## 1. Identification

| Product identifier | HFE-150 |
| :--- | :--- |
| Other means of identification | None. |
| Recommended use | Asphalt emulsion |
| Recommended restrictions | None known. |
| Manufacturer/Importer/Supplier/Distributor information  <br> Manufacturer: Ergon Asphalt \& Emulsions, Inc. <br> Address: 2829 Lakeland Drive <br>  Jackson, MS 39232 <br> Website: www.ergonasphalt.com <br> Telephone: $1-800-222-7122$ (Customer Service) <br> E-mail: sds@ergon.com <br> 24 hour Emergency North America 1-800-424-9300; International 1-703-527-3887 <br> (CHEMTREC):  |  |

## 2. Hazard(s) identification

Physical hazards
Health hazards

Environmental hazards
OSHA defined hazards
Label elements

## Signal word

Hazard statement

Precautionary statement
Prevention

Response
Storage
Disposal
Hazard(s) not otherwise classified (HNOC)
Supplemental information

Not classified.
Carcinogenicity Category 1

Reproductive toxicity Category 2
Specific target organ toxicity, repeated Category 2 exposure

Not classified.
Not classified.

Danger
May cause cancer. Suspected of damaging fertility or the unborn child. May cause damage to organs through prolonged or repeated exposure.

Wear protective gloves/protective clothing/eye protection/face protection. Obtain special instructions before use. Do not eat, drink or smoke when using this product. Do not handle until all safety precautions have been read and understood. Do not breathe vapor. Wash thoroughly after handling. Contaminated work clothing should not be allowed out of the workplace. Keep container tightly closed.
IF exposed or concerned: Get medical advice/attention.
Store locked up.
Dispose of contents/container in accordance with local/regional/national/international regulations.
None known.

Vapors containing hydrogen sulfide may accumulate during storage or transport. HYDROGEN SULFIDE (H2S) can be harmful if inhaled.

## 3. Composition/information on ingredients

## Mixtures

| Chemical name | Common name and synonyms | CAS number |
| :--- | :---: | :---: |
| ASPHALT | $8052-42-4$ | \% |
| Material name: $\mathrm{HFE}-150$ | $50-70$ |  |
| 6989 Version \#: 01 | Issue date: $05-26-2020$ |  |


| Chemical name | Common name and synonyms | CAS number | \% |
| :--- | :---: | :---: | :---: |
| WATER | $7732-18-5$ | $20-40$ |  |
| Petroleum Distillates | TSCA Listed | $3-5$ |  |

## 4. First-aid measures

## Inhalation

## Skin contact

## Eye contact

## Ingestion

## Most important symptoms/effects, acute and delayed <br> Indication of immediate medical attention and special treatment needed <br> General information

If breathing is difficult, remove to fresh air and keep at rest in a position comfortable for breathing. Call a physician if symptoms develop or persist.
If clothing sticks to the skin, do not remove. Lotion or hand cream may aid in the removal of asphalt. Wash contact areas with soap and water. If needed, seek medical attention.
Immediately flush eyes with plenty of water for at least 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Get medical attention if irritation develops and persists.
Rinse mouth. DO NOT induce vomiting. Get medical attention immediately. If ingestion of a large amount does occur, call a poison control center immediately.
Direct contact with eyes may cause temporary irritation.

Treat symptomatically.

Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves.

## 5. Fire-fighting measures

Suitable extinguishing media
Unsuitable extinguishing media
Specific hazards arising from the chemical
Special protective equipment
and precautions for
firefighters
Fire fighting
equipment/instructions
Specific methods
General fire hazards

Foam. Dry chemical powder. Carbon dioxide (CO2).
Water. Do not use water jet as an extinguisher, as this will spread the fire.

During fire, gases hazardous to health may be formed.

Firefighters must use standard protective equipment including flame retardant coat, helmet with face shield, gloves, rubber boots, and in enclosed spaces, SCBA. Structural firefighters protective clothing will only provide limited protection.
ALWAYS stay away from tanks engulfed in flame. Fight fire from maximum distance or use unmanned hose holders or monitor nozzles. Move containers from fire area if you can do so without risk. In the event of fire, cool tanks with water spray.
In the event of fire and/or explosion do not breathe fumes. In the event of fire, cool tanks with water spray.
No unusual fire or explosion hazards noted.

## 6. Accidental release measures

Personal precautions, protective equipment and emergency procedures

Methods and materials for containment and cleaning up

Keep unnecessary personnel away. Keep people away from and upwind of spill/leak. Keep out of low areas. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Ventilate closed spaces before entering them. For personal protection, see section 8 of the SDS.
This product is miscible in water.
Large Spills: Stop the flow of material, if this is without risk. Dike the spilled material, where this is possible. Cover with plastic sheet to prevent spreading. Absorb in vermiculite, dry sand or earth and place into containers. Prevent entry into waterways, sewer, basements or confined areas.

Small Spills: Wipe up with absorbent material (e.g. cloth, fleece). Clean surface thoroughly to remove residual contamination.

Never return spills to original containers for re-use. Absorb or cover with dry earth, sand or other non-combustible material and transfer to containers. Ventilate area and avoid breathing vapors or mist. For large spills, dike far ahead of liquid spill for later disposal. Do not release into sewers or waterways.

## Environmental precautions

Avoid discharge into drains, water courses or onto the ground.

## 7. Handling and storage

Precautions for safe handling

Conditions for safe storage, including any incompatibilities

Avoid prolonged exposure. Use only in well-ventilated areas. Hydrogen sulfide, a very highly toxic gas, may be present with this material. Keep face clear of tank and/or tank car openings. Good personal hygiene is necessary. Wash hands and contaminated areas with water and soap before leaving the work site.
Prevent electrostatic charge build-up by using common bonding and grounding techniques. Store in original tightly closed container. Store in a well-ventilated place. Do not allow material to freeze.

## 8. Exposure controls/personal protection

## Occupational exposure limits

US. ACGIH Threshold Limit Values

| Components | Type | Value | Form |
| :--- | :--- | :--- | :--- |
| ASPHALT (CAS 8052-42-4) | TWA | $0.5 \mathrm{mg} / \mathrm{m3}$ | Inhalable fume. |
| Petroleum Distillates | TWA | $200 \mathrm{mg} / \mathrm{m} 3$ | Non-aerosol. |


| US. NIOSH: Pocket Guide to Chemical Hazards <br> Type | Value | Form |  |
| :--- | :--- | :--- | :--- |
| ASPHALT (CAS 8052-42-4) | Ceiling | $5 \mathrm{mg} / \mathrm{m} 3$ | Fume. |
| Petroleum Distillates | TWA | $100 \mathrm{mg} / \mathrm{m3}$ |  |

Biological limit values No biological exposure limits noted for the ingredient(s).
Exposure guidelines
US ACGIH Threshold Limit Values: Skin designation
Petroleum Distillates (CAS TSCA Listed) Can be absorbed through the skin.

Appropriate engineering | Provide adequate ventilation, including appropriate local extraction, to ensure that the defined |
| :--- |
| controls | occupational exposure limit is not exceeded.

Individual protection measures, such as personal protective equipment
Eye/face protection Wear safety glasses; chemical goggles (if splashing is possible).
Skin protection
Hand protection Chemical resistant gloves are recommended. If contact with forearms is likely wear gauntlet style gloves.
Other Wear appropriate clothing to prevent any possibility of liquid contact and repeated or prolonged vapor contact. Plastic or rubber gloves, apron and boots.
Respiratory protection
When workers are facing concentrations above the exposure limit they must use appropriate certified respirators.

Thermal hazards
General hygiene
considerations
Wear appropriate thermal protective clothing, when necessary.
Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing and protective equipment to remove contaminants.

## 9. Physical and chemical properties

| Appearance | Brown to black in color. |
| :--- | :--- |
| $\quad$ Physical state | Liquid. |
| Form | Liquid. |
| Color | Brown. to Black. |
| Odor | Tar-like |
| Odor threshold | Not available. |
| pH | $9-11$ |
| Melting point/freezing point | Not available. |
| Initial boiling point and | $212^{\circ} \mathrm{F}\left(100^{\circ} \mathrm{C}\right)$ |
| boiling range |  |
| Flash point | $>212.0^{\circ} \mathrm{F}\left(>100.0^{\circ} \mathrm{C}\right)$ Cleveland Open Cup |
| Evaporation rate | $<1$ |
| Flammability (solid, gas) | Not available. |


| Upper/lower flammability or explosive limits |  |
| :---: | :---: |
| Flammability limit - lower (\%) | 0.7 \% |
| Flammability limit upper (\%) | 5 \% |
| Explosive limit - lower (\%) | Not available. |
| Explosive limit - upper (\%) | Not available. |
| Vapor pressure | < 1 mm Hg @ 70 F |
| Vapor density | > 1 |
| Relative density | Not available. |
| Solubility(ies) |  |
| Solubility (water) | Slightly Soluble |
| Partition coefficient (n-octanol/water) | Not available. |
| Auto-ignition temperature | $>444{ }^{\circ} \mathrm{F}\left(>228.89{ }^{\circ} \mathrm{C}\right)$ |
| Decomposition temperature | Not available. |
| Viscosity | Not available. |
| Other information |  |
| Density | $8.39 \mathrm{lb} / \mathrm{gal}$ |
| Specific gravity | 1.01 |

## 10. Stability and reactivity

Reactivity
Chemical stability
Possibility of hazardous reactions
Conditions to avoid

Incompatible materials
Hazardous decomposition products

The product is stable and non-reactive under normal conditions of use, storage and transport Stable under normal temperature conditions.
Hazardous polymerization does not occur.

Avoid temperatures exceeding the flash point. Contact with incompatible materials. Do not overheat product.
Strong oxidizing agents.
Upon decomposition, this product may yield sulfur dioxide, carbon monoxide, carbon dioxide and/or low molecular weight hydrocarbons. Hydrogen sulfide.

## 11. Toxicological information

Information on likely routes of exposure
Inhalation Prolonged inhalation may be harmful.
Skin contact No adverse effects due to skin contact are expected.
Eye contact Harmful in contact with eyes.
Ingestion
Expected to be a low ingestion hazard.
Symptoms related to the
Direct contact with eyes may cause temporary irritation.
physical, chemical and
toxicological characteristics
Information on toxicological effects
Acute toxicity Not available.
Skin corrosion/irritation Prolonged skin contact may cause temporary irritation.
Serious eye damage/eye Harmful in contact with eyes. None known.

## irritation

Respiratory or skin sensitization
Respiratory sensitization Not available.
Skin sensitization May cause skin disorders if contact is repeated or prolonged.
Germ cell mutagenicity $\quad$ No data available to indicate product or any components present at greater than $0.1 \%$ are mutagenic or genotoxic.

| Carcinogenicity | Risk of cancer cannot be excluded with prolonged exposure. IARC: occ straight-run bitumens and their emissions during road paving are "poss humans" (Group 2B). |
| :---: | :---: |
| IARC Monographs. Overall Evaluation of Carcinogenicity |  |
| ASPHALT (CAS 8052-42-4) OSHA Specifically Regulate | 2B Possibly carcinogenic to humans. Substances (29 CFR 1910.1001-1052) |
| Not regulated. <br> US. National Toxicology | gram (NTP) Report on Carcinogens |
| Not listed. |  |
| Reproductive toxicity | Not classified. |
| Specific target organ toxicity - single exposure | Not classified. |
| Specific target organ toxicity - repeated exposure | Not classified. |
| Aspiration hazard | Not available. |
| Chronic effects | Prolonged exposure may cause chronic effects. |
| Further information | This product has no known adverse effect on human health. |

## 12. Ecological information

Ecotoxicity
Product

Not expected to be harmful to aquatic organisms.

HFE-150
Aquatic

| Crustacea | EC50 | Daphnia |
| :--- | :--- | :--- |
| Fish | LC50 | Fish |

* Estimates for product may be based on additional component data not shown.

Persistence and degradability No data is available on the degradability of this product.
Bioaccumulative potential No data available.
Mobility in soil
Other adverse effects

No data available.
No other adverse environmental effects (e.g. ozone depletion, photochemical ozone creation potential, endocrine disruption, global warming potential) are expected from this component.

## 13. Disposal considerations

## Disposal instructions

Local disposal regulations
Hazardous waste code

Waste from residues / unused products

## Contaminated packaging

Collect and reclaim or dispose in sealed containers at licensed waste disposal site. Dispose in accordance with all applicable regulations. No components are identified as hazardous wastes. Disposal recommendations are based on uncontaminated material.
Dispose in accordance with all applicable regulations.
The waste code should be assigned in discussion between the user, the producer and the wast disposal company. Not applicable.
Dispose of in accordance with local regulations. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe manner (see: Disposal instructions). Avoid discharge into water courses or onto the ground.
Empty containers should be taken to an approved waste handling site for recycling or disposal. Since emptied containers may retain product residue, follow label warnings even after container is emptied.

## 14. Transport information

DOT
Not regulated as dangerous goods.

## IATA

Not regulated as dangerous goods.
IMDG
Not regulated as dangerous goods.
Transport in bulk according to Not available.
Annex II of MARPOL 73/78
and the IBC Code

## 15. Regulatory information

US federal regulations All components are on the U.S. EPA TSCA Inventory List.
TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)
Not regulated.
CERCLA Hazardous Substance List (40 CFR 302.4)
ASPHALT (CAS 8052-42-4)
Listed.
SARA 304 Emergency release notification
Not regulated.
OSHA Specifically Regulated Substances (29 CFR 1910.1001-1052)
Not regulated.

## Superfund Amendments and Reauthorization Act of 1986 (SARA)

SARA 302 Extremely hazardous substance
Not listed.
SARA 313 (TRI reporting)
Not regulated.

## Other federal regulations

Clean Air Act (CAA) Section 112 Hazardous Air Pollutants (HAPs) List
Not regulated.
Clean Air Act (CAA) Section 112(r) Accidental Release Prevention (40 CFR 68.130)
Not regulated.
Safe Drinking Water Act Not regulated.
(SDWA)
US state regulations WARNING: This product contains a chemical known to the State of California to cause cancer.
California Proposition 65

WARNING: WARNING: This product contains a chemical known to the State of California to cause cancer.

## California Proposition 65 - CRT: Listed date/Carcinogenic substance <br> ASPHALT (CAS 8052-42-4) Listed: January 1, 1990

US. California. Candidate Chemicals List. Safer Consumer Products Regulations (Cal. Code Regs, tit. 22, 69502.3, subd. (a))
ASPHALT (CAS 8052-42-4)
Petroleum Distillates (CAS TSCA Listed)
International Inventories

| Country(s) or region | Inventory name | On inventory (yes/no)* |
| :--- | :--- | ---: |
| Australia | Australian Inventory of Chemical Substances (AICS) | Yes |
| Canada | Domestic Substances List (DSL) | Yes |
| Canada | Non-Domestic Substances List (NDSL) | No |
| China | Inventory of Existing Chemical Substances in China (IECSC) | Yes |
| Europe | European Inventory of Existing Commercial Chemical Substances | Yes |
|  | (EINECS) | No |
| Europe | European List of Notified Chemical Substances (ELINCS) | No |
| Japan | Inventory of Existing and New Chemical Substances (ENCS) | Yes |
| Korea | Existing Chemicals List (ECL) | Yes |
| New Zealand | New Zealand Inventory | Yes |
| Philippines | Philippine Inventory of Chemicals and Chemical Substances | Yes |
| (PICCS) | Taiwan Chemical Substance Inventory (TCSI) |  |

*A "Yes" indicates that all components of this product comply with the inventory requirements administered by the governing country(s)
A "No" indicates that one or more components of the product are not listed or exempt from listing on the inventory administered by the governing country(s).

## 16. Other information, including date of preparation or last revision

Issue date
Version \#
Further information
NFPA ratings

## References

## Disclaimer

05-26-2020
01
HMIS® is a registered trade and service mark of the NPCA.
Health: 2
Flammability: 1
Instability: 0
ACGIH
EPA: AQUIRE database
NLM: Hazardous Substances Data Base
US. IARC Monographs on Occupational Exposures to Chemical Agents
IARC Monographs. Overall Evaluation of Carcinogenicity
National Toxicology Program (NTP) Report on Carcinogens
ACGIH Documentation of the Threshold Limit Values and Biological Exposure Indices
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