SODIUM ACETATE, ANHYDROUS CAROLINA BIOLOGICAL Revised: 09/05/00 Replaces: None Printed: 07/08/06

PRODUCT IDENTIFICATION

PRODUCT NAME: SODIUM ACETATE, ANHYDROUS COMMON SYNONYMS: ACETIC ACID, SODIUM SALT CHEMICAL FAMILY: ORGANIC SODIUM SALTS CH3COONA FORMULA: FORMULA WT.: 82.03 127-09-3 CAS NO.: PRODUCT USE: PRODUCT USE: LABORATORY REAGENT PRODUCT CODES: 3470,3471,3472,3473,3474 CHEMTREC # (800) 424-9300 NATIONAL RESPONSE CENTER # (800) 424-8802 J.T.BAKER INC. 222 RED SCHOOL LANE PHILLIPSBURG, NJ 08865 24-HOUR EMERGENCY TELEPHONE -- (201) 859-2151 EFFECTIVE: 01/04/94 ISSUED: 04/08/95 REVISION #05 PRECAUTIONARY LABELING BAKER SAF-T-DATA* SYSTEM HEALTH SLIGHT 1 FLAMMABILITY -0 NONE NONE REACTIVITY -0 1 SLIGHT CONTACT _ LABORATORY PROTECTIVE EQUIPMENT GOGGLES; LAB COAT U.S. PRECAUTIONARY LABELING CAUTION MAY CAUSE IRRITATION. DURING USE AVOID CONTACT WITH EYES, SKIN, CLOTHING. WASH THOROUGHLY AFTER HANDLING. WHEN NOT IN USE KEEP IN TIGHTLY CLOSED CONTAINER. INTERNATIONAL LABELING AVOID CONTACT WITH EYES. AFTER CONTACT WITH SKIN, WASH IMMEDIATELY WITH PLENTY OF WATER. KEEP CONTAINER TIGHTLY CLOSED. SAF-T-DATA* STORAGE COLOR CODE: ORANGE (GENERAL STORAGE) COMPONENTS COMPONENT CAS NO. WEIGHT % OSHA/PEL ACGTH/TLV SODIUM ACETATE, ANHYDROUS 127-09-3 90-100 N/E N/E PHYSICAL DATA BOILING POINT: N/A VAPOR PRESSURE (MMHG): N/A MELTING POINT: 324 C (615 F) VAPOR DENSITY (AIR=1): N/A (AT 760 MM HG) SPECIFIC GRAVITY: 1.53 EVAPORATION RATE: N/A (H2O=1) SOLUBILITY(H20): APPRECIABLE (>10%) % VOLATILES BY VOLUME: 0 (21 C) PH: N/A ODOR THRESHOLD (P.P.M.): N/A PHYSICAL STATE: SOLID COEFFICIENT WATER/OIL DISTRIBUTION: N/A APPEARANCE & ODOR: WHITE CRYSTALS. ODORLESS.

FIRE AND EXPLOSION HAZARD DATA

Page 1 of 4

SODIUM ACETATE, ANHYDROUS CAROLINA BIOLOGICAL Revised: 09/05/00 Replaces: None Printed: 07/08/06

FLASH POINT (CLOSED CUP): N/A AUTOIGNITION TEMPERATURE: N/A FLAMMABLE LIMITS: UPPER - N/A LOWER - N/A FIRE EXTINQUISHING MEDIA USE EXTINGUISHING MEDIA APPROPRIATE FOR SURROUNDING FIRE. SPECIAL FIRE-FIGHTING PROCEDURES FIREFIGHTERS SHOULD WEAR PROPER PROTECTIVE EQUIPMENT AND SELF-CONTAINED BREATHING APPARATUS WITH FULL FACEPIECE OPERATED IN POSITIVE PRESSURE MODE. UNUSUAL FIRE & EXPLOSION HAZARDS NONE IDENTIFIED. TOXIC GASES PRODUCED CARBON MONOXIDE, CARBON DIOXIDE EXPLOSION DATA-SENSITIVITY TO MECHANICAL IMPACT NONE IDENTIFIED. EXPLOSION DATA-SENSITIVITY TO STATIC DISCHARGE NONE IDENTIFIED. HEALTH HAZARD DATA THRESHOLD LIMIT VALUE (TLV/TWA): NOT ESTABLISHED SHORT-TERM EXPOSURE LIMIT (STEL): NOT ESTABLISHED PERMISSIBLE EXPOSURE LIMIT (PEL): NOT ESTABLISHED TOXICITY OF COMPONENTS 3530 ORAL RAT LD50 FOR SODIUM ACETATE, ANHYDROUS MG/KG SUBCUTANEOUS MOUSE LD50 FOR SODIUM ACETATE, ANHYDROUS 8000 MG/KG INTRAVENOUS MOUSE LD50 FOR SODIUM ACETATE, ANHYDROUS 335 MG/KG CARCINOGENICITY: NTP: NO IARC: NO Z LIST: NO OSHA REG: NO CARCINOGENICITY NONE IDENTIFIED. REPRODUCTIVE EFFECTS NONE IDENTIFIED. EFFECTS OF OVEREXPOSURE INHALATION: IRRITATION OF UPPER RESPIRATORY TRACT SKIN CONTACT: IRRITATION EYE CONTACT: IRRITATION SKIN ABSORPTION: NONE IDENTIFIED INGESTION: GASTROINTESTINAL IRRITATION CHRONIC EFFECTS: NONE IDENTIFIED TARGET ORGANS RESPIRATORY SYSTEM, LUNGS MEDICAL CONDITIONS GENERALLY AGGRAVATED BY EXPOSURE NONE IDENTIFIED PRIMARY ROUTES OF ENTRY INGESTION, INHALATION, EYE CONTACT, SKIN CONTACT EMERGENCY AND FIRST AID PROCEDURES INGESTION: IF SWALLOWED AND THE PERSON IS CONSCIOUS, IMMEDIATELY GIVE

SODIUM ACETATE, ANHYDROUS CAROLINA BIOLOGICAL Revised: 09/05/00 Replaces: None Printed: 07/08/06

LARGE AMOUNTS OF WATER. GET MEDICAL ATTENTION. INHALATION: IF A PERSON BREATHES IN LARGE AMOUNTS, MOVE THE EXPOSED

PERSON TO FRESH AIR.

SKIN CONTACT: IN CASE OF CONTACT, IMMEDIATELY WASH SKIN WITH PLENTY OF

SOAP AND WATER FOR AT LEAST 15 MINUTES.

EYE CONTACT: IN CASE OF EYE CONTACT, IMMEDIATELY FLUSH WITH PLENTY

OF

WATER FOR AT LEAST 15 MINUTES.

SARA/TITLE III HAZARD CATEGORIES AND LISTS

ACUTE: YES CHRONIC: YES FLAMMABILITY: NO PRESSURE: NO REACTIVITY: NO EXTREMELY HAZARDOUS SUBSTANCE: NO CERCLA HAZARDOUS SUBSTANCE: NO

SARA 313 TOXIC CHEMICALS: NO TSCA INVENTORY: YES

REACTIVITY DATA

STABILITY: STABLEHAZARDOUS POLYMERIZATION: WILL NOTOCCURCONDITIONS TO AVOID:MOISTURE, HEATINCOMPATIBLES:STRONG OXIDIZING AGENTS, FLUORINEDECOMPOSITION PRODUCTS:CARBON MONOXIDE, CARBON DIOXIDE

SPILL & DISPOSAL PROCEDURES

STEPS TO BE TAKEN IN THE EVENT OF A SPILL OR DISCHARGE

WEAR SUITABLE PROTECTIVE CLOTHING. CAREFULLY SWEEP UP AND REMOVE. DISPOSAL PROCEDURE

DISPOSE IN ACCORDANCE WITH ALL APPLICABLE FEDERAL, STATE, AND LOCAL ENVIRONMENTAL REGULATIONS.

INDUSTRIAL PROTECTIVE EQUIPMENT

VENTILATION: USE ADEQUATE GENERAL OR LOCAL EXHAUST VENTILATION TO

KEEP FUME OR DUST LEVELS AS LOW AS POSSIBLE. RESPIRATORY PROTECTION: NONE REQUIRED WHERE ADEQUATE VENTILATION CONDITIONS

EXIST. IF AIRBORNE CONCENTRATION IS HIGH, USE

AN

APPROPRIATE RESPIRATOR OR DUST MASK.

EYE/SKIN PROTECTION: SAFETY GOGGLES, RUBBER GLOVES ARE RECOMMENDED.

STORAGE AND HANDLING PRECAUTIONS

SAF-T-DATA* STORAGE COLOR CODE: ORANGE (GENERAL STORAGE) STORAGE REQUIREMENTS

KEEP CONTAINER TIGHTLY CLOSED. SUITABLE FOR ANY GENERAL CHEMICAL STORAGE

AREA.

SPECIAL PRECAUTIONS

MATERIAL IS HYGROSCOPIC.

TRANSPORTATION DATA AND ADDITIONAL INFORMATION

DOMESTIC (D.O.T.)

PROPER SHIPPING NAME: CHEMICALS, N.O.S. (NON-REGULATED)

SODIUM ACETATE, ANHYDROUS CAROLINA BIOLOGICAL Revised: 09/05/00 Replaces: None Printed: 07/08/06

INTERNATIONAL (I.M.O.) PROPER SHIPPING NAME: CHEMICALS, N.O.S. (NON-REGULATED) MARINE POLLUTANTS: NO

AIR (I.C.A.O.) PROPER SHIPPING NAME: CHEMICALS, N.O.S. (NON-REGULATED)

U.S. CUSTOMS HARMONIZATION NUMBER: 29152200004

NOTE: WHEN HANDLING LIQUID PRODUCTS, SECONDARY PROTECTIVE CONTAINERS MUST BE USED FOR CARRYING. N/A = NOT APPLICABLE, OR NOT AVAILABLE N/E = NOT ESTABLISHED. THE INFORMATION IN THIS MATERIAL SAFETY DATA SHEET MEETS THE REQUIREMENTS O THE UNITED STATES OCCUPATIONAL SAFETY AND HEALTH ACT AND REGULATIONS PROMULGATED THEREUNDER (29 CFR 1910.1200 ET. SEQ.) AND THE CANADIAN WORKPLACE HAZARDOUS MATERIALS INFORMATION SYSTEM. THIS DOCUMENT IS INTENDED ONLY AS A GUIDE TO THE APPROPRIATE PRECAUTIONARY HANDLING OF THE MATERIAL BY A PERSON TRAINED IN, OR SUPERVISED BY A PERSON TRAINED IN, CHEMICAL HANDLING. THE USE IS RESPONSIBLE FOR DETERMINING THE PRECAUTIONS AND DANGERS OF THIS CHEMICAL FOR HIS OR HER PARTICULAR APPLICATION. DEPENDING ON USAGE, PROTECTIVE CLOTHIN INCLUDING EYE AND FACE GUARDS AND RESPIRATORS MUST BE USED TO AVOID CONTACT WITH MATERIAL OR BREATHING CHEMICAL VAPORS/FUMES. EXPOSURE TO THIS PRODUCT MAY HAVE SERIOUS ADVERSE HEALTH EFFECTS. THIS CHEMICAL MAY INTERACT WITH OTHER SUBSTANCES. SINCE THE POTENTIAL USES ARE SO VARIED, BAKER CANNOT WARN OF ALL OF THE POTENTIAL DANGERS OF USE OR INTERACTION WITH OTHER CHEMICALS OR MATERIALS. BAKER WARRANTS THAT THE CHEMICAL MEETS THE SPECIFICATIONS SET FORTH ON THE LABEL. BAKER DISCLAIMS ANY OTHER WARRANTIES, EXPRESSED OR IMPLIED, WITH REGARD TO THE PRODUCT SUPPLIED HEREUNDER, ITS MERCHANTABILITY OR ITS FITNESS FOR A PARTICULAR PURPOSE. THE USER SHOULD RECOGNIZE THAT THIS PRODUCT CAN CAUSE SEVERE INJURY AND EVE DEATH, ESPECIALLY IF IMPROPERLY HANDLED OR THE KNOWN DANGERS OF USE ARE NOT HEEDED. READ ALL PRECAUTIONARY INFORMATION. AS NEW DOCUMENTED GENERAL SAFETY INFORMATION BECOMES AVAILABLE, BAKER WILL PERIODICALLY REVISE THIS MATERIAL SAFETY DATA SHEET. NOTE: CHEMTREC, CANUTEC, AND NATIONAL RESPONSE CENTER EMERGENCY TELEPHONE NUMBERS ARE TO BE USED ONLY IN THE EVENT OF CHEMICAL EMERGENCIES INVOLVING A SPILL, LEAK, FIRE, EXPOSURE, OR ACCIDENT INVOLVING CHEMICALS. ALL NON-EMERGENCY QUESTIONS SHOULD BE DIRECTED TO CUSTOMER SERVICE (1-800-JTBAKER ASSISTANCE. COPYRIGHT 1995 J.T.BAKER INC. * TRADEMARKS OF J.T.BAKER INC. APPROVED BY QUALITY ASSURANCE DEPARTMENT.