

# Safety Data Sheet

**LambdaStar Plus**

**SDS: 5/4/15**

## Section 1 – Chemical Product and Company Identification

**Product Name:** LambdaStar Plus

**CAS #** 91465-08-6

**EPA Reg. #:** 71532-29-91026

**Product Use:** Restricted Use Insecticide

**Company Identification:** LG Life Science America Inc.  
910 Sylvan Avenue  
Englewood Cliffs, NJ 07632

**Emergency call:** 201-816-2310

## Section 2 – Hazards identification

**Classification of substance:**



Fatal if swallowed

Very Toxic to aquatic life

Very Toxic to aquatic life with long lasting effects

**GHS labeling elements:**

The substance is classified and labeled according to the Globally Harmonized System (GHS):

**Hazard pictograms:**



**Signal Word:** Danger

**Hazard-determined components of labeling:** Lambda-cyhalothrin

**Hazard statements:**

Fatal if swallowed.

Very Toxic to aquatic life.

Very Toxic to aquatic life with long lasting effects.

Cause Eye Irritation.

Cause mild skin irritation.

**Precautionary Statements:**

**If Swallowed:** Rinse mouth and Do not induce vomiting. Immediately call a Poison Center/doctor.

**If in Eye:** Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do.

# Safety Data Sheet

## LambdaStar Plus

**SDS: 5/4/15**

Continue rinsing. If eye irritation persists: Get medical advice/attention.

**If on Skin:** Remove all contaminated clothing. Rinse with water. If skin irritation occurs seek medical advice/attention.

**If Inhaled:** Remove person to fresh air and keep at rest in a position comfortable for breathing. Wash contaminated clothing before reuse.

**Storage/Disposal:** Storage locked up and Dispose of contents and containers accord to local, state and federal law.

### Section 3 – Composition/information of ingredient

		Percent	CAS No.
Lambda-cyhalothrin	Lambda-cyhalothrin:[1a(S),3a(Z)]-(±)cyano(3-phenoxyphenyl)methyl-3-(2-chloro-3,3,3-trifluoro-1-proenyl)-2,2-dimethylcyclopropanecarboxylate	23.28%	91465-08-6
Other Ingredients	Non-toxic and non-hazardous*	76.72%	

\* Proprietary components

### Section 4 – First Aid Measures

Symptoms	Exposure to Lambda-cyhalothrin may cause a skin sensation called paresthesia, which is usually described as tingling, itching, burning,prickling, glowing, flushing, numbness or a chapped feeling. High levels of the active ingredient lambda-cyhalothrin may induce neurotoxic effects such as staggering gait, muscle tremors and convulsions.
Swallowed:	Call a poison control center or doctor immediately for treatment advice. Do not induce vomiting unless told to do so by the poison control center or doctor. DO not give anything by mouth to an unconscious person.
Eyes:	May cause irritation. Hold eye open and rinse slowly and gently with water for 15 to 20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye.
Skin:	Take off contaminated clothing. Rinse skin immediately with plenty of water for 15 to 20 minutes
Inhalation:	May cause irritation. Remove to fresh air. If person stops breathing give them artificial respiration and get medical attention immediately.
<p>Note to Physicians</p> <p>For current information about the treatment, consult a certified Regional Poison Control Center by calling the number listed in your local telephone directory.</p>	

# Safety Data Sheet

**LambdaStar Plus**

**SDS: 5/4/15**

## Section 5 – Fire Fighting Measure

**Extinguishing media:** Use dry powder or sand, carbon dioxide, or appropriate fire materials. Avoid use of water jets for extinguishing

**Fire and Explosive Hazards:** Not expected to be a fire or explosive hazard. May emit toxic fumes when heated to decomposition.

**Special fire fighting procedures:** Fireman should wear positive pressed freely breathing devices, complete fire protection clothes and shoes. Do not access if tank is on fire. Use water to cool exposed containers to extinguish fire. Withdraw immediately in case of rising sound from venting safety devices or discoloration of tank. Avoid inhalation of materials or combustion by-product. Vapor or gas is burned at distant ignition sources can be spread quickly.

**Reference to other sections:**

See Section 10 for decomposition products.

## Section 6 – Accidental Release Measures

**Personal precautions, protective equipment and emergency procedures:** Wear approved respiratory protection, chemically compatible gloves and protective clothing. Keep unprotected persons away. Allow work against the wind and remove all people upwind. DO not direct water at spill or source leak.

**Environmental precautions:** Prevent runoff and contact with sources of water including but not limited to drains, sewers, lakes and ponds. Since emptied containers retain product residue(vapor, liquid, solid) follow all MSDS and label warnings even after container is empty. In case of large spill, inform the relevant authorities.

**Methods and material for containment and cleaning up:**

**In case small leak or spill:** contain material using sand or other non-combustible, let absorb, and dispose as waste. Don't contaminate any body of water. Sweep up material, place in a bottle, and hold for waste disposal.

**In case large leak or spill:** Stay upwind and keep out of low areas. Use dike to prevent spill from spreading and prevent from contaminating waterways. Notify local, state and federal authorities for further instructions.

**Reference to other sections:**

See Section 7 for information on safe handling.

See Section 8 for information on personal protection equipment.

See Section 13 for disposal information.

## Section 7 – Handling and Storage

### Handling

**Precautions for safe handling:** Do not inhale the steam prolonged or repeatedly. Use product only in well-ventilated place. Users should wash hands before eating and drinking. Do not contaminate water, food, or feed by storage.

Keep protective respiratory device available.

**Conditions for Safe Storage, including any incompatibilities**

**Storage:** Store in original container only. Avoid direct sunlight. Do not apply physical shock to container. Store locked up.

# Safety Data Sheet

## LambdaStar Plus

**SDS: 5/4/15**

**Requirements to be met by storerooms and receptacles:** Store out of sun in cool place.

**Reference to other sections:**

See Section 10 for incompatibilities

### Section 8 – Contact Controls and Personal Protection

**Max allowed concentration:** No Data

**Way of measurement:** No Data

**Engineering Control:** Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower. Use adequate ventilation to keep risk of inhalation low. Take safety shower and eye bath after handling.

#### Personal Protection

**Respirators:** Use NIOSH-approved respirator in accordance with health/safety regulations.

**Eyes:** Wear appropriate protective eyeglasses or chemical safety goggles.

**Body:** Wear appropriate chemical resistant overalls and rubber boots and rubber gloves. Avoid any skin exposure.

**Hands:** Wear appropriate gloves, such as barrier laminate or Viton  $\geq$  14mils.

**General protective and hygienic measures:** Discard clothing other absorbent materials that have been drenched or heavily contaminated with this product's concentrate. Do not reuse them. Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables, use detergent and hot water. Keep and wash PPE separately from other laundry. No smoking, eating or drinking during handling. Change to clean clothes after washing.

**Other conditions:** When handlers use closed systems, enclosed cabs, or aircraft in a manner that meets the requirements listed in the Worker Protection Standard (WPS) for agricultural pesticides [40CFR 170.240(d)(4-6)], the handler PPE requirements may be reduced or modified as specified in the WPS.

### Section 9 – Physical and Chemical Properties

#### Information on basic physical and chemical properties

##### General Information:

**Appearance and Physical State:** Fluid (Capsule Suspension based on water), slightly aromatic odor

**pH Value:** 4.69

**Vapor Pressure (25 °C):** Not determined

**Melting point:** Not available

**Boiling Point:** Not applicable

**Specific Gravity:** 1.03

**Comparative concentration (water: 1):** Not available (not required for end use)

**Quantity of heat in burning (KJ/mol):** Not available (not required for end use)

**Density (g/cm<sup>3</sup>):** 1.028 at 24°C

**Critical pressure (Mpa):** Not available

**Critical temperature:** Not available

**Flash point (C):** Not available

# Safety Data Sheet

## LambdaStar Plus

**SDS: 5/4/15**

**Burning temperature (C):** Not available

**Explosion:** Not available

**Solubility:** Suspendable in water

### Section 10 – Stability and Reactivity

**Chemical Stability:** This material is stable at the normal storage conditions.

**Incompatible to Avoid:** Strong acidic and alkali materials should be avoided.

**Conditions to Avoid:** Avoid accumulation of electrostatic charges, heating, flames, and hot surface.

**Decomposition Products:** Not Known to Occur. May emit toxic fume in a fire.

**Hazardous Polymerization:** No record

**Reference to other sections:**

See Section 5 for static discharge potential

### Section 11 – Toxicological Information

**Acute Toxicity:**

**LD/LC50 values that are relevant for classification:**

**Oral:** LD<sub>50</sub> : 79, 55 mg/kg (males, females)

**Inhalation:** LC<sub>50</sub> > 0.57 mg/L

**Dermal:** LD<sub>50</sub> > 5000 mg/kg

**Eyes:** Mildly Irritating

**Primary irritant effect:**

**If swallowed:** Fatal if swallowed. No hazards anticipated from swallowing small amounts incidental to normal handling operation.

**On eyes:** Cause Eye Irritation

**On the skin:** Slightly Irritating

**Respiratory sensitization:** Single exposure to dust is not likely to be hazardous. Vapors are unlikely due to physical properties.

**Skin Sensitization:** Product is considered a contact sensitizer.

**Germ Cell Mutagenicity:** The chromosome aberration test was negative.

**Carcinogenicity:** This product has negative Ames test results.

**Reproductive Toxicity:** Not available

**STOT-Single Exposure:** Not available

**STOT-Repeated Exposure:** Not available

**Aspiration Hazard:** Not available

### Section 12 – Ecological Data

**Eco-toxicity:**

**Fish acute toxicity (Bluegill):** LC<sub>50</sub>: 0.21 ug/l (24hr)

**Algae acute toxicity:** LC<sub>50</sub> > 0.1 mg/l (96hr)

**Oaphnia acute toxicity:** LC<sub>50</sub>: 0.36ug/l (48hr)

**Acute oral (Mallard duck):** LD<sub>50</sub> > 3950 mg/kg

# Safety Data Sheet

## LambdaStar Plus

**SDS: 5/4/15**

**Toxicity to Beneficial Insects:** Toxic to some non-target arthropods.

**Eco-decomposition:** No data available

**Other:** No data available

### Section 13 – Disposal Considerations

**Waste Disposal:** Do not contaminate water, food, or feed by disposal. Dispose of waste in accordance with all applicable Federal, State, and local laws. Improper disposal of excess pesticide, spray mixture, or rinsate is violation of Federal Law. If these waste cannot be disposed of by use according to label instructions contact your State Pesticide or Environmental Control Agency, or the Hazardous Waste representative at the nearest EPA Regional Office for guidance.

**Container Disposal:** Do not distribute, make available, furnish or reuse empty containers. Triple rinse (or equivalent), then offer for recycling or reconditioning if container reuse is permitted. If container reuse is prohibited, puncture metal containers and dispose of in a sanitary landfill, or by other approved State and local authorities, If burned, stay out of smoke.

### Section 14 – Transport Information

**Proper Shipping Name:** Pyrethroid Pesticides, Liquid, Toxic, N.O.S. (contains Lambda-Cyhalothrin)

**Hazard Class or Division:** Class 6.1

**Identification Number:** UN 3352

**Packing Group:** PGIII

### Section 15 – Regulatory Data

**U.S. Regulatory Information:** California Prop. 65-Development Toxicity, FIFIRA

**International Regulatory Information:** EINECS#218-161-2  
Hazard code: Xn  
Risk phrases: R20, R21, R22, R63  
Safety phrases: S36/37/39  
Canada: WHMIS Class D-2A

#### GHS labeling elements:

The substance is classified and labeled according to the Globally Harmonized System (GHS):

#### Hazard pictograms:



GHS06

GHS09

**Signal Word:** Danger

**Hazard-determined components of labeling:** Lambda-cyhalothrin

**Hazard statements:**

# Safety Data Sheet

## LambdaStar Plus

**SDS: 5/4/15**

Fatal if swallowed.

Very Toxic to aquatic life.

Very Toxic to aquatic life with long lasting effects.

Cause Eye Irritation.

Cause mild skin irritation.

### **Precautionary Statements:**

**If Swallowed:** Rinse mouth and Do not induce vomiting. Immediately call a Poison Center/doctor.

**If in Eye:** Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice/attention.

**If on Skin:** Remove all contaminated clothing. Rinse with water. If skin irritation occurs seek medical advice/attention.

**If Inhaled:** Remove person to fresh air and keep at rest in a position comfortable for breathing. Wash contaminated clothing before reuse.

Storage/Disposal: Storage locked up and Dispose of contents and containers accord to local, state and federal law.

### **Section 16 – Additional information**

**Reference:** The information contained herein is believed to be accurate. It is provided independently of any sale of the product for purpose of hazard communication. It is not intended to constitute performance information concerning the product. No express warranty, or implied warranty of merchantability or fitness for a particular purpose is made with respect to the product or the information contained herein. This Safety Data Sheet was compiled with data and information from the following source: KOSHA, NITE, ESIS, NLM, SIDS, IPCS

MSDS Date issue:

SDS Rev. Date: 5/4/15