Safety Data Sheet

AeroShell Calibrating Fluid 2

Infosafe No.	ACITU 00/eng/C	**Version No.**	1	**ISSUED Date**	2003/06/04	**Status**	ISSUED

1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND COMPANY/UNDERTAKING

Product Name
AeroShell Calibrating Fluid 2

Product Code
001A0032

Product Type/Use
Special kerosine for aircraft fuel system calibration.

Company Name
SGSI Drafting Signoff Stage 1

Other Names	**Name**	**Code**
	AeroShell Calibrating Fluid 2	140001168087

2. COMPOSITION/INFORMATION ON INGREDIENTS

Preparation Description
Special Run Stoddard Solvent. May contain antioxidant and corrosion inhibitor additives.

Dangerous Components / Constituents	**Name**	**CAS**	**EINECS**	**Proportion**	**Hazard**	**R Phrase**
	Stoddard solvent	8052-41-3	232-489-3	95-100 %	Xn, N	R10, R65, R66, R51/53

Other Information
See Section 16 'Other Information' for full text of each relevant Risk phrase.

3. HAZARDS IDENTIFICATION

EC Classification
Harmful, Dangerous for the environment, Flammable

Human Health Hazards

Harmful: may cause lung damage if swallowed. Aspiration into the lungs may cause chemical pneumonitis which can be

fatal. Repeated exposure may cause skin dryness or cracking. Vapours may cause drowsiness and dizziness.

Safety Hazards
Flammable. In use, may form flammable/explosive vapour-air mixture.

Environmental Hazards
Toxic to aquatic organisms. May cause long term adverse effects in the aquatic environment.

4. FIRST AID MEASURES

Symptoms and Effects
Aspiration into the lungs may occur directly or following ingestion. This can cause chemical pneumonitis which may be fatal. Prolonged exposure to vapour/mist may cause headaches, dizziness, nausea, unconsciousness and irritation to the eyes and upper respiratory tract.

Inhalation
Remove to fresh air. If rapid recovery does not occur, obtain medical attention.

Skin
Remove contaminated clothing and wash affected skin with soap and water. If persistent irritation occurs, obtain medical attention. If high pressure injection injuries occur, obtain medical attention immediately.

Eye
Flush eye with copious quantities of water. If persistent irritation occurs, obtain medical attention.

Ingestion
DO NOT INDUCE VOMITING. Protect airway if vomiting begins. Give nothing by mouth. If breathing but unconcious, place in recovery position. If breathing has stopped, apply artificial respiration. OBTAIN MEDICAL ATTENTION IMMEDIATELY.

Advice to Doctor
Treat symptomatically. Aspiration into the lungs may result in chemical pneumonitis. Dermatitis may result from prolonged or repeated exposure.

5. FIRE FIGHTING MEASURES

Specific Hazards
The vapour is heavier than air, spreads along the ground and distant ignition is possible. Will float and may be reignited on surface water. Combustion is likely to give rise to a complex mixture of airborne solid and liquid particulates and gases, including carbon monoxide and unidentified organic and inorganic compounds.

Extinguishing Media
Foam, water spray or fog. Dry chemical powder, carbon dioxide, sand or earth may be used for small fires only.

Unsuitable Extinguishing Media
Water in jet. Use of halon extinguishers should be avoided for environmental reasons.

Protective Equipment
Proper protective equipment including breathing apparatus must be worn when approaching a fire in a confined space.

Other Information
Keep adjacent containers cool by spraying with water.

6. ACCIDENTAL RELEASE MEASURES

Personal Precautions
Do not breathe vapour. Ventilate contaminated area thoroughly. Avoid contact with skin, eyes, clothing. Take off immediately all contaminated clothing. Vapour can travel along the ground for considerable distances. Remove all possible sources of ignition in the surrounding area and evacuate all personnel. Avoid sparks. Take precautionary measures against static discharge. Shut off leaks, if possible without personal risk.

Personal Protection
Wear Monogoggles, PVC, neoprene or nitrile rubber gloves, Chemical resistant PVC one-piece suit with integral hood. Safety boots - rubber, knee length. For guidance on respiratory protection see Section 8.

Environmental Precautions
Prevent from spreading or entering into drains, ditches or rivers by using sand, earth, or other appropriate barriers. Inform local authorities if this cannot be prevented.

Clean-up Methods - Small Spillages
Absorb or contain liquid with sand, earth or spill control material. Shovel up and place in a labelled, sealable container for subsequent safe disposal.

Clean-up Methods - Large Spillages
Transfer to a labelled container for product recovery or safe disposal. Otherwise treat as for small spillage.

Other Information
Risk of explosion. Inform the emergency services if liquid enters surface water drains. Vapour may form an explosive mixture with air.

7. HANDLING AND STORAGE

Handling
Avoid prolonged or repeated contact with skin, eyes and clothing . Only use in well-ventilated areas. Extinguish any naked flames. Remove ignition sources. Avoid sparks. Do not smoke. Take precautionary measures against static discharges. When using do not eat or drink. When handling product in drums, safety footwear should be worn and proper handling equipment should be used. Prevent spillages. Cloth, paper and other materials that are used to absorb spills present a fire hazard. Avoid their accumulation by disposing of them safely and immediately. In addition to any specific recommendations given for controls of risks to health, safety and the environment, an assessment of risks must be made to help determine controls appropriate to local circumstances.

Storage
Use properly labelled and closable containers. Keep container tightly closed in a dry, well-ventilated place away from direct sunlight and other sources of heat or ignition. All tanks/equipment must be earthed/bonded. Keep in a bunded area. Do not smoke in storage areas.

Storage Temperatures
Ambient.

Product Transfer
Electrostatic charges may be generated during pumping. Ensure electrical continuity by bonding all equipment. Avoid splash filling.

Recommended Materials
For containers or container linings, use mild steel or stainless steel. For container paints use zinc silicate. Aluminium may also be used for applications where it does not present an unnecessary fire hazard. For seals and gaskets, use compressed asbestos fibre, PTFE, Viton A, Viton B.

Unsuitable Materials
Materials for the construction of facilities for storing, handling and distributing this product should neither present unnecessary safety hazards nor adversely affect its quality. Examples of materials to avoid are: copper, copper alloys (ferrous and non-ferrous), zinc, zinc alloys. Synthetic materials such as plastics and fibreglass may also be unsuitable, depending on the material specification and intended use. Materials for packages, containers (including containers for the retention or dispatch of samples) and container linings must not adversely affect the quality of the product. They must be impermeable and must not be weakened or otherwise affected by the product. Examples of materials to avoid are: natural rubber, polymethyl methacrylate, polystyrene, polyvinyl chloride, polyisobutylene. Polyethylene and polypropylene are also unsuitable unless they are high density types which have been specifically tested for compatibility with this product.

Other Information
Avoid the use of plastic containers for draining or sampling purposes. Never siphon by mouth.

8. EXPOSURE CONTROLS, PERSONAL PROTECTION

Exposure Limits
No Exposure Limit Established

Body Protection
Minimise all forms of skin contact. Overalls and shoes with oil resistant soles should be worn. Launder overalls and undergarments regularly.

Environmental Exposure Controls
Minimise release to the environment. An environmental assessment must be made to ensure compliance with local environmental legislation.

9. PHYSICAL AND CHEMICAL PROPERTIES

Colour
Colourless.

Physical State
Liquid at ambient temperature.

Odour
Characteristic.

pH Value
Data not available.

Vapour Pressure
< 1 kPa at 20°C.

Initial Boiling Point
circa 158°C.

Final Boiling Point
circa 196°C.

Solubility in Water
Negligible.

Density
circa 770 kg/m3 at 15°C.

Flash Point
circa 40°C. (Tag closed test).

Flammable Limits - Upper
circa 6%(V/V).

Flammable Limits - Lower
circa 1%(V/V).

Auto-Ignition Temperature
Data not available.

Kinematic Viscosity
circa 1.15 mm2/s at 15°C.

Evaporation Rate
Data not available.

Vapour Density (Air=1)
> 4.5 at 15°C.

Partition co-efficient, n-octanol/water
Data not available.

Pour Point
Data not available.

10. STABILITY AND REACTIVITY

Stability
Stable.

Conditions to Avoid
Heat, flames and sparks.

Materials to Avoid
Strong oxidizing agents.

Hazardous Decomposition Products
Hazardous decomposition products are not expected to form during normal storage.

11. TOXICOLOGICAL INFORMATION

Basis for Assessment
Toxicological data have not been determined specifically for this product. Information given is based on a knowledge of the components and the toxicology of similar products.

Acute Toxicity - Oral
LD50 > 2000 mg/kg. Ingestion can lead to vomiting and aspiration into the lungs, which can result in chemical pneumonitis, which can be fatal.

Acute Toxicity - Dermal
LD50 > 2000 mg/kg.

Acute Toxicity - Inhalation
LC50 > 5 mg/l. Vapours may cause drowsiness and dizziness.

Eye Irritation
Not expected to be irritating.

Skin Irritation
Expected to be slightly irritating. Repeated exposure may cause skin dryness or cracking.

Respiratory Irritation
If mists are inhaled, slight irritation of the respiratory tract may occur.

Skin Sensitisation
Not a skin sensitizer.

Carcinogenicity
Components are not known to be associated with carcinogenic effects.

Mutagenicity
Not considered to be a mutagenic hazard.

Reproductive Toxicity

Not considered to be toxic to reproduction.

Other Information
Prolonged/repeated contact may cause defatting of the skin which can lead to dermatitis in some individuals.

12. ECOLOGICAL INFORMATION

Basis for Assessment
Ecotoxicological data have not been determined specifically for this product. Information given is based on a knowledge of the components and the ecotoxicology of similar products.

Mobility
Liquid under most environmental conditions. Floats on water. Contains volatile components. Partly evaporates from water or soil surfaces, but a significant proportion will remain after one day. Large volumes may penetrate soil and could contaminate groundwater.

Persistence / Degradability
Not expected to be readily biodegradable. Major constituents are expected to be inherently biodegradable, but the product contains components that may persist in the environment. Oxidises rapidly by photochemical reactions in air.

Bioaccumulation
Has the potential to bioaccumulate.

Ecotoxicity
Poorly soluble mixture. May cause physical fouling of aquatic organisms. Product is expected to be toxic to aquatic organisms, LL/EL50 1 -10 mg/l. (LL/EL50 expressed as the nominal amount of product required to prepare aqueous test extract).

Other Adverse Effects
Not expected to have ozone depletion potential, photochemical ozone creation potential or global warming potential.

13. DISPOSAL CONSIDERATIONS

Precautions
Refer to Section 7 before handling the product or containers.

Waste Disposal
Recycle or dispose of in accordance with prevailing regulations, with a recognised collector or contractor. The competence of the contractor to deal satisfactorily with this type of product should be established beforehand. Recover or recycle if possible. Otherwise incineration. Do not pollute the soil, water or environment with the waste product.

Product Disposal
As for waste disposal.

Container Disposal
Drums should be emptied and returned to the supplier or sent to a drum re-conditioner without removing or defacing markings or labels. Drain container thoroughly. After draining, vent in a safe place away from sparks and fire. Residues may cause an explosion hazard. Do not puncture cut or weld uncleaned drums. Recycle or dispose of in accordance with the legislation in force with a recognised collector or contractor.

14. TRANSPORT INFORMATION

15. REGULATORY INFORMATION

EC Symbols
Xn N

EC Risk Phrase

R10 Flammable.
R65 Harmful: may cause lung damage if swallowed.
R66 Repeated exposure may cause skin dryness and cracking.
R67 Vapours may cause drowsiness and dizziness
R51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

EC Safety Phrase
S7 Keep container tightly closed.
S16 Keep away from sources of ignition - No smoking.
S29 Do not empty into drains.
S51 Use only in well ventilated areas.
S61 Avoid release to the environment. Refer to special instructions/safety data sheet.
S62 If swallowed, do not induce vomiting; seek medical advice immediately and show this container or label.

EINECS
All components listed or polymer exempt.

METI (Japan)
Not established.

TSCA (USA)
All components listed.

DSL (Canada)
All components listed.

AICS (Australia)
All components listed.

Packaging & Labelling
Stoddard solvent.

Safety data sheet available for professional user on request.

16. OTHER INFORMATION

Revisions Highlighted
No amendments made to information.

Restrictions
This product must not be used in applications other than those for which this type of oil is specified without first consulting the supplier. This product must be used, handled and applied in accordance with the requirements of the equipment manufacturer's manuals, bulletins and other documentation.

List of R Phrases in Section 2
R10 Flammable.
R65 Harmful: may cause lung damage if swallowed.
R66 Repeated exposure may cause skin dryness and cracking.
R51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

Further Information
This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It does not constitute a guarantee for any specific property of the product.

End of SDS