SAFETY DATA SHEET

1. Product and Company Identification

PRODUCT NUMBER:	1152	**COMPANY PHONE:**	1-800-241-8180
PRODUCT NAME:	HAND GUARD	**EMERGENCY TELEPHONE:**	1-800-241-8180
PRODUCT DESCRIPTION:	Aerosol Foam Hand Protecting Spray	**INFOTRAC:**	1-800-535-5053
COMPANY INFORMATION:	**PRO CHEM, INC.** 1475 Bluegrass Lakes Parkway Alpharetta, GA 30004		

2. Hazards Identification

GHS CLASSIFICATION:
Flammable aerosols: Category 1
Sensitization, skin: Category 1
Environmental hazards: Not classified.
OSHA defined hazards: Not classified.

SIGNAL WORD:
DANGER

SYMBOL:

HAZARD STATEMENTS:
Extremely flammable aerosol. May cause an allergic skin reaction.

PRECAUTIONARY STATEMENTS:

Prevention:
Keep away from heat/sparks/open flames/hot surfaces. No smoking. Do not spray on an open flame or other ignition source. Pressurized container: Do not pierce or burn, even after use. Avoid breathing mist or vapor. Contaminated work clothing must not be allowed out of the workplace. Wear protective gloves.

Response:
IF ON SKIN: Wash with plenty of water. Specific treatment (see this label). If skin irritation or rash occurs: Get medical advice/attention. Wash contaminated clothing before reuse.

Storage: Protect from sunlight. Do not expose to temperatures exceeding 50°C/122°F.

Disposal: Dispose of contents/container in accordance with local/regional/national/international regulations.

HAZARDS NOT OTHERWISE SPECIFIED:
Static accumulating flammable liquid can become electrostatically charged even in bonded and grounded equipment. Sparks may ignite liquid and vapor. May cause flash fire or explosion.

SUPPLEMENTAL INFORMATION:
None.

3. Composition / Information on Ingredients

CHEMICAL NAME	CAS	Concentration % by Weight
1,2-Propanediol	57-55-6	2.5-10
Isobutane	75-28-5	2.5-10
Isopropyl myristate	110-27-0	1-2.5
Triethanolamine	102-71-6	1-2.5
4-chloro-3,5-xylenol	88-04-0	0.1-1
Other components below reportable levels		80-90

*Designates that a specific chemical identity and/or percentage of composition has been withheld as a trade secret.

4. First Aid Measures

EMERGENCY OVERVIEW

WARNING: Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves. Wash contaminated clothing before reuse.

EYES: Rinse with water. Get medical attention if irritation develops and persists.

SKIN: Remove contaminated clothing immediately and wash skin with soap and water. In case of eczema or other skin disorders: Seek medical attention and take along these instructions.

INHALATION:
Move to fresh air. Call a physician if symptoms develop or persist.

INGESTION:
Rinse mouth. Get medical attention if symptoms occur.

MOST IMPORTANT SYMPTOMS/EFFECTS, ACUTE AND DELAYED:
Dermatitis. Rash. May cause an allergic skin reaction.

INDICATION OF IMMEDIATE MEDICAL ATTENTION AND SPECIAL TREATMENT NEEDED:
Provide general supportive measures and treat symptomatically. Keep victim under observation. Symptoms may be delayed.

5. Fire-Fighting Measures

SUITABLE FIRE EXTINGUISHING MEDIA:
Water fog. Foam. Carbon dioxide (CO2). Dry chemical powder, carbon dioxide, sand or earth may be used for small fires only.

UNSUITABLE FIRE EXTINGUISHING MEDIA:
Do not use water jet as an extinguisher, as this will spread the fire.

SPECIFIC HAZARDS ARISING FROM THE CHEMICAL:
Contents under pressure. Pressurized container may explode when exposed to heat or flame. This product is a poor conductor of electricity and can become electrostatically charged. If sufficient charge is accumulated, ignition of flammable mixtures can occur. To reduce potential for

static discharge, use proper bonding and grounding procedures. This liquid may accumulate static electricity when filling properly grounded containers. Static electricity accumulation may be significantly increased by the presence of small quantities of water or other contaminants. Material will float and may ignite on surface of water.

SPECIFIC FIRE-FIGHTING METHODS:

Move containers from fire area if you can do so without risk. Containers should be cooled with water to prevent vapor pressure build up. For massive fire in cargo area, use unmanned hose holder or monitor nozzles, if possible. If not, withdraw and let fire burn out. Use standard firefighting procedures and consider the hazards of other involved materials. Move containers from fire area if you can do so without risk. In the event of fire and/or explosion do not breathe fumes.

SPECIAL PROTECTIVE EQUIPMENT FOR FIREFIGHTERS:

Firefighters must use standard protective equipment including flame retardant coat, helmet with face shield, gloves, rubber boots, and in enclosed spaces, SCBA.

GENERAL FIRE HAZARDS:

EXTREMELY FLAMMABLE AEROSOL.

6. Accidental Release Measures

PERSONAL PRECAUTIONS:

Keep unnecessary personnel away. Keep people away from and upwind of spill/leak. Keep out of low areas. Remove all possible sources of ignition in the surrounding area. Wear appropriate protective equipment and clothing during clean up. Avoid breathing mist or vapor. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Ventilate closed spaces before entering them. Use appropriate containment to avoid environmental contamination. Transfer by mechanical means such as vacuum truck to a salvage tank or other suitable container for recovery or safe disposal. Local authorities should be advised if significant spillages cannot be contained. For personal protection, see Section 8 of the SDS.

ENVIRONMENTAL PRECAUTIONS AND CLEAN-UP METHODS:

Refer to attached safety data sheets and/or instructions for use. Eliminate all ignition sources (no smoking, flares, sparks, or flames in immediate area). Keep combustibles (wood, paper, oil, etc.) away from spilled material. Stop leak if you can do so without risk. Move the cylinder to a safe and open area if the leak is irreparable. 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. Following product recovery, flush area with water.

Small Spills: Wipe up with absorbent material (e.g. cloth, fleece). Clean surface thoroughly to remove residual contamination. For waste disposal, see Section 13 of the SDS. Avoid discharge into drains, water courses or onto the ground. Use appropriate containment to avoid environmental contamination.

7. Handling and Storage

SAFE HANDLING:

Minimize fire risks from flammable and combustible materials (including combustible dust and static accumulating liquids) or dangerous reactions with incompatible materials. Handling operations that can promote accumulation of static charges include but are not limited to: mixing, filtering, pumping at high flow rates, splash filling, creating mists or sprays, tank and container filling, tank cleaning, sampling, gauging, switch loading, vacuum truck operations. Pressurized container: Do not pierce or burn, even after use. Do not use if spray button is missing or defective. Do not spray on a naked flame or any other incandescent material. Do not smoke while using or until sprayed surface is thoroughly dry. Do not cut, weld, solder, drill, grind, or expose containers to heat, flame, sparks, or other sources of ignition. All equipment used when handling the product must be grounded. Do not re-use empty containers. Do not get in eyes, on skin, or on clothing. Avoid breathing mist or vapor. Use only in well-ventilated areas. Wear appropriate personal protective equipment. Observe good industrial hygiene practices. For additional information on equipment bonding and grounding, refer to the Canadian Electrical Code in Canada, (CSA C22.1), or the American Petroleum Institute (API) Recommended Practice 2003, "Protection Against Ignitions Arising out of Static, Lightning, and Stray Currents" or National Fire Protection Association (NFPA) 77, "Recommended Practice on Static Electricity" or National Fire Protection Association (NFPA) 70, "National Electrical Code".

SAFE STORAGE & INCOMPATIBILITIES:

Level 1 Aerosol.

Pressurized container. Protect from sunlight and do not expose to temperatures exceeding 50°C/122 °F. Do not puncture, incinerate or crush. Do not handle or store near an open flame, heat or other sources of ignition. This material can accumulate static charge which may cause spark and become an ignition source. Avoid spark promoters. Ground/bond container and equipment. These alone may be insufficient to remove static electricity. Refrigeration recommended. Store away from incompatible materials (see Section 10 of the SDS).

8. Exposure Controls / Personal Protection

Occupational exposure limits

US. ACGIH Threshold Limit Values

COMPONENTS	TYPE	VALUE
Isobutane (CAS 75-28-5)	STEL	1000 ppm
Triethanolamine (CAS 102-71-6)	TWA	5 mg/m3

US. NIOSH: Pocket Guide to Chemical Hazards

COMPONENTS	TYPE	VALUE
Isobutane (CAS 75-28-5)	TWA	1900 mg/m3 800 ppm

US. Workplace Environmental Exposure Level (WEEL) Guides

COMPONENTS	TYPE	VALUE	FORM
1,2-Propanediol (CAS 57-55-6)	TWA	10 mg/m3	Aerosol

BIOLOGICAL LIMIT VALUE:

No biological exposure limits noted for the ingredient(s).

ENGINEERING CONTROLS:

Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level.

INDIVIDUAL PROTECTION MEASURES, SUCH AS PERSONAL PROTECTIVE EQUIPMENT:

EYE PROTECTION: Face shield is recommended. Wear safety glasses with side shields (or goggles).
SKIN PROTECTION: Wear appropriate chemical resistant gloves. Wear appropriate chemical resistant clothing. Use of an impervious apron is recommended.
RESPIRATORY PROTECTION: If permissible levels are exceeded use NIOSH mechanical filter/organic vapor cartridge or an air-supplied respirator.
THERMAL HAZARDS: Wear appropriate thermal protective clothing, when necessary.

GENERAL HYGIENE CONSIDERATIONS:
When using do not smoke. 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. Contaminated work clothing should not be allowed out of the workplace.

9. Physical & Chemical Properties

APPEARANCE:		**FLAMMABILITY(solid/gas):**	Not available.
Physical State:	Gas.	**Flammability Limit–lower (%)**	Not available.
Form:	Aerosol.	**Flammability Limit–upper (%):**	Not available.
Color:	Not available.	**Explosive Limit – lower (%):**	Not available.
ODOR:	Not available.	**Explosive Limit – upper (%):**	Not available.
ODOR THRESHOLD:	Not available.	**VAPOR PRESSURE:**	23.01 psig @70°F estimated
pH:	Not available.	**VAPOR DENSITY:**	Not available.
MELTING/FREEZING POINT:	Not available.	**RELATIVE DENSITY:**	Not available.
INITIAL BOILING POINT/RANGE:	212°F (100°C) estimated	**SOLUBILITY (water):**	Not available.
PARTITION COEFFICIENT (n-octanol/water):	Not available.	**AUTO-IGNITION TEMP:**	Not available.
VISCOSITY:	Not available.	**DECOMPOSITION TEMP:**	Not available.
SPECIFIC GRAVITY:	0.868 estimated	**FLASH POINT:**	-99.4°F (-73.0°C) PROPELLANT estimated
EVAPORATION RATE:	Not available.		

10. Stability & Reactivity Information

REACTIVITY:
The product is stable and non-reactive under normal conditions of use, storage and transport.

CHEMICAL STABILITY:
Material is stable under normal conditions.

POSSIBILITY OF HAZARDOUS REACTIONS:
Hazardous polymerization does not occur.

INCOMPATIBLE MATERIALS:
Strong oxidizing agents.

CONDITIONS TO AVOID:
Avoid temperatures exceeding the flash point. Contact with incompatible materials.

HAZARDOUS DECOMPOSITION PRODUCTS:
No hazardous decomposition products are known.

11. Toxicological Information

PRIMARY ROUTE OF ENTRY:

EYES: Direct contact with eyes may cause temporary irritation.

SKIN: May cause an allergic skin reaction. Prolonged or repeated exposure may cause liver and kidney damage. These effects have not been observed in humans.

INHALATION: No adverse effects due to inhalation are expected.

INGESTION: Expected to be a low ingestion hazard.

SYMPTOMS RELATED TO THE PHYSICAL, CHEMICAL AND TOXICOLOGICAL CHARACTERISTICS:

Dermatitis. Rash. May cause an allergic skin reaction.

ACUTE TOXICITY:

May cause an allergic skin reaction.

COMPONENTS	SPECIES	TEST RESULTS
1,2-Propanediol (CAS 57-55-6)		
Acute		
Dermal		
LD50	Rabbit	> 2000 mg/kg, 24 Hours
Oral		
LD50	Guinea pig	19700 mg/kg
	Mouse	24900 mg/kg
	Rat	22000 mg/kg
Isobutane (CAS 75-28-5)		
Acute		
Inhalation		
LC50	Mouse	1237 mg/l, 120 Minutes
		52 %, 120 Minutes
	Rat	1355 mg/l
Isopropyl Myristate (CAS 110-27-0)		
Acute		
Inhalation		
LC50	Rat	> 5.3 mg/l, 4 Hours
Oral		
LD50	Rat	> 4300 mg/kg
Triethanolamine (CAS 102-71-6)		
Acute		
Dermal		
LD50	Rabbit	> 2000 mg/kg
Oral		
LD50	Rat	6400 mg/kg

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

SKIN CORROSION/IRRITATION:

Prolonged skin contact may cause temporary irritation.

SERIOUS EYE DAMAGE/IRRITATION:

Direct contact with eyes may cause temporary irritation.

RESPIRATORY SENSITIZATION:

Not available.

SKIN SENSITIZATION:

May cause an allergic skin reaction.

GERM CELL MUTAGENICITY:

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 Monographs. Overall Evaluation of Carcinogenicity

Triethanolamine (CAS 102-71-6) 3 Not classifiable as to carcinogenicity to humans.

OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050): Not listed.

REPRODUCTIVE TOXICITY:

This product is not expected to cause reproductive or developmental effects.

SPECIFIC TARGET ORGAN TOXICITY (single exposure):

Not classified.

SPECIFIC TARGET ORGAN TOXICITY (repeated exposures):

Not classified.

ASPIRATION HAZARD:

Not available.

CHRONIC EFFECTS:

May be harmful if absorbed through skin. Prolonged exposure may cause chronic effects. Prolonged or repeated exposure may cause liver and kidney damage. These effects have not been observed in humans.

12. Ecological Information

ECOTOXICITY:

The product is not classified as environmentally hazardous. However, this does not exclude the possibility that large or frequent spills can have a harmful or damaging effect on the environment.

COMPONENTS		SPECIES	TEST RESULTS
1,2-Propanediol (CAS 57-55-6)			
Aquatic			
Crustacea	EC50	Daphnia	10000.0001 mg/L, 48 Hours
		Water flea (Daphnia magna)	> 10000 mg/l, 48 hours
Fish	LC50	Fathead minnow (Pimephales promelas)	710 mg/l, 96 hours

Triethanolamine (CAS 102-71-6)

Aquatic			
Algae	IC50	Algae	216 mg/L, 72 Hours
Crustacea	EC50	Water flea (Ceriodaphnia dubia)	565.2 - 658.3 mg/l, 48 hours
Fish	LC50	Fathead minnow (Pimephales promelas)	10610 - 13010 mg/l, 96 hours

* 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.

Partition coefficient n-octanol / water (log Kow)	
1,2-Propanediol	-0.92
Isobutane	2.76
Triethanolamine	-1

MOBILITY IN SOIL:

No data available.

OTHER ADVERSE EFFECTS:

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 Consideration

DISPOSAL INSTRUCTIONS:

Collect and reclaim or dispose in sealed containers at licensed waste disposal site. Contents under pressure. Do not puncture, incinerate or crush. Dispose of contents/container in accordance with local/regional/national/international regulations.

LOCAL DISPOSAL REGULATIONS:

Dispose in accordance with all applicable regulations.

HAZARDOUS WASTE CODE:

The waste code should be assigned in discussion between the user, the producer and the waste disposal company.

WASTE FROM RESIDUES/UNUSED PRODUCTS:

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).

CONTAMINATED PACKAGING:

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. Do not re-use empty containers.

14. Transportation Information

DOT:

UN NUMBER: UN1950
UN PROPER SHIPPING NAME: Aerosols, flammable, (each not exceeding 1 L capacity)
TRANSPORT HAZARD CLASS(ES)
Class: 2.1
Subsidiary Risk: --
Label(s): 2.1

PACKING GROUP: Not applicable.
SPECIAL PRECAUTIONS FOR USER: Read safety instructions, SDS and emergency procedures before handling.
SPECIAL PROVISIONS: N82
PACKAGING EXCEPTIONS: 306
PACKAGING NON BULK: None
PACKAGING BULK: None

This product meets the exception requirements of section 173.306 as a limited quantity and may be shipped as a limited quantity. Until 12/31/2020, the "Consumer Commodity - ORM-D" marking may still be used in place of the new limited quantity diamond mark for packages of UN 1950 Aerosols. Limited quantities require the limited quantity diamond mark on cartons after 12/31/20 and may be used now in place of the "Consumer Commodity ORM-D" marking and both may be displayed concurrently.

IATA:

UN NUMBER: UN1950
UN PROPER SHIPPING NAME: Aerosols, flammable
TRANSPORT HAZARD CLASS(ES)
Class: 2.1
Subsidiary Risk: --
Label(s): 2.1

PACKING GROUP: Not applicable.
ENVIRONMENTAL HAZARDS: No.
ERG CODE: 10L
SPECIAL PRECAUTIONS FOR USER: Read safety instructions, SDS and emergency procedures before handling.
OTHER INFORMATION:
PASSENGER AND CARGO AIRCRAFT: Allowed.
CARGO AIRCRAFT ONLY: Allowed.
PACKAGING EXCEPTIONS: LTD QTY

IMDG:

UN NUMBER: UN1950
UN PROPER SHIPPING NAME: AEROSOLS
TRANSPORT HAZARD CLASS(ES)
Class: 2.1
Subsidiary Risk: --
Label(s): 2.1

PACKING GROUP: Not applicable.
ENVIRONMENTAL HAZARDS:

Marine pollutant: No.
EmS: F-D, S-U
SPECIAL PRECAUTIONS FOR USER: Read safety instructions, SDS and emergency procedures before handling.
PACKAGING EXCEPTIONS: LTD QTY
TRANSPORT IN BULK ACCORDING TO ANNEX II OF MARPOL 73/78 and the IBC CODE:
Not applicable.

15. Regulatory Information

US FEDERAL REGULATIONS:

This product is a "Hazardous Chemical" as defined by the OSHA Hazard Communication Standard, 29 CFR 1910.1200. 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): Not listed.
SARA 304 Emergency release notification: Not regulated.
OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050): Not listed.

SUPERFUND AMENDMENTS AND REAUTHORIZATION ACT of 1986 (SARA):

Hazard categories Immediate Hazard – Yes.
Delayed Hazard – No.
Fire Hazard – Yes.
Pressure Hazard – No.
Reactivity Hazard – No.

SARA 302 Extremely hazardous substance: Not listed.
SARA 311/312 Hazardous Chemical: No.
SARA 313 (TRI reporting)

CHEMICAL NAME	CAS No	% BY WT
Diethanolamine	111-42-2	0.1-1

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):
Isobutane (CAS 75-28-5)
Safe Drinking Water Act (SDWA): Not regulated.

US STATE REGULATIONS:

US. Massachusetts RTK - Substance List:
Isobutane (CAS 75-28-5)
Triethanolamine (CAS 102-71-6)
US. New Jersey Worker and Community Right-to-Know Act:
1,2-Propanediol (CAS 57-55-6)
Isobutane (CAS 75-28-5)
Triethanolamine (CAS 102-71-6)
US. Pennsylvania Worker and Community Right-to-Know Law:
1,2-Propanediol (CAS 57-55-6)
Isobutane (CAS 75-28-5)
Triethanolamine (CAS 102-71-6)
US. Rhode Island RTK:
Isobutane (CAS 75-28-5)
US. California Proposition 65:
WARNING: This product contains a chemical known to the State of California to cause cancer.
US - California Proposition 65 - CRT: Listed date/Carcinogenic substance:
Diethanolamine (CAS 111-42-2) Listed: June 22, 2012

Country(s) or region	Inventory name	On inventory (yes/no)*
Australia	Australian Inventory of Chemical Substances (AICS)	No
Canada	Domestic Substances List (DSL)	Yes
Canada	Non-Domestic Substances List (NDSL)	No
China	Inventory of Existing Chemical Substances in China (IECSC)	No
Europe	European Inventory of Existing Commercial Chemical Substances (EINECS)	No
Europe	European List of Notified Chemical Substances (ELINCS)	No
Japan	Inventory of Existing and New Chemical Substances (ENCS)	No
Korea	Existing Chemicals List (ECL)	No
New Zealand	New Zealand Inventory	No
Philippines	Philippine Inventory of Chemicals and Chemical Substances (PICCS)	No
United States & Puerto Rico	Toxic Substances Control Act (TSCA) Inventory	Yes

*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

N/A = Not Applicable; N/D = Not Determined

HMIS	Health Hazards: 2	Flammability: 2	Physical hazards: 0	Personal protection: X

DISCLAIMER:

To the best of our knowledge, information contained herein is accurate. However, there is no assumption of liability for the accuracy or completeness of the information contained herein. Final determination of suitability of any material is the sole responsibility of the user. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee

that these are the only hazard, which exists. The information contained in this SDS was obtained from current and reliable sources; however, the data is provided without any warranty, expressed or implied, regarding its correctness or accuracy. Since the conditions or handling, storage and disposal of this product are beyond the control of the manufacturer, the manufacturer will not be responsible for loss, injury, or expense arising out of the products improper use. No warranty, expressed or inferred, regarding the product described in this SDS shall be created or inferred by any statement in this SDS. Various government agencies may have specific regulations regarding the transportation, handling, storage, use, or disposal of this product, which may not be covered by this SDS. The user is responsible for full compliance.