

## Safety Data Sheet

In accordance with Regulation (EU) 2020/878

Effective date: 04.07.2023 version 3

1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND OF THE COMPANY/UNDERTAKING		
Product name	6x DNA Loading Dye Buffer Blue	
Catalog number	07-01-0000S, 07-01-00001, 07-01-00010	
REACH registration number	Not applicable	
ECHA registration number (EC-No)	Not applicable	
Unique formula identifire (UFI) code	Not applicable	
Recommended use of the chemical and uses advised against	This product is for Research Use Only. Not for consumer use.	
Manufacturer/Supplier	Solis BioDyne OÜ Teaduspargi 9, 50411 Tartu, Estonia info@solisbiodyne.com Tel. +372 740 9960, Fax. +372 740 2079	
Information in case of emergency	Solis BioDyne Tel. +372 740 9960 EU Emergency Service Tel 112 Estonian Poison Center +372 794 3794	

2. HAZARDS IDENTIFICATION		
Classificaton of the substance or mixture	Classification according to Regulation (EC) No 1272/2008	
Physical hazards	Not hazardous	
Health hazards	Not hazardous	
Environmental hazards	Not hazardous	
Explosion hazards	Not hazardous	
Additional hazards	This mixture does not contain any substances that are assessed to be a PBT or a vPvB The mixture does not contain any nanoforms	
Label elements	Labelling according to Regulation (EC) No 1272/2008 [CLP]	
Pictograms	None	
Signal word	None	
Hazard statements	Not applicable	
EU Specific Hazard Statements	Not applicable	
Precautionary Statements		
Prevention	Not applicable	
Response	Not applicable	
Storage	Routine storage at -28°C to -18°C until the end of shelf-life (Expiry Date marking on the package). Keep/store only in original/labeled container. Transport conditions in section 14	
Disposal	Prevent product from entering drains. Do not allow material to contaminate ground water system	
Other Hazards	No endocrine disruptors information is available	

## 3. COMPOSITION/ INFORMATION ON INGREDIENTS

3.1 Substances

Hazardous/Non-hazardous Components:

3.2 Mixtures

Hazardous/Non-hazardous Components:

Component CAS-No. EC-No		REACH reg No	Conc % (w/w)	Classification according to Regulation (EC) No 1272/2008 (CLP)			
	EC-No.			Pictogram, signal word code (s)	Hazard class and category code (s)	Hazard statement code (s)	
H₂O	7732-18-5	231-791-2	-	<75	-	-	-
Ficoll	26873-85-8	N/A	-	<25	-	-	-
Tris-HCl	77-86-1	201-064-4	-	<1	-	-	-
EDTA	6381-92-6	205-358-3	-	<1	-	-	-
Bromophenol blue	34725-61-6	252-170-2	-	<0.1	-	-	-

The product contains no substances which at their given concentration, are considered to be hazardous to health. We recommend handling all chemicals with caution.

There are no additional ingredients (incl nanoforms) present which, within the current knowledge of the supplier and in the concentrations applicable, are classified as hazardous to health or the environment.

4. FIRST-AID MEASURES	
Skin contact	Wash off with plenty of water. Immediate medical attention is not required.
Eye contact	Rinse opened eye immediately with plenty of water. Remove contact lenses if present. If irritation persists, get medical attention.
Inhalation	Move to fresh air. Consult a physician if necessary.
Ingestion	Clean mouth with water and drink afterwards plenty of water. Consult a physician if necessary.
Most important symptoms and effects, both acute and delayed	No information available
Indication of any immediate medical attention and special treatment needed	None
Notes to physician	Treat symptomatically

5. FIRE-FIGHTING MEASURES	
Suitable extinguishing media	Dry chemical, CO <sub>2</sub> , water spary or alcohol resistant foam.
Unsuitable extinguishing media	No information available
Fire/Explosion hazards	Not applicable
Protective equipment and precautions for fire-fighters	Wear self-contained breathing apparatus and protective clothing to prevent contact with skin and eyes

6. ACCIDENTAL RELEASE MEASURES		
Personal precautions	Use personal protective equipment. Ensure adequate ventilation, especially in confined areas.	
Personal protective equipment	Use personal protection recommended in Section 8.	
Environmental precautions	Do not allow to enter surface/ sewers or ground water. Prevent further leakage or spillage if safe to do so. See section 12 for additional information.	
Methods and material for containment and cleaning up	Soak up with inert absorbent material	

7. HANDLING AND STORAGE	
Precautions for safe handling	Handle in accordance with good industrial hygiene and safety practice. Use personal protective equipment

Conditions for safe storage, including any incompatibilities	Store at -20°C. Keep/store only in original container. Transport conditions in section 14
Specific uses	For Research Use Only

8. EXPOSURE CONTROLS/PERSONAL PROTECTION			
Exposure Limits	Contains no substances with occupational exposure limit values.		
Engineering measures	Showers. Eyewash stations. Ensure adequate ventilation.		
Personal protective equipment:			
Respiratory protection	Not required. Use in well ventilated areas.		
Skin and body protection	Wear suitable protective clothing and gloves		
Eye and face protection	Wear safety glasses with side shields (or goggles)		
Protection of hands	Check protective gloves prior to each use for their proper condition.  Material of gloves: Nitrile rubber, NBP		
Hygiene measures	Handle in accordance with good industrial hygiene and safety practice		
Environmental exposure controls	Prevent product from entering drains. Do not allow material to contaminate ground water system		

9. PHYSICAL AND CHEMICAL PROPERTIES			
Physical state	Slightly viscous liquid		
Colour	Blue		
Odour	Not defined		
pH value	7.0-9.0. Contact info@solisbiodyne.com for specific information		
Melting/freezing point	No data available		
Boiling point/ boiling range	No data available		
Flammability	No data available		
Lower and upper explosion limit	No data available		
Flash point	No data available		
Autoignition temperature	No data available		
Decomposition temperature	No data available		
Kinematic viscosity	No data available		
Solubility	No data available		
Partition coefficient n-octanol/water	No data available		
Vapor pressure	No data available		
Density and/or relative density	No data available		
Relative vapor density	No data available		
Decomposition temperature	No data available		
Particle characteristics	No data available		
Information with regard to physical hazard classes	Not hazardous		
Other safety characteristics	No information available		

10. STABILITY AND REACTIVITY		
Reactivity	No data available	
Chemical stability	Stable under normal conditions	
Possibility of hazardous reactions	Hazardous reaction has not been reported	
Conditions to avoid	No information available	
Incompatible materials	Strong oxidizing agents, acids and alkali	
Hazardous decomposition products	No data available	

## 11. TOXICOLOGICAL INFORMATION

Acute toxicicity	There is no evidence available indicating acute toxicity
Skin corrosion/irritation	May cause skin irritation
Serious eye damage/irritation	May cause eye irritation
Sensitization:	
Respiratory	Material may be irritating to mucous membranes and upper respiratory tract
Skin	Prolonged or repeated exposure may cause allergic reactions in certain sensitive individuals
Germ cell mutagenicity	No data available
Carcinogenicity	No data available
Reproductive toxicicity	No data available
STOT-single exposure	No data available
STOT-repeated exposure	No data available
Aspiration hazard	No data available
Endocrine disrupting properties	No data available
Information on other hazards	No data available

12. ECOLOGICAL INFORMATION		
Marine pollutant	No data available	
Ecotoxicity	No data available. Prevent product from entering drains. Do not allow material to contaminate ground water system.	
Mobility	No data available	
Persistence and degradability	No data available	
Bioaccumulation	No data available	
Endocrine disrupting properties	No data available	
Othe adverse effects	No data available	

13. DISPOSAL CONSIDERATIONS		
Waste handling and disposal	The generation of waste should be avoided or minimized wherever possible. Disposal of this product, its solutions or of any by-products, shall comply with the requirements of all applicable local, regional or national/federal regulations.	
Information regarding the disposal of the packaging	Empty containers or liners may retain some product residues. This material and its container must be disposed of in according to approved disposal technique	
Physical/chemical properties that may affect waste treatment options shall be specified	No special	
Sewage disposal	Do not empty into drains. Do not dispose of waste into sewer	
Special precautions for any recommended waste treatment	Consider local regulations and safe disposal procedures	

14. TRANSPORT INFORMATION	N .
UN number:	
UN proper shipping name	Not applicable
Transport hazard class (es):	
Packing group	Not applicable
Environmental hazards	Not hazardous goods
Special precautions for user	Handle in accordance with good industrial hygiene and safety practice
Land transport ADR/RID (cross-bo	order):
ADR/RID class	Not regulated
Air transport ICAO-TI and IATA-D	GR:

ICAO/IATA class	Not regulated
Additional information	This substance is considered to be non-hazardous for transport
Transport conditions	Transport at ambient temperature Routine storage after transport -28°C to -18°C
Maritime transport in bulk according to IMO instruments	Not regulated

15. REGULATORY INFORMATION		
Safety, health and environmetal regulations/legislation specific for the product	Safety, health and environmental regulations/legislation specific for the substance or mixture	None
	Substances of Very High Concern. EU - REACH (1907/2006) - Article 59(1) - Candidate List of Substances for Eventual Inclusion in Annex XIV	None
	Substance subject to authorisation per REACH Annex XIV	None
	Restricted substances under EC 1907/2006, Annex XVII	None
	Regulation (EC) No 649/2012 (Rotterdam Convention - export/import of dangerous chemicals)	None
	Regulation(EU)No2019/1021 (Stockholm Convention persistent organic pollutants)	None
	EU - Substances Depleting the Ozone layer (1005/2009)	None
	German Water hazard classes (Wassergefährdungsklassen)	None
Components of animal origin	Regulation (EC) No 1069/2009 of the European Parliament and of the Council of 21 October 2009 laying down health rules as regards animal by-products and derived products not intended for human consumption and repealing Regulation (EC) No 1774/2002 (Animal by-products Regulation)	None
Chemical safety assessment	No Chemical safety assessment has been carried out	

16. OTHER INFORMATION		
Prepared by	Solis BioDyne / Technology specialist	
Reason for revision	Revised according (EU) 2020/878 amending Annex II to Regulation (EC) No 1907/2006 (REACH)	
Revision number	3	
Revision date	04.07.2023	
SDS is valid 3 years from r	revision date. Contact info@solisbiodyne.com for latest revision.	
Last changes	Added UFI, endocrine disruptors and nanforms information and formal changes in all sections except 4, 5, 6 and 10.	
This safety data sheet com	oplies with the requirements of Regulation (EC) No. 1907/2006 and (EU) 2020/878	

amending Annex II to Regulation (EC) No 1907/2006

IMPORTANT: The information in this SDS is provided in good faith based on our knowledge as of the issue date (or subsequent revision date, if any), and is to be used only as a guide. This SDS does not constitute a guarantee (express or implied) of any kind and we make no warranties or merchantability or fitness for a particular purpose. This information relates only to the designated product as shipped and may not be valid if the product is used in combination with any other materials or is not used in accordance with our instructions. It is the responsibility of the buyer/user to ensure that its activities comply with all applicable governmental requirements. Since conditions of use of the product are not under the control of Solis BioDyne it is the duty of the buyer/user to determine the necessary conditions for the safe use of the product. Solis BioDyne will not be liable for any damages resulting from handling or contact with the product.

ADR/RID - Road Transport of Dangerous Material/International Carriage of Dangerous Goods by Rail.

AGW - Time-weighted Average Concentration

EC - European Commission

CLP - Classification, Labelling and Packaging

IATA-DGR – International Air Transport Association-Dangerous Goods Regulations

ICAO-TI – International Civil Aviation Organization-Technical Instructions

IMO - International Maritime Organization

LD - Lethal Dose

NBP - N-Butyl-2-pyrrolidone

OEL – Occupational Exposure Limits

PBT - Persistent Bioaccumulative Toxic

PEL – Permissible Exposure Limits

STEL - Short Term Exposure Limit

STOT - Specific target organ toxicity

TLV - Threshold Limit Value

TWA - Time-Weighted Average

