore 758069
n.v. SUMITOMO BAKELITE EUROPE s.a. PHONE: 02-709-2139 (BELGIUM)	Regus Pegasus Park Pegasuslaan 5 1831 Diegem, Belgium
SUMITOMO BAKELITE (SUZHOU) CO., LTD. PHONE: 0512-67613850 (CHINA)	140 Jinjihu Road, China-Singapore Suzhou Industrial Park, Suzhou, China, 215021
SUMITOMO BAKELITE (TAIWAN) CO., LTD. PHONE: 07-787-1285 (TAIWAN)	No.1 Hwa Syi Road, Ta Fa Industrial District, Ta Liao, Kaohsiung, Taiwan
CHEMTREC PHONE: 800-424-9300 (USA) 24 hours EVERYDAY	

## 2. HAZARDS IDENTIFICATION

GHS-Classification :

Serious eye damage/eye irritation Category2B  
Germ cell mutagenicity Category2  
Carcinogenicity Category1

GHS-Labeling



Danger

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## Hazard Statement: :

Causes serious eye irritation  
May cause genetic deficiencies  
May cause cancer

## Precaution Statement:

Use only in well-ventilated area  
Avoid breathing dust/fume/gas/mist/vapours/spray  
Avoid contact skin  
Wear protective gloves/protective clothing/eye protection/face protection.  
Wash ... thoroughly after handling

## 3. COMPOSITION/INFORMATION ON INGREDIENTS

Mixture

COMPONENTS	(CAS NO.)	BY WEIGHT (%)
Epoxy Resin A	(Trade Secret)	1 – 5
Epoxy Resin B	(Trade Secret)	1 – 5
Phenol Resin	(Trade Secret)	2 – 8
Carbon black	(1333-86-4)	0.1 - 0.5
Silica fused	(60676-86-0)	65 – 85
Silica fused	(7631-86-9)	5 – 15
Silica, crystalline *	(14808-60-7)	0.1 - 0.5

\*:Remaining as impurity of Silica fused(Cas No.60676-86-0)

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## 4. FIRST AID MEASURES

EYE CONTACT : Flush affected eyes with large amount of water, also under the eyelids for at least 15 minutes. Get medical attention.

SKIN CONTACT : Wash immediately with plenty of water or shower with soap. If irritation occurs, get medical attention.

INGESTION : Immediately give plenty of water. Get medical attention.

INHALATION : Remove to fresh air in case of accidental inhalation of vapors or dusts. Get medical attention.

### SPECIAL NOTE TO PHYSICIANS

: Treat Symptomatically.

Treatment may vary with condition of victim and specifics of incident.

## 5. FIRE FIGHTING MEASURES

Extinguishing media : Suitable for water, foam, carbon dioxide or dry chemicals.

Specific hazards : Combustion gas contains carbon mono oxide.

Specific methods : Wear protective equipment. Evacuate the people from leeward side, and extinguish the fire from windward.

Protection of firefighters : Wear full bunker gear including positive self-contained breathing apparatus in any closed space.

## 6. ACCIDENTAL RELEASE MEASURES

PERSONAL PRECAUTION : Use personal protective equipments. Avoid dust formation.

ENVIRONMENTAL PRECAUTIONS : Do not flush into surface water or sanitary sewer system.

METHODS FOR CLEANING UP : Clean contaminated surface thoroughly.

## 7. HANDLING AND STORAGE

HANDLING : Avoid contact with eyes and skin, and avoid breathing dust or vapors. Provide appropriate exhaust ventilation at places where dust is formed.

STORAGE : Keep containers tightly closed in a cool, well-ventilated space. Keep dry and cool below 5 °C for quality.

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## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

### EXPOSURE LIMITS:

COMPONENTS	EXPOSURE GUIDELINES (mg/m <sup>3</sup> )	
	ACGIH (TLV-TWA)	OSHA (PEL)
Silica Fused	0.1 (Respirable)	80
Silica, crystalline, quartz	0.1 (Respirable)	10 (Respirable), 30 (Total)
Epoxy Resin A	Not listed	Not listed
Epoxy Resin B	Not listed	Not listed
Phenol Resin	Not listed	Not listed
Carbon Black	3.5	3.5

### ENGINEERING MEASURES:

Ensure adequate ventilation, especially in confirmed areas.

### PERSONAL PROTECTIVE EQUIPMENTS:

Respiratory protection - For most conditions, no respiratory protection should be needed; however, in dusty atmospheres or insufficient ventilation, wear a suitable respiratory equipment or NIOSH// OSHA approved respirator to protect from dust.

Hand protection - Impervious gloves (chemical-resistant gloves).

Eye protection - Safety glasses with side shields.

Skin and body protection - Chemical-resistant apron.

## 9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance	: Black tablet
Odour	: Slight antiseptic odor
Odour threshold	: None
pH	: Not applicable
Melting point/freezing point	(Softening point) 75°C - 95°C
Initial boiling point and boiling range	: None
Flash point	: None
Evaporation rate	: Not applicable
Flammability(solid,gas)	: Flame retardance
Upper/lower flammability or explosive limits	: Not applicable
Vapor pressure	: Not applicable
Vapor density	: Not applicable
Relative density	: 1.8 - 2.2
Solubility(ies)	: Insoluble in water
Partition coefficient:n-octanol/water	: No information available.
Auto-ignition temperature	: No information available.
Decomposition temperature	: No information available.
Viscosity	: Not applicable

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## 10. STABILITY AND REACTIVITY

### CHEMICAL STABILITY:

Stable under recommended storage condition.

### CONDITIONS TO AVOID:

Keep away from heat, moisture and sunlight for quality.

### MATERIALS TO AVOID:

Oxidizing agents, acids and alkali.

### HAZARDOUS DECOMPOSITION PRODUCTS:

Carbon dioxide. Thermal decomposition can lead to release of irritating gases and vapors such as methane, ammonia, Phenol, carbon monoxide and hydrocarbon compounds.

## 11. TOXICOLOGICAL INFORMATION

No data is available on product itself.

Acute toxic substance: Silica fused: oral-rat LD50: 3,160mg/kg  
Epoxy resin A : oral-rat LD50: >5,000 mg/kg  
Epoxy resin B : oral-rat LD50: >1,000 mg/kg

Skin corrosive /Irritating substance: Not applicable

Substance causing serious eye damage or irritation: Silica fused

Respiratory hypersensitive substance: Not applicable

Skin hypersensitive substance: Not applicable

Carcinogenic substance: Silica fused: Group 3  
Carbon black: Group 2B  
Silica, crystalline \* Group 1A

\*:Remaining as impurity of Silica fused

Germ cell mutagenic substance: Epoxy resin A

Reproduction toxic substance: Not applicable

Specific target organ/systemic toxicity substance (onetime exposure): Not applicable

Specific target organ/systemic toxicity substance (repeated exposure): Not applicable

Aquatic environment hazard substance: Not applicable

## 12. ECOLOGICAL INFORMATION

### Aquatic/terrestrial ecology toxicity:

Waste water from subsequent processing should be given appropriate treatment in line with local regulations.

Residual and degradability: No data is available on product itself.

Biological concentration: No data is available on product itself.

Soil mobility: No data is available on product itself.

Other hazardous effects: No data is available on product itself.

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## 13. DISPOSAL INFORMATION

### WASTE FROM RESIDUES:

Can burn in a chemical incinerator equipped with an afterburner and scrubber in compliance with government or local disposal regulations, also contaminated packaging do so.

## 14. TRANSPORT INFORMATION

U.N. number: None assigned.  
U.N. proper shipping name: Not applicable  
Transportation danger classes: None assigned  
Container classes: None assigned  
Marine contamination substance: No data is available on product itself.  
Whether the user needs to know about the to transportation or transportation method or special safety measures : Transport under 5 °C or below for quality. Avoid leak, spilling and collapse of cargo.

## 15. REGULATORY INFORMATION

### Applicable regulations:

<Ref> Each substance  
Standards on Workplace Atmosphere of Dangerous and Hazardous Materials  
Carbon Black

## 16. OTHER INFORMATION

Reference document: ACGIH (2006)  
OSHA (USA CFR 29, 2006)  
IARC (Vol. 1 ~ 88)  
NTP (11th)  
RTECS (2006, Internet)  
International Chemical Safety Cards (ICSCs)  
Supplier's Material Safety Data Sheet

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