



Pro Form Products Ltd.
604 McGeachie Drive
Milton, Ontario, L9T 3Y5
Canada
905-878-4990

PRODUCT: PF 533 COPPER WELD-THRU PRIMER

SECTION 01: IDENTIFICATION

Initial supplier identifier..... Pro Form Products Ltd.
604 McGeachie Drive
Milton, Ontario L9T3Y5
Tel (905) 878-4990 Fax (905) 878-1189

Product identifier..... PF 533 COPPER WELD-THRU PRIMER

Recommended use and restrictions on .. Paints.
use

Chemical family..... Mixture.

NFPA rating..... Health: 2 Fire: 4 Reactivity: 0.

HMIS..... H: 2 F: 3 R: 0.

24 hour emergency number..... For transportation emergencies (in Canada) call CANUTEC 1-888-226-8832 (CAN-UTEC);
IN THE UNITED STATES CALL CHEMTREC 1-800-424-9300.
** For medical emergencies contact your local poison control centre **.

SECTION 02: HAZARD IDENTIFICATION



Signal Word..... DANGER.

Hazard Classification..... Flammable Aerosols — Category 1. Gas under pressure: Compressed Gas. Aspiration Toxicity 1. Skin Irritation — Category 2. Eye Irritation — Category 2A. Specific Target Organ Toxicity — Single Exposure — Category 3. (narcotic effects). (respiratory system). Reproductive Toxicity — Category 2. Specific Target Organ Toxicity — Repeated Exposure — Category 2.

Hazard Description..... H222 Extremely flammable aerosol. H229 Pressurized container: may burst if heated. H280 Contains gas under pressure; may explode if heated. H304 May be fatal if swallowed and enters airways. H315 Causes skin irritation. H319 Causes serious eye irritation. H335 May cause respiratory irritation. H336 May cause drowsiness or dizziness. H361 Suspected of damaging fertility or the unborn child. H373 May cause damage to organs through prolonged or repeated exposure. (Eyes, Skin, Respiratory System, and Central Nervous System).

Prevention..... P201 Obtain special instructions before use. P202 Do not handle this product until all safety instructions have been read and understood. P210 Keep away from heat, sparks, open flames and hot surfaces. No smoking. P211 Do not spray on an open flame or other ignition sources. P251 Do not pierce or burn container, even after use. P260 Do not breathe the mist, vapours, or spray. P264 Wash thoroughly after handling. P271 Use only outdoors or in a well ventilated area. P280 Wear protective gloves and eye protection.

Response P301 + P310 If swallowed IMMEDIATELY CALL A POISON CONTROL CENTRE and follow instructions provided by the centre. P331 Do NOT induce vomiting. P304 + P340 - If inhaled remove person to fresh air and keep comfortable for breathing. P312 Call a POISON CENTER/doctor if you feel unwell. P305 + P351 + P338 If in eyes rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing until medical help arrives. P337 + P313 - If eye irritation persists get medical attention. P302 + P352 - If on skin: wash with plenty of water. P332 + P313 - If skin irritation occurs get medical attention or advice. P362 + P364 - Take off contaminated clothing and wash before reuse. P308 + P313 If exposed or concerned, get medical advice/attention.

Storage..... P233 Keep container tightly closed. P403 Store in a well ventilated area. P405 Store locked up. P410 Protect from sunlight. P412 Do not expose to temperature exceeding 50°C / 122°F.

Disposal..... P501 Dispose all unused, waste or empty containers in accordance with local regulations.

Note This product mixture has been classified based on its ingredients.

PRODUCT: PF 533 COPPER WELD-THRU PRIMER**SECTION 03: COMPOSITION / INFORMATION ON INGREDIENTS**

CHEMICAL NAME AND SYNONYMS	CAS #	WT. %
Petroleum gases, liquefied, sweetened	68476-86-8	10-30
Acetic acid, methyl ester	79-20-9	10-30
n-Butyl Acetate	123-86-4	7-13
Toluene	108-88-3	7-13
Acetone	67-64-1	5-10
Copper	7440-50-8	3-7

<<The actual concentration(s) withheld as a trade secret>>

SECTION 04: FIRST-AID MEASURES

Eye contact.....	In case of contact, immediately flush eyes, keeping eyelids open, with plenty of water for at least 15 minutes. Consult a physician if irritation continues.
Skin contact.....	Immediately remove all contaminated clothing; flush skin with water for at least 15 minutes. If irritation persists, seek medical attention.
Inhalation.....	If inhaled, remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen, obtain medical attention.
Ingestion.....	If ingestion is suspected, contact physician or poison control center immediately. If spontaneous vomiting occurs have victim lean forward with head down to prevent aspiration of fluid into the lungs. Never give anything by mouth to an unconscious person.
Most important symptoms and effects, whether acute or delayed	Causes skin and eye irritation. Symptoms may include stinging, tearing, redness, swelling, and blurred vision. Direct contact with eyes may cause temporary irritation. May cause respiratory irritation. Vapors have a narcotic effect and may cause headache, fatigue, dizziness and nausea. This product contains ingredients that are suspected of damaging fertility or the unborn child. Causes damage to organs through prolonged or repeated exposure.
Additional information.....	Treat victims symptomatically. The main hazard from ingestion is aspiration of the liquid into the lungs producing chemical pneumonitis. In the event of an incident involving this product ensure that medical authorities are provided a copy of this safety data sheet.

SECTION 05: FIRE-FIGHTING MEASURES

Suitable and unsuitable extinguishing media	"Alcohol" foam, CO ₂ , dry chemical. In cases of larger fires, water spray should be used. Do not use water in a jet.
Specific hazards arising from the hazardous product, such as the nature of any hazardous combustion products	Oxides of carbon (CO, CO ₂).
Special protective equipment and precautions for fire-fighters	Extremely flammable aerosol. Firefighter should be equipped with self-contained breathing apparatus and full protective clothing to protect against potentially toxic and irritating fumes. Cool fire-exposed containers with cold water spray. Heat will cause pressure buildup and may cause explosive rupture. Solvent vapours may be heavier than air and may build up and travel along the ground to an ignition source, which may result in a flash back to the source of the vapours. Keep run-off water from entering sewers and other waterways. Dike for water control.

SECTION 06: ACCIDENTAL RELEASE MEASURES

Leak/spill.....	Ventilate. Eliminate all sources of ignition. Isolate area and keep unauthorized people away. Do not walk through spilled material. Wear recommended protective equipment. Contain the spill. Use non-sparking tools and equipment to pick up the spilled material. Cover spill with absorbent material and place in appropriate containers. Spill area can be washed with water. Collect wash water for approved disposal. Spilled material and water rinses are classified as chemical waste, and must be disposed of in accordance with current local, provincial, state, and federal regulations.
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SECTION 07: HANDLING AND STORAGE

Precautions for safe handling.....	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 pressurize, cut, weld, braze, solder, drill, grind, or expose empty containers to heat, sparks or open flames. Containers must be grounded and bonded. Do not use near sources of ignition, open flames or sparks. Do not cut, drill, weld or grind on or near the container. Open containers
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PRODUCT: PF 533 COPPER WELD-THRU PRIMER**SECTION 07: HANDLING AND STORAGE**

Precautions for safe handling..... slowly to allow for any pressure build-up to escape. Keep containers closed when not in use. Always adopt precautionary measures against build-up of static which may arise from appliances, handling and the containers in which product is packed. Avoid breathing vapours or mist. Avoid all skin contact and ventilate adequately, otherwise wear an appropriate breathing apparatus. Employees should wash hands and face before eating or drinking.

Conditions for safe storage, including any incompatibilities Keep away from heat, sparks, and open flames. Store in a cool, dry and well ventilated area. Store away from sunlight. Store away from oxidizing and reducing materials. Keep container closed when not in use. Do not store above 50 deg C.

SECTION 08: EXPOSURE CONTROLS / PERSONAL PROTECTION

INGREDIENTS	ACGIH TLV		OSHA PEL		NIOSH
	TWA	STEL	PEL	STEL	
Petroleum gases, liquefied, sweetened	Not established	Not established	Not established	Not established	Not established
Acetic acid, methyl ester	200 ppm CA ON: 200ppm (TWA), 250ppm (STEV-C)	Not established	200 ppm	Not established	Not established
n-Butyl Acetate	50 ppm CA ON: 50ppm (TWA), 150ppm (STEL)	150 ppm	150 ppm	200 ppm	150 ppm / STEL 200 ppm
Toluene	20 ppm CA ON: TWA: 20 ppm	Not established	200 ppm	500 ppm 10 minutes	100 ppm / STEL 150 ppm
Acetone	250 ppm TLV CA ON: 500ppm (TWA); 750ppm (STEL)	500 ppm	1,000 ppm	Not established	250 ppm
Copper	0.2 mg/m3 (dust)	Not established	1 mg/m3 (dust)	Not established	1 mg/m3 (dust)
Respiratory/type.....	Local exhaust ventilation is recommended. Wear an appropriate, properly fitted respirator when contaminant levels exceed the recommended exposure limits. Use NIOSH approved respirator or equipment. Do not exceed the use limits of the respirator.				
Eye/type.....	Chemical safety goggles and full faceshield if a splash hazard exists.				
Gloves/ type.....	Chemical resistant gloves.				
Clothing/type.....	Wear adequate protective clothes. Wear long sleeves and trousers to prevent dermal exposure.				
Footwear/type.....	Safety boots per local regulations.				
Other/type.....	Eye wash facility and emergency shower should be in close proximity. Employees should wash their hands and face before eating, drinking, or using tobacco products.				
Appropriate engineering controls.....	Provide natural or mechanical ventilation to control exposure levels below airborne exposure limits. Local mechanical exhaust ventilation should be used at sources of air contamination, such as open process equipment, or during purging operations, to capture gases and fumes that may be emitted. Standard reference sources regarding industrial ventilation (ie. ACGIH industrial ventilation) should be consulted for guidance about adequate ventilation.				

SECTION 09: PHYSICAL AND CHEMICAL PROPERTIES

Appearance/Physical state..... Aerosol.

Colour..... Copper.

Odour..... Solvent odour.

Odour threshold (ppm)..... Not available.

Vapour pressure (mm Hg)..... Not available.

Vapour density (air=1)..... >1.

pH..... No data.

Relative Density (Specific Gravity)..... 0.852.

Density..... 7.11 lb/usg - 0.852 g/mL.

Melting / Freezing point (deg C)..... Not available.

Solubility..... Insoluble in water.

Initial boiling point / boiling range (deg C). 56°C (liquid).

Evaporation rate..... Not available.

Flash point (deg C), method..... -96.4°C Closed cup. (propellant).

Auto ignition temperature (deg C)..... Not available.

Upper flammable limit (% vol)..... 16.0.

Lower flammable limit (% vol)..... 1.2.

Partition coefficient — n-octanol/water..... Not available.

PRODUCT: PF 533 COPPER WELD-THRU PRIMER**SECTION 09: PHYSICAL AND CHEMICAL PROPERTIES**

Maximum incremental reactivity (MIR)..... 0.87.
 % Volatile by volume..... 53.75.
 VOC (less water)..... 2.55 lb/USG - 305.57 g/L.
 Viscosity..... Not available.

SECTION 10: STABILITY AND REACTIVITY

Chemical stability..... Stable at normal temperatures and pressures.
 Reactivity Avoid heat, sparks and flames. Explosive reactions can occur in the presence of strong oxidizing agents.
 Possibility of hazardous reactions..... Hazardous polymerization will not occur.
 Conditions to avoid, including static Keep away from heat. Incompatible with strong oxidizers. Strong bases.
 discharge, shock or vibration
 Hazardous decomposition products..... Oxides of carbon (CO,CO2). Other potentially toxic fumes.

SECTION 11: TOXICOLOGICAL INFORMATION

INGREDIENTS	LC50	LD50
Petroleum gases, liquefied, sweetened	31mg/L (Rat) 4 hr	No data
Acetic acid, methyl ester	16000 ppm (Rat) 4 h	LD50 5001 mg/kg (oral rat) LD50 5001 mg/kg (dermal rabbit)
n-Butyl Acetate	>33 mg/L vapour, 5.2 mg/L (rat) dust/mist	10760 mg/kg (rat, oral) 14112 mg/kg (rabbit, dermal)
Toluene	8000ppm (rat inhalation) 400ppm mouse (inhalation 24hr)	5,000 mg/kg (rat ora); 12,124 mg/kg (rabbit dermal)
Acetone	50,100 mg/m3 8 hours, rat	5,800 mg/kg (rat oral)
Copper	Not available	ORL-DOM LDLo: 18,000-18,200mg/kg
Route of exposure.....	Eye contact. Skin contact. Inhalation. Ingestion. Skin absorption.	
Effects of acute exposure.....	Causes skin irritation. Causes serious eye irritation. The aromatic hydrocarbon solvents in this product can be irritating to the eyes, nose and throat. In high concentration, they may cause central nervous system depression and narcosis characterized by nausea, lightheadedness and dizziness from overexposure by inhalation. May be harmful if absorbed through the skin. Aspiration of the material can cause lung damage.	
Effects of chronic exposure.....	Prolonged or repeated skin contact may cause drying or cracking of skin. Breathing high concentrations of vapour may cause anesthetic effects and serious health effects. Prolonged or repeated exposure may lead to liver, kidney or central nervous system symptoms. Intentional misuse by deliberately concentrating and inhaling this product may be harmful or fatal.	
Carcinogenicity of material.....	IARC has classified Toluene as a Group 3 (Not classifiable as to its carcinogenicity to humans); ACGIH has classified Toluene as a Group A4 (Not classifiable as a human carcinogen).	
Reproductive effects.....	Toluene is fetotoxic in rats and mice at maternally toxic levels. Prolonged and repeated exposure of pregnant animals (>1500 ppm) to Toluene have been reported to cause adverse fetal developmental effects. Toluene is known by the State of California to cause adverse fetal developmental effects.	
Specific Target Organ Toxicity	May cause drowsiness or dizziness. May cause respiratory irritation. Causes damage to organs through prolonged or repeated exposure . (Eyes, Skin, Respiratory System, and Central Nervous System).	

SECTION 12: ECOLOGICAL INFORMATION

Environmental..... Do not allow to enter waters, waste water or soil.
 Persistence and degradability..... Not available.

SECTION 13: DISPOSAL CONSIDERATIONS

Information on safe handling for disposal . Contents under pressure. Do not puncture, incinerate or expose to heat, even when empty.
 and methods of disposal, including any . Dispose of waste in accordance with all applicable Federal, Provincial/State and local
 contaminated packaging regulations.

PRODUCT: PF 533 COPPER WELD-THRU PRIMER**SECTION 14: TRANSPORT INFORMATION**

TDG Classification.....	UN1950 - AEROSOLS, flammable - Class 2.1 - This product meets limited quantity exemption when shipped in containers less than 1 Litre.
DOT Classification (Road).....	UN1950 - AEROSOLS, flammable - Class 2.1 - Ltd Qty (1 Liter/0.26 Gallons).
IATA Classification (Air).....	UN1950 - AEROSOLS, flammable - Class 2.1 - Limited Quantity. Do not ship by air without checking appropriate IATA regulations.
IMDG Classification (Marine).....	UN1950 - AEROSOLS - Class 2.1 - EmS: F-D, S-U - Limited Quantity. Check IMDG regulations for limited quantity exemptions.
Marine Pollutant	
Proof of Classification.....	In accordance with Part 2.2.1 of the Transportation of Dangerous Goods Regulations (July 2, 2014) - we certify that classification of this product is correct. .

SECTION 15: REGULATORY INFORMATION

CEPA status.....	On Domestic Substances List (DSL).
TSCA inventory status.....	All components are listed.
OSHA.....	This product is considered hazardous under the OSHA Hazard Communication Standard.
SARA Title III	
Section 302 - extremely hazardous substances	None.
Section 311/312 - hazard categories.....	Immediate health, delayed health, fire hazard.
Section 313.....	Toluene. Copper.
EPA hazardous air pollutants (HAPS) 40CFR63	Toluene.
California Proposition 65.....	*** ! WARNING: This product can expose you to chemicals including [see below], which are known to the State of California to cause birth defects or other reproductive harm. (Benzene (D)). (Toluene). *** ! WARNING: This product can expose you to chemicals including [see below], which are known to the State of California to cause cancer . (Acetaldehyde). (Benzene). (Ethyl benzene). (Methanol). For more information, go to www.P65Warnings.ca.gov .

SECTION 16: OTHER INFORMATION

Prepared by:	REGULATORY AFFAIRS. Trivalent Data Systems Ltd. www.trivalent.com .
Telephone number:.....	(800) 387-7981.
Disclaimer:.....	DISCLAIMER: All information appearing herein is based upon data obtained from experience and recognized technical sources. To the best of our knowledge, it is believed to be correct as of the date of issue but we make no representations as to its accuracy or sufficiency and do not suggest or guarantee that any hazards listed herein are the only ones which exist. The hazard information contained herein is offered solely for the consideration of the user, subject to his own investigation and verification of compliance with applicable regulations, including the safe use of the product under every foreseeable condition. The information relates only to the product designated herein, and does not relate to its use in combination with any other material or in any other process.
Review Date:.....	2022-11-30.
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