Physical state Liquid

SAFETY DATA SHEET

Version 3

Issue Date 01-Dec-2014

Revision Date 10-Aug-2017

1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND OF THE COMPANY/UNDERTAKING

Product identifier Product Name

Pasture Pro® Plus One Step Weed & Feed 15-0-0

Other means of identificationProduct CodePBI FP 7171122EPA Pesticide Registration Number2217-911Product Size2/2.5 U. S. Gal.

Recommended use of the chemical and restrictions on useRecommended UseHerbicide.Uses advised againstNo information available.

Details of the supplier of the safety data sheetSupplierManufacturerPBI Gordon CorporationPBI Gordon Corporation1217 West 12th Street1217 West 12th StreetKansas City, MO 64101Kansas City, MO 64101Emergency telephone numberChemtrec 1-800-424-9300

2. HAZARDS IDENTIFICATION

Classification

OSHA Regulatory Status

This chemical is considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200)

Acute Inhalation Toxicity - Dusts and Mists

Label elements

Emergency Overview

Warning

Hazard statements

Harmful if inhaled. May cause eye irritation.

Precautionary Statements - Prevention

- Avoid breathing dust/fume/gas/mist/vapors/spray
- Use only outdoors or in a well-ventilated area
- Wear protective gloves/protective clothing/eye protection/face protection
- Contaminated work clothing should not be allowed out of the workplace

Odor Amines

Company Name PBI Gordon Corporation 1217 West 12th Street Kansas City, MO 64101

Category 4

An Employee-Owned Company

obi/gordon

Appearance Liquid

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Precautionary Statements - Response

- IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing
- · IF ON SKIN: Wash with plenty of soap and water
- If skin irritation or rash occurs: Get medical advice/attention
- Wash contaminated clothing before reuse
- IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing
- Call a POISON CENTER or doctor/physician if you feel unwell

Precautionary Statements - Storage

• Store in a well-ventilated place. Keep cool

Precautionary Statements - Disposal

· Dispose of contents/container to an approved waste disposal plant

Hazards not otherwise classified (HNOC)

Have the product label with you when calling a poison control center or doctor or going in for treatment. You may also contact 1-877-800-5556 for emergency medical treatment advice.

Other Information

3. COMPOSITION/INFORMATION ON INGREDIENTS

Chemical Name	CAS. Number	Weight %
Trade Secret	Proprietary	30 - 40%
2,4-D, dimethylamine salt	2008-39-1	2.57
Bis(2-hydroxyethyl)ammonium	5742-19-8	1.26
2,4-dichlorophenoxyacetate		

* The exact percentage (concentration) of composition has been withheld as a trade secret

4. FIRST AID MEASURES

First aid measures		
General advice	If symptoms persist, call a physician.	
Eye contact	Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. If symptoms persist, call a physician.	
Skin Contact	Wash off immediately with plenty of water for at least 15 minutes. Wash off immediately with soap and plenty of water while removing all contaminated clothes and shoes. If skin irritation persists, call a physician.	
Inhalation	Remove to fresh air. Move to fresh air in case of accidental inhalation of vapors or decomposition products. If symptoms persist, call a physician.	
Ingestion	Do NOT induce vomiting. Drink plenty of water. Rinse mouth. Clean mouth with water and drink afterwards plenty of water. Never give anything by mouth to an unconscious person. Call a physician.	
Self-protection of the first aider	Use personal protective equipment as required.	
Most important symptoms and effects, both acute and delayed		
Symptoms	No information available.	
Indication of any immediate medical attention and special treatment needed		
Note to physicians	Treat symptomatically.	

5. FIRE-FIGHTING MEASURES

Suitable extinguishing media

Carbon dioxide (CO2). Water spray (fog). Foam. Dry chemical.

Specific hazards arising from the chemical

In the event of fire and/or explosion do not breathe fumes. Thermal decomposition can lead to release of irritating and toxic gases and vapors.

Explosion data

Sensitivity to Mechanical Impact None. Sensitivity to Static Discharge None.

Protective equipment and precautions for firefighters

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Personal precautions	Use personal protective equipment as required. Avoid contact with eyes and skin. Evacuate personnel to safe areas. Keep people away from and upwind of spill/leak.		
Environmental precautions			
Environmental precautions	Prevent entry into waterways, sewers, basements or confined areas. Do not flush into surface water or sanitary sewer system. Prevent further leakage or spillage if safe to do so. Prevent product from entering drains. See Section 12 for additional ecological information.		
Methods and material for containment and cleaning up			
Methods for containment	Prevent further leakage or spillage if safe to do so.		
Methods for cleaning up	Soak up with inert absorbent material. Pick up and transfer to properly labeled containers. After cleaning, flush away traces with water. Prevent product from entering drains. Dam up.		

7. HANDLING AND STORAGE

Precautions for safe handling

Advice on safe handling Ensure adequate ventilation, especially in confined areas. Use personal protective equipment as required. Use with local exhaust ventilation. Do not breathe dust/fume/gas/mist/vapors/spray.

Conditions for safe storage, including any incompatibilities

Storage ConditionsKeep out of the reach of children. Keep containers tightly closed in a cool, well-ventilated
place. Keep in properly labeled containers.

Incompatible materials None known.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

Exposure Guidelines

This product, as supplied, does not contain any hazardous materials with occupational exposure limits established by the region specific regulatory bodies

Chemical Name	ACGIH TLV	OSHA PEL	NIOSH IDLH
2,4-D, dimethylamine salt	TWA: 10 mg/m ³ inhalable fraction	TWA: 10 mg/m ³	IDLH: 10 mg/m ³ , TWA: 10 mg/m ³

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Appropriate engineering controls

Engineering Controls

Ensure adequate ventilation, especially in confined areas.

Individual protection measures, such as personal protective equipment

Eye/face protection	Tight sealing safety goggles. Face protection shield.	
Skin and body protection	Wear protective gloves and protective clothing.	
Respiratory protection	If exposure limits are exceeded or irritation is experienced, NIOSH/MSHA approved respiratory protection should be worn. Positive-pressure supplied air respirators may be required for high airborne contaminant concentrations. Respiratory protection must be provided in accordance with current local regulations.	
General Hygiene Considerations	When using do not eat, drink or smoke. Wash contaminated clothing before reuse. Regular cleaning of equipment, work area and clothing is recommended.	

9. PHYSICAL AND CHEMICAL PROPERTIES

Information on basic physical and chemical properties

Physical state Appearance Color	Liquid Liquid Brown	Odor Odor threshold	Amines No information available
Property pH Melting point/freezing point	<u>Values</u> 7.0-9.0 <32 °F	<u>Remarks • Method</u>	
Boiling point / boiling range Flash point Evaporation rate Flammability (solid, gas) Flammability Limit in Air	 > 100 °C / 212 °F > 93 °C / > 200 °F No information available No information available 	Pensky-Martens Closed	Cup (PMCC)
Upper flammability limit: Lower flammability limit: Vapor pressure Vapor density	No information available No information available <17 mm Hg >1		
Specific Gravity Water solubility Solubility in other solvents Partition coefficient Autoignition temperature	1.10927 Soluble in water No information available No information available No information available		
Decomposition temperature Oxidizing properties	No information available No information available		
Other Information			

Density

9.25 pounds/gallon

10. STABILITY AND REACTIVITY

Reactivity No data available

Chemical stability Stable.

Possibility of Hazardous Reactions None under normal processing.

Hazardous polymerization

Will not occur.

Conditions to avoid

Keep from freezing.

Incompatible materials

None known.

Hazardous Decomposition Products

May emit toxic fumes under fire conditions. Carbon monoxide. Carbon dioxide (CO2). Nitrogen oxides (NOx). Hydrogen chloride.

11. TOXICOLOGICAL INFORMATION

Information on likely routes of exposure

Product Information	
Inhalation	Irritant, moderate respiratory.

Mild eye irritation. Eye contact

Skin Contact Substance may cause slight skin irritation.

Ingestion May cause irritation.

Chemical Name	Oral LD50	Dermal LD50	Inhalation LC50
Trade Secret	= 8471 mg/kg (Rat)	-	-
2,4-D, dimethylamine salt 2008-39-1	= 625 mg/kg (Rat)	= 2115 mg/kg(Rabbit)	-

Information on toxicological effects

Symptoms

No information available.

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Sensitization Germ cell mutagenicity Carcinogenicity	its Group 2B chloropheno classifiable a and mice did		nogenicity in humans.) The P, MCPP, and MCPA a Cla /.) More current 2,4-D lifeti ects and a recent World He	e US EPA has given the ass D classification (not me feeding studies in rats ealth Organization (WHO)
		ether each agency has liste		
Chemical Name	ACGIH	IARC	NTP	OSHA

Chemical Name	ACGIH	IARC	NTP	OSHA
2,4-D, dimethylamine salt		Group 2B		
2008-39-1				

IARC (International Agency for Research on Cancer)

Group 2B - Possibly Carcinogenic to H	umans
Reproductive toxicity	No information available.
STOT - single exposure	No information available.
STOT - repeated exposure	No information available.
Chronic toxicity	Repeated contact may cause allergic reactions in very susceptible persons. Avoid repeated
	exposure.
Aspiration hazard	No information available.

Aspiration hazard

Numerical measures of toxicity - Product Information

Unknown Toxicity	0 % of the mixture consists of ingredient(s) of unknown toxicity
Oral LD50	> 5000 mg/kg body weight (rat)
Dermal LD50 Inhalation LC50	> 5000 mg/kg body weight (rat)> 2.02 mg/L Rat

12. ECOLOGICAL INFORMATION

Ecotoxicity

Harmful to aquatic life with long lasting effects

64% of the mixture consists of components(s) of unknown hazards to the aquatic environment

Chemical Name	Algae/aquatic plants	Fish	Toxicity to	Crustacea
			microorganisms	
Trade Secret		16200 - 18300: 96 h Poecilia		3910: 48 h Daphnia magna
		reticulata mg/L LC50		mg/L EC50 Static 10000: 24
		-		h Daphnia magna Straus
				mg/L EC50

Persistence and degradability

No information available.

Bioaccumulation

No information available.

Other adverse effects

No information available

13. DISPOSAL CONSIDERATIONS

Waste treatment methods

 Disposal of wastes
 Disposal should be in accordance with applicable regional, national and local laws and regulations.

 Contaminated packaging
 Do not reuse container, unless specified by the manufacturer.

14. TRANSPORT INFORMATION

DOT

Description

The following guidelines apply for domestic ground transport. If shipping by air or ocean, please contact our Transportation Dept.

PESTICIDES, NOI, INCLUDING DEFOLIANTS, FUNGICIDES, HERBICIDES, OR INSECTICIDES NMFC 155050-6

In our current available sizes, this product does not qualify as a Hazardous Material.

15. REGULATORY INFORMATION

U.S. EPA Label Information

EPA Pesticide Registration Number 2217-911

Federal Insecticide, Fungicide, Rodenticide Act Regulations

This chemical is a pesticide product registered by the Environmental Protection Agency and is subject to certain labeling requirements under federal pesticide law. These requirements differ from the classification criteria and hazard information required for safety data sheets, and for workplace labels of non-pesticide chemicals. Following is the hazard information as required on the pesticide label:

EPA Pesticide Label

Caution. Keep out of the reach of children.

International Inventories	
TSCA	Not Listed
DSL/NDSL	Not Listed
EINECS/ELINCS	Listed
ENCS	Not Listed
IECSC	Not Listed
KECL	Not Listed
PICCS	Not Listed
AICS	Listed

Legend:

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory

DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List

EINECS/ELINCS - European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances

ENCS - Japan Existing and New Chemical Substances

IECSC - China Inventory of Existing Chemical Substances

KECL - Korean Existing and Evaluated Chemical Substances

PICCS - Philippines Inventory of Chemicals and Chemical Substances

AICS - Australian Inventory of Chemical Substances

Chemical Name	TSCA	DSL	NDSL	EINECS	ELINCS	ENCS	IECSC	KECL	PICCS	AICS
Trade Secret	Х	Х		Х		Х	Х	Х	Х	Х
2,4-D, dimethylamine salt				Х			Х		Х	Х
Bis(2-hydroxyethyl)ammoniu				Х						Х
m										
2,4-dichlorophenoxyacetate										

US Federal Regulations

SARA 313

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372

SARA 311/312	Hazard	Categories

Acute health hazard	Yes
Chronic Health Hazard	No
Fire hazard	No
Sudden release of pressure hazard	No
Reactive Hazard	No

CWA (Clean Water Act)

This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42)

CERCLA

This material, as supplied, contains one or more substances regulated as a hazardous substance under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302)

Chemical Name	Hazardous Substances RQs	CERCLA/SARA RQ	Reportable Quantity (RQ)
2,4-D, dimethylamine salt	100 lb		RQ 100 lb final RQ
2008-39-1			RQ 45.4 kg final RQ
Bis(2-hydroxyethyl)ammonium	100 lb		RQ 100 lb final RQ
2,4-dichlorophenoxyacetate			RQ 45.4 kg final RQ
5742-19-8			

US State Regulations

U.S. State Right-to-Know Regulations

International Regulations

Mexico - Grade

Moderate risk, Grade 2

16. OTHER INFORMATION

NFPA	Health hazards 2	Flammability 1	Instability 0	Physical and Chemical
HMIS	Health hazards 2	Flammability 1	Physical hazards 0	Properties - Personal protection X

Disclaimer

The information provided in this Material Safety Data Sheet is correct to the best of PBI Gordon Corporation's knowledge, information and belief at the date of this publication. The information given is designed only as guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any other process, unless specified in the text. PBI GORDON CORPORATION MAKES NO WARRANTIES, EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE OR COURSE OF PERFORMANCE OR USAGE OF TRADE. Given the variety of factors that can affect the use and application of this product, some of which are uniquely within the user's knowledge and control, it is essential that the user evaluate the product to determine whether it is fit for a particular purpose and suitable for user's method of use or application. Each user is also responsible for evaluating the conditions of use and designing the appropriate protective mechanisms to prevent employee exposures, property damage, or release to the environment. PBI Gordon Corporation assumes no responsibility for injury to the recipient or third persons, or for any damage to any property resulting from misuse of the product.

End of Safety Data Sheet