

Material Safety Data Sheet

IDENTITY (As Used on Label and List) Selan Antifungal	
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Section I

Manufacturer/Distributor's Name Span-America	Emergency Telephone Number (800) 888-6752
Address (Number, Street, City, State, and ZIP Code) 70 Commerce Center	Telephone Number for Information (864) 288-6752
Greenville, SC 29615	Date Prepared: 01/26/04

Section II - Hazard Ingredients/Identity Information

Hazardous Components (Specific Chemical Identity; Common Name(s))	CAS #	OSHA PEL	ACGIH TLV	STEL	HAZARDOUS
Chemical Name	Trade/Common				
Blend of fatty alcohol and ethoxylated sorbitan ester	Polawax	N/A	N/A	N/A	None Found
Glycol	PGUSPRV Propylene Glycol – USP RV	57-55-6	N/A	N/A	
TBF 9 – (5 to 600M)	Dimethylpolysiloxane	N/A	N/A	N/A	None Found
1H-imidazole, 1-{(2,4-dichlorophenyl)-2[(2,4-dichlorophenyl) methoxy] ethyl}- mononitrate	Miconazole Nitrate	22832-87-7	N/A	N/A	
Zinc Oxide Powder	Zinc White, Chinese White	1314-13-2	N/A	10mg/M3	

Section III - Physical/Chemical Characteristics

NFPA/HMIS Ratings

Trade/Common Name	Health	Flammability	Reactivity	Special/Other
Polawax	0	0	0	PPE Code B
Propylene Glycol	0	1	0	
Dimethylpolysiloxane	0	0	0	
Miconazole Nitrate				
Zinc Oxide	1	0	0	PPE Code E

Polarwax

Boiling Point	Not Available	Specific Gravity (H ₂ O = 1)	N/A
Vapor Pressure (mm Hg.)	Not Available	Melting Point	50-54° C
Vapor Density (AIR = 1)	Not Available	Evaporation Rate (Butyl Acetate = 1)	N/A
Solubility in Water	Emulsifiable	pH	5.5 – 7.0 (3% in water)
Appearance/Physical State	Creamy white, waxy solid	Odor	Mild characteristic

Propylene Glycol

Boiling Point	187.2° C (369°F)	Specific Gravity (H ₂ O = 1)	1.0381
Vapor Pressure (mm Hg.)	<1 mm Hg @ 25° C (77° F)	Melting/Freezing Point	< - 60° C (< - 76° F)
Vapor Density (AIR = 1)	5.2	Evaporation Rate (Butyl Acetate = 1)	<1
Solubility in Water	Slight (0.1-1%)	pH	6
Appearance/Physical State	Colorless mobile liquid	Odor	Mild Odor

Dimethylpolysiloxane

Boiling Point	N/A	Specific Gravity (H ₂ O = 1)	.97
Vapor Pressure (mm Hg.)	NEG	Melting/Freezing Point	N/A
Vapor Density (AIR = 1)	N/A	Evaporation Rate (Butyl Acetate = 1)	<1
Solubility in Water	Insoluble	Acid/Alkalinity (MEQ/G)	7
Appearance /Physical State	Clear liquid	Odor	None
% Volatile by Weight	<1	Density (Kg/M3)	958.5

Miconazole Nitrate

Boiling Point	N/A	Specific Gravity (H ₂ O = 1)	N/A
Vapor Pressure (mm Hg.)	N/A	Melting/Freezing Point	N/A
Vapor Density (AIR = 1)	N/A	Evaporation Rate (Butyl Acetate = 1)	N/A
Solubility in Water	Very Slightly Soluble	Acid/Alkalinity (MEQ/G)	N/A
Appearance /Physical State	White or practically white crystalline or powder	Odor	Slight
% Volatile by Weight	N/A	Density (Kg/M3)	N/A

Zinc Oxide

Boiling Point	N/A	Specific Gravity (H ₂ O = 1)	5.61
Vapor Pressure (mm Hg.)	Sublimes @ 1975° C	Melting/Freezing Point	N/A
Vapor Density (AIR = 1)	N/A	Evaporation Rate (Butyl Acetate = 1)	N/A
Solubility in Water	0.00016g/100ml cold water; soluble in acids and bases	Acid/Alkalinity (MEQ/G)	N/A
Appearance /Physical State	Fine white powder	Odor	None
% Volatile by Weight	N/A	Molecular Weight	81.38

Section IV - Fire and Explosion Hazard Data

Polarwax

Flash Point (Method Used) Closed Cup Method: Not Established	Flammable Limits	LEL N/A	UEL N/A
Extinguishing Media: Dry Chemical, foam, carbon dioxide, water spray			
Special Fire Fighting Procedures: Wear self-contained breathing apparatus and other protective clothing			
Unusual Fire and Explosion Hazards NONE			

Propylene Glycol

Flash Point (Method Used) Closed Cup Method 100° C (212° F)	Flammable Limits	LEL 2.6	UEL 12.5
Extinguishing Media: Use water spray, dry chemical, foam, or carbon dioxide. Use water spray to cool fire-exposed containers. Water or foam may cause frothing			
Special Fire Fighting Procedures No special equipment or procedures required			
Unusual Fire and Explosion Hazards: None			
Ignition Temperature: 371.1° C (700° F)			

Dimethylpolysiloxane

Flash Point (Method Used) >204° C >400° F	Flammable Limits	LEL N/A	UEL N/A
Extinguishing Media: All standard firefighting media			
Special Fire Fighting Procedures: None Known			
Sensitivity to mechanical Impact: No			
Unusual Fire and Explosion Hazards: None Known			
Sensitivity to static discharge: Sensitivity to static discharge is not expected			

Miconazole Nitrate

Flash Point (Method Used) N/A	Flammable Limits	LEL N/A	UEL N/A
Extinguishing Media: Water spray, dry chemical, carbon dioxide or foam as appropriate for surrounding fire and materials			
Special Fire Fighting Procedures: As with all fires, evacuate personnel to safe area. Firefighters should use self-contained breathing equipment and protective clothing			
Auto-ignition temperature: 350°C			
Unusual Fire and Explosion Hazards: This material is assumed to be combustible. As with all dry powders it is advisable to ground mechanical equipment in contact with dry material to dissipate the potential buildup of static electricity. When heated to decomposition material emits toxic of NO and CI fumes. Emits toxic fumes under fire conditions.			

Zinc Oxide

Flash Point (Method Used) N/A	Flammable Limits	LEL N/A	UEL N/A
Extinguishing Media: None – Material will not burn			
Special Fire Fighting Procedures: None Known			
Auto-ignition temperature: N/A			
Unusual Fire and Explosion Hazards: None known			

Section V – Stability and Reactivity Data

Polarwax

Stability	Stable	Conditions to Avoid: None Known
Incompatibility (<i>Materials to Avoid</i>)	Strong oxidizing agents	
Hazardous Decomposition or Byproducts	Oxides of carbon	
Hazardous Polymerization	Will Not Occur	Conditions to Avoid: None Known

Propylene Glycol

Stability	Stable	Conditions to Avoid: None Known
Incompatibility (<i>Materials to Avoid</i>)	None Known	
Hazardous Decomposition or Byproducts – heat/combustion		Toxic levels of carbon monoxide, carbon dioxide, irritating aldehydes and ketones
Hazardous Polymerization	Will Not Occur	Conditions to Avoid: None Known

Dimethylpolysiloxane

Stability	Stable	Conditions to Avoid: None Known
Incompatibility (<i>Materials to Avoid</i>)	None Known	
Hazardous Decomposition or Byproducts – heat/combustion		Carbon monoxide, carbon dioxide, formaldehyde
Hazardous Polymerization	Will Not Occur	Conditions to Avoid: None Known

Miconazole Nitrate

Stability	Stable	Conditions to Avoid: Material is stable from a safety point of view – avoid exposure to light
Incompatibility (<i>Materials to Avoid</i>)	None Known	
Hazardous Decomposition or Byproducts – heat/combustion		Material emits toxic fumes of NO _x and Cl. Emits toxic fumes under fire conditions
Hazardous Polymerization	Will Not Occur	Conditions to Avoid: None Known

Zinc Oxide

Stability	Stable	Conditions to Avoid: None Known
Incompatibility (<i>Materials to Avoid</i>)	Intimate mixtures with chlorinated rubber above 216° C	
Hazardous Decomposition or Byproducts – heat/combustion	None Known	
Hazardous Polymerization	Will Not Occur	Conditions to Avoid: None Known

Section VI - Health Hazard Data

Polarwax

Route(s) of Entry:	Inhalation?	Skin?	Ingestion?
Health Hazards (<i>Acute and Chronic</i>)	None determined		None determined
Carcinogenicity:	Non-carcinogenic	IARC Monographs? No	OSHA Regulated? No
Signs and Symptoms of Exposure	None determined		
Medical Conditions Generally Aggravated by Exposure	None determined		
Emergency and First Aid Procedures			
Skin	Wash with soap and water		
Eyes	Flush with water for at least 15 minutes. If irritation develops, get medical attention		
Ingested	Get medical attention		

Propylene Glycol

Route(s) of Entry:	Inhalation?	Skin/Eyes?	Ingestion?
Health Hazards (<i>Acute and Chronic</i>)	Practically non-toxic	Practically non-toxic	Practically non-toxic
Carcinogenicity:	Non-carcinogenic	IARC Monographs? No	OSHA Regulated? No
Signs and Symptoms of Exposure	None determined		
Medical Conditions Generally Aggravated by Overexposure	Vapors or mist in excess of permissible concentrations or in usually high concentrations generated from spraying, heating the material or as from exposure in poorly ventilated areas or confined spaces may cause irritation of the nose, throat, headache, nausea, and drowsiness	Brief contact is not irritating. Prolonged contact as with clothing wetted with material may cause defatting or skin or irritation	If more than several mouthfuls are swallowed, abdominal discomfort, nausea, and diarrhea may occur. Aspiration may occur during swallowing or vomiting resulting in lung damage.
Emergency and First Aid Procedures			
Skin	Wash with soap and water. Get medical attention if skin irritation develops		
Eyes	Flush with water for at least 15 minutes. If irritation develops, get medical attention		
Ingested	If person is conscious and can swallow, give two glasses of water (16 oz.) but do not induce vomiting. If vomiting occurs, give fluids again. Get medical attention		
Inhalation	If irritation, headache, nausea, or drowsiness occurs, remove to fresh air. Get medical attention if breathing becomes difficult.		

Dimethylpolysiloxane

Route(s) of Entry:	Inhalation?	Skin/Eyes?	Ingestion?
Health Hazards (<i>Acute and Chronic</i>)	None determined	Skin - None determined Eyes – May cause mild eye irritation	None determined
Carcinogenicity:	Non-carcinogenic	IARC Monographs? No	OSHA Regulated? No
Signs and Symptoms of Exposure	None determined	None determined	None determined
Medical Conditions Generally Aggravated by Exposure	None determined	None determined	None determined
Emergency and First Aid Procedures			
Skin	Wash with soap and water		
Eyes	Flush with water for at least 15 minutes. If irritation develops, get medical attention		
Ingested	None Known		
Inhalation	None Known		
Other	Attention: Not for injection into humans. This product contains Methylpolysiloxanes, which can generate Formaldehyde at approximately 300° F (150° C) and above. In atmospheres which contain oxygen.		

Miconazole Nitrate

Route(s) of Entry:	Inhalation?	Skin/Eyes?	Ingestion?
Health Hazards (<i>Acute and Chronic</i>)	Possible allergic reaction	Possible mild irritation to mucous membranes	Adverse effects include vomiting, diarrhea, convulsions and heart rhythm disorders
Carcinogenicity:	Non-carcinogenic	IARC Monographs? No	OSHA Regulated? No
Signs and Symptoms of Exposure	None determined		
Medical Conditions Generally Aggravated by Exposure	Hypersensitivity to the material	Hypersensitivity to the material	Hypersensitivity to the material
Emergency and First Aid Procedures			
Skin	There is little absorption through the skin or mucous membranes when Miconazole Nitrate is applied topically, however, it has caused contact dermatitis. Flush with copious amounts of water.		
Eyes	Flush with water for at least 15 minutes. If irritation develops, get medical attention		
Ingested	May cause irritation. Flush out mouth with water.		
Inhalation	May cause irritation of respiratory tract. Remove to fresh air		

Zinc Oxide

Route(s) of Entry:	Inhalation?	Skin/Eyes?	Ingestion?
Health Hazards (<i>Acute and Chronic</i>)	Dust can cause irritation of the nose, throat, and upper respiratory tract: Coughing and choking	Dust may irritate or dry the skin Dust may cause eye irritation	Non-toxic. Although ingestion is unlikely, it can result in consequent pain, nausea, vomiting, thirst and diarrhea
Carcinogenicity:	Non-carcinogenic	IARC Monographs? No	OSHA Regulated? No
Signs and Symptoms of Overexposure	Chills, mild fever and aching muscles and joints lasting 24 hours or less		
Medical Conditions Generally Aggravated by Exposure	Hypersensitivity to the material	Hypersensitivity to the material	Hypersensitivity to the material
Emergency and First Aid Procedures			
Skin	Wash with soap and water		

Eyes	Flush with water for at least 15 minutes. If irritation develops, get medical attention
Ingested	None Known
Inhalation	Remove to fresh air. If breathing difficult, assist breathing and seek medical attention

Section VII - Precautions for Safe Handling and Use

Polarwax

Steps to Be Taken in Case Material is Released or Spilled		
Clean up with inert absorbent material and place into a separate waste container. Flush area with warm water		
Waste Disposal Method	None Listed	
Precautions to Be taken in Handling and Storing		To optimize product integrity and quality, store under cool, dry conditions
Other Precautions: None		

Propylene Glycol

Steps to Be Taken in Case Material is Released or Spilled	
Contain spill if possible, contain with absorbent materials such as clay or soil, and shovel up. Avoid skin and eye contact.	
Waste Disposal Method	This product has been evaluated for RCRA characteristics and does not meet the criteria of a hazardous waste if discarded in its purchased form.
Precautions to Be taken in Handling and Storing	Handling: Minimum feasible handling temperatures should be maintained. Storage: Periods of exposure to high temperatures should be minimized. Water contamination should be avoided
Other Precautions: None	

Dimethylpolysiloxane

Steps to Be Taken in Case Material is Released or Spilled	
Wipe, scrap or soak up in an inert material and put in a container for disposal. Wash walking surfaces with detergent and water to reduce slipping hazard.	
Waste Disposal Method	Should be made in accordance with federal, state, and local regulations. Incineration recommended in approved incinerator according to state, federal, and local regulations.
Precautions to Be taken in Handling and Storing	Handling: Minimum feasible handling temperatures should be maintained. Storage: Periods of exposure to high temperatures should be minimized. Water contamination should be avoided
Other Precautions: None	

Miconazole Nitrate

Steps to Be Taken in Case Material is Released or Spilled	
Wear approved respirator and chemically compatible gloves. Vacuum or sweep up spillage. Avoid dust. Place spillage in appropriate container for waste disposal. Wash contaminated clothing before reuse. Ventilate area and wash spill site.	
Waste Disposal Method	Should be made in accordance with federal, state, and local regulations.
Precautions to Be taken in Handling and Storing	Store in light resistant container. This material should be handled and stored per label and other instructions to ensure product integrity
Other Precautions: Avoid contact with eyes, skin or clothing. Avoid breathing dust or mist. Use with adequate dust control. Wash thoroughly after handling. Wear fresh clothing daily. Wash contaminated clothing before reuse. Do not permit drinking or smoking near material.	

Zinc Oxide

Steps to Be Taken in Case Material is Released or Spilled	
Sweep or vacuum spills into a container. Spilled areas may be washed with water but do NOT wash into sewer.	
Waste Disposal Method	Waste zinc oxide should be handled in a manner which complies with local, state and federal regulations
Precautions to Be taken in Handling and Storing	Store in a dry area
Other Precautions: None	

Section VIII - Control Measures

Polarwax

Respiratory Protection (<i>Specify Type</i>)	Not required	
Ventilation	Normal ventilation adequate	Special: None
	Mechanical (<i>General</i>)	Other
Protective Gloves: Wear Impervious Gloves	Eye Protection: Use OSHA approved safety glasses	
Other Protective Clothing or Equipment: None		
Work/Hygienic Practices: Follow Good Manufacturing Practices		

Propylene Glycol

Respiratory Protection (<i>Specify Type</i>)		Not required	
Ventilation	Local exhaust ventilation recommended if generating vapor, dust, or mist.		Special: None
Mechanical (<i>General</i>)		Other	
Protective Gloves: None listed		Eye Protection: Safety glasses, chemical type goggles or face shield recommended to prevent eye contact	
Other Protective Clothing or Equipment: None			
Work/Hygienic Practices: Workers should wash exposed skin several times daily with soap and water. Soiled work clothing should be washed or dry cleaned			

Dimethylpolysiloxane

Respiratory Protection (<i>Specify Type</i>)		Not required	
Ventilation	None Known		Special: None
Mechanical (<i>General</i>): None Known		Other: None Known	
Protective Gloves: None listed		Eye Protection: Safety glasses	
Other Protective Clothing or Equipment: None			
Work/Hygienic Practices: Follow Good Manufacturing Practices			

Miconazole Nitrate

Respiratory Protection (<i>Specify Type</i>)		NIOSH approved respirator	
Ventilation	Adequate		Special: None
Mechanical (<i>General</i>): None Known		Other: None Known	
Protective Gloves: Rubber		Eye Protection: Safety goggles	
Other Protective Clothing or Equipment: Appropriate laboratory apparel, protect exposed skin			
Work/Hygienic Practices: Follow Good Manufacturing Practices			

Zinc Oxide

Respiratory Protection (<i>Specify Type</i>)		Wear OSHA approved dust mask or respirator	
Ventilation	Provide sufficient local ventilation if TLV likely to be exceeded		Special: None
Mechanical (<i>General</i>): None Known		Other: None Known	
Protective Gloves: Gloves recommended or use barrier cream		Eye Protection: Safety goggles	
Other Protective Clothing or Equipment: Full protective clothing is recommended for bulk dust handling			
Work/Hygienic Practices: Follow Good Manufacturing Practices			

DISCLAIMER

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