NEOCOL BC – BLACK MAGNETIC INK CONCENTRATE – HYDROCARBON BASED

According to REACH Regulation (EC) No 1907/2006, as amended by UK REACH Regulations SI 2019/758 and SI 2020/1577

SECTION 1: IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1 Product identifier

Product Name	NEOCOL BC – BLACK MAGNETIC INK CONCENTRATE – HYDROCARBON BASED

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

Identified Use(s)	For use in the Magnetic Particle Inspection Process (BS EN ISO 9934 – 2 – 2002). Dilution Rate 50:1 with a suitable hydrocarbon carrier.
Uses Advised Against	Not known.

1.3 Details of the supplier of the safety data sheet

Company Identification	Johnson and Allen Ltd
Address of Supplier	Neocol Works Smithfield Sheffield
Postal code	S3 7AR
Telephone	0114 2738066
Fax	0114 2729842
E-mail	info@johnsonandallen.co.uk
Office hours	08:30 - 17:00

1.4 Emergency telephone number

Company	0114 2738066 (UK office hours 08.30-17.00)

SECTION 2: HAZARDS IDENTIFICATION

2.1 Classification of the substance or mixture

GB CLP Regulation, UK SI 2019/720 and UK SI 2020/1567	Not classified as dangerous for supply/use.

2.2 Label elements

	According to GB CLP Regulations, UK SI 2019/720 and UK SI 2020/1567
Product Name	NEOCOL BC – BLACK MAGNETIC INK CONCENTRATE – HYDROCARBON BASED
Hazard Pictogram(s)	None.
Signal Word(s)	None.
Hazard Statement(s)	None.
Precautionary Statement(s)	None.

2.3 Other hazards

None known.

2.4 Additional Information

None.

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SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

3.1 Substances

Not applicable.

3.2 Mixtures

HAZARDOUS INGREDIENT(S)	CAS No.	EC No. / Registration number(s)	%W/W	Hazard Statement(s)	Hazard Pictogram(s)
Triiron tetraoxide	1317-61-9	215-277-5	>75	Not classified	None
White mineral oil (petroleum)	8042-47-5	232-455-8	>15	Not classified	None
Lanolin	8006-54-0	232-348-6	<5	Not classified	None

SECTION 4: FIRST AID MEASURES

4.1 Description of first aid measures

Inhalation	If breathing is difficult, remove victim to fresh air and keep at rest in a position comfortable for breathing. If symptoms persist, obtain medical attention.
Skin Contact	Wash with plenty of soap and water. If symptoms develop, obtain medical attention.
Eye Contact	Flush eyes with water for at least 15 minutes while holding eyelids open. If symptoms persist, obtain medical attention.
Ingestion	Wash out mouth with water. Do not induce vomiting.

4.2 Most important symptoms and effects, both acute and delayed

None anticipated.

4.3 Indication of any immediate medical attention and special treatment needed

Unlikely to be required but if necessary treat symptomatically.

SECTION 5: FIREFIGHTING MEASURES

5.1 Extinguishing media

Suitable Extinguishing media	Extinguish with dry chemical or foam.
Unsuitable extinguishing media	Water jet spray.

5.2 Special hazards arising from the substance or mixture

Decomposes in a fire giving off toxic fumes: Carbon monoxide, Carbon dioxide.

5.3 Advice for firefighters

Fire fighters should wear complete protective clothing including self-contained breathing apparatus. Keep containers cool by spraying with water if exposed to fire.

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, protective equipment and emergency procedures

Caution - spillages may be slippery. Ensure adequate ventilation. Wash hands thoroughly after handling.

6.2 Environmental precautions

Do not release large quantities into the surface water or into drains.

6.3 Methods and material for containment and cleaning up

Adsorb spillages onto sand, earth or any suitable adsorbent material. Transfer to a container for disposal.

6.4 Reference to other sections

See Also Section 8, 13.

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SECTION 7: HANDLING AND STORAGE

7.1 Precautions for safe handling

Provide adequate ventilation. Wash hands and exposed skin after use.

7.2 Conditions for safe storage, including any incompatibilities

Keep in a cool, well ventilated place.

Storage temperature	Ambient.
Storage life	Stable under normal conditions.
Incompatible materials	Strong oxidising agents.

7.3 Specific end use(s)

For use in the Magnetic Particle Inspection Process (BS EN ISO 9934 – 2 – 2002).
Dilution Rate 50:1 with a suitable hydrocarbon carrier.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 Control parameters

8.1.1 Occupational Exposure Limits

SUBSTANCE	CAS No.	LTEL (8 hr TWA ppm)	LTEL (8 hr TWA mg/m³)	STEL (ppm)	STEL (mg/m³)	Note
						None assigned

Region	Source
United Kingdom	UK Workplace Exposure Limits EH40/2005 (Fourth edition, published 2020)

8.2 Exposure controls

8.2.1. Appropriate engineering controls: Provide adequate ventilation.

8.2.2. Personal protection equipment

Eye Protection: Not normally required.
Wear protective eye glasses for protection against liquid splashes.

Skin protection: Wear suitable gloves if prolonged skin contact is likely.
Breakthrough time of the glove material: refer to the information provided by the gloves' producer.

Respiratory protection: Normally no personal respiratory protection is necessary.
Wear suitable respiratory protective equipment if exposure to high levels of material are likely.

Thermal hazards: Not applicable.

8.2.3. Environmental Exposure Controls: Do not release large quantities into the surface water or into drains.

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SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic physical and chemical properties

Appearance	Liquid.
	Colour : Black (Shaken).
Odour	Paraffinic odour.
Odour threshold	Not known.
pH	Not known.
Melting point/freezing point	>1500°C (Triiron tetraoxide)
Initial boiling point and boiling range	Not known.
Flash Point	>100°C
Evaporation rate	Not known.
Flammability (solid, gas)	Not applicable.
Upper/lower flammability or explosive limits	Not known.
Vapour pressure	Not known.
Vapour density	Not known.
Density (g/ml)	5.17 g/ml (Triiron tetraoxide)
Relative density	Not known.
Solubility(ies)	Solubility (Water) : Insoluble.
	Solubility (Other) : Not known.
Partition coefficient: n-octanol/water	Not known.
Auto-ignition temperature	Not known.
Decomposition Temperature (°C)	Not known.
Viscosity	Not known.
Explosive properties	Not explosive.
Oxidising properties	Not oxidising.

9.2 Other information

None.

SECTION 10: STABILITY AND REACTIVITY

10.1 Reactivity

Stable under normal conditions.

10.2 Chemical Stability

Stable under normal conditions.

10.3 Possibility of hazardous reactions

No hazardous reactions known if used for its intended purpose.

10.4 Conditions to avoid

Heat and direct sunlight.

10.5 Incompatible materials

Strong oxidising agents.

10.6 Hazardous decomposition products

No hazardous decomposition products known.

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SECTION 11: TOXICOLOGICAL INFORMATION

Unlikely to cause harmful effects under normal conditions of handling and use.

11.1 Information on toxicological effects

Acute toxicity - Ingestion	Calculation method : Not classified.
	Low oral toxicity.
	Triiron tetraoxide:
	LD50 (rat) >5000 mg/kg
Acute toxicity - Skin Contact	Calculation method : Not classified.
	Low acute toxicity.
Acute toxicity - Inhalation	Calculation method : Not classified.
	Low acute toxicity.
	Triiron tetraoxide:
	LC50 (rat) >5.05 mg/l
Skin corrosion/irritation	Calculation method : Not classified.
	Non-irritant.
Serious eye damage/irritation	Calculation method : Not classified.
Skin sensitization data	Calculation method : Not classified.
	It is not a skin sensitiser.
Respiratory sensitization data	Calculation method : Not classified.
Germ cell mutagenicity	Calculation method : Not classified.
	There is no evidence of mutagenic potential.
Carcinogenicity	Calculation method : Not classified.
	No evidence of carcinogenicity.
Reproductive toxicity	Calculation method : Not classified.
	No evidence of reproductive effects.
Lactation	Calculation method : Not classified.
STOT - single exposure	Calculation method : Not classified.
STOT - repeated exposure	Calculation method : Not classified.
Aspiration hazard	Calculation method : Not classified.

11.2 Other information

Not known.

SECTION 12: ECOLOGICAL INFORMATION

12.1 Toxicity

	Low toxicity to aquatic organisms.
Toxicity - Fish	Triiron tetraoxide:
	LC50 (96 hour) (Zebra fish): > 10000 mg/L
Toxicity - Aquatic invertebrates	Triiron tetraoxide:
	EC50 (48 hour) (Daphnia magna): > 100 mg/L

12.2 Persistence and degradability

The product is biodegradable. Unlikely to persist.

12.3 Bioaccumulative potential

The product has no potential for bioaccumulation.

12.4 Mobility in soil

Insoluble in water. Floats on water. The product is predicted to have low mobility in soil.

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12.5 Results of PBT and vPvB assessment

Not classified as PBT or vPvB.

12.6 Other adverse effects

None known.

SECTION 13: DISPOSAL CONSIDERATIONS

13.1 Waste treatment methods

Dispose of contents/container to: Licensed recycler. Refer to manufacturer for information on recovery/recycling. Do NOT landfill.

13.2 Additional Information

Disposal should be in accordance with local, state or national legislation.

SECTION 14: TRANSPORT INFORMATION

Not classified as hazardous for transport.

14.1 UN number

Not applicable

14.2 UN proper shipping name

Not applicable

14.3 Transport hazard class(es)

Not applicable

14.4 Packing group

Not applicable

14.5 Environmental hazards

Not classified as a Marine Pollutant.

14.6 Special precautions for user

Not known

14.7 Transport in bulk according to Annex II of Marpol and the IBC Code

Not known

SECTION 15: REGULATORY INFORMATION

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

United Kingdom Regulations - Authorisations and/or Restrictions On Use

UK REACH Candidate List of Substances of Very High Concern for Authorisation	Not listed
UK REACH Authorisation List (Annex XIV) list of substances subject to authorisation	Not listed
UK REACH Restrictions List (Annex XVII) Restrictions on the manufacture, placing on the market and use of certain dangerous substances, mixtures and articles	Not listed
UK REACH Rolling Action Plan (RAP)	Not listed

The Persistent Organic Pollutants Regulations 2007 (SI 2007/3106) as amended	Not listed
The Ozone-Depleting Substances and Fluorinated Greenhouse Gases (Amendment etc.) (EU Exit) Regulations 2019 (SI 2019/583)	Not listed
The Prior Informed Consent (PIC) Regulations concerning the export and import of hazardous chemicals SI2008/2108 as amended	Not listed
European Regulations - Authorisations and/or Restrictions On Use	
Community Rolling Action Plan (CoRAP)	Not listed

15.2 Chemical Safety Assessment

United Kingdom	Not applicable

SECTION 16: OTHER INFORMATION

The following sections contain revisions or new statements: 1-16

LEGEND

Acronyms	ATE : Acute Toxicity Estimate CAS : Chemical Abstracts Service DNEL : Derived No Effect Level EC : European Community EINECS : European Inventory of Existing Commercial Chemical Substances LTEL : Long term exposure limit PBT : Persistent, Bioaccumulative and Toxic PNEC : Predicted No Effect Concentration REACH : Registration, Evaluation, Authorisation and Restriction of Chemicals STEL : Short term exposure limit STOT : Specific Target Organ Toxicity vPvB : very Persistent and very Bioaccumulative
Key literature references and sources for data used to compile the SDS	GB CLP Regulation, UK SI 2019/720 and UK SI 2020/1567
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