

SECTION 1: Identification of the substance/mixture and of the company/undertaking**1.1. Product identifier****Starind K90 20%S**

Polyvinylpyrrolidone

CAS No.: 9003-39-8
EC No.: 618-363-4
INDEX No.: not relevant
REACH No.: Do not require registration

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

Relevant identified uses: The product is intended for professional use.

Uses advised against: not relevant

1.3. Details of the supplier of the safety data sheet**Supplier (manufacturer)**

Star-Tech & JRS Specialty Products Co., Ltd.

No.1, Huanan Road

Changshou District

Chongqing

China

Telephone: +86 23 6302 6003**Telefax:** +86 23 6898 1156**Information contact**

Information

Information telephone: +86 23 6302 6003**Information telefax:** +86 23 6898 1156**E-mail (competent person):** marketing@chinassp.net**Website:** www.chinassp.net/en**1.4. Emergency telephone number****Telephone:** +86 23 6898 1156**SECTION 2: Hazards identification****2.1. Classification of the substance or mixture**

Regulation (EC) No. 1272/2008: not relevant

2.2. Label elements**Classification according to Regulation (EC) No. 1272/2008 [CLP]**

not relevant

2.3. Other hazards

The product in the delivered form is not dust explosion capable; the enrichment of fine dust however leads to the danger of dust explosion.

May cause respiratory irritation.

Damage can be caused through mechanical influence of the product (e.g. sticking).

Special danger of slipping by leaking/spilling product.

SECTION 3: Composition / information on ingredients

3.1. Substances

Substance related information
Polyvinylpyrrolidone
CAS No.: 9003-39-8
EC No.: 618-363-4
INDEX no.: not relevant

3.2. Mixtures

Composition/information on ingredients

Substance:	EC-no.:	CAS-No.:	INDEX no.:	REACH-no.:	Concentration:	Classification: EC 1272/2008 (CLP):
not relevant	not relevant	not relevant	not relevant	not relevant	not relevant	not relevant

Substance with a common (EC) occupational exposure limit value

Substance:	EC-no.:	CAS-No.:	INDEX no.:	REACH-no.:	Concentration:	Classification: EC 1272/2008 (CLP):
not relevant	not relevant	not relevant	not relevant	not relevant	not relevant	not relevant

(Full text of H- and EUH-phrases: see section 16.)

Additional information

not relevant

SECTION 4: First aid measures

4.1. Description of first aid measures

General information: When in doubt or if symptoms are observed, get medical advice.

Following inhalation: Provide fresh air.

Following skin contact: When in doubt or if symptoms are observed, get medical advice.

Following skin contact: After contact with skin, wash immediately with plenty of water and soap.
In case of skin irritation, consult a physician.

After eye contact: Rinse immediately carefully and thoroughly with eye-bath or water.
In case of eye irritation consult an ophthalmologist.

After ingestion: Rinse mouth immediately and drink plenty of water.

When in doubt or if symptoms are observed, get medical advice.

Self-protection of the first aider: not relevant

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

Symptoms: No known symptoms to date.

Nature of Hazard: May cause respiratory irritation.

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

Notes for the doctor: Treat symptomatically.

Special treatment: Treat symptomatically.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media: Carbon dioxide (CO₂). Foam. Extinguishing powder.

Unsuitable extinguishing media: Water

5.2. Special hazards arising from the substance or mixture

In case of fire may be liberated: Carbon monoxide. Carbon dioxide. Nitrogen oxides (NO_x)
Danger of dust explosion.
Special danger of slipping by leaking/spilling product.

5.3. Advice for firefighters

General information

Coordinate fire-fighting measures to the fire surroundings.

Special protective equipment for firefighters:

In case of fire: Wear self-contained breathing apparatus.

Additional information

Fire class A (Fires of solids, mainly organic nature, which normally burn down under glow forming).

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

For non-emergency personnel:

Special danger of slipping by leaking/spilling product.
Wear breathing apparatus if exposed to vapours/dusts/aerosols.

For emergency responders:

See protective measures under point 7 and 8.

6.2. Environmental precautions

Do not allow to enter into surface water or drains.

6.3. Methods and material for containment and cleaning up

Take up mechanically.
Avoid generation of dust.
Avoid contact with water.

6.4. Reference to other sections

Disposal: see section 13.
Personal protection equipment: see section 8

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Advices on safe handling

If handled uncovered, arrangements with local exhaust ventilation should be used if possible.
It is recommended to design all work processes always so that the following is excluded:
Inhalation of dust/particles

Technical measures

During filling, metering and sampling should be used if possible:
Devices with local exhaust
Dust should be exhausted directly at the point of origin.

Precautions against fire and explosion

The product is: Combustible.
Danger of dust explosion.
Keep away from heat/sparks/open flames/hot surfaces. - No smoking.
Have fire-extinguishers in readiness before opening containers.

Additional information

Avoid generation of dust.

Shafts and sewers must be protected from entry of the product.

Recommendations for handling:

210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.

240 Ground/bond container and receiving equipment.

241 Use explosion-proof electrical/ventilating/lighting equipment.

280 Wear protective gloves/protective clothing/eye protection/face protection.

7.2. Conditions for safe storage, including any incompatibilities

Technical measures and storage conditions

not relevant

Packaging materials

not relevant

Requirements for storage rooms and vessels

not relevant

Hints on joint storage

Storage class: 11 Combustible solids.

Further information on storage conditions

Protect against: Humidity, UV-radiation/sunlight.

Storage temperature: not relevant

Relative air humidity (%): not relevant

Storage stability: at least 3 years

Maximum storage period (time): not relevant

7.3. Specific end use(s)

not relevant

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Occupational exposure limit value

Substance:	CAS-No.:	Source:	Occupational Exposure limits value:	Limitation of exposure peaks:	Remark:
Respirable dust	not relevant	not relevant	3 mg/m ³ (respirable particles) 10 mg/m ³ (inhalable particles) 5 mg/m ³ (respirable dust fraction) 15 mg/m ³ (Total dust)	not relevant	TVL-TWA US ACGIH TWA US OSHA

Substance with a common (EC) occupational exposure limit value

Substance:	CAS-No.:	Source:	Occupational exposure limit value:	Limitation of exposure peaks:	Remark:
not relevant	not relevant	not relevant	not relevant	not relevant	not relevant

DNEL-/PNEC-values

DNEL value

Substance:	CAS-No.:	DNEL/DMEL	Industry	Professional	Consumer
not relevant	not relevant	not relevant	not relevant	not relevant	not relevant

PNEC Value

Substance:	CAS-No.:	PNEC	Limit value:	Consumer
not relevant	not relevant	not relevant	not relevant	not relevant

Risk management measures according to used control banding approach
not relevant

Additional information
not relevant

8.2. Exposure controls

Occupational exposure controls

If technical exhaust or ventilation measures are not possible or insufficient, respiratory protection must be worn.

General protection and hygiene measures

Wash hands before breaks and after work.

Minimum standard for preventive measures while handling with working materials are specified in the TRGS 500.

Personal protection equipment

Technical measures and the application of suitable work processes have priority over personal protection equipment.

Respiratory protection

Suitable respiratory protection apparatus: Filtering Half-face mask (DIN EN 149)

Half-face mask or quarter face piece: maximum use concentration for substances with exposure limits:

P1 filter: up to a max. of 4 times the exposure limit.

P2 filter: up to a max. of 10 times the exposure limit.

P3 filter: up to a max. of 30 times the exposure limit.

The filter class must be suitable for the maximum contaminant concentration

(gas/vapour/aerosol/particulates) that may arise when handling the product.

If the concentration is exceeded, self-contained breathing apparatus must be used!

Hand protection

Hand protection is not required

Eye/face protection

Dust protection eye glasses.

Body protection

Body protection: not applicable.

Environmental exposure controls

See chapter 7. No additional measures necessary.

Consumer exposure controls

not relevant

Exposure Scenario

not relevant

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Appearance

Physical state:

Liquid

Color:

Clear and colorless to slightly yellowish

Odor:

No smell or slightly characteristic odor

Odor threshold:

not relevant

Safety relevant basis data Parameter	Unit	Remark
Density:		not determined
Bulk density:		not determined
pH:	7.0 – 9.0	
Melting point/freezing point:		not relevant
Initial boiling point and boiling range:		not relevant
Flash point:		not determined
Flammability (solid, gas):		not relevant
Explosivity:		Dust explosive
Lower explosion limit:		not determined
Upper explosion limit:		not determined
Ignition temperature:		No data available
Decomposition temperature:		No data available
Oxidizing potential:		not oxidizing.
Vapour pressure:		not determined
Vapour density:		not determined
Evaporation rate:		not determined
Water solubility:		soluble
Fat solubility:		soluble
Soluble in:		not relevant
Partition coefficient n-octanol/water:		No data available
Viscosity:		not relevant
Solvent separation test:		not relevant
Solvent content:		not relevant

9.2. Other information

not relevant

SECTION 10: Stability and reactivity

10.1. Reactivity

not relevant

10.2. Chemical stability

not relevant

10.3. Possibility of hazardous reactions

not relevant

10.4. Conditions to avoid

Avoid generation of dust.

Avoid contact with water.

Keep away from heat/sparks/open flames/hot surfaces. - No smoking.

10.5. Incompatible materials

Oxidizing agent, strong

Reducing agent, strong

10.6. Hazardous decomposition products

In case of fire may be liberated: Carbon monoxide. Carbon dioxide (CO₂). Nitrogen oxides (NO_x)

Additional information

not relevant

SECTION 11: Toxicological information

11.1. Information on toxicological effects

not relevant

Acute toxicity

Substance:	CAS-No.:	Toxicological information
Polyvinylpyrrolidone	9003-39-8	LD50: >2000mg/kg (rat)

Specific symptoms in laboratory animals

No information available.

Irritation and etching

Irritant effect on the skin

Not an irritant.

Irritant effect on the eye

Not an irritant.

Irritant effect on the respiratory tract

slightly irritant but not relevant for classification.

Caustic effect

not corrosive

Sensitization

not sensitizing.

Repeated dose toxicity (subacute, subchronic, chronic)

not relevant

CMR effects (carcinogenicity, mutagenicity and toxicity for reproduction)

Carcinogenicity

not relevant

Germ cell mutagenicity

not relevant

Reproductive toxicity

not relevant

General remarks

Damage can be caused through mechanical influence of the product (e.g. sticking).

Practical experience/human evidence

No information available.

Other observations

not relevant

Other information

not relevant

SECTION 12: Ecological information

12.1. Toxicity

not relevant

Eco toxicity

Substance:	CAS-No.:	Eco toxicity
not relevant	not relevant	not relevant

12.2. Persistence and degradability

not readily biodegradable (according to OECD criteria)

12.3. Bio accumulative potential

No indication of bioaccumulation potential.

12.4. Mobility in soil

No data available

12.5. Results of PBT and vPvB assessment

This substance does not meet the PBT/vPvB criteria of REACH, annex XIII.

12.6. Other adverse effects

not relevant

Further ecological information

Do not allow uncontrolled discharge of product into the environment.

Further details

not relevant

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Appropriate disposal/Product

Dispose of waste according to applicable legislation.

Appropriate disposal / Package

Non-contaminated packages may be recycled.

List of proposed waste codes/waste designations in accordance with EWC

Waste code product: 07 01 99 - wastes not otherwise specified

Waste code packaging: 15 01 06 - mixed packaging

Remark

The allocation of waste identity numbers/waste descriptions must be carried out according to the EWC, specific to the industry and process.

SECTION 14: Transport information

14.1. UN number

not relevant

14.2. UN proper shipping name

not relevant

14.3. Transport hazard class(es)

not relevant

14.4. Packing group

not relevant

14.5. Environmental hazards

not relevant

14.6. Special precautions for user

Land transport (ADR/RID)

Remark: No dangerous good in sense of this transport regulation.

Sea transport (IMDG)

Remark: No dangerous good in sense of this transport regulation.

Lufttransport (ICAO-TI / IATA-DGR)

Remark: No dangerous good in sense of this transport regulation.

14.7. Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

Remark: not relevant

SECTION 15: Regulatory information

Labelling

Hazardous component(s) for labelling

not relevant

Special labelling of particular preparations

not relevant

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

EU legislation

Information according to 1999/13/EC about limitation of emissions of volatile organic compounds (VOC-guideline).

not relevant

Regulation (EC) No 2037/2000 concerning materials, which cause damage to the ozone layer.

not relevant

Regulation (EC) No. 648/2004 (Detergents regulation)

not relevant

National regulations

Observe in addition any national regulations!

Restrictions of occupation

not relevant

Storage class

11 Combustible solids.

Water hazard class (WGK)

weak water pollutant (WGK 1)

Other regulations, restrictions and prohibition regulations

Minimum standard for preventive measures while handling with working materials are specified in the TRGS 500.

15.2. Chemical Safety Assessment

For this substance a chemical safety assessment has not been carried out.

SECTION 16: Other information

Relevant H- and EUH-phrases (Number and full text)

not relevant

Training advice

not relevant

Recommended restrictions of use

not relevant

Further remarks

The above information describes exclusively the safety requirements of the product and is based on our present-day knowledge.

The information is intended to give you advice about the safe handling of the product named in this safety data sheet, for storage, processing, transport and disposal.

The information cannot be transferred to other products.

In the case of mixing the product with other products or in the case of processing, the information on this safety data sheet is not necessarily valid for the new made-up material.

Documentation of changes

Data changed compared with the previous version

Key literature references and sources for data

Data arise from reference works and literature.

GESTIS- substances data base

Regulation (EC) 1272/2008 [CLP]

Abbreviations and acronyms

EWC = European Waste Catalogue
