

## MATERIAL SAFETY DATA SHEET

## [1.PRODUCT AND COMPANY IDENTIFICATION]

PRODUCT NAME : TUFTONE MHBK-2  
SUPPLIER : Kao Corporation  
ADDRESS : 1-3,Bunka 2-chome,Sumida-ku,Tokyo 131-8501 Japan  
DIVISION : Chemical Division  
TELEPHONE NUMBER : 81-3-5630-7700  
FAX NUMBER : 81-3-5630-7889  
EMERGENCY TELEPHONE : 81-3-5630-7700  
NUMBER

## [2.COMPOSITION/INFORMATION ON INGREDIENTS]

SUBSTANCE OR PREPARATION : Preparation  
INGREDIENTS AND  
CONCENTRATION RANGE :

Ingredients	Concentration Range(%)	CAS RN
Black Toner		

INGREDIENTS CONTRIBUTING TO : None  
THE HAZARD(JAPAN)

## [3.HAZARDS IDENTIFICATION]

MOST IMPORTANT HAZARDS :  
ADVERSE HUMAN HEALTH : To the best of our investigation, no special hazards have to be  
EFFECTS mentioned.  
ENVIRONMENTAL EFFECTS : To the best of our investigation, no information about adverse effect in  
the environment available.  
PHYSICAL AND CHEMICAL : May cause risk of dust explosion.  
HAZARDS  
CLASS NAME FOR MSDS IN : Not applicable  
JAPAN

## [4.FIRST-AID MEASURES]

IN CASE OF INHALATION : Remove person to fresh air. If necessary seek medical attention.  
IN CASE OF SKIN CONTACT : Wash material off the skin with plenty of water and soap. If necessary  
seek medical attention.  
IN CASE OF EYE CONTACT : Immediately hold eyelids open and flush with a stream of water for at  
least 15 minutes. If necessary seek medical attention.  
IN CASE OF INGESTION : Seek medical attention. Never give anything by mouth to an unconscious  
person. If possible, rinse out mouth and give one or two glasses of water  
or milk to drink.

## [5.FIRE-FIGHTING MEASURES]

EXTINGUISHING MEDIA : Water spray, powder  
NOT SUITABLE EXTINGUISHING : No information available  
MEDIA  
SPECIFIC HAZARDS : May produce irritating or toxic gases in a fire.  
SPECIFIC METHODS : Keep away from sources of ignition and use appropriate extinguishing  
media.Fight fire from upwind position if possible.  
PROTECTION OF FIREFIGHTERS : Use goggles in combination with dust mask, and another protections as  
appropriate to situation.

## [6.ACCIDENTAL RELEASE MEASURES]

- PERSONAL PRECAUTIONS : Use mask, goggles and protective gloves.  
Large spills : Remove person to safety.  
Ensure adequate ventilation.  
Treat from upwind position.
- ENVIRONMENTAL PRECAUTIONS : Do not discharge into the drains, surface waters or ground water directly.
- METHODS FOR CLEANING UP : Prevent dispersion of dust.  
Sweep or vacuum by dust-explosion-proof type cleaner.
- PREVENTION OF SECONDARY HAZARDS : No information available

## [7.HANDLING AND STORAGE]

## HANDLING

- TECHNICAL MEASURES : Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower.
- PRECAUTIONS : Avoid inhalation of fine dust .
- SAFE HANDLING ADVICE : Handle in well-ventilated areas.  
Use safety glasses and protective gloves as appropriate to situation.  
Wash hands and face and gargle after handling.  
Prevent generation of dust.  
This material may cause risk of dust explosion.

## STORAGE

- STORAGE CONDITIONS : Keep container tightly closed.  
Protect from sun. Store in a well-ventilated room (under 40 C).
- PACKAGING MATERIALS : No information available

## [8.EXPOSURE CONTROLS/PERSONAL PROTECTION]

- ENGINEERING MEASURES : Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower.  
Use an adequate ventilation.  
Use local exhaust ventilation, in case of generation of dust.
- LIMIT VALUES
- ACGIH(TLV) : TWA 3.5 mg/m<sup>3</sup>  
Carbon black  
TWA 3mg/m<sup>3</sup>(respirable particulate);TWA 10mg/m<sup>3</sup>(inhalable particulate)  
(Particulates Not Otherwise Classified)
- OSHA(PEL) : TWA 3.5 mg/m<sup>3</sup>  
Carbon black
- PERSONAL PROTECTIVE EQUIPMENT
- RESPIRATORY PROTECTION : Use dust mask, as appropriate to situation.
- HAND PROTECTION : Rubber gloves
- EYE PROTECTION : Safety glasses with side shield(Safety goggles or Face shield)
- SKIN AND BODY PROTECTION : Full-body suit
- HYGIENE MEASURES : No information available

## [9.PHYSICAL AND CHEMICAL PROPERTIES]

## PHYSICAL STATES

- FORM : Pulverizing powder
- COLOUR : Black
- ODOUR : Odourless
- pH : Not applicable

## SPECIFIC TEMPERATURES/TEMPERATURE RANGES AT WHICH CHANGES IN PHYSICAL STATE OCCUR

- BOILING POINT : No data available

MELTING POINT	: No data available
DECOMPOSITION TEMPERATURE	: No data available
FLASH POINT	: Not applicable
AUTOIGNITION TEMPERATURE	: No data available
EXPLOSION PROPERTIES	
EXPLOSION	: UPPER LIMIT No data available      LOWER LIMIT No data available
VAPOUR PRESSURE	: No data available
VAPOUR DENSITY	: No data available
DENSITY	: 1.2 g/mL      ( 20°C )      ( 68°F )
SOLUBILITY	
WATER SOLUBILITY	: Insoluble
SOLVENT SOLUBILITY	: Partially soluble in toluene, chloroform and tetrahydrofuran.
OCTANOL/WATER PARTITION COEFFICIENT	: No data available
OTHER DATA	: No data available

## [10.STABILITY AND REACTIVITY]

STABILITY	: Stable in general.
HAZARDOUS REACTIONS	: Stable.
CONDITIONS TO AVOID	: No information available
MATERIALS TO AVOID	: No information available
HAZARDOUS DECOMPOSITION PRODUCTS	: No information available
OTHERS	: No information available

## [11.TOXICOLOGICAL INFORMATION]

ACUTE TOXICITY	: No information available
LOCAL EFFECTS	:
CORROSIVITY	: No information available
SKIN IRRITATION	: No information available
EYE IRRITATION	: No information available
SENSITIZATION	: No information available
CHRONIC TOXICITY/LONG TERM TOXICITY	: No information available
CARCINOGENICITY	: No information available
IARC	: Group 2B : Possibly carcinogenic to humans Carbon black Group 3 : Not Classifiable Titanium dioxide Group 3,Unclassifiable as to carcinogenicity to humans Amorphous Silica
NTP	: Not established
OSHA	: Not established
MUTAGENICITY	: No information available
TERATOGENICITY	: No information available
REPRODUCTION TOXICITY	: No information available
OTHER DATA	: No information available

## [12.ECOLOGICAL INFORMATION]

MOBILITY : No information available  
PERSISTENCE/  
DEGRADABILITY : No information available  
BIOACCUMULATION : No information available  
ECOTOXICITY :  
AQUATIC TOXICITY : No information available  
OTHER DATA : No information available

## [13.DISPOSAL CONSIDERATIONS]

Review "HANDLING AND STORAGE (Section 7)".  
Passed to a licensed waste contractor.  
This product may cause risk of dust explosion.  
Dispose of waste in accordance with local,state, and federal regulations.

Dispose of waste in accordance with local,state and federal regulations.

## [14.TRANSPORT INFORMATION]

Follow all regulations in your country or region

UN CLASS/UN NUMBER : Not applicable  
PRECAUTIONS : Review "ACCIDENTAL RELEASE MEASURES (Section 6)".  
Review "HANDLING AND STORAGE (Section 7)".  
Ensure containers without breakage or leakage.  
Ensure containers tightly fixed.  
Follow all regulations in your country or region.  
Avoid heating(keep under 40 C).

## [15.REGULATORY INFORMATION]

Follow all regulations in your country or region

INVENTORIES	: ENCS(Japan)	Yes
	TSCA(USA)	Yes
	EINECS(EU)	No(ELINCS)
	AICS(Australia)	Yes
	DSL(Canada)	No(NDSL)
	ECL(Korea)	Yes
	PICCS(Philippines)	Yes

KAO Corporation is not able to check up the regulatory information in regard to the substances in your country or region,therefore,we request this matter would be filled by your responsibility.

## [16.OTHER INFORMATION]

REFERENCE : -Safety data sheet for chemical products - Part 1: Content and order of sections(ISO 11014-1)  
-International Chemical Safety Cards(ICSC) (Compiler's Guide)(1994)

To the best of the manufacturer's knowledge,the information contained herein is accurate. However, neither the manufacturer, nor any of its affiliates, make any representations or warranties (expressed or implied), nor assumes any liability(including liability for any direct, incidental, consequential, or other damages) with respect to the accuracy or completeness of the information contained herein. Such information may be (without limitation) invalid if the specified material is used in combination with another ,in a particular process, or under unusual conditions. Determination of suitability of any material for any given purpose is the sole responsibility of the user who assumes all risk and responsibility therefore. All materials may present unknown hazards and should be used with appropriate caution. The manufacturer cannot and does not guarantee that the hazards described herein are the only ones that exist.