PAGE 1 MANUFACTURE INFORMATION GROBET FILE CO. OF AMERICA, INC. 750 WASHINGTON AVE. EMERGENCY PHONE....: 800-255-3924 PREPARATION/REVISION DATE: 03/20/92 CARLSTADT, NJ 07072 TRADE NAME/SYNONYMS...: SOLDER-SILVER PASTE-MEDIUM CHEMICAL NAME/SYNONYMS: CHEMICAL FAMILY....: DOES PRODUCT CONTAIN HAZARDOUS INGREDIENTS? (Y,N,N/A,N/I):
CHEMICAL/COMMON NAME
CAS-NUMBER % PE
51LVER 7440-22-4 70 N/ PEL-OSHA TLV-ACGIH .01MG/M3 N/A SILVER .iMG/M3 5.OMG/M3 2.5MG/M3 COPPER ZINC 7440-50-8 N/A N/A 7440-66-6 7789-29-2 N/A N/A POTASSIUM BIFLOURIDE N/A N/A 14075-53-7 N/A 2.5MG/M3 POTASSIUM FLUOBORATE N/A DOES PRODUCT CONTAIN CARCINOGENS (NTP. IARC. OR OSHA)? (Y.N.N/A,N/I): HEALTH EFFECTS (ACUTE AND CHRONIC)
FLOURIDE FUMES CAUSE HYPOCALCEMIA; SKIN CONTACT CAUSES SEVERE IRRITATION
ESPECIALLY ON ABRASED SKIN. EYE CONTACT IRRITATES STRONGLY - FUTHER EXPOSURE
MAY CAUSE BURNS, CORNEAL DAMAGE. INGESTION OF FLOURIDE MYA BE FATAL.
SILVER: OVER EXPOSURE TO SILVER DUSTS OR FUMES MAY CAUSE A PERMANENT GRAYISH
PIGMENTATION OF THE SKIN AN CAN CAUSE IRRITATION OF THE SKIN AND
MUCOUS MEMBRANES. PROLONGED OVEREXPOSURE CAN LEAD TO KIDNEY DAMAGE.
COPPER: INDUSTRIAL EXPOSURE TO COPPER FUMES, DUSTS OR MISTS RESULTS IN METAL
FUME FEVER WITH ATROPHIC CHANGES IN NASAL MUCOUS MEMBRANES. CHRONIC
POISONING RESULTS IN WILSON'S DISEASE, CHARACTERIZED BY A HEPATIC CIRRHOSIS,
BRAIN DAMAGE, DEMYELIMATION, RENAL DISEASE AND COPPER DEPOSITION IN THE
CORNEA. ZINC EXPOSURE MAY CAUSE METAL FUME FEVER. FLOURIDE EXPOSURE HAS BEEN
LINKED TO SKELETAL ABNORMALITIES AND GASTRIC COMPLICATIONS. PRIMARY ROUTES OF ENTRY INHALATION, SKIN INGESTION MEDICAL CONDITIONS AGGRAVATED BY EXPOSURE
PREEXISTING EYE AND SKIN DISORDER OR DAMAGE TO MUCOUS MEMBRANES MAY BE
SUSCEPTIBLE TO THE EFFECT OF FLOURIDE EXPOSURE. EMERGENCY FIRST AID PROCEDURES VICTIMS OF OVEREXPOSURE TO FUME - IMMEDIATELY REMOVE TO FRESH AIR.
IF BREATHING IS DIFFICULT, GIVE OXYGEN IF QUALIFIED OPERATOR IS AVAILABLE. IF
NOT BREATHING, GIVE ARTIFICIAL RESPIRATION. CALL A PHYSICIAN AND GIVE
SUPPORTIVE TREATMENT. BOILING POINT(F).. >450F VAPOR PRESSURE (MMHG) C. SMM N/A 25C VAPOR DENSITY(AIR#1) N/A SOLUBILITY IN WATER. . INSOLUBLE APPEARANCE AND ODOR INFORMATION PASTE - NO ODOR FLAMMABLE LIMITS-LEL= N/A UEL= N/A FLASH POINT (METHOD USED) 250F EXTINGUISHING MEDIA CO2, DRY CHEMICAL, FOAM, WATER OR SPRAY (FOG)

SPECIAL FIRE FIGHTING PROCEDURES FIRE FIGHTERS SHOULD WEAR SCBA AND FULL PORTECTIVE CLOTHING

UNUSUAL FIRE AND EXPLOSION HAZARDS N/A

INCOMPATIBILITY (MATERIALS TO AVOID) ACIDS AND ALKALIES

HAZARDOUS DECOMPOSITION PRODUCTS CARBON DIOXIDE, CARBON MONOXIDE, FLUORIDE FUMES AND FILLER METAL OXIDE FUMES

WILL HAZARDOUS POLYMERIZATION OCCUR

CONDITIONS TO AVOID/POLYMERIZATION N/A

IS THE PRODUCT STABLE YES, AT ROOM TEMPERATURE

CONDITIONS TO AVOID/STABILITY HIGH TEMPERATURE DURING STORAGE

STEPS TO BE TAKEN IN CASE MATERIAL IS RELEASED OR SPILLED DIKE UP LARGE SPILLS, USE AN ASORBENT MATERIAL FOR CLEAN UP. WEAR RUBBER SWEEP UP AND PLACE IN CLOSED, LABELED CONTAINER, FOR RECYCLING OR DISPOSAL. AVOID HIGH TEMPERATURES.

WASTE DISPOSAL METHOD DISPOSAL OF WASTE PRODUCT MAY BE SUBJECT TO FEDERAL, STATE AND LOCAL REGULATIONS. USERS SHOULD REVIEW THEIR OWN OPERATIONS IN TERMS OF APPLICABLE FEDERAL, STATE AND LOCAL LAWS AND REGULATIONS, THEN CONSULT WITH APPROPRIATE REGULATORY AGENCIES BEFORE DISCHARGE OF DISPOSING OF THE WASTE MATERIAL.

VENTILATION

LOCAL EXHAUST AIR FLOW @100 LFT/MN MECHANICAL (GEN) 2000 CU FT/MIN OTHER....... SPECIAL..... N/A

RESPIRATORY PROTECTION
IN CONFINED SPACE, USE AN AIRLINE RESPIRATOR OR HOSE MAS NIOSH APPROVED OR SELF CONTAINED.

PROTECTIVE GLOVES HEAT PROTECTIVE RUBBER

OTHER PROTECTIVE EQUIPMENT SAFETY GOGGLES OR FULL FACE SHIELD. NORMAL CLOTHING FOR TORCH BRAZING (AVOID FLAMMABLE FABRICS).

OTHER ENGINEERING CONTROLS EYE BATH AND SAFETY SHOWER.

WORK PRACTICES GOOD HOUSEKEEPING PRACTICES

HYGENIC PRACTICES WASH HAND BEFORE EATING, DRINKING AND SMOKING. THE DRINKING WATER SUPPLY IS PROHIBITED UNDER FEDERAL LAW IN WORKING AREA. DO NOT PERMIT EATING, DRINKING, OR USING TOBACCO PRODUCTS WHILE HANDLING THIS MATERIAL.

PRECAUTIONS TO BE TAKEN IN HANDLING AND STORAGE N/A

MAINTENANCE PRECAUTIONS
REFER TO ANSI 249.1 "SAFETY IN CUTTING AND WELDING"

OTHER PRECAUTIONS N/A

OTHER COMMENTS
THE INFORMATION HEREIN IS GIVEN IN GOOD FAITH, NO WARRANTY EXPRESS OR IMPLIED, IS MADE.