

Material Safety Data Sheet	Viscous petroleum road bitumen grade BND 100/130	Total Pages 5 Page 1 Version 1.0
----------------------------	---	--

1. IDENTIFICATION OF CHEMICAL PRODUCTS AND INFORMATION ON THE MANUFACTURER AND / OR SUPPLIER

Technical name	Viscous petroleum road bitumen grade BND 100/130
Brief recommendations for use	It is used as a binder in the construction and repair of road surfaces.
Name of the organization	"Biteh", Limited Liability Company (Bitekh LLC)
Address	115533, Moscow, Nagatinskaya street, house 5, E 5, POM 503
Emergency telephone number	+7(495)215-25-21
Fax	
E-mail	info@bitekh.ru
Web-site	http://bitekh.ru/

2. GHS HAZARD IDENTIFICATION

Classification	The product is not classified according to GHS.
Warning marking	
Signal word	Not applicable.
Hazard symbols	Not applicable.
H-phrases	Not applicable.
P-phrases	Not applicable.

3. COMPOSITION / INFORMATION ON INGREDIENTS

Component (INCI)	Concentration (%)	Number CAS	Number EC
Viscous petroleum road bitumen grade BND 100/130	100	8052-42-4	232-490-9

4. FIRST AID MEASURES

In case of contact with eyes	If hot bitumen gets into the eyes, do not remove it from the eye, seek medical attention immediately. In case of contact with bitumen of normal temperature, rinse eyes with running water.
When exposed to skin	If molten bitumen gets on the skin, immediately cool the skin with water. In case of extensive burns, cover the affected skin area with a sterile bandage and refer to a doctor. In case of contact with solid bitumen of normal temperature, wash with soap and water.
If swallowed	This route of entry into the body is unlikely. If bitumen is swallowed, rinse mouth with water, drink plenty of water. Seek medical attention.
Inhalation	Fresh air, peace, warmth. Seek medical attention if necessary.
Most important symptoms	When inhaling vapors of heated bitumen: headache, dizziness, nausea, sore throat, cough, lacrimation.
Potential Hazardous Effects	If heated bitumen gets into the eyes: redness, pain, burns. When exposed to heated bitumen on the skin: redness, pain, burns. If swallowed – this route of entry is unlikely.

5. FIRE FIGHTING MEASURES

Flammability	Combustible substance.
Thermal degradation products	In the process of combustion and thermal destruction, toxic carbon oxides are formed. Carbon monoxide disrupts the transport and transfer of oxygen to tissues, oxygen deficiency of the body develops. Symptoms of poisoning: headache, dizziness, blurred vision, nausea, vomiting, loss of consciousness. Carbon dioxide in a fire causes increased breathing and increased pulmonary ventilation, has a vasodilating effect. Symptoms of poisoning: increased heart rate, increased blood pressure, migraine pain, headache, dizziness, lethargy, loss of consciousness.
Fire and explosion safety	Flash point in an open crucible > 230 °C; Self-ignition temperature in air > 368 °C; Lower flammability limit: 0.7% vol.; Upper flammability limit: 6% vol.
Extinguishing Methods	Sand, felt, carbon dioxide, foam fire extinguishers. DO NOT use water.
Extinguishing Specificity	Extinguish from a safe distance, taking precautions. Firefighter's combat clothing (jacket and trousers with removable insulating linings) complete with a lifeguard belt, mittens or gloves, a

Material Safety Data Sheet	Viscous petroleum road bitumen grade BND 100/130	Total Pages 5
		Page 2
		Version 1.0

fire helmet, and special protective shoes.

6. MEASURES IN CASE OF ACCIDENTAL RELEASE/LEAKAGE

Individual precautions

Remove strangers. Observe fire safety measures. No smoking. Eliminate sources of fire and sparks. It is necessary to use overalls and personal protective equipment in the accident zone. Provide first aid to the injured.

Environmental precautions

Maximum sealing of containers, communications and other equipment; periodic monitoring of the content of harmful substances in the air of the working area; air purification of industrial premises to established standards before discharge into the atmosphere. Do not allow product to enter waterways.

Contamination and cleaning

Use water spray to isolate vapors. Straits after cooling should be rolled over, collected in a container, hermetically sealed and sent for disposal. Cut off the surface layer of soil with pollution, collect and take out for disposal in compliance with safety measures. Cover the cuts with a fresh layer of soil. Rinse the surface of the rolling stock with detergent compositions.

7. HANDLING AND STORAGE

Precautions and safe handling

The premises must be equipped with general exchange and local supply and exhaust ventilation, which ensures the cleanliness of the air in the working area. Observe safety and fire safety regulations, use explosion-proof equipment.

Do not drink, eat or smoke when handling the product. Wash hands thoroughly after handling. Observe the rules of personal hygiene.

It is necessary to use personal protective equipment: filter respirators, gloves, goggles, overalls, safety shoes.

Precautionary measures

Avoid contact with eyes. Do not inhale. Do not swallow. Do not apply to skin and mucous membranes.

Safe storage

Bitumen should be stored in tanks equipped with fixed or portable heating equipment.

It is allowed to store bitumen on open asphalt or concrete sites.

Guaranteed shelf life – 1 year from the date of manufacture.

8. INDIVIDUAL PROTECTION MEANS

Individual protection

Production facilities must be equipped with general exchange and supply and exhaust ventilation, ensuring the purity of the air in the working area.

Equipment

Control

Individual protection means

When working, it is necessary to use individual protective equipment: filter respirators, rubber gloves, goggles, overalls.

Eye protection



Respiratory Protection



Hand skin protection



Material Safety Data Sheet	Viscous petroleum road bitumen grade BND 100/130	Total Pages 5
		Page 3
		Version 1.0

Special tools Absent

9. PHYSICAL AND CHEMICAL PROPERTIES

Specifications	Indicators
Appearance (physical condition, color)	Black viscous liquid at high temperatures, solid at ambient temperature
Odour	No odor at room temperature
Odor threshold	No data
Concentration of hydrogen ions (pH)	No data
Softening temperature, °C, not less	45
Penetration	101 – 130
Initial boiling point, °C, not less	450
Vapor pressure at 180 °C, mmHg, no more	0.75
Relative density, g/cm ³	0.98 – 1.06
Decomposition temperature, °C	No data
Kinematic viscosity at 135 °C, cSt	220 – 420
Dynamic viscosity at 60 °C, Pa	90 – 350
Oxidizing properties	Oxidizes at a temperature of more than 160 °C with atmospheric oxygen, boils up when water enters hot bitumen

10. STABILITY AND REACTIVITY

Chemical stability The product is chemically stable under normal conditions of storage, transportation and use.

Solubility Slightly soluble in water, solubility in toluene - 99.0%.

11. TOXICOLOGICAL INFORMATION

Acute toxicity	Not classified as dangerous product. LD ₅₀ (oral, rat) > 5 000 mg/kg; LD ₅₀ (dermal, rabbits) > 2 000 mg/kg.
Respiratory or skin sensitization	Sensitizing effect not established.
Mutagenicity	There is no data indicating that the product is mutagenic or genotoxic.
Carcinogenicity	Bitumen is not classified as a probable, possible or confirmed human carcinogen by IARC.
Reproductive toxicity	It does not have a negative effect on the reproductive function of the body.
Specific target organ toxicity - single exposure	Not classified as specific target organ toxicant.
Specific target organ toxicity - repeated exposure	Not classified as specific target organ toxicant.
Aspiration hazard	Not classified as presenting an aspiration hazard.
Chronic effects	No information

12. ENVIRONMENTAL INFORMATION

Aquatic microorganisms	There is no evidence of any significant effect or harmful effects of the products on aquatic organisms.
Persistence and degradability	No information
Bioaccumulation potential	No information
Soil mobility	No information
Other adverse effects	No other adverse environmental impacts (eg ozone depletion, endocrine disruption, global warming potential) are expected from the product.

13. WASTE MANAGEMENT

	Wastes of production are neutralized in accordance with sanitary norms and rules approved in the established manner. Recycling and disposal of waste in the production process by agreement with a company that has a license for waste disposal.
--	--

14. TRANSPORT INFORMATION

14.1 Number UN	Not applicable for bitumen in solid state. 3257 – for bitumen transported in the molten state.
14.2 Proper shipping and transport names	<i>Shipping Name for bitumen transported in the molten state:</i>

Material Safety Data Sheet	Viscous petroleum road bitumen grade BND 100/130	Total Pages 5
		Page 4
		Version 1.0

ELEVATED TEMPERATURE LIQUID, N.O.S., at or above 100 °C and below its flash-point.

Transport Name:

Viscous petroleum road bitumen grade BND 100/130

14.3 Types of transport risks

*International Civil Aviation Organization/
International Air Transport Association
(ICAO / IATA)*

Danger / Class / Division

Environmental hazards

Signs

9L

*International Maritime Dangerous Goods
Code (IMDG)code*

Danger / Class / Division

Danger to the aquatic environment

Signs

F-A S-P

*The Intergovernmental Organisation for
International Carriage by Rail(MKMPOG)
/European agreement concerning the
transport of dangerous goods (DOPOG)*

Danger / Class / Division

9

Signs

9

Code

M9

14.4 Group packing

III

14.5 Environmental risks

Absent.

*14.6 Environmental risks with the app. II to
the International Convention for the
prevention of pollution from ships (MARPOL)
73/78 и code International Code for the
Construction and Equipment of Ships,
Carriers Dangerous Chemicals in Bulk
(MRG)*

Does not concern.

14.7 Special precautions

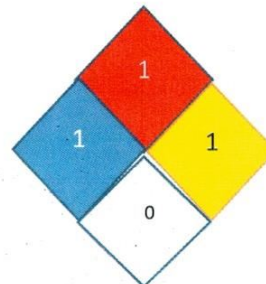
Absent.

15. REGULATORY INFORMATION

HMIS

HEALTH	1
FLAMMABILITY	1
PHYSICAL HAZARD	1
PERSONAL PROTECTION	F

NFPA



REACH

GHS

MDGC

ICAO/IATA

Application II MARPOL 73/78

RID

ADR

16. ADDITIONAL INFORMATION

Material Safety Data Sheet	Viscous petroleum road bitumen grade BND 100/130	Total Pages 5
		Page 5
		Version 1.0

We believe that the information contained here is current as of the date of this Material Safety Data Sheet and is offered in good faith. Since the use of this information and these opinions and terms of use of the product are not under control Bitekh LLC, user obligation to determine the conditions for the safe use of the product.

Gathered information:

Bitekh LLC

Actual date:

27.01.2022

Disclaimer:

The information provided in this Material Safety Data Sheet is based on data that is believed to be accurate at the date of preparation of this Material Safety Data Sheet. No liability is accepted for any damage or injury caused by abnormal use or due to non-compliance with recommended practices. The above information and the product are provided provided that the person receiving them must make their own determination as to the suitability of the product for their specific purpose and provided that they accept the risk of their use. In addition, no permission is granted or implied for the application of any patented invention without a license. The above information is believed to be accurate and reflect the information available to the manufacturer. However, this does not entail a guarantee for all the specific characteristics of the goods and does not serve as a basis for the emergence of contractual relations from a legal point of view. Current laws and regulations must be respected by the manufacturer's successor under his responsibility.

General director

Bitekh LLC

/ Koryakin Vadim Vladimirovich

Print place

