1. IDENTIFICATION OF THE MATERIAL AND SUPPLIER

1.1 Product identifier
Product name          MIL-PRF-7024E; CALIBRATION FLUID II
Synonym(s)            7024E; CALIBRATION FLUID II • CALIBRATION FLUID II

1.2 Uses and uses advised against
Use(s)                AEROSPACE APPLICATIONS • INDUSTRIAL APPLICATIONS • SOLVENT

1.3 Details of the supplier of the safety data sheet
Supplier name         A. S. HARRISON & CO PTY LIMITED
Address               75 Old Pittwater Rd, Brookvale, NSW, Australia, 2100
Telephone             (02) 8978 1000
Fax                   (02) 8978 1050
Email                 ash.sales@harrison.com.au
Website               http://www.asharrison.com.au

1.4 Emergency telephone number(s)
Emergency             1800 009 162

2. HAZARDS IDENTIFICATION

2.1 Classification of the substance or mixture
CLASSIFIED AS HAZARDOUS ACCORDING TO SAFE WORK AUSTRALIA CRITERIA
GHS Classification(s) Flammable Liquids: Category 3
Aspiration Hazard: Category 1
Skin Corrosion/Irritation: Category 2
Serious Eye Damage / Eye Irritation: Category 2A
Acute Toxicity: Inhalation: Category 4
Specific Target Organ Systemic Toxicity (Single Exposure): Category 3

2.2 Label elements
Signal word           DANGER
Pictograms

Hazard statement(s)
H226                  Flammable liquid and vapour.
H304                  May be fatal if swallowed and enters airways.
H315                  Causes skin irritation.
H319                  Causes serious eye irritation.
H332                  Harmful if inhaled.
H335                  May cause respiratory irritation.

Prevention statement(s)
P210                   Keep away from heat/sparks/open flames/hot surfaces. No smoking.
P233                   Keep container tightly closed.
P240                   Ground/bond container and receiving equipment.
P241                   Use explosion-proof electrical/ventilating/lighting equipment.
P243                   Take precautionary measures against static discharge.
P261                   Avoid breathing dust/fume/gas/mist/vapours/spray.
P264                   Wash thoroughly after handling.
P271                   Use only outdoors or in a well-ventilated area.
Product name: MIL-PRF-7024E; CALIBRATION FLUID II

Wear protective gloves/protective clothing/eye protection/face protection.

Response statement(s)

IF SWALLOWED: Immediately call a POISON CENTER or doctor/physician.

IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower.

IF INHALED: Remove to fresh air and keep at rest in a position comfortable for breathing.

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

Call a POISON CENTER or doctor/physician if you feel unwell.

Specific treatment is advised - see first aid instructions.

Do NOT induce vomiting.

Take off contaminated clothing and wash before re-use.

In case of fire: Use appropriate media for extinction.

3. COMPOSITION/ INFORMATION ON INGREDIENTS

3.1 Substances / Mixtures

<table>
<thead>
<tr>
<th>Ingredient</th>
<th>CAS number</th>
<th>EC number</th>
<th>Content</th>
</tr>
</thead>
<tbody>
<tr>
<td>SOLVENT NAPHTHA (PETROLEUM), MEDIUM ALIPHATIC</td>
<td>64742-88-7</td>
<td>265-191-7</td>
<td>&gt;90%</td>
</tr>
<tr>
<td>1,2,4-TRIMETHYLBENZENE</td>
<td>95-63-6</td>
<td>202-436-9</td>
<td>&lt;5%</td>
</tr>
</tbody>
</table>

4. FIRST AID MEASURES

4.1 Description of first aid measures

Eye: If in eyes, hold eyelids apart and flush continuously with running water. Continue flushing until advised to stop by a Poisons Information Centre, a doctor, or for at least 15 minutes.

Inhalation: If inhaled, remove from contaminated area. To protect rescuer, use a Type A (Organic vapour) respirator or an Air-line respirator (in poorly ventilated areas). Apply artificial respiration if not breathing.

Skin: If skin or hair contact occurs, remove contaminated clothing and flush skin and hair with running water. Continue flushing with water until advised to stop by a Poisons Information Centre or a doctor.

Ingestion: For advice, contact a Poison Information Centre on 13 11 26 (Australia Wide) or a doctor (at once). If swallowed, do not induce vomiting.

First aid facilities: Eye wash facilities and safety shower should be available.

4.2 Most important symptoms and effects, both acute and delayed

No information provided.

4.3 Immediate medical attention and special treatment needed

Treat symptomatically.

5. FIREFIGHTING MEASURES

5.1 Extinguishing media

Dry agent, carbon dioxide or foam. Prevent contamination of drains and waterways.

5.2 Special hazards arising from the substance or mixture

Flammable. May evolve carbon oxides and hydrocarbons when heated to decomposition. Eliminate all ignition sources including cigarettes, open flames, spark producing switches, heaters, naked lights, pilot lights, etc when handling. Earth containers when dispensing fluids.
Product name: MIL-PRF-7024E; CALIBRATION FLUID II

5.3 Advice for firefighters
Evacuate area and contact emergency services. Toxic gases may be evolved in a fire situation. Remain upwind and notify those downwind of hazard. Wear full protective equipment including Self Contained Breathing Apparatus (SCBA) when combating fire. Use waterfog to cool intact containers and nearby storage areas.

5.4 Hazchem code
- 3Y
  - Alcohol Resistant Foam is the preferred firefighting medium. Else use;
  - 3 Normal Foam (protein based foam that is not alcohol resistant).
  - Y Risk of violent reaction or explosion. Wear full fire kit and breathing apparatus. Contain spill and run-off.

6. ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, protective equipment and emergency procedures
Wear Protective Equipment (PPE) as detailed in section 8 of the SDS. Clear area of all unprotected personnel. Ventilate area where possible. Contact emergency services where appropriate.

6.2 Environmental precautions
Prevent product from entering drains and waterways.

6.3 Methods of cleaning up
Contain spillage, then cover / absorb spill with non-combustible absorbent material (vermiculite, sand, or similar), collect and place in suitable containers for disposal.

6.4 Reference to other sections
See Sections 8 and 13 for exposure controls and disposal.

7. HANDLING AND STORAGE

7.1 Precautions for safe handling
Before use carefully read the product label. Use of safe work practices are recommended to avoid eye or skin contact and inhalation. Observe good personal hygiene, including washing hands before eating. Prohibit eating, drinking and smoking in contaminated areas.

7.2 Conditions for safe storage, including any incompatibilities
Store tightly sealed in a cool, dry, well ventilated area, removed from incompatible substances, heat or ignition sources and foodstuffs. Ensure containers are adequately labelled, protected from physical damage and sealed when not in use. Check regularly for leaks or spills. Large storage areas should be bunded and have appropriate fire protection and ventilation systems.

7.3 Specific end use(s)
No information provided.

8. EXPOSURE CONTROLS/ PERSONAL PROTECTION

8.1 Control parameters

<table>
<thead>
<tr>
<th>Substance</th>
<th>Reference</th>
<th>TWA ppm</th>
<th>TWA mg/m³</th>
<th>STEL ppm</th>
<th>STEL mg/m³</th>
</tr>
</thead>
<tbody>
<tr>
<td>1,2,4-Trimethylbenzene (as Trimethyl benzene)</td>
<td>SWA (AUS)</td>
<td>25</td>
<td>123</td>
<td>--</td>
<td>--</td>
</tr>
</tbody>
</table>

Biological limits
No biological limit values have been entered for this product.

8.2 Exposure controls

Engineering Controls
Avoid inhalation. Use in well ventilated areas. Where an inhalation risk exists, mechanical extraction ventilation is recommended. Flammable/ explosive vapours may accumulate in poorly ventilated areas. Vapours are heavier than air and may travel some distance to an ignition source and flash back. Maintain...
Product name: MIL-PRF-7024E; CALIBRATION FLUID II

vapour levels below the recommended exposure standard.

PPE

| Eye/Face        | Wear splash-proof goggles. |
| Hand           | Wear nitrile or neoprene gloves. |
| Body           | When using large quantities or where heavy contamination is likely, wear coveralls. |
| Respiratory    | Where an inhalation risk exists, wear a Type A (Organic vapour) respirator. |

9. PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic physical and chemical properties

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appearance</td>
<td>CLEAR COLOURLESS LIQUID</td>
</tr>
<tr>
<td>Odour</td>
<td>MILD ODOUR</td>
</tr>
<tr>
<td>Odour Threshold</td>
<td>NOT AVAILABLE</td>
</tr>
<tr>
<td>pH</td>
<td>NOT AVAILABLE</td>
</tr>
<tr>
<td>Melting Point</td>
<td>NOT AVAILABLE</td>
</tr>
<tr>
<td>Boiling Point</td>
<td>154°C to 181°C</td>
</tr>
<tr>
<td>Flash Point</td>
<td>40°C (cc)</td>
</tr>
<tr>
<td>Evaporation Rate</td>
<td>NOT AVAILABLE</td>
</tr>
<tr>
<td>Flammability</td>
<td>FLAMMABLE</td>
</tr>
<tr>
<td>Upper Explosion Limit</td>
<td>NOT AVAILABLE</td>
</tr>
<tr>
<td>Lower Explosion Limit</td>
<td>1.0 %</td>
</tr>
<tr>
<td>Vapour Pressure</td>
<td>NOT AVAILABLE</td>
</tr>
<tr>
<td>Vapour Density</td>
<td>4.7 (Air = 1)</td>
</tr>
<tr>
<td>Solubility (water)</td>
<td>INSOLUBLE</td>
</tr>
<tr>
<td>Partition Coefficient</td>
<td>NOT AVAILABLE</td>
</tr>
<tr>
<td>Autoignition Temperature</td>
<td>278°C</td>
</tr>
<tr>
<td>Decomposition Temperature</td>
<td>NOT AVAILABLE</td>
</tr>
<tr>
<td>Viscosity</td>
<td>NOT AVAILABLE</td>
</tr>
<tr>
<td>Explosive Properties</td>
<td>NOT AVAILABLE</td>
</tr>
<tr>
<td>Oxidising Properties</td>
<td>NOT AVAILABLE</td>
</tr>
<tr>
<td>Specific Gravity</td>
<td>0.771</td>
</tr>
</tbody>
</table>

9.2 Other information

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>% Volatiles</td>
<td>NOT AVAILABLE</td>
</tr>
</tbody>
</table>
Product name  MIL-PRF-7024E; CALIBRATION FLUID II

10. STABILITY AND REACTIVITY

10.1 Reactivity
Carefully review all information in sections 10.2 to 10.6.

10.2 Chemical stability
Stable under recommended conditions of storage.

10.3 Possibility of hazardous reactions
Polymerization will not occur.

10.4 Conditions to avoid
Avoid heat, sparks, open flames and other ignition sources.

10.5 Incompatible materials
Incompatible with oxidising agents (e.g. hypochlorites), acids (e.g. nitric acid), alkalis (e.g. sodium hydroxide), heat and ignition sources. May evolve carbon oxides and hydrocarbons when heated to decomposition.

11. TOXICOLOGICAL INFORMATION

11.1 Information on toxicological effects

Health hazard summary
May be harmful - irritant. This product has the potential to cause adverse health effects with over exposure. Chronic exposure to some solvents may result in anaemia and liver, kidney and central nervous system (CNS) damage.

Eye
Irritant. Contact may result in irritation, lacrimation, pain and redness. May result in burns with prolonged contact.

Inhalation
Irritant. Over exposure to vapours may result in respiratory irritation, nausea, dizziness and headache. High level exposure may result in drowsiness and breathing difficulties. Chronic exposure may result in liver, kidney and CNS damage.

Skin
Irritant. Contact may result in drying and defatting of the skin, rash and dermatitis. May be absorbed through skin with harmful effects.

Ingestion
May be harmful. Ingestion may result in nausea, vomiting, abdominal pain, dizziness, fatigue and diarrhoea. Ingestion of large quantities may result in liver and kidney damage, and unconsciousness. Aspiration or inhalation may cause chemical pneumonitis and pulmonary oedema.

Toxicity data
1,2,4-TRIMETHYLBENZENE (95-63-6)
LC50 (Inhalation): 18 g/m^3/4hrs (rat)
LD50 (Ingestion): 5 g/kg (rat)
Product name: MIL-PRF-7024E; CALIBRATION FLUID II

12. ECOLOGICAL INFORMATION

12.1 Toxicity
No information provided.

12.2 Persistence and degradability
No information provided.

12.3 Bioaccumulative potential
No information provided.

12.4 Mobility in soil
No information provided.

12.5 Results of PBT and vPvB assessment
No information provided.

12.6 Other adverse effects
Aliphatic hydrocarbons behave differently in the environment depending on their size. WATER: Light aliphatics volatilise rapidly from water (half life - few hours). Bioconcentration should not be significant. SOIL: Light aliphatics biodegrade quickly in soil and water, heavy aliphatics biodegrade very slowly. ATMOSPHERE: Vapour-phase aliphatics will degrade by reaction with hydroxyl radicals.

13. DISPOSAL CONSIDERATIONS

13.1 Waste treatment methods

Waste disposal
For small amounts, absorb with sand, vermiculite or similar and dispose of to an approved landfill site. Contact the manufacturer/supplier for additional information if disposing of large quantities (if required). Prevent contamination of drains and waterways as aquatic life may be threatened and environmental damage may result.

Legislation
Dispose of in accordance with relevant local legislation.

14. TRANSPORT INFORMATION

CLASSIFIED AS A DANGEROUS GOOD BY THE CRITERIA OF THE ADG CODE

<table>
<thead>
<tr>
<th>Land Transport (ADG)</th>
<th>Sea Transport (IMDG/IMO)</th>
<th>Air Transport (IATA/ICAO)</th>
</tr>
</thead>
<tbody>
<tr>
<td>14.1 UN number</td>
<td>1268</td>
<td>1268</td>
</tr>
<tr>
<td>14.2 UN proper shipping name</td>
<td>PETROLEUM DISTILLATES, N.O.S. or PETROLEUM PRODUCTS, N.O.S.</td>
<td></td>
</tr>
<tr>
<td>14.3 Transport hazard classes</td>
<td></td>
<td></td>
</tr>
<tr>
<td>DG Class</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Subsidiary risk(s)</td>
<td>None Allocated</td>
<td>-</td>
</tr>
<tr>
<td>14.4 Packing group</td>
<td>III</td>
<td>III</td>
</tr>
<tr>
<td>14.5 Environmental hazards</td>
<td></td>
<td>None Allocated</td>
</tr>
<tr>
<td>14.6 Special precautions for user</td>
<td></td>
<td>F-E, S-E</td>
</tr>
<tr>
<td>Hazchem Code</td>
<td>●3Y</td>
<td></td>
</tr>
<tr>
<td>EMS</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
15. REGULATORY INFORMATION

15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture

Poison schedule
Classified as a Schedule 5 Poison using the criteria in the Standard for the Uniform Scheduling of Medicines and Poisons (SUSMP).

Classifications
F - Flammable
Xi - Irritant
Xn - Harmful

Risk phrases
R10: Flammable.
R20: Harmful by inhalation.
R36/37/38: Irritating to eyes, respiratory system and skin.
R65: Harmful: May cause lung damage if swallowed.

Safety phrases
S16: Keep away from sources of ignition - No smoking.
S26: In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.
S45: In case of accident or if you feel unwell seek medical advice immediately (show the label where possible).
S53: Avoid exposure - obtain special instructions before use.

Inventory listing(s)
AUSTRALIA: AICS (Australian Inventory of Chemical Substances)
All components are listed on AICS, or are exempt.

15.2 Chemical safety assessment
No information provided.

16. OTHER INFORMATION

Additional information
WORK PRACTICES - SOLVENTS: Organic solvents may present both a health and flammability hazard. It is recommended that engineering controls should be adopted to reduce exposure where practicable (for example, if using indoors, ensure explosion proof extraction ventilation is available). Flammable or combustible liquids with explosive limits have the potential for ignition from static discharge. Refer to AS 1020 (The control of undesirable static electricity) and AS 1940 (The storage and handling of flammable and combustible liquids) for control procedures.

WORKPLACE CONTROLS AND PRACTICES: Unless a less toxic chemical can be substituted for a hazardous substance, ENGINEERING CONTROLS are the most effective way of reducing exposure. The best protection is to enclose operations and/or provide local exhaust ventilation at the site of chemical release. Isolating operations can also reduce exposure. Using respirators or protective equipment is less effective than the controls mentioned above, but is sometimes necessary.

HEALTH EFFECTS FROM EXPOSURE:
It should be noted that the effects from exposure to this product will depend on several factors including: frequency and duration of use; quantity used; effectiveness of control measures; protective equipment used and method of application. Given that it is impractical to prepare a ChemAlert report which would encompass all possible scenarios, it is anticipated that users will assess the risks and apply control methods where appropriate.

PERSONAL PROTECTIVE EQUIPMENT GUIDELINES:
The recommendation for protective equipment contained within this report is provided as a guide only. Factors such as method of application, working environment, quantity used, product concentration and the availability of engineering controls should be considered before final selection of personal protective equipment is made.

Abbreviations
ACGIH American Conference of Governmental Industrial Hygienists
**MIL-PRF-7024E; CALIBRATION FLUID II**

- **CAS #** Chemical Abstract Service number - used to uniquely identify chemical compounds
- **CNS** Central Nervous System
- **EC No.** EC No - European Community Number
- **EMS** Emergency Schedules (Emergency Procedures for Ships Carrying Dangerous Goods)
- **GHS** Globally Harmonized System
- **GTEPG** Group Text Emergency Procedure Guide
- **IARC** International Agency for Research on Cancer
- **LC50** Lethal Concentration, 50% / Median Lethal Concentration
- **LD50** Lethal Dose, 50% / Median Lethal Dose
- **mg/m³** Milligrams per Cubic Metre
- **OEL** Occupational Exposure Limit
- **pH** relates to hydrogen ion concentration using a scale of 0 (high acidic) to 14 (highly alkaline).
- **ppm** Parts Per Million
- **STEL** Short-Term Exposure Limit
- **STOT-RE** Specific target organ toxicity (repeated exposure)
- **STOT-SE** Specific target organ toxicity (single exposure)
- **SUSMP** Standard for the Uniform Scheduling of Medicines and Poisons
- **SWA** Safe Work Australia
- **TLV** Threshold Limit Value
- **TWA** Time Weighted Average

**Report Status**

This ChemAlert report has been independently compiled by RMT’s scientific department utilising the original Safety Data Sheet (“SDS”) for the product provided to RMT by the manufacturer. The information is based on the latest chemical and toxicological research and is believed to represent the current state of knowledge as to the appropriate safety and handling precautions for the product at the time of issue. It is an independent collation by RMT of information obtained from the original SDS for this product. Its content has not been authorised or verified by the manufacturer / distributor of the chemical to which it relates.

This ChemAlert report does not constitute the manufacturer’s original SDS and is not intended to be a replacement for same. It is provided to subscribers of ChemAlert as a reference tool only, is not all-inclusive and does not represent any guarantee as to the properties of the product. Further clarification regarding any aspect of the product should be obtained directly from the manufacturer.

While RMT has taken all due care to include accurate and up-to-date information in this ChemAlert report, it does not provide any warranty as to accuracy or completeness. As far as lawfully possible, RMT accepts no liability for any loss, injury or damage (including consequential loss) which may be suffered or incurred by any person as a consequence of their reliance on the information contained in this ChemAlert report.

**Prepared By**

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**Based on SDS dated:** 04 Mar 2013

End of Report