Material Safety Data Sheet

Nitronium tetrafluoroborate, 0.5m solution in sulfolane

ACC# 95291

Section 1 - Chemical Product and Company Identification

MSDS Name: Nitronium tetrafluoroborate, 0.5m solution in sulfolane **Catalog Numbers:** AC175130000, AC175130250, AC175132000

Synonyms:

Company Identification:

Acros Organics N.V.

One Reagent Lane

Fair Lawn, NJ 07410

For information in North America, call: 800-ACROS-01

For emergencies in the US, call CHEMTREC: 800-424-9300

Section 2 - Composition, Information on Ingredients

CAS#	Chemical Name	Percent	EINECS/ELINCS
13826-86-3	Nitronium tetrafluoroborate, 0.5M solution in sulfolane	6.6%	237-533-5
126-33-0	Nitronium tetrafluoroborate, 0.5M solution in sulfolane		204-783-1

Section 3 - Hazards Identification

EMERGENCY OVERVIEW

Appearance: not available liquid.

Danger! Corrosive. Causes eye and skin burns. Causes digestive and respiratory tract burns. Moisture sensitive.

Target Organs: None.

Potential Health Effects

Eye: Causes eye burns. May cause irreversible eye injury.

Skin: Causes skin burns.

Ingestion: Causes gastrointestinal tract burns.

Inhalation: Irritation may lead to chemical pneumonitis and pulmonary edema. Causes chemical burns to the respiratory tract.

Chronic: Not available.

Section 4 - First Aid Measures

Eyes: Immediately flush eyes with plenty of water for at least 15 minutes, occasionally lifting the upper and lower eyelids. Get medical aid imme diately.

Skin: Get medical aid immediately. Immediately flush skin with plenty of water for at least 15 minutes while removing contaminated clothing and shoes.

Ingestion: Get medical aid immediately. Do NOT induce vomiting. If conscious and alert, rinse mouth and drink 2-4 cupfuls of milk or water.

Inhalation: Get medical aid immediately. Remove from exposure and move to fresh air immediately. If not breathing, give artificial respiration. If breathing is difficult, give oxygen.

Notes to Physician: Treat symptomatically and supportively.

Section 5 - Fire Fighting Measures

General Information: As in any fire, wear a self-contained breathing apparatus in pressure-demand, MSHA/NIOSH (approved or equivalent), and full protective gear.

Extinguishing Media: Use water spray, dry chemical, carbon dioxide, or chemical foam.

Flash Point: Not available.

Autoignition Temperature: Not available. **Explosion Limits, Lower:**Not available.

Upper: Not available. **NFPA Rating:** Not published.

Section 6 - Accidental Release Measures

General Information: Use proper personal protective equipment as indicated in Section 8.

Spills/Leaks: Absorb spill with inert material (e.g. vermiculite, sand or earth), then place in suitable container.

Section 7 - Handling and Storage

Handling: Wash thoroughly after handling. Do not breathe dust, vapor, mist, or gas. Do not get in eyes, on skin, or on clothing. Use only

in a chemical fume hood.

Storage: Store in a cool, dry place. Store in a tightly closed container. Keep under a nitrogen blanket. Keep refrigerated. (Store below

4°C/39°F.)

Section 8 - Exposure Controls, Personal Protection

Engineering Controls: Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower. **Exposure Limits**

Chemical Name	ACGIH	NIOSH	OSHA - Final PELs
Nitronium tetrafluoroborate, 0.5M solution in sulfolane	none listed	none listed	none listed
Nitronium tetrafluoroborate, 0.5M solution in sulfolane	none listed	none listed	none listed

OSHA Vacated PELs: Nitronium tetrafluoroborate, 0.5M solution in sulfolane: No OSHA Vacated PELs are listed for this chemical.

Nitronium tetrafluoroborate, 0.5M solution in sulfolane: No OSHA Vacated PELs are listed for this chemical.

Personal Protective Equipment

Eyes: Wear safety glasses and chemical goggles if splashing is possible. **Skin:** Wear appropriate protective gloves to prevent skin exposure.

Clothing: Wear a chemical apron.

Respirators: A NIOSH/MSHA approved air purifying dust or mist respirator or European Standard EN 149.

Section 9 - Physical and Chemical Properties

Physical State: Liquid Appearance: not available Odor: Not available. pH: Not available.

Vapor Pressure: Not available. Vapor Density: Not available. Evaporation Rate:Not available. Viscosity: Not available. Boiling Point: Not available.

Freezing/Melting Point:Not available. Decomposition Temperature:Not available.

Solubility: may decompose

Specific Gravity/Density:1.2680g/cm3

Molecular Formula:BF4NO2 Molecular Weight:132.81

Section 10 - Stability and Reactivity

Chemical Stability: Not available.

Conditions to Avoid: Exposure to moist air or water.

Incompatibilities with Other Materials: Moist air or water, strong oxidizing agents.

Hazardous Decomposition Products: Nitrogen oxides, carbon monoxide, oxides of sulfur, carbon dioxide, hydrogen fluoride gas.

 $\textbf{Hazardous Polymerization:} \ \ \textbf{Has not been reported}.$

Section 11 - Toxicological Information

RTECS#:

CAS# 13826-86-3: QX8620000 CAS# 126-33-0: XN0700000 LD50/LC50:

Not available

CAS# 126-33-0:

Draize test, rabbit, eye: 253 mg Mild; Oral, mouse: LD50 = 1900 mg/kg; Oral, rat: LD50 = 1540 uL/kg; Skin, rabbit: LD50 = 3180 uL/kg; Skin, rat: LD50 = >3800 mg/kg;

Carcinogenicity:

CAS# 13826-86-3: Not listed by ACGIH, IARC, NTP, or CA Prop 65. CAS# 126-33-0: Not listed by ACGIH, IARC, NTP, or CA Prop 65.

Epidemiology: No information available. **Teratogenicity:** No information available. **Reproductive Effects:** No information available.

Mutagenicity: No information available.

Neurotoxicity: No information available.

Other Studies:

Section 12 - Ecological Information

No information available

Section 13 - Disposal Considerations

Chemical waste generators must determine whether a discarded chemical is classified as a hazardous waste. US EPA guidelines for the classification determination are listed in 40 CFR Parts 261.3. Additionally, waste generators must consult state and local hazardous waste regulations to ensure complete and accurate classification.

RCRA P-Series: None listed. RCRA U-Series: None listed.

Section 14 - Transport Information

	US DOT	Canada TDG	
Shipping Name:	CORROSIVE LIQUID, ACIDIC, ORGANIC, N.O.S.	No information available.	
Hazard Class:	8		
UN Number:	UN3265		
Packing Group:	II		

Section 15 - Regulatory Information

US FEDERAL

CAS# 13826-86-3 is listed on the TSCA inventory.

CAS# 126-33-0 is listed on the TSCA inventory.

Health & Safety Reporting List

None of the chemicals are on the Health & Safety Reporting List.

Chemical Test Rules

None of the chemicals in this product are under a Chemical Test Rule.

Section 12b

None of the chemicals are listed under TSCA Section 12b.

TSCA Significant New Use Rule

None of the chemicals in this material have a SNUR under TSCA.

CERCLA Hazardous Substances and corresponding RQs

None of the chemicals in this material have an RQ.

SARA Section 302 Extremely Hazardous Substances

None of the chemicals in this product have a TPQ.

SARA Codes

CAS # 126-33-0: immediate.

Section 313 No chemicals are reportable under Section 313.

Clean Air Act:

This material does not contain any hazardous air pollutants.

This material does not contain any Class 1 Ozone depletors.

This material does not contain any Class 2 Ozone depletors.

Clean Water Act:

None of the chemicals in this product are listed as Hazardous Substances under the CWA.

None of the chemicals in this product are listed as Priority Pollutants under the CWA.

None of the chemicals in this product are listed as Toxic Pollutants under the CWA.

OSHA:

None of the chemicals in this product are considered highly hazardous by OSHA.

STATE

CAS# 13826-86-3 is not present on state lists from CA, PA, MN, MA, FL, or NJ.

CAS# 126-33-0 can be found on the following state right to know lists: Pennsylvania, Massachusetts.

California Prop 65

California No Significant Risk Level: None of the chemicals in this product are listed.

European/International Regulations

European Labeling in Accordance with EC Directives

Hazard Symbols:

Risk Phrases:

R 34 Causes burns.

Safety Phrases:

S 25 Avoid contact with eyes.

S 36/37/39 Wear suitable protective clothing, gloves and eye/face pr otection.

S 45 In case of accident or if you feel unwell, seek medical advice immediately (show the label where possible).

WGK (Water Danger/Protection)

CAS# 13826-86-3: No information available.

CAS# 126-33-0: 1

Canada - DSL/NDSL

CAS# 126-33-0 is listed on Canada's DSL List. CAS# 13826-86-3 is listed on Canada's NDSL List.

Canada - WHMIS

WHMIS: Not available.

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations and the MSDS contains all of the information required by those regulations.

Canadian Ingredient Disclosure List

Section 16 - Additional Information

MSDS Creation Date: 9/02/1997 **Revision #3 Date:** 10/03/2005

The information above is believed to be accurate and represents the best information currently available to us. However, we make no warranty of merchantability or any other warranty, express or implied, with respect to such information, and we assume no liability resulting from its use. Users should make their own investigations to determine the suitability of the information for their particular purposes. In no event shall Fisher be liable for any claims, losses, or damages of any third party or for lost profits or any special, indirect, incidental, consequential or exemplary damages, howsoever arising, even if Fisher has been advised of the possibility of such damages.