

MATERIAL SAFETY DATA SHEET

Section 1 - Product and Company Identification
PRIMPREP BLOOD RNA EXTRACTION KIT KR-1000
PRIMEPREP VIRAL RNA/DNA EXTRACTION KIT KR-2000

Product Identification: PrimePrep Plasmid Isolation kit etc.
Date of MSDS: 01/01/2006 **Technical Review Date:** 01/09/2014
FSC: NIIN: EMPTY
Submitter: N EN
Status Code: A
MFN: 01
Article: N
Kit Part: N

Manufacturer's Information

Manufacturer's Name: Genet Bio Co.
Manufacturer's Address1: B-412, Migun Techno World II, Techno2-ro, Yuseong-gu
Manufacturer's Address2: Daejeon
Manufacturer's Country: South Korea
General Information Telephone: 82-0502-523-3484
Emergency Telephone: 82-0502-523-3485
Proprietary: N
Reviewed: Y
Published: Y
CAGE: OPXC7

Contractor Information

Contractor's Name: Genet Bio
Contractor's Address1: B-412, Migun Techno World II, Techno2-ro, Yuseong-gu
Contractor's Address2: Daejeon, South Korea
Contractor's Telephone: 82-0502-523-3485

Section 2 - Composition/Information on Ingredients

Ingredient Name: RIBONUCLEASE A solution
Ingredient CAS Number: 9001-99-4 **Ingredient CAS Code:** T
RTECS Number: RF0760000 **RTECS Code:** T
=WT: =WT Code:
=Volume: =Volume Code:
>WT: >WT Code:
>Volume: >Volume Code:
<WT: <WT Code:
<Volume: <Volume Code:
% Low WT: % Low WT Code:
% High WT: % High WT Code:
% Low Volume: % Low Volume Code:

% High Volume: % High Volume Code:

% Text: N/P

% Enviromental Weight:

Other REC Limits: N/P

OSHA PEL: N/P **OSHA PEL Code:**

OSHA STEL: N/P **OSHA STEL Code:**

ACGIH TLV: N/P **ACGIH TLV Code:**

ACGIH STEL: N/P **ACGIH STEL Code:**

EPA Reporting Quantity:

DOT Reporting Quantity:

Ozone Depleting Chemical: N

Ingredient Name: ETHYLENEDIAMINETETRAACETIC ACID. %: 10 MM. PH: 8.0 @ 20C.

Ingredient CAS Number: 60-00-4 **Ingredient CAS Code:** T

RTECS Number: AH4025000 **RTECS Code:** T

=WT: =WT Code:

=Volume: =Volume Code:

>WT: >WT Code:

>Volume: >Volume Code:

<WT: <WT Code:

<Volume: <Volume Code:

% Low WT: % Low WT Code:

% High WT: % High WT Code:

% Low Volume: % Low Volume Code:

% High Volume: % High Volume Code:

% Text: 10 MM

% Enviromental Weight:

Other REC Limits: N/P

OSHA PEL: N/P **OSHA PEL Code:**

OSHA STEL: N/P **OSHA STEL Code:**

ACGIH TLV: N/P **ACGIH TLV Code:**

ACGIH STEL: N/P **ACGIH STEL Code:**

EPA Reporting Quantity: 5000 LBS

DOT Reporting Quantity: 5000 LBS

Ozone Depleting Chemical: N

Ingredient Name: HYDROCHLORIC ACID. %:AQUEOUS SOLUTION OF 50 MM
TRIS(HYDROXYMETHYL)-AMINOMETHANE AND HYDROCHLORIC ACID.

Ingredient CAS Number: 7647-01-0 **Ingredient CAS Code:** T

RTECS Number: MW4025000 **RTECS Code:** T

=WT: =WT Code:

=Volume: =Volume Code:

>WT: >WT Code:

>Volume: >Volume Code:

<WT: <WT Code:

<Volume: <Volume Code:

% Low WT: % Low WT Code:

% High WT: % High WT Code:

% Low Volume: % Low Volume Code:

% High Volume: % High Volume Code:

% Text: <50 MM

% Enviromental Weight:

Other REC Limits: N/P

OSHA PEL: C7 MG/M3;C5 PPM **OSHA PEL Code:** T

OSHA STEL: N/P **OSHA STEL Code:**

ACGIH TLV: NOT ESTABLISHED **ACGIH TLV Code:** T

ACGIH STEL: C7.5 MG/M3;C5 PPM **ACGIH STEL Code:** T
EPA Reporting Quantity: 5000 LBS
DOT Reporting Quantity: 5000 LBS
Ozone Depleting Chemical: N

Ingredient Name: TRIS(HYDROXYMETHYL)-AMINOMETHANE. %:AQUEOUS SOLUTION OF 50 MM TRIS(HYDROXYMETHYL)-AMINOMETHANE AND HYDROCHLORIC ACID.

Ingredient CAS Number: **Ingredient CAS Code:** X

RTECS Number: **RTECS Code:** X

=WT: =WT Code:

=Volume: =Volume Code:

>WT: >WT Code:

>Volume: >Volume Code:

<WT: <WT Code:

<Volume: <Volume Code:

% Low WT: % Low WT Code:

% High WT: % High WT Code:

% Low Volume: % Low Volume Code:

% High Volume: % High Volume Code:

% Text: <50 MM

% Enviromental Weight:

Other REC Limits: N/P

OSHA PEL: N/P **OSHA PEL Code:**

OSHA STEL: N/P **OSHA STEL Code:**

ACGIH TLV: N/P **ACGIH TLV Code:**

ACGIH STEL: N/P **ACGIH STEL Code:**

EPA Reporting Quantity:

DOT Reporting Quantity:

Ozone Depleting Chemical:

Ingredient Name: ACETIC ACID

Ingredient CAS Number: 64-19-7 **Ingredient CAS Code:** T

RTECS Number: AF1225000 **RTECS Code:** T

=WT: =WT Code:

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>Volume: >Volume Code:

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% Low WT: % Low WT Code:

% High WT: % High WT Code:

% Low Volume: % Low Volume Code:

% High Volume: % High Volume Code:

% Text: N/P

% Enviromental Weight:

Other REC Limits: N/P

OSHA PEL: 25 MG/M3;10 PPM **OSHA PEL Code:** T

OSHA STEL: N/P **OSHA STEL Code:**

ACGIH TLV: 25 MG/M3;10 PPM **ACGIH TLV Code:** T

ACGIH STEL: 37 MG/M3;15 PPM **ACGIH STEL Code:** T

EPA Reporting Quantity: 5000 LBS

DOT Reporting Quantity: 5000 LBS

Ozone Depleting Chemical: N

Ingredient Name: PROTEINASE K

Ingredient CAS Number: 39450-01-6 **Ingredient CAS Code:** M

RTECS Number: RTECS Code: X
=WT: =WT Code:
=Volume: =Volume Code:
>WT: >WT Code:
>Volume: >Volume Code:
<WT: <WT Code:
<Volume: <Volume Code:
% Low WT: % Low WT Code:
% High WT: % High WT Code:
% Low Volume: % Low Volume Code:
% High Volume: % High Volume Code:
% Text: N/K
% Enviromental Weight:
Other REC Limits: N/K
OSHA PEL: N/K **OSHA PEL Code:** M
OSHA STEL: OSHA STEL Code:
ACGIH TLV: N/K **ACGIH TLV Code:** M
ACGIH STEL: N/P **ACGIH STEL Code:**
EPA Reporting Quantity:
DOT Reporting Quantity:
Ozone Depleting Chemical:

Section 3 - Hazards Identification, Including Emergency Overview

Health Hazards Acute & Chronic: THE TOXICOLOGICAL PROPERTIES OF THIS PRODUCT HAVE NOT BEEN DETERMINED. THE SOLUTION MAY CAUSE ACUTE OR CHRONIC IRRITATION OF SKIN, EYES AND MUCOUS MEMBRANES.

Signs & Symptoms of Overexposure: SEE HEALTH HAZARDS.

Medical Conditions Aggravated by Exposure: N/P

LD50 LC50 Mixture: N/P

Route of Entry Indicators:

Inhalation: YES

Skin: YES

Ingestion: YES

Carcinogenicity Indicators

NTP: NO

IARC: NO

OSHA: NO

Carcinogenicity Explanation: N/P

Section 4 - First Aid Measures

First Aid:

EYES: FLUSH W/WATER FOR 15 MINS. SKIN: WASH W/WATER FOR 15 MINS. INHALATION: REMOVE TO FRESH AIR. IF BREATHING IS DIFFICULT GIVE OXYGEN. IF BREATHING STOPS GIVE CPR. INGESTION: WASH OUT W/WATER. OBTAIN MEDICAL ATTENTION IN ALL CASES.

Section 5 - Fire Fighting Measures

Fire Fighting Procedures:

WEAR NIOSH APPROVED SELF-CONTAINED BREATHING APPARATUS AND FULL PROTECTIVE EQUIPMENT (FP N).

Unusual Fire or Explosion Hazard: N/P

Extinguishing Media:

USE EXTINGUISHING MEDIA APPROPRIATE TO SURROUNDING FIRE CONDITIONS.

Flash Point: **Flash Point Text:** N/A

Autoignition Temperature:

Autoignition Temperature Text: N/P

Lower Limit(s):

Upper Limit(s):

Section 6 - Accidental Release Measures

Spill Release Procedures:

WEAR PROTECTIVE CLOTHING AND SAFETY GLASSES OR GOGGLES WHILE CLEANING UP THE SPILL. MINIMIZE SPREAD OF LIQUID USING APPROPRIATE ABSORBENT MATERIAL. PLACE IN CLOSED CONTAINERS FOR DISPOSAL.

Section 7 - Handling and Storage

Spill Release Procedures: WEAR PROTECTIVE CLOTHING AND SAFETY GLASSES OR GOGGLES WHILE CLEANING UP THE SPILL. MINIMIZE SPREAD OF LIQUID USING APPROPRIATE ABSORBENT MATERIAL. PLACE IN CLOSED CONTAINERS FOR DISPOSAL.

Waste Disposal Methods: DISPOSE OF IN ACCORDANCE WITH ALL APPLICABLE FEDERAL, STATE AND LOCAL ENVIRONMENTAL REGULATIONS.

Handling And Storage Precautions: STORE IN TIGHTLY CLOSED CONTAINER AT ROOM TEMPERATURE. MAY CAUSE EYE AND SKIN IRRITATION. DURING USE, AVOID CONTACT WITH EYES, SKIN AND CLOTHING. WHEN NOT IN USE, KEEP IN TIGHTLY CLOSED CONTAINER.

Other Precautions: THIS PRODUCT IS FOR RESEARCH USE ONLY. THIS PRODUCT HAS NOT BEEN APPROVED FOR DIAGNOSTIC OR THERAPEUTIC USE.

Section 8 - Exposure Controls & Personal Protection

Respiratory Protection:

USE NIOSH APPROVED RESPIRATOR APPROPRIATE FOR EXPOSURE OF CONCERN (FP N).

Ventilation: N/P

Protective Gloves:

WEAR PROPER GLOVES. WEAR IMPERVIOUS GLOVES (FP N).

Eye Protection: ANSI APPROVED CHEMICAL WORKERS GOGGLES (FP N).

Other Protective Equipment: EYEWASH AND DELUGE SHOWER MEETING ANSI DESIGN CRITERIA (FP N). WEAR LAB COAT.

Work Hygienic Practices: WASH THOROUGHLY AFTER HANDLING.

Supplemental Health & Safety Information: N/P

Section 9 - Physical & Chemical Properties

HCC:

NRC/State License Number:

Net Property Weight for Ammo:

Boiling Point: **Boiling Point Text:** N/P

Melting/Freezing Point: **Melting/Freezing Text:** N/P

Decomposition Point: **Decomposition Text:** N/P

Vapor Pressure: N/P **Vapor Density:** N/P

Percent Volatile Organic Content:

Specific Gravity: N/P

Volatile Organic Content Pounds per Gallon:

pH: N/A

Volatile Organic Content Grams per Liter:

Viscosity: N/P

Evaporation Weight and Reference: N/P

Solubility in Water: N/P

Appearance and Odor: CLEAR, COLORLESS LIQUID; SLIGHT ALCOHOL ODOR.

Percent Volatiles by Volume: N/P

Corrosion Rate: N/P

Section 10 - Stability & Reactivity Data

Stability Indicator: YES

Materials to Avoid: N/P

Stability Condition to Avoid: N/P

Hazardous Decomposition Products: N/P

Hazardous Polymerization Indicator: NO

Conditions to Avoid Polymerization: N/P

Section 11 - Toxicological Information

Toxicological Information:

THE TOXICOLOGICAL PROPERTIES OF THIS PRODUCT HAVE NOT BEEN DETERMINED.

Section 12 - Ecological Information

None Listed

Section 13 - Disposal Considerations

Waste Disposal Methods:

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

Section 14 - Transport Information

AIR TRANSPORTATION : ALL AIR TRANSPORTATION APPROVED AND THE PLACE SET TO THE IATA AVIATION ACT IS FOLLOWED.

Section 15 - Regulatory Information

None Listed

Section 16 - Other Information

Other Information:

CHEMICAL NAME OF PRODUCT: WATER WHICH HAS BEEN TREATED WITH 0.1% DIETHYLPYROCARBONATE (DEPC) AND SUBSEQUENTLY AUTOCLAVED. THE HAZARDS IDENTIFIED WITH THIS PRODUCT ARE BASED ON THE HAZARDS OF THE INDIVIDUAL COMPONENT(S) AND NOT ON THE SOLUTION AS A WHOLE. THIS IS BASED ON THE SAF-T-DATA (TRADEMARK OF MALLINCKRODT BAKER, INC) RATINGS: HEALTH=1 (SLIGHT); FLAMMABILITY=1 (SLIGHT); REACTIVITY=1 (SLIGHT) ; CONTACT=1 (SLIGHT).

HAZCOM Label Information

Product Identification: WATER, DEPC TREATED, B2023

Assigned Individual: N

Company Name: Genet Bio

Health Emergency Telephone: +82-0502-523-3484

Label Required Indicator: Y

Date Label Reviewed: 01/09/2014

Status Code: A

Manufacturer's Label Number:

Date of Label:

Year Procured: N/K

Organization Code: F

Chronic Hazard Indicator: Y

Eye Protection Indicator: YES

Skin Protection Indicator: YES

Respiratory Protection Indicator: YES

Signal Word: CAUTION

Health Hazard: Slight

Contact Hazard: Slight

Fire Hazard: None

Reactivity Hazard: None