

MATERIAL SAFETY DATASHEET (MSDS)

"NODULARIN"

SECTION I - Product Identification

PRODUCT NAME: NODULARIN

DATE: 04/26/06

CAS #: 118399-22-7

SYNONYMS: NA

SECTION II – Hazards Identification

MAY CAUSE SKIN IRRITATION AND/OR DERMATITIS. INHALATION MAY CAUSE IRRITATION OF RESPIRATORY TRACT. INGESTION MAY BE HARMFUL IF SWALLOWED. AVOID CONTACT WITH EYES.

SECTION III - Physical Data

APPEARANCE AND ODOR: CLEAR OIL. PHYSICAL STATE: LIQUID.

FORMULA: $C_{41}H_{60}N_8O_{10}$.

MOLECULAR WEIGHT: 825.

SOLUBILITY: SLIGHTLY SOLUBLE IN WATER.

SECTION IV - Fire and Explosion Hazard Data

USE DRY CHEMICAL, CO₂, WATER SPRAY OR "ALCOHOL" FOAM. BURNING PRODUCES IRRITANT FUMES. WEAR SELF-CONTAINED BREATHING APPARATUS PRESSURE-DEMAND, MSHA/NIOSH (APPROVED OR EQUIVALENT) AND FULL PROTECTIVE GEAR. WATER MIST MAY BE USED TO COOL CLOSED CONTAINERS.

SECTION V - Health Hazard Data

IN THE CASE OF ACCIDENT OR IF YOU FEEL ILL (ABNORMAL), SEEK MEDICAL ADVICE IMMEDIATELY (SHOW THE LABEL WHERE POSSIBLE). IF INHALED, MOVE TO FRESH AIR. CALL A PHYSICIAN IMMEDIATELY. IF SKIN CONTACT OCCURS AND IRRITATION DEVELOPS, RINSE IMMEDIATELY WITH PLENTY OF WATER AND SEEK MEDICAL ADVICE. IN THE CASE OF CONTACT WITH EYES, RINSE IMMEDIATELY WITH PLENTY OF WATER AND SEEK MEDICAL ADVICE. IF INGESTED DO NOT INDUCE VOMITING WITHOUT MEDICAL ADVICE.

SECTION VI – Stability and Reactivity Data

STABILITY: STABLE UNDER RECOMMENDED STORAGE CONDITIONS. HAZARDOUS COMBUSTION OR DECOMPOSITION PRODUCTS: NITROGEN OXIDES (NO_x)/AMMONIA/CN-. HAZARDOUS POLYMERIZATION: NONE UNDER NORMAL PROCESSING
AVOID EXPOSURE TO AIR OR MOISTURE OVER PROLONGED PERIODS.

SECTION VII - Spill and Disposal Procedures

WASTE DISPOSAL MUST BE IN ACCORDANCE WITH APPROPRIATE FEDERAL, STATE, AND LOCAL REGULATIONS. THIS PRODUCT, IF UNALTERED BY USE, MAY BE DISPOSED OR BY TREATMENT AT A PERMITTED FACILITY OR AS DEvised BY YOUR LOCAL HAZARDOUS WASTE REGULATORY AUTHORITY. RESIDUE FROM FIRES EXTINGUISHED WITH THIS MATERIAL MAY BE HAZARDOUS. DO NOT RE-USE EMPTY CONTAINERS.

SECTION VIII - Protective Equipment

ENSURE ADEQUATE VENTILATION. BREATHING APPARATUS ONLY IF AEROSOL OR DUST IS FORMED. PVC OR OTHER PLASTIC MATERIAL GLOVES. USUAL SAFETY PRECAUTIONS WHILE HANDLING THE PRODUCT WILL PROVIDE ADEQUATE PROTECTION AGAINST THIS POTENTIAL EFFECT. SAFETY GLASSES WITH SIDE-SHIELDS. HANDLE IN ACCORDANCE WITH GOOD INDUSTRIAL HYGIENE AND SAFETY PRACTICE.

SECTION IX - Storage and Handling Precautions

STORAGE +4 DEGREES CELSIUS. HANDLE ONLY IN AREA PROVIDED WITH APPROPRIATE EXHAUST VENTILATION. WEAR PERSONAL PROTECTIVE EQUIPMENT. OXIDISING AND SPONTANEOUSLY FLAMMABLE PRODUCTS.

SECTION X - Transportation Data and Additional Information

SHIPPING: TREAT AS A HAZARDOUS MATERIAL.

SECTION XI - Toxicity Data

LD₅₀S and LC₅₀S: NOT DETERMINED.
CHRONIC EXPOSURE: MAY CAUSE NAUSEA AND VOMITING, HIGHER EXPOSURE CAUSES UNCONSCIOUSNESS.
SYMPTOMS OF OVEREXPOSURE: HEADACHE, DIZZINESS, TIREDNESS, NAUSEA, VOMITING, REDNESS, SWELLING

References available upon request.

Material Safety Data Sheets are periodically reviewed and modified as new information becomes available.