

# Introduction

# **Purpose**

This document provides instructions for the installation of the Central Processing Unit (CPU) Heater Kit on 9800K Series pumps.

## **Table of Contents**

Торіс	Page
Introduction	1
Important Safety Information	3
Installation of the CPU Heater Kit	5

# **Required Tools**

The following tools are required for the installation of the kit:

- Phillips® screwdriver
- 8 mm nut driver or socket

## **Parts List**

The following table lists the parts included in this kit.

Item	Description	Part Number	Quantity	
			M07774A001 (115 VAC)	M07774A002 (220 VAC)
1	Standoff, Printed Circuit Board (PCB) Snap in 1/4L-	C09695	5	5
2	Support, PC Board	M04768A002	1	1
3	Cable, Heater 115 VAC	M05120A003	1	=
4	Cable, Heater 230 VAC	M05120A004	-	1
5	Nut, Metric, Flange	M00414B005	3	3
6	Screw, Sems PH Phil M3	Q12845-36	2	2
7	Washer, Fiber .192ID X .77	067165	3	3

## **Related Documents**

Document Number	Title	GOLD Library
MDE-4334	Atlas™ Start-up/Service Manual	Atlas
MDE-4363	Atlas Owner's Manual	Atlas

# Warranty

For information on warranty, refer to MDE-4255 Gasboy's Warranty Policy Statement. If you have any warranty-related questions, contact Gasboy's Warranty Department at its Greensboro location.

# **Important Safety Information**

This section introduces the hazards and safety precautions associated with installing, inspecting, maintaining or servicing this product. Before performing any task on this product, read this safety information and the applicable sections in this manual, where additional hazards and safety precautions for your task will be found. Fire, explosion, electrical shock or pressure release could occur and cause death or serious injury if these safe service procedures are not followed.

### **Preliminary Precautions**

You are working in a potentially dangerous environment of flammable fuels, vapors, and high voltage or pressures. Only trained or authorized individuals knowledgeable in the related procedures should install, inspect, maintain or service this equipment.



### **Emergency Total Electrical Shut-Off**

The first and most important information you must know is how to stop all fuel flow to the pump and island. Locate the switch or circuit breakers that shut-off all power to all fueling equipment, dispensing devices, and submerged turbine pumps (STPs).

### **⚠** WARNING



The EMERGENCY STOP, ALL STOP, and PUMP STOP buttons at the cashier's station WILL NOT shut off electrical power to the pump/dispenser.

This means that even if you activate these stops, fuel may continue to flow uncontrolled.

You must use the TOTAL ELECTRICAL SHUT-OFF in the case of an emergency and not only these cashier station "stops."

### **Total Electrical Shut-Off Before Access**

Any procedure requiring access to electrical components or the electronics of the dispenser requires total electrical shutoff of that unit. Know the function and location of this switch or circuit breaker before inspecting, installing, maintaining, or servicing Gasboy equipment.

#### **Evacuation, Barricading and Shut-Off**

Any procedures requiring accessing the pump/dispenser or STPs requires the following three actions:









- An evacuation of all unauthorized persons and vehicles using safety tape, cones or barricades to the effected units
- A total electrical shut-off of that unit

#### Read the Manual

Read, understand and follow this manual and any other labels or related materials supplied with this equipment. If you do not understand a procedure, call a Gasboy Authorized Service Contractor or call the Gasboy Service Center at 1-800-444-5529. It is imperative to your safety and the safety of others to understand the procedures before beginning work.

### Follow the Regulations

There is applicable information in NFPA 30A; *Automotive and Marine Service Code*, NFPA 70; *National Electrical Code* (NEC), OSHA regulations and federal, state, and local codes which must be followed. Failure to install, inspect, maintain or service this equipment in accordance with these codes, regulations and standards may lead to legal citations with penalties or affect the safe use and operation of the equipment.

### **Replacement Parts**

Use only genuine Gasboy replacement parts and retrofit kits on your pump/dispenser. Using parts other than genuine Gasboy replacement parts could create a safety hazard and violate local regulations.

## Safety Symbols and Warning Words

This section provides important information about warning symbols and boxes.

### Alert Symbol

This safety alert symbol is used in this manual and on warning labels to alert you to a precaution which must be followed to prevent potential personal safety hazards. Obey safety directives that follow this symbol to avoid possible injury or death.

### Signal Words

These signal words used in this manual and on warning labels tell you the seriousness of particular safety hazards. The precautions that follow must be followed to prevent death, injury or damage to the equipment



**DANGER** - This signal word is used to alert you to a hazard to unsafe practice which will result in death or serious injury



**WARNING -** This alerts you to a hazard or unsafe practice that could result in death or serious injury. **CAUTION** with Alert symbol - This signal word

designates a hazard or unsafe practice which may result in minor injury.

**CAUTION** without Alert symbol - When used by itself, CAUTION designates a hazard or unsafe practice which may result in property or equipment damage.

## **Working With Fuels and Electrical Energy**

### **Prevent Explosions and Fires**

Fuels and their vapors will become explosive if ignited. Spilled or leaking fuels cause vapors. Even filling customer tanks will cause explosive vapors in the vicinity of dispenser or island.

#### No Open Flames

Open flames from matches, lighters, welding torches or other sources can ignite fuels and their vapors.

### No Sparks - No Smoking



Sparks from starting vehicles, starting or using power tools, burning cigarettes, cigars or pipes can also ignite fuels and their vapors. Static electricity, including an electrostatic charge on your body, can cause a spark sufficient to ignite fuels and their vapors. After getting out of a vehicle, touch the metal of your vehicle to discharge any electrostatic charge before you approach the dispenser island.

### **Working Alone**

It is highly recommended that someone who is capable of rendering first aid be present during servicing. Be familiar with Cardiopulmonary Resuscitation (CPR) methods if you are working with or around high voltages. This information is available from the American Red Cross. Always advise the station personnel about where you will be working, and caution them not to activate power while you are working on the equipment. Use the OSHA tag out and lock out procedures. If you are not familiar with this requirement, refer to information in the service manual and OSHA documentation.

### **Working With Electricity Safely**

Ensure to use safe and established practices in working with electrical devices. Poorly wired devices may cause a fire, explosion or electrical shock. Ensure grounding connections are properly made. Ensure that sealing devices and compounds are in place. Ensure not to pinch wires when replacing covers. Follow OSHA Lock-Out and Tag-Out requirements. Station employees and service contractors need to understand and comply with this program completely to ensure safety while the equipment is down.

#### **Hazardous Materials**

Some materials present inside electronic enclosures may present a health hazard if not handled correctly. Ensure to clean hands after handling equipment. Do not place any equipment in mouth.

### **⚠** WARNING

This area contains a chemical known to the State of California to cause cancer.

### **⚠** WARNING

This area contains a chemical known to the State of California to cause birth defects or other reproductive harm.

**IMPORTANT**: Oxygen may be needed at scene if gasoline has been ingested or inhaled. Seek medical advice immediately.

### **Emergency First Aid**

### **Informing Emergency Personnel**

- Compile the following information for emergency personnel:
- Location of accident (for example, address, front/back of building, and so on).
- Nature of accident (for example, possible heart attack, run over by car, burns, and so on).
- Age of victim (for example, baby, teenager, middle-age, elderly).
- Whether or not victim has received first aid (for example, stopped bleeding by pressure, and so on).
- Whether or not a victim has vomited (for example, if swallowed or inhaled something, and so on).

### WARNING



Gasoline ingested may cause unconsciousness and burns to internal organs.

Do not induce vomiting.

Keep airway open.

Oxygen may be needed at scene.

Seek medical advice immediately.

### **★** WARNING



Gasoline inhaled may cause unconsciousness and burns to lips, mouth and lungs.

Keep airway open.

Seek medical advice immediately.

### **★** WARNING



Gasoline spilled in eyes may cause burns to eye tissue.

Irrigate eyes with water for approximately 15 minutes.

Seek medical advice immediately

### **⚠** WARNING



Gasoline spilled on skin may cause burns. Wash area thoroughly with clear/water. Seek medical advice immediately.

**IMPORTANT**: Oxygen may be needed at scene if gasoline has been ingested or inhaled. Seek medical advice immediately.

#### Lockout/Tagout

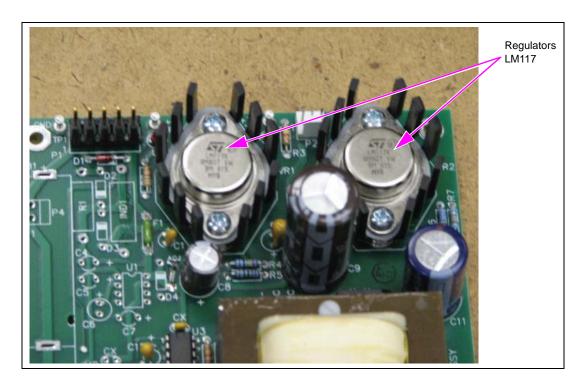
Lockout/Tagout covers servicing and maintenance of machines and equipment in which the unexpected energization or start up of the machine(s) or equipment or release of stored energy could cause injury to employees or personnel. Lockout/Tagout applies to all mechanical, hydraulic, chemical or other energy, but does not cover electrical hazards. Reference Subpart S of 29 CFR Part 1910 - Electrical Hazards, 29 CFR Part 1910.333 contains specific Lockout/Tagout provision for electrical hazards.

# Installation of the CPU Heater Kit

To install the CPU Heater Kit for 9800K Series pumps, proceed as follows:

- 1 Ensure that power has been removed before you service the equipment.
- **2** Remove the dispenser side panels and bezels.
- **3** Remove the screws and lower display panel.
- 4 Locate the power supply. On the power supply, locate the regulators as shown in Figure 1.

Figure 1: Location of LM117 Regulators



**5** Verify if the regulators are of LM117 type (the part number will be printed on the part). If they are not, then do not install the mounting heater assembly. Replace the power supply with the one that has the correct regulators.

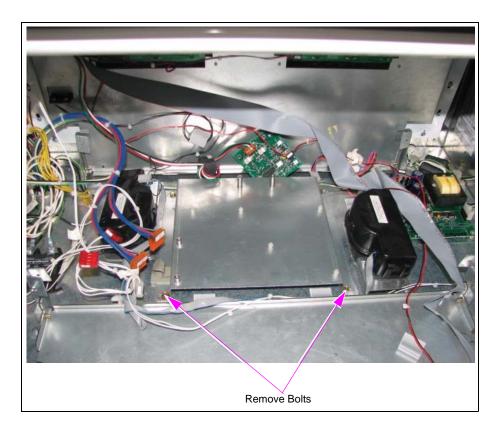
The following table provides the power supply part numbers.

Power Supply	Part Number	
115V (battery backed)	C06397	
115V (without battery)	C06396	
220V (battery backed)	C06489	
220V (without battery)	C06488	

**6** Locate the existing CPU on the mounting plate.

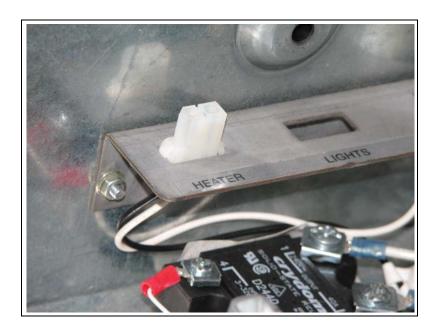
**7** Remove all cables connected to the CPU board. If your dispenser has a pulse output board or RS-485 board, disconnect it from the CPU and remove the CPU board.

Figure 2: Removal of Bolts



- **8** Locate the four bolts that hold the existing mounting plate on the dispenser. Remove the four bolts (Figure 2) and the existing mounting plate.
- **9** Install the new mounting plate/heater assembly. *Note: Ensure that no wires are caught below the new mounting plate.*
- **10** Use the four bolts removed in step 8 to secure the mounting plate.
- 11 Locate the power bracket inside the unit (near the end of the AC conduit) shown in Figure 3 on page 7.
- **12** Run the heater cable to the power bracket.

  Note: Ensure that the cable does not run with DC cables and interfere with the pulser in any way.



**Figure 3: Heater Cable Connection** 

- 13 Connect the new heater cable to the heater connector on the power bracket (see Figure 3).

  Note: If the unit has an existing battery heater cable, unplug it from the connector on the bracket and plug it into the mating connector on the new heater cable.
- 14 Reinstall the CPU board and connect all cables that were removed in step 6.
- **15** Reinstall the pulse output or RS-485 board, if needed.
- **16** Reassemble the dispenser after the assembly and testing is complete.

The installation of the CPU Heater Kit for 9800K Series pumps is complete.



Atlas™ is a trademark of Gasboy International. Phillips® is a registered trademark of Phillips Screw Company.

