MATERIAL SAFETY DATA SHEET

Vector® BUTANE GAS REFILL CARTRIDGE

SECTION I - Substance Identification & General Information

Distributed by: KGM Industries Co., Inc., Commerce, CA 90040, U.S.A.

TRADE NAME: **Vector**®

CHEMICAL FAMILY: Alkane Hydrocarbon

DOT HAZARD CLASS: Flammable Gas, 2.1

SYNONYMS: Butane gas

FORMULA: $C_4H_{10} \& C_3H_8$

UN/NA ID#: UN 2037

SECTION II- Summary of Hazards & Composition

SUBSTANCE: Butane Percent: 60.00

CAS#: 106-87-8 Synonyms: n-Butane, Tetrane

SUBSTANCE: iso-Butane Percent: 29.00

CAS#: 75-28-5 Synonyms: 2-Methylpropane, Trlmethylethane

SUBSTANCE: Propane Percent: 11.00

CAS#: 75-98-6 Synonyms: LPG, Dimethylmethane, Propylhydride

EXTREMELY FLAMMABLE! Keep away from heat, sparks and open flame.

SECTION III - Physical Data

BOILING POINT: 31.1 Degree Fahrenheit

SOLUBILITY IN WATER: nil

APPEARANCE AND ODOR: Clear gas in Vector® brand aerosol can; Butane odor.

SPECIFIC GRAVITY: 0.556gms/cc VAPOR PRESSURE: 30 psig

SECTION IV - Fire & Explosion Data

FLASH POINT: -50 degree Fahrenheit Closed Cup

EXTINGUISHING MEDIA: CO2, Foam, Halogenated extinguishing agent

SPECIAL FIREFIGHTING PROCEDURES:

Water may be ineffective against flames, but can be used to cool exposed aerosols. Use self-contained breathing equipment with full face piece operated in positive-pressure mode.

UNUSUAL FIRE AND EXPLOSION HAZARDS:

Extremely Flammable liquefied gas is pressurized.

SECTION V - HEALTH HAZARD DATA

Personal Protective Procedures: None required under normal use.

Health Hazards:

Inhalation: 1% vapor concentration may produce anesthetic effects. Non-toxic, but may displace oxygen causing asphyxiation.

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SECTION V - HEALTH HAZARD DATA - continued

Eye or Skin Contact: Vapors are not irritating; liquid may cause freeze burns.

Ingestion: Freeze burns to mucous membranes, and central nervous system depression.

Signs and Symptoms of Exposure:

Concentration of propellant may cause anesthetic effects, dizziness, disorientation, headache, excitation, and central nervous system depression.

Emergency and First Aid Procedures:

Skin & Eye: Flush with running water at least 15 minutes. Seek medical attention if irritation develops.

Inhalation: Remove from exposure. Administer artificial respiration if necessary.

SEEK MEDICAL ATTENTION.

Ingestion: SEEK IMMEDIATE MEDICAL ATTENTION!

SECTION VI - Reactivity Data

Stability: Stable

Incompatibility: Strong oxidizing materials. Sources of ignition.

Hazardous Decomposition Products: None Known

Hazardous polymerization will not occur.

Section VII - Storage, Spills and Disposal Data

Handling and Storage: Do not handle or store near hear, sparks or flame. Contents under pressure (aerosol can). Exposure to heat in excess of 120° F may cause cans to burst. Vapor density heavier than air and highly flammable.

Store as Level 3 Aerosol (NFPA 30B)

Spill Procedure: Liquid evaporates rapidly at room temperatures.

Section VIII – Transportation Requirements

Department of Transportation (DOT) Classification:

UN Identification Number: UN 2037

Proper Shipping Name: Receptacles, Small Containing Gas (gas cartridges)

[without a release device, non-refillable]

Hazard Class 2.1

Hazard Label: Flammable Gas

24-HOUR EMERGENCY ASSISTANCE

CHEMTREC: 800-424-9300 (U.S. & Canada)

CHEMTREC's International Emergency phone number (Outside of U.S. & Canada): +1 703-741-6090 (Collect Calls

Accepted)