



Material Safety Data Sheet

NFPA	HMIS	Personal Protective Equipment
	Health Hazard 1 Fire Hazard 1	
	Reactivity	See Section 15.

Section 1. Chem	ical Product and Company Identification			Page Number: 1	
Common Name/ Trade Name	Doxan	Catalog Number(s).	D1096		
	DUXAII		CAS#	17086-28-1	
Manufacturer	MICROWISE COMPANY		RTECS	QI8650000	
			TSCA	TSCA 8(b) inventory: No products were found.	
Commercial Name(s)	DOXAN		CI#	Not available.	
Synonym	4-(Dimethylamino)-1,4,4alpha,5,5alpha,6,11,12alpha- Monohydrate; 6-Deoxy-5-oxytetracycline monohydrate		IN CASE OF EMERGENCY		
Chemical Name	2-Naphthacenecarboxamide,4-(dimethylamino)-1,4,4a monohydrate, (4S,4aR,5S,5aR,6R,12aS)- (9CI)	1,5,5a,6,11,12a-c	CHEMTREC	(24hr) 800-424-9300	
Chemical Family	Not available.		CALL (310) 516-8000		
Chemical Formula	C22-H24-N2-O8.H2O				
Section 2.Compo	sition and Information on Ingredients				
		8	Exposure Limits		

			Exposure Limits			
Name		CAS #	TWA (mg/m ³)	STEL (mg/m ³)	CEIL (mg/m ³)	% by Weight
1) Doxycycline, Monohydrate 17086-28-1						100
Toxicological Data on Ingredients						
Section 3. Hazards lo	lentification					
Potential Acute Health Effects	Slightly hazardous in case of skin contact (irritant), of eye contact (irritant), of ingestion, of inhalation.					
Potential Chronic Health Effects	CARCINOGENIC EFFECTS: Not available. MUTAGENIC EFFECTS: Not available. TERATOGENIC EFFECTS: Not available. DEVELOPMENTAL TOXICITY: Not available. Repeated or prolonged exposure is not known to aggravate medical condition.					

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Section 4. First Aid Me	easures
Eye Contact	Check for and remove any contact lenses. In case of contact, immediately flush eyes with plenty of water for a least 15 minutes. Cold water may be used. WARM water MUST be used. Get medical attention if irritation occurs.
Skin Contact	Wash with soap and water. Cover the irritated skin with an emollient. Get medical attention if irritation develops
Serious Skin Contact	Not available.
Inhalation	If inhaled, remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Get medical attention.
Serious Inhalation	Not available.
Ingestion	Do NOT induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. Loosen tight clothing such as a collar, tie, belt or symptoms appear.
Serious Ingestion	Not available.
Section 5. Fire and E	xplosion Data
Flammability of the Product	May be combustible at high temperature.
Auto-Ignition Temperature	Not available.
Flash Points	Not available.
Flammable Limits	Not available.
Products of Combustion	These products are carbon oxides (CO, CO2), nitrogen oxides (NO, NO2).
Fire Hazards in Presence of Various Substances	Slightly flammable to flammable in presence of heat.
Explosion Hazards in Presence of Various Substances	Risks of explosion of the product in presence of mechanical impact: Not available. Risks of explosion of the product in presence of static discharge: Not available.
Fire Fighting Media and Instructions	SMALL FIRE: Use DRY chemical powder. LARGE FIRE: Use water spray, fog or foam. Do not use water jet.
Special Remarks on Fire Hazards	As with most organic solids, fire is possible at elevated temperatures
Special Remarks on Explosion Hazards	Fine dust dispersed in air in sufficient concentrations, and in the presence of an ignition source is a potential dust explosion hazard.
Section 6. Accidental	Release Measures
Small Spill	Use appropriate tools to put the spilled solid in a convenient waste disposal container. Finish cleaning by spreading water on the contaminated surface and dispose of according to local and regional authority requirements.
Large Spill	Use a shovel to put the material into a convenient waste disposal container. Finish cleaning by spreading water on the contaminated surface and allow to evacuate through the sanitary system.

Section 7. Handling and Storage

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Precautions	Keep away from heat. Keep away from sources of ignition. Ground all equipment containing material. Do not ingest. Do not breathe dust. If ingested, seek medical advice immediately and show the container or the label. Keep away from incompatibles such as oxidizing agents.		
Storage	Keep container tightly closed. Keep container in a cool, well-ventilated area. Sensitive to light. Store in light-resistant containers.		
Section 8. Exposure	Controls/Personal Protection		
Engineering Controls	Use process enclosures, local exhaust ventilation, or other engineering controls to keep airborne levels below recommended exposure limits. If user operations generate dust, fume or mist, use ventilation to keep exposure to airborne contaminants below the exposure limit.		
Personal Protection	Safety glasses. Lab coat. Dust respirator. Be sure to use an approved/certified respirator or equivalent. Gloves.		
Personal Protection in Case of	Splash goggles. Full suit. Dust respirator. Boots. Gloves. A self contained breathing apparatus should be used		
a Large Spill	to avoid inhalation of the product. Suggested protective clothing might not be sufficient; consult a specialist BEFORE handling this product.		
Exposure Limits	Not available.		

Section 9. Physical and Chemical Properties

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Physical state and appearance	Solid. (Crystalline powder.)	Odor	Odorless.
Molecular Weight	462.45 g/mole	Taste	Not available.
pH (1% soln/water)	Not available.	Color	Yellow.
Boiling Point	Not available.		
Melting Point	Not available.		
Critical Temperature	Not available.		
Specific Gravity	Not available.		
Vapor Pressure	Not applicable.		
Vapor Density	Not available.		
Volatility	Not available.		
Odor Threshold	Not available.		
Water/Oil Dist. Coeff.	Not available.		
Ionicity (in Water)	Not available.		
Dispersion Properties	Not available.		
Solubility	Very slightly soluble in cold water. Insoluble in diethyl ether. Sparingly soluble in alcohol. Insoluble in chloroform. Freely soluble in dilute acid and alkali hydroxide s	solutions.	

Doxycycline, Monohydrate

Section 10. Stability	and Reactivity Data
Stability	The product is stable.
Instability Temperature	Not available.
Conditions of Instability	Excess heat, incompatible materials, light
Incompatibility with various substances	Reactive with oxidizing agents.
Corrosivity	Not available.
Special Remarks on Reactivity	Sensitive to light.
Special Remarks on Corrosivity	Not available.
Polymerization	Will not occur.
Section 11. Toxicolo	gical Information
Routes of Entry	Inhalation. Ingestion.
Toxicity to Animals	For Doxycycline: Acute oral toxicity (LD50): 1870 mg/kg [Mouse].
Chronic Effects on Humans	Not available.
Other Toxic Effects on Humans	Slightly hazardous in case of skin contact (irritant), of ingestion, of inhalation.
Special Remarks on Toxicity to Animals	Not available.
Special Remarks on Chronic Effects on Humans	May affect genetic material (mutagenic). May cause adverse reproductive effects based on animal test data
Special Remarks on other Toxic Effects on Humans	Potential Health Effects: Skin: May cause skin irritation. Eyes: Dust may cause eye irritation. Inhalation: Dust may cause respiratory tract irritation. Ingestion: Can cause gastric irritation and distress with adbominal discomfort, nausea, vomiting, diarrhea, epigastric burning (esophagitis), hiccups, dysphagia, enterocolitis. It may rarely cause anosmia (an absent or impaired sens of smell). May also affect the urinary system/kidneys (nephrotoxicity, polydipsia, polyuria, proteinuria, glycosuria, aminoaciduria), metabolism (metabolic acidosis), liver (hepatocellular necrosis with cholestasis), blood (anemia, leukopenia, neutropenia, eosinophilia, thromobocytopenia), cardiovascular system (tachycardia, sporadic Wenckebach heart block). May also cause skin hyperpigmention/phototoxicity (photosenitivity reactions). May cause hypersensitivity reactions such as urticaria, angioneurotic edema, anaphylaxis, purpura, and serum sickness. May cause Porphyria. Medical Conditions Aggravated by Exposure: Hypersensitivity to material; Porphyria
Section 12. Ecologic	al Information
Ecotoxicity	Not available.
BOD5 and COD	Not available.
Products of Biodegradation	Possibly hazardous short term degradation products are not likely. However, long term degradation products may arise.
Toxicity of the Products of Biodegradation	The product itself and its products of degradation are not toxic.
Special Remarks on the Products of Biodegradation	Not available.

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Section 13. Disposa	al Considerations	
Waste Disposal	Waste must be disposed of in accordance with federal, state and local environmental control regulations.	
Section 14. Transp	port Information	
DOT Classification	Not a DOT controlled material (United States).	
Identification	Not applicable.	
Special Provisions for Transport	Not applicable.	
DOT (Pictograms)	\bigotimes	
Section 15. Other	Regulatory Information and Pictograms	
Federal and State Regulations	California prop. 65: This product contains the following ingredients for which the State of California has found to cause cancer, birth defects or other reproductive harm, which would require a warning under the statute: Doxycycline, Monohydrate California prop. 65: This product contains the following ingredients for which the State of California has found to cause birth defects which would require a warning under the statute: Doxycycline, Monohydrate	
California Proposition 65 Warnings	California prop. 65: This product contains the following ingredients for which the State of California has fou to cause cancer which would require a warning under the statute: No products were found. California prop. 65: This product contains the following ingredients for which the State of California has fou to cause birth defects which would require a warning under the statute: Doxycycline, Monohydrate	
Other Regulations	Not available.	
Other Classifications	WHMIS (Canada) Not controlled under WHMIS (Canada).	
	DSCL (EEC) This product is not classified according Not applicable. to the EU regulations.	
HMIS (U.S.A.)	Health Hazard 1 Fire Hazard 1 Reactivity 0 Personal Protection E	
WHMIS (Canada) (Pictograms)		
DSCL (Europe) (Pictograms)		
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Doxycycline, Mono	hydrate		Page Number: 6
TDG (Canada) (Pictograms)	\bigotimes		
ADR (Europe) (Pictograms)			
Protective Equipment		Gloves.	
		Lab coat.	
		Dust respirator. Be sure to use an approved/certified respirator or equivalent.	
	$\nabla \overline{\mathcal{O}}$	Safety glasses.	

Section 16. C	Section 16. Other Information				
MSDS Code	D5709				
References	Not available.				
Other Special Considerations	Major Use: Antibiotic				
Validated by Sonia Owen on 8/22/2006.		Verified by Sonia Owen. Printed 9/12/2006.			
CALL (310) 516-800	00				

Notice to Reader

All chemicals may pose unknown hazards and should be used with caution. This Material Safety Data Sheet (MSDS) applies only to the material as packaged. If this product is combined with other materials, deteriorates, or becomes contaminated, it may pose hazards not mentioned in this MSDS. It shall be the user's responsibility to develop proper methods of handling and personal protection based on the actual conditions of use. While this MSDS is based on technical data judged to be reliable, Spectrum Quality Products, Inc. assumes no responsibility for the completeness or accuracy of the information contained herein.