



# MATERIAL SAFETY DATA SHEET

## SAFETY DATA SHEET

Prepared according to 29CFR 1910.1200, Regulation (EC) No. 1272/2008 (GHS) and Canadian Controlled Products Act (CPR)

### SECTION 1: PRODUCT AND COMPANY IDENTIFICATION

<b>PRODUCT NAME:</b>	<i>Ben's 100 EPA Reg. No. 56575-7</i>	<b>HMIS Hazard Rating</b>	
		HEALTH	1
		FLAMMABILITY	1
		REACTIVITY	0
		PERSONAL PROTECTION	X
<b>MSDS Date:</b>	<i>December 19, 2011</i>		
<b>MSDS Revision No.:</b>	<i>New</i>		
<b>USE:</b>	<i>Insect Repellent</i>		
<b>MANUFACTURER:</b>	<i>Tender Corporation</i>		
<b>ADDRESS:</b>	<i>106 Burndy Road Littleton, NH 03561</i>		
<b>INFORMATION CALLS:</b>	<i>800-258-4696</i>		
<b>FAX PHONE:</b>	<i>603-444-6735</i>		
<b>EMERGENCY PHONE:</b>	<i>Spills: Veolia (800) 354-2382 Medical: Poison Control Center Information:(800) 258-4696</i>		

### SECTION 2: HAZARDS IDENTIFICATION

**EMERGENCY OVERVIEW:** *Clear, DEET odor, Non-flammable but combustible, Water soluble, Liquid*

**HAZARD CLASSIFICATION:** *Warning*

**GHS Label elements, including precautionary statements**

*Pictogram*



**Signal word:** *WARNING*

**Hazard statement(s)**

<i>H302</i>	<i>Harmful if swallowed</i>
<i>H319</i>	<i>Causes serious eye irritation</i>
<i>H315</i>	<i>Causes skin irritation</i>
<i>H412</i>	<i>Harmful to aquatic organisms and may cause long-term adverse effects in the aquatic environment</i>

**Precautionary statement(s)**

<i>P102</i>	<i>Keep out of the reach of children</i>
<i>P234</i>	<i>Keep in original container</i>
<i>P305+P351+P338</i>	<i>IF IN EYES; Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing</i>
<i>P301+330+331+315</i>	<i>IF SWALLOWED: Rinse mouth. DO NOT induce vomiting. Get immediate medical advice/attention.</i>
<i>P273</i>	<i>Avoid release to the environment</i>

**ROUTES OF EXPOSURE:** *Dermal, oral*

### POTENTIAL HEALTH EFFECTS

<b>INHALATION:</b>	<i>May cause irritation to lungs</i>
<b>SKIN CONTACT:</b>	<i>Do not use over cuts, wounds or irritated skin Pre-existing skin disorders may be aggravated by exposure</i>
<b>EYE CONTACT:</b>	<i>Prolonged contact may cause irritation, with redness, pain, tearing, blurred vision and conjunctivitis.</i>
<b>INGESTION:</b>	<i>May be harmful if swallowed.</i>



## MATERIAL SAFETY DATA SHEET

### SAFETY DATA SHEET

Prepared according to 29CFR 1910.1200, Regulation (EC) No. 1272/2008 (GHS) and Canadian Controlled Products Act (CPR)

---

#### SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

---

Ingredient	Conc. (%)	CAS NO.	EC NO.	Classification
DEET (N,N-Diethyl-m-toluamide)	>97	134-62-3	205-149-7	WHMIS D2B-Toxic EU-Xn;Xi; R22-36/38 R52-53

See Section 8 – “EXPOSURE CONTROLS/PERSONAL PROTECTION” for exposure guidelines

---

#### SECTION 4: FIRST AID MEASURES

---

<b>INHALATION:</b>	Move victim to fresh air. Apply artificial respiration if indicated. Contact a physician if warranted.
<b>CONTACT WITH SKIN:</b>	Take off contaminated clothing. Immediately wash gently and thoroughly with luke warm, gently flowing water and non-abrasive soap for 15-20 mins. If skin irritation or rash occurs, see a doctor. Thoroughly clean clothing before reuse or dispose of safely.
<b>CONTACT WITH EYES:</b>	Immediately flush the contaminated eye(s) with lukewarm, gently flowing water for 15-20 minutes, while holding the eyelid(s) open. If a contact lens is present, DO NOT delay flushing or attempt to remove the lens. Take care not to rinse contaminated water into the unaffected eye or onto the face. If irritation or pain persists, see a doctor.
<b>INGESTION:</b>	Have victim rinse mouth with water. NEVER give anything by mouth if the victim is rapidly losing consciousness, or is unconscious or convulsing. DO NOT INDUCE VOMITING. Contact a physician if warranted.

---

#### SECTION 5: FIRE-FIGHTING MEASURES

---

**FIRE AND EXPLOSIVE PROPERTIES:** Non Flammable - This product is combustible but not flammable or explosive

Flash Point: >250° C

Flammable Limits: Not applicable

**EXTINGUISHING MEDIA:** Water spray  
Carbon dioxide  
Dry Chemical or foam

**SPECIFIC HAZARDS:** In case of fire, hazardous combustion gases may be formed:  
Carbon monoxide (CO)  
Carbon Dioxide (CO<sub>2</sub>)  
Nitrogen oxides (NO<sub>x</sub>)

**PROTECT EQUIPMENT FOR FIREFIGHTERS:** Use self-contained breathing apparatus and full protective clothing

**FURTHER INFORMATION:** Fire residues and contaminated firefighting water must be disposed of in accordance with local regulations

---

#### SECTION 6: ACCIDENTAL RELEASE MEASURES

---

**PERSONAL PRECAUTIONS:** For Large Spills; isolate the hazard area. Keep out unnecessary and unprotected personnel. Increase ventilation to area or move leaking container to a well-ventilated and secure area. Use the Personal Protective Equipment recommended in Section 8 of this MSDS. Review Section 7 (Handling) of this MSDS before proceeding with cleanup.

**ENVIRONMENTAL PRECAUTIONS:** Do not contaminate water by disposal of wastes

**METHOD FOR CONTAINMENT AND CLEAN-UP:**

Prevent product from entering drains and ventilation systems. Contain and soak up spill with absorbent that does not react with spilled product. Place used absorbent into suitable, covered labeled containers for disposal.

Large Spills: Dike spill product to prevent runoff. Recover contaminated water for appropriate disposal.

Report spills to local health, safety and environmental authorities, as required.



## MATERIAL SAFETY DATA SHEET

### SAFETY DATA SHEET

Prepared according to 29CFR 1910.1200, Regulation (EC) No. 1272/2008 (GHS) and Canadian Controlled Products Act (CPR)

---

#### SECTION 7: HANDLING AND STORAGE

---

**HANDLING:** *Read entire label before using. Use strictly in accordance with label precautionary statements and directions.*

**STORAGE:** *Do not contaminate food or feed.  
Keep product in its original container.  
Keep container tightly closed.  
Store this product in a cool, dry place away from heat or direct sunlight.  
Protect from freezing.*

---

#### SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

---

**ENGINEERING CONTROLS:** *General ventilation is usually adequate. When handling large quantities of concentrated product; Use local exhaust ventilation, if necessary.*

**PERSONAL PROTECTIVE EQUIPMENT (PPE):** *None required.*

#### EXPOSURE GUIDELINES:

INGREDIENT:	CAS NO.	%	ACGIH TLV-TWA	Exposure Limits ACGIH TLV-STEL	OSHA PEL-TWA
-------------	---------	---	---------------	-----------------------------------	--------------

---

#### SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

---

**APPEARANCE:** *Clear liquid*

**ODOR:** *Insecticidal (Deet)*

**pH:** *Not tested*

**BOILING POINT:** *545° F*

**MELTING POINT:** *Not determined*

**RELATIVE DENSITY (H<sub>2</sub>O = 1) @25°C:** *0.992 – 0.999 gm/ml*

**VAPOR PRESSURE (mmHg) @ °C:** *Not applicable*

**VAPOR DENSITY (AIR = 1):** *Not applicable*

**FLASH POINT:** *greater than 250°C*

**SOLUBILITY IN WATER:** *Immiscible*

**SOLUBILITY IN SOLVENTS:** *Soluble in alcohol*

**VISCOSITY:** *5-25 cps @ 25° C*

**VOLATILE ORGANIC COMPOUNDS (VOC):** *Not tested*

**PARTITION COEFFICIENT:** *2.26*



## MATERIAL SAFETY DATA SHEET

### SAFETY DATA SHEET

*Prepared according to 29CFR 1910.1200, Regulation (EC) No. 1272/2008 (GHS) and Canadian Controlled Products Act (CPR)*

#### SECTION 10: STABILITY AND REACTIVITY

<b>STABILITY:</b>	<i>Stable</i>
<b>CONDITIONS TO AVOID:</b>	<i>Extreme temperatures</i>
<b>INCOMPATIBILITY (MATERIAL TO AVOID):</b>	<i>Strong oxidizing agents, Strong acid and Bases may cause hydrolysis of product</i>
<b>HAZARDOUS DECOMPOSITION OR BY-PRODUCTS:</b>	<i>Carbon dioxide, Carbon monoxide, Nitrogen oxides</i>
<b>HAZARDOUS POLYMERIZATION:</b>	<i>Will not occur</i>

#### SECTION 11: TOXICOLOGICAL INFORMATION

*The preparation has not been tested for all toxicological effects; some are classified on the basis of the known hazards of the components.*

<b>Acute oral toxicity:</b>	<b>LD50</b> – <i>Greater than 2,000 mg/kg rat</i> <b>Method:</b> <i>Not given</i> <b>Source:</b> <i>Safety Data Sheet of manufacturer</i>
<b>Acute inhalation toxicity:</b>	<b>LC50</b> – <i>Greater than 5.95mg/L (4hr, rat)</i> <b>Method:</b> <i>Not given</i> <b>Source:</b> <i>Safety Data Sheet of manufacturer</i>
<b>Acute dermal toxicity:</b>	<b>LD50</b> – <i>Greater than 3,180 mg/kg rabbit</i> <b>Method:</b> <i>Not given</i> <b>Source:</b> <i>Safety Data Sheet of manufacturer</i>
<b>Irritant effect on skin:</b>	<i>Non-irritant</i> <b>Method:</b> <i>Not given</i> <b>Source:</b> <i>Safety Data Sheet of manufacturer</i>
<b>Irritant effect on eyes:</b>	<i>Slightly irritating</i> <b>Method:</b> <i>Not given</i> <b>Source:</b> <i>Safety Data Sheet of manufacturer</i>
<b>Sensitization:</b>	<i>Non-sensitizing</i> <b>Method:</b> <i>Not given</i> <b>Source:</b> <i>Safety Data Sheet of manufacturer</i>
<b>Mutagenicity:</b>	<i>Not determined</i> <b>Method</b> <b>Source:</b>
<b>Carcinogenicity/Reproductive toxicity:</b>	<i>Not determined; None of the components present in this material at concentrations of 0.1% or greater are listed by IARC, NTP, OSHA or ACGIH as being carcinogens.</i> <b>Source:</b> <i>Safety Data Sheets of manufacturer</i>
<b>Specific Target Organ Toxicity</b>	<b>Single exposure (GHS)</b> – <i>no data available</i> <b>Repeated exposure (GHS)</b> – <i>no data available</i>

#### Signs and Symptoms of Exposure

##### POTENTIAL HEALTH EFFECTS

<b>INHALATION:</b>	<i>May cause irritation to lungs</i>
<b>SKIN CONTACT:</b>	<i>Do not use over cuts, wounds or irritated skin. Pre-existing skin disorders may be aggravated by exposure</i>
<b>EYE CONTACT:</b>	<i>Prolonged contact may cause irritation, with redness, pain, tearing, blurred vision and conjunctivitis.</i>
<b>INGESTION:</b>	<i>May be harmful if swallowed.</i>
<b>TARGET ORGANS:</b>	<i>Central Nervous System</i>



# MATERIAL SAFETY DATA SHEET

## SAFETY DATA SHEET

*Prepared according to 29CFR 1910.1200, Regulation (EC) No. 1272/2008 (GHS) and Canadian Controlled Products Act (CPR)*

### SECTION 12: ECOLOGICAL INFORMATION

<b>General Comments:</b>	<i>Ecotoxicological data have not been determined specifically for this product, but it is classified on the basis of the known hazards of the components. This section is not required by WHMIS.</i>
<b>Mobility</b>	<i>The product is not expected to be mobile in the aquatic environment.</i>
<b>Biodegradability</b>	<i>N,N-Diethyl-m-toluamide - 83.8% (28d) Method: OECD 301B Source: Literature</i>
<b>Bioaccumulation</b>	<i>N,N-Diethyl-m-toluamide is not readily biodegradable in the environment, according to ECBI/07/00 Rev. 3 (29/8/00)</i>
<b>Toxicity</b>	<i>N,N-Diethyl-m-toluamide has been shown to be toxic to aquatic organisms. LC50 approx. 97 mg/l (96H rainbow trout) Method: OECD 203 Source: Literature</i>

### SECTION 13: DISPOSAL CONSIDERATIONS

**WASTE DISPOSAL METHOD:** *Do not reuse any empty containers.*

**US:** *This product is not a hazardous solid waste as defined in Resource Conservation Recovery Act Regulations (40 CFR 261) and should be disposed of according to local, state and Federal regulations. Dispose of partially filled and empty containers by wrapping and discarding in trash.*

**International:** *This product should not be disposed of via the drains or by landfill. Disposal must be in accordance with current national and local regulations. Chemical residues generally count as special waste, and their disposal may be regulated in the EC member countries through corresponding laws and regulations. We recommend that you contact either the authorities or approved waste disposal companies who will advise you on how to dispose of special waste.*

*General EU requirements are given in the Waste Framework Directive (75/442/EEC) and the Hazardous Waste Directive (91/689/EEC). Packaging may contain residues of the product and should be treated accordingly.*

### SECTION 14: TRANSPORT INFORMATION

<b>SHIPPING INFORMATION:</b>			<b>Marine Pollutant:</b> <i>No</i>			
<b>Regulation</b>	<b>UN No.</b>	<b>Proper Shipping Name</b>	<b>Class</b>	<b>Package Group</b>	<b>Additional Information</b>	
U.S. Department of Transportation (DOT) – NonBulk	-	-	-	-	<i>Not regulated</i>	
U.S. Department of Transportation (DOT) – Bulk	-	-	-	-	<i>Not regulated</i>	
Canadian Transportation of Dangerous Goods (TDG)	-	-	-	-	<i>Not regulated</i>	
International Maritime Dangerous Goods (IMDG)	-	-	-	-	<i>Not regulated</i>	
International Air Transport Assoc. (IATA)	-	-	-	-	<i>Not regulated</i>	

The transportation regulations are cited according to international regulations and in the form applicable to the United States and Canada. Possible national deviations in other countries are not considered.

### SECTION 15: REGULATORY INFORMATION

**U.S. FEDERAL REGULATIONS:**

**TSCA (TOXIC SUBSTANCE CONTROL ACT):** *All components of this product are listed or exempt on the TSCA list*

**CERCLA (COMPREHENSIVE RESPONSE COMPENSATION, AND LIABILITY ACT):** *None*

**CERCLA HAZARDOUS SUBSTANCE:** *None*

**CERCLA REPORTABLE QUANTITY:** *None*

**RCRA 261 (RESOURCE CONSERVATION RECOVERY ACT):** *This product is not defined as a hazardous solid waste..*

**SARA TITLE III (SUPERFUND AMENDMENTS AND REAUTHORIZATION ACT)**

**Section 302 Extremely Hazardous Substances (TPQ):** *None*

**311/312 HAZARD CLASS:** *None*

**313 REPORTABLE INGREDIENTS:** *None*

**U.S. STATE REGULATIONS:**

**California Proposition 65 Warning:** *None*

**States Right to Know:** *None*



# MATERIAL SAFETY DATA SHEET

## SAFETY DATA SHEET

Prepared according to 29CFR 1910.1200, Regulation (EC) No. 1272/2008 (GHS) and Canadian Controlled Products Act (CPR)

### CANADIAN REGULATIONS:

**WHMIS CLASSIFICATION:** D2B Toxic 

This product has been classified in accordance with the hazard criteria of the CPR and the MSDS contains all the information required by the CPR.

**DOMESTIC SUBSTANCE LIST (DSL)/NON-DOMESTIC SUBSTANCE LIST (NDSL):** All components are listed or exempt

Canadian Ingredient Disclosure List: *N,N-Diethyl-m-toluamide* (CAS # 134-62-3)

### EU REGULATIONS:

Labeling in accordance with EC-Directives

Hazard symbols



Toxic to Aquatic Organisms



Irritant

Hazardous component(s) to be indicated on label – *N,N-Diethyl-m-toluamide* (CAS # 134-62-3)

<b>R phrases</b>	22	Harmful if swallowed
	36/38	Irritating to eyes and skin
	52/53	Harmful to aquatic organisms and may cause long-term adverse effects in the aquatic environment
<b>S phrases</b>	2	Keep out of the reach of children
	26	In case of contact with eyes, rinse immediately with plenty of water and seek medical advice
	49	Keep only in the original container
	61	Avoid release to the environment. Refer to special instructions/safety data sheet.

### SECTION 16: OTHER INFORMATION

<b>HMIS</b>		
<b>Health: 1</b>	<b>Flammability: 1</b>	<b>Reactivity: 0</b>
<b>Special: None</b>		

4=extreme 3=High 2=Moderate 1=Slight 0=Insignificant

### REVISED SECTIONS OR REASON FOR REVISION:

ORIGIN DATE: DECEMBER 19, 2011

**DISCLAIMER:** The information provided herein was believed to be accurate, to the best knowledge of Tender Corporation, at the time of preparation from a compilation of sources believed to be reliable and is furnished without warranty, expressed or implied. It is the responsibility of the user to investigate and understand other pertinent sources of information, to comply with all laws and procedures applicable to the safe handling, storage and use of this product and to determine the suitability of the product for its intended use. This data sheet relates only to the specific product listed and does not relate to use in combination or in any process with other materials