

Saint-Gobain Performance Plastics Corporation Wayne Facility
Material Safety Data Sheet
Title: PFA PRODUCTS

Document # SMP 5.0.0.20
Revision: 01/23/08
Supersedes: 11/23/04
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HMIS RATING: Health- 0 Flammability- 0 Reactivity- 0

SECTION I- Identification of Product

PRODUCT NAME: NORTON® PFA Film, CHEMFLUOR® PFA Tubing, CHEMWARE® PFA Bottles

OTHER/GENERIC NAMES: Perfluoroalkoxy Polymer, PFA

FORM: Transparent or Translucent plastic film, tubing, rod.

PRODUCT USE: High temperature film laminates, release liners, chemical resistance applications, high purity fluid handling, non-stick surface coverings, lab ware.

MANUFACTURERS NAME/ADDRESS: Saint-Gobain Performance Plastics Corp.
150 Dey Road, Wayne, NJ 07470 USA

EMERGENCY TELEPHONE NO.: CHEM-TEL Inc. US: 1-800-255-3924 Worldwide + 01-813-248-0585
TECHNICAL ASSISTANCE TELEPHONE NO.: 973-696-4700

SECTION II- Composition/Information on Ingredients

<u>Ingredient Name</u>	<u>CAS Number</u>	<u>Weight %</u>
Fluorinated Ethylene Perfluoroalkyl Vinyl Ether Copolymer	26655-00-5	100%

This product as supplied is not considered hazardous as defined in the US Code of Federal Regulations, 29CFR 1910.1200. This product is considered an "article" as supplied for its intended and foreseen use.

All components appear on TSCA Inventory. This product contains no substances at or above the reporting threshold under Section 313 of Title III of the US EPA Superfund Amendments and Reauthorization Act of 1986 and US Code of Federal Regulations, 40CFR part 372, based on available data.

SECTION III- Hazards Identification

EMERGENCY OVERVIEW: No special dangers are known. Use within specified processing parameters, high temperatures could evolve irritating and/or toxic fumes.

Potential Health Hazards:

SKIN: Not anticipated under recommended usage conditions. Nuisance dust may be encountered during machining operation, mechanical irritation.

EYES: Not anticipated under recommended usage conditions.

INHALATION: Not anticipated under recommended usage conditions. May cause flu-like symptoms if thermal decomposition products are inhaled ("polymer-fume-fever"), chills, fever, and headache.

INGESTION: Not anticipated under recommended usage conditions.

DELAYED EFFECTS: None

Ingredients found on one of the OSHA designated carcinogen lists are listed below:

None listed

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Section IV- First Aid Measures

SKIN: Not anticipated under recommended usage conditions. For hot product, immediately immerse in or flush affected area with large amounts of cold water. Cover with clean cotton sheeting or gauze and seek medical advice.

EYES: Not anticipated under recommended usage conditions. If necessary, flush eyes with plenty of water. If symptoms persist or injury is suspected, seek medical advice.

INHALATION: Not anticipated under recommended usage conditions. Remove victim to fresh air. If not breathing, perform mouth-to-mouth resuscitation. Seek medical attention.

INGESTION: Not anticipated under recommended usage conditions. Treat symptomatically. Seek medical attention. If unconscious, do not give anything by mouth. If vomiting occurs, prevent aspiration.

ADVICE TO PHYSICIAN: Expect influenza-like symptoms if thermal decomposition products are inhaled: chills, fever, headache, shortness of breath, coughing. This is known as "polymer fume-fever" and will pass after 24 to 48 hours providing no further exposure occurs.

SECTION V- Fire Fighting Measures

Flammable Properties

FLASH POINT: Does not flash
FLASH POINT METHOD: N/A
AUTO IGNITION TEMPERATURE: Not known
UPPER FLAME LIMIT (volume % in Air): N/A
LOWER FLAME LIMIT (volume % in Air): N/A
OXYGEN INDEX: N/A

EXTINGUISHING MEDIA: Water, foam, carbon dioxide, dry chemical.

UNUSUAL FIRE AND EXPLOSIVE HAZARDS: Does not burn without external source of fuel.

SPECIAL FIRE FIGHTING PRECAUTIONS/INSTRUCTIONS: In an extreme fire situation, protection from hydrogen fluoride should be employed. Toxic Fluorine compounds may be evolved in fire.

SECTION VI- Accidental Release Measures

IN CASE OF SPILLS OR OTHER RELEASE: Sweep or pick up and dispose of in a solid waste container.

SECTION VII- Handling and Storage

NORMAL HANDLING: Product is physiologically inert and non-toxic at normal temperatures. Above 270 °C, some decomposition of PFA products can be expected with evolution of gaseous and particulate products, which are toxic if inhaled. This can give rise to a characteristic syndrome with influenza type symptoms known as "polymer fume fever". These symptoms subside within 24-48 hours away from further exposure with no long-term effects. Keep away from ignition sources- do not smoke while using Fluoropolymers.

STORAGE RECOMMENDATIONS: Store in a clean, dry, dust free environment to maintain material cleanliness-preferably in its original packaging.

SECTION VIII- Exposure Controls/Personal Protection

VENTILATION: Ensure good ventilation or exhaust if there is the possibility of fumes being evolved. Not required if material is used within specified processing parameters.

FIRE AND EXPLOSION: Not applicable

PERSONAL PROTECTIVE EQUIPMENT: None required if material is used within specified processing parameters. Normal safety equipment should always be used in an industrial environment.

ADDITIONAL RECOMMENDATIONS: Heat resistant clothing and skin covering when working with hot product. Do not smoke while handling material. Keep tobacco products away from sources of contamination: hands and clothes.

EXPOSURE GUIDELINES/LIMITS: Not applicable

OTHER EXPOSURE LIMITS FOR POTENTIAL DECOMPOSITION PRODUCTS: Not available.

SECTION IX- Physical and Chemical Properties

APPEARANCE: Transparent or translucent film, tubing, or rod

PHYSICAL STATE: Solid

ODOR: Odorless

SPECIFIC GRAVITY (H₂O = 1): 2.12-2.17

SOLUBILITY IN WATER (weight %): Insoluble

PH: Not applicable

BOILING POINT: Not applicable

MELTING POINT: 302-310°C

VAPOR PRESSURE: Not applicable

VAPOR DENSITY: Not applicable

EVAPORATION RATE: Not applicable

% VOLATILES: <1%

IGNITION TEMPERATURE: N/A

FLASH POINT: Does not flash

THERMAL DECOMPOSITION: See Section X.

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SECTION X- Stability and Reactivity

CHEMICAL STABILITY: Stable. Thermal degradation can begin at 270°C.

INCOMPATIBILITIES/REACTS: Reacts with molten alkali metals and interhalogen compounds. Will burn in atmosphere of 95% oxygen when an ignition source is present.

HAZARDOUS DECOMPOSITION PRODUCTS: Thermal decomposition will evolve hydrogen fluoride and perfluoroolefins.

HAZARDOUS POLYMERIZATION: Will not occur.

SECTION XI- Toxicological Information

GENERAL: No potential health hazards when used within processing guidelines. Fluoropolymers are physiologically inert and are considered non-toxic.

IMMEDIATE (ACUTE) EFFECTS: See section III.

DELAYED (SUBCHRONIC AND CHRONIC) EFFECTS: None known

TOXICITY OF PRODUCT: Non-toxic when used within recommended guidelines.

OTHER DATA: None.

SECTION XII- Ecological Information

No known harmful effects on the environment.

SECTION XIII- Disposal Considerations

Clean material may be recycled.

Dispose of Fluoropolymer material as solid waste according to local regulations.

Dispose of packaging as solid waste according to local regulations.

This information relates only to uncontaminated product. If used in a process, which contaminates product, then disposal considerations should be re-evaluated.

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SECTION XIV- Transport Information

DOT designation: Not hazardous

UN No.: Not determined

ICAO/IATA: Not hazardous

There is no known transportation requirements associated with this material in the form supplied based on currently available data.

SECTION XV- Regulatory Information

There is no known regulatory requirements associated with this material in the form supplied based on currently available data.

SECTION XVI- Other Information

This material safety data sheet was prepared in compliance with US OSHA Hazard Communication Standard 29CFR 1910.1200 and the European Council Directive 91/155/EEC, 67/548 and 88/379/EEC as well as their relevant amendments, on the approximation of laws, regulations and administrative provisions relative to the classification, packaging and labeling of dangerous substances and preparations.

The information and recommendations set forth above are taken from sources believed to be accurate as of the date hereof; however, Saint-Gobain Performance Plastics Corporation makes no warranty with respect to the accuracy of the information or the suitability of the recommendations, and assumes no liability to any user thereof. The information contained in this sheet does not constitute a hazard assessment and should not be used in place of the user's own assessment of workplace risks as required by other health and safety legislation.