

SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 Black

[File No.] 202001E

[Date of issue] 2018/03/19

[Details of Manufacture]

Manufacture's name: MITSUBISHI PENCIL CO., LTD.

Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN

Telephone number: 03-3458-6281 telefax number: 03-3450-0363
(Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified

Acute toxicity(skin) : Not classified

Acute toxicity(inhalation steam) : Not classified

Skin corrosion/irritation : Category2

Serious eye damage/Eye Irritation : Category2

Respiratory sensitizer : Classification not possible

Skin sensitizer : Classification not possible

Germ cell mutagenicity : Classification not possible

Carcinogenicity : Category2

Toxic to reproduction : Category1

Specific target organ systemic toxicity(single exposure) : Category1

Specific target organ systemic toxicity(repeated exposure) : Category1

Aspiration hazard : Category1

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2

Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram



Signal Word : Danger

Hazard Statement : Highly flammable liquid and vapour

: May be fatal if swallowed and enters airways

: Causes skin irritation

: Causes serious eye damage

: Suspected of causing cancer

: May damage fertility or the unborn child

: Causes damage to organs

: Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
- : Keep cool.
- : Ground/bond container and receiving equipment.
- : Do not breathe dust/vapours etc..
- : Do not eat, drink or smoke when using this product.
- : Avoid release to the environment.
- : Use personal protective equipment as required.(Refer to Section 8)
- : Get medical advice/attention if you feel unwell.
- : Take off contaminated clothing and wash before reuse.
- : Collect spillage.
- : IF ON SKIN: Wash with plenty of soap and water.
- : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
- : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
- : IF exposed or concerned: Get medical advice/attention.
- : If skin irritation occurs: Get medical advice/attention.
- : If eye irritation persists: Get medical advice/attention.
- : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
- : IF SWALLOWED: Get immediate medical advice/attention. Do NOT induce vomiting.
- : Store in a well-ventilated place. Keep cool.
- : Dispose in accordance with all current regulations and standards.

[Other hazards]

No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink [Ink quantity of product :about 7.8g]
Chemical name	Cas No.	Concentration range(wt%)
Xylenes	1330-20-7	30-50
Ethylbenzene	100-41-4	10-30
Isobutyl alcohol	78-83-1	< 10
Oleic acid	112-80-1	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
: Take off the contact lens if possible
: Then get medical attention immediately.
- Skin contact : Wash skin.
: Consult medical advice depending on the symptoms.
: Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
: Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
: Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Isobutyl alcohol	-	(TWA)50ppm
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: Black
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Isobutyl alcohol 107.9°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Isobutyl alcohol 415.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about0.9
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >70%

[Other information]

No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(skin)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(inhalation:vapours)

Not classified : >50 mg/L (estimate value)

Skin corrosion/irritation

Isobutyl alcohol : Category2

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Isobutyl alcohol : Category2A

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Xylenes : Category1

Aspiration hazard

Isobutyl alcohol	: Category2
Xylenes	: Category2
Ethylbenzene	: Category1

Hazard to the Aquatic Environment (Acute)

Xylenes	: Category2
Ethylbenzene	: Category1

Hazard to the Aquatic Environment (Chronic)

Xylenes	: Category2
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12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

960820

[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

- The information is based on our present knowledge at the date of its publication, and designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release.
- This shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 Red

[File No.] 202003E

[Date of issue] 2018/03/19

[Details of Manufacture]

Manufacture's name: MITSUBISHI PENCIL CO., LTD.

Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN

Telephone number: 03-3458-6281 telefax number: 03-3450-0363
(Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified

Acute toxicity(skin) : Not classified

Acute toxicity(inhalation steam) : Not classified

Skin corrosion/irritation : Category2

Serious eye damage/Eye Irritation : Category2

Respiratory sensitizer : Classification not possible

Skin sensitizer : Classification not possible

Germ cell mutagenicity : Classification not possible

Carcinogenicity : Category2

Toxic to reproduction : Category1

Specific target organ systemic toxicity(single exposure) : Category1

Specific target organ systemic toxicity(repeated exposure) : Category1

Aspiration hazard : Category2

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2

Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram



Signal Word : Danger

Hazard Statement : Highly flammable liquid and vapour
: May be harmful if swallowed and enters airways
: Causes skin irritation
: Causes serious eye damage
: Suspected of causing cancer
: May damage fertility or the unborn child
: Causes damage to organs
: Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
 - : Keep cool.
 - : Ground/bond container and receiving equipment.
 - : Do not breathe dust/vapours etc..
 - : Do not eat, drink or smoke when using this product.
 - : Avoid release to the environment.
 - : Use personal protective equipment as required.(Refer to Section 8)
 - : Get medical advice/attention if you feel unwell.
 - : Take off contaminated clothing and wash before reuse.
 - : Collect spillage.
 - : IF ON SKIN: Wash with plenty of soap and water.
 - : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
 - : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easys to do. Continue rinsing.
 - : IF exposed or concerned: Get medical advice/attention.
 - : If skin irritation occurs: Get medical advice/attention.
 - : If eye irritation persists: Get medical advice/attention.
 - : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
 - : IF SWALLOWED: Get immediate medical advaice/attention. Do NOT induce vomiting.
 - : Store in a well-ventilated place. Keep cool.
 - : Dispose in accordance with all current regulations and standards.
- [Other hazards] No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink[Ink quantity of product :about 8.2g]
Chemical name	Cas No.	Concentration range(wt%)
Titanium dioxide	13463-67-7	30-50
Xylenes	1330-20-7	30-50
Ethylbenzene	100-41-4	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
 : Take off the contact lens if possible
 : Then get medical attention immediately.
- Skin contact : Wash skin.
 : Consult medical advice depending on the symptoms.
 : Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
 : Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
 : Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Titanium dioxide	-	(TWA)10mg/m ³
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: Red
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Ethylbenzene 136.0°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Ethylbenzene 432.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about1.3
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >40%

[Other information] No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(skin)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(inhalation:vapours)

Not classified : >50 mg/L (estimate value)

Skin corrosion/irritation

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Titanium dioxide : Category2B

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Titanium dioxide : Category3

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Titanium dioxide : Category1

Xylenes : Category1

Aspiration hazard

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Acute)

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Chronic)

Titanium dioxide : Category4

Xylenes : Category2

12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

960820

[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

- The information is based on our present knowledge at the date of its publication, and designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release.
- This shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 Blue

[File No.] 202002E

[Date of issue] 2018/03/19

[Details of Manufacture]

Manufacture's name: MITSUBISHI PENCIL CO., LTD.

Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN

Telephone number: 03-3458-6281 telefax number: 03-3450-0363
(Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified

Acute toxicity(skin) : Not classified

Acute toxicity(inhalation steam) : Not classified

Skin corrosion/irritation : Category2

Serious eye damage/Eye Irritation : Category2

Respiratory sensitizer : Classification not possible

Skin sensitizer : Classification not possible

Germ cell mutagenicity : Classification not possible

Carcinogenicity : Category2

Toxic to reproduction : Category1

Specific target organ systemic toxicity(single exposure) : Category1

Specific target organ systemic toxicity(repeated exposure) : Category1

Aspiration hazard : Category2

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2

Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram



Signal Word : Danger

Hazard Statement : Highly flammable liquid and vapour
: May be harmful if swallowed and enters airways
: Causes skin irritation
: Causes serious eye damage
: Suspected of causing cancer
: May damage fertility or the unborn child
: Causes damage to organs
: Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
- : Keep cool.
- : Ground/bond container and receiving equipment.
- : Do not breathe dust/vapours etc..
- : Do not eat, drink or smoke when using this product.
- : Avoid release to the environment.
- : Use personal protective equipment as required.(Refer to Section 8)
- : Get medical advice/attention if you feel unwell.
- : Take off contaminated clothing and wash before reuse.
- : Collect spillage.
- : IF ON SKIN: Wash with plenty of soap and water.
- : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
- : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easys to do. Continue rinsing.
- : IF exposed or concerned: Get medical advice/attention.
- : If skin irritation occurs: Get medical advice/attention.
- : If eye irritation persists: Get medical advice/attention.
- : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
- : IF SWALLOWED: Get immediate medical advaice/attention. Do NOT induce vomiting.
- : Store in a well-ventilated place. Keep cool.
- : Dispose in accordance with all current regulations and standards.

[Other hazards]

No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink[Ink quantity of product :about 8.0g]
Chemical name	Cas No.	Concentration range(wt%)
Xylenes	1330-20-7	30-50
Titanium dioxide	13463-67-7	10-30
Ethylbenzene	100-41-4	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
: Take off the contact lens if possible
: Then get medical attention immediately.
- Skin contact : Wash skin.
: Consult medical advice depending on the symptoms.
: Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
: Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
: Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Titanium dioxide	-	(TWA)10mg/m ³
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: Blue
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Ethylbenzene 136.0°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Ethylbenzene 432.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about1.3
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >40%

[Other information]

No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(skin)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(inhalation:vapours)

Not classified : >50 mg/L (estimate value)

Skin corrosion/irritation

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Titanium dioxide : Category2B

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Titanium dioxide : Category3

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Titanium dioxide : Category1

Xylenes : Category1

Aspiration hazard

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Acute)

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Chronic)

Titanium dioxide : Category4

Xylenes : Category2

12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

960820

[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

- The information is based on our present knowledge at the date of its publication, and designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release.
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SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 Yellow

[File No.] 202009E

[Date of issue] 2018/03/19

[Details of Manufacture]

Manufacture's name: MITSUBISHI PENCIL CO., LTD.

Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN

Telephone number: 03-3458-6281 telefax number: 03-3450-0363
(Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified

Acute toxicity(skin) : Not classified

Acute toxicity(inhalation steam) : Not classified

Skin corrosion/irritation : Category2

Serious eye damage/Eye Irritation : Category2

Respiratory sensitizer : Classification not possible

Skin sensitizer : Classification not possible

Germ cell mutagenicity : Classification not possible

Carcinogenicity : Category2

Toxic to reproduction : Category1

Specific target organ systemic toxicity(single exposure) : Category1

Specific target organ systemic toxicity(repeated exposure) : Category1

Aspiration hazard : Category2

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2

Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram



Signal Word : Danger

Hazard Statement : Highly flammable liquid and vapour
: May be harmful if swallowed and enters airways
: Causes skin irritation
: Causes serious eye damage
: Suspected of causing cancer
: May damage fertility or the unborn child
: Causes damage to organs
: Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
 - : Keep cool.
 - : Ground/bond container and receiving equipment.
 - : Do not breathe dust/vapours etc..
 - : Do not eat, drink or smoke when using this product.
 - : Avoid release to the environment.
 - : Use personal protective equipment as required.(Refer to Section 8)
 - : Get medical advice/attention if you feel unwell.
 - : Take off contaminated clothing and wash before reuse.
 - : Collect spillage.
 - : IF ON SKIN: Wash with plenty of soap and water.
 - : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
 - : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
 - : IF exposed or concerned: Get medical advice/attention.
 - : If skin irritation occurs: Get medical advice/attention.
 - : If eye irritation persists: Get medical advice/attention.
 - : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
 - : IF SWALLOWED: Get immediate medical advice/attention. Do NOT induce vomiting.
 - : Store in a well-ventilated place. Keep cool.
 - : Dispose in accordance with all current regulations and standards.
- [Other hazards] No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink [Ink quantity of product :about 8.5g]
Chemical name	Cas No.	Concentration range(wt%)
Titanium dioxide	13463-67-7	30-50
Xylenes	1330-20-7	30-50
Ethylbenzene	100-41-4	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
: Take off the contact lens if possible
: Then get medical attention immediately.
- Skin contact : Wash skin.
: Consult medical advice depending on the symptoms.
: Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
: Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
: Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Titanium dioxide	-	(TWA)10mg/m ³
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: Yellow
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Ethylbenzene 136.0°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Ethylbenzene 432.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about1.3
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >40%
[Other information]	No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(skin)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(inhalation:vapours)

Not classified : >50 mg/L (estimate value)

Skin corrosion/irritation

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Titanium dioxide : Category2B

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Titanium dioxide : Category3

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Titanium dioxide : Category1

Xylenes : Category1

Aspiration hazard

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Acute)

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Chronic)

Titanium dioxide : Category4

Xylenes : Category2

12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

960820

[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

- The information is based on our present knowledge at the date of its publication, and designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release.
- This shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 Light green

[File No.] 202010E

[Date of issue] 2018/03/19

[Details of Manufacture]

Manufacture's name: MITSUBISHI PENCIL CO., LTD.

Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN

Telephone number: 03-3458-6281 telefax number: 03-3450-0363
(Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified

Acute toxicity(skin) : Not classified

Acute toxicity(inhalation steam) : Not classified

Skin corrosion/irritation : Category2

Serious eye damage/Eye Irritation : Category2

Respiratory sensitizer : Classification not possible

Skin sensitizer : Classification not possible

Germ cell mutagenicity : Classification not possible

Carcinogenicity : Category2

Toxic to reproduction : Category1

Specific target organ systemic toxicity(single exposure) : Category1

Specific target organ systemic toxicity(repeated exposure) : Category1

Aspiration hazard : Category2

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2

Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram



Signal Word : Danger

Hazard Statement : Highly flammable liquid and vapour
: May be harmful if swallowed and enters airways
: Causes skin irritation
: Causes serious eye damage
: Suspected of causing cancer
: May damage fertility or the unborn child
: Causes damage to organs
: Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
 - : Keep cool.
 - : Ground/bond container and receiving equipment.
 - : Do not breathe dust/vapours etc..
 - : Do not eat, drink or smoke when using this product.
 - : Avoid release to the environment.
 - : Use personal protective equipment as required.(Refer to Section 8)
 - : Get medical advice/attention if you feel unwell.
 - : Take off contaminated clothing and wash before reuse.
 - : Collect spillage.
 - : IF ON SKIN: Wash with plenty of soap and water.
 - : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
 - : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
 - : IF exposed or concerned: Get medical advice/attention.
 - : If skin irritation occurs: Get medical advice/attention.
 - : If eye irritation persists: Get medical advice/attention.
 - : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
 - : IF SWALLOWED: Get immediate medical advice/attention. Do NOT induce vomiting.
 - : Store in a well-ventilated place. Keep cool.
 - : Dispose in accordance with all current regulations and standards.
- [Other hazards] No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink [Ink quantity of product :about 8.5g]
Chemical name	Cas No.	Concentration range(wt%)
Titanium dioxide	13463-67-7	30-50
Xylenes	1330-20-7	30-50
Ethylbenzene	100-41-4	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
: Take off the contact lens if possible
: Then get medical attention immediately.
- Skin contact : Wash skin.
: Consult medical advice depending on the symptoms.
: Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
: Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
: Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Titanium dioxide	-	(TWA)10mg/m ³
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: Light green
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Ethylbenzene 136.0°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Ethylbenzene 432.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about1.3
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >40%

[Other information]

No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(skin)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(inhalation:vapours)

Not classified : >50 mg/L (estimate value)

Skin corrosion/irritation

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Titanium dioxide : Category2B

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Titanium dioxide : Category3

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Titanium dioxide : Category1

Xylenes : Category1

Aspiration hazard

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Acute)

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Chronic)

Titanium dioxide : Category4

Xylenes : Category2

12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

960820

[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

- The information is based on our present knowledge at the date of its publication, and designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release.
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SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 Green
 [File No.] 202011E
 [Date of issue] 2018/03/19
 [Details of Manufacture]
 Manufacture's name: MITSUBISHI PENCIL CO., LTD.
 Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN
 Telephone number: 03-3458-6281 telefax number: 03-3450-0363
 (Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified
 Acute toxicity(skin) : Not classified
 Acute toxicity(inhalation steam) : Not classified
 Skin corrosion/irritation : Category2
 Serious eye damage/Eye Irritation : Category2
 Respiratory sensitizer : Classification not possible
 Skin sensitizer : Classification not possible
 Germ cell mutagenicity : Classification not possible
 Carcinogenicity : Category2
 Toxic to reproduction : Category1
 Specific target organ systemic toxicity(single exposure) : Category1
 Specific target organ systemic toxicity(repeated exposure) : Category1
 Aspiration hazard : Category2

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2
 Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram : 

Signal Word : Danger

Hazard Statement : Highly flammable liquid and vapour
 : May be harmful if swallowed and enters airways
 : Causes skin irritation
 : Causes serious eye damage
 : Suspected of causing cancer
 : May damage fertility or the unborn child
 : Causes damage to organs
 : Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
 - : Keep cool.
 - : Ground/bond container and receiving equipment.
 - : Do not breathe dust/vapours etc..
 - : Do not eat, drink or smoke when using this product.
 - : Avoid release to the environment.
 - : Use personal protective equipment as required.(Refer to Section 8)
 - : Get medical advice/attention if you feel unwell.
 - : Take off contaminated clothing and wash before reuse.
 - : Collect spillage.
 - : IF ON SKIN: Wash with plenty of soap and water.
 - : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
 - : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
 - : IF exposed or concerned: Get medical advice/attention.
 - : If skin irritation occurs: Get medical advice/attention.
 - : If eye irritation persists: Get medical advice/attention.
 - : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
 - : IF SWALLOWED: Get immediate medical advice/attention. Do NOT induce vomiting.
 - : Store in a well-ventilated place. Keep cool.
 - : Dispose in accordance with all current regulations and standards.
- [Other hazards] No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink [Ink quantity of product :about 8.2g]
Chemical name	Cas No.	Concentration range(wt%)
Titanium dioxide	13463-67-7	30-50
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Ethylbenzene	100-41-4	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
: Take off the contact lens if possible
: Then get medical attention immediately.
- Skin contact : Wash skin.
: Consult medical advice depending on the symptoms.
: Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
: Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
: Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Titanium dioxide	-	(TWA)10mg/m ³
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: Green
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Ethylbenzene 136.0°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Ethylbenzene 432.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about1.3
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >40%

[Other information] No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

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Skin corrosion/irritation

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Titanium dioxide : Category2B

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Titanium dioxide : Category3

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Titanium dioxide : Category1

Xylenes : Category1

Aspiration hazard

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Acute)

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Chronic)

Titanium dioxide : Category4

Xylenes : Category2

12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

960820

[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

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SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 Violet
 [File No.] 202012E
 [Date of issue] 2018/03/19
 [Details of Manufacture]
 Manufacture's name: MITSUBISHI PENCIL CO., LTD.
 Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN
 Telephone number: 03-3458-6281 telefax number: 03-3450-0363
 (Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified
 Acute toxicity(skin) : Not classified
 Acute toxicity(inhalation steam) : Not classified
 Skin corrosion/irritation : Category2
 Serious eye damage/Eye Irritation : Category2
 Respiratory sensitizer : Classification not possible
 Skin sensitizer : Classification not possible
 Germ cell mutagenicity : Classification not possible
 Carcinogenicity : Category2
 Toxic to reproduction : Category1
 Specific target organ systemic toxicity(single exposure) : Category1
 Specific target organ systemic toxicity(repeated exposure) : Category1
 Aspiration hazard : Category2

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2
 Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram : 

Signal Word : Danger

Hazard Statement : Highly flammable liquid and vapour
 : May be harmful if swallowed and enters airways
 : Causes skin irritation
 : Causes serious eye damage
 : Suspected of causing cancer
 : May damage fertility or the unborn child
 : Causes damage to organs
 : Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
 - : Keep cool.
 - : Ground/bond container and receiving equipment.
 - : Do not breathe dust/vapours etc..
 - : Do not eat, drink or smoke when using this product.
 - : Avoid release to the environment.
 - : Use personal protective equipment as required.(Refer to Section 8)
 - : Get medical advice/attention if you feel unwell.
 - : Take off contaminated clothing and wash before reuse.
 - : Collect spillage.
 - : IF ON SKIN: Wash with plenty of soap and water.
 - : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
 - : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
 - : IF exposed or concerned: Get medical advice/attention.
 - : If skin irritation occurs: Get medical advice/attention.
 - : If eye irritation persists: Get medical advice/attention.
 - : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
 - : IF SWALLOWED: Get immediate medical advice/attention. Do NOT induce vomiting.
 - : Store in a well-ventilated place. Keep cool.
 - : Dispose in accordance with all current regulations and standards.
- [Other hazards] No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink [Ink quantity of product :about 8.3g]
Chemical name	Cas No.	Concentration range(wt%)
Titanium dioxide	13463-67-7	30-50
Xylenes	1330-20-7	30-50
Ethylbenzene	100-41-4	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
: Take off the contact lens if possible
: Then get medical attention immediately.
- Skin contact : Wash skin.
: Consult medical advice depending on the symptoms.
: Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
: Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
: Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Titanium dioxide	-	(TWA)10mg/m ³
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: Violet
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Ethylbenzene 136.0°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Ethylbenzene 432.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about1.3
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >40%
[Other information]	No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(skin)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(inhalation:vapours)

Not classified : >50 mg/L (estimate value)

Skin corrosion/irritation

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Titanium dioxide : Category2B

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Titanium dioxide : Category3

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Titanium dioxide : Category1

Xylenes : Category1

Aspiration hazard

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Acute)

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Chronic)

Titanium dioxide : Category4

Xylenes : Category2

12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

960820

[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

- The information is based on our present knowledge at the date of its publication, and designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release.
- This shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 Orange

[File No.] 202013E

[Date of issue] 2018/03/19

[Details of Manufacture]

Manufacture's name: MITSUBISHI PENCIL CO., LTD.

Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN

Telephone number: 03-3458-6281 telefax number: 03-3450-0363
(Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified

Acute toxicity(skin) : Not classified

Acute toxicity(inhalation steam) : Not classified

Skin corrosion/irritation : Category2

Serious eye damage/Eye Irritation : Category2

Respiratory sensitizer : Classification not possible

Skin sensitizer : Classification not possible

Germ cell mutagenicity : Classification not possible

Carcinogenicity : Category2

Toxic to reproduction : Category1

Specific target organ systemic toxicity(single exposure) : Category1

Specific target organ systemic toxicity(repeated exposure) : Category1

Aspiration hazard : Category2

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2

Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram



Signal Word : Danger

Hazard Statement : Highly flammable liquid and vapour
: May be harmful if swallowed and enters airways
: Causes skin irritation
: Causes serious eye damage
: Suspected of causing cancer
: May damage fertility or the unborn child
: Causes damage to organs
: Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
 - : Keep cool.
 - : Ground/bond container and receiving equipment.
 - : Do not breathe dust/vapours etc..
 - : Do not eat, drink or smoke when using this product.
 - : Avoid release to the environment.
 - : Use personal protective equipment as required.(Refer to Section 8)
 - : Get medical advice/attention if you feel unwell.
 - : Take off contaminated clothing and wash before reuse.
 - : Collect spillage.
 - : IF ON SKIN: Wash with plenty of soap and water.
 - : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
 - : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easys to do. Continue rinsing.
 - : IF exposed or concerned: Get medical advice/attention.
 - : If skin irritation occurs: Get medical advice/attention.
 - : If eye irritation persists: Get medical advice/attention.
 - : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
 - : IF SWALLOWED: Get immediate medical advaice/attention. Do NOT induce vomiting.
 - : Store in a well-ventilated place. Keep cool.
 - : Dispose in accordance with all current regulations and standards.
- [Other hazards] No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink[Ink quantity of product :about 8.5g]
Chemical name	Cas No.	Concentration range(wt%)
Titanium dioxide	13463-67-7	30-50
Xylenes	1330-20-7	30-50
Ethylbenzene	100-41-4	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
: Take off the contact lens if possible
: Then get medical attention immediately.
- Skin contact : Wash skin.
: Consult medical advice depending on the symptoms.
: Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
: Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
: Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Titanium dioxide	-	(TWA)10mg/m ³
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: Orange
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Ethylbenzene 136.0°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Ethylbenzene 432.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about1.3
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >40%
[Other information]	No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(skin)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(inhalation:vapours)

Not classified : >50 mg/L (estimate value)

Skin corrosion/irritation

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Titanium dioxide : Category2B

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Titanium dioxide : Category3

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Titanium dioxide : Category1

Xylenes : Category1

Aspiration hazard

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Acute)

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Chronic)

Titanium dioxide : Category4

Xylenes : Category2

12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

960820

[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

- The information is based on our present knowledge at the date of its publication, and designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release.
- This shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 Pink

[File No.] 202014E

[Date of issue] 2018/03/19

[Details of Manufacture]

Manufacture's name: MITSUBISHI PENCIL CO., LTD.

Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN

Telephone number: 03-3458-6281 telefax number: 03-3450-0363
(Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified

Acute toxicity(skin) : Not classified

Acute toxicity(inhalation steam) : Not classified

Skin corrosion/irritation : Category2

Serious eye damage/Eye Irritation : Category2

Respiratory sensitizer : Classification not possible

Skin sensitizer : Classification not possible

Germ cell mutagenicity : Classification not possible

Carcinogenicity : Category2

Toxic to reproduction : Category1

Specific target organ systemic toxicity(single exposure) : Category1

Specific target organ systemic toxicity(repeated exposure) : Category1

Aspiration hazard : Category2

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2

Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram



Signal Word : Danger

Hazard Statement : Highly flammable liquid and vapour
: May be harmful if swallowed and enters airways
: Causes skin irritation
: Causes serious eye damage
: Suspected of causing cancer
: May damage fertility or the unborn child
: Causes damage to organs
: Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
- : Keep cool.
- : Ground/bond container and receiving equipment.
- : Do not breathe dust/vapours etc..
- : Do not eat, drink or smoke when using this product.
- : Avoid release to the environment.
- : Use personal protective equipment as required.(Refer to Section 8)
- : Get medical advice/attention if you feel unwell.
- : Take off contaminated clothing and wash before reuse.
- : Collect spillage.
- : IF ON SKIN: Wash with plenty of soap and water.
- : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
- : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easys to do. Continue rinsing.
- : IF exposed or concerned: Get medical advice/attention.
- : If skin irritation occurs: Get medical advice/attention.
- : If eye irritation persists: Get medical advice/attention.
- : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
- : IF SWALLOWED: Get immediate medical advaice/attention. Do NOT induce vomiting.
- : Store in a well-ventilated place. Keep cool.
- : Dispose in accordance with all current regulations and standards.

[Other hazards]

No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink[Ink quantity of product :about 8.5g]
Chemical name	Cas No.	Concentration range(wt%)
Titanium dioxide	13463-67-7	30-50
Xylenes	1330-20-7	30-50
Ethylbenzene	100-41-4	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
: Take off the contact lens if possible
: Then get medical attention immediately.
- Skin contact : Wash skin.
: Consult medical advice depending on the symptoms.
: Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
: Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
: Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Titanium dioxide	-	(TWA)10mg/m ³
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: Pink
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Ethylbenzene 136.0°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Ethylbenzene 432.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about1.3
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >40%
[Other information]	No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(skin)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(inhalation:vapours)

Not classified : >50 mg/L (estimate value)

Skin corrosion/irritation

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Titanium dioxide : Category2B

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Titanium dioxide : Category3

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Titanium dioxide : Category1

Xylenes : Category1

Aspiration hazard

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Acute)

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Chronic)

Titanium dioxide : Category4

Xylenes : Category2

12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

960820

[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

- The information is based on our present knowledge at the date of its publication, and designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release.
- This shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 Light blue

[File No.] 202015E

[Date of issue] 2018/03/19

[Details of Manufacture]

Manufacture's name: MITSUBISHI PENCIL CO., LTD.

Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN

Telephone number: 03-3458-6281 telefax number: 03-3450-0363
(Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified

Acute toxicity(skin) : Not classified

Acute toxicity(inhalation steam) : Not classified

Skin corrosion/irritation : Category2

Serious eye damage/Eye Irritation : Category2

Respiratory sensitizer : Classification not possible

Skin sensitizer : Classification not possible

Germ cell mutagenicity : Classification not possible

Carcinogenicity : Category2

Toxic to reproduction : Category1

Specific target organ systemic toxicity(single exposure) : Category1

Specific target organ systemic toxicity(repeated exposure) : Category1

Aspiration hazard : Category2

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2

Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram



Signal Word : Danger

Hazard Statement : Highly flammable liquid and vapour
: May be harmful if swallowed and enters airways
: Causes skin irritation
: Causes serious eye damage
: Suspected of causing cancer
: May damage fertility or the unborn child
: Causes damage to organs
: Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
- : Keep cool.
- : Ground/bond container and receiving equipment.
- : Do not breathe dust/vapours etc..
- : Do not eat, drink or smoke when using this product.
- : Avoid release to the environment.
- : Use personal protective equipment as required.(Refer to Section 8)
- : Get medical advice/attention if you feel unwell.
- : Take off contaminated clothing and wash before reuse.
- : Collect spillage.
- : IF ON SKIN: Wash with plenty of soap and water.
- : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
- : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easys to do. Continue rinsing.
- : IF exposed or concerned: Get medical advice/attention.
- : If skin irritation occurs: Get medical advice/attention.
- : If eye irritation persists: Get medical advice/attention.
- : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
- : IF SWALLOWED:Get immediate medical advaice/attention.Do NOT induce vomiting.
- : Store in a well-ventilated place. Keep cool.
- : Dispose in accordance with all current regulations and standards.

[Other hazards]

No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink[Ink quantity of product :about 8.4g]
Chemical name	Cas No.	Concentration range(wt%)
Titanium dioxide	13463-67-7	30-50
Xylenes	1330-20-7	30-50
Ethylbenzene	100-41-4	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
: Take off the contact lens if possible
: Then get medical attention immediately.
- Skin contact : Wash skin.
: Consult medical advice depending on the symptoms.
: Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
: Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
: Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Titanium dioxide	-	(TWA)10mg/m ³
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: Light blue
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Ethylbenzene 136.0°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Ethylbenzene 432.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about1.3
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >40%

[Other information] No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(skin)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(inhalation:vapours)

Not classified : >50 mg/L (estimate value)

Skin corrosion/irritation

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Titanium dioxide : Category2B

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Titanium dioxide : Category3

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Titanium dioxide : Category1

Xylenes : Category1

Aspiration hazard

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Acute)

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Chronic)

Titanium dioxide : Category4

Xylenes : Category2

12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

960820

[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

- The information is based on our present knowledge at the date of its publication, and designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release.
- This shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 Brown

[File No.] 202016E

[Date of issue] 2018/03/19

[Details of Manufacture]

Manufacture's name: MITSUBISHI PENCIL CO., LTD.

Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN

Telephone number: 03-3458-6281 telefax number: 03-3450-0363
(Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified

Acute toxicity(skin) : Not classified

Acute toxicity(inhalation steam) : Not classified

Skin corrosion/irritation : Category2

Serious eye damage/Eye Irritation : Category2

Respiratory sensitizer : Classification not possible

Skin sensitizer : Classification not possible

Germ cell mutagenicity : Classification not possible

Carcinogenicity : Category2

Toxic to reproduction : Category1

Specific target organ systemic toxicity(single exposure) : Category1

Specific target organ systemic toxicity(repeated exposure) : Category1

Aspiration hazard : Category2

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2

Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram



Signal Word : Danger

Hazard Statement : Highly flammable liquid and vapour
: May be harmful if swallowed and enters airways
: Causes skin irritation
: Causes serious eye damage
: Suspected of causing cancer
: May damage fertility or the unborn child
: Causes damage to organs
: Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
 - : Keep cool.
 - : Ground/bond container and receiving equipment.
 - : Do not breathe dust/vapours etc..
 - : Do not eat, drink or smoke when using this product.
 - : Avoid release to the environment.
 - : Use personal protective equipment as required.(Refer to Section 8)
 - : Get medical advice/attention if you feel unwell.
 - : Take off contaminated clothing and wash before reuse.
 - : Collect spillage.
 - : IF ON SKIN: Wash with plenty of soap and water.
 - : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
 - : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
 - : IF exposed or concerned: Get medical advice/attention.
 - : If skin irritation occurs: Get medical advice/attention.
 - : If eye irritation persists: Get medical advice/attention.
 - : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
 - : IF SWALLOWED: Get immediate medical advice/attention. Do NOT induce vomiting.
 - : Store in a well-ventilated place. Keep cool.
 - : Dispose in accordance with all current regulations and standards.
- [Other hazards] No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink [Ink quantity of product :about 8.3g]
Chemical name	Cas No.	Concentration range(wt%)
Titanium dioxide	13463-67-7	30-50
Xylenes	1330-20-7	30-50
Ethylbenzene	100-41-4	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
: Take off the contact lens if possible
: Then get medical attention immediately.
- Skin contact : Wash skin.
: Consult medical advice depending on the symptoms.
: Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
: Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
: Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Titanium dioxide	-	(TWA)10mg/m ³
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: Brown
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Ethylbenzene 136.0°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Ethylbenzene 432.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about1.3
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >40%

[Other information] No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(skin)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(inhalation:vapours)

Not classified : >50 mg/L (estimate value)

Skin corrosion/irritation

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Titanium dioxide : Category2B

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Titanium dioxide : Category3

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Titanium dioxide : Category1

Xylenes : Category1

Aspiration hazard

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Acute)

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Chronic)

Titanium dioxide : Category4

Xylenes : Category2

12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

960820

[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

- The information is based on our present knowledge at the date of its publication, and designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release.
- This shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 Grey

[File No.] 202017E

[Date of issue] 2018/03/19

[Details of Manufacture]

Manufacture's name: MITSUBISHI PENCIL CO., LTD.

Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN

Telephone number: 03-3458-6281 telefax number: 03-3450-0363
(Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified

Acute toxicity(skin) : Not classified

Acute toxicity(inhalation steam) : Not classified

Skin corrosion/irritation : Category2

Serious eye damage/Eye Irritation : Category2

Respiratory sensitizer : Classification not possible

Skin sensitizer : Classification not possible

Germ cell mutagenicity : Classification not possible

Carcinogenicity : Category2

Toxic to reproduction : Category1

Specific target organ systemic toxicity(single exposure) : Category1

Specific target organ systemic toxicity(repeated exposure) : Category1

Aspiration hazard : Category2

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2

Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram



Signal Word : Danger

Hazard Statement : Highly flammable liquid and vapour
: May be harmful if swallowed and enters airways
: Causes skin irritation
: Causes serious eye damage
: Suspected of causing cancer
: May damage fertility or the unborn child
: Causes damage to organs
: Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
 - : Keep cool.
 - : Ground/bond container and receiving equipment.
 - : Do not breathe dust/vapours etc..
 - : Do not eat, drink or smoke when using this product.
 - : Avoid release to the environment.
 - : Use personal protective equipment as required.(Refer to Section 8)
 - : Get medical advice/attention if you feel unwell.
 - : Take off contaminated clothing and wash before reuse.
 - : Collect spillage.
 - : IF ON SKIN: Wash with plenty of soap and water.
 - : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
 - : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
 - : IF exposed or concerned: Get medical advice/attention.
 - : If skin irritation occurs: Get medical advice/attention.
 - : If eye irritation persists: Get medical advice/attention.
 - : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
 - : IF SWALLOWED: Get immediate medical advice/attention. Do NOT induce vomiting.
 - : Store in a well-ventilated place. Keep cool.
 - : Dispose in accordance with all current regulations and standards.
- [Other hazards] No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink [Ink quantity of product :about 8.3g]
Chemical name	Cas No.	Concentration range(wt%)
Titanium dioxide	13463-67-7	30-50
Xylenes	1330-20-7	30-50
Ethylbenzene	100-41-4	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
: Take off the contact lens if possible
: Then get medical attention immediately.
- Skin contact : Wash skin.
: Consult medical advice depending on the symptoms.
: Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
: Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
: Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Titanium dioxide	-	(TWA)10mg/m ³
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: Gray
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Ethylbenzene 136.0°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Ethylbenzene 432.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about1.3
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >40%

[Other information]

No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(skin)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(inhalation:vapours)

Not classified : >50 mg/L (estimate value)

Skin corrosion/irritation

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Titanium dioxide : Category2B

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Titanium dioxide : Category3

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Titanium dioxide : Category1

Xylenes : Category1

Aspiration hazard

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Acute)

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Chronic)

Titanium dioxide : Category4

Xylenes : Category2

12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

960820

[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

- The information is based on our present knowledge at the date of its publication, and designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release.
- This shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 White

[File No.] 202018E

[Date of issue] 2018/03/19

[Details of Manufacture]

Manufacture's name: MITSUBISHI PENCIL CO., LTD.

Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN

Telephone number: 03-3458-6281 telefax number: 03-3450-0363
(Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified

Acute toxicity(skin) : Not classified

Acute toxicity(inhalation steam) : Not classified

Skin corrosion/irritation : Category2

Serious eye damage/Eye Irritation : Category2

Respiratory sensitizer : Classification not possible

Skin sensitizer : Classification not possible

Germ cell mutagenicity : Classification not possible

Carcinogenicity : Category2

Toxic to reproduction : Category1

Specific target organ systemic toxicity(single exposure) : Category1

Specific target organ systemic toxicity(repeated exposure) : Category1

Aspiration hazard : Category2

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2

Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram



Signal Word : Danger

Hazard Statement : Highly flammable liquid and vapour
: May be harmful if swallowed and enters airways
: Causes skin irritation
: Causes serious eye damage
: Suspected of causing cancer
: May damage fertility or the unborn child
: Causes damage to organs
: Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
- : Keep cool.
- : Ground/bond container and receiving equipment.
- : Do not breathe dust/vapours etc..
- : Do not eat, drink or smoke when using this product.
- : Avoid release to the environment.
- : Use personal protective equipment as required.(Refer to Section 8)
- : Get medical advice/attention if you feel unwell.
- : Take off contaminated clothing and wash before reuse.
- : Collect spillage.
- : IF ON SKIN: Wash with plenty of soap and water.
- : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
- : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easys to do. Continue rinsing.
- : IF exposed or concerned: Get medical advice/attention.
- : If skin irritation occurs: Get medical advice/attention.
- : If eye irritation persists: Get medical advice/attention.
- : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
- : IF SWALLOWED: Get immediate medical advaice/attention. Do NOT induce vomiting.
- : Store in a well-ventilated place. Keep cool.
- : Dispose in accordance with all current regulations and standards.

[Other hazards]

No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink[Ink quantity of product :about 8.5g]
Chemical name	Cas No.	Concentration range(wt%)
Titanium dioxide	13463-67-7	30-50
Xylenes	1330-20-7	30-50
Ethylbenzene	100-41-4	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
: Take off the contact lens if possible
: Then get medical attention immediately.
- Skin contact : Wash skin.
: Consult medical advice depending on the symptoms.
: Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
: Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
: Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Titanium dioxide	-	(TWA)10mg/m ³
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: White
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Ethylbenzene 136.0°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Ethylbenzene 432.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about1.3
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >40%

[Other information]

No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(skin)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(inhalation:vapours)

Not classified : >50 mg/L (estimate value)

Skin corrosion/irritation

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Titanium dioxide : Category2B

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Titanium dioxide : Category3

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Titanium dioxide : Category1

Xylenes : Category1

Aspiration hazard

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Acute)

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Chronic)

Titanium dioxide : Category4

Xylenes : Category2

12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

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[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

- The information is based on our present knowledge at the date of its publication, and designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release.
- This shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 Gold

[File No.] 202019E

[Date of issue] 2018/03/19

[Details of Manufacture]

Manufacture's name: MITSUBISHI PENCIL CO., LTD.

Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN

Telephone number: 03-3458-6281 telefax number: 03-3450-0363
(Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified

Acute toxicity(skin) : Not classified

Acute toxicity(inhalation steam) : Not classified

Skin corrosion/irritation : Category2

Serious eye damage/Eye Irritation : Category2

Respiratory sensitizer : Classification not possible

Skin sensitizer : Classification not possible

Germ cell mutagenicity : Classification not possible

Carcinogenicity : Category2

Toxic to reproduction : Category1

Specific target organ systemic toxicity(single exposure) : Category1

Specific target organ systemic toxicity(repeated exposure) : Category1

Aspiration hazard : Category2

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2

Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram



Signal Word : Danger

Hazard Statement : Highly flammable liquid and vapour

: May be harmful if swallowed and enters airways

: Causes skin irritation

: Causes serious eye damage

: Suspected of causing cancer

: May damage fertility or the unborn child

: Causes damage to organs

: Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
- : Keep cool.
- : Ground/bond container and receiving equipment.
- : Do not breathe dust/vapours etc..
- : Do not eat, drink or smoke when using this product.
- : Avoid release to the environment.
- : Use personal protective equipment as required.(Refer to Section 8)
- : Get medical advice/attention if you feel unwell.
- : Take off contaminated clothing and wash before reuse.
- : Collect spillage.
- : IF ON SKIN: Wash with plenty of soap and water.
- : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
- : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
- : IF exposed or concerned: Get medical advice/attention.
- : If skin irritation occurs: Get medical advice/attention.
- : If eye irritation persists: Get medical advice/attention.
- : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
- : IF SWALLOWED: Get immediate medical advice/attention. Do NOT induce vomiting.
- : Store in a well-ventilated place. Keep cool.
- : Dispose in accordance with all current regulations and standards.

[Other hazards]

No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink [Ink quantity of product :about 8.1g]
Chemical name	Cas No.	Concentration range(wt%)
Xylenes	1330-20-7	30-50
Copper(as bronze powder)	7440-50-8	10-30
Ethylbenzene	100-41-4	< 10
Zinc (as bronze powder)	7440-66-6	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
: Take off the contact lens if possible
: Then get medical attention immediately.
- Skin contact : Wash skin.
: Consult medical advice depending on the symptoms.
: Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
: Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
: Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Copper(as bronze powder)	-	(TWA)1mg/m ³
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: Gold
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Ethylbenzene 136.0°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Ethylbenzene 432.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about1.2
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >40%

[Other information] No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(skin)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(inhalation:vapours)

Not classified : >50 mg/L (estimate value)

Skin corrosion/irritation

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Zinc (as bronze powder) : Category2B

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Copper(as bronze powder) : Category3

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Copper(as bronze powder) : Category1

Xylenes : Category1

Aspiration hazard

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Acute)

Zinc (as bronze powder) : Category1

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Chronic)

Copper(as bronze powder) : Category4

Zinc (as bronze powder) : Category1

Xylenes : Category2

12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

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[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

- The information is based on our present knowledge at the date of its publication, and designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release.
- This shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

SAFETY DATA SHEET

1. Product and Company Identification

[Product name] PX-20 Silver
 [File No.] 202020E
 [Date of issue] 2018/03/19
 [Details of Manufacture]
 Manufacture's name: MITSUBISHI PENCIL CO., LTD.
 Address: 5-23-37, HIGASHIOHI, SHINAGAWA, TOKYO, JAPAN
 Telephone number: 03-3458-6281 telefax number: 03-3450-0363
 (Only office hour are available.)

2. Hazards identification

Information of this section is about the ink.

[Classification of the substance or mixture]

PHYSICO-CHEMICAL HAZARDS

Flammable Liquids : Category2

HEALTH HAZARDS

Acute toxicity(oral) : Not classified
 Acute toxicity(skin) : Not classified
 Acute toxicity(inhalation steam) : Not classified
 Skin corrosion/irritation : Category2
 Serious eye damage/Eye Irritation : Category2
 Respiratory sensitizer : Classification not possible
 Skin sensitizer : Classification not possible
 Germ cell mutagenicity : Classification not possible
 Carcinogenicity : Category2
 Toxic to reproduction : Category1
 Specific target organ systemic toxicity(single exposure) : Category1
 Specific target organ systemic toxicity(repeated exposure) : Category1
 Aspiration hazard : Category1

ENVIRONMENTAL HAZARDS

Hazard to the Aquatic Environment (Acute) : Category2
 Hazard to the Aquatic Environment (Chronic) : Category2

[Label elements]

Pictogram



Signal Word

: Danger

Hazard Statement

: Highly flammable liquid and vapour
 : May be fatal if swallowed and enters airways
 : Causes skin irritation
 : Causes serious eye damage
 : Suspected of causing cancer
 : May damage fertility or the unborn child
 : Causes damage to organs
 : Causes damage to organs through prolonged or repeated exposure

- : Toxic to aquatic life
- : Toxic to aquatic life with long lasting effect

Precautionary Statement

- : Keep away from heat/sparks/open flames/hot surfaces. –No smoking.
 - : Keep cool.
 - : Ground/bond container and receiving equipment.
 - : Do not breathe dust/vapours etc..
 - : Do not eat, drink or smoke when using this product.
 - : Avoid release to the environment.
 - : Use personal protective equipment as required.(Refer to Section 8)
 - : Get medical advice/attention if you feel unwell.
 - : Take off contaminated clothing and wash before reuse.
 - : Collect spillage.
 - : IF ON SKIN: Wash with plenty of soap and water.
 - : IF ON SKIN(or hair): Remove immediately all contaminated clothing. Rinse skin with water.
 - : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
 - : IF exposed or concerned: Get medical advice/attention.
 - : If skin irritation occurs: Get medical advice/attention.
 - : If eye irritation persists: Get medical advice/attention.
 - : In case of fire: Use appropriate means for fire extinguishing in accordance with all current regulations and standards.
 - : IF SWALLOWED: Get immediate medical advice/attention. Do NOT induce vomiting.
 - : Store in a well-ventilated place. Keep cool.
 - : Dispose in accordance with all current regulations and standards.
- [Other hazards] No information available.

3. Composition/information on ingredients

[The chemical product is a substance or a mixture]	[Component parts]	Mixture
[Chemical nature]		Ink [Ink quantity of product :about 8.0g]
Chemical name	Cas No.	Concentration range(wt%)
Xylenes	1330-20-7	50-80
Ethylbenzene	100-41-4	10-30
Aluminum (as paste)	7429-90-5	< 10

4. First aid measures

[Description of first aid measures]

- Eye contact : Flush eyes with plenty of water for at least 15 minutes.
: Take off the contact lens if possible
: Then get medical attention immediately.
- Skin contact : Wash skin.
: Consult medical advice depending on the symptoms.
: Thoroughly clean and dry contaminated clothing and shoes before reuse.
- Ingestion : Consult medical advice, and show the SDS to physician.
: Never give anything by mouth. If vomiting occurs, keep head lower than hips to help prevent aspiration.
- Inhalation : Remove from exposure area to fresh air immediately. Give artificial respiration if not breathing.
: Consult medical advice, and show the SDS to physician.

[Most important symptoms and effects, both acute and delayed]

No information available.

[Indication of any immediate medical attention and special treatment needed]

No information available.

5. Firefighting measures

[Extinguishing media]

Regular dry chemical, carbon dioxide, water, regular foam

[Special hazards arising from the substance or mixture]

No further relevant information available.

[Advice for firefighters]

Stay upwind and keep out of low areas and avoid inhalation of material or combustion by-products.

Wear suitable protective equipment.

6. Accidental release measures

[Personal precautions, protective equipment and emergency procedures]

Rope off the area to contain the leak and prohibit entrance except for authorized persons.

Wear appropriate protection gear.

Do not work in the leeward.

[Environmental precautions]

Collect leaked material in empty container after leading outflow to a safe area containing earth and sand.

Do not allow leaked material to pollute rivers, lakes, etc.

[Methods and material for containment and cleaning up]

Wipe off by dry cloth and wash with water.

Dispose of pollution or waste in accordance with national, state and local regulations.

[Reference to other sections]

No information available.

7. Handling and storage

[Precautions for safe handling]

Do not lick or swallow the ink.

Avoid contact with skin and eyes.

Ventilate the room in case of using and don't breathe the vapor.

Recap after use (if there is a cap), and keep out of the reach of childrens.

[Conditions for safe storage, including any incompatibilities]

Keep away from oxidizing materials, ignition sources, high temperature and direct sunlight.

Recommended temperature : 0-40°C

[Specific end use(s)]

No information available.

8. Exposure controls/personal protection

[Control parameters]

Chemical name	OSHA	ACGIH
Aluminum (as paste)	-	(TWA)10ppm
Xylenes	-	(TWA)100ppm (STEL)150ppm

[Exposure controls]

Protective equipment	: Ventilate the room in case of using it and don't breathe the vapor. Do mechanical exhaust as needed.
Respiratory protection	: Not required.
Hands protection	: Not required.
Eye protection	: Not required.
Skin protection	: Not required.

9. Physical and chemical properties

[Information on basic physical and chemical properties]

Color	: Silver
State	: Liquid
Odor	: Aromatic odor
pH	: No information available.
Boiling point	: No information available.[Ethylbenzene 136.0°C]
Melting point	: No information available.
Flash point	: No information available.[Ethylbenzene 18.0°C]
Autoignition temperature	: No information available.[Ethylbenzene 432.0°C]
Explosion limits	: No information available.
Vapor density(air=1)	: No information available.
Density	: about1.0
Solubility in water	: insoluble
Evaporation rate	: No information available.
Volatile	: >60%

[Other information] No information available.

10. Stability and reactivity

[Chemical stability]

This mixture is stable in normal temperature, a condition of the pressure.

[Reactivity]	No data available.
[Conditions to avoid]	Avoid heat, flames, sparks and other sources of ignition. Avoid direct sunlight and high temperature.
[Incompatible materials]	No information available.
[Hazardous decomposition products]	No information available.
[Possibility of hazardous reactions]	No information available.

11. Toxicological information

[Information on toxicological effects]

Acute toxicity(oral)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(skin)

Not classified : >5000 mg/kg (estimate value)

Acute toxicity(inhalation:vapours)

Not classified : >50 mg/L (estimate value)

Skin corrosion/irritation

Xylenes : Category2

Ethylbenzene : Category3

Serious eye damage/Eye Irritation

Xylenes : Category2A

Ethylbenzene : Category2B

Respiratory sensitizer

No information available.

Skin sensitizer

No information available.

Germ cell mutagenicity

No information available.

Carcinogenicity

Ethylbenzene : Category2

Toxic to reproduction

Xylenes : Category1B

Ethylbenzene : Category1B

Specific target organ systemic toxicity(single exposure)

Xylenes : Category1

Ethylbenzene : Category2

Specific target organ systemic toxicity(repeated exposure)

Aluminum (as paste) : Category1

Xylenes : Category1

Aspiration hazard

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Acute)

Xylenes : Category2

Ethylbenzene : Category1

Hazard to the Aquatic Environment (Chronic)

Aluminum (as paste) : Category4

Xylenes : Category2

12. Ecological information

[Results of PBT and vPvB assessment]

No information available.

[Other adverse effects]

No information available.

13. Disposal considerations

[Waste treatment methods]

Dispose in accordance with all current regulations and standards.

Do not allow it to flow into the drainages with waste fluid.

14. Transport information

[Environmental hazards]

No information available.

[HS Code]

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[Special precautions for user]

Check the container for any leakage. Load a cargo without a dropping or incurring damage, and take caution against collapse of container.

15. Regulatory information

Information of this section is about the ink.

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

Follow all regulation in your country.

[Chemical safety assessment]

Ink or lead are manufactured in accordance with ISO 8124-3 Safety of Toys – Part 3""

16. Other information

- The information is based on our present knowledge at the date of its publication, and designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release.
- This shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.