## SAFETY DATA SHEET

## [1.PRODUCT AND COMPANY IDENTIFICATION]

[1.PRODUCT AND COMPANY IDENTIFICA	-			
	KALCOL 4098			
SUPPLIER :	: Fatty Chemical (Malaysia) Sdn. Bhd.			
ADDRESS :	Lorong Perusahaan Satu, Prai Industrial Complex, 13600 Prai, Penang, MALAYSIA			
DIVISION :				
TELEPHONE NUMBER :	60-4-399-8500			
FAX NUMBER :	60-4-399-8503			
E-MAIL ADDRESS :				
EMERGENCY TELEPHONE NUMBER :	60-4-399-8500			
RECOMMENDED USE : AND RESTRICTIONS ON USE				
[2.HAZARDS IDENTIFICATION]				
GHS CLASSIFICATION				
PHYSICAL AND CHEMICAL HAZARDS :	Not classified			
HEALTH HAZARDS				
ACUTE TOXICITY (Oral) :	Not classified			
	Not classified			
ACUTE TOXICITY (Inhalation) :	Not applicable(Vapours)			
SKIN CORROSION / IRRITATION :				
SERIOUS EYE DAMAGE / EYE : IRRITATION	Category 2A			
RESPIRATORY SENSITIZATION :	Classification not possible			
SKIN SENSITIZATION :	Not classified			
GERM CELL MUTAGENICITY :	Not classified			
CARCINOGENICITY :	Not classified			
REPRODUCTIVE TOXICITY :	Not classified			
SPECIFIC TARGET ORGAN TOXICITY				
- SINGLE EXPOSURE :	Classification not possible			
- REPEATED EXPOSURE :	Not classified			
ASPIRATION HAZARD :	Classification not possible			
ENVIRONMENTAL HAZARDS				
HAZARDOUS TO THE AQUATIC ENVIE	RONMENT			
- ACUTE HAZARD :	Not classified			
- LONG-TERM HAZARD :	Category 1			
- HAZARDOUS TO THE OZONE : LAYER	Classification not possible			
GHS LABEL ELEMENTS				
PICTOGRAMS OR SYMBOLS :				
SIGNAL WORD :	Warning			
HAZARD STATEMENTS :	Causes serious eye irritation Very toxic to aquatic life with long lasting effects			
PRECAUTIONARY STATEMENTS				
PREVENTION :	Avoid release to the environment. Wash thoroughly after handling.			
	Wear eye protection/face protection.			

RESPONSE	: IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.					
	If eye irritation persists: Get medical advice/attention.					
	IF ON SKIN: Gently wash with plenty of water and soap.					
	Call a POISON CENTER or doctor if you feel unwell. Collect spillage.					
STORAGE						
DISPOSAL	<ul> <li>Passed to a licensed waste contractor.</li> </ul>					
SAFE HANDLING ADVICE	: Refer to SDS.					
[3.COMPOSITION / INFORMATION ON IN	-					
SUBSTANCE OR MIXTURE	: Substance					
INGREDIENTS AND CONCENTRATION RANGE	: Myristyl alcohol					
CAS RN	: 112-72-1					
[4.FIRST-AID MEASURES]						
IN CASE OF INHALATION	: Remove person to fresh air and keep comfortable for breathing.					
IN CASE OF SKIN CONTACT	: Gently wash with plenty of soap and water.					
IN CASE OF EYE CONTACT	: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.					
	If eye irritation persists: Get medical advice/attention.					
IN CASE OF INGESTION	: Call a POISON CENTER or doctor if you feel unwell.					
[5.FIRE-FIGHTING MEASURES]						
EXTINGUISHING MEDIA	: Powder, alcohol-resistant foam, carbon dioxide, sand					
NOT SUITABLE EXTINGUISHING	: No information available					
MEDIA						
SPECIFIC HAZARDS	: No information available					
SPECIFIC METHODS	: Keep away from sources of ignition and use appropriate extinguishing media. Fight fire from upwind position if possible.					
	Do not flow the materials causing adverse effects into the environment with effluent fire extinguishing agents.					
PROTECTION OF FIRE FIGHTERS	: Use goggles in combination with dust mask, and other protections as appropriate to situation.					
[6.ACCIDENTAL RELEASE MEASURES]						
PERSONAL PRECAUTIONS,	: Use goggles and protective gloves.					
PROTECTIVE EQUIPMENT AND EMERGENCY PROCEDURE	Large spills : Remove person to safety. Ensure adequate ventilation.					
ENVIRONMENTAL PRECAUTIONS	: Avoid release to the environment.					
METHODS FOR CLEANING UP	: Cool down to solid in case of melt(be careful of heat), and then sweep or vacuum spilled materials to drums or containers.					
PREVENTION OF SECONDARY HAZARDS	: Keep away from sources of ignition and prepare extinguishing media.					
[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	: Keep away from source of ignition.					
SAFE HANDLING ADVICE	: Use an adequate ventilation.					
	Wash thoroughly after handling. Use personal protective equipment as required.					

STORAGE SUITABLE STORAGE CONDITIONS SAFE PACKAGING MATERIALS	<ul> <li>Store container tightly closed in well-ventilated place.</li> <li>Keep away from source of ignition.</li> <li>No information available</li> </ul>			
[8.EXPOSURE CONTROLS / PERSONAL	-			
ENGINEERING MEASURES	: Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower.			
	Use an adequate ventilation.			
LIMIT VALUES				
ACGIH (TLV)	Not established			
OSHA (PEL)	: Not established			
PERSONAL PROTECTIVE EQUIPMENT				
RESPIRATORY PROTECTION	: Use as appropriate to situation.			
HAND PROTECTION	: Rubber gloves			
EYE PROTECTION	: Safety glasses			
SKIN AND BODY PROTECTION	: Full-body suit			
HYGIENE MEASURES	: No information available			
[9.PHYSICAL AND CHEMICAL PROPERT	IES]			
APPEARANCE				
PHYSICAL STATE	: Solid			
COLOUR	: White			
ODOUR	: Slightly characteristic odour			
рН	: Not applicable			
SPECIFIC TEMPERATURES / TEMPER AT WHICH CHANGES IN PHYSICAL ST				
BOILING POINT	: 296 °C ( 564.8 °F)			
MELTING POINT	: 37 - 40 °C ( 98.6 - 104 °F)			
FLASH POINT	: 156 °C ( 312.8 °F) (CLEVELAND open cup method)			
FLAMMABILITY OR EXPLOSIVE PROP	ERTIES			
FLAMMABILITY OR EXPLOSIVE LIMITS	: UPPER LIMIT : 4.2 % LOWER LIMIT : 0.5 %			
VAPOUR PRESSURE	: No information available			
VAPOUR DENSITY	: No information available			
DENSITY (SPECIFIC GRAVITY)	: 0.8224 g/mL ( 40 °C) ( 104 °F)			
SOLUBILITY				
WATER SOLUBILITY	: Insoluble			
SOLVENT SOLUBILITY	: Soluble in general organic solvents			
PARTITION COEFFICIENT: n- OCTANOL / WATER (log Pow)	: No information available			
AUTO-IGNITION TEMPERATURE	: No information available			
DECOMPOSITION TEMPERATURE	: No information available			
ODOUR THRESHOLD	: No information available			
EVAPORATION RATE	: No information available			
FLAMMABILITY (SOLID,GAS)	: No information available			
VISCOSITY	: 16 mPa.s ( 40 °C) ( 104 °F)			
OTHER DATA	: No information available			
[10.STABILITY AND REACTIVITY]				
CHEMICAL STABILITY	: Stable in general.			

POSSIBILITY OF HAZARDOUS REACTIONS	:	No information available
CONDITIONS TO AVOID	:	No information available
INCOMPATIBLE MATERIALS	:	No information available
HAZARDOUS DECOMPOSITION PRODUCTS	:	No information available
OTHERS	:	No information available
[11.TOXICOLOGICAL INFORMATION]		
ACUTE TOXICITY		
Oral		
INFORMATION ON PRODUCT	:	Rat, LD50 : > 2000 mg/kg (male, female)
Dermal		
INFORMATION ON PRODUCT	:	No information available
Inhalation		
INFORMATION ON PRODUCT	:	No information available
SKIN CORROSION / IRRITATION		
INFORMATION ON PRODUCT	:	Rabbit, undiluted, 4 hours semi-occluded application test (OECD404) : Not classified
SERIOUS EYE DAMAGE / IRRITATION		
INFORMATION ON PRODUCT	:	Rabbit, undiluted, OECD405 : Category 2A
RESPIRATORY OR SKIN SENSITIZATIO	ΟN	
RESPIRATORY		
INFORMATION ON PRODUCT SKIN	:	No information available
INFORMATION ON PRODUCT	:	Guinea pig, Guinea Pig Maximization Test : Negative
MUTAGENICITY (GERM CELL MUTAGE		
INFORMATION ON PRODUCT	:	Ames test (TA98,TA100,TA1535,TA1537,TA1538) : Negative
CARCINOGENICITY		
INFORMATION ON PRODUCT	:	No information available
IARC	:	Not listed
NTP	:	Not listed
EU	:	Not listed
OSHA	:	Not listed
REPRODUCTIVE TOXICITY		
INFORMATION ON PRODUCT	:	No information available
SPECIFIC TARGET ORGAN TOXICITY		
- SINGLE EXPOSURE		
INFORMATION ON PRODUCT	:	No information available
- REPEATED EXPOSURE		
INFORMATION ON PRODUCT	:	No information available
	:	No information available
OTHER INFORMATION	•	No information available
[12.ECOLOGICAL INFORMATION]		
ECOTOXICITY	:	Rainbow trout, OECD203, 96h, LC50 : > 1 mg/L (The highest attainable test concentration)
ACUTE HAZARD	:	No information available
LONG-TERM HAZARD	:	No information available

PERSISTENCE / DEGRADABILITY	:	Closed bottle test (BODIS-test) : 92 % (28 days) (3)			
MOBILITY IN SOIL	:	No information available			
BIOACCUMULATIVE POTENTIAL	-	No information available			
OTHER ADVERSE EFFECTS	:	No information available			
[13.DISPOSAL CONSIDERATIONS]					
		Review "HANDLING AND ST	ORAGE (Section 7)".		
		Passed to a licensed waste c	ontractor.		
Dispose of waste in accordance with loca	l,st	ate and federal regulations.			
[14.TRANSPORT INFORMATION]					
Follow all regulations in your country or re	egio	on			
INTERNATIONAL REGULATIONS					
UN CLASS / UN NUMBER	:	Class 9 / UN3077			
ΙΑΤΑ	:	UN Number	UN3077		
		Proper Shipping Name	Environmentally Hazardous Substance, Solid, n.o.s.(Myristyl alcohol)		
		Class	9		
		Packing Group	111		
IMDG	:	UN Number	UN3077		
		Proper Shipping Name	Environmentally Hazardous Substance, Solid, n.o.s.(Myristyl alcohol)		
		Class	9		
		Packing Group	111		
		Additional Information	Marine pollutant		
SPECIAL PRECAUTIONS FOR USER :		Review "ACCIDENTAL RELEASE MEASURES (Section 6)". Review "HANDLING AND STORAGE (Section 7)".			
		Ensure containers without bre			
		Ensure containers tightly fixed. Follow all regulations in your country or region.			
		Keep away from source of igr			
		Emergency Response Guide(ERG) Numbers : 171			
[15.REGULATORY INFORMATION]					
Follow all regulations in your country or re	aio	on.			
INVENTORIES	:	ENCS(Japan)	2-217		
	•	TSCA(USA)	Yes		
		EINECS(EU)	204-000-3		
		AICS(Australia)	Yes		
		DSL(Canada)	Yes		
		ECL(Korea)	KE-33362		
		PICCS(Philippines)	Yes		
		IECSC(China)	Yes		
KAO Corporation is not able to check up t		regulatory information in rega	rd to the substances in your country or		
region,therefore,we request this matter we	oul	d be filled by your responsibili	ty.		
[16.OTHER INFORMATION]					
REFERENCE	:	-Safety data sheet for chemical products - Part 1: Content and order of sections(ISO 11014-1)			
		-International Chemical Safet	y Cards(ICSC) (Compiler's Guide)(1994)		
		(3)IUCLID			

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