MATERIAL SAFETY DATA SHEET

KIT COMPONENTS

<table>
<thead>
<tr>
<th>Product code</th>
<th>Product Name</th>
</tr>
</thead>
<tbody>
<tr>
<td>95143-020</td>
<td>qScript™ XLT One-Step RT-PCR Kit</td>
</tr>
<tr>
<td>95143-200</td>
<td></td>
</tr>
</tbody>
</table>

Components

<table>
<thead>
<tr>
<th>Components</th>
<th>Name</th>
</tr>
</thead>
<tbody>
<tr>
<td>84257</td>
<td>qScript XLT One-Step RT</td>
</tr>
<tr>
<td>84258</td>
<td></td>
</tr>
<tr>
<td>84259</td>
<td>One-Step ToughMix (2X)</td>
</tr>
<tr>
<td>84260</td>
<td></td>
</tr>
<tr>
<td>84255</td>
<td>GelTrack® Loading Dyes (50X)</td>
</tr>
<tr>
<td>84007</td>
<td>Nuclease-Free Water</td>
</tr>
</tbody>
</table>
SECTION 1 – PRODUCT AND COMPANY IDENTIFICATION

Product Name: qScript™ XLT One-Step Reverse Transcriptase
Product Code(s): 84257; 84258

General Use: Laboratory reagent
For Research Use Only, Not for Use in Diagnostic Procedures

Manufacturer:
QUANTA BIOSCIENCES INC.
202 PERRY PKWY., SUITE 1
GAITHERSBURG, MD 20877
USA
Phone: (800) 364-2149
FAX: (301) 956-1681
Email: technical.support@quantabio.com
www.quantabio.com

Emergency Telephone:
Quanta BioSciences: (240) 454-8912 (09:00 to 17:00 EST)
Or contact your local distributor for Quanta BioSciences products.

SECTION 2 – HAZARDS IDENTIFICATION

Emergency Overview: May cause eye, skin or respiratory irritation.

Potential Health Effects:
EYES: May cause eye irritation. Exposed individuals may experience eye tearing, redness, and discomfort.
SKIN: May cause skin irritation.
INGESTION: May be harmful if swallowed in large quantities.
INHALATION: May cause irritation to the respiratory system if liquid is splashed or aerosolized.

Chronic Effects / Carcinogenicity: No chemical components in this material at reportable thresholds are listed by IARC, OSHA or NTP.

Potential Environmental Effects: The product components are not classified as environmentally hazardous.

SECTION 3 – COMPOSITION / INFORMATION ON INGREDIENTS

<table>
<thead>
<tr>
<th>Hazardous Ingredients</th>
<th>CAS Registry No.</th>
<th>Percentage (wt/wt)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Glycerol</td>
<td>56-81-5</td>
<td>40–60</td>
</tr>
</tbody>
</table>

OSHA Regulatory Status: This material is considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200).

SECTION 4 – FIRST AID MEASURES

EYES: Immediately flush with contaminated eye(s) with lukewarm, gently flowing water for at least 5 minutes, while holding the eyelids(s) open. Remove any contact lenses and continue rinsing. Get medical attention if irritation persists after washing.
SKIN: Remove contaminated clothes and rinse skin thoroughly with water for at least 15 minutes. If irritation develops and persists, get medical attention.

INGESTION: Rinse mouth thoroughly with water. If large amounts have been ingested, give 2 to 8 ounces of water. Get medical attention.

INHALATION: If symptoms are experienced, remove source of contamination or move victim to fresh air. Obtain medical advice.

SECTION 5 – FIRE FIGHTING MEASURES

<table>
<thead>
<tr>
<th>Flammable Properties</th>
<th>Method: Not applicable</th>
</tr>
</thead>
<tbody>
<tr>
<td>Flash Point:</td>
<td>Not flammable</td>
</tr>
<tr>
<td>Flammable Limits:</td>
<td>LFL: Not applicable</td>
</tr>
<tr>
<td>Autoignition Temperature:</td>
<td>Not applicable</td>
</tr>
</tbody>
</table>

EXTINGUISHING MEDIA: Dry chemical

FIRE & EXPLOSION HAZARDS: None. Product will not support combustion.

FIRE FIGHTING INSTRUCTIONS: Wear self-contained breathing apparatus and protective suit for surrounding fire.

SECTION 6 – ACCIDENTAL RELEASE MEASURES

PERSONAL PRECAUTIONS: Use personal protective equipment. See Section 8.

METHODS FOR CLEANING UP: Soak up with inert absorbent material.

SECTION 7 – HANDLING AND STORAGE

HANDLING: Local exhaust is recommended. Avoid inhalation of vapors and spray mist and contact with skin and eyes. Wear approved safety goggles. Wear protective gloves and appropriate clothing to prevent skin contact. Observe good industrial hygiene practices.

STORAGE: Store in closed original container in a dry place. Keep away from food, drink and animal feeding stuffs. Store away from incompatible materials.

SECTION 8 – EXPOSURE CONTROLS / PERSONAL PROTECTION

ENGINEERING CONTROLS: Provide adequate ventilation and minimize the risk of inhalation of vapors and mists.

RESPIRATORY PROTECTION: Not needed if ventilation is adequate to control occupational exposures. If needed, refer to 29 CFR 1910.134, CSA Z94.4-93, or European Standard EN 149 for complete regulations. Seek advice from local supervisor.

SKIN PROTECTION: Wear protective gloves. Use skin protection. Apron and long sleeves are recommended.

EYE PROTECTION: Risk of contact: Wear approved safety goggles.

EXPOSURE GUIDELINES: Glycerin (mist) total dust: 15 mg/m³ TWA (OSHA)
Glycerin (mist) respirable fraction: 5 mg/m³ TWA (OSHA)
MATERIAL SAFETY DATA SHEET

Glycerin mist: 10 mg/m³ TWA (ACGIH)

SECTION 9 – PHYSICAL AND CHEMICAL PROPERTIES

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appearance</td>
<td>Clear liquid</td>
</tr>
<tr>
<td>Odor</td>
<td>Odorless</td>
</tr>
<tr>
<td>Boiling Point</td>
<td>No data available</td>
</tr>
<tr>
<td>Vapor Pressure</td>
<td>No data available</td>
</tr>
<tr>
<td>Solubility in Water</td>
<td>Complete</td>
</tr>
<tr>
<td>Specific Gravity</td>
<td>No data available</td>
</tr>
<tr>
<td>pH</td>
<td>8.0</td>
</tr>
<tr>
<td>VOC</td>
<td>No data available</td>
</tr>
</tbody>
</table>

SECTION 10 – STABILITY AND REACTIVITY

Stability: This product is stable under expected conditions of use.

Materials to Avoid: Oxidizing agents; alkalies.

Conditions to Avoid: Heat.

Hazardous Decomposition Products: At elevated temperatures, acrolein, carbon oxides, nitrogen oxides.

SECTION 11 – TOXICOLOGICAL INFORMATION

Acute Toxicity

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Oral LD₅₀ (rat/mouse)</th>
<th>Dermal LD₅₀ (rat/rabbit)</th>
<th>Inhalation LD₅₀ (rat/mouse)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Glycerol</td>
<td>12600 mg/kg (rat)</td>
<td>&gt;1000 mg/kg (rabbit)</td>
<td>&gt;570 mg/m³ (rat)</td>
</tr>
</tbody>
</table>

Chronic Toxicity

Carcinogenic effects: The components of this product are not designated as potential carcinogens by IARC (Group 1, 2A or 2B), NTP or OSHA.

Mutagenic effects: No data available.

Teratogenic effects: No data available.

SECTION 12 – ECOLOGICAL INFORMATION

Ecotoxicity: The product components are not classified as environmentally hazardous.

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Fish LC₅₀ (species, hours)</th>
<th>Invertebrates EC₅₀ or IC₅₀ (species, hours)</th>
<th>Plant EC₅₀ (species, hours)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Glycerol</td>
<td>5000 mg/l (Goldfish)</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>

Mobility: The product is water soluble and may spread in water systems.
Persistence and Degradability: No data available.

Bioaccumulation Potential: No data available.

**SECTION 13 – DISPOSAL CONSIDERATIONS**

Dispose of waste and residues in accordance with local authority requirements.

**SECTION 14 – TRANSPORT INFORMATION**

**US DOT**

Not regulated

Proper Shipping Name
UN Number
Hazard Class
Packing Group
Special Instructions

**IATA**

Not regulated

Proper Shipping Name
UN Number
Hazard Class
Packing Group
Special Instructions

**IMDG**

Not regulated

Proper Shipping Name
UN Number
Hazard Class
Packing Group
Special Instructions

**SECTION 15 – REGULATORY INFORMATION**

**U.S. State Regulations**

California Proposition 65 - This product contains the following Proposition 65 chemicals:
None

**Canada**

This product has been classified according to the hazard criteria of the CPR and the MSDS contains all of the information required by the CPR.

WHMIS Hazard class: D2B

**SECTION 16 – OTHER INFORMATION**
This material is sold for research and development purposes only. It is not for any human or animal therapeutic or clinical diagnostic use. It is not intended for food, drug, household, agricultural, or cosmetic use. An individual technically qualified to handle potentially hazardous chemicals must supervise the use of this material.

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 be present unknown hazards and should be used with caution. Since Quanta BioSciences 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 MSDS DOES NOT CONSTITUTE A WARRANTY, EXPRESS OR IMPLIED, INCLUDING ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE.

qScript is a trademark of Quanta BioSciences, Inc.
SECTION 1 – PRODUCT AND COMPANY IDENTIFICATION

Product Name: One-Step ToughMix® (2X)
Product Code(s): 84113, 84114

General Use: Laboratory reagent
For Research Use Only, Not for Use in Diagnostic Procedures

MSDS Issue Date: 26 November, 2012

Manufacturer:
QUANTA BIOSCIENCES INC.
202 PERRY PKWY., SUITE 1
GAITHERSBURG, MD 20877
USA
Phone: (800) 364-2149
FAX: (301) 956-1681
Email: technical.support@quantabio.com
www.quantabio.com

Emergency Telephone:
Quanta BioSciences: (240) 454-8912 (09:00 to 17:00 EST)
Or contact your local distributor for Quanta BioSciences products.

SECTION 2 – HAZARDS IDENTIFICATION

Emergency Overview: May cause eye, skin or respiratory irritation.

Potential Health Effects:

EYES: May cause eye irritation. Exposed individuals may experience eye tearing, redness, and discomfort.

SKIN: May cause skin irritation.

INGESTION: May be harmful if swallowed in large quantities.

INHALATION: May cause irritation to the respiratory system if liquid is splashed or aerosolized.

Chronic Effects / Carcinogenicity: No chemical components in this material at reportable thresholds are listed by IARC, OSHA or NTP.

Potential Environmental Effects: The product components are not classified as environmentally hazardous.

SECTION 3 – COMPOSITION / INFORMATION ON INGREDIENTS

<table>
<thead>
<tr>
<th>Hazardous Ingredients</th>
<th>CAS Registry No.</th>
<th>Percentage (wt/wt)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Glycerol</td>
<td>56-81-5</td>
<td>1 – 5</td>
</tr>
<tr>
<td>Tris-hydroxymethylaminomethane</td>
<td>77-88-1</td>
<td>1 – 2</td>
</tr>
</tbody>
</table>

OSHA Regulatory Status: This material is considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200).

SECTION 4 – FIRST AID MEASURES

EYES: Immediately flush with contaminated eye(s) with lukewarm, gently flowing water for at least 5 minutes, while holding the eyelids(s) open. Remove any contact lenses and continue rinsing.
MATERIAL SAFETY DATA SHEET

Get medical attention if irritation persists after washing.

SKIN: Remove contaminated clothes and rinse skin thoroughly with water for at least 15 minutes. If irritation develops and persists, Get medical attention.

INGESTION: Rinse mouth thoroughly with water. If large amounts have been ingested, give 2 to 8 ounces of water. Get medical attention.

INHALATION: If symptoms are experienced, remove source of contamination or move victim to fresh air. Obtain medical advice.

SECTION 5 – FIRE FIGHTING MEASURES

Flammable Properties
Flash Point: Does not flash Method: Not applicable
Flammable Limits: LFL: Not applicable UFL: Not applicable
Autoignition Temperature: Not applicable

EXTINGUISHING MEDIA: Dry chemical
FIRE & EXPLOSION HAZARDS: None. Product will not support combustion.
FIRE FIGHTING INSTRUCTIONS: Wear self-contained breathing apparatus and protective suit for surrounding fire.

SECTION 6 – ACCIDENTAL RELEASE MEASURES

PERSONAL PRECAUTIONS: Use personal protective equipment. See Section 8.
METHODS FOR CLEANING UP: Soak up with inert absorbent material.

SECTION 7 – HANDLING AND STORAGE

HANDLING: Local exhaust is recommended. Avoid inhalation of vapors and spray mist and contact with skin and eyes. Wear approved safety goggles. Wear protective gloves and appropriate clothing to prevent skin contact. Observe good industrial hygiene practices.
STORAGE: Store in closed original container in a dry place. Keep away from food, drink and animal feeding stuffs. Store away from incompatible materials.

SECTION 8 – EXPOSURE CONTROLS / PERSONAL PROTECTION

ENGINEERING CONTROLS: Provide adequate ventilation and minimize the risk of inhalation of vapors and mists.
RESPIRATORY PROTECTION: Not needed if ventilation is adequate to control occupational exposures. If needed, refer to 29 CFR 1910.134, CSA Z94.4-93, or European Standard EN 149 for complete regulations. Seek advice from local supervisor.
SKIN PROTECTION: Wear protective gloves. Use skin protection. Apron and long sleeves are recommended.
EYE PROTECTION: Risk of contact: Wear approved safety goggles.
EXPOSURE GUIDELINES: Glycerin (mist) total dust: 15 mg/m³ TWA (OSHA)
Glycerin (mist) respirable fraction: 5 mg/m$^3$ TWA (OSHA)  
Glycerin mist: 10 mg/m$^3$ TWA (ACGIH)

**SECTION 9 – PHYSICAL AND CHEMICAL PROPERTIES**

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appearance</td>
<td>Clear liquid</td>
</tr>
<tr>
<td>Odor</td>
<td>Odorless</td>
</tr>
<tr>
<td>Boiling Point</td>
<td>No data available</td>
</tr>
<tr>
<td>Vapor Pressure</td>
<td>No data available</td>
</tr>
<tr>
<td>Solubility In Water</td>
<td>Complete</td>
</tr>
<tr>
<td>Specific Gravity</td>
<td>No data available</td>
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<tr>
<td>pH</td>
<td>8.7 (+/- 0.1)</td>
</tr>
<tr>
<td>VOC</td>
<td>No data available</td>
</tr>
</tbody>
</table>

**SECTION 10 – STABILITY AND REACTIVITY**

- **Stability:** This product is stable under expected conditions of use.
- **Materials to Avoid:** Oxidizing agents; alkalies.
- **Conditions to Avoid:** Heat.
- **Hazardous Decomposition Products:** At elevated temperatures, acrolein, carbon oxides, nitrogen oxides.

**SECTION 11 – TOXICOLOGICAL INFORMATION**

**Acute Toxicity**

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Oral LD$_{50}$ (rat/mouse)</th>
<th>Dermal LD$_{50}$ (rat/rabbit)</th>
<th>Inhalation LC$_{50}$ (rat/mouse)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Glycerol</td>
<td>12600 mg/kg (rat)</td>
<td>&gt;1000 mg/kg (rabbit)</td>
<td>&gt;570 mg/m$^3$ (rat)</td>
</tr>
<tr>
<td>Tris(hydroxymethyl) aminomethane</td>
<td>5900 mg/kg (rat)</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>

**Chronic Toxicity**

Carcinogenic effects: The components of this product are not designated as potential carcinogens by IARC (Group 1, 2A or 2B), NTP or OSHA.

Mutagenic effects: No data available.

Teratogenic effects: No data available.

Target organs: No data available.

**SECTION 12 – ECOLOGICAL INFORMATION**

Ecotoxicity: The product components are not classified as environmentally hazardous.
MATERIAL SAFETY DATA SHEET

<table>
<thead>
<tr>
<th>LC₅₀ (species, hours)</th>
<th>EC₅₀ or IC₅₀ (species, hours)</th>
<th>EC₅₀ (species, hours)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Glycerol 5000 mg/l (Goldfish)</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>

Mobility: The product is water soluble and may spread in water systems.

Persistence and Degradability: No data available.

Bioaccumulation Potential: No data available.

SECTION 13 – DISPOSAL CONSIDERATIONS

Dispose of waste and residues in accordance with local, state, provincial or federal requirements, as applicable.

SECTION 14 – TRANSPORT INFORMATION

US DOT Not regulated
Proper Shipping Name
UN Number
Hazard Class
Packing Group
Special Instructions

IATA Not regulated
Proper Shipping Name
UN Number
Hazard Class
Packing Group
Special Instructions

IMDG Not regulated
Proper Shipping Name
UN Number
Hazard Class
Packing Group
Special Instructions

SECTION 15 – REGULATORY INFORMATION

U.S. State Regulations

California Proposition 65 - This product contains the following Proposition 65 chemicals:
None

Canada

This product has been classified according to the hazard criteria of the CPR and the MSDS contains all of the information required by the CPR.

WHMIS Hazard class: D2B
This material is sold for research and development purposes only. It is not for any human or animal therapeutic or clinical diagnostic use. It is not intended for food, drug, household, agricultural, or cosmetic use. An individual technically qualified to handle potentially hazardous chemicals must supervise the use of this material.

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 be present unknown hazards and should be used with caution. Since Quanta BioSciences 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 MSDS DOES NOT CONSTITUTE A WARRANTY, EXPRESS OR IMPLIED, INCLUDING ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE.

ToughMix is a registered trademark of Quanta BioSciences, Inc.
SECTION 1 – PRODUCT AND COMPANY IDENTIFICATION

Product Name: GelTrack Loading Dyes (50X)
Product Code(s): 84255

General Use: Laboratory reagent
For Research Use Only, Not for Use in Diagnostic Procedures

Manufacturer:
QUANTA BIOSCIENCES INC.
202 PERRY PKWY., SUITE 1
GAITHERSBURG, MD 20877
USA
Phone: (800) 364-2149
FAX: (301) 956-1681
Email: technical.support@quantabio.com
www.quantabio.com

Emergency Telephone:
Quanta BioSciences: (240) 454-8912 (09:00 to 17:00 EST)
Or contact your local distributor for Quanta BioSciences products.

SECTION 2 – COMPOSITION/DATA ON COMPONENTS

<table>
<thead>
<tr>
<th>Substance Name</th>
<th>CAS Registry No.</th>
<th>SARA 313</th>
</tr>
</thead>
<tbody>
<tr>
<td>GelTrack Loading Dyes (50X)</td>
<td>None</td>
<td>No</td>
</tr>
</tbody>
</table>

SECTION 3 – HAZARDS IDENTIFICATION

Emergency Overview
Avoid contact and inhalation.

Form
Liquid

OSHA Hazards
Irritant

HMIS Classification
Health Hazard: 2
Flammability: 0
Physical hazards: 0

NFPA Rating
Health Hazard: 2
Fire: 0
Reactivity Hazard: 0

Potential Health Effects
Inhalation May be harmful if inhaled. Causes respiratory tract irritation
SECTION 4 – FIRST AID MEASURES

**Skin contact**
Wash off immediately with plenty of soap and water. If irritation develops, get medical attention.

**Eye contact**
Rinse thoroughly with plenty of water, also under the eyelids. If irritation persists, get medical attention.

**Ingestion**
Never give anything by mouth to an unconscious person. Rinse mouth with water. Consult a physician.

**Inhalation**
If breathed in, move person into fresh air. If not breathing give artificial respiration. Consult a physician.

SECTION 5 – FIRE FIGHTING MEASURES

**Flammable properties**
- Flash point: no data available
- Ignition temperature: no data available

**Suitable extinguishing media**
Use water spray, alcohol resistant foam, dry chemical or carbon dioxide

**Special protective equipment for Firefighters**
Wear self-contained breathing apparatus and protective suit

SECTION 6 – ACCIDENTAL RELEASE MEASURES

**Personal precautions**
Use personal protective equipment

**Environmental precautions**
Do not let product enter drains

SECTION 7 – HANDLING AND STORAGE

**Handling**
Local exhaust is recommended. Avoid inhalation of vapors and spray mist and contact with skin and eyes. Wear approved safety goggles. Wear protective gloves and appropriate clothing to prevent skin contact. Observe good industrial hygiene practices.

**Storage**
Store at –20°C to 4°C in closed original container in a dry place. Keep away from food, drink and animal feeding stuffs. Store away from incompatible materials.

SECTION 8 – EXPOSURE CONTROLS / PERSONAL PROTECTION

**Occupational exposure controls**

**Exposure limits**
- **Engineering measures**
  Ensure adequate ventilation, especially in confined areas

**Personal protective equipment**
- **Respiratory protection**
  In case of insufficient ventilation, wear suitable respiratory equipment
- **Hand protection**
  Protective gloves
- **Eye protection**
  Safety glasses with side-shields
- **Skin and body protection**
  Lightweight protective clothing
MATERIAL SAFETY DATA SHEET

Hygiene measures
Handle in accordance with good industrial hygiene and safety practice
Environmental exposure
controls Prevent product from entering drains

SECTION 9 – PHYSICAL AND CHEMICAL PROPERTIES

General Information
Form
Green Liquid

Important Health Safety and Environmental Information
Boiling point/range °C  No data available °F  No data available
Melting point/range °C  No data available °F  No data available
Flash point °C  No data available °F  No data available
Autoignition temperature °C  No data available °F  No data available
Oxidizing properties No information available
Water solubility No data available

SECTION 10 – STABILITY AND REACTIVITY

Stability
Stable under recommended storage conditions
Materials to avoid
Strong oxidizing agents
Hazardous decomposition products
Hazardous decomposition products formed under fire conditions. - Carbon oxides, nitrogen oxides (NOx), Sulphur oxides, Sodium oxides
Polymerization
Hazardous polymerization does not occur

SECTION 11 – TOXICOLOGICAL INFORMATION

Acute Toxicity
Principle Routes of Exposure/ Potential Health Effects
Eyes  Causes eye irritation
Skin  May be harmful if absorbed through skin. Causes skin irritation.
Inhalation  May be harmful if inhaled. Causes respiratory tract irritation.
Ingestion  May be harmful if swallowed

Specific Effects
Carcinogenic effects  No information available
Mutagenic effects  No information available
Reproductive toxicity  No information available
Sensitization  No information available

Target Organ Effects  No information available

SECTION 12 – ECOLOGICAL INFORMATION

Ecotoxicity effects  No information available
Mobility  No information available
Biodegradation  Inherently biodegradable
MATERIAL SAFETY DATA SHEET

Bioaccumulation  No information available

SECTION 13 – DISPOSAL CONSIDERATIONS
Dispose of waste and residues in accordance with local authority requirements.

SECTION 14 – TRANSPORT INFORMATION
IATA:  Non-hazardous for air transport
RIS/ADR:  Non-hazardous for road transport
IMDG:  Non-hazardous for sea transport

SECTION 15 – REGULATORY INFORMATION
OSHA Hazards:  Irritant

International Inventories

U.S. Federal Regulations
SARA 313:  Not regulated

Clean Air Act, Section 112 Hazardous Air Pollutants (HAPs) (see 40 CFR 61)
This product contains the following HAPs:

U.S. State Regulations:  None listed

California Prop. 65 components
This product does not contain any chemicals known to State of California to cause cancer, birth, or any other reproductive defects.

Canada
This product has been classified according to the hazard criteria of the CPR and the MSDS contains all of the information required by the CPR.

WHMIS Hazard class:  Not controlled

SECTION 16 – OTHER INFORMATION
MSDS Status:  original

This material is sold for research and development purposes only. It is not for any human or animal therapeutic or clinical diagnostic use. It is not intended for food, drug, household, agricultural, or cosmetic use. An individual technically qualified to handle potentially hazardous chemicals must supervise the use of this material.

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 be present unknown hazards and should be used with caution. Since Quanta BioSciences 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 MSDS DOES NOT CONSTITUTE A WARRANTY, EXPRESS OR IMPLIED, INCLUDING ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE.

GelTrack is a registered trademark of Quanta BioSciences, Inc..
SECTION 1 – PRODUCT AND COMPANY IDENTIFICATION

Product Name: Nuclease-Free Water
Product Code(s): 84004; 84005; 84006

General Use: Laboratory reagent
For Research Use Only, Not for Use in Diagnostic Procedures

Manufacturer:
QUANTA BIOSCIENCES INC.
202 PERRY PKWY., SUITE 1
GAITHERSBURG, MD 20877
USA
Phone: (800) 364-2149
FAX: (301) 956-1681
Email: technical.support@quantabio.com
www.quantabio.com

Emergency Telephone:
Quanta BioSciences: (240) 454-8912 (9:00 to 17:00 EST)
Or contact your local distributor for Quanta BioSciences products.

SECTION 2 – HAZARDS IDENTIFICATION

Emergency Overview: May cause eye, skin or respiratory irritation.

Potential Health Effects:
EYES: May cause slight eye irritation.
SKIN: May cause slight skin irritation.
INGESTION: May be harmful if swallowed in large quantities.
INHALATION: May cause mild irritation to the respiratory system if liquid is splashed or aerosolized.

Chronic Effects / Carcinogenicity: No chemical components in this material at reportable thresholds are listed by IARC, OSHA or NTP.

Potential Environmental Effects: The product components are not classified as environmentally hazardous.

SECTION 3 – COMPOSITION / INFORMATION ON INGREDIENTS

<table>
<thead>
<tr>
<th>Hazardous Ingredients</th>
<th>CAS Registry No.</th>
<th>Percentage (wt/wt)</th>
</tr>
</thead>
<tbody>
<tr>
<td>None</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

OSHA Regulatory Status: While this material is not considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200), this MSDS contains valuable information critical to the safe handling and proper use of the product. This MSDS should be retained and available for employees and other users of this product.

SECTION 4 – FIRST AID MEASURES

EYES: Immediately flush with contaminated eye(s) with lukewarm, gently flowing water for at least 5 minutes, while holding the eyelids(s) open. Remove any contact lenses and continue rinsing. Get medical attention if irritation persists after washing.
SKIN: Remove contaminated clothes and rinse skin thoroughly with water for at least 5 minutes. If irritation develops and persists, get medical attention.

INGESTION: Rinse mouth thoroughly with water. If large amounts have been ingested, give 2 to 8 ounces of water. Get medical attention.

INHALATION: If symptoms are experienced, remove source of contamination or move victim to fresh air. Obtain medical attention.

SECTION 5 – FIRE FIGHTING MEASURES

<table>
<thead>
<tr>
<th>Flammable Properties</th>
<th>Flash Point:</th>
<th>Not flammable</th>
<th>Method: Not applicable</th>
</tr>
</thead>
<tbody>
<tr>
<td>Flammable Limits:</td>
<td>LFL: Not applicable</td>
<td>UFL: Not applicable</td>
<td></td>
</tr>
<tr>
<td>Autoignition Temperature:</td>
<td>Not applicable</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

EXTINGUISHING MEDIA: Dry chemical

FIRE & EXPLOSION HAZARDS: None. Product will not support combustion.

FIRE FIGHTING INSTRUCTIONS: Wear self-contained breathing apparatus and protective suit for surrounding fire.

SECTION 6 – ACCIDENTAL RELEASE MEASURES

PERSONAL PRECAUTIONS: Use personal protective equipment. See Section 8.

METHODS FOR CLEANING UP: Soak up with inert absorbent material.

SECTION 7 – HANDLING AND STORAGE

HANDLING: Local exhaust is recommended. Avoid inhalation of vapors and spray mist and contact with skin and eyes. Wear approved safety goggles. Wear protective gloves and appropriate clothing to prevent skin contact. Observe good industrial hygiene practices.

STORAGE: Store in closed original container in a dry place. Keep away from food, drink and animal feeding stuffs. Store away from incompatible materials.

SECTION 8 – EXPOSURE CONTROLS / PERSONAL PROTECTION

ENGINEERING CONTROLS: Provide adequate ventilation and minimize the risk of inhalation of vapors and mists.

RESPIRATORY PROTECTION: Not needed if ventilation is adequate to control occupational exposures. If needed, refer to 29 CFR 1910.134, CSA Z94.4-93, or European Standard EN 149 for complete regulations. Seek advice from local supervisor.

SKIN PROTECTION: Wear protective gloves. Use skin protection.

EYE PROTECTION: Wear approved safety glasses.

EXPOSURE GUIDELINES: None
SECTION 9 – PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE: Clear liquid
ODOR: Odorless
BOILING POINT: ~ 212°F (~100°C)
VAPOR PRESSURE: No data available
SOLUBILITY IN WATER: Complete
SPECIFIC GRAVITY: 1.000 g/mL at 3.98°C
pH: 6.0 to 8.0 at 25°C
VOC: No data available

SECTION 10 – STABILITY AND REACTIVITY

STABILITY: This product is stable under expected conditions of use.
MATERIALS TO AVOID: No data available
CONDITIONS TO AVOID: No data available
HAZARDOUS DECOMPOSITION PRODUCTS: No data available

SECTION 11 – TOXICOLOGICAL INFORMATION

Carcinogenic effects: The components of this product are not designated as potential carcinogens by IARC (Group 1, 2A or 2B), NTP or OSHA.

SECTION 12 – ECOLOGICAL INFORMATION

Ecotoxicity: The product components are not classified as environmentally hazardous.
Mobility: The product is water soluble and may spread in water systems.
Persistence and Degradability: No data available.
Bioaccumulation Potential: No data available.

SECTION 13 – DISPOSAL CONSIDERATIONS

Dispose of waste and residues in accordance with local authority requirements.

SECTION 14 – TRANSPORT INFORMATION

US DOT Not regulated
Proper Shipping Name
UN Number
Hazard Class
MATERIAL SAFETY DATA SHEET

Packing Group
Special Instructions
IATA
Proper Shipping Name
UN Number
Hazard Class
Packing Group
Special Instructions
IMDG
Proper Shipping Name
UN Number
Hazard Class
Packing Group
Special Instructions

SECTION 15 – REGULATORY INFORMATION

U.S. State Regulations

California Proposition 65 - This product contains the following Proposition 65 chemicals:
None

Canada

This product has been classified according to the hazard criteria of the CPR and the MSDS contains all of the information required by the CPR.

WHMIS Hazard class: Not controlled

SECTION 16 – OTHER INFORMATION

MSDS Status: replaces Rev. 05-JUN-2007

This material is sold for research and development purposes only. It is not for any human or animal therapeutic or clinical diagnostic use. It is not intended for food, drug, household, agricultural, or cosmetic use. An individual technically qualified to handle potentially hazardous chemicals must supervise the use of this material.

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 be present unknown hazards and should be used with caution. Since Quanta BioSciences 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 MSDS DOES NOT CONSTITUTE A WARRANTY, EXPRESS OR IMPLIED, INCLUDING ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE.