Safety Data Sheet

according to the REACH Regulation (EC) 1907/2006 amended by Regulation (EU) 2020/878

Reference number: 04160

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SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier

Product form Substance

Trade name **IMIDAZOLE EXTRA PURE**

EC Index-No. 613-319-00-0 EC-No. 206-019-2 CAS-No. 288-32-4 Product code B-01428

Type of product Heterocyclic organic compound

Formula C3H4N2

Chemical structure



Synonyms : Glyoxaline, 1,3-Diazole, 1H-Imidazole

1.2. Relevant identified uses of the substance or mixture and uses advised against

1.2.1 Relevant identified uses

Use of the substance/mixture : Industrial; For professional use only

Use of the substance/mixture : Laboratory chemicals

Manufacture of substances

1.2.2. Uses advised against

No additional information available

1.3. Details of the supplier of the safety data sheet

Bio-Chem Chemicals

5455, Nicholson Road Science Market, Ambala Cantt. 133001 Haryana (India)

+91-82952 41953

info@biofinechemical.com - www.biofinechemical.com

1.4. Emergency telephone number

: +91 99921 51495 (10.00am - 06.30pm) (Office Hours) Emergency number

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification according to Regulation (EC) No. 1272/2008 [CLP]

Acute toxicity (oral), Category 4 H302 Skin corrosion/irritation, Category 1, Sub-Category 1C H314 Reproductive toxicity, Category 1B H360D

Full text of H- and EUH-statements: see section 16

Adverse physicochemical, human health and environmental effects

May damage fertility or the unborn child. Harmful if swallowed. Causes severe skin burns and eye damage.

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2.2. Label elements

Labelling according to Regulation (EC) No. 1272/2008 [CLP]

Hazard pictograms (CLP)



Signal word (CLP) : Danger

Hazard statements (CLP) : H302 - Harmful if swallowed.

H314 - Causes severe skin burns and eye damage.

H360D - May damage the unborn child.

Precautionary statements (CLP) : P201 - Obtain special instructions before use.

P260 - Do not breathe dust/fume/gas/mist/vapours/spray.

P280 - Wear protective clothing, eye protection, face protection, protective gloves. P301+P312 - IF SWALLOWED: Call a POISON CENTRE or doctor if you feel unwell. P303+P361+P353 - IF ON SKIN (or hair): Take off immediately all contaminated clothing.

Rinse skin with water .

P305+P351+P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove

contact lenses, if present and easy to do. Continue rinsing.

Nordic countries regulation

Denmark

MAL code : 00-3 (Executive Order No. 301 from 1993)

2.3. Other hazards

Contains no PBT and/or vPvB substances ≥ 0.1% assessed in accordance with REACH Annex XIII

SECTION 3: Composition/information on ingredients

3.1. Substances

Substance type : Mono-constituent

Name	Product identifier	%
IMIDAZOLE	CAS-No.: 288-32-4 EC-No.: 206-019-2 EC Index-No.: 613-319-00-0	100

3.2. Mixtures

Not applicable

SECTION 4: First aid measures

4.1. Description of first aid measures

First-aid measures general : Call a physician immediately.

First-aid measures after inhalation : Remove person to fresh air and keep comfortable for breathing. Remove person to fresh air

and keep comfortable for breathing. Immediately call a POISON CENTER/doctor. : Take off immediately all contaminated clothing, Immediately call a POISON

First-aid measures after skin contact

CENTER/doctor, Rinse skin with water/shower, Call a physician immediately,

First-aid measures after eye contact : Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy

to do. Continue rinsing. Immediately call a POISON CENTER/doctor, Call a physician

: Rinse mouth. Call a POISON CENTER/doctor if you feel unwell. Do NOT induce vomiting. First-aid measures after ingestion

Immediately call a POISON CENTER/doctor. Do not induce vomiting. Call a physician

immediately.

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4.2. Most important symptoms and effects, both acute and delayed

Symptoms/effects : Causes severe skin burns and eye damage.

Symptoms/effects after inhalation : Dust of the product, if present, may cause respiratory irritation after an excessive inhalation

exposure. Although no appropriate human or animal health effects data are known to exist.

this material is expected to be an inhalation hazard.

Symptoms/effects after skin contact : Burns

Symptoms/effects after eye contact : Serious damage to eyes.

Symptoms/effects after ingestion : Swallowing a small quantity of this material will result in serious health hazard. Burns.

4.3. Indication of any immediate medical attention and special treatment needed

Treat symptomatically.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media : Water spray. Foam. Dry powder. Carbon dioxide.

Unsuitable extinguishing media : Do not use a heavy water stream.

5.2. Special hazards arising from the substance or mixture

Fire hazard : No fire hazard.

Explosion hazard : No direct explosion hazard.

Hazardous decomposition products in case of fire : Toxic fumes may be released.

5.3. Advice for firefighters

Firefighting instructions : Fight fire from safe distance and protected location. Do not enter fire area without proper

protective equipment, including respiratory protection.

Protection during firefighting : Use self-contained breathing apparatus and chemically protective clothing. Do not attempt

to take action without suitable protective equipment. Self-contained breathing apparatus.

Complete protective clothing.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

General measures : Notify authorities if product enters sewers or public waters. Absorb spillage to prevent

material damage.

6.1.1. For non-emergency personnel

Protective equipment : Wear recommended personal protective equipment.

Emergency procedures : Evacuate unnecessary personnel. Only qualified personnel equipped with suitable

protective equipment may intervene. Do not breathe dust/fume/gas/mist/vapours/spray.

6.1.2. For emergency responders

Protective equipment : Do not attempt to take action without suitable protective equipment. Use personal protective

equipment as required. For further information refer to section 8: "Exposure

controls/personal protection".

Emergency procedures : Ventilate area. Evacuate unnecessary personnel.

6.2. Environmental precautions

Avoid release to the environment. Notify authorities if product enters sewers or public waters.

6.3. Methods and material for containment and cleaning up

For containment : Using a clean shovel, put the material in a dry container and cover without compressing it.

Methods for cleaning up : Mechanically recover the product. Large spills: scoop solid spill into closing containers.

Notify authorities if product enters sewers or public waters.

Other information : Dispose of materials or solid residues at an authorized site.

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6.4. Reference to other sections

For further information refer to section 13.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Additional hazards when processed

: Not expected to present a significant hazard under anticipated conditions of normal use.

Precautions for safe handling : Ensure good ventilation of the work station. Do not breathe

dust/fume/gas/mist/vapours/spray. Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Wear personal protective

equipment. Avoid contact with skin and eyes.

Hygiene measures : Do not eat, drink or smoke when using this product. Wash hands, forearms and face

thoroughly after handling. Wash contaminated clothing before reuse. Separate working clothes from town clothes. Launder separately. Always wash hands after handling the

product.

7.2. Conditions for safe storage, including any incompatibilities

Technical measures : Comply with applicable regulations.

Storage conditions : Keep container tightly closed. Store in a well-ventilated place. Keep cool. Store locked up.

Packaging materials : Store always product in container of same material as original container.

7.3. Specific end use(s)

No additional information available

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

8.1.1 National occupational exposure and biological limit values

No additional information available

8.1.2. Recommended monitoring procedures

No additional information available

8.1.3. Air contaminants formed

No additional information available

8.1.4. DNEL and PNEC

No additional information available

8.1.5. Control banding

No additional information available

8.2. Exposure controls

8.2.1. Appropriate engineering controls

Appropriate engineering controls:

Ensure good ventilation of the work station.

8.2.2. Personal protection equipment

Personal protective equipment:

Wear recommended personal protective equipment.

Personal protective equipment symbol(s):







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8.2.2.1. Eye and face protection

Eye protection:

Chemical goggles or safety glasses

8.2.2.2. Skin protection

Skin and body protection:

Wear a mask

Hand protection:

Protective gloves

8.2.2.3. Respiratory protection

Respiratory protection:

Wear appropriate mask

8,2,2,4. Thermal hazards

No additional information available

8,2,3, Environmental exposure controls

Environmental exposure controls:

Avoid release to the environment.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state

: White to off white. Colour

Appearance Crystalline powder or crystals, Flakes, Molecular mass 68.08 g/mol

Odour amine like. Odour threshold Not available Melting point : 88 - 90 °C Freezing point : Not applicable Boiling point : 256 °C Flammability : Non flammable. Lower explosion limit : Not applicable Upper explosion limit : Not applicable : 145 °C Flash point : Not applicable Auto-ignition temperature Decomposition temperature : Not available : 9.5 - 11 pН

pH solution concentration : 5 % Viscosity, kinematic : Not applicable

Viscosity, dynamic : 2.696 mPa s at 100 °C

Solubility : Water: 663 g/l at 20 °C - Soluble in water Ethanol: Soluble

Ether: Soluble Acetone: Soluble : Not available

Partition coefficient n-octanol/water (Log Pow) : 0.02

Partition coefficient n-octanol/water (Log Kow)

: 0.003 hPa at 20 °C Vapour pressure

Vapour pressure at 50°C : Not available Density : 1.03 g/cm³ Relative density : Not available : 2.35 (Air = 1) Relative vapour density at 20°C Particle size : Not available

9.2. Other information

9.2.1. Information with regard to physical hazard classes

No additional information available

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9.2.2. Other safety characteristics

No additional information available

SECTION 10: Stability and reactivity

10.1. Reactivity

Thermal decomposition generates: Corrosive vapours.

10.2. Chemical stability

Stable under normal conditions.

10.3. Possibility of hazardous reactions

No dangerous reactions known under normal conditions of use.

10.4. Conditions to avoid

Direct sunlight. Overheating.

10.5. Incompatible materials

No additional information available

10.6. Hazardous decomposition products

Thermal decomposition generates: Corrosive vapours.

SECTION 11: Toxicological information

11.1. Information on hazard classes as defined in Regulation (EC) No 1272/2008

Acute toxicity (oral) : Harmful if swallowed. Acute toxicity (dermal) : Not classified Acute toxicity (inhalation) : Not classified

Skin corrosion/irritation : Causes severe skin burns.

pH: 9.5 - 11

Serious eye damage/irritation : Assumed to cause serious eye damage

> pH: 9.5 - 11 : Not classified

Respiratory or skin sensitisation Germ cell mutagenicity : Not classified Carcinogenicity : Not classified

Reproductive toxicity : May damage the unborn child.

STOT-single exposure : Not classified STOT-repeated exposure : Not classified Aspiration hazard Not classified

IMIDAZOLE EXTRA PURE (288-32-4)

Not applicable Viscosity, kinematic

11.2. Information on other hazards

11.2.1. Endocrine disrupting properties

No additional information available

11,2,2, Other information

Potential adverse human health effects and

symptoms

: Harmful if swallowed.

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SECTION 12: Ecological information

12.1. Toxicity

Ecology - general : Before neutralisation, the product may represent a danger to aquatic organisms.

Hazardous to the aquatic environment, short-term

(acute)

Hazardous to the aquatic environment, long-term

(chronic)

: Not classified

: Not classified

12.2. Persistence and degradability

IMIDAZOLE EXTRA PURE (288-32-4)	
Persistence and degradability	Rapidly degradable

12.3. Bioaccumulative potential

No additional information available

12.4. Mobility in soil

No additional information available

12.5. Results of PBT and vPvB assessment

No additional information available

12.6. Endocrine disrupting properties

No additional information available

12.7. Other adverse effects

No additional information available

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Regional waste regulation : Disposal must be done according to official regulations.

Waste treatment methods : Dispose of contents/container in accordance with licensed collector's sorting instructions.

Sewage disposal recommendations : Disposal must be done according to official regulations.

Product/Packaging disposal recommendations : Dispose of contents/container to hazardous or special waste collection point, in accordance

with local, regional, national and/or international regulation. Disposal must be done

according to official regulations.

Additional information : Do not re-use empty containers.

SECTION 14: Transport information

In accordance with ADR / IMDG / IATA / ADN / RID

14.1. UN number or ID number

 UN-No. (ADR)
 : UN 3263

 UN-No. (IMDG)
 : UN 3263

 UN-No. (IATA)
 : UN 3263

 UN-No. (ADN)
 : UN 3263

 UN-No. (RID)
 : UN 3263

14.2. UN proper shipping name

Proper Shipping Name (ADR) : CORROSIVE SOLID, BASIC, ORGANIC, N.O.S. Proper Shipping Name (IMDG) : CORROSIVE SOLID, BASIC, ORGANIC, N.O.S.

Proper Shipping Name (IATA) : Corrosive solid, basic, organic, n.o.s.

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Proper Shipping Name (ADN) : CORROSIVE SOLID, BASIC, ORGANIC, N.O.S. Proper Shipping Name (RID) : CORROSIVE SOLID, BASIC, ORGANIC, N.O.S.

Transport document description (ADR) : UN 3263 CORROSIVE SOLID, BASIC, ORGANIC, N.O.S. (IMIDAZOLE), 8, II, (E)

Transport document description (IMDG)

: UN 3263 CORROSIVE SOLID, BASIC, ORGANIC, N.O.S., 8, II

Transport document description (IATA)

: UN 3263 Corrosive solid, basic, organic, n.o.s. (IMIDAZOLE), 8, II

Transport document description (ADN)

: UN 3263 CORROSIVE SOLID, BASIC, ORGANIC, N.O.S., 8, II

Transport document description (RID)

: UN 3263 CORROSIVE SOLID, BASIC, ORGANIC, N.O.S., 8, II

14.3. Transport hazard class(es)

ADR

Transport hazard class(es) (ADR) : 8
Danger labels (ADR) : 8



IMDG

Transport hazard class(es) (IMDG) : 8
Danger labels (IMDG) : 8



IATA

Transport hazard class(es) (IATA) : 8
Danger labels (IATA) : 8



ADN

Transport hazard class(es) (ADN) : 8
Danger labels (ADN) : 8



RID

Transport hazard class(es) (RID) : 8
Danger labels (RID) : 8



14.4. Packing group

Packing group (ADR) : II
Packing group (IMDG) : II
Packing group (IATA) : II
Packing group (ADN) : II
Packing group (RID) : II

14.5. Environmental hazards

Dangerous for the environment : No

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Marine pollutant : No

Other information : No supplementary information available

14.6. Special precautions for user

Overland transport

Classification code (ADR) : C8
Special provisions (ADR) : 274
Limited quantities (ADR) : 1kg
Excepted quantities (ADR) : E2

Packing instructions (ADR) : P002, IBC08

Special packing provisions (ADR) : B4
Mixed packing provisions (ADR) : MP10
Portable tank and bulk container instructions (ADR) : T3
Portable tank and bulk container special provisions : TP33

(ADR)

Tank code (ADR) : SGAN, L4BN

Vehicle for tank carriage : AT
Transport category (ADR) : 2
Special provisions for carriage - Packages (ADR) : V11
Hazard identification number (Kemler No.) : 80

Orange plates

80 3263

Tunnel restriction code (ADR) : E EAC code : 2X

Transport by sea

: 274 Special provisions (IMDG) Limited quantities (IMDG) : 1 kg Excepted quantities (IMDG) : E2 : P002 Packing instructions (IMDG) IBC packing instructions (IMDG) : IBC08 : B21, B4 IBC special provisions (IMDG) : T3 Tank instructions (IMDG) Tank special provisions (IMDG) : TP33 EmS-No. (Fire) F-A EmS-No. (Spillage) S-B Stowage category (IMDG) В

Segregation (IMDG) : SGG18, SG35

Properties and observations (IMDG) : Reacts violently with acids. Causes burns to skin, eyes and mucous membranes.

MFAG-No : 154

Air transport

: E2 PCA Excepted quantities (IATA) PCA Limited quantities (IATA) Y844 : 5kg PCA limited quantity max net quantity (IATA) PCA packing instructions (IATA) : 859 : 15kg PCA max net quantity (IATA) CAO packing instructions (IATA) : 863 : 50kg CAO max net quantity (IATA) Special provisions (IATA) : A3. A803 ERG code (IATA) : 8L

Inland waterway transport

Classification code (ADN) : C8
Special provisions (ADN) : 274
Limited quantities (ADN) : 1 kg
Excepted quantities (ADN) : E2
Equipment required (ADN) : PP, EP
Number of blue cones/lights (ADN) : 0

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Rail transport

Classification code (RID): C8Special provisions (RID): 274Limited quantities (RID): 1kgExcepted quantities (RID): E2

Packing instructions (RID) : P002, IBC08

Special packing provisions (RID) : B4
Mixed packing provisions (RID) : MP10
Portable tank and bulk container instructions (RID) : T3
Portable tank and bulk container special provisions : TP33

(RID)

Tank codes for RID tanks (RID) : SGAN, L4BN

Transport category (RID) : 2
Special provisions for carriage – Packages (RID) : W11
Colis express (express parcels) (RID) : CE10
Hazard identification number (RID) : 80

14.7. Maritime transport in bulk according to IMO instruments

Not applicable

SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture

15.1.1. EU-Regulations

REACH Annex XVII (Restriction List)

EU restriction list (REACH Annex XVII)		
Reference code	Applicable on	
30.	IMIDAZOLE EXTRA PURE	

REACH Annex XIV (Authorisation List)

Not listed on REACH Annex XIV (Authorisation List)

REACH Candidate List (SVHC)

Not listed on the REACH Candidate List

PIC Regulation (Prior Informed Consent)

Not listed on the PIC list (Regulation EU 649/2012)

POP Regulation (Persistent Organic Pollutants)

Not listed on the POP list (Regulation EU 2019/1021)

Ozone Regulation (1005/2009)

Not listed on the Ozone Depletion list (Regulation EU 1005/2009)

Dual-Use Regulation (428/2009)

Contains no substance subject to the COUNCIL REGULATION (EC) No 428/2009 of 5 May 2009 setting up a Community regime for the control of exports, transfer, brokering and transit of dual-use items.

Explosives Precursors Regulation (2019/1148)

Contains no substance(s) listed on the Explosives Precursors list (Regulation EU 2019/1148 on the marketing and use of explosives precursors)

Drug Precursors Regulation (273/2004)

Contains no substance(s) listed on the Drug Precursors list (Regulation EC 273/2004 on the manufacture and the placing on market of certain substances used in the illicit manufacture of narcotic drugs and psychotropic substances)

15.1.2. National regulations

Germany

Water hazard class (WGK) : WGK 2, Significantly hazardous to water (Classification according to AwSV; ID No. 1448).

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Chemicals Prohibition Ordinance (ChemVerbotsV) : This product is subject to ChemVerbotsV Annex 2 Entry 1. The following requirements must

be observed: authorization requirement (according to § 6 paragraph 1 sentence 1), basic requirements for carrying out the delivery (according to § 8 paragraph 1, 3 and 4), identification and documentation (according to § 9 paragraph 1 to 3) and exclusion of the

shipping route (according to § 10).

Hazardous Incident Ordinance (12. BlmSchV) : Is not subject to the Hazardous Incident Ordinance (12. BlmSchV)

Netherlands

SZW-lijst van kankerverwekkende stoffen : The substance is not listed SZW-lijst van mutagene stoffen : The substance is not listed SZW-lijst van reprotoxische stoffen – Borstvoeding : The substance is not listed SZW-lijst van reprotoxische stoffen – : The substance is not listed

Vruchtbaarheid

SZW-lijst van reprotoxische stoffen - Ontwikkeling : IMIDAZOLE is listed

Denmark

MAL code : 00-3 (Executive Order No. 301 from 1993)

Danish National Regulations : Young people below the age of 18 years are not allowed to use the product

Pregnant/breastfeeding women working with the product must not be in direct contact with

the product

15.2. Chemical safety assessment

No chemical safety assessment has been carried out

SECTION 16: Other information

Abbreviations and acronyms:		
ADN	European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways	
ADR	European Agreement concerning the International Carriage of Dangerous Goods by Road	
ATE	Acute Toxicity Estimate	
BCF	Bioconcentration factor	
BLV	Biological limit value	
BOD	Biochemical oxygen demand (BOD)	
COD	Chemical oxygen demand (COD)	
DMEL	Derived Minimal Effect level	
DNEL	Derived-No Effect Level	
EC-No.	European Community number	
EC50	Median effective concentration	
EN	European Standard	
IARC	International Agency for Research on Cancer	
IATA	International Air Transport Association	
IMDG	International Maritime Dangerous Goods	
LC50	Median lethal concentration	
LD50	Median lethal dose	
LOAEL	Lowest Observed Adverse Effect Level	
NOAEC	No-Observed Adverse Effect Concentration	
NOAEL	No-Observed Adverse Effect Level	
NOEC	No-Observed Effect Concentration	
OECD	Organisation for Economic Co-operation and Development	

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Abbreviations and acronyms:		
OEL	Occupational Exposure Limit	
PBT	Persistent Bioaccumulative Toxic	
PNEC	Predicted No-Effect Concentration	
RID	Regulations concerning the International Carriage of Dangerous Goods by Rail	
SDS	Safety Data Sheet	
STP	Sewage treatment plant	
ThOD	Theoretical oxygen demand (ThOD)	
TLM	Median Tolerance Limit	
voc	Volatile Organic Compounds	
CAS-No.	Chemical Abstract Service number	
N.O.S.	Not Otherwise Specified	
vPvB	Very Persistent and Very Bioaccumulative	
ED	Endocrine disrupting properties	

Full text of H- and EUH-statements:		
Acute Tox. 4 (Oral)	Acute toxicity (oral), Category 4	
H302	Harmful if swallowed.	
H314	Causes severe skin burns and eye damage.	
H360D	May damage the unborn child.	
Repr. 1B	Reproductive toxicity, Category 1B	
Skin Corr. 1C	Skin corrosion/irritation, Category 1, Sub-Category 1C	

Safety Data Sheet (SDS), EU

This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product.