

METCO PERKIN-ELMER -- METCO 73F-NS-1 -- 3439-01-380-6737

===== Product Identification =====

Product ID:METCO 73F-NS-1

MSDS Date:02/03/1993

FSC:3439

NIIN:01-380-6737

MSDS Number: BYCSD

=== Responsible Party ===

Company Name:METCO PERKIN-ELMER

Address:1101 PROSPECT AVENUE

Box:1006

City:WESTBURY

State:NY

ZIP:11590-0201

Country:US

Info Phone Num:516-334-1300;202-483-7616

Emergency Phone Num:516-334-13

00;800-424-9300(CHEMTREC)

CAGE:FO877

=== Contractor Identification ===

Company Name:METCO INC, SUB OF THE PERKIN-ELMER CORP

Address:1101 PROSPECT AVENUE

Box:City:WESTBURY

State:NY

ZIP:11590-2724

Country:US

Phone:516-334-1300

CAGE:39918

Company Name:METCO PERKIN-ELMER

Address:1101 PROSPECT AVENUE

Box:1006

City:WESTBURY

State:NY

ZIP:11590-0201

Phone:(516) 334-1300

CAGE:FO877

Company Name:SULZER METCO (US) INC

Address:1101 PROSPECT AVE

Box:City:WESTBURY

State:NY

ZIP:11590-2724

Country:US

Phone:516-

334-1300
CAGE:01FK3

===== Composition/Information on Ingredients =====

Ingred Name:TUNGSTEN CARBIDE
CAS:12070-12-1
RTECS #:YO7250000
Fraction by Wt: 82% %
Other REC Limits:NONE RECOMMENDED
OSHA PEL:5 MG W/M3
ACGIH TLV:5 MG W/M3

Ingred Name:COBALT (SARA III)
CAS:7440-48-4
RTECS #:GF8750000
Fraction by Wt: 17% %
Other REC Limits:NONE RECOMMENDED
OSHA PEL:0.05 MG/M3
ACGIH TLV:0.05 MG/M3;DUST 9192

Ingred Name:IRON
CAS:7439-89-6
RTECS #:NO4565500
Fraction by Wt: 1% %
Other REC
Limits:NONE RECOMMENDED

===== Hazards Identification =====

LD50 LC50 Mixture:NOT GIVEN FOR PRODUCT AS A WHOLE.
Routes of Entry: Inhalation:YES Skin:YES Ingestion:YES
Reports of Carcinogenicity:NTP:NO IARC:NO OSHA:NO
Health Hazards Acute and Chronic:INHALATION MAY CAUSE LUNG DAMAGE,
PNEUMONIA, SIDEROSIS AND RESPIRATORY TRACT IRRITATION. SKIN AND EYE
CONTACT MAY CAUSE IRRITATION.MAY CAUSE ALLERGIC DERMATITIS, ECZEMA.
Explanation of Carcinogenicity:C
OBALT IS FOUND TO BE A CONFIRMED
CARCINOGEN BY OTHER REFERENCE GUIDE SOURCES SUCH AS VAN NOSTRAND.
Effects of Overexposure:EYE IRRITATION, SKIN IRRITATION, DERMATITIS,
ECZEMA, LUNG DAMAGE, RESPIRATORY TRACT IRRITATION, COUGH, WHEEZING,
SHORTNESS OF BREATH, BENIGN PNEUMOCONIOSIS.
Medical Cond Aggravated by Exposure:NONE SPECIFIED BY MANUFACTURER.

===== First Aid Measures =====

First Aid:EYE: FLUSH WITH SUFFICIENT AMOUNTS OF WATER. IF IRRITATION

PERSISTS, CONSULT A PHYSICIAN. SKIN: WASH WITH SOAP AND WATER.
INHALATION: EXPOSE TO FRESH AIR. CONSULT A PHYSICIAN IF IRRITATION
OR RESPIRATORY DISTRESS PERSISTS. INGESTION: CONSULT A PHYSICIAN.

===== Fire Fighting Measures =====

Flash Point:NONFLAMMABLE
Lower Limits:NOT GIVEN
Upper Limits:NOT GIVEN
Extinguishing Media:USE CLASS D FIRE EXTINGUISHER.
Fire Fighting Procedures:TREAT AS A METALLIC FIRE.
Unusual Fire/Explosion Hazard:FINE METAL DUSTS
ARE FLAMMABLE AND MAY
EXPLODE WHEN EXPOSED TO HEAT, FLAME OR STRONG OXIDIZERS.

===== Accidental Release Measures =====

Spill Release Procedures:VACUUM LOOSE POWDER ONLY WITH VACUUMS EQUIPPED
WITH HEPA FILTRATION. VACUUMS APPROPRIATE FOR USE WITH METALLIC
DUSTS SHOULD BE UTILIZED. WIPE THE AREA CLEAN. DO NOT USE WATER FOR
CLEAN UP OPERATIONS. DO NOT SWEEP. AVOID GENERATING AIRBORNE DUST.
Neutralizing Agent:NONE SPECIFIED BY MANUFACTURER.

=====

===== Handling and Storage =====

Handling and Storage Precautions:STORE AWAY FROM INCOMPATIBLES. STORE
PRODUCT CONTAINERS IN A WELL-VENTILATED, CLEAN, COOL, DRY AREA.
MINIMIZE PHYSICAL DAMAGE.
Other Precautions:AVOID INGESTION, INHALATION AND EXCESSIVE SKIN
CONTACT. AVOID CONTACT OF POWDER WITH WATER AND OXIDIZERS.

===== Exposure Controls/Personal Protection =====

Respiratory Protection:A RESPIRATOR APPROVED BY NIOSH WITH FILTER
CARTRIDGE APPROVED FOR DUST/FUMES/MISTS SHOULD BE WORN AT ALL
TIMES DURING THE THERMAL SPRAY PROCESS TO PROTECT THE OPERATOR FROM
EXPOSURE TO DUST AND FUMES .
Ventilation:PRODUCT SHOULD BE USED WITH THE APPROPRIATE LOCAL EXHAUST
VENTILATION PROVIDED.
Protective Gloves:ALUMINIZED GLOVES DURING PROCESSING
Eye Protection:CHEMICAL WORKER'S GOGGLES
Other Protective Equipment:HEARING PROTECTION, ALUMINIZED APRON,
APPROPRIATE CLOTHING TO PREVENT SKIN CONTACT.
Work Hygienic Practices:WASH HAND

S THOROUGHLY WITH SOAP AND WATER
BEFORE EATING, DRINKING, SMOKING OR USING TOILET FACILITIES.
Supplemental Safety and Health
EYE WASH STATIONS ARE RECOMMENDED.

===== Physical/Chemical Properties =====

HCC:N1
Boiling Pt:B.P. Text:NOT GIVEN
Melt/Freeze Pt:M.P/F.P Text:2200-2300F
Vapor Pres:NOT GIVEN
Vapor Density:NOT GIVEN
Spec Gravity:4.5 - 6.3
Viscosity:NOT GIVEN
Evaporation Rate & Reference:NOT GIVEN
Solubility in Water:NOT GIVEN
Appearance and Odor:POWDER,
NO ODOR
Percent Volatiles by Volume:NIL

===== Stability and Reactivity Data =====

Stability Indicator/Materials to Avoid:YES
OXIDIZERS, ACIDS, SULFUR, NI(NO₃)₂, COMBUSTIBLES.
Stability Condition to Avoid:HEAT, FLAME, IGNITION SOURCES
Hazardous Decomposition Products:OZONE AND NITRIC ACID ARE FORMED BY
THE PLASMA FLAME.

===== Disposal Considerations =====

Waste Disposal Methods:EMPTY PRODUCT CONTAINERS, PRODUCT WASTE AND
CLEAN
ING MEDIA SHOULD BE STORE AND DISPOSED OF ACCORDING TO THE
APPROPRIATE LOCAL, STATE AND FEDERAL REGULATORY GUIDELINES.

Disclaimer (provided with this information by the compiling agencies):
This information is formulated for use by elements of the Department
of Defense. The United States of America in no manner whatsoever,
expressly or implied, warrants this information to be accurate and
disclaims all liability for its use. Any person utilizing this
document should seek competent p

rofessional advice to verify and
assume responsibility for the suitability of this information to their
particular situation.