



Page 1 of 10 Revision date: 11-Nov-2016 Version: 1.1

# IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND THE COMPANY/UNDERTAKING

**Product Identifier** 

Material Name: Bupivacaine Hydrochloride Injection (Hospira, Inc.)

**Trade Name: Bupivacaine Injection** 

Bupivacaine Spinal (Bupivacine in Dextrose, USP) Synonyms:

Not determined **Chemical Family:** 

Relevant Identified Uses of the Substance or Mixture and Uses Advised Against

Intended Use: Pharmaceutical product used as anesthetic agent

Details of the Supplier of the Safety Data Sheet

Pfizer Inc **Pfizer Pharmaceuticals Group** 235 East 42nd Street New York, New York 10017

1-800-879-3477

**Emergency telephone number:** CHEMTREC (24 hours): 1-800-424-9300 pfizer-MSDS@pfizer.com **Contact E-Mail:** 

Pfizer Ltd Ramsgate Road Sandwich, Kent **CT13 9NJ United Kingdom** 

+00 44 (0)1304 616161 **Emergency telephone number:** 

International CHEMTREC (24 hours): +1-703-527-3887

# 2. HAZARDS IDENTIFICATION

Classification of the Substance or Mixture **GHS - Classification** 

Acute Oral Toxicity: Category 4

**Label Elements** 

Signal Word: Warning

**Hazard Statements:** H302 - Harmful if swallowed

P264 - Wash hands thoroughly after handling **Precautionary Statements:** 

P270 - Do not eat, drink or smoke when using this product

P301+ P312 - IF SWALLOWED: Call a POISON CENTRE or doctor/physician if you feel

unwell

P330 - Rinse mouth

P501 - Dispose of contents/container in accordance with all local and national regulations

Material Name: Bupivacaine Hydrochloride Injection (Hospira, Page 2 of 10

Inc.)

Revision date: 11-Nov-2016 Version: 1.1



Other Hazards An Occupational Exposure Value has been established for one or more of the ingredients (see

Section 8).

**Note:** This document has been prepared in accordance with standards for workplace safety, which

requires the inclusion of all known hazards of the product or its ingredients regardless of the potential risk. The precautionary statements and warning included may not apply in all cases.

Your needs may vary depending upon the potential for exposure in your workplace.

## 3. COMPOSITION / INFORMATION ON INGREDIENTS

#### **Hazardous**

Ingredient	CAS Number	EU EINECS/ELINCS List	GHS Classification	%
Bupivacaine Hydrochloride	14252-80-3	Not Listed	Acute Tox. 2 (H300)	= 0.75</td
HYDROCHLORIC ACID	7647-01-0	231-595-7	Skin Corr.1B (H314) STOT SE 3 (H335)	**
SODIUM HYDROXIDE	1310-73-2	215-185-5	Skin Corr. 1A (H314)	**

Ingredient	CAS Number	EU EINECS/ELINCS List	GHS Classification	%
Methylparaben	99-76-3	202-785-7	Not Listed	*
Dextrose	14431-43-7	Not Listed	Not Listed	*

Additional Information: \* Proprietary

Ingredient(s) indicated as hazardous have been assessed under standards for workplace

safety.

In accordance with 29 CFR 1910.1200, the exact percentage composition of this mixture has

been withheld as a trade secret.

### For the full text of the CLP/GHS abbreviations mentioned in this Section, see Section 16

## 4. FIRST AID MEASURES

**Description of First Aid Measures** 

**Eye Contact:** Flush with water while holding eyelids open for at least 15 minutes. Seek medical attention

immediately.

**Skin Contact:** Remove contaminated clothing. Flush area with large amounts of water. Use soap. Seek

medical attention.

**Ingestion:** Never give anything by mouth to an unconscious person. Wash out mouth with water. Do not

induce vomiting unless directed by medical personnel. Seek medical attention immediately.

**Inhalation:** Remove to fresh air and keep patient at rest. Seek medical attention immediately.

Material Name: Bupivacaine Hydrochloride Injection (Hospira, Page 3 of 10

Inc.)

Revision date: 11-Nov-2016 Version: 1.1

Most Important Symptoms and Effects, Both Acute and Delayed

Symptoms and Effects of For information on potential signs and symptoms of exposure, See Section 2 - Hazards

**Exposure:** Identification and/or Section 11 - Toxicological Information.

Medical Conditions None known

Aggravated by Exposure:

Indication of the Immediate Medical Attention and Special Treatment Needed

Notes to Physician: None

### 5. FIRE FIGHTING MEASURES

**Extinguishing Media:** Extinguish fires with CO2, extinguishing powder, foam, or water.

Special Hazards Arising from the Substance or Mixture

Hazardous Combustion Formation of toxic gases is possible during heating or fire.

Products:

Fire / Explosion Hazards: Not flammable.

Advice for Fire-Fighters

During all fire fighting activities, wear appropriate protective equipment, including self-contained breathing apparatus.

### 6. ACCIDENTAL RELEASE MEASURES

### Personal Precautions, Protective Equipment and Emergency Procedures

Personnel involved in clean-up should wear appropriate personal protective equipment (see Section 8). Minimize exposure.

### **Environmental Precautions**

Place waste in an appropriately labeled, sealed container for disposal. Care should be taken to avoid environmental release.

## Methods and Material for Containment and Cleaning Up

Measures for Cleaning / Contain the source of spill if it is safe to do so. Collect spill with absorbent material. Clean spill

**Collecting:** area thoroughly.

**Additional Consideration for** 

Large Spills:

Contain the source of the spill or leak if it is safe to do so. Collect spill with a non-combustible

absorbent material and transfer to labeled container for disposal.

## 7. HANDLING AND STORAGE

#### **Precautions for Safe Handling**

Avoid breathing vapor or mist. Avoid contact with eyes, skin and clothing. When handling, use appropriate personal protective equipment (see Section 8). Wash thoroughly after handling. Releases to the environment should be avoided. Review and implement appropriate technical and procedural waste water and waste disposal measures to prevent occupational exposure or environmental releases. Potential points of process emissions of this material to the atmosphere should be controlled with dust collectors, HEPA filtration systems or other equivalent controls.

### Conditions for Safe Storage, Including any Incompatibilities

Storage Conditions: Store as directed by product packaging.

Specific end use(s): Pharmaceutical drug product

## 8. EXPOSURE CONTROLS / PERSONAL PROTECTION

### **Control Parameters**

Refer to available public information for specific member state Occupational Exposure Limits.

\_\_\_\_\_

Material Name: Bupivacaine Hydrochloride Injection (Hospira, Page 4 of 10

Inc.)

Revision date: 11-Nov-2016 Version: 1.1

# 8. EXPOSURE CONTROLS / PERSONAL PROTECTION

**Bupivacaine Hydrochloride** 

Pfizer OEL TWA-8 Hr:  $20 \mu g/m^{3}$ 

HYDROCHLORIC ACID

**ACGIH Ceiling Threshold Limit:** 2 ppm Australia PEAK 5 ppm 7.5 mg/m<sup>3</sup> **Austria OEL - MAKs** 5 ppm 8 mg/m<sup>3</sup> **Belgium OEL - TWA** 5 ppm 8 mg/m<sup>3</sup> **Bulgaria OEL - TWA** 5 ppm 8.0 mg/m<sup>3</sup> **Cyprus OEL - TWA** 5 ppm 8 mg/m<sup>3</sup> Czech Republic OEL - TWA 8 mg/m<sup>3</sup> Estonia OEL - TWA 5 ppm 8 mg/m<sup>3</sup> 2 ppm Germany - TRGS 900 - TWAs  $3 \text{ mg/m}^3$ 2 ppm Germany (DFG) - MAK

3.0 mg/m<sup>3</sup> **Greece OEL - TWA** 5 ppm 7 mg/m<sup>3</sup>

**Hungary OEL - TWA** 8 mg/m<sup>3</sup> Ireland OEL - TWAs 5 ppm  $8 \text{ mg/m}^3$ 

**Italy OEL - TWA** 5 ppm 8 mg/m<sup>3</sup> Japan - OELs - Ceilings 2 ppm 3.0 mg/m<sup>3</sup>

Latvia OEL - TWA 5 ppm  $8 \text{ mg/m}^3$ Lithuania OEL - TWA 5 ppm  $8 \text{ mg/m}^3$ 

**Luxembourg OEL - TWA** 5 ppm  $8 \text{ mg/m}^3$ Malta OEL - TWA 5 ppm

8 mg/m<sup>3</sup> 8 mg/m<sup>3</sup> **Netherlands OEL - TWA** 5 mg/m<sup>3</sup> **Poland OEL - TWA** 5 ppm Portugal OEL - TWA 8 mg/m<sup>3</sup>

Romania OEL - TWA 5 ppm 8 mg/m<sup>3</sup>

Slovakia OEL - TWA 5 ppm 8.0 mg/m<sup>3</sup> Slovenia OEL - TWA

5 ppm 8 mg/m<sup>3</sup> Spain OEL - TWA 5 ppm

7.6 mg/m<sup>3</sup>

Material Name: Bupivacaine Hydrochloride Injection (Hospira, Page 5 of 10

Inc.)

Revision date: 11-Nov-2016 Version: 1.1

# 8. EXPOSURE CONTROLS / PERSONAL PROTECTION

 Switzerland OEL -TWAs
 2 ppm

 3.0 mg/m³
 5 mg/m³

**SODIUM HYDROXIDE** 

**ACGIH Ceiling Threshold Limit:** 2 mg/m<sup>3</sup> 2 mg/m<sup>3</sup> **Australia PEAK** Austria OEL - MAKs 2 mg/m<sup>3</sup> **Bulgaria OEL - TWA** 2.0 mg/m<sup>3</sup>  $1 \text{ mg/m}^3$ Czech Republic OEL - TWA Estonia OEL - TWA  $1 \text{ mg/m}^3$ France OEL - TWA 2 ma/m<sup>3</sup> **Greece OEL - TWA** 2 mg/m<sup>3</sup>  $2 \text{ mg/m}^3$ **Hungary OEL - TWA** Japan - OELs - Ceilings  $2 \text{ mg/m}^3$ Latvia OEL - TWA 0.5 mg/m<sup>3</sup> **OSHA - Final PELS - TWAs:** 2 mg/m<sup>3</sup> Poland OEL - TWA 0.5 mg/m<sup>3</sup> Slovakia OEL - TWA 2 mg/m<sup>3</sup> Slovenia OEL - TWA  $2 \text{ mg/m}^3$  $1 \text{ mg/m}^3$ Sweden OEL - TWAs **Switzerland OEL -TWAs** 2 mg/m<sup>3</sup>

**Exposure Controls** 

Engineering Controls: Engineering controls should be used as the primary means to control exposures. General

room ventilation is adequate unless the process generates dust, mist or fumes. Keep airborne

contamination levels below the exposure limits listed above in this section.

Personal Protective Refer to

Equipment:

Refer to applicable national standards and regulations in the selection and use of personal protective equipment (PPE). Contact your safety and health professional or safety equipment supplier for assistance in selecting the correct protective clothing/equipment based on an assessment of the workplace conditions, other chemicals used or present in the workplace and

specific operational processes.

Hands: Impervious gloves (e.g. Nitrile, etc.) are recommended if skin contact with drug product is

possible and for bulk processing operations. (Protective gloves must meet the standards in

accordance with EN374, ASTM F1001 or international equivalent.)

**Eyes:** Wear safety glasses or goggles if eye contact is possible. (Eye protection must meet the

standards in accordance with EN166, ANSI Z87.1 or international equivalent.)

Skin: Impervious protective clothing is recommended if skin contact with drug product is possible and

for bulk processing operations. (Protective clothing must meet the standards in accordance

with EN13982, ANSI 103 or international equivalent.)

Respiratory protection: Under normal conditions of use, if the applicable Occupational Exposure Limit (OEL) is

exceeded, wear an appropriate respirator with a protection factor sufficient to control exposures to below the OEL (e.g. particulate respirator with a half mask, P3 filter). (Respirators must meet the standards in accordance with EN140. EN143. ASTM F2704-10 or international

equivalent.)

**Molecular Weight:** 

Mixture

Material Name: Bupivacaine Hydrochloride Injection (Hospira, Page 6 of 10

Inc.)

Revision date: 11-Nov-2016 Version: 1.1

# 9. PHYSICAL AND CHEMICAL PROPERTIES

Physical State:SolutionColor:Clear, colorlessOdor:No data available.Odor Threshold:No data available.

Molecular Formula: Mixture

Solvent Solubility:
Water Solubility:
PH:
No data available
Partition Coefficient: (Method, pH, Endpoint, Value)

Water for injection No data available Sodium chloride No data available

**Bupivacaine Hydrochloride** 

No data available

**Dextrose** 

No data available

HYDROCHLORIC ACID

No data available

**SODIUM HYDROXIDE** 

No data available **Methylparaben** No data available

**Decomposition Temperature (°C):** No data available.

Evaporation Rate (Gram/s):

Vapor Pressure (kPa):

Vapor Density (g/ml):

Relative Density:

No data available

Flammablity:

Autoignition Temperature (Solid) (°C):

Flammability (Solids):

Flash Point (Liquid) (°C):

Upper Explosive Limits (Liquid) (% by Vol.):

Lower Explosive Limits (Liquid) (% by Vol.):

No data available
No data available
No data available

# 10. STABILITY AND REACTIVITY

Reactivity: No data available

Chemical Stability: Stable under normal conditions of use.

**Possibility of Hazardous Reactions** 

Oxidizing Properties: No data available

**Conditions to Avoid:** Fine particles (such as dust and mists) may fuel fires/explosions. **Incompatible Materials:** As a precautionary measure, keep away from strong oxidizers

Hazardous Decomposition No data available

**Products:** 

Material Name: Bupivacaine Hydrochloride Injection (Hospira, Page 7 of 10

Inc.)

Revision date: 11-Nov-2016 Version: 1.1

# 11. TOXICOLOGICAL INFORMATION

Information on Toxicological Effects

**General Information:** The information included in this section describes the potential hazards of the individual

ingredients.

**Short Term:** May cause mild eye irritation. May cause slight skin irritation. (based on components).

Anesthetic drug: may cause central nervous system and cardiovascular system effects

Known Clinical Effects: Adverse effects associated with therapeutic use include dizziness, nervousness, agitation,

drowsiness, apprehension, euphoria, blurred/double vision, slurred speech, tremors,

convulsions, and seizure. Respiratory depression and arrest may follow. Other, more serious

effects seen with IV use of this drug, particularly when it is administered rapidly, are cardiovascular collapse, central nervous system depression, and/or hypotension.

Acute Toxicity: (Species, Route, End Point, Dose)

Sodium chloride

Rat Oral LD50 3000 mg/kg Mouse Oral LD50 4000 mg/kg

**Bupivacaine Hydrochloride** 

Rabbit Oral LD50 18 mg/kg
Rat Para-periosteal LD50 6mg/kg
Rat Subcutaneous LD50 43mg/kg
Mouse Intravenous LD50 6.1mg/kg

HYDROCHLORIC ACID

Rat Oral LD 50 238-277 mg/kg

Irritation / Sensitization: (Study Type, Species, Severity)

Sodium chloride

Eye Irritation Rabbit Moderate Skin Irritation Rabbit Mild

Reproduction & Developmental Toxicity: (Study Type, Species, Route, Dose, End Point, Effect(s))

**Bupivacaine Hydrochloride** 

Prenatal & Postnatal Development Intravenous 0.6 mg/kg LOAEL Neonatal toxicity

Genetic Toxicity: (Study Type, Cell Type/Organism, Result)

HYDROCHLORIC ACID

Bacterial Mutagenicity (Ames) Salmonella Negative

In Vivo Micronucleus Rat Negative

Carcinogen Status: None of the components of this formulation are listed as a carcinogen by IARC, NTP or OSHA.

HYDROCHLORIC ACID

IARC: Group 3 (Not Classifiable)

Material Name: Bupivacaine Hydrochloride Injection (Hospira, Page 8 of 10

Inc.)

Revision date: 11-Nov-2016 Version: 1.1

# 12. ECOLOGICAL INFORMATION

Environmental Overview: Environmental properties have not been thoroughly investigated. Releases to the environment

should be avoided.

Toxicity: No data available

Persistence and Degradability: No data available

Bio-accumulative Potential: No data available

Mobility in Soil: No data available

## 13. DISPOSAL CONSIDERATIONS

Waste Treatment Methods: Dispose of waste in accordance with all applicable laws and regulations. Member State

specific and Community specific provisions must be considered. Considering the relevant known environmental and human health hazards of the material, review and implement appropriate technical and procedural waste water and waste disposal measures to prevent occupational exposure and environmental release. It is recommended that waste minimization be practiced. The best available technology should be utilized to prevent environmental

releases. This may include destructive techniques for waste and wastewater.

### 14. TRANSPORT INFORMATION

The following refers to all modes of transportation unless specified below.

Not regulated for transport under USDOT, EUADR, IATA, or IMDG regulations.

# 15. REGULATORY INFORMATION

Safety, Health and Environmental Regulations/Legislation Specific for the Substance or Mixture

**Bupivacaine Hydrochloride** 

CERCLA/SARA 313 Emission reporting

California Proposition 65

EU EINECS/ELINCS List

Not Listed

Not Listed

Methylparaben

CERCLA/SARA 313 Emission reporting Not Listed

Material Name: Bupivacaine Hydrochloride Injection (Hospira, Page 9 of 10

Inc.)

Revision date: 11-Nov-2016 Version: 1.1

# 15. REGULATORY INFORMATION

California Proposition 65

Inventory - United States TSCA - Sect. 8(b)

Australia (AICS):

Present

EU EINECS/ELINCS List

Not Listed

Present

202-785-7

#### HYDROCHLORIC ACID

CERCLA/SARA 313 Emission reporting 1.0 %
CERCLA/SARA Hazardous Substances 5000 lb
and their Reportable Quantities: 2270 kg
CERCLA/SARA - Section 302 Extremely Hazardous 500 lb

**TPQs** 

CERCLA/SARA - Section 302 Extremely Hazardous 5000 lb

**Substances EPCRA RQs** 

California Proposition 65
Inventory - United States TSCA - Sect. 8(b)
Australia (AICS):
Standard for the Uniform Scheduling
for Drugs and Poisons:
Schedule 6
EU EINECS/ELINCS List
Not Listed
Present
Schedule 5
Schedule 6
231-595-7

#### **SODIUM HYDROXIDE**

**CERCLA/SARA 313 Emission reporting** Not Listed **CERCLA/SARA Hazardous Substances** 1000 lb and their Reportable Quantities: 454 kg Not Listed California Proposition 65 Inventory - United States TSCA - Sect. 8(b) Present Australia (AICS): Present Standard for the Uniform Scheduling Schedule 5 for Drugs and Poisons: Schedule 6 **EU EINECS/ELINCS List** 215-185-5

### **Dextrose**

CERCLA/SARA 313 Emission reporting

California Proposition 65

Australia (AICS):

Present

EU EINECS/ELINCS List

Not Listed

Not Listed

# 16. OTHER INFORMATION

## Text of CLP/GHS Classification abbreviations mentioned in Section 3

Acute toxicity, oral-Cat.2; H300 - Fatal if swallowed

Skin corrosion/irritation-Cat.1A; Skin corrosion/irritation-Cat.1B; H314 - Causes severe skin burns and eye damage Specific target organ toxicity, single exposure; Respiratory tract irritation-Cat.3; H335 - May cause respiratory irritation

**Data Sources:** Publicly available toxicity information. Pfizer proprietary drug development information. Safety

data sheets for individual ingredients.

Reasons for Revision: Updated Section 1 - Identification of the Substance/Preparation and the Company/Undertaking.

Revision date: 11-Nov-2016

PZ03230

Material Name: Bupivacaine Hydrochloride Injection (Hospira, Page 10 of 10

Inc.)

Revision date: 11-Nov-2016 Version: 1.1

Product Stewardship Hazard Communication

Prepared by: Pfizer Global Environment, Health, and Safety Operations

Pfizer Inc believes that the information contained in this Material Safety Data Sheet is accurate, and while it is provided in good faith, it is without warranty of any kind, expressed or implied. If data for a hazard are not included in this document there is no known information at this time.

**End of Safety Data Sheet** 

\_\_\_\_\_