



REACTION ENGINEERING INC.

P.O. Box 1452

Dodge City, Kansas 67801

(620)225-2180

RXN-76

Product Bulletin

PRODUCT DESCRIPTION:

RXN-76 is a select blend of polyphosphates designed for process and potable water applications. The unique properties of this product make it extremely effective at controlling hardness deposits and corrosion in hot and cold potable water systems. RXN-76 by its stabilization qualities, effectively controls dissolved iron and manganese. In addition, RXN-76 economically and effectively controls lead and copper corrosion in potable and municipal water systems. This product is composed of non-toxic ingredients and is approved by the U.S. Department of Agriculture for use in potable water systems as well as food and meat processing plants.

BENEFITS OF USE:

- * Non-toxic
- * Flexible over a wide range of applications
- * Protects valuable systems and equipment
- * Prevents hardness deposits and corrosion
- * Stabilizes dissolved iron and manganese
- * Controls lead and copper corrosion

PHYSICAL DATA:

- * White powder/granule
- * P2O5 content of 55% minimum
- * Solubility of 10% by weight
- * pH of 5% solution: 9.0 - 9.2

DIRECTIONS FOR USE:

Your Reaction Engineering Representative will assist you in determining proper feed and treatment ratios, as well as testing methodology.

SAFETY PRECAUTIONS:

RXN-76 is blended from ingredients recognized by the FDA as suitable for water treatment. The product is mildly alkaline and caution should be exercised to avoid contact with skin and eyes. Consult Material Safety Data Sheet and keep a copy on file.

AVAILABILITY:

RXN-76 is available in one hundred pound (100#) and three hundred pound (300#) fiber drums.

MATERIAL SAFETY DATA SHEET "ESSENTIALLY SIMILAR" TO OSHA FORM 20		DATE 01/01/07		ADDRESS: Reaction Engineering Inc. P.O. Box 1452 Dodge City, Ks. 67801-1452		EMERGENCY PHONE NUMBERS BUSINESS: (620) 225-2180 OTHER: (800) 255-3924 CAS NO. NA for blends CHEMICAL FAMILY Water Treating Chemicals	
MATERIALS OR COMPONENTS Not Considered a Hazardous Product		% W/W		HAZARD DATA		SHIPPING INFORMATION Water Treating Compound, Powder. Non-Hazardous.	
BOILING POINT/RANGE °C NA °F		MELTING POINT °C NA °F		FREEZING POINT °C NA °F		MOLECULAR WEIGHT NE	
SPECIFIC GRAVITY (H20=1) @ 20/20 °C NA		VAPOR PRESSURE (mm Hg) @ °C NA		VAPOR DENSITY (AIR=1) Powder °F		EVAPORATION RATE NA BUTYLACETATE=1 WATER=1 ETHER=1 OTHER:	
SOLUBILITY IN H2O Complete Minimal		% VOLATILES BY VOLUME		APPEARANCE AND ODOR White, Free Flowing Powder OTHER:		FLASH POINT °C None °F TEST METHOD LOWER NA FLAMMABLE LIMITS % UPPER NA AUTOIGNITION TEMP/FIRE POINT °C NA °F	
EXTINGUISHING MEDIA WATER- FOG WATER- STREAM CO2 DRY CHEMICAL ALCOHOL FOAM FOAM EARTH/ SAND		SPECIAL FIRE FIGHTING PROCEDURES DON'T ENTER ALLOW FIRE TO WATER MAY CAUSE FROTHING DON'T USE WATER USE SELF CONTAINED BREATHING APPARATUS		UNUSUAL FIRE AND EXPLOSION HAZARDS DUST EXPLOSION SENSITIVE TO SHOCK CONTAM- NATION TEMPE- RATURE OTHER: None known		STABILITY CONDITIONS CONTRIBUTING TO INSTABILITY STABLE UNSTABLE THERMAL PHOTO DEGRADATION POLYME- RIZATION CONTAMINATION	
INCOMPATIBILITY - AVOID CONTACT WITH ACIDS STRONG ALKALIS STRONG OXIDIZERS OTHER:		HAZARDOUS DECOMPOSITION PRODUCTS - THERMAL AND OTHER (LIST) May evolve oxides of carbon and phosphorus.		CONDITION TO AVOID HEAT OPEN FLAMES SPARKS IGNITION SOURCES OTHER: None Known		STEPS TO BE TAKEN IF MATERIAL IS RELEASED OR SPILLED FLUSH WITH WATER ABSORB WITH SAND OR INERT MATERIAL NEUTRALIZE SWEEP/SCOOP UP AND REMOVE KEEP UPWIND PREVENT SPILL	
WASTE DISPOSAL METHOD- DISPOSE IMMEDIATELY OTHER:		In accordance with Federal, State, and Local regulations.					
CONTINUED ON NEXT PAGE							

ORAL (ACUTE): May cause laxative effect. DERMAL (ACUTE): Normally not irritating. EYE: Irritating.		CHRONIC, SUBCHRONIC, ETC. NOTE TO PHYSICIAN: Ingestion of a large dose (e.g. 20 g) may cause nausea and vomiting. If vomiting is not spontaneous, do not induce it. Phosphates are laxatives.		PERMISSIBLE EXPOSURE LIMIT (SPECIFY IF TLV/TWA OR CEILING(C)) ACGIH 19__ NE OSHA 19__ NE OTHER:		IRRITATION SKIN <input checked="" type="checkbox"/> SEVERE <input type="checkbox"/> MODERATE <input type="checkbox"/> MILD (TRANSIENT) EYE <input checked="" type="checkbox"/> SEVERE <input type="checkbox"/> MODERATE <input type="checkbox"/> MILD (TRANSIENT)		CORROSIVITY SKIN <input type="checkbox"/> 4 HRS. (DOT) <input type="checkbox"/> 24 HRS. (CPSC) EYE <input type="checkbox"/> MAY CAUSE BLINDNESS		SENSITIZATION SKIN <input type="checkbox"/> ALLERGEN <input type="checkbox"/> NARCOTIC <input type="checkbox"/> CYANOSIS <input type="checkbox"/> ASPHYXANT LUNG EFFECTS (SPECIFY): May be irritating.		OTHER (SPECIFY): REPEATED CONTACT SKIN DEFATTER		INGESTION <input type="checkbox"/> INDUCE <input checked="" type="checkbox"/> DO NOT INDUCE <input checked="" type="checkbox"/> GIVE PLenty OF WATER <input checked="" type="checkbox"/> GET MEDICAL ATTENTION OTHER:		DERMAL <input checked="" type="checkbox"/> FLUSH WITH SOAP AND WATER <input type="checkbox"/> GET MEDICAL ATTENTION <input type="checkbox"/> CONTAMINATED CLOTHING-LAUNDER <input type="checkbox"/> CONTAMINATED SHOES-DESTROY OTHER:		EYE CONTACT <input checked="" type="checkbox"/> FLUSH WITH PLenty OF WATER <input checked="" type="checkbox"/> GET MEDICAL ATTENTION OTHER:		INHALATION <input checked="" type="checkbox"/> REMOVE TO FRESH AIR <input checked="" type="checkbox"/> IF NOT BREATHING GIVE ARTIFICIAL RESPIRATION <input type="checkbox"/> GIVE OXYGEN <input type="checkbox"/> GET MEDICAL ATTENTION OTHER:		VENTILATIONS REQUIREMENTS - ALWAYS MAINTAIN EXPOSURE BELOW PERMISSIBLE EXPOSURE LIMITS <input type="checkbox"/> CONSULT AND INDUSTRIAL HYGIENIST <input type="checkbox"/> LOCAL EXHAUST <input checked="" type="checkbox"/> USE WITH ADEQUATE VENTILATION <input type="checkbox"/> CHECK FOR CONTAMINANT AND OXYGEN DEFICIENCY OTHER:		EYE <input checked="" type="checkbox"/> FACE SHIELD AND GOGGLES <input type="checkbox"/> SAFETY GLASSES		RESPIRATOR TYPE - USE ONLY NIOSH APPROVED EQUIPMENT <input type="checkbox"/> SELF-CONTAINED <input type="checkbox"/> SUPPLIED AIR <input type="checkbox"/> CAN OR CARTRIDGE GAS <input checked="" type="checkbox"/> FILTER-DUST, FUME, MIST OTHER:		OTHER PROTECTIVE EQUIPMENT <input checked="" type="checkbox"/> RUBBER BOOTS <input checked="" type="checkbox"/> APRON OTHER:		PRECAUTIONARY LABELING <input checked="" type="checkbox"/> WASH AFTER HANDLING <input checked="" type="checkbox"/> DO NOT GET IN EYES, SKIN, CLOTHING <input checked="" type="checkbox"/> DO NOT BREATHE GAS DUST, VAPOR <input checked="" type="checkbox"/> KEEP CONTAINER CLOSED <input type="checkbox"/> KEEP AWAY FROM HEAT, SPARKS <input checked="" type="checkbox"/> STORE IN CLOSED CONTAINER <input type="checkbox"/> DONT STORE NEAR COMBUSTIBLES <input checked="" type="checkbox"/> KEEP FROM CONTACT WITH CLOTHING <input type="checkbox"/> EMPTY CONTAINER MAY CONTAIN HAZARDOUS <input type="checkbox"/> USE EXPLOSION PROOF EQUIPMENT OTHER:		OTHER HANDLING AND STORAGE CONDITIONS: Do not smoke or eat when handling chemicals. Keep out of the reach of children.		THE ABOVE INFORMATION IS ACCURATE TO THE BEST OF OUR KNOWLEDGE. HOWEVER, SINCE DATA, SAFETY STANDARDS, AND GOVERNMENT REGULATIONS ARE SUBJECT TO CHANGE AND THE CONDITIONS OF HANDLING AND USE, OR MISUSE ARE BEYOND OUR CONTROL, WE MAKE NO WARRANTY, EITHER EXPRESSED OR IMPLIED, WITH RESPECT TO THE COMPLETENESS OR CONTINUING ACCURACY OF THE INFORMATION CONTAINED HEREIN AND DISCLAIM ALL LIABILITY FOR RELIANCE THEREON. USER SHOULD SATISFY HIMSELF THAT HE HAS ALL CURRENT DATA RELEVANT TO HIS PARTICULAR USE.	
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