

Item# 30904

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MATERIAL SAFETY DATA SHEET

DATE PREPARED:
REVISED JUNE 20, 2000.

IDENTITY (AS USED ON LABEL AND LIST): AQUA AMMONIA, 28%

SECTION I

MANUFACTURER'S NAME: EMERGENCY TELEPHONE NUMBER:
NAR ENTERPRISES, INC. (253)476-9401 OR 1-888-474-5699

ADDRESS: 5202 SOUTH PROCTOR STREET, BLDG. A
TACOMA, WASHINGTON 98409

SECTION II - HAZARDOUS INGREDIENTS/IDENTITY INFORMATION

HAZARDOUS COMPONENTS CHEMICAL NAME:	OSHA PEL	ACGIH TLV	OTHER LIMITS	PERCENT
AMMONIUM HYDROXIDE (CAS #1336-21-6)	50 PPM	25 PPM	35 PPM (STEL)	28%

SECTION III - PHYSICAL/CHEMICAL CHARACTERISTICS

BOILING POINT: 27 Degrees C SPECIFIC GRAVITY: 0.9
 VAPOR PRESSURE (MM HG): 501 MELTING POINT: APPROX. -77 C
 VAPOR DENSITY (AIR=1): 0.596 EVAPORATION RATE(BUTYL ACETATE=1): SLOWER
 SOLUBILITY IN WATER: COMPLETELY
 APPEARANCE AND ODOR: WATER-WHITE LIQUID; STRONG, PUNGENT AMMONIA ODOR.

SECTION IV - FIRE AND EXPLOSION HAZARD DATA

FLASH POINT: NON-FLAMMABLE FLAMMABLE LIMITS: N/A LEL: 16 UEL: 25
 EXTINGUISHING MEDIA: WATER - OR OTHER EXTINGUISHING AGENT
 APPROPRIATE TO SURROUNDING FIRE CONDITIONS.

SPECIAL FIRE FIGHTING PROCEDURES: FIREFIGHTERS SHOULD WEAR SELF-CONTAINED NIOSH-APPROVED BREATHING APPARATUS AND FULL PROTECTIVE CLOTHING.

UNUSUAL FIRE AND EXPLOSION HAZARDS: LIMITED POTENTIAL EXISTS FOR CONTAINERS TO RUPTURE IN FIRE DUE TO OVER-PRESSURIZATION. AMMONIA VAPORS IN THE PRESENCE OF OIL OR OTHER COMBUSTIBLE MATERIALS WILL INCREASE THE FIRE HAZARD. ACCUMULATIONS OF AMMONIA IN CONFINED SPACES MAY EXPLODE IF EXPOSED TO A STRONG IGNITION SOURCE.

SECTION V - REACTIVITY DATA

STABILITY: STABLE HAZARDOUS POLYMERIZATION: WILL NOT OCCUR
 CONDITIONS TO AVOID INSTABILITY: HEAT RELEASES GAS WITHOUT VIOLENCE IN THE ABSENCE OF INCOMPATIBLE MATERIALS.
 MATERIALS AND CONDITIONS TO AVOID INCOMPATIBILITY: STRONG OXIDIZERS, INCLUDING HALOGENS. ACIDS: HYDROCHLORIC, HYDROFLUORIC, NITRIC, AND SULFURIC. ALSO REACTS WITH ACROLEIN, ACRYLIC ACID, DIMETHYL SULFATE, GOLD, SILVER NITRATE, SILVER OXIDE PLUS ETHYL ALCOHOL, HYPOCHLORITES OF CALCIUM OR SODIUM, MERCURY PROPYLENE OXIDE, IODINE.
 HAZARDOUS DECOMPOSITION PRODUCTS: NOT RELEVANT

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SECTION VI - HEALTH HAZARD DATA

ROUTE(S) OF ENTRY:	INHALATION? YES	SKIN? YES	INGESTION? YES
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HEALTH HAZARDS (ACUTE AND CHRONIC): INHALATION: SEVERELY IRRITATING TO THROAT AND RESPIRATORY TRACT. INGESTION: CAUSES SEVERE BURNING OF THE ESOPHAGUS, STOMACH, MOUTH, AND THROAT. POSSIBLE DEATH FROM SHOCK OR ASPHYXIA MAY RESULT. SKIN: CORROSIVE BURNS OR BLISTER FORMATION IF CONTACT IS PROLONGED. EYES: IMMEDIATE INTENSE IRRITATION AND PAIN. IN EXTREME EXPOSURE, CORNEAL ULCERATION OR BLINDNESS MAY RESULT.

CARCINOGENICITY: NTP? NO IARC MONOGRAPHS? NO OSHA REGULATED? NO

SIGNS AND SYMPTOMS OF EXPOSURE: INHALATION: DIFFICULTY IN BREATHING, CHEST PAIN. INGESTION: BURNING PAIN IN MOUTH, THROAT, ETC. SKIN: REDNESS AND BURNING. EYES: REDNESS, BURNING, AND IRRITATION.

MEDICAL CONDITIONS GENERALLY AGGRAVATED BY EXPOSURE: NONE KNOWN

EMERGENCY AND FIRST AID PROCEDURES: EYES: IMMEDIATELY FLUSH WITH LARGE AMOUNTS OF WATER FOR AT LEAST 15 MINUTES. SKIN: IMMEDIATELY FLUSH WITH LARGE AMOUNTS OF WATER WHILE REMOVING CONTAMINATED CLOTHING AND SHOES. INGESTION: DO NOT INDUCE VOMITING. DRINK LARGE AMOUNTS OF WATERS, SUBSTITUTING WITH DILUTED VINEGAR, LEMON JUICE. INHALATION: REMOVE TO FRESH AIR. SEEK MEDICAL ATTENTION FOR ALL OF THE ABOVE.

SECTION VII - PRECAUTIONS FOR SAFE HANDLING AND USE

STEPS TO BE TAKEN IN CASE MATERIAL IS RELEASED OR SPILLED: EVACUATE UNPROTECTED PERSONNEL AND PROVIDE VENTILATION. USE WATER SPRAY TO KNOCK DOWN AMMONIA GAS. FLUSH WITH LARGE QUANTITIES OF WATER. LARGE SPILLS - DIKE WITH SAND OR OTHER INERT MATERIAL, PUMP INTO DRUMS.

WASTE DISPOSAL METHOD: TREATMENT OR DISPOSAL OF WASTE GENERATED BY USE OF THIS PRODUCT SHOULD BE REVIEWED IN TERMS OF APPLICABLE FEDERAL, STATE, AND LOCAL REGULATIONS.

PRECAUTIONS TO BE TAKEN IN HANDLING AND STORING: AVOID ALL CONTACT OF LIQUID WITH THE BODY. STORE IN A COOL, DRY, WELL-VENTILATED AREA IN CLOSED CONTAINERS.

OTHER PRECAUTIONS: TRAIN WORKERS IN PROPER HANDLING PROCEDURES SO AS TO PREVENT CONTACT WITH PRODUCT AND INHALATION OF VAPORS.

SECTION VIII - CONTROL MEASURES

RESPIRATORY PROTECTION: USE NIOSH-APPROVED BREATHING APPARATUS

VENTILATION: LOCAL EXHAUST IS ACCEPTABLE

PROTECTIVE GLOVES: BUTYL RUBBER, NEOPRENE, NATURAL RUBBER

EYE PROTECTION: CHEMICAL GOGGLES SHOULD BE WORN.

OTHER PROTECTIVE CLOTHING OR EQUIPMENT: PROVIDE EYEWASH STATIONS AND QUICK-DRENCH SHOWER FACILITIES CONVENIENT TO THE WORKPLACE.

WORK/HYGIENIC PRACTICES: AVOID CONTACT WITH SKIN AND EYES. WASH THOROUGHLY AFTER HANDLING.

*** END OF M.S.D.S. ***