$C1823 Series [C]-MSDS\_US-English-04.pdf$ 

 $C1823 Series [M]-MSDS\_US-English-04.pdf$ 

 $C1823 Series \hbox{[Y]-MSDS\_US-English-} 04.pdf$ 



# MATERIAL SAFETY DATA SHEET

# 1. Product and Company Identification

**Identification of the** 

preparation

C1823Series[C]

**Product use** Inkjet printing

**Version** # 04

**Revision date** 24-Oct-2012 CAS# Mixture

**Company identification Hewlett-Packard Company** 

3000 Hanover Street Palo Alto, CA 94304-1185

**United States** 

Telephone 650-857-1501

Hewlett-Packard health effects line (Toll-free within the US) 1-800-457-4209

(Direct) 1-503-494-7199 **HP Customer Care Line** 

(Toll-free within the US) 1-800-474-6836

(Direct) 1-208-323-2551

Email: hpcustomer.inquiries@hp.com

# 2. Hazards Identification

Contact with skin and eyes may result in irritation. **Emergency overview** 

Causes skin irritation.

**Acute health effects** 

Any potential hazards are presumed to be due to exposure to the components.

Skin contact 1.5-pentanediol

Contact with skin may result in irritation.

2-pyrrolidone

Contact with skin may result in irritation.

Alkyldiol ethoxylate

Contact with skin may result in severe irritation.

Ethyl alkyldiol

Contact with skin may result in mild irritation.

Metal nitrate # 2

Contact with skin may result in irritation.

Eye contact 1.5-pentanediol

Contact with eyes may result in irritation.

2-pyrrolidone

Contact with eyes may result in irritation.

Alkyldiol ethoxylate

Contact can cause moderate to severe irritation and possible injury to the eyes.

Ethyl alkyldiol

Contact with eyes may result in mild irritation.

Metal nitrate # 2

Contact with eyes may result in irritation.

**Inhalation** 2-pvrrolidone

Inhalation may result in respiratory irritation.

Metal nitrate # 2

Inhalation may result in respiratory irritation.

Material name: C1823Series[C] 1/6

**Ingestion** 2-pyrrolidone

Ingestion may result in nausea, vomiting and diarrhea.

Alkyldiol ethoxylate

Ingestion may cause irritation of mouth, throat, nausea, vomiting and diarrhea.

Cyan Colorant
Harmful if swallowed.

Metal nitrate # 2

Contains nitrate salts, may cause methemoglobinemia.

**Potential health effects** 

**Routes of exposure** Potential routes of overexposure to this product are skin and eye contact

Inhalation of vapor and ingestion are not expected to be significant routes of exposure for this

product under normal use conditions.

Complete toxicity data are not available for this specific formulation

**Chronic health effects** Substituted phthalocyanine salt: Prolonged ingestion exposure may cause serious damage to

health.

**Carcinogenicity**None of the components present in this formulation at concentrations equal to or greater than

0.1% are listed by EU, MAK, IARC, NTP or OSHA.

3. Composition / Informa	_	
Components	CAS #	Percent
1,5-pentanediol	111-29-5	< 10
2-pyrrolidone	616-45-5	< 10
Alkyldiol ethoxylate	Proprietary	< 2.5
Cyan Colorant	Proprietary	<2.5
Ethyl alkyldiol	Proprietary	< 10
Metal nitrate # 2	Proprietary	< 2.5
Water	7732-18-5	> 60

This product has been evaluated using criteria specified in 29 CFR 1910.1200 (Hazard

Communication Standard).

#### 4. First Aid Measures

First aid procedures

**Eye contact** Do not rub eyes. Immediately flush with large amounts of clean, warm water (low pressure) for at

least 15 minutes or until particles are removed. If irritation persists get medical attention.

For small (incipient) fires, use media such as foam, sand, dry chemical, or carbon dioxide.

2/6

**Skin contact** Wash affected areas thoroughly with mild soap and water. Get medical attention if irritation

develops or persists.

InhalationRemove to fresh air. If symptoms persist, get medical attention.IngestionIf ingestion of a large amount does occur, seek medical attention.

General advice No additional information

#### 5. Fire Fighting Measures

Flammable properties None known.

**Extinguishing media** 

Suitable extinguishing

media

For large fires use very large (flooding) quantities of water and/or foam, applied as a mist or spray. None known.

Unsuitable extinguishing

media

None known.

**Specific methods**None established. **Hazardous combustion**Refer to section 10.

products

Material name: C1823Series[C] MSDS US

#### 6. Accidental Release Measures

**Personal precautions** Wear appropriate personal protective equipment.

Do not let product enter drains. Do not flush into surface water or sanitary sewer system. **Environmental precautions** 

**Methods for containment** Dike the spilled material, where this is possible. Absorb with inert absorbent such as dry clay, sand

or diatomaceous earth, commercial sorbents, or recover using pumps.

Methods for cleaning up

Other information Soak up with inert absorbent material. Slowly vacuum or sweep the material into a bag or other

sealed container. Dispose of in compliance with federal, state, and local regulations. See also

section 13 Disposal considerations.

Soak up with inert absorbent material.

# 7. Handling and Storage

Handling Avoid contact with skin, eyes and clothing.

Keep out of the reach of children. Keep away from excessive heat or cold. Storage

# 8. Exposure Controls / Personal Protection

**Exposure guidelines** Exposure limits have not been established for this product.

**Engineering controls** Use in a well ventilated area. Provide adequate ventilation.

Personal protective equipment

Eye / face protection Not required under intended use.

Skin protection Protected gloves not required under intended use.

Respiratory protection For use other than intended use (such as in the event of a large spill), goggles and respirators may

be required.

**General hygiene** considerations

Handle in accordance with good industrial hygiene and safety practice.

General Use personal protective equipment to minimize exposure to skin and eye.

# 9. Physical & Chemical Properties

**Appearance** Not available.

Color Cyan

Not available. Odor **Odor threshold** Not available.

**Physical state** Liquid

**Form** Not available. 7.8 - 8.6 рH **Melting point** Not available. Freezing point Not available. **Boiling point** Not determined

Flash point 200 °F (93.3 °C) Pensky-Martens Closed Cup

**Evaporation rate** Not determined Flammability limits in air, upper, % by volume

Not available.

Flammability limits in air,

lower, % by volume

Not determined

Not determined Vapor pressure Vapor density Not available. Specific gravity 1 - 1.2

Relative density Not available. Soluble in water Solubility (water) Not available. **Auto-ignition temperature** Not available. **Decomposition temperature** 

**Viscosity** > 2 cp VOC < 347 g/l

Material name: C1823Series[C] MSDS US 3/6 Other information For other VOC regulatory data/information see section 15.

10. Chemical Stability & Reactivity Information

Chemical stability Stable under recommended storage conditions.

**Incompatible materials** Incompatible with strong bases and oxidizing agents.

**Hazardous decomposition** 

products

Upon decomposition, this product may yield gaseous nitrogen oxides, carbon monoxide, carbon

dioxide and/or low molecular weight hydrocarbons.

Possibility of hazardous

reactions

Will not occur.

#### 11. Toxicological Information

Serious eye damage/eye

irritation

Not available.

**Further information** Complete toxicity data are not available for this specific formulation.

Refer to Section 2 for potential health effects and Section 4 for first aid measures.

# 12. Ecological Information

**Ecotoxicity** No information on ecology is available.

**Aquatic toxicity** The product contains a substance which may cause long-term adverse effects in the aquatic

environment.

Persistence and degradability Not available.

#### 13. Disposal Considerations

**Disposal instructions** Dispose of in compliance with federal, state, and local regulations.

#### 14. Transport Information

**Further information** 

Not a dangerous good under DOT, IATA, ADR, IMDG, or RID.

DOT

Not regulated as dangerous goods.

**IATA** 

Not regulated as dangerous goods.

**IMDG** 

Not regulated as dangerous goods.

RID

Not regulated as dangerous goods.

# 15. Regulatory Information

**US federal regulations** US TSCA 12(b): Does not contain listed chemicals.

**DEA Exempt Chemical Mixtures Code Number** 

Not regulated.

Drug Enforcement Administration (DEA). List 1 & 2 Exempt Chemical Mixtures (21 CFR 1310.12(c))

Not regulated.

Drug Enforcement Administration (DEA). List 2, Essential Chemicals (21 CFR 1310.02(b) and 1310.04(f)(2) and **Chemical Code Number** 

Not listed.

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)

No

Not regulated.

# **CERCLA (Superfund) reportable quantity**

Occupational Safety and Health Administration (OSHA)

29 CFR 1910.1200 hazardous chemical

Material name: C1823Series[C] MSDS US 4/6 Superfund Amendments and Reauthorization Act of 1986 (SARA)

**Hazard categories** Immediate Hazard - No

Delayed Hazard - No Fire Hazard - No Pressure Hazard - No Reactivity Hazard - No

Section 302 extremely

hazardous substance

**Section 311 hazardous** 

No

chemical

State regulations

**US. Massachusetts RTK - Substance List** 

2-pyrrolidone (CAS 616-45-5)

**US. New Jersey Worker and Community Right-to-Know Act** 

Not regulated.

**US. Pennsylvania RTK - Hazardous Substances** 

2-pyrrolidone (CAS 616-45-5)

Listed.

**US. Rhode Island RTK** 

Not regulated.

**Regulatory information** 

All chemical substances in this HP product have been notified or are exempt from notification under chemical substances notification laws in the following countries: US (TSCA), EU

(EINECS/ELINCS), Switzerland, Canada (DSL/NDSL), Australia, Japan, Philippines, South Korea,

New Zealand, and China.

16. Other Information

Other information This MSDS was prepared in accordance with USA OSHA Hazard Communications regulation (29

CFR 1910.1200).

**HMIS® ratings** Health: 1

Flammability: 1 Physical hazard: 0

NFPA ratings Health: 1

Flammability: 1 Instability: 0

**Disclaimer** This Safety Data Sheet document is provided without charge to customers of Hewlett-Packard

Company. Data is the most current known to Hewlett-Packard Company at the time of preparation of this document and is believed to be accurate. It should not be construed as guaranteeing specific properties of the products as described or suitability for a particular application. This document was prepared to the requirements of the jurisdiction specified in Section 1 above and

5/6

may not meet regulatory requirements in other countries.

**Issue date** 24-Oct-2012

This data sheet contains changes from the previous version in section(s):

Composition / Information on Ingredients: Disclosure Overrides

Fire Fighting Measures: Suitable extinguishing media
 Physical & Chemical Properties: Other information
 Disposal Considerations: Disposal instructions
 Transport Information: Further information

**Manufacturer information**Hewlett-Packard Company 3000 Hanover Street

Palo Alto, California 94304-1112 US

(Direct) 1-503-494-7199

(Toll-free within the US) 1-800-457-4209

Material name: C1823Series[C] MSDS US

#### **Explanation of abbreviations**

**ACGIH** American Conference of Governmental Industrial Hygienists

**CAS** Chemical Abstracts Service

CERCLA Comprehensive Environmental Response Compensation and Liability Act

**CFR** Code of Federal Regulations

**COC** Cleveland Open Cup

**DOT** Department of Transportation

**EPCRA** Emergency Planning and Community Right-to-Know Act (aka SARA)

IARC International Agency for Research on Cancer

NIOSH National Institute for Occupational Safety and Health

NTP National Toxicology Program

**OSHA** Occupational Safety and Health Administration

**PEL** Permissible Exposure Limit

**RCRA** Resource Conservation and Recovery Act

**REC** Recommended

**REL** Recommended Exposure Limit

**SARA** Superfund Amendments and Reauthorization Act of 1986

**STEL** Short-Term Exposure Limit

**TCLP** Toxicity Characteristics Leaching Procedure

**TLV** Threshold Limit Value

TSCA Toxic Substances Control Act VOC Volatile Organic Compounds

Material name: C1823Series[C]



# MATERIAL SAFETY DATA SHEET

# 1. Product and Company Identification

Identification of the

preparation

C1823Series[M]

Version # 04

Revision date 24-Oct-2012 CAS # Mixture

**Company identification** Hewlett-Packard Company

3000 Hanover Street Palo Alto, CA 94304-1185

**United States** 

Telephone 650-857-1501

Hewlett-Packard health effects line (Toll-free within the US) 1-800-457-4209

(Direct) 1-503-494-7199 HP Customer Care Line

(Toll-free within the US) 1-800-474-6836

(Direct) 1-208-323-2551

Email: hpcustomer.inquiries@hp.com

#### 2. Hazards Identification

**Emergency overview** Contact with skin and eyes may result in irritation.

Causes skin irritation.

**Acute health effects** 

Any potential hazards are presumed to be due to exposure to the components.

**Skin contact** *1,5-pentanediol* 

Contact with skin may result in irritation.

2-pyrrolidone

Contact with skin may result in irritation.

Alkyldiol ethoxylate

Contact with skin may result in severe irritation.

Ethyl alkyldiol

Contact with skin may result in mild irritation.

Magenta Colorant

May cause sensitization by skin contact.

Metal nitrate # 2

Contact with skin may result in irritation.

**Eye contact** *1,5-pentanediol* 

Contact with eyes may result in irritation.

2-pyrrolidone

Contact with eyes may result in irritation.

Alkyldiol ethoxylate

Contact can cause moderate to severe irritation and possible injury to the eyes.

Ethyl alkyldiol

Contact with eyes may result in mild irritation.

Magenta Colorant

Risk of serious damage to eyes.

Metal nitrate # 2

Contact with eyes may result in irritation.

Material name: C1823Series[M] MSDS US

**Inhalation** *2-pyrrolidone* 

Inhalation may result in respiratory irritation.

Metal nitrate # 2

Inhalation may result in respiratory irritation.

**Ingestion** 2-pyrrolidone

Ingestion may result in nausea, vomiting and diarrhea.

Alkyldiol ethoxylate

Ingestion may cause irritation of mouth, throat, nausea, vomiting and diarrhea.

Metal nitrate # 2

Contains nitrate salts, may cause methemoglobinemia.

**Potential health effects** 

**Routes of exposure** Potential routes of overexposure to this product are skin and eye contact

Inhalation of vapor and ingestion are not expected to be significant routes of exposure for this

product under normal use conditions.

Complete toxicity data are not available for this specific formulation

**Carcinogenicity**None of the components present in this formulation at concentrations equal to or greater than

0.1% are listed by EU, MAK, IARC, NTP or OSHA.

# 3. Composition / Information on Ingredients

CAS #	Percent
111-29-5	< 10
616-45-5	< 10
Proprietary	< 2.5
Proprietary	< 10
Proprietary	< 5
Proprietary	< 7.5
7732-18-5	> 60
	111-29-5 616-45-5 Proprietary Proprietary Proprietary Proprietary

Composition comments

This ink supply contains an aqueous ink formulation.

This product has been evaluated using criteria specified in 29 CFR 1910.1200 (Hazard

Communication Standard).

#### 4. First Aid Measures

First aid procedures

**Eye contact** Do not rub eyes. Immediately flush with large amounts of clean, warm water (low pressure) for at

least 15 minutes or until particles are removed. If irritation persists get medical attention.

**Skin contact** Wash affected areas thoroughly with mild soap and water. Get medical attention if irritation

develops or persists.

InhalationRemove to fresh air. If symptoms persist, get medical attention.IngestionIf ingestion of a large amount does occur, seek medical attention.

General advice No additional information

#### 5. Fire Fighting Measures

Flammable properties

None known.

Extinguishing media

Suitable extinguishing media

For small (incipient) fires, use media such as foam, sand, dry chemical, or carbon dioxide.

For large fires use very large (flooding) quantities of water and/or foam, applied as a mist or spray.

Unsuitable extinguishing

media

None known.

**Specific methods**None established. **Hazardous combustion**Refer to section 10.

products

Material name: C1823Series[M] MSDS US

#### 6. Accidental Release Measures

**Personal precautions** Wear appropriate personal protective equipment.

Do not let product enter drains. Do not flush into surface water or sanitary sewer system. **Environmental precautions** 

**Methods for containment** Dike the spilled material, where this is possible. Absorb with inert absorbent such as dry clay, sand

or diatomaceous earth, commercial sorbents, or recover using pumps.

Methods for cleaning up

Soak up with inert absorbent material.

Other information Soak up with inert absorbent material. Slowly vacuum or sweep the material into a bag or other

sealed container. Dispose of in compliance with federal, state, and local regulations. See also

section 13 Disposal considerations.

# 7. Handling and Storage

Handling Avoid contact with skin, eyes and clothing.

Keep out of the reach of children. Keep away from excessive heat or cold. Storage

# 8. Exposure Controls / Personal Protection

**Exposure guidelines** Exposure limits have not been established for this product.

**Engineering controls** Use in a well ventilated area. Provide adequate ventilation.

Personal protective equipment

Eye / face protection Not required under intended use.

Skin protection Protected gloves not required under intended use.

Respiratory protection For use other than intended use (such as in the event of a large spill), goggles and respirators may

be required.

**General hygiene** considerations

Handle in accordance with good industrial hygiene and safety practice.

General Use personal protective equipment to minimize exposure to skin and eye.

# 9. Physical & Chemical Properties

**Appearance** Not available. Color Magenta Not available. Odor **Odor threshold** Not available.

**Physical state** Liquid **Form** Liquid. 7.8 - 8.6 рH **Melting point** Not available. Freezing point Not available. **Boiling point** Not determined

200 °F (93.3 °C) Pensky-Martens Closed Cup Flash point

**Evaporation rate** Not determined Flammability limits in air, upper, % by volume

Not available.

Flammability limits in air,

lower, % by volume

Not determined

Not determined Vapor pressure Vapor density Not available.

Specific gravity 1 - 1.2

Relative density Not available. Soluble in water Solubility (water) **Auto-ignition temperature** Not available. Not available. **Decomposition temperature** 

**Viscosity** 2 cp VOC < 347 g/l

Material name: C1823Series[M] MSDS US Other information For other VOC regulatory data/information see section 15.

# 10. Chemical Stability & Reactivity Information

Chemical stability Stable under recommended storage conditions.

Incompatible materials Incompatible with strong bases and oxidizing agents.

**Hazardous decomposition** 

products

Upon decomposition, this product may yield gaseous nitrogen oxides, carbon monoxide, carbon

dioxide and/or low molecular weight hydrocarbons.

Possibility of hazardous

reactions

Will not occur.

#### 11. Toxicological Information

Serious eye damage/eye

irritation

Not available.

**Further information** Complete toxicity data are not available for this specific formulation.

Refer to Section 2 for potential health effects and Section 4 for first aid measures.

# 12. Ecological Information

**Ecotoxicity** No information on ecology is available. **Aquatic toxicity** No data available for this product.

Persistence and degradability Not available.

#### 13. Disposal Considerations

**Disposal instructions** Dispose of in compliance with federal, state, and local regulations.

> HP's Planet Partners (trademark) supplies recycling program enables simple, convenient recycling of HP original inkiet and LaserJet supplies. For more information and to determine if this service

is available in your location, please visit http://www.hp.com/recycle.

#### 14. Transport Information

Not a dangerous good under DOT, IATA, ADR, IMDG, or RID. **Further information** 

DOT

Not regulated as dangerous goods.

**IATA** 

Not regulated as dangerous goods.

**IMDG** 

Not regulated as dangerous goods.

RID

Not regulated as dangerous goods.

#### 15. Regulatory Information

**US federal regulations** US TSCA 12(b): Does not contain listed chemicals.

**DEA Exempt Chemical Mixtures Code Number** 

Not regulated.

Drug Enforcement Administration (DEA). List 1 & 2 Exempt Chemical Mixtures (21 CFR 1310.12(c))

Not regulated.

Drug Enforcement Administration (DEA). List 2, Essential Chemicals (21 CFR 1310.02(b) and 1310.04(f)(2) and **Chemical Code Number** 

Not listed.

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)

Not regulated.

#### **CERCLA (Superfund) reportable quantity**

Occupational Safety and Health Administration (OSHA)

29 CFR 1910.1200 No hazardous chemical

Material name: C1823Series[M] MSDS US 4/6

Superfund Amendments and Reauthorization Act of 1986 (SARA)

**Hazard categories** Immediate Hazard - No

Delayed Hazard - No Fire Hazard - No Pressure Hazard - No Reactivity Hazard - No

Section 302 extremely

hazardous substance

Section 311 hazardous

No

chemical

State regulations

**US. Massachusetts RTK - Substance List** 

2-pyrrolidone (CAS 616-45-5)

**US. New Jersey Worker and Community Right-to-Know Act** 

Not regulated.

**US. Pennsylvania RTK - Hazardous Substances** 

2-pyrrolidone (CAS 616-45-5) Listed.

**US. Rhode Island RTK** 

Not regulated.

**Regulatory information** All chemical substances in this HP product have been notified or are exempt from notification

under chemical substances notification laws in the following countries: US (TSCA), EU

(EINECS/ELINCS), Switzerland, Canada (DSL/NDSL), Australia, Japan, Philippines, South Korea,

New Zealand, and China.

**Other information** VOC content (less water, less exempt compounds) = <1231 q/L (U.S. requirement, not for

emissions)

VOC data based on formulation (Organic compounds minus solids)

16. Other Information

Other information This MSDS was prepared in accordance with USA OSHA Hazard Communications regulation (29

CFR 1910.1200).

**HMIS**® ratings Health: 1

Flammability: 1 Physical hazard: 0

NFPA ratings Health: 1

Flammability: 1 Instability: 0

**Disclaimer** This Safety Data Sheet document is provided without charge to customers of Hewlett-Packard

Company. Data is the most current known to Hewlett-Packard Company at the time of preparation of this document and is believed to be accurate. It should not be construed as guaranteeing specific properties of the products as described or suitability for a particular application. This document was prepared to the requirements of the jurisdiction specified in Section 1 above and

may not meet regulatory requirements in other countries.

Issue date 24-Oct-2012

This data sheet contains changes from the previous version in section(s):

Composition / Information on Ingredients: Disclosure Overrides

5. Fire Fighting Measures: Suitable extinguishing media 9. Physical & Chemical Properties: Other information 14. Transport Information: Further information

15. Regulatory Information: Other information

**Manufacturer information** Hewlett-Packard Company

3000 Hanover Street

Palo Alto, California 94304-1112 US

(Direct) 1-503-494-7199

(Toll-free within the US) 1-800-457-4209

Material name: C1823Series[M] MSDS US

#### **Explanation of abbreviations**

**ACGIH** American Conference of Governmental Industrial Hygienists

**CAS** Chemical Abstracts Service

CERCLA Comprehensive Environmental Response Compensation and Liability Act

**CFR** Code of Federal Regulations

**COC** Cleveland Open Cup

**DOT** Department of Transportation

**EPCRA** Emergency Planning and Community Right-to-Know Act (aka SARA)

IARC International Agency for Research on Cancer

NIOSH National Institute for Occupational Safety and Health

NTP National Toxicology Program

**OSHA** Occupational Safety and Health Administration

**PEL** Permissible Exposure Limit

**RCRA** Resource Conservation and Recovery Act

**REC** Recommended

**REL** Recommended Exposure Limit

**SARA** Superfund Amendments and Reauthorization Act of 1986

**STEL** Short-Term Exposure Limit

**TCLP** Toxicity Characteristics Leaching Procedure

**TLV** Threshold Limit Value

TSCA Toxic Substances Control Act
VOC Volatile Organic Compounds

Material name: C1823Series[M] MSDS US



# MATERIAL SAFETY DATA SHEET

# 1. Product and Company Identification

Identification of the

preparation

C1823Series[Y]

Version # 04

Revision date 24-Oct-2012
CAS # Mixture

**Company identification** Hewlett-Packard Company

3000 Hanover Street Palo Alto, CA 94304-1185

**United States** 

Telephone 650-857-1501

Hewlett-Packard health effects line (Toll-free within the US) 1-800-457-4209

(Direct) 1-503-494-7199 HP Customer Care Line

(Toll-free within the US) 1-800-474-6836

(Direct) 1-208-323-2551

Email: hpcustomer.inquiries@hp.com

# 2. Hazards Identification

**Emergency overview** Contact with skin and eyes may result in irritation.

Causes skin irritation.

**Acute health effects** 

Any potential hazards are presumed to be due to exposure to the components.

**Skin contact** *2-pyrrolidone* 

Contact with skin may result in irritation.

Alkyldiol ethoxylate

Contact with skin may result in severe irritation.

Ethyl alkyldiol

Contact with skin may result in mild irritation.

Metal nitrate # 1

Contact with skin may result in irritation.

**Eye contact** *2-pyrrolidone* 

Contact with eyes may result in irritation.

Alkyldiol ethoxylate

Contact can cause moderate to severe irritation and possible injury to the eyes.

Ethyl alkyldiol

Contact with eyes may result in mild irritation.

Metal nitrate # 1

Contact with eyes may result in irritation.

**Inhalation** *2-pyrrolidone* 

Inhalation may result in respiratory irritation.

Metal nitrate # 1

Inhalation may result in respiratory irritation.

Material name: C1823Series[Y] MSDS US

**Ingestion** 2-pyrrolidone

Ingestion may result in nausea, vomiting and diarrhea.

Alkyldiol ethoxylate

Ingestion may cause irritation of mouth, throat, nausea, vomiting and diarrhea.

Diethylene glycol

Harmful if swallowed. May cause kidney and liver damage. May depress the central nervous

system.

Metal nitrate # 1

Contains nitrate salts, may cause methemoglobinemia.

Yellow Colorant
Toxic if swallowed.

**Potential health effects** 

**Routes of exposure** Potential routes of overexposure to this product are skin and eye contact

Inhalation of vapor and ingestion are not expected to be significant routes of exposure for this

product under normal use conditions.

Complete toxicity data are not available for this specific formulation

**Chronic health effects** Cvan ink:

Substituted phthalocyanine salt: Prolonged ingestion exposure may cause serious damage to

health.

Yellow ink:

Arylazopyrazolesulfonate salt: Prolonged ingestion exposure may cause serious damage to

health.

**Carcinogenicity**None of the components present in this formulation at concentrations equal to or greater than

0.1% are listed by EU, MAK, IARC, NTP or OSHA.

3. Composition /	information on ingredients
C	

Components	CAS #	Percent
2-pyrrolidone	616-45-5	< 5
Alkyldiol ethoxylate	Proprietary	< 2.5
Diethylene glycol	111-46-6	< 5
Ethyl alkyldiol	Proprietary	< 10
Metal nitrate # 1	Proprietary	< 7.5
Water	7732-18-5	> 70
Yellow Colorant	Proprietary	< 5

**Composition comments** This ink supply contains an agueous ink formulation.

This product has been evaluated using criteria specified in 29 CFR 1910.1200 (Hazard

Communication Standard).

#### 4. First Aid Measures

First aid procedures

**Eye contact** Do not rub eyes. Immediately flush with large amounts of clean, warm water (low pressure) for at

least 15 minutes or until particles are removed. If irritation persists get medical attention.

**Skin contact** Wash affected areas thoroughly with mild soap and water. Get medical attention if irritation

develops or persists.

InhalationRemove to fresh air. If symptoms persist, get medical attention.IngestionIf ingestion of a large amount does occur, seek medical attention.

**General advice** No additional information

#### 5. Fire Fighting Measures

Flammable properties None known.

Material name: C1823Series[Y] MSDS US

**Extinguishing media** 

Suitable extinguishing

media

For small (incipient) fires, use media such as foam, sand, dry chemical, or carbon dioxide. For large fires use very large (flooding) quantities of water and/or foam, applied as a mist or spray.

Unsuitable extinguishing

media

None known.

Specific methods **Hazardous combustion** 

products

None established. Refer to section 10.

#### 6. Accidental Release Measures

Personal precautions

Wear appropriate personal protective equipment.

**Environmental precautions Methods for containment** 

Do not let product enter drains. Do not flush into surface water or sanitary sewer system. Dike the spilled material, where this is possible. Absorb with inert absorbent such as dry clay, sand

or diatomaceous earth, commercial sorbents, or recover using pumps.

Methods for cleaning up

Other information

Soak up with inert absorbent material.

Soak up with inert absorbent material. Slowly vacuum or sweep the material into a bag or other sealed container. Dispose of in compliance with federal, state, and local regulations. See also

section 13 Disposal considerations.

# 7. Handling and Storage

Handling Avoid contact with skin, eyes and clothing.

Keep out of the reach of children. Keep away from excessive heat or cold. Storage

#### 8. Exposure Controls / Personal Protection

#### **Occupational exposure limits**

**U.S. - WEEL** 

Components	Туре	Value
Diethylene glycol (111-46-6)	TWA	10.0000 mg/m3

Exposure limits have not been established for this product. **Exposure guidelines** 

**Engineering controls** 

Use in a well ventilated area. Provide adequate ventilation.

Personal protective equipment

Eye / face protection

Not required under intended use.

Skin protection

Protected gloves not required under intended use.

**Respiratory protection** 

For use other than intended use (such as in the event of a large spill), goggles and respirators may

be required.

**General hygiene** considerations

Handle in accordance with good industrial hygiene and safety practice.

General Use personal protective equipment to minimize exposure to skin and eye.

# 9. Physical & Chemical Properties

**Appearance** Liquid. Color Yellow

Odor Not available. **Odor threshold** Not available.

**Physical state** Liquid

**Form** Not available. 7.8 - 8.6Ha **Melting point** Not available. Freezing point Not available. **Boiling point** Not determined

200 °F (93.3 °C) Pensky-Martens Closed Cup Flash point

Not determined **Evaporation rate** 

Material name: C1823Series[Y] MSDS US Flammability limits in air, upper, % by volume

Not available.

Flammability limits in air,

lower, % by volume

Not determined

Vapor pressure Not determined Vapor density Not available.

Specific gravity 1 - 1.2

**Relative density** Not available. Soluble in water Solubility (water) Not available. **Auto-ignition temperature Decomposition temperature** Not available.

**Viscosity** 2 cp VOC < 287 g/l

Other information For other VOC regulatory data/information see section 15.

# 10. Chemical Stability & Reactivity Information

Chemical stability Stable under recommended storage conditions. **Incompatible materials** Incompatible with strong bases and oxidizing agents.

**Hazardous decomposition** 

products

Upon decomposition, this product may yield gaseous nitrogen oxides, carbon monoxide, carbon

dioxide and/or low molecular weight hydrocarbons.

**Possibility of hazardous** 

reactions

Will not occur.

#### 11. Toxicological Information

Serious eye damage/eye

irritation

Not available.

**Further information** Complete toxicity data are not available for this specific formulation.

Refer to Section 2 for potential health effects and Section 4 for first aid measures.

# 12. Ecological Information

No information on ecology is available. **Ecotoxicity** No data available for this product. **Aquatic toxicity** 

Persistence and degradability Not available.

#### 13. Disposal Considerations

**Disposal instructions** Dispose of in compliance with federal, state, and local regulations.

> HP's Planet Partners (trademark) supplies recycling program enables simple, convenient recycling of HP original inkjet and LaserJet supplies. For more information and to determine if this service

is available in your location, please visit http://www.hp.com/recycle.

#### 14. Transport Information

**Further information** Not a dangerous good under DOT, IATA, ADR, IMDG, or RID.

**DOT** 

Not regulated as dangerous goods.

**IATA** 

Not regulated as dangerous goods.

Not regulated as dangerous goods.

**RID** 

Not regulated as dangerous goods.

# 15. Regulatory Information

**US federal regulations** US TSCA 12(b): Does not contain listed chemicals.

#### **DEA Exempt Chemical Mixtures Code Number**

Not regulated.

Material name: C1823Series[Y] MSDS US

#### Drug Enforcement Administration (DEA). List 1 & 2 Exempt Chemical Mixtures (21 CFR 1310.12(c))

Not regulated.

Drug Enforcement Administration (DEA). List 2, Essential Chemicals (21 CFR 1310.02(b) and 1310.04(f)(2) and Chemical Code Number

Not listed.

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)

Not regulated.

#### **CERCLA (Superfund) reportable quantity**

None

Occupational Safety and Health Administration (OSHA)

**29 CFR 1910.1200** No

hazardous chemical

Superfund Amendments and Reauthorization Act of 1986 (SARA)

**Hazard categories** Immediate Hazard - No

Delayed Hazard - No Fire Hazard - No Pressure Hazard - No Reactivity Hazard - No

Section 302 extremely hazardous substance

No

**Section 311 hazardous** 

Nο

chemical

State regulations

**US. Massachusetts RTK - Substance List** 

2-pyrrolidone (CAS 616-45-5)

**US. New Jersey Worker and Community Right-to-Know Act** 

Not regulated.

**US. Pennsylvania RTK - Hazardous Substances** 

2-pyrrolidone (CAS 616-45-5) Listed. Diethylene glycol (CAS 111-46-6) Listed.

**US. Rhode Island RTK** 

Diethylene glycol (CAS 111-46-6)

**Regulatory information** All chemical substances in this HP product have been notified or are exempt from notification

under chemical substances notification laws in the following countries: US (TSCA), EU

(EINECS/ELINCS), Switzerland, Canada (DSL/NDSL), Australia, Japan, Philippines, South Korea,

New Zealand, and China.

**Other information** VOC content (less water, less exempt compounds) = <1320 g/L (U.S. requirement, not for

emissions)

VOC data based on formulation (Organic compounds minus solids)

16. Other Information

Other information This MSDS was prepared in accordance with USA OSHA Hazard Communications regulation (29

CFR 1910.1200).

**HMIS**® ratings Health: 1

Flammability: 1 Physical hazard: 0

NFPA ratings Health: 1

Flammability: 1 Instability: 0

**Disclaimer** This Safety Data Sheet document is provided without charge to customers of Hewlett-Packard

Company. Data is the most current known to Hewlett-Packard Company at the time of preparation of this document and is believed to be accurate. It should not be construed as guaranteeing specific properties of the products as described or suitability for a particular application. This document was prepared to the requirements of the jurisdiction specified in Section 1 above and

may not meet regulatory requirements in other countries.

**Issue date** 24-Oct-2012

Material name: C1823Series[Y] MSDS US

This data sheet contains changes from the previous version in section(s):

Composition / Information on Ingredients: Disclosure Overrides 5. Fire Fighting Measures: Suitable extinguishing media

9. Physical & Chemical Properties: Other information14. Transport Information: Further information15. Regulatory Information: Other information

 Manufacturer information
 Hewlett-Packard Company

3000 Hanover Street

Palo Alto, California 94304-1112 US

(Direct) 1-503-494-7199

(Toll-free within the US) 1-800-457-4209

# **Explanation of abbreviations**

**ACGIH** American Conference of Governmental Industrial Hygienists

**CAS** Chemical Abstracts Service

CERCLA Comprehensive Environmental Response Compensation and Liability Act

CFR Code of Federal Regulations

**COC** Cleveland Open Cup

**DOT** Department of Transportation

**EPCRA** Emergency Planning and Community Right-to-Know Act (aka SARA)

IARC International Agency for Research on Cancer

NIOSH National Institute for Occupational Safety and Health

NTP National Toxicology Program

**OSHA** Occupational Safety and Health Administration

**PEL** Permissible Exposure Limit

**RCRA** Resource Conservation and Recovery Act

**REC** Recommended

**REL** Recommended Exposure Limit

**SARA** Superfund Amendments and Reauthorization Act of 1986

**STEL** Short-Term Exposure Limit

**TCLP** Toxicity Characteristics Leaching Procedure

**TLV** Threshold Limit Value

TSCA Toxic Substances Control Act
VOC Volatile Organic Compounds

Material name: C1823Series[Y] MSDS US

6/6