

# MATERIAL SAFETY DATA SHEET

For R&D use only. Not for drug, household or other uses.

Click <http://www.lookchem.com/cas-446/446-86-6.html> for suppliers of this product.

## Composition/Information on Ingredient

**Cas:**  
446-86-6  
**Code:**  
M

**RTECS:**  
UO8925000  
**Code:**  
M

**Name:**  
IMURAN (6-((1-METHYL-4-NITRO-1H-IMIDAZOL-5-YL)THI

**Other REC Limits:**  
NOT ESTABLISHED

**OSHA PEL:**  
NOT ESTABLISHED  
**Code:**  
M

**OSHA STEL:**

**Code:**

**ACGIH TLV:**  
NOT ESTABLISHED  
**Code:**  
M

**ACGIHSTEL:**  
N/P  
**Code:**

## Control Measures

**Respiratory Protection:**  
FULL AIR-SUPPLIED SUIT IS RECOMMENDED OR AN AIR-SUPPLIED HOOD WITH FULL BODY COVERING.

**Ventilation:**  
LOCAL EXHAUST OR BIOLOGICAL SAFETY CABINET.

**Protective Gloves:**  
DOUBLE LATEX

**Eye Protection:**  
CHEMICAL SAFETY GOGGLES

**Other Protective Equipment:**  
Equipment AVOID ALL CONTACT BY WEARING FULL BODY PROTECTIVE CLOTHING (FOR EXAMPLE TYVEK).

**Work Hygienic Practices:**  
WASH THOROUGHLY AFTER HANDLING AND BEFORE EATING. LAUNDER CONTAMINATED CLOTHING BEFORE REUSE.

**Supplemental Safety and Health:**  
4 THIS IS AN ANTINEOPLASTIC DRUG. \*CONTINUED FROM HEALTH HAZARDS:THERE HAVE BEEN CLINICAL REPORTS OF STERILITY,AZOOSPERMIA AND TESTICULAR ATROPHY IN MALE PATIENTS RECEIVING THIS DRUG\*

## Health Hazards Data

**LD50LC50Mixture:**  
LD50 (ORAL MOUSE) IS 2500 MG/KG

**Route Of Entry Inds - Inhalation:**  
YES

**Skin:**  
YES

**Ingestion:**  
YES

**Carcinogenicity Inds - NTP:**  
YES

**IARC:**  
YES

**OSHA:**  
NO

**Health Hazards Acute And Chronic:**  
AZATHIOPRINE IS MUTAGENIC IN ANIMALS AND HUMANS.THE PRINCIPAL EFFECT IS DEPRESSION OF THE BONE MARROW.PROLONGED IMMUNOSUPPRESSION MAY RESULT IN SUPERINFECTION WITH BACTERIA,VIRUSES,PROTOZOA AND FUNGI. AZATHIOPRINE HAS BEEN SHOWN TO BE MUTAGENIC IN ANIMALS AND HUMANS.AZATHIOPRINE IS TERATOGENIC IN RODENTS.

**Explanation Of Carcinogenicity:**  
2 AZATHIOPRINE IS A CONFIRMED CARCINOGEN BY IARC AND NTP.

**Signs And Symptions Of Overexposure:**  
MANUFACTURER DID NOT SPECIFY.

**Medical Cond Aggravated By Exposure:**  
NONE NOTED.

**First Aid:**  
EYES:RINSE IMMEDIATELY WITH PLENTY OF WATER.SEE DOCTOR. SKIN:WASH OFF SKIN WITH PLENTY OF WATER.SEE DOCTOR IF CONTACT IS PROLONGED. INHALATION:REMOVE TO FRESH AIR.SEE DOCTOR. INGESTION:WASH OUT MOUTH. GIVE FLUIDS.SEE DOCTOR.THERE IS NOT A SPECIFIC ANTIDOTE TO AZATHIOPRINE.A SINGLE MODERATE OVERDOSE IS NOT SERIOUSLY THREATENING,BUT WOULD CALL FOR DAILY WATCH OF THE BLOOD COUNT FOR AT LEAST 2 WEEKS.

**Spill Release Procedures:**  
WEAR SUITABLE PROTECTIVE CLOTHING.CLEAN UP WITH TOWELS AND TRANSFER TO CLOSED DISPOSAL CONTAINER.DECONTAMINATE AREA WITH DILUTE CAUSTIC SODA AND SODIUM HYPOCHLORITE SOLUTION.CLEAN AREA WITH DETERGENT.

**Neutralizing Agent:**  
DILUTE CAUSTIC SODA AND SODIUM HYPOCHLORITE SOLUTION.

**Waste Disposal Methods:**  
NOTIFY YOUR LOCAL ENVIRONMENTAL OFFICER. DISPOSE OF IN ACCORDANCE WITH ALL APPLICABLE FEDERAL, STATE AND LOCAL LAWS AND REGULATIONS. PRODUCT MAY BE INCINERATED. WASH WATERS AND RINSES SHOULD BE DISCHARGED TO AN APPROVED SEWERAGE SYSTEM.

**Handling And Storage Precautions:**  
STORE IN COOL, DRY, WELL VENTILATED AREA. PROTECT FROM PHYSICAL DAMAGE, HEAT AND IGNITION SOURCES. KEEP CONTAINERS CLOSED. PROTECT FROM LIGHT.

**Other Precautions:**  
NONE NOTED.

## Fire and Explosion Hazard Information

**Flash Point Method:**  
N/P

**Flash Point:**

**Flash Point Text:**  
N/R 3

**Autoignition Temp:**

**Autoignition Temp Text:**  
N/A

**Lower Limits:**  
N/R

**Upper Limits:**  
N/R

**Extinguishing Media:**  
USE CARBON DIOXIDE, FOAM, DRY CHEMICAL, OR WATER FOG.

**Fire Fighting Procedures:**  
FIRE FIGHTERS SHOULD USE NIOSH APPROVED SCBA & FULL PROTECTIVE EQUIPMENT WHEN FIGHTING CHEMICAL FIRE. USE WATER SPRAY TO COOL NEARBY CONTAINERS EXPOSED TO FIRE.

**Unusual Fire/Explosion Hazard:**  
FIRE OR EXCESSIVE HEAT MAY CAUSE PRODUCTION OF HAZARDOUS DECOMPOSITION PRODUCTS.

## Physical/Chemical Properties

**HCC:**  
T6

**NRC/State LIC No:**

**Net Prop WT For Ammo:**

**Boiling Point:**

**B.P. Text:**  
UNKNOWN

**Melt/Freeze Pt:**

**M.P/F.P Text:**  
N/R

**Decomp Temp:**

**Decomp Text:**  
N/A

**Vapor Pres:**  
UNKNOWN

**Vapor Density:**  
UNKNOWN

**Volatile Org Content %:**

**Spec Gravity:**  
UNKNOWN

**VOC Pounds/Gallon:**

**PH:** N/P

**VOC Grams/Liter:**

**Viscosity:**  
N/P

**Evaporation Rate & Reference:**  
UNKNOWN

**Solubility in Water:**  
COMPLETE

**Appearance and Odor:**  
LIQUID IN 20 ML VIAL FOR INJECTION.

**Percent Volatiles by Volume:**  
N/K

**Corrosion Rate:**  
N/P

## Reactivity Data

**Stability Indicator:**  
YES

**Stability Condition To Avoid:**  
N/R

**Materials To Avoid:**  
N/R

**Hazardous Decomposition Products:**  
CARBON DIOXIDE, CARBON MONOXIDE, INCOMPLETELY BURNED CARBON PRODUCTS.

**Hazardous Polymerization Indicator:**  
NO 5

**Conditions To Avoid Polymerization:**  
NOT APPLICABLE

## Toxicological Information

**Information:**N/P

## MSDS Transport Information

**Information:**N/P

## Regulatory Information

**Sara Title III Information:** N/P

**Federal Regulatory Information:** N/P

**State Regulatory Information:** N/P

## Other Information

**Other Information:**N/P