

# Safety Data Sheet

according to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

Date of issue: 05/07/2020 Revision date: 02/04/2022 Supersedes: 02/04/2022

Version: 1.5

### **SECTION 1: Identification**

### Identification

Product form : Mixture

Product name : Best NK Plus 26-0-7

Product code : M840139

#### Recommended use and restrictions on use

: Fertilizer Use of the substance/mixture

### Supplier

JR Simplot Company

P.O. Box 70013

Boise, ID 83707

T 1-208-336-2110

#### **Emergency telephone number**

**Emergency number** : CHEMTREC 1-800-424-9300

### **SECTION 2: Hazard(s) identification**

### Classification of the substance or mixture

#### **GHS-US** classification

Acute toxicity (oral), Category 4

Serious eye damage/eye irritation, Category 2

Carcinogenicity, Category 2

H302 Harmful if swallowed. H319 Causes serious eye irritation.

H351 Suspected of causing cancer.

Full text of H statements : see section 16

### GHS Label elements, including precautionary statements

### **GHS US labelling**

Hazard pictograms (GHS US)





Signal word (GHS US) : Warning

Hazard statements (GHS US) : H302 - Harmful if swallowed.

H319 - Causes serious eye irritation. H351 - Suspected of causing cancer.

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

P202 - Do not handle until all safety precautions have been read and understood.

P264 - Wash hands, forearms and face thoroughly after handling. P270 - Do not eat, drink or smoke when using this product.

P280 - Wear protective gloves/protective clothing/eye protection/face protection. P301+P312 - If swallowed: Call a poison center/doctor/... if you feel unwell

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

contact lenses, if present and easy to do. Continue rinsing. P308+P313 - If exposed or concerned: Get medical attention

P330 - Rinse mouth.

P337+P313 - If eye irritation persists: Get medical attention

P405 - Store locked up.

P501 - Dispose of contents/container to hazardous or special waste collection point, in

accordance with local, regional, national and/or international regulation

### Other hazards which do not result in classification

No additional information available

# **Unknown acute toxicity (GHS US)**

Not applicable

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### **SECTION 3: Composition/information on ingredients**

### 3.1. Substances

Not applicable

#### 3.2. Mixtures

Name	Product identifier	%	GHS-US classification
urea (57-13-6)	(CAS-No.) 57-13-6	20-40	Eye Irrit. 2B, H320
potassium chloride	(CAS-No.) 7447-40-7		Not classified
dolomite	(CAS-No.) 16389-88-1	10-15	Eye Irrit. 2B, H320
Iron Sucrate	(CAS-No.) 8047-67-4	5-10	Acute Tox. 3 (Oral), H301 Carc. 2, H351
Polymer Coating			Not classified
sulfur	(CAS-No.) 7704-34-9	0-1	Skin Irrit. 2, H315 Eye Irrit. 2B, H320
Wax	(CAS-No.) 64771-72-8		Not classified
ammonium nitrate	(CAS-No.) 6484-52-2		Eye Irrit. 2B, H320
ammonium sulfate (7783-20-2)	(CAS-No.) 7783-20-2		Not classified

Full text of hazard classes and H-statements: see section 16

### **SECTION 4: First-aid measures**

### 4.1. Description of first aid measures

First-aid measures general

: Never give anything by mouth to an unconscious person. If you feel unwell, seek medical advice (show the label where possible). IF exposed or concerned: Get medical advice/attention. Call a poison center or a doctor if you feel unwell.

First-aid measures after inhalation

: Remove person to fresh air and keep comfortable for breathing. Allow affected person to breathe fresh air. Allow the victim to rest.

First-aid measures after skin contact

: Remove affected clothing and wash all exposed skin area with mild soap and water, followed by warm water rinse. Wash skin with plenty of water.

First-aid measures after eye contact

: IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical attention.

First-aid measures after ingestion

: Do NOT induce vomiting. Obtain emergency medical attention. Rinse mouth. Call a poison center or a doctor if you feel unwell.

#### 4.2. Most important symptoms and effects (acute and delayed)

Potential adverse human health effects and

symptoms

: Based on available data, the classification criteria are not met.

Symptoms/effects after eye contact : Causes eye irritation. Eye irritation.

### 4.3. Immediate medical attention and special treatment, if necessary

Treat symptomatically.

### **SECTION 5: Fire-fighting measures**

# 5.1. Suitable (and unsuitable) extinguishing media

Suitable extinguishing media : Cart

: Carbon dioxide. Sand. Water spray. Dry powder. Foam.

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

### 5.2. Specific hazards arising from the chemical

Hazardous decomposition products in case of fire

: Toxic fumes may be released.

### 5.3. Special protective equipment and precautions for fire-fighters

Firefighting instructions

: Use water spray or fog for cooling exposed containers. Exercise caution when fighting any chemical fire. Prevent fire fighting water from entering the environment.

Protection during firefighting

: Do not enter fire area without proper protective equipment, including respiratory protection. Do not attempt to take action without suitable protective equipment. Self-contained breathing apparatus. Complete protective clothing.

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#### **SECTION 6: Accidental release measures**

### 6.1. Personal precautions, protective equipment and emergency procedures

### 6.1.1. For non-emergency personnel

Emergency procedures : Ventilate spillage area. Evacuate unnecessary personnel. Avoid contact with skin and eyes.

## 6.1.2. For emergency responders

Protective equipment : Do not attempt to take action without suitable protective equipment. Equip cleanup crew with

proper protection. For further information refer to section 8: "Exposure controls/personal

protection".

Emergency procedures : Ventilate area.

#### 6.2. Environmental precautions

Avoid release to the environment. Prevent entry to sewers and public waters. Notify authorities if liquid enters sewers or public waters.

### 6.3. Methods and material for containment and cleaning up

Methods for cleaning up : Mechanically recover the product. On land, sweep or shovel into suitable containers. Minimise

generation of dust. Store away from other materials. Notify authorities if product enters sewers

or public waters

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

#### 6.4. Reference to other sections

See Heading 8. Exposure controls and personal protection. For further information refer to section 13.

### **SECTION 7: Handling and storage**

#### 7.1. Precautions for safe handling

Precautions for safe handling : Ensure good ventilation of the work station. Wash hands and other exposed areas with mild

soap and water before eating, drinking or smoking and when leaving work. Provide good ventilation in process area to prevent formation of vapour. 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. Always wash hands after handling the

product.

### 7.2. Conditions for safe storage, including any incompatibilities

Storage conditions : Keep only in the original container in a cool, well ventilated place away from : Keep container

closed when not in use. Store locked up. Store in a well-ventilated place. Keep cool.

Incompatible products : Strong bases. Strong acids.

Incompatible materials : Sources of ignition. Direct sunlight.

### **SECTION 8: Exposure controls/personal protection**

# 8.1. Control parameters

Best NK Plus 26-0-7	
No additional information available	
urea (57-13-6) (57-13-6)	
No additional information available	

# potassium chloride (7447-40-7)

No additional information available

# Wax (64771-72-8)

No additional information available

# **Polymer Coating**

No additional information available

#### dolomite (16389-88-1)

### **USA - ACGIH - Occupational Exposure Limits**

ACGIH TWA (mg/m³) 3 mg/m³

### Iron Sucrate (8047-67-4)

No additional information available

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sulfur (7704-34-9)	
USA - ACGIH - Occupational Exposure Limits	
ACGIH TWA (mg/m³)	3 mg/m³
ammonium nitrate (6484-52-2)	
No additional information available	
ammonium sulfate (7783-20-2) (7783-20-2)	
No additional information available	

### 8.2. Appropriate engineering controls

Appropriate engineering controls : Ensure good ventilation of the work station.

Environmental exposure controls : Avoid release to the environment.

### 8.3. Individual protection measures/Personal protective equipment

### Personal protective equipment:

Avoid all unnecessary exposure.

Hand protection:

Wear protective gloves.

Eye protection:

Chemical goggles or safety glasses. Safety glasses

Skin and body protection:

Wear suitable protective clothing

Respiratory protection:

Wear appropriate mask

Other information:

Do not eat, drink or smoke during use.

### **SECTION 9: Physical and chemical properties**

### 9.1. Information on basic physical and chemical properties

Physical state : Solid
Appearance : Granules.
Colour : Multi-colored

Odour : There may be no odour warning properties, odour is subjective and inadequate to warn of

overexposure.

Mixture contains one or more component(s) which have the following odour:

Odourless In moist air: Ammonia odour Pure substance is odourless Commercial/unpurified

substance: Unpleasant odour

Odour threshold No data available No data available pΗ Melting point : No data available Freezing point Not applicable Boiling point : No data available Not applicable Flash point Relative evaporation rate (butylacetate=1) : No data available Flammability (solid, gas) : Non flammable. Vapour pressure No data available Relative vapour density at 20 °C : No data available Relative density No data available Density : 57-61 lbs/ft3 Solubility : No data available Partition coefficient n-octanol/water (Log Pow) : No data available

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Auto-ignition temperature : Not applicable
Decomposition temperature : No data available
Viscosity, kinematic : No data available
Viscosity, dynamic : No data available
Explosive limits : Not applicable
Explosive properties : No data available
Oxidising properties : No data available

### 9.2. Other information

No additional information available

# **SECTION 10: Stability and reactivity**

#### 10.1. Reactivity

The product is non-reactive under normal conditions of use, storage and transport.

## 10.2. Chemical stability

Not established.

## 10.3. Possibility of hazardous reactions

Not established.

### 10.4. Conditions to avoid

Direct sunlight. Extremely high or low temperatures.

### 10.5. Incompatible materials

Strong acids. Strong bases.

### 10.6. Hazardous decomposition products

fume. Carbon monoxide. Carbon dioxide.

# **SECTION 11: Toxicological information**

## 11.1. Information on toxicological effects

Acute toxicity (oral) : Harmful if swallowed.

Acute toxicity (dermal) : Not classified

Acute toxicity (inhalation) : Not classified

ATE US (oral)	1273.885 mg/kg bodyweight
urea (57-13-6) (57-13-6)	
LD50 oral rat	8471 mg/kg (Rat; OECD 401: Acute Oral Toxicity; Literature study; 14300 mg/kg bodyweight; Rat; Experimental value)
LD50 dermal rat	> 3200 mg/kg (Rat; Literature study)
LD50 dermal rabbit	> 21000 mg/kg (Rabbit; Literature study)
potassium chloride (7447-40-7)	
LD50 oral rat	2600 mg/kg (Rat)

petabolam emeriae (1111 101)		
LD50 oral rat	2600 mg/kg (Rat)	
sulfur (7704-34-9)		
LD50 oral rat	> 5000 mg/kg (Rat)	

ammonium nitrate (6484-52-2)	
LC50 inhalation rat (mg/l)	> 9.23 mg/l/4h (Rat)
LD50 dermal rabbit	> 2000 mg/kg (Rabbit)

LD50 oral rat	4820 mg/kg (Rat)
	> 3000 mg/kg (Rabbit)

LD50 dermal rat	> 2000 mg/kg

ammonium sulfate (7783-20-2) (7783-20-2)

LD50 oral rat

Skin corrosion/irritation : Not classified
Serious eye damage/irritation : Causes serious eye irritation.

Respiratory or skin sensitisation : Not classified

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2840 mg/kg (Rat)

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Germ cell mutagenicity : Not classified

Carcinogenicity : Suspected of causing cancer.

Iron Sucrate (8047-67-4)

IARC group 3 - Not classifiable

Reproductive toxicity : Not classified

STOT-single exposure : Not classified

STOT-repeated exposure : Not classified

Aspiration hazard : Not classified
Viscosity, kinematic : No data available

Potential adverse human health effects and

symptoms

: Based on available data, the classification criteria are not met.

Symptoms/effects after eye contact : Causes eye irritation. Eye irritation.

## **SECTION 12: Ecological information**

### 12.1. Toxicity

Ecology - general : The product is not considered harmful to aquatic organisms nor to cause long-term adverse effects in the environment.

urea (57-13-6) (57-13-6)	
LC50 fish 1	> 6810 mg/l (96 h; Leuciscus idus; Nominal concentration)
EC50 Daphnia 1	> 10000 mg/l (48 h; Daphnia magna; Nominal concentration)
LC50 fish 2	17500 mg/l (96 h; Poecilia reticulata)
EC50 Daphnia 2	> 10000 mg/l (24 h; Daphnia magna)
TLM fish 1	17500 ppm (96 h; Poecilia reticulata)
Threshold limit other aquatic organisms 1	120000 mg/l (16 h; Bacteria; Toxicity test)
Threshold limit other aquatic organisms 2	> 10000 mg/l (Pseudomonas putida)
Threshold limit algae 1	> 10000 mg/l (168 h; Scenedesmus quadricauda; Growth rate)
Threshold limit algae 2	47 mg/l (192 h; Microcystis aeruginosa; Growth rate)
potassium chloride (7447-40-7)	
LC50 fish 1	920 mg/l (96 h; Gambusia affinis; Static system)
EC50 Daphnia 1	630 mg/l (48 h; Ceriodaphnia dubia)
LC50 fish 2	2010 mg/l (96 h; Lepomis macrochirus; Static system)
EC50 Daphnia 2	660 mg/l (48 h; Daphnia magna)
Threshold limit algae 1	850 mg/l (72 h; Scenedesmus subspicatus)
Threshold limit algae 2	> 100 mg/l (72 h; Scenedesmus subspicatus; GLP)

sulfur (7704-34-9)	
LC50 fish 1	866 mg/l (96 h; Brachydanio rerio)
LC50 fish 2	> 100 mg/l 96 h; Salmo gairdneri (Oncorhynchus mykiss)
TLM fish 1	10000 ppm (96 h; Gambusia affinis)
Threshold limit other aquatic organisms 1	> 10000 mg/l (24 h; Daphnia magna)
ammonium nitrate (6484-52-2)	
LC50 fish 1	74 mg/l (48 h; Cyprinus carpio; Lethal)
EC50 Daphnia 1	555 mg/l (Daphnia magna)
LC50 fish 2	800 mg/l (3.9 h; Pisces)
TLM fish 1	100 - 1000,96 h; Pisces
TLM other aquatic organisms 1	100 - 1000,96 h

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ammonium nitrate (6484-52-2)	nium nitrate (6484-52-2)	
Threshold limit algae 1	83 mg/l (Scenedesmus quadricauda; Growth rate)	
ammonium sulfate (7783-20-2) (7783-20-2)		
LC50 fish 1	126 mg/l (96 h; Poecilia reticulata)	
EC50 Daphnia 1	202 mg/l (96 h; Daphnia magna)	
LC50 fish 2	250 – 480 mg/l (96 h; Brachydanio rerio)	
EC50 Daphnia 2	433 mg/l (50 h; Daphnia magna)	
TLM fish 1	1290 ppm (96 h; Gambusia affinis)	

# 12.2. Persistence and degradability

Best NK Plus 26-0-7		
Persistence and degradability	Not established.	
rea (57-13-6) (57-13-6)		
Persistence and degradability	Inherently biodegradable. Hydrolysis in water. Not established.	
ThOD	0.27 g O₂/g substance	
potassium chloride (7447-40-7)		
Persistence and degradability	Biodegradability: not applicable. Not established.	
Biochemical oxygen demand (BOD)	Not applicable	
Chemical oxygen demand (COD)	Not applicable	
ThOD	Not applicable	
BOD (% of ThOD)	Not applicable	
Wax (64771-72-8)		
Persistence and degradability	Not established.	
dolomite (16389-88-1)		
Persistence and degradability	Biodegradability: not applicable. Not established.	
Biochemical oxygen demand (BOD)	Not applicable	
Chemical oxygen demand (COD)	Not applicable	
ThOD	Not applicable	
BOD (% of ThOD)	Not applicable	
Iron Sucrate (8047-67-4)		
Persistence and degradability	Not established.	
sulfur (7704-34-9)		
Persistence and degradability	Biodegradability: not applicable. Biodegradability in soil: not applicable. Adsorbs into the soil. Not established.	
Biochemical oxygen demand (BOD)	Not applicable	
Chemical oxygen demand (COD)	Not applicable	
ThOD	Not applicable	
BOD (% of ThOD)	Not applicable	
ammonium nitrate (6484-52-2)		
Persistence and degradability	Biodegradable in water. Biodegradable in the soil. Not established.	
ammonium sulfate (7783-20-2) (7783-20-2)		
Persistence and degradability	Biodegradability in water: no data available. Not established.	

# 12.3. Bioaccumulative potential

Best NK Plus 26-0-7		
Bioaccumulative potential	Not established.	
urea (57-13-6) (57-13-6)		
BCF fish 1	1 (72 h; Brachydanio rerio; Fresh water)	
BCF other aquatic organisms 1	11700 (Chlorella sp.)	
Partition coefficient n-octanol/water (Log Pow)	< -1.73 (Experimental value; EU Method A.8: Partition Coefficient)	

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urea (57-13-6) (57-13-6)			
Bioaccumulative potential	Bioaccumulation: not applicable. Not established.		
potassium chloride (7447-40-7)			
Partition coefficient n-octanol/water (Log Pow)	-0.46 (Estimated value)		
Bioaccumulative potential	Bioaccumulation: not applicable. Not established.		
Wax (64771-72-8)			
Bioaccumulative potential	Not established.		
dolomite (16389-88-1)			
Bioaccumulative potential	No bioaccumulation data available. Not established.		
Iron Sucrate (8047-67-4)			
Bioaccumulative potential	Not established.		
sulfur (7704-34-9)			
Partition coefficient n-octanol/water (Log Pow)	0.23 (Estimated value)		
Bioaccumulative potential	Low potential for bioaccumulation (Log Kow < 4). Not established.		
ammonium nitrate (6484-52-2)			
Partition coefficient n-octanol/water (Log Pow)	-3.1		
Bioaccumulative potential	Bioaccumulation: not applicable. Not established.		
ammonium sulfate (7783-20-2) (7783-20-2)			
Partition coefficient n-octanol/water (Log Pow)	-5.1		
Bioaccumulative potential	Bioaccumulation: not applicable. Not established.		

## 12.4. Mobility in soil

sulfur (7704-34-9)	
Ecology - soil	Not toxic to bees.

## 12.5. Other adverse effects

Other information : Avoid unintentional release to the environment.

# **SECTION 13: Disposal considerations**

### 13.1. Disposal methods

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

Product/Packaging disposal recommendations : Dispose in a safe manner in accordance with local/national regulations.

Ecology - waste materials : Avoid unintentional release to the environment.

# **SECTION 14: Transport information**

# **Department of Transportation (DOT)**

In accordance with DOT

Other information : No supplementary information available.

**Transportation of Dangerous Goods** 

Transport by sea

Air transport

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### SECTION 15: Regulatory information

### 15.1. US Federal regulations

#### Best NK Plus 26-0-7

All components of this product are listed, or excluded from listing, on the United States Environmental Protection Agency Toxic Substances Control Act (TSCA) inventory except for:

Polymer Coating	CAS-No.	%
Iron Sucrate	CAS-No. 8047-67-4	5-10%

### 15.2. International regulations

### **CANADA**

### urea (57-13-6) (57-13-6)

Listed on the Canadian DSL (Domestic Substances List)

### potassium chloride (7447-40-7)

Listed on the Canadian DSL (Domestic Substances List)

### Wax (64771-72-8)

Listed on the Canadian DSL (Domestic Substances List)

#### **Polymer Coating**

Not listed on the Canadian DSL (Domestic Substances List)/NDSL (Non-Domestic Substances List)

#### dolomite (16389-88-1)

Listed on the Canadian NDSL (Non-Domestic Substances List)

#### Iron Sucrate (8047-67-4)

Not listed on the Canadian DSL (Domestic Substances List)/NDSL (Non-Domestic Substances List)

### sulfur (7704-34-9)

Listed on the Canadian DSL (Domestic Substances List)

# ammonium nitrate (6484-52-2)

Listed on the Canadian DSL (Domestic Substances List)

### ammonium sulfate (7783-20-2) (7783-20-2)

Listed on the Canadian DSL (Domestic Substances List)

### **EU-Regulations**

No additional information available

**National regulations** 

No additional information available

### 15.3. US State regulations

California Proposition 65 - This product does not contain any substances known to the state of California to cause cancer, developmental and/or reproductive harm

Component	State or local regulations
sulfur(7704-34-9)	U.S Massachusetts - Right To Know List; U.S New Jersey - Right to Know Hazardous Substance List; U.S Pennsylvania - RTK (Right to Know) List
ammonium nitrate(6484-52-2)	U.S Massachusetts - Right To Know List; U.S New Jersey - Right to Know Hazardous Substance List; U.S Pennsylvania - RTK (Right to Know) List
ammonium sulfate (7783-20-2)(7783-20-2)	U.S Massachusetts - Right To Know List; U.S Pennsylvania - RTK (Right to Know) List

### **SECTION 16: Other information**

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Revision date : 02/04/2022 Other information : None.

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## Full text of H-statements:

H301	Toxic if swallowed.
H302	Harmful if swallowed.
H315	Causes skin irritation.
H319	Causes serious eye irritation.
H320	Causes eye irritation
H351	Suspected of causing cancer.

### SDS US (GHS HazCom 2012)

Disclaimer: This information relates to the specific material designated and may not be valid for such material used in combination with any other materials or in any process. Such information is to the best of our knowledge and belief, accurate and reliable as of the date compiled. However, no representation, warranty or guarantee is made as to its accuracy, reliability or completeness. NO WARRANTY OF MERCHANTABILITY, FITNESS FOR ANY PARTICULAR PURPOSE, OR ANY OTHER WARRANTY, EXPRESS OR IMPLIED, IS MADE CONCERNING THE INFORMATION HEREIN PROVIDED. It is the user's responsibility to satisfy himself as to the suitability and completeness of such information for his own particular use. We do not accept liability for any loss or damage that may occur from the use of this information nor do we offer warranty against patent infringement.

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