



OPERATORS MANUAL

AGITATION BOATS

Model # _____

Serial # _____

Dealer _____ Date _____

Owner _____ Date _____

**Exhibit
DX 64**

Puck Custom Enterprises
110 100th Street
Manning, Iowa 51455
(712) 653-3045

www.puckenterprises.com

Copyright © 2011 Puck Custom Enterprises, Inc.

PCE AGITATION BOAT



Your new Puck Custom Enterprises Agitation Boat has been designed and manufactured to provide many years of very reliable service when used for the purpose for which it is intended, and with correct and regular maintenance.

This machine is warranted as stated on the next page. Your dealer should register your Boat with Puck Custom Enterprises, provide us your contact details, purchase information and serial number. The registration process activates your warranty and helps us assist you if you have any questions in the future.

If any part of this operating manual is lost or becomes unreadable, contact your dealer for a new set.

The serial number and identification tag is located on the control tower. Please refer to this number when communicating with your dealer or Puck Custom Enterprises.

Warranty Information

WARRANTY MANUFACTURER

Dealer or Distributor understands and agrees that the Manufacturer extends only the following Warranty to customers. In the event Dealer or Distributor extends any additional warranty (such as by enlarging the scope or period of warranty or undertaking a warranty of merchantability or fitness for any particular purpose) or any other obligation whatsoever, Dealer or Distributor shall: (1) be solely responsible therefore (2) have no recourse against Manufacturer thereof and (3) defend, indemnify and hold Manufacturer harmless against any claim or cause of action whatsoever arising out of, or occasioned by, Dealer or Distributor's extension of said additional warranty or obligation.

CERTIFICATE OF GENERAL EQUIPMENT WARRANTY

Puck Custom Enterprises warrants new Products sold by it to be free from defects in material or workmanship for a period of one (1) year after date of delivery to the first user and subject to the following conditions.

1. Puck Custom Enterprises, Inc.'s obligation and liability under this Warranty is expressly limited to repairing or replacing at Puck Custom Enterprises, Inc.'s option, any parts which appear to Puck Custom Enterprises, Inc. upon inspection to have been defective in material or workmanship.
2. Such parts shall be provided at no cost to user, at the business establishment of the authorized Puck Custom Enterprises, Inc. dealer or distributor of the Product during regular working hours.
3. This Warranty shall not apply to component parts or accessories of Products not manufactured by Puck Custom Enterprises Inc. and which carry the warranty of the original manufacturer thereof, or to normal wear and tear, or maintenance (such as tune-ups) or normal maintenance parts (such as oil filters).
4. Replacement or repair parts installed in this Product covered by this Warranty are warranted only for the remainder of this Warranty as if such parts were original components of said Product.

NO INCIDENTAL OR CONSEQUENTIAL DAMAGES MAY BE ASSERTED AGAINST PUCK CUSTOM ENTERPRISES, INC. UNDER ANY CIRCUMSTANCE WHATSOEVER. PUCK CUSTOM ENTERPRISES' LIQUIDATED DAMAGES IN ANY SITUATION MAY NOT EXCEED THE RETAIL PRICE OF THE PRODUCT OR PART.

PUCK CUSTOM ENTERPRISES, INC. MAKES NO OTHER WARRANTY, EXPRESS OR IMPLIED, AND MAKES NO WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE.

Puck Custom Enterprises, Inc.'s obligation under this Warranty shall not include any transportation charges, cost of installation, duty taxes or any other charges whatsoever, or any liability for direct, indirect, incidental or consequential damage or delay. If requested by Puck Custom Enterprises, Inc. products or parts for which a warranty claim is made are to be returned transportation prepaid to Puck Custom Enterprises, Inc. Any improper use, including operation after discovery of defective or worn parts, operation beyond rated capacity, substitution or parts not approved by Puck Custom Enterprises, Inc. company or any alteration or repair by others in such manner as in Puck Custom Enterprises, Inc. company's judgment affects the Products materially and adversely, shall void this Warranty.

"NO EMPLOYEE OR REPRESENTATIVE IS AUTHORIZED TO CHANGE THIS WARRANTY IN ANY WAY OR GRANT ANY OTHER WARRANTY UNLESS SUCH CHANGE IS MADE IN WRITING AND SIGNED BY AN OFFICER OF PUCK CUSTOM ENTERPRISES AT ITS HOME OFFICE."

LIABILITY FOR DELAYS

No liability shall attach to Manufacturer direct, or indirect, incidental or consequential damages or expenses due to loss, damage, detention of delay in delivery of Products resulting from acts or delays beyond its control.

Title

To the Purchaser.....	1
Warranty.....	2
Safety Signs.....	4
Safety.....	6
Operation Instructions.....	9
Maintenance.....	14
Troubleshooting.....	15
Parts List.....	16



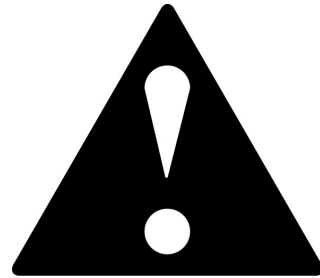
CAUTION:
NEVER OPERATE THIS EQUIPMENT UNTIL OPERATOR FULLY UNDERSTANDS THE COMPLETE CONTENTS OF THIS MANUAL. IT IS THE BOAT OWNER'S FULL RESPONSIBILITY TO PROVIDE SATISFACTORY SAFETY AND OPERATION INSTRUCTIONS TO ANY USER OF THIS EQUIPMENT.

This is important to prevent injury or death to the operator. The safe handling of this equipment will help minimize damage to the boat. If you, or any other operator of this equipment have any questions about sections of this manual, please contact your dealer.

Safety Signs

IDENTIFY SAFETY ALERT SYMBOL

This safety alert symbol indicates important safety information in the manual or on the equipment. Be alert to the potential of personal injury or death. Carefully read the information following each safety alert symbol.



KNOW SIGNAL WORDS

DANGER: Indicates an imminently hazardous situation that, if not avoided, will result in death or serious injury.

WARNING: Identifies a potentially hazardous situation that, if not avoided, could result in death or serious injury.

CAUTION: Identifies a potentially hazardous situation that, if not avoided, may result in minor or moderate injury.



FOLLOW SAFETY INSTRUCTIONS

Safety sign instructions must be read, understood and followed to be effective. Safety signs and decals provide very important information and instructions that alert you of dangers and hazards that are or can be present during the operation of this equipment.

Become familiar with all controls before operating machinery.

If any part of this manual is unclear and you need assistance to properly operate the machine or understand this manual, please contact your dealer.

READ AND UNDERSTAND THIS OPERATORS MANUAL AND BECOME FAMILIAR WITH ALL CONTROLS BEFORE OPERATING MACHINERY.

Safety Signs

REPLACEMENT OF SAFETY SIGNS

Safety signs or decals must be kept clean and readable. If they become unreadable for any reason, they must be replaced with an identical replacement decal. Safety decals must also be replaced if parts are repaired or replaced with new parts that do not already include the necessary safety decals.

REPLACEMENT DECALS

Order replacement decals by part number through your nearest dealer. Part numbers are listed above.

APPLICATION OF SAFETY DECALS

Surface preparation is very important for safety decals to properly adhere. Grease, oil and dirt must be removed and the surface must be smooth and dry. Most decals have a split backing which is meant to be removed from the split outward. To apply the decals follow these procedures:

1. Position the decal in the proper location and hold firmly over the largest portion of backing.
2. Use one hand to hold the decal in position, with the other hand carefully roll the loose end over and peel the backing outward. When the backing is removed as described with even and gradual pulling, the decal will roll onto the surface smooth and wrinkle free.
3. With the smallest portion of the decal attached, the same procedure can be applied to the other half.
4. When the decal has been attached in place, use a cloth or soft paper towel to burnish the decal onto the cleaned surface. Work gently from the middle outwards to avoid creating any wrinkles.

**TO AVOID PERSONAL INJURY, DEATH OR DAMAGE TO THE MACHINE,
ALWAYS OBSERVE AND FOLLOW SAFETY PROCEDURES**

Safety

BE CAUTIOUS WHEN OPERATING HYDRAULIC EQUIPMENT

Hydraulic pressure can be very dangerous and can cause serious personal injury and death. Be sure to relieve all pressure before disconnecting hydraulic lines.

Hydraulic fluid escaping from a very small hole can be almost invisible. Use a piece of cardboard or wood, not your hands, to search for leaks.

If injured by escaping hydraulic fluid, seek medical attention immediately. Serious infection or reaction may develop.



CLEAR AWAY ANY FOREIGN OBJECTS

Before use, make sure that the unit does not have any foreign objects or material in it that can cause equipment damage or personal injury.

KEEP RIDERS OFF MACHINE

Never allow anyone to ride on the unit at anytime.

DO NOT OPERATE OR PERFORM MAINTENANCE UNDER THE INFLUENCE OF ALCOHOL OR DRUGS

Never operate or perform maintenance on this equipment while under the influence of alcohol or drugs.

Safety

DO NOT RIDE

No one for any reason should be on the agitation boat while it is on the lagoon. Riding the boat while on the lagoon can cause serious injury or even death. If there is a problem with the boat turn it completely off and remove from the lagoon before servicing.



CLEAN OUT HATCH

Be sure to shut pump off and release pressure before opening hatch. Failure to do so could cause injury.



SAFETY CHAINS

Four safety chains found on each corner of the flotation, must be on and tightened before the boat is placed in the water. Twist chain tight when attaching to flotation for added reinforcement.



BEWARE OF DANGEROUS PINCH POINTS

There are pinch points located on the wings and front/back control nozzle of the boat. Keep all body parts away from pinch points to avoid serious injury. Stay clear while unit is in operation.



Safety

TO AVOID BODILY INJURY

No one for any reason should be on the unit while it is in operation. Before servicing unit shut it down entirely and remove from lagoon. Utilize personal floating devices as required. Remember being on a lagoon is extremely dangerous and should be avoided at all times. If you are to leave the unit running attended please refer to the stationary agitation procedures for information. Avoid handling the unit while the power is on and it is running.



CAUTION

TO AVOID BODILY INJURY:

1. STAY OFF machine during OPERATION and transport. KEEP OTHERS OFF.
2. DISENGAGE and SHUT OFF all engine power and REMOVE FROM LAGOON before servicing or unclogging machine.
3. KEEP hands, feet & clothing AWAY from PUMP INTAKE & OUTFLOWS.
4. Use PERSONAL FLOTATION DEVICES when necessary.
5. READ operator's MANUALS for additional instructions on safety, service, and operation.

ROTATING FAN

When the engine is running keep arms and legs away from the rotating fan. The fan is very dangerous and may cause serious injury. Be sure to turn the engine off and wait for it to stop moving before servicing.



WARNING

**ROTATING FAN
STAY CLEAR
WHEN IN MOTION**

OUTFLOW

All of the outflows on the boat are high pressure. Never be anywhere near the outflow nozzle while the unit is running. **Stay out of and away from any liquid that could potentially be pulled into the pump's intake.**

GATE 3
HIGH PRESSURE
OUTFLOW



INFLOW

Inflow nozzle has very high pressured suction. Serious injury could occur when the pump is running. Stay clear of inflow and outflow.

INFLOW

Operating Information



WARNING! BEFORE YOU BEGIN

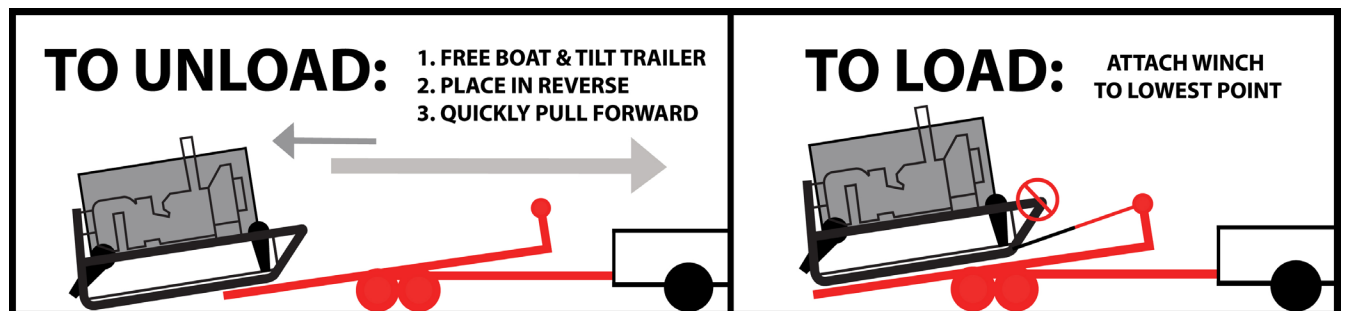
Before operating this Agitation Boat, make sure that you are familiar with all procedures involved in safe and effective use of the equipment.



Before operating the Agitation Boat make sure there is no one on the machine. Keep everyone away while operating. Never allow anyone to ride the boat at any time. Never operate this Agitation Boat if any part is damaged or missing.

TRANSPORT

Hinged flotation makes for easy transport with a truck and trailer. When transporting your agitation boat make sure that it is securely attached to the trailer. The hinged flotation should be all the way retracted. Make sure the winch is securely attached to the agitation boat and that it is pulled tight. Utilize safety chains and tie-downs. Do not use this trailer to transport anything other than your agitation boat as it designed only for that purpose.



UNLOADING

When unloading the agitation boat unhook the winch, tilt the trailer up, back truck and trailer up then quickly pull forward so the boat slides off the trailer. Stay away from the back of the trailer while unloading. **Always Place the agitation boat into the water using a loader tractor.**

LOADING

Always use a loader tractor to remove unit from lagoon. When loading the agitation boat tilt the trailer down, **attach the winch to the lowest possible point on the agitation boat.** Make sure the chain is hooked only near the ground. Center the agitation boat with the trailer before pulling the agitation boat up. After the agitation boat is loaded tilt trailer back so it is level. Use safety chains to secure unit to trailer.

Operation

The master ON / OFF switch turns on and shuts off power to the entire unit.

Make sure switch is turned to “On” before placing into the lagoon.

TURN OFF UNIT WHEN NOT IN USE BY USING THE MANUAL MASTER ON/OFF SWITCH.

ON / OFF

HYDRAULIC LEVERS

FOR USE ON SHORE, these hydraulic levers control the following boat functions:

Wings: Controls the hinged flotation.

Steering - Forward/Reverse: Moves the back nozzles

Steering - Left/Right: Moves the front nozzle

Gate 1: Opens and closes Gate 1

Gate 2: Opens and closes Gate 2

Gate 3: Opens and closes Gate 3

UP	FORWARD	LEFT	OPEN	OPEN	OPEN
WINGS	STEERING		GATE 1	GATE 2	GATE 3
DOWN	REVERSE	RIGHT	CLOSE	CLOSE	CLOSE

LOWER FLOTATION DEVICES

MAKE SURE YOU, AND ANYONE ELSE, IS CLEAR OF PINCH POINTS.

By using the Hydraulic Levers, lower the hinged flotation by pressing down on the hydraulic lever.

*****ATTACH AND TIGHTEN SAFETY CHAINS TO SECURE FLOATATION*****

Operation

CHECK ALL MAINTENANCE REQUIREMENTS BEFORE OPERATION

USING THE WIRELESS REMOTE

WHILE BOAT IS ON SHORE:

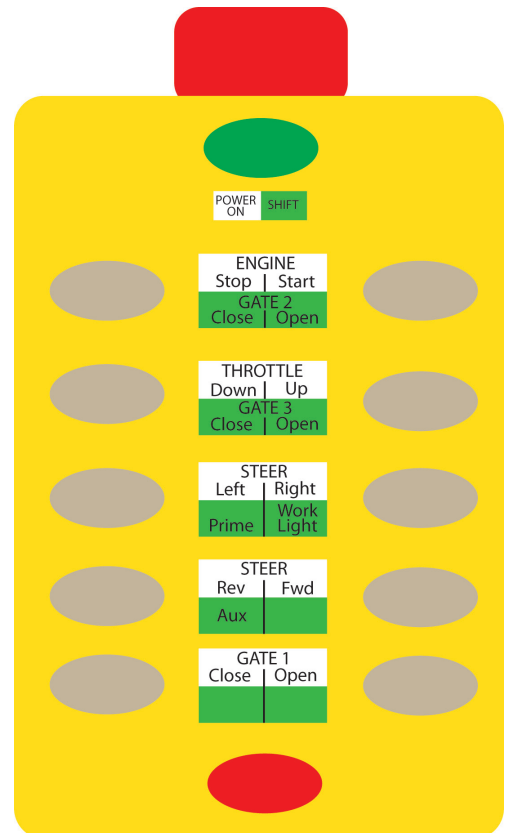
- Press the E-Stop Button down (on top of remote)
- Push Green Button Once
- Release the E-Stop Button (by twisting upward)
- Push the Start Button Once (top right button)
- Check the boat's control panel - all lights should turn green.
- Push and Hold the Start Button to Engage Engine and ensure start capabilities.
- **Shut Engine off** by pressing one of the 3 Stop Buttons on the remote.



WIRELESS REMOTE

The wireless Remote is set up as shown in the picture to the right. **The large master shut off button (E-Stop) is on the top of the remote.** The green button is the start button and the shift for all of the secondary commands. **The bottom red button is Shut Off.**

ROW	LEFT BUTTON	RIGHT BUTTON
1 1+Green	STOP Close Gate 2	START Open Gate 2
2 2+Green	THROTTLE DOWN Close Gate 3	THROTTLE UP Open Gate 3
3 3+Green	TURN LEFT Prime	TURN RIGHT Work Lights
4 4+Green	REVERSE Auxiliary	FORWARD Auxiliary
5	CLOSE GATE 1	OPEN GATE 1



Operation

PLACING THE AGITATION BOAT INTO THE LAGOON

- ALWAYS USE A LOADER TRACTOR TO PLACE UNIT INTO LAGOON OR REMOVE IT FROM LAGOON. BE SURE TO ACCESS THE LAGOON ON A DIRT BANK. ROCKS AND CEMENT WILL DAMAGE THE FLOTATION.
- DO NOT START THE AGITATION BOAT BEFORE IT IS ALL THE WAY IN THE LAGOON.
- STAND A SAFE DISTANCE FROM THE SHORE WHEN OPERATING THE WIRELESS REMOTE

WHILE BOAT IS ON LAGOON:

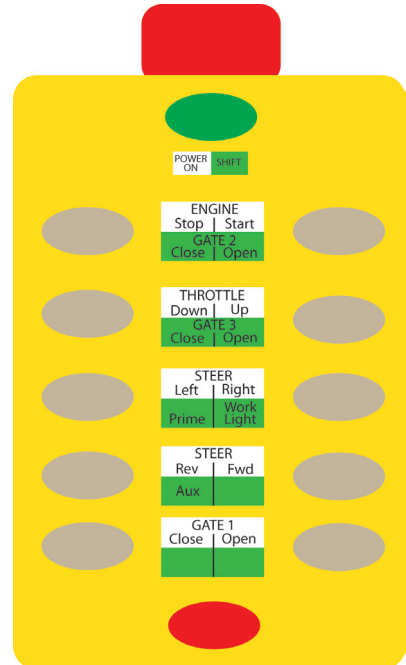
- Press the E-Stop Button down (on top of remote)
- Push Green Button Once
- Release the E-Stop Button (by twisting upward)
- Push the Start Button Once (top right button)
- Push and Hold the Start Button to Engage Engine

PREPARING TO PRIME PUMP:

- **Close GATE 1:** Press & hold bottom left button
- **Close GATE 3:** Press & hold green button & second left button
- **Open GATE 2:** Press & hold green button & top right button
- **Rotate Rear Nozzles to Reverse:** Press & Hold fourth left button
- **PRIME PUMP:** Press & hold green button & third left button

ONCE PUMP IS PRIMED:

- Continue to back boat away from shore in Reverse
- **Open GATE 1** for left/right steering
- Agitate lagoon by directing the boat with the wireless remote



GATES

All three of the gates are clearly marked on the agitation boat by these decals.

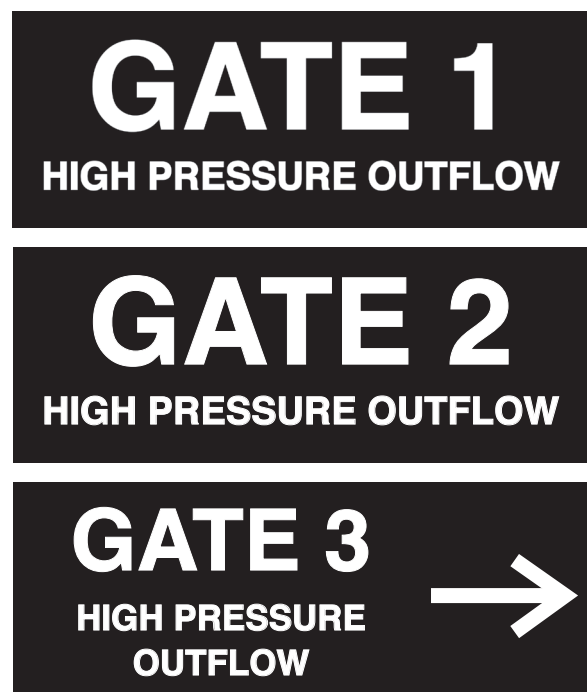
Gate 1: Shuts off flow to front of boat. Used for steering the agitation boat **left and right**.

Gate 2: Shuts off flow to rear of boat. Used for moving the agitation boat in **forward or reverse**.

Gate 3: Is a multipurpose front “cannon.”

- Used on the lagoon to break up solids
- Used for attaching a hose for utility transferring, when “docked” by shore.

All of the gates can be opened and closed by either the control panel on the boat or on the wireless remote.



Operation

PUMP SHOULD NOT SHAKE OR VIBRATE

Check for signs of cavitation. If the pump is vibrating or shaking excessively or if there is a wake or ripple in the water your pump may be cavitating. If the pump is cavitating, lower the Engine RPM. Check the pump for debris stuck in the impeller. Check to make sure there are no air leaks.

If problems persist, please call PCE at 712-653-3045

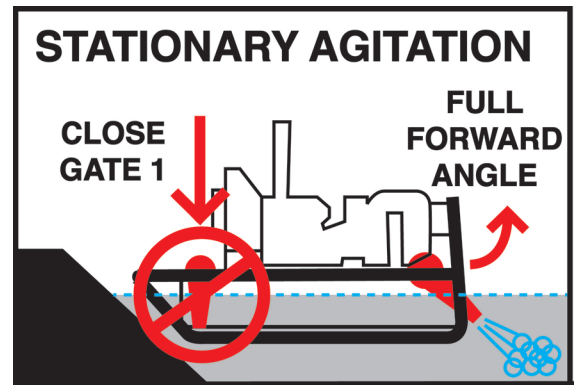
**DO NOT ALLOW
PUMP TO
CAVITATE**

**PUMP SHOULD NOT SHAKE
OR VIBRATE**

Lower Engine RPM, Refer to Pump Curves,
Check Pump for Debris / Unit for Air Leaks,
Call PCE: 712-653-3045

STATIONARY AGITATION

When using your agitation boat for stationary agitation bring the boat against the lagoon bank. Make sure that gate 1 or the left/right nozzle is off so it does not damage bank. Also make sure that the back two nozzles are at a full forward angle.



AFTER EACH USE

PREPARE TO REMOVE UNIT

- Find a bank clear of rocks, sharp objects, or cement that could potentially damage flotation.
- **Close Gate 1** to keep from damaging the bank, and bring the unit to shore.
- **Turn the engine OFF**
- **Open all Gates** - so liquid will drain when being pulled from lagoon.
- Using Caution, attach chains to a low point on the front of the unit.
- Pull the boat from the lagoon with the tractor.

ONCE ON SHORE

- Empty Moisture Trap on Priming System
- Make other maintenance checks
- IF COLD WEATHER: Stand Clear of unit, Open all gates, run the motor 10-20 seconds to clean out the pump.
- **UNHOOK ALL SAFETY CHAINS**
- Make sure everyone is off unit, and standing clear of any pinch points.
- Use Hydraulic Lever to retract Floataion
- Load onto Trailer

IF TRANSPORTING A LONG DISTANCE WE RECOMMEND STRAPPING THE FLOTATION TOGETHER ON THE TOP.

Maintenance

BEFORE EACH USE

- Check the hydraulic lines and couplers to make sure they are in satisfactory working condition.
- Check the hydraulic tank for fluid level. Add hydraulic oil as necessary.
- Make sure all four safety chains are on the hinged flotation and that they are twisted tight.

HYDRAULIC OIL

SECONDARY VACUUM SHUT-OFF

Part of the priming system, the secondary vacuum shut-off requires daily cleaning. Often Debris and Liquid will reach the Secondary Vacuum Shut-Off Canister. Before and after each use, open the drain valve at the bottom and remove the top to clean out any debris.

**DRAIN & CLEAN
OUT DEBRIS
DAILY**

DRAIN WATER FROM OIL RESERVOIR

The Cornell Pump's run-dry seal requires to lubrication with oil. Condensation will build up and it must be drained to allow oil to reach the seal.

**OPEN THE SPICKET CONNECTED TO THE PUMP AND
OIL RESERVOIR DAILY UNTIL OIL BEGINS TO DRIP OUT.**

**DRAIN
WATER DAILY**
REFILL WITH OIL
WHEN NEEDED

CHECK OIL AND COOLANT

Everyday before turning the unit on, check the oil and coolant levels so ensure the agitation boat will run with the highest efficiency.

If oil-sulfur content exceeds 5,000 PPM check the Engine owners manual.

**CHECK
OIL & COOLANT
LEVELS DAILY**

SEE OWNER'S MANUAL FOR SERVICE DETAILS

Oil Change Interval:
Standard Oil: 250 HRS

9.0L Engine Filters:
Oil: RE509672 Fuel: RE525523

6.8L Engine Filters:
Oil: RE504836
Fuel: RE522878 and RE529643

4.5L Engine Filters:
Oil: RE504836
Fuel: RE522878 and RE529643

IF OIL-SULFUR CONTENT EXCEEDS 5,000 PPM
CHECK OWNER'S MANUAL

VACUUM PUMP OIL

Be sure to use the correct vacuum pump oil in your pump.
ISO-68 Synthetic Blend non-detergent. Check belt for tension.

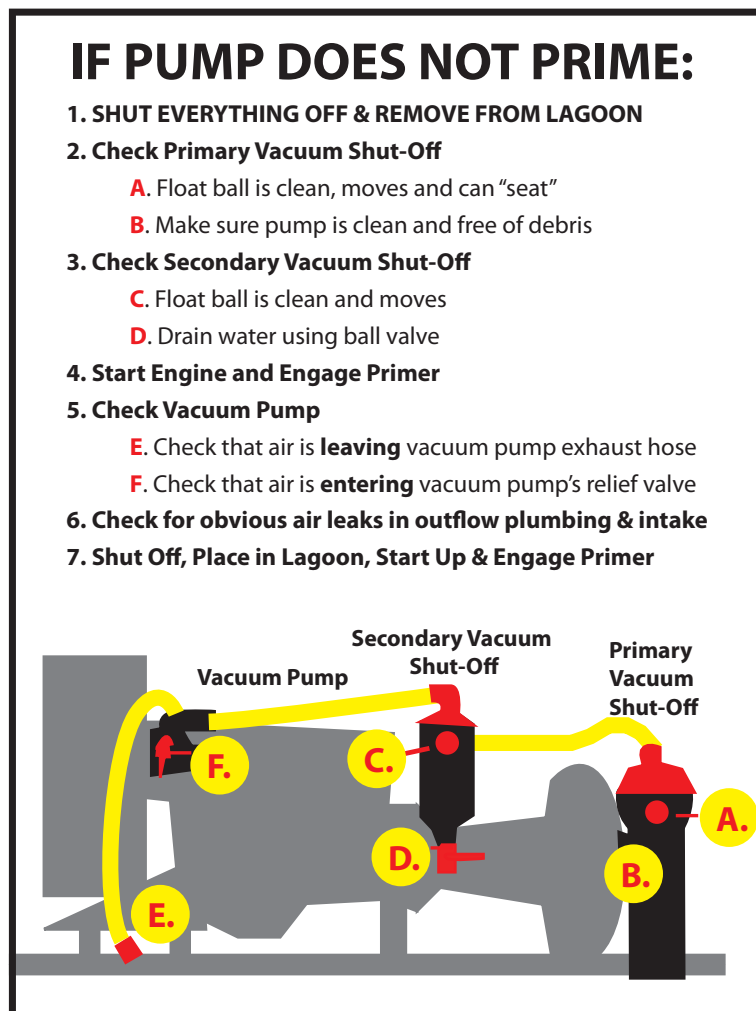
VACUUM PUMP OIL
ISO-68 Synthetic Blend
NON-DETERGENT

Troubleshooting

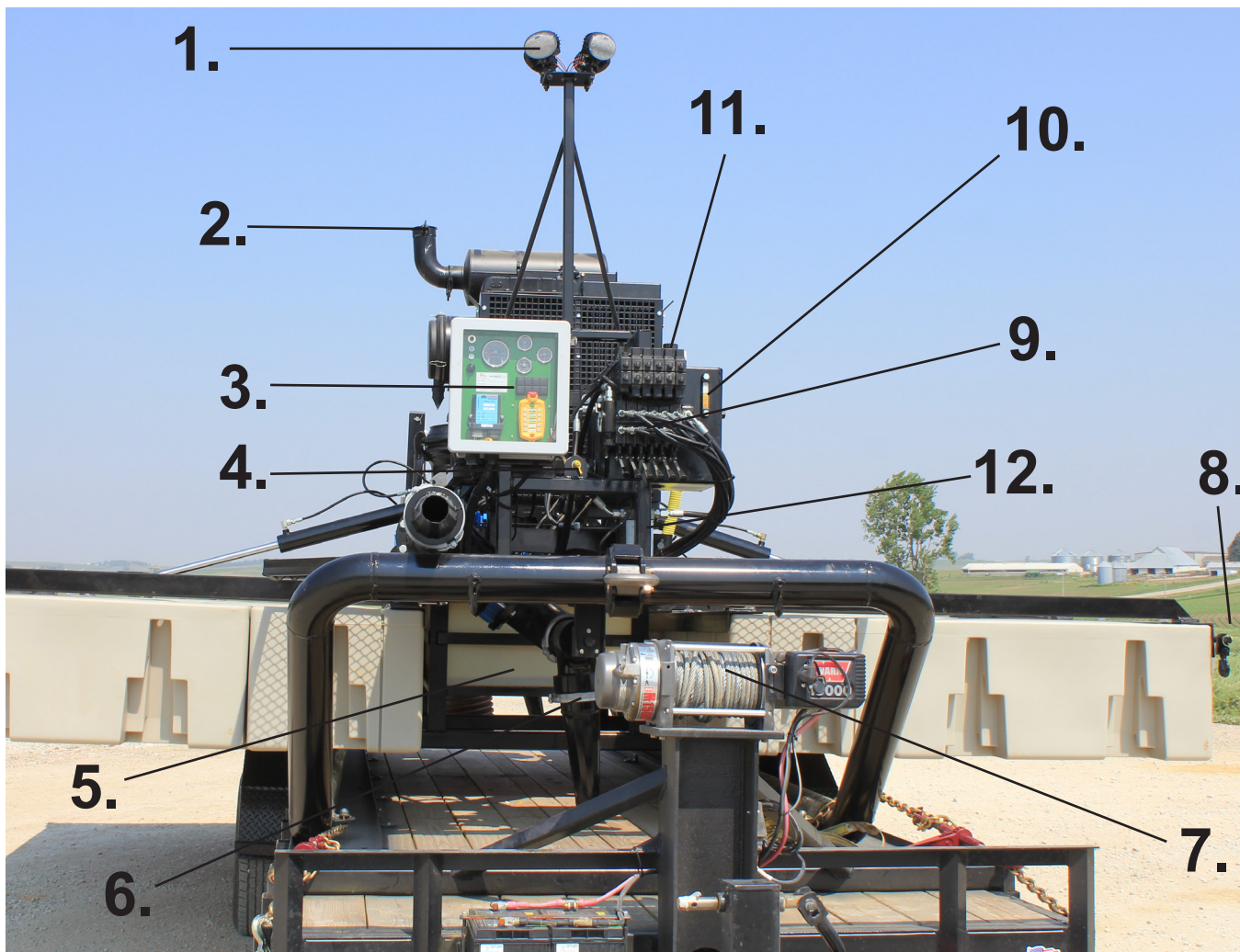
IF PUMP IS NOT PRIMING

SHUT THE UNIT OFF COMPLETELY AND REMOVE FROM LAGOON BEFORE CHECKING FOR THE PROBLEM.

- Check primary vacuum shut-off first, this is the tower that leads into the pump. Take the lid off the tower and be sure the float ball is clean and moving freely and can “seat”, also make sure the pump is clean and free of debris.
- Check the secondary vacuum shut-off next, this is the tower that the primary vacuum shut off leads into. Again remove the lid and be sure the float ball is clean, moves freely and can “seat”. Drain any water out of the secondary vacuum shut-off using the ball valve that is right beneath it.
- Start up the engine and engage the primer.
- Check the vacuum pump, which the secondary vacuum shut-off runs into. It is located right above the engine. Check that air is leaving from the end of the vacuum pump’s exhaust hose. Also check that air is entering the vacuum pump’s relief valve which is located on the vacuum pump.
- Check for obvious air leaks in outflow plumbing and intake. Try closing each gate to check for O-ring leaks.
- Shut off the engine and primer, place the agitation boat into the lagoon, and start the engine and primer back up.
- Refer to the diagram below, for further problems or questions call **PCE 712-653-3045**



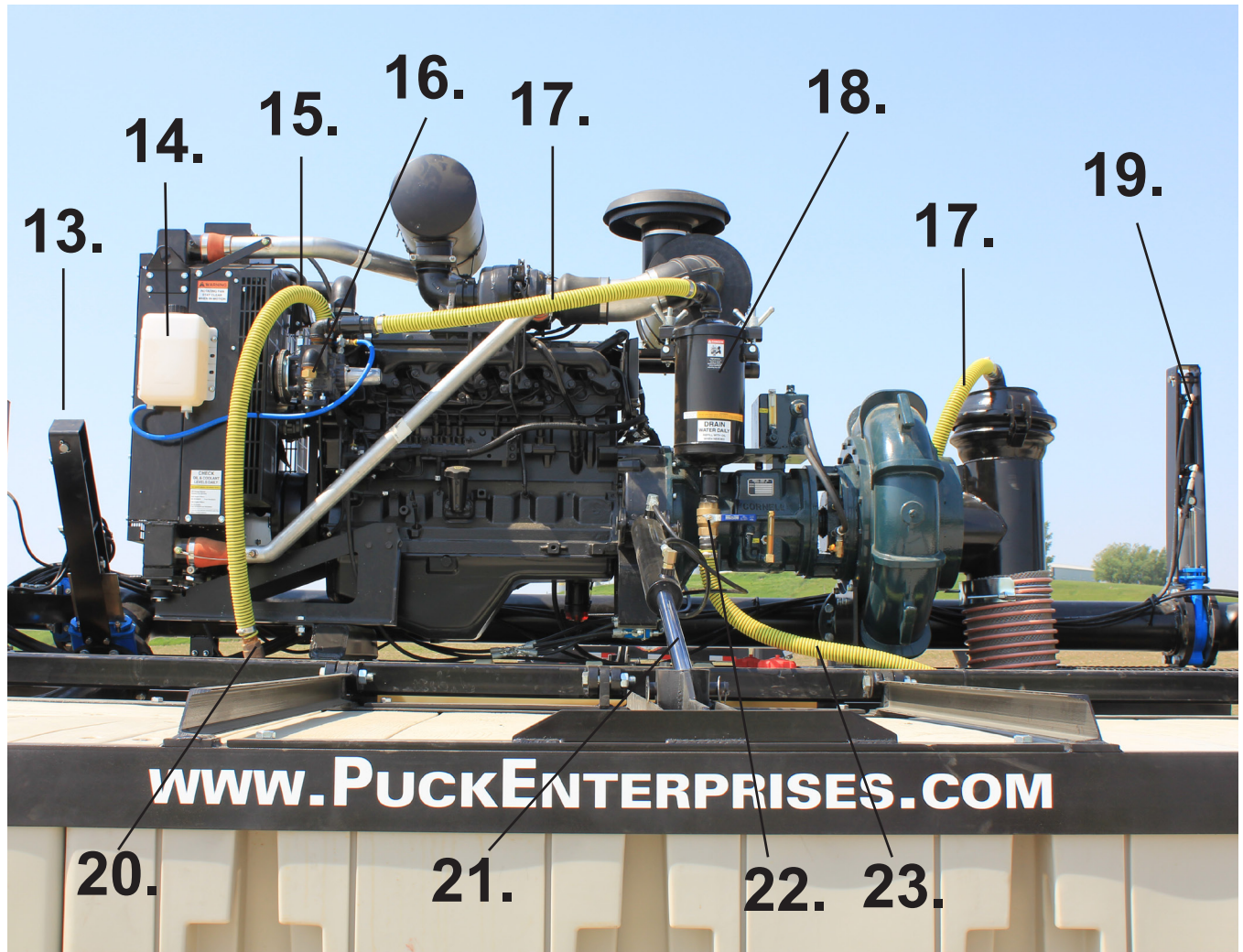
Parts



- 1. Lights
- 2. Rain Cap
- 3. Control Box
- 4. Master Disconnect
- 5. Fuel Tank
- 6. 6 Inch Clamp

- 7. Winch
- 8. Tie Down Hook
- 9. Valve Stack
- 10. Reservoir
- 11. Electric Solenoid
- 12. Hydraulic Oil Filter

Parts



- 13. Gate 1
- 14. Vacuum Pump Oil Reservoir
- 15. Exhaust Hose
- 16. Vacuum Relief
- 17. Suction Hose

- 18. Moisture Trap
- 19. Gate 2
- 20. Check Valve
- 21. Wing Cylinder
- 22. Drain/ Ball Valve
- 23. Drain Hose

