

1121 5th Street NW Washington, DC 20001 www.edvotek.com

Safety Data Sheet

Version 2 Revision Date 10/17/2014

1. PRODUCT AND COMPANY IDENTIFICATION

Product name: DNA Binding solution

Product Number:

Brand: Edvotek Supplier: Edvotek

1121 5th Street NW Washington, DC

20001

Telephone: 1-800-338-6835

or 202-370-1500 Fax: 202-370-1501

1X. 202-370-1301

Emergency Phone #:

202-370-1500

2. HAZARDS IDENTIFICATION

Emergency Overview

OSHA Hazards:

Flammable liquids (2)

Pictogram



Hazard statement(s)

H225 Highly flammable liquid and vapour.

Precautionary statement(s)

P210 Keep away from

heat/sparks/open flames/hot surfaces...

P233 Keep container tightly closed.

P242 Use only non-sparking tools.

P280 Wear protective gloves/

protective clothing/ eye protection/ face protection.

P303 + P361 + P353 IF ON SKIN (or hair): Remove/ Take off immediately all

contaminated clothing. Rinse skin with water/ shower.

P370 + P378 In case of fire: Use dry sand, dry chemical or alcohol-resistant foam

P501 Dispose of contents/ container to an approved waste disposal plant

HMIS Classification:

Health hazard: 2 Flammability: 3 Physical hazard: 0

NFPA Rating:

Health hazard: 2
Fire: 3
Reactivity Hazard: 0

Potential Health Effects:

Inhalation: May be harmful if inhaled. **Skin:** May be harmful if absorbed

through skin. May cause skin irritation.

Eyes: May cause eye irritation. **Ingestion**: May be harmful if

swallowed.

3. COMPOSITION/INFORMATION ON INGREDIENTS

Mixture of the substances listed below with nonhazardous additions.

Chemical name	EC No.	CAS -No	Concentration
Ethanol	200-578-6	64-17-5	
Glacial acetic	200-580-7	64-19-7	

4. FIRST AID MEASURES

General information

No special measures required.

If inhaled

If breathed in, move person into fresh air. If not breathing, give artificial respiration. Consult doctor in case of complaints.

In case of skin contact

Immediately wash off with soap and plenty of water. Get medical attention if symptoms develop.

In case of eye contact

Flush eyes with water as a precaution. Get medical attention immediately if irritation persists.

If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water. Get medical attention if symptoms develop.

5. FIREFIGHTING MEASURES

Conditions of flammability

Flammable or combustible.

Suitable extinguishing media

Use water spray, alcohol resistant foam, dry chemical or carbon dioxide.

Special protective equipment for firefighters

Wear self contained breathing apparatus for fire fighting if necessary.

Hazardous combustion products

No known products

6. ACCIDENTAL RELEASE MEASURES

Personal precautions

Prevent skin/eye contact. Use personal protective equipment as needed.

Environmental precautions

Dilute with plenty of water. Do not allow to enter sewers/ surface or ground water.

Methods and materials for containment and cleaning up

Clean up spills immediately. Use absorbent materials if needed and dispose into a chemical waste container.

7. HANDLING AND STORAGE

Precautions for safe handling

No special measures necessary. Good laboratory technique should be used when handling.

Conditions for safe storage

No special measures necessary. Store at room temperature.

Incompatible Products

No known products.

8. EXPOSURE CONTROLS/ PERSONAL PROTECTION

Personal protective equipment Respiratory protection

Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Hand protection

Wear protective gloves. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices.

Eye protection

Avoid eye contact with this material. Wear chemical safety goggles.

Skin and body protection

Use chemical gloves as needed. Use clean protective body covering clothing as needed to minimize contact with clothing and skin.

Hygiene measures

Handle in accordance with good industrial hygiene and safety practice. Wash and dry hands at the end of workday.

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance

Form liquid Color colorless

Odor no data available

Safety data

no data available Ha Melting point/freezing point no data available Boiling point no data available Flash point no data available Ignition temperature no data available **Autoignition Temperature** no data available Lower explosion limit no data available Upper explosion limit no data available Vapor pressure no data available Density (water=1) no data available Water solubility no data available

Partition coefficient:

n-octanol/water no data available Relative vapour Density no data available Odour Threshold no data available Evaporation rate no data available

10. STABILITY AND REACTIVITY

Chemical stability

Stable under recommended storage conditions.

Possibility of hazardous reactions

Vapours may form explosive mixture with air.

Conditions to avoid

Heat, flames and sparks. Extremes of temperature and direct sunlight

Materials to avoid

Alkali metals, Ammonia, Oxidizing agents, Peroxide

Hazardous decomposition products

No dangerous decomposition products known

11. TOXICOLOGICAL INFORMATION

Acute toxicity LD/LC50 values

no data available

Serious eye damage/eye irritation

no data available

Respiratory or skin sensitization

no data available

Germ cell mutagenicity

no data available

Skin corrosion/irritation

no data available

Carcinogenicity

No components of this product are listed by IARC, ACGIH, NTP and OSHA.

Reproductive toxicity

no data available

Teratogenicity

no data available

Aspiration hazard

no data available

Synergistic effects

no data available

12. ECOLOGICAL INFORMATION

Toxicity

no data available

Persistence and degradability

no data available

Bioaccumulative potential

no data available

Mobility in soil

no data available

PBT and vPvB assessment

no data available

Other adverse effects

no data available

13. DISPOSAL CONSIDERATIONS

Product

Dispose of unused product, residues, and containers according to local, regional, state, and national regulations.

Contaminated packaging

Dispose of as unused product.

14. TRANSPORT INFORMATION

DOT (US)

Not dangerous goods

IMDG

Not dangerous goods

IATA

Not dangerous goods

15. REGULATORY INFORMATION

OSHA Hazards

Flammable liquids.

SARA 302 Components

SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

SARA 313 Components

SARA 313: This material does not contain any chemical components with known CAS numbers that exceed the reporting levels established by SARA Title III, Section 313.

SARA 311/312Hazards

No SARA Hazards.

16. OTHER INFORMATION

For educational use only. Not intended for human or animal diagnostic or therapeutic uses.

The above information was acquired by diligent search and/or investigation and the recommendations are based on prudent application of professional judgment. The information shall not be taken as being all inclusive and is to be used only as a guide. All materials and mixtures may present unknown hazards and should be used with caution. Since the Company cannot control the actual methods, volumes, or conditions of use, the Company shall not be held liable for any damages or losses resulting from the handling or from contact with the product as described herein. THE INFORMATION IN THIS SDS DOES NOT CONSTITUTE A WARRANTY, EXPRESSED OR IMPLIED, INCLUDING ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE.

SDS- DNA in Solution Page 1 of 7



1121 5th Street NW Washington, DC 20001 www.edvotek.com

Safety Data Sheet

Version 2 Revision Date 08/09/2013

1. PRODUCT AND COMPANY IDENTIFICATION

Product name: DNA in solution Product Number: 332, 333, 334, 336,

369, 701, 702, 703, 704 Brand: Edvotek Supplier: Edvotek

1121 5th Street NW Washington, DC

20001

Telephone: 1-800-338-6835

or 202-370-1500

Fax: 202-370-1501 Emergency Phone # (For both supplier

and Manufacturer):

202-370-1500

2. HAZARDS IDENTIFICATION

Emergency Overview

OSHA Hazards:

No known OSHA hazards Not a dangerous substance or mixture according to the Globally Harmonized System (GHS).

HMIS Classification:

Health hazard: 0 Flammability: 0 Physical hazard: 0

NFPA Rating:

Health hazard: 0
Fire: 0
Reactivity Hazard: 0

Potential Health Effects:

Inhalation: May be harmful if inhaled. **Skin**: May be harmful if absorbed through skin. May cause skin irritation.

Eyes: May cause eye irritation. **Ingestion**: May be harmful if

swallowed.

SDS- DNA in solution Page 2 of 7

3. COMPOSITION/INFORMATION ON INGREDIENTS

No ingredients are hazardous according to OSHA criteria.

4. FIRST AID MEASURES

General information

No special measures required.

If inhaled

If breathed in, move person into fresh air. If not breathing, give artificial respiration. Consult doctor in case of complaints.

In case of skin contact

Immediately wash off with soap and plenty of water. Get medical attention if symptoms develop.

In case of eye contact

Flush eyes with water as a precaution. Get medical attention immediately if irritation persists.

If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water. Get medical attention if symptoms develop.

5. FIREFIGHTING MEASURES

Conditions of flammability

Not flammable or combustible.

Suitable extinguishing media

Use water spray, alcohol resistant foam, dry chemical or carbon dioxide.

Special protective equipment for firefighters

Wear self contained breathing apparatus for fire fighting if necessary.

Hazardous combustion products

No known products.

SDS- DNA in solution Page 3 of 7

6. ACCIDENTAL RELEASE MEASURES

Personal precautions

Prevent skin/eye contact. Use personal protective equipment as needed.

Environmental precautions

Dilute with plenty of water. Do not allow to enter sewers/ surface or ground water.

Methods and materials for containment and cleaning up

Clean up spills immediately. Use absorbent materials if needed and dispose into a chemical waste container.

7. HANDLING AND STORAGE

Precautions for safe handling

No special measures necessary. Good laboratory technique should be used when handling.

Conditions for safe storage

No special measures necessary. Store at room temperature.

Incompatible Products

No known products.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Personal protective equipment Respiratory protection

Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Hand protection

Wear protective gloves. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices.

SDS- DNA in solution Page 4 of 7

Eye protection

Avoid eye contact with this material. Wear chemical safety goggles.

Skin and body protection

Use chemical gloves as needed. Use clean protective body covering clothing as needed to minimize contact with clothing and skin.

Hygiene measures

Handle in accordance with good industrial hygiene and safety practice. Wash and dry hands at the end of workday.

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance

Form liquid Color colorless

Odor no data available

Safety data

no data available Ha Melting point/freezing point no data available **Boiling point** no data available Flash point no data available no data available Ignition temperature **Autoignition Temperature** no data available Lower explosion limit no data available Upper explosion limit no data available Vapor pressure no data available Density (water=1) no data available Water solubility no data available

Partition coefficient:

n-octanol/water no data available Relative vapour Density no data available Odour Threshold no data available Evaporation rate no data available SDS- DNA in solution Page 5 of 7

10. STABILITY AND REACTIVITY

Chemical stability

Stable under recommended storage conditions.

Possibility of hazardous reactions

No further relevant data available.

Conditions to avoid

No further relevant data available.

Materials to avoid

No further relevant data available.

Hazardous decomposition products

No dangerous decomposition products known.

11. TOXICOLOGICAL INFORMATION

Acute toxicity LD/LC50 values

no data available

Serious eye damage/eye irritation

no data available

Skin corrosion/irritation

no data available

Reproductive toxicity

no data available

Teratogenicity

no data available

Respiratory or skin sensitization

no data available

Germ cell mutagenicity

no data available

Carcinogenicity

No components of this product are listed by IARC, ACGIH, NTP and

OSHA.

Aspiration hazard

no data available

Synergistic effects

no data available

SDS- DNA in solution Page 6 of 7

12. ECOLOGICAL INFORMATION

Toxicity

no data available

Persistence and degradability

no data available

Bioaccumulative potential

no data available

Mobility in soil

no data available

PBT and vPvB assessment

no data available

Other adverse effects

no data available

13. DISPOSAL CONSIDERATIONS

Product

Dispose of unused product, residues, and containers according to local, regional, state, and national regulations.

Contaminated packaging

Dispose of as unused product.

14. TRANSPORT INFORMATION

DOT (US)

Not dangerous goods

IMDG

Not dangerous goods

IATA

Not dangerous goods

SDS- DNA in solution Page 7 of 7

15. REGULATORY INFORMATION

OSHA Hazards

No known OSHA hazards

SARA 302 Components

SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

SARA 313 Components

SARA 313: This material does not contain any chemical components with known CAS numbers that exceed the reporting levels established by SARA Title III, Section 313.

SARA 311/312Hazards

No SARA Hazards.

16. OTHER INFORMATION

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SDS- Ethidium Bromide Page 1 of 8



1121 5th Street NW Washington, DC 20001 www.edvotek.com

Safety Data Sheet

Version 2 Revision Date 08/09/2013

1. PRODUCT AND COMPANY IDENTIFICATION

Product name: Ethidium Bromide

Product Number: 2000, 2002, 20005

Brand: Edvotek Supplier: Edvotek

1121 5th Street NW Washington, DC

20001

Telephone: 1-800-338-6835

or 202-370-1500

Fax: 202-370-1501 Emergency Phone # (For both supplier

and Manufacturer):

202-370-1500

2. HAZARDS IDENTIFICATION

Emergency Overview

GHS Clasification

Acute toxicity, Oral (Category 4)
Acute toxicity, Inhalation (Category 2)
Germ Cell mutagenicity (Category 2)
Skin irritant (Category 2)

Signal word

Danger

Pictograms







Hazard statement(s)

H302 Harmful if swallowed.

H330 Fatal if inhaled.

H341 Suspected of causing genetic defects.

SDS-Ethidium Bromide Page 2 of 8

Precautionary statement(s)

P260 Do not breathe dust/ fume/ gas/

mist/ vapours/ spray.

P281 Use personal protective

equipment as required.

P310

Immediately call a POISON CENTER or doctor/ physician

HMIS Classification:

Health hazard: 3 Flammability: 0 Physical hazard: 0

NFPA Rating:

Health hazard: 4
Fire: 0
Reactivity Hazard: 0

OSHA Hazards

Highly toxic by inhalation, Harmful by ingestion, Mutagen

Potential Health Effects:

Inhalation May be harmful if inhaled. May cause respiratory tract irritation. Skin- May be harmful if absorbed through skin. May cause skin irritation. Eyes-May cause eye irritation. Ingestion- Harmful if swallowed.

3. COMPOSITION/INFORMATION ON INGREDIENTS

Synonyms: EtBr

3,8-Diamino-5-ethyl-6-phenylphenanthridinium bromide

Homidium bromide Formula: $C_{21}H_{20}BrN_3$

Molecular Weight: 394.31 g/mol

Chemical name	EC No.	CAS -No	Concentration
3,8-Diamino-1-ethyl-6-	214-984-6	1239-45-8	
phenylphenanthridinium			
bromide			

SDS-Ethidium Bromide Page 3 of 8

4. FIRST AID MEASURES

If inhaled

If breathed in, move person into fresh air. If not breathing, give artificial respiration.

In case of skin contact

Immediately wash off with soap and plenty of water. Get medical attention if symptoms develop.

In case of eye contact

Flush eyes with water as a precaution. Get medical attention immediately if irritation persists.

If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water. Get medical attention if symptoms develop.

5. FIREFIGHTING MEASURES

Conditions of flammability

Not flammable or combustible.

Suitable extinguishing media

Use water spray, alcohol resistant foam, dry chemical or carbon dioxide.

Special protective equipment for firefighters

Wear self contained breathing apparatus for fire fighting if necessary.

Hazardous combustion products

Emits toxic fumes.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions

Prevent skin/eye contact. Use personal protective equipment as needed.

Environmental precautions

Dilute with plenty of water. Do not allow to enter sewers/ surface or ground water.

SDS-Ethidium Bromide Page 4 of 8

Methods and materials for containment and cleaning up

Clean up spills immediately. Use absorbent materials if needed and dispose into a chemical waste container.

7. HANDLING AND STORAGE

Precautions for safe handling

Handle in accordance with good industrial hygiene and safety practice.

Keep in the dark in a dry and wellventilated place.

Conditions for safe storage

Incompatible storage Strong oxidizing agent

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Personal protective equipment Respiratory protection

Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Hand protection

Wear protective gloves. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices.

Eye protection

Avoid eye contact with this material. Wear chemical safety goggles.

Skin and body protection

Use chemical gloves as needed. Use clean protective body covering clothing as needed to minimize contact with clothing and skin.

Hygiene measures

Handle in accordance with good industrial hygiene and safety practice. Wash and dry hands at the end of workday.

SDS-Ethidium Bromide Page 5 of 8

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance

Form chemical bound to paper

Colour no color

Safety data

pH 4.0-7.0

Melting point/freezing point no data available Boiling point no data available Flash point no data available Ignition temperature no data available **Autoignition Temperature** no data available Lower explosion limit no data available Upper explosion limit no data available Vapour pressure no data available Density no data available Water solubility no data available

Partition coefficient:

n-octanol/water no data available
Relative vapour Density no data available
Odour no data available
Odour Threshold no data available
Evaporation rate no data available

10. STABILITY AND REACTIVITY

Chemical stability

Stable under recommended storage Ma conditions.

Possibility of hazardous reactions

No further relevant data available.

Conditions to avoid

No further relevant data available.

Materials to avoid

Strong oxidizing agents.

Hazardous decomposition products

Hazardous decomposition products formed under fire conditions. Carbon oxides, nitrogen oxides (NOx), Hydrogen bromide gas.

SDS-Ethidium Bromide Page 6 of 8

11. TOXICOLOGICAL INFORMATION

Acute toxicity Oral LD50

LD50

Oral-rat-1,503 -2,177 mg/kg

Inhalation LC50

LC50

Inhalation-rat-1 h-11.8 -134 mg/l

Dermal LD50

no data available no data available

Reproductive toxicity

no data available

Teratogenicity

no data available

Skin corrosion/irritation

no data avilable

Serious eye damage/eye irritation

no data available

Respiratory or skin sensitization

no data available

Germ cell mutagenicity

In vitro tests showed mutagenic effects

Aspiration hazard

no data available

Synergistic effects

no data available

12. ECOLOGICAL INFORMATION

Toxicity

no data available

Persistence and degradability

no data available

Bioaccumulative potential

no data available

Other adverse effects

no data available

Mobility in soil

no data available

PBT and vPvB assessment

no data available

SDS-Ethidium Bromide Page 7 of 8

13. DISPOSAL CONSIDERATIONS

Product

Dispose of unused product, residues, and containers according to local, regional, state, and national regulations.

Contaminated packaging

Dispose of as unused product.

14. TRANSPORT INFORMATION

DOT (US)

Not dangerous goods

IMDG

Not dangerous goods

IATA

Not dangerous goods

15. REGULATORY INFORMATION

OSHA Hazards

Highly toxic by inhalation, Harmful by ingestion. Mutagen

SARA 302 Components

No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

SARA 313 Components

This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.

SARA 311/312Hazards

Acute Health Hazard, Chronic Health Hazard.

SDS-Ethidium Bromide Page 8 of 8

16. OTHER INFORMATION

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1121 5th Street NW Washington, DC 20001 www.edvotek.com

Safety Data Sheet

Version 2 Revision Date 08/09/2013

1. PRODUCT AND COMPANY IDENTIFICATION

Product name: PCR − EdvoBeads TM

Product Number: 625

Brand: Edvotek Supplier: Edvotek

1121 5th Street NW

Washington, DC

20001

Telephone: 1-800-338-6835

or 202-370-1500 ax: 202-370-1501

Fax: 202-370-1501 Emergency Phone # (For both supplier

and Manufacturer):

202-370-1500

2. HAZARDS IDENTIFICATION

Emergency Overview

OSHA Hazards:

No known OSHA hazards

Not a dangerous substance or mixture according to the Globally Harmonized System (GHS).

HMIS Classification:

Health hazard: 0 Flammability: 0 Physical hazard: 0

NFPA Rating:

Health hazard: 0 Fire: 0

Reactivity Hazard: 0

Potential Health Effects:

Skin: May be harmful if absorbed.

through skin. May cause skin irritation.

Eyes: May cause eye irritation. **Ingestion**: May be harmful if

swallowed.

3. COMPOSITION/INFORMATION ON INGREDIENTS

No ingredients are hazardous according to OSHA criteria.

4. FIRST AID MEASURES

General information

No special measures required

If inhaled

If breathed in, move person into fresh air. If not breathing, give artificial respiration. Consult doctor in case of complaints.

In case of skin contact

Immediately wash off with soap and plenty of water. Get medical attention if symptoms develop.

In case of eye contact

Flush eyes with water as a precaution. Get medical attention immediately if irritation persists.

If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water. Get medical attention if symptoms develop.

5. FIREFIGHTING MEASURES

Conditions of flammability

Not flammable or combustible.

Suitable extinguishing media

Use water spray, alcohol resistant foam, dry chemical or carbon dioxide.

Special protective equipment for firefighters

Wear self contained breathing apparatus for fire fighting if necessary.

Hazardous combustion products

No known products

6. ACCIDENTAL RELEASE MEASURES

Personal precautions

Prevent skin/eye contact. Use personal protective equipment as needed.

Environmental precautions

Dilute with plenty of water. Do not allow to enter sewers/ surface or ground water.

Methods and materials for containment and cleaning up

Clean up spills immediately. Use absorbent materials if needed and dispose into a chemical waste container.

7. HANDLING AND STORAGE

Precautions for safe handling

No special measures necessary. Good laboratory technique should be used when handling.

Conditions for safe storage

No special measures necessary. Store at room temperature.

Incompatible Products

No known products.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Personal protective equipment Respiratory protection

Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Hand protection

Wear protective gloves. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

Eye protection

Avoid eye contact with this material. Wear chemical safety glasses with side shields or chemical safety goggles.

Skin and body protection

Use chemical gloves as needed. Use clean protective body covering clothing as needed to minimize contact with clothing and skin.

Hygiene measures

Handle in accordance with good industrial hygiene and safety practice. Wash and dry hands at the end of workday.

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance

Form Solid Colour white

Odor no data avilable

Safety data

no data available Ha Melting point/freezing point no data available **Boiling point** no data available no data available Flash point no data available Ignition temperature **Autoignition Temperature** no data available Lower explosion limit no data available Upper explosion limit no data available Vapour pressure no data available Density (water=1) no data available Water solubility no data available

Partition coefficient:

n-octanol/water no data available Relative vapour Density no data available Odour Threshold no data available Evaporation rate no data available

10. STABILITY AND REACTIVITY

Chemical stability

Stable under recommended storage conditions.

Possibility of hazardous reactions

No further relevant data available.

Conditions to avoid

No further relevant data available.

Materials to avoid

No further relevant data available.

Hazardous decomposition products

No dangerous decomposition products known.

11. TOXICOLOGICAL INFORMATION

Acute toxicity LD/LC50 values

no data available

Serious eye damage/eye irritation

no data available

Skin corrosion/irritation

no data available

Reproductive toxicity

no data available

Teratogenicity

no data available

Respiratory or skin sensitization

no data available

Germ cell mutagenicity

no data available

Carcinogenicity

No components of this product are listed by IARC, ACGIH, NTP and OSHA.

Aspiration hazard

no data available

Synergistic effects

no data available

12. ECOLOGICAL INFORMATION

Toxicity

no data available

Persistence and degradability

no data available

Bioaccumulative potential

no data available

Mobility in soil

no data available

PBT and vPvB assessment

no data available

Other adverse effects

no data available

13. DISPOSAL CONSIDERATIONS

Product

Dispose of unused product, residues, and containers according to local, regional, state, and national regulations.

Contaminated packaging

Dispose of as unused product.

14. TRANSPORT INFORMATION

DOT (US)

Not dangerous goods

IMDG

Not dangerous goods

IATA

Not dangerous goods

15. REGULATORY INFORMATION

OSHA Hazards

No known OSHA hazards

SARA 302 Components

SARA 302: No

chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

SARA 313 Components

SARA 313: This material does not contain any chemical components with known CAS numbers that exceed the reporting levels established by SARA Title III, Section 313.

SARA 311/312Hazards

No SARA Hazards.

16. OTHER INFORMATION

For educational use only. Not intended for human or animal diagnostic or therapeutic uses.

The above information was acquired by diligent search and/or investigation and the recommendations are based on prudent application of professional judgment. The information shall not be taken as being all inclusive and is to be used only as a guide. All materials and mixtures may present unknown hazards and should be used with caution. Since the Company cannot control the actual methods, volumes, or conditions of use, the Company shall not be held liable for any damages or losses resulting from the handling or from contact with the product as described herein. THE INFORMATION IN THIS SDS DOES NOT CONSTITUTE A WARRENTY, EXPRESSED OR IMPLIED, INCLUDING ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE.



1121 5th Street NW Washington, DC 20001 www.edvotek.com

Safety Data Sheet

Version 2 Revision Date 08/09/2013

or 202-370-1500

and Manufacturer):

202-370-1500

1. PRODUCT AND COMPANY IDENTIFICATION

Product name: Primers -Synthetic Telephone: 1-800-338-6835

DNA

Product Number: Fax: 202-370-1501
Brand: Edvotek Emergency Phone # (For both supplier

Brand: Edvotek Supplier: Edvotek

1121 5th Street NW

Washington, DC

HAZARDS IDENTIFICATION

20001

Emergency Overview NFP

OSHA Hazards:

2.

No known OSHA hazards Not a dangerous substance or mixture according to the Globally Harmonised System (GHS).

HMIS Classification:

Health hazard: 0 Flammability: 0 Physical hazard: 0

NFPA Rating:

Health hazard: 0
Fire: 0
Reactivity Hazard: 0

Potential Health Effects:

Inhalation: May be harmful if inhaled.. **Skin**: May be harmful if absorbed.

through skin. May cause skin irritation.

Eyes: May cause eye irritation. **Ingestion**: May be harmful if

swallowed.

3. COMPOSITION/INFORMATION ON INGREDIENTS

No ingredients are hazardous according to OSHA criteria.

4. FIRST AID MEASURES

General information

No special measures required

If inhaled

If breathed in, move person into fresh air. If not breathing, give artificial respiration. Consult doctor in case of complaints.

In case of skin contact

Immediately wash off with soap and plenty of water. Get medical attention if symptoms develop.

In case of eye contact

Flush eyes with water as a precaution. Get medical attention immediately if irritation persists.

If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water. Get medical attention if symptoms develop.

5. FIREFIGHTING MEASURES

Conditions of flammability

Not flammable or combustible.

Suitable extinguishing media

Use water spray, alcohol resistant foam, dry chemical or carbon dioxide.

Special protective equipment for firefighters

Wear self contained breathing apparatus for fire fighting if necessary.

Hazardous combustion products

No known products.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions

Prevent skin/eye contact. Use personal protective equipment as needed.

Environmental precautions

Dilute with plenty of water. Do not allow to enter sewers/ surface or ground water.

Methods and materials for containment and cleaning up

Clean up spills immediately. Use absorbent materials if needed and dispose into a chemical waste container.

7. HANDLING AND STORAGE

Precautions for safe handling

No special measures necessary. Good laboratory technique should be used when handling.

Conditions for safe storage

No special measures necessary. Store at room temperature.

Incompatible Products

No known products

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Personal protective equipment Respiratory protection

Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Hand protection

Wear protective gloves. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices.

Eye protection

Avoid eye contact with this material. Wear chemical safety goggles.

Skin and body protection

Use chemical gloves as needed. Use clean protective body covering clothing as needed to minimize contact with clothing and skin.

Hygiene measures

Handle in accordance with good industrial hygiene and safety practice. Wash and dry hands at the end of workday.

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance

Form liquid Colour colorless

Odor no data avilable

Safety data

рH no data available Melting point/freezing point no data available **Boiling point** no data available Flash point no data available Ignition temperature no data available **Autoignition Temperature** no data available Lower explosion limit no data available Upper explosion limit no data available Vapour pressure no data available Density (water=1) no data available Water solubility no data available Partition coefficient:

n-octanol/water no data available Relative vapour Density no data available Odour Threshold no data available Evaporation rate no data available

10. STABILITY AND REACTIVITY

Chemical stability

Stable under recommended storage conditions.

Possibility of hazardous reactions

No further relevant data available.

Conditions to avoid

No further relevant data available.

Materials to avoid

No further relevant data available.

Hazardous decomposition products

No dangerous decomposition products known.

11. TOXICOLOGICAL INFORMATION

Acute toxicity LD/LC50 values

no data available

Serious eye damage/eye irritation

no data available

Skin corrosion/irritation

no data available

Reproductive toxicity

no data available

Teratogenicity

no data available

Respiratory or skin sensitization

no data available

Germ cell mutagenicity

no data available

Carcinogenicity

No components of this product are listed by IARC, ACGIH, NTP and OSHA.

Aspiration hazard

no data available

Synergistic effects

no data available

12. ECOLOGICAL INFORMATION

Toxicity

no data available

Persistence and degradability

no data available

Bioaccumulative potential

no data available

Mobility in soil no data available

PBT and vPvB assessment

no data available

Other adverse effects

no data available

13. DISPOSAL CONSIDERATIONS

Product

Dispose of unused product, residues, and containers according to local, regional, state, and national regulations.

Contaminated packaging

Dispose of as unused product.

14. TRANSPORT INFORMATION

DOT (US)

Not dangerous goods

IMDG

Not dangerous goods

IATA

Not dangerous goods

15. REGULATORY INFORMATION

OSHA Hazards

No known OSHA hazards.

SARA 302 Components

SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

SARA 313 Components

SARA 313: This material does not contain any chemical components with known CAS numbers that exceed the reporting levels established by SARA Title III, Section 313.

SARA 311/312Hazards

No SARA Hazards.

16. OTHER INFORMATION

For educational use only. Not intended for human or animal diagnostic or therapeutic uses.

The above information was acquired by diligent search and/or investigation and the recommendations are based on prudent application of professional judgment. The information shall not be taken as being all inclusive and is to be used only as a guide. All materials and mixtures may present unknown hazards and should be used with caution. Since the Company cannot control the actual methods, volumes, or conditions of use, the Company shall not be held liable for any damages or losses resulting from the handling or from contact with the product as described herein. THE INFORMATION IN THIS SDS DOES NOT CONSTITUTE A WARRENTY, EXPRESSED OR IMPLIED, INCLUDING ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE.

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1121 5th Street NW Washington, DC 20001 www.edvotek.com

Version 2

Safety Data Sheet

Revision Date 08/09/2013

1. PRODUCT AND COMPANY IDENTIFICATION

Product name: TE Buffer

Product Number:

Brand: Edvotek Supplier: Edvotek

1121 5th Street NW Washington, DC

20001

Telephone: 1-800-338-6835

or 202-370-1500

Fax: 202-370-1501

Emergency Phone #:

202-370-1500

2. HAZARDS IDENTIFICATION

Emergency Overview

OSHA Hazards:

No known OSHA hazards.

Not a dangerous substance or mixture according to the Globally Harmonized System (GHS).

HMIS Classification:

Health hazard: 1 Flammability: 0 Physical hazard: 0

NFPA Rating:

Health hazard: 0
Fire: 0
Reactivity Hazard: 0

Potential Health Effects:

Inhalation: May be harmful if inhaled. **Skin:** May be harmful if absorbed through skin. May cause skin irritation.

Eyes: May cause eye irritation. **Ingestion** May be harmful if

swallowed.

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3. COMPOSITION/INFORMATION ON INGREDIENTS

Mixture of the substances listed bellow with nonhazardous additions.

Chemical name	EC No.	CAS -No	Concentration
EDTA, disodium	205-358-3	6381-92-6	
dihydrate			
Tris hydroxymethyl	201-064-4	77-86-1	
aminomethane			

4. FIRST AID MEASURES

General information

No special measures required.

If inhaled

If breathed in, move person into fresh air. If not breathing, give artificial respiration. Consult doctor in case of complaints.

In case of skin contact

Immediately wash off with soap and plenty of water. Get medical attention if symptoms develop.

In case of eye contact

Flush eyes with water as a precaution. Get medical attention immediately if irritation persists.

If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water. Get medical attention if symptoms develop.

5. FIREFIGHTING MEASURES

Conditions of flammability

Not flammable or combustible.

Suitable extinguishing media

Use water spray, alcohol resistant foam, dry chemical or carbon dioxide.

Special protective equipment for firefighters

Wear self contained breathing apparatus for fire fighting if necessary.

Hazardous combustion products

Carbon oxides, Nitrogen oxides (NOx).

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6. ACCIDENTAL RELEASE MEASURES

Personal precautions

Prevent skin/eye contact. Use personal protective equipment as needed.

Environmental precautions

Dilute with plenty of water. Do not allow to enter sewers/ surface or ground water.

Methods and materials for containment and cleaning up

Clean up spills immediately. Use absorbent materials if needed and dispose into a chemical waste container.

7. HANDLING AND STORAGE

Precautions for safe handling

No special measures necessary. Good laboratory technique should be used when handling.

Conditions for safe storage

No special measures necessary. Store at room temperature.

Incompatible Products

Strong oxidizing agents.

8. EXPOSURE CONTROLS/ PERSONAL PROTECTION

Personal protective equipment Respiratory protection

Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Hand protection

Wear protective gloves. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices.

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Eye protection

Avoid eye contact with this material. Wear chemical safety goggles.

Skin and body protection

Use chemical gloves as needed. Use clean protective body covering clothing as needed to minimize contact with clothing and skin.

Hygiene measures

Handle in accordance with good industrial hygiene and safety practice. Wash and dry hands at the end of workday.

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance

Form liquid Color colorless

Odor no data available

Safety data

6-8 pΗ Melting point/freezing point no data available $\sim 100^{\circ}$ C **Boiling** point Flash point no data available Ignition temperature no data available **Autoignition Temperature** no data available Lower explosion limit no data available Upper explosion limit no data available Vapor pressure no data available Density (water=1) 1.020 Water solubility no data available

Partition coefficient:

n-octanol/water no data available Relative vapour Density no data available Odour Threshold no data available Evaporation rate no data available SDS- TE Buffer Page 5 of 7

10. STABILITY AND REACTIVITY

Chemical stability

Stable under recommended storage conditions.

Possibility of hazardous reactions

No further relevant data available.

Conditions to avoid

No further relevant data available.

Materials to avoid

No further relevant data available.

Hazardous decomposition products

No dangerous decomposition products known.

11. TOXICOLOGICAL INFORMATION

Acute toxicity LD/LC50 values

no data available

Serious eye damage/eye irritation

no data available

Skin corrosion/irritation

no data available

Reproductive toxicity

no data available

Teratogenicity

no data available

Respiratory or skin sensitization

no data available

Germ cell mutagenicity

no data available

Carcinogenicity

No components of this product are listed by IARC, ACGIH, NTP and OSHA.

Aspiration hazard

no data available

Synergistic effects

no data available

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12. ECOLOGICAL INFORMATION

Toxicity

no data available

Persistence and degradability

no data available

Bioaccumulative potential

no data available

Mobility in soil

no data available

PBT and vPvB assessment

no data available

Other adverse effects

no data available

13. DISPOSAL CONSIDERATIONS

Product

Dispose of unused product, residues, and containers according to local, regional, state, and national regulations.

Contaminated packaging

Dispose of as unused product.

14. TRANSPORT INFORMATION

DOT (US)

Not dangerous goods

IMDG

Not dangerous goods

IATA

Not dangerous goods

SDS- TE Buffer Page 7 of 7

15. REGULATORY INFORMATION

OSHA Hazards

No known OSHA hazards

SARA 302 Components

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SARA 313 Components

SARA 313: This material does not contain any chemical components with known CAS numbers that exceed the reporting levels established by SARA Title III, Section 313.

SARA 311/312Hazards

No SARA Hazards.

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