P.O. Box 1527, Greenville, NC 27835-1527 Greenville Blvd, NE, Greenville, NC 27834 919/752-2111 FAX: 919/752-4217

Dear Grady-White Owner:

Welcome aboard!

Buying and owning a boat is a very special experience. Of all the many products you'll ever own we want your Grady-White experience to be the absolute best. That means providing you the descriptions, explanations and technical support that you need to enjoy your Grady-White with confidence and security.

Your Grady-White exceeds all U.S. Coast Guard safety standards and is built to standards certified by the National Marine Manufacturers Association (NMMA). Best of all, your boat is built to Grady-White standards, standards that have served our owners through some truly extraordinary conditions since our first models built in 1958.

The seaworthiness and safety of your Grady-White is highly dependent on your operation, maintenance and care of your boat, so please read this manual thoroughly and keep it around for reference. Moreover, if you need further explanation or "hands-on" help don't hesitate to ask the people at your Grady-White dealership; they have experience with the systems and operations of your boat. If for any reason you need further help, please feel free to call us at the factory. We sincerely want to provide you with the help and information that will make your Grady-White experience delightful.

Thanks for choosing a Grady-White. All of us at the factory and at your dealership are dedicated to carning your confidence in Grady-White Boats. Again, welcome aboard.

Sincerely yours,

GRADY-WHITE BOATS, INC.

Kris Sheppard President

## CONSUMER INFORMATION

## OWNER'S PACKET

Your Grady-White contains many features and accessories that has existing printed material provided by the various equipment manufacturers. This information is compiled in a package that we will reference throughout this manual as an "Owner's Packet." This Owner's Packet includes a Grady-White Owner's Manual and Engine Manuals to advise on operation, service, specifications, maintenance, warranty, and other useful facts. While reading your Grady-White manual, you will find other technical literature referenced as resources for detailed information. The Owner's Packet will also consist of operation guides, informative labels and product warranties you will need to be acquainted with. Your Owner's Packet can also be utilized to retain instructions and data compiled on additional equipment and accessories installed after delivery.

YOU AND YOUR BOAT, a book published by National Marine Manufacture's Association (NMMA), has been included with your Owner's Packet as a supplement. This publication will be referenced in your Grady-White Owner's Manual to present additional instructions and information on basic boating.

## WARRANTY INFORMATION

The Grady-White warranty is located on the last page of this manual. Upon the purchase of your new Grady-White Boat, the dealer will fill out a warranty card. This card will be kept on file at the dealership and the Grady-White factory. A copy will be provided for your records and should be kept with other valuable documents for future reference. For questions regarding your warranty please contact your dealership.

#### DEALER'S RESPONSIBILITIES

Throughout the fabricating and assembly processes your Grady-White has undergone a series of strict inspections. Subsequent to the final factory overview your dealer must perform additional pre-delivery checks and approve your Grady-White for delivery.

Dealer responsibilities include providing the following:

- An orientation of the general operation of your Grady-White.
- A warranty card to be completed and signed by the dealer and the consumer. This warranty card is to be sent to Grady-White Boats to validate the warranty.
- An explanation of safety considerations regarding the use of containment systems and components.
- A complete Owner's Packet containing literature and information regarding your Grady-White and its separate warranted products, operation, installation and maintenance instructions.
- A review of all warranties, pointing out the importance of mailing warranty and registration to various manufacturers within the required time limits.
- Guidance on acquiring local and out of area service during and out of warranty periods.

## CONSUMER RESPONSIBILITIES

The following are responsibilities of the Grady-White owner:

- · Read and understand the express limited warranty.
- Study in detail all literature and instructions enclosed and use all equipment in accordance.
- Examine the boat and confirm all systems are working suitably at the time of accepting delivery.
- Render proper maintenance and periodic servicing of the boat in accordance with suggestions in the Owner's Manual.
- Return the boat, following 20 hours of operation, to the selling dealer for its 20 hour inspection.

When contacting your dealer concerning warranties or service, please have all relevant information such as serial numbers, model numbers etc. available. This information is on your copy of the warranty card.

Grady-White Boats has a permanent record of your boat, which is retained under its "Hull Identification Number" (HIN). Data regarding equipment and accessories, as well as dealer/shipping information is documented.

The "Hull Identification Number," located on the starboard side of the transom, is a significant source for identification and must be noted in all correspondence and orders. Failure to include HIN only creates delay.

## HAZARD WARNING SYMBOLS

The hazard warning symbols shown below are applied throughout this manual to alert the customer to potentially dangerous situations which can lead to death, personal injury and/or product damage. We urge you to observe these warnings cautiously and comply with all safety recommendations.

## 1 13 82 45 88 6 6 6 7 -

The state of the s

THIS SYMBOL ALERTS YOU TO IMMEDIATE HAZARDS WHICH WILL CAUSE SEVERE PERSONAL INJURY OR DEATH IF THE WARNING IS IGNORED.

## <u> Awarning</u>

THIS SYMBOL ALERTS YOU TO HAZARDS OR UNSAFE PRACTICES WHICH COULD RESULT IN SEVERE PERSONAL INJURY OR DEATH IF THE WARNING IS IGNORED.

## A CAUTION

THIS SYMBOL ALERTS YOU TO IMMEDIATE HAZARDS WHICH COULD RESULT IN MINOR PERSONAL INJURY, OR CAUSE PRODUCT OR PROPERTY DAMAGE IF THE WARNING IS IGNORED.

## **MNOTICE**

THIS SYMBOL CALL ATTENTION TO INSTALLATION, OPERATION OR MAINTENANCE INFORMATION WHICH IS IMPORTANT TO PROPER OPERATION, BUT IS NOT HAZARD RELATED.

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## CHAPTER ONE BOATING SAFETY

## REQUIRED SAFETY EQUIPMENT

The US Coast Guard (USCG) requires that every boat between 26 and 40 feet have specific equipment on board. Check with local regulations on mandatory equipment apart from the list of Coast Guard requirements. Read You and Your Boat for limited stipulations and facts pertaining to the items listed below.

#### FIRE EXTINGUISHER

Your boat must be equipped with (2) marine approved fire extinguishers. Check extinguishers regularly for charge status.

## PERSONAL FLOTATION

Each passenger must have a USCG approved personal flotation device (PFD).

## SOUND SIGNALING DEVICE (HORN, WHISTLE OR BELL)

Your Grady-White is equipped with a marine horn that meet the USCG stipulations of a sounding device on board.

#### VISUAL DISTRESS SIGNALS

USCG approved visual distress signals are required for day and night use when operating on US waters.

#### LIGHTING

Grady-White boats are equipped with navigational lights that meet the prerequisites for inland or international waters.

## ADDITIONAL RECOMMENDED EQUIPMENT

In addition to the required safety equipment, there are additional items that will provide an extra margin of safety and convenience for you and your passengers while boating. For an extended list of basic gear, tools and spare parts reference the pamphlet You and Your Boat enclosed with this manual.

Keep tools and spare parts in good condition. Replace parts removed from spare parts kit. Most importantly use US Coast Guard approved or marine certified parts.

Do not attempt any repairs or maintenance you do not understand or have proper tools to perform. Contact your Grady-White dealer or another reputable service center.

#### **REGISTRATION NUMBERS**

Federal and State laws require a power boat to be registered in the State where it is primarily used. Registration numbers and validation stickers must be displayed according to regulations. The registration certificate must be on board when boating. The boat serial number or Hull Identification Number (HIN), is required on the registration form. The HIN is located on the upper right hand corner of the transom and is the most important identifying factor. The HIN should be included on all documents and any correspondences to provide you timely service.

## **EMERGENCY STOP SWITCH**

Some Grady-Whites are equipped with and emergency stop switch. This is a safety feature that, if used, will shut the engines down if the operator leaves his position. This ignition shutdown switch includes a shut-off switch, switch clip, lanyard and lanyard clip. The lanyard clip is attached to the operator. If a situation arises where the engine must be shut down, a pull on the cord to release the clip from the shut-off will shut down the engines. To reset the ignition shut down switch, simply reinstall the switch clip above the shut-off switch and flip the switch to the up position. The ultimate decision to use the emergency stop switch rest with the owner/driver.

#### **EMERGENCY INFORMATION**

While boating unpleasant situations may develop. When emergency situations materialize you should prepare yourself on how to cope with them, whether they happen aboard your vessel or someone else's. Anticipate a gameplan for specific situation that may occur such as fire, man overboard or a collision etc., to give you the confidence and ability necessary for an emergency. A key factor is to remain calm, familiarize yourself with the procedures in *You and Your Boat* for emergency situations.

#### RENDERING ASSISTANCE

The owner or operator of a vessel is required by law to render all practical or necessary assistance to any person or vessel affected by collision, accident or casualty. However, you should not endanger your vessel or passengers to render assistance.

#### ACCIDENT REPORTING

Report all boating accidents to your local authorities. Federal regulations require boat operators that are involved in an accident to submit a written report within 48 hours.. In the event of death or disappearance, notification is required immediately by phone or radio, in addition to the written report. These reports can be submitted to the State Boating Law Administrator. Forms can be obtained through USCG, local harbor patrol offices, sheriff, and police stations.

## LIGHTNING PRECAUTIONS

This awareness is included to ensure the safety of the owner and passengers. Always be mindful of the weather! When a lightning storm advances obvious safety precautions should be taken. Dock the boat and seek shelter on land. If this is not possible seek refuge inside the boat until the storm has passed. Stay out of the water! Lightning will seek a ground when it strikes, for that reason avoid contact with metal parts of the boat.

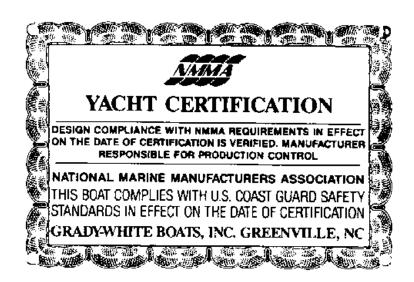
## **BOATING SAFETY TIPS**

Certain precautions will enhance you and your passengers' boating safety and pleasure. Read your pamphlet You and Your Boat for recommendations in addition to the ones listed below:

- Study all Operation and Maintenance Manuals for your Grady-White before operation. For any questions or concerns, contact your dealer. Proper operation and maintenance will insure quality performance and the longevity of your boat.
- A written float plan left with a reliable person will be valuable information in the event of a mishap and you do not return on time. **Upon returning** inform the holder of the float plan. This will prevent false alarms about your safety.
- Never operate or allow anyone to operate your boat while under the influence of drugs or alcohol.
- Do not allow individuals under 16 years of age to operate your boat.
   Inexperienced drivers should not be allowed to operate the boat without constant and direct supervision.
- Instruct at least one person to pilot your boat and be familiar with basic boating techniques and safe operation in the event of an emergency.
- While boating, passengers should be settled in a safe position. Handholds and rails should be used. **Do not allow** bow-riding, transom or gunnel riding.
- Keep your boat speed under control. Respect for other boaters and those on shore is common courtesy. The operator of the boat is responsible for injury or damage caused by the boat's wake. Your wake could swamp or damage a smaller craft or endanger its passengers. Stay alert for posted "No Wake Zones".
- Never allow swimmers/skiers to enter or exit the boat with the engines running. A shift lever in neutral could become engaged, causing severe harm to swimmers. Do not operate your boat in swimming or diving areas at any time.
- When venturing into foreign waters, collect information on the boating area. Obtain charts for new areas whenever possible.
- Recommend boat shoes or tennis shoes to passengers to prevent slipping or falling.
- Read and understand the "Rules of the Road" in You and Your Boat for a better
  understanding of who has the right of way when crossing or taking over another
  vessel. This will provide you with tips on signaling for distinct situations.

#### CERTIFICATION

At the helm station, you will find a NMMA (National Marine Manufacturers Association) Yacht Certification tag. This means your yacht complies with Coast Guard safety standards. (NOTE: Any boat with an overall length of 26 feet or greater is defined as a "yacht" by NMMA.)





This label means that your Grady-White is certified by the NMMA With this tag, you are assured that your fuel system, electrical system, lighting, ventilation, and steering, are not only in compliance with the US Coast Guard regulations, but also meet the more stringent standards of the NMMA. The NMMA is a national trade organization serving all elements of the recreational boating industry, including manufacturers of boating equipment. With this tag, you can have confidence in the quality of your boat.

## BASIC FLOATATION

THIS BOAT HAS "BASIC FLOTATION" AS DEFINED BY ABYC STANDARD H-8.

This label means that Grady-White has designed and built your boat to the ABYC basic flotation standard H-8. Basic flotation is defined as having enough foam, in the boat, to create buoyancy and prevent sinking under swamped conditions.

## LOADING CAPACITY

Though overloading is a primary cause of many boating accidents, improper loading is equally hazardous. Boaters should not only pay attention to the amount of weight, but also to the **distribution** of weight within the boat.

## **CARBON MONOXIDE**

DO NOT INHALE EXHAUST FUMES! EXHAUST FUMES CONTAINS CARBON MONOXIDE THAT IS A DANGEROUS GAS THAT IS POTENTIALLY LETHAL.

Exhaust fumes contain carbon monoxide (CO), an odorless and colorless gas. Carbon monoxide is poisonous and a health hazard that can be fatal if breathed over an extended period of time. Symptoms of CO poisoning can include: dizziness, nausea, headache, sleepiness, vomiting, throbbing in temples, muscular twitching, and the inability to think clearly. If you or anyone else experience these symptoms, immediately get away from fumes and into an area where plenty of FRESH air can be consumed. If any symptoms from above persist, seek medical attention.

Carbon Monoxide is the gas formed by the combination of one molecule of carbon and one molecule of oxygen. Chemists refer to it as CO, its chemical formula, "C" for carbon and "O" for oxygen. Its weight is about the same as air, so it cannot be expected to rise or fall like some other gases, but will distribute itself throughout space.

Carbon monoxide can accumulate in cabins and under canvas. If your boat is equipped with canvas that encloses the aft cockpit and the propulsion equipment, do not operate the boat with this canvas closed.

The boat operator should be aware that CO is emitted from any boat's exhaust. The operation, mooring, and anchoring in an area containing other boats may be in an atmosphere containing carbon monoxide that is not of the operator's making. An operator, likewise, needs to be aware of the consequence of his actions on other boats. Of primary concern is the operation of an auxiliary generator with boats moored along side each other.

## AWARNING

When operating center console or cuddy cabin at cruising speeds, slow speeds, or dead in the water with canvas tops, side curtains and/or back curtains in place, be careful of engine exhaust to ensure that emissions do not accumulate in boat interior. Maintain proper ventilation by adjusting canvas enclosure.

## SUGGESTED BOATING CLASSES AND READING MATERIAL

Like a car, boats must be operated according to safety rules and traffic regulations. Although we include some basic boating tips in this manual, a thorough review of the safety rules and regulations for boating is beyond the scope of this manual.

We support the work of the United Coast Guard Auxiliary and the United States Power Squadrons. We urge you to exercise the opportunity to attend any instructional classes sponsored by these organizations. Reference the last page of You and Your Boat for different options on education and information on charts and maps. Also available for further knowledge on boating, we advise that you review the following publications:

PILOTING, SEAMANSHIP AND SMALL BOAT HANDLING
(Chapman)\*

Motor Boating and Sailing
Post Office Box 2319 -- F.D.R. Station
New York, New York 10022

\*Available on CD ROM

PLEASURE BOATING AND SEAMANSHIP
US Coast Guard Auxiliary
306 Wilson Road Oaklands
Newark, Delaware 19711

BOATMAN'S HANDBOOK
by Tom Bottomly
Motor Boating and Sailing
Post Office Box 2319 -- F.D.R. Station
New York, New York 10022

FOR MORE INFORMATION ON BOATING SAFETY COURSES IN YOUR AREA, CALL BOATING EDUCATION HOTLINE 1-800-336-BOAT (2628),
US COAST GUARD BOATING HOTLINE 1-800-368-5647 or
CONTACT YOUR LOCAL COAST GUARD.

## CHAPTER TWO GENERAL INFORMATION

## FUELING

## 

## Safety during fueling requires CAUTION and COMMON SENSE.

Please study the following precautions carefully, and ask your dealer if you have questions. Check your engine manual to confirm the type of fuel specified by the manufacturer. Do not use gasoline containing alcohol. Alcohol in fuel will deteriorate the rubber material used to make up your fueling system. If you operate an outboard with an oil injection system, check the engine manual for the approved type of oil and fill the tank completely.

- Observe all safety regulations for the safe handling of fuel.
- · Extinguish cigarettes and all other lighted materials.
- Before fueling, close all ports, hatches, windows, and engine compartments, to prevent fumes from accumulating in closed areas.
- Before fueling, turn battery select switch(es) to "OFF," this will stop all engines, motors, fans, and lights, etc.
- Keep the fuel supply nozzle in contact with the fuel tank opening to prevent any static sparks.
- Secure the fuel cap and check fuel lines and connections for leakage. Wash and clean any spilled fuel. Dispose of rags or sponges used for clean-up on shore.
- Ventilate all ports, windows, hatches, and other closed areas. Run blower a
  minimum of four minutes, or until all fumes are expelled from engine
  compartment (on stern drive models). Conduct a "sniff test" to make certain all
  fumes are vacant before using the battery select switch(es).
- Select your first tank cautiously. Take into consideration the distribution of your load as fuel is consumed. Performance will be influenced by weight distribution.
   If your boat is equipped with two fuel tanks, use the fuel select valve (see FUEL SELECT VALVE on next page) to select the proper tank.
- Watch fuel flow constantly to prevent overflow or spills. Over-filled fuel tank(s)
  will leak fuel from vents causing damage to areas. Allow room for expansion.

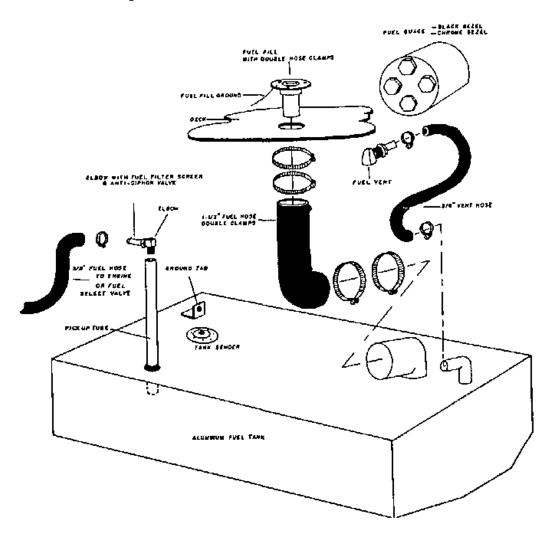
## **FUEL SYSTEM MAINTENANCE**

If you are experiencing fuel flow problems, an easy method of determining whether the problem is in your fuel system is to connect a six gallon portable tank to your engine. Also, inspect the anti-siphon valve (pictured below) to make sure fuel is flowing properly. The manual shut off valve should be closed when servicing the fuel system to avoid spilling fuel into the bilge.

Do not use fuels containing alcohol. Alcohol, particularly methanol, will absorb water, which makes fuel more corrosive to metals in tanks and carburetors, and shortens the durability of elastomers, such as hose and gaskets.

After fueling, inspect the fuel lines, connections, and fuel tanks for tightness, signs of leaks, and deterioration. At least annually conduct a more thorough inspection of fuel system components, especially those hidden from routine inspection. Replace any fittings, deteriorated hose, or clamps; also correct any bad connections that may cause a problem.

Reference the Fuel Tank Compartment section under Maintenance for more information on cleaning the fuel storage area.



### DISCHARGE REGULATIONS

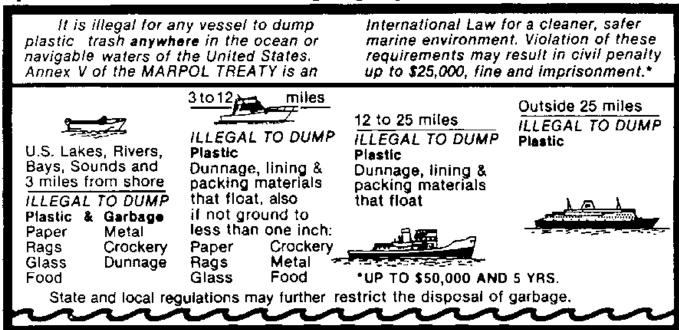
## DISPOSAL OF PLASTICS AND OTHER GARBAGE IN WATERS OF THE UNITED STATES

The Federal Water Pollution Control Act prohibits the discharge of oil or hazardous substances which may be harmful into the US navigable waters. The US Coast Guard requires that any vessel 26 feet or greater, display a placard in a prominent location, notifying the crew and passengers of discharge restrictions. Each placard must be at least nine inches wide and four inches high, made of a durable material, and printed with letters that are at least 1/8 of an inch in height.

## $\Lambda$ notice

It is illegal for any vessel to dump PLASTIC trash anywhere in the ocean or navigable waters of the United States.

The MARPOL ANNEX V is the Act to prevent pollution from ships and other vessels. Federal regulations prohibit the discharge of plastic garbage anywhere in the marine environment. Plastic includes but is not limited to: synthetic fishing nets, ropes, lines, straws, six pack holders, styrofoam cups and lids, bottles, buckets and plastic bags. These regulations also restrict the disposal of other types of garbage within specified boundaries from shore. The following plaque will help you determine the specific distances offshore that certain garbage is permitted.



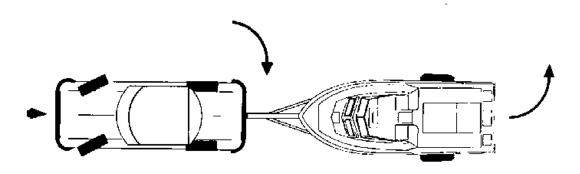
## DISCHARGE OF OIL

The Federal Water Pollution Control Act prohibits the discharge of oil or oily waste into or upon the navigable waters and contiguous zones of the United States, if such discharge causes a film or sheen upon, or discoloration of, the surface of the water, or causes a sludge or emulsion beneath the surface of the water. Violators are subject to a penalty of \$5,000.

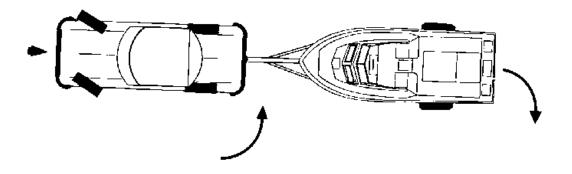
## TRAILERING

The adjustment and balance of your boat on the trailer determines how easily your boat may be transported. The tongue weight on the hitch ball should be 5-10% of the total weight of your boat, motor, and trailer. Tail-heavy loads cause swaying while trailering. The rollers and/or bunkers of your trailer should be adjusted so that the weight is distributed evenly across the stern and forward throughout the keel section. Your dealer is responsible for adjusting your trailer properly.

You and Your Boat covers the trailering aspect in detail and also provides the checks essential for safe trailering.



**BACKING TO RIGHT** 



BACKING TO LEFT

#### DRIVING

Do not allow passengers to ride in the boat while trailering. Check brakes prior to leaving. Drive steady as possible and avoid sudden jerks. Anticipate stops to make them smooth. Road trips call for occasional stops to make sure the trailer is still secured properly.

### LAUNCHING

Practice maneuvering the trailer. The trailer always backs in the opposite direction of the vehicle. To maneuver the trailer, turn the steering wheel in the direction you want the trailer to go. Refer to launching in You and Your Boat. Prior to initial launch, familiarize yourself with this manual and all aspects of your boat. At the launch site, go through a pre-launch checklist. The list should be suited to your specific needs.

## PRE-START CHECKLIST

You and Your Boat covers the essentials, for a boater's checklist, on the first page titled BOATMAN'S CHECKLIST. When your predeparture checks have been completed, you will be ready to leave the dock. Start your engine to check all instruments, if the oil pressure gauge does not respond immediately, shut off the engine.

## APPROACHING/LEAVING THE DOCK

Unlike an automobile, the stern of your boat reacts first when turning. A turn to the right will swing the stern to the left and vice-versa. Remember that turning your boat away from an object, such as a dock, will tend to swing the stern toward that object. Utilize Docking in your publication of *You and Your Boat*.

## **TOWING OR BEING TOWED**

In the event of a mishap or power loss, you may need to tow a boat or have yours towed. Remember: you should not tow a boat larger than your own. Never tow a boat if you are not equipped with the proper lines. Nylon ropes are recommended. They have the strength and elasticity needed to absorb the shock of towing and sudden jerks. Individual should never seize a towline, always secure it to the boat.

Before towing a boat, make a bridle, tie it securely to the pad eyes on the transom with enough slack to clear the engine and stern drive. Pad the line wherever it comes into contact with the boat to prevent chafing. Attach a tow line to the bridle so that it can slide from side to side to prevent too much pressure on a single pad eye. The tow line should then be attached to the bow eye or to a bridle on the towed boat. The tow line should be a minimum of twice the length of the towing boat, the longer the better. When passing the towline to the other boat, do not try to run in too close. Send either a light line or attach the towline to a life preserver to be pulled in. Be careful of the other boat's propeller.

The towed boat should always have someone at the wheel, since the boat may swing off course. Start the tow off slowly. A steady pull at a moderate speed should be used. It is important to keep the slack out of the propeller area. Watch the action of the towing boat. If too much slack develops in the towline and contact is apparent, turn in either direction to avoid hitting the stern.

## 

As a precaution, passengers on both boats should stay clear of the towline, lines under stress could snap and fly in either direction causing injury.

## SHALLOW WATER

Your boat draws 15-20 inches of water. If your boat becomes grounded with the propeller in mud or sand, do not try to power off, due to possible damage to your engine's cooling system. When grounded, try to float the boat off by tilting the motor back and rocking the boat from side to side to break the suction of mud from the keel. Move passengers or heavy objects from the point where the boat is grounded. Do not lower or start the engines until the boat is clear of the ground. Refer to shallow water in You and Your Boat.

When boating in water with tidal changes, be attentive of water level fluctuations. If you are grounded on an incoming tide, you can wait until the tide is high enough to refloat your boat. However, on an outgoing tide you should act quickly to refloat your boat. If not, set an anchor to keep the boat from becoming driven further aground. Set the anchor to counter the action of the wind or current. The anchor can also be used to pull the boat free.

Many inland areas have rocks and stumps which could crack or puncture a fiberglass hull. Be familiar with the boating area and use caution in shallow water.

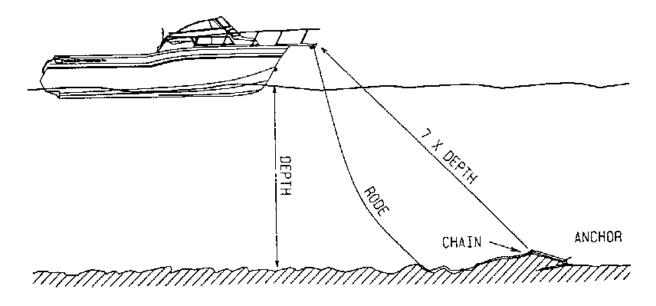
#### **ANCHORING**

Some factors that determine the size and type of anchor most suitable for your boat include the size of your boat and the type of lake, sea, or river bottom in your boating. You and Your Boat covers anchoring and a list of tips.

A 3 to 4 foot length of chain between the anchor and the length of anchor rode will help prevent the line from chaffing on rough obstacles, and will also help hold anchor flukes down for more secure anchoring.

## NOTICE

It is illegal to tie your boat to navigational aids, such as buoys and markers.



To retrieve the anchor, slowly drive the boat to the point directly above the anchor and pull upward on the anchor line until anchor is retrieved. If the anchor is difficult to break out, tie off the anchor line while directly over the anchor and slowly motor forward to "break" the anchor free.

## /\WARNING

Never anchor off the stern of the boat, especially in strong winds or currents. The weight of the stern and flat surface to the seas can easily cause water to enter over the t ransom, and swamp the boat.

#### WINDLASS

Anchoring can be less laborious if your boat has a windlass accessory. If your boat is equipped with a windlass, reference your windlass Operation Manual for instructions.

## GENERAL INFORMATION ON BOAT HANDLING

The best method of learning how to handle your Grady-White boat and obtaining the best performance from your boat is to practice and experiment. After several hours of operation, you should experiment with the throttle settings to discover the setting that will be the most comfortable and economical range for your particular loading conditions.

We suggest that you make a speed/RPM chart in order to obtain the most economical operation. Operate the boat at various speeds and check the fuel consumption. Determine the amount of operating time remaining when the fuel gauge drops into the red band. Make a log of this type of information and have it available when operating your boat.

Other statistics you may want to determine for valuable information could include the following:

- Minimum speed for effective steering.
- Turning radius at different speeds.
- Response to steering at low speeds.
- Acceleration and declaration rates.
- Time and distance to bring the boat to a stop at different speeds.
- Control of the boat using both engines in close quarters.

Also read the section in You and Your Boat for information on safe operating speed.

## TWIN ENGINE BOATS

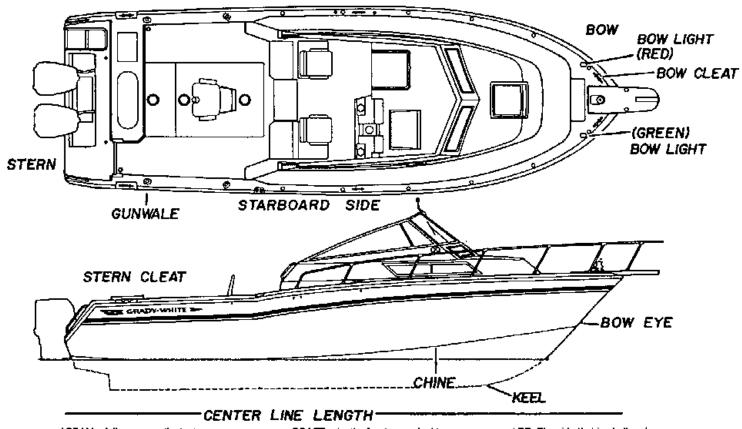
Twin engine boats are easy to maneuver. The boat will run ahead or backward in a straight line when both engines are working together at the same speed. During backing, the engines can be used to steer to port as well as starboard.

Moving ahead on one engine will cause the bow to swing away from the running engine side and to move forward at the same time. Backing up with one engine will cause the bow to swing toward the running engine side and the boat to move backward.

Running one engine ahead and one engine astern will cause the boat to turn endfor-end in little more than its own length.

Running both engines in the same direction at different speeds will cause the boat to move in the direction dictated by the faster engine, but its influence will be modified by the slower engine.

## COMMONLY USED NAUTICAL TERMS PORT SIDE



ABEAM - A line perpendicular to a boat's keel

ACCESS PLATE - A removable, watertight cover that provides quick entry to enclosed areas for maintenance or visual inspection

AFT - Toward the rear or stern of the boat

BEAM - The greatest width of a boat

BILGE - The lower interior area of the hull

BOW - The fore part of a boat

BOW EYE - A U-shaped hull fitting used to attach the trailer winch to the boat

BULKHEAD - Vertical partition in a boat

CHINE - Meeting juncture of topside and bottom of boat

CLEAT - Deck fitting with arms or horns on which lines are fastened

DECK - Upper structure which covers the hull DRAFT - depth of water required to float a boat

FATHOM - A depth measurement equal to six feet

FREEBOARD - Height of topside from water line to the deck

GUNWALE (OR GUNNEL) - Meeting junction of hull and dock

HATCH - An opening in the deck to provide access below

HEAD - A toilet or toilet area in a boat

HEADROOM - Vertical distance between the deck and cabin or canopy top

HULL - The basic part of the boat; a watertight vessel that provides buoyancy to float the weight of the craft and its load

KEEL - The major longitudinal member of a hull - the lowest external portion of a boat

KNOT - Unit of speed in nautical miles per hour 2-9

LEE -The side that is sheltered from the wind

LIST - The tilt or lean to one side

PORT - A term designating the left side of the boat when facing forward

SCUPPER - Holes permitting water to drain overboard from deck or cockpit

SHEER - Curve or sweep of the deck as viewed from the side

STARBOARD - A term designating the right side of the boat when facing forward

STERN - The rear end of a boat

STRINGER - Longitudinal members fastened inside the hulf for additional structural strength

WAKE - The track or path left in the water by a moving boat

WINDWARD - Toward the direction from which the wind is blowing (against the wind

## CHAPTER THREE PERFORMANCE

## PERFORMANCE FACTORS

Maximum performance is dependent on many factors and cannot be guaranteed. These factors will vary with altering conditions. Reference the trouble shooting guide in *You and Your Boat*. Some of these factors are:

## **ENGINE EFFICIENCY**

Assuming your boat is equipped with the correct engine, the engine is properly tuned and the drive system is in good condition, engines operate most efficiently at the RPM confirmed in the engine Operating Manual. Efficiency will decrease if normal care and maintenance is not performed. If engines are neglected, power will drop and speed will decrease. In addition, expensive repairs may become necessary. Be sure to follow all instructions in this manual as well as the Engine Operation Manual.

## WEATHER CONDITIONS

Weather conditions affect engine performance. Barometric pressure and humidity both influence horsepower too. The cumulative affect of weather alone could amount to a 10% loss in horse power on some hot days.

## LOAD DISTRIBUTION

A decrease in performance will be noted when gear, equipment, passengers, and fuel are added. This extra load will affect the performance of your boat according to the distribution of the weight. Other types of extra load could be water in the bilge. A gallon of water weighs 8 pounds. When water accumulates in the bilge this will greatly affect the performance. Keep the bilge dry to eliminate this type of extra load.

#### MARINE GROWTH

Maximum performance is obtained only when your hull bottom is clean. Growth on the bottom of the boat will increase resistance and decrease speed. This will also increase fuel consumption. Detailed recommendations for hull cleaning are included in the MAINTENANCE section of this manual.

## **TRIM**

Your outboard is equipped with power tilt and trim mechanisms. The purpose of the tilt is to raise the engine for launching, loading, or trailering your boat. Engine trim is covered in *You and Your Boat*.

Trim refers both to the weight distributions inside the boat and to the angle of thrust of the drive unit. The angle of thrust of the drive unit forces the bow up or down. The trim tabs on your boat also control the trim of the boat, similar to the engine trim. Refer to BY MODEL SECTION, Trim Tabs for additional information.

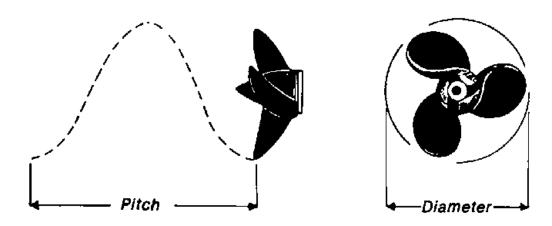
## PERFORMANCE

## PROPELLER

The condition of your prop is a major influence on the performance of your boat. Your engine is equipped with the best size prop for normal conditions. If you have unusual uses or weight conditions, special props may be required for altered applications. A damaged prop can affect your boat's top speed, cause vibrations or a sudden drop in RPMs, or even increase fuel consumption. Read more about propellers in You and Your Boat; this publication covers ventilation and cavitation.

## **ACAUTION**

When replacing propellers, stay within the engine manufacturer's maximum and minimum RPM ranges. This information is in your engine Manual. If your boat does not have a tachometer, consult your dealer for propeller changes.



Pitch and Diameter are the two basic dimensions of a propeller.

Example of propeller dimension: 14 x 17

Diameter = 14

Pitch = 17

## PROPULSION SYSTEM

#### OUTBOARD

Information concerning the outboard engine(s) is located in the Operation and Maintenance Manuals supplied by the engine manufacturer. Details of important engine functions such as the lubrication system, cooling system and alarm/monitoring system are outlined in these manuals. Your familiarization with the engine reference material will result in the proper usage and service that is essential to ensure safe and enduring engine performance. The manual is included with the Owner's Packet.

DO NOT INHALE EXHAUST FUMES! EXHAUST CONTAINS CARBON MONOXIDE THAT IS A DANGEROUS GAS AND IS POTENTIALLY LETHAL.

## PERFORMANCE

## A WARNING

Do not attempt to service any engine or drive component without being totally familiar with the safe and proper service procedures. Certain moving parts are exposed and can be dangerous.

## \* / CAUTION

Do not paint the outboard motor with anti-fouling paints designed for boat hulls. Many of these paints can cause severe damage to the engines.

## **ENGINE WARRANTY**

A warranty registration card is included with all engine manuals and should be completed and returned to the engine manufacturer as soon as possible.

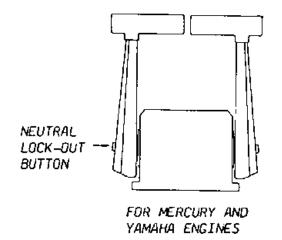
## THROTTLE/SHIFT CONTROL

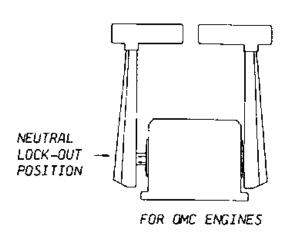
The throttle/shift control, located at the helm station, controls the flow of fuel to the engine and acts as a gear shift lever to control the forward and aft thrust of the propeller.

The vertical position of the throttle control is usually the neutral position. Move the control forward to engage the shifting mechanism, which creates a forward thrust of the propeller. Advance the forward movement to increase the fuel flow to the engine and boost the forward lunge.

Move the control lever aft of the neutral position to reverse the shift mechanism and create a reverse thrust of the propeller. Increase the aft movement to increase the reverse thrust. Remember that propellers are designed for maximum forward thrust, so reverse thrust will not be as efficient.

All controls have a safety mechanism. This mechanism will not allow the engine to start when the control is in gear. To increase the flow of fuel to the engine while remaining in the neutral position, you may use the neutral lock out button in the control handle.





## PERFORMANCE

As the boat is moving forward, you may reverse the shift mechanism that will provide a "braking action," slowing the boat.

## **ACAUTION**

THIS BRAKING ACTION CAUSES A FOLLOWING WAKE WHICH MAY RISE ABOVE THE TRANSOM AND FLOOD THE BOAT IF IT IS MOVING AT TOO GREAT A SPEED. ALLOW ENGINE RPMs TO DECREASE BEFORE SHIFTING INTO REVERSE.

Reference You and Your Boat for maintenance. If your throttle or shift cables need replacing, reference the specification sheet at the front of this manual.

#### STEERING

## HYDRAULIC STEERING

"G. (2024)

Hydraulic steering systems (not to be confused with power steering) require regular preventative maintenance for continued safe and reliable operation. The oil level in the helm pump must be maintained within acceptable operating levels. A low oil level will cause air to be introduced into the steering system and result in unresponsive steering. The oil level should always be within 1/2 inch from the base of the fill hole, located on the front top portion of the helm pump. Check the steering system for oil leaks. An unchecked leak, in time, will result in unresponsive steering and/or possible loss of steering.

Any moving mechanical linkages, sliders, etc. should be greased as needed with a high quality marine grease. Reference the steering manufacturer's Manual for specific recommendations and additional maintenance requirements.

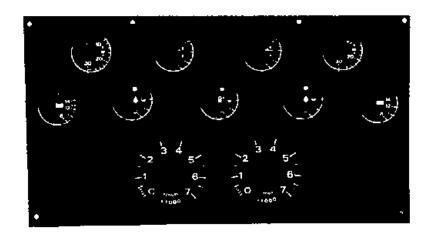
Any slow or sudden change in the "feel" of your steering system indicates an immediate need for a thorough inspection. All repairs and replacements to steering systems should be made only by an authorized dealer.

## **TILT STEERING**

Tilt steering is available as an optional feature in conjunction with hydraulic steering. This feature enables the operator to tilt the wheel up or down. Refer to the steering system Owner's Manual for information on oil levels with tilt steering.

## CHAPTER FOUR GAUGES AND SWITCHES

## MERCURY AND OMC ENGINE INSTRUMENTATION



## **FUEL GAUGE**

The fuel gauge indicates the fuel level. When reading this gauge, remember two things: (1) the accuracy of your gauge varies with the attitude of your boat in the water (trim or list), and (2) the fuel pickup tube inside the gas tank is not capable of withdrawing all of the fuel from the tank. For these reasons, never operate your boat at extremely low fuel levels.

## OIL QUANTITY GAUGE

OMC pre-rigs are equipped with an oil quantity gauge that indicates the oil level in the tank.

## TACHOMETER GAUGE

The tachometer indicates engine revolutions per minute (RPMs). Consult your engine Owner's Manual for recommended operating RPMs.

## TRIM GAUGE

The trim gauge indicates the angle of thrust of the lower unit of the engines. See the PERFORMANCE section of this manual for trim adjustment recommendations.

#### VOLTMETER

The voltmeter indicates the battery charge. A reading of 12 or 13 volts is normal, indicating a fully-charged battery. Readings below 11 indicate a weak battery, which may not start the engine(s). A reading of 13 to 15 volts when the engine is running is normal. Readings over 15 volts may indicate regulator problems. Low or fluctuating readings may indicate loose connections, loose belts, or trouble in the regulator and alternator circuit. A voltage drop soon after the engine is shut down indicates a bad battery or a heavy load on the electrical system.

## WATER PRESSURE GAUGE (OMC RIG ONLY)

The water pressure gauge indicates the water pressure in the engine cooling system. Readings help determine if water pressure is too low for adequate cooling.

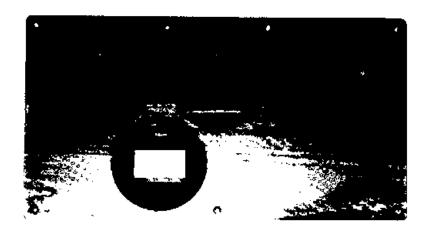
## WATER TEMPERATURE GAUGE (MERCURY RIG ONLY)

The water temperature gauge indicates the temperature of the cooling water circulating through your engine. When the temperature exceeds the recommended operating range for your engine, immediately shut off your engine to prevent damage. Overheating is often caused by obstruction of your engine's water intake on the lower unit. Check the water intake first if you experience trouble.

## WATER TEMPERATURE, OIL LEVEL, AND FUEL SYSTEM WARNING BUZZER

Your Grady-White has a factory installed warning buzzer, located under the dash, for water temperature and oil level. In addition, OMC rigged boats utilize a fuel system warning buzzer.

## YAMAHA ENGINE INSTRUMENTATION



## DIGITAL SPEEDOMETER

## BATTERY VOLTAGE INDICATOR

This feature indicates the battery charge when the engine is off, and indicates the alternator output when the engine is running. A reading of 12 or 13 volts is normal, indicating a fully-charged battery. Readings below 11 indicate a weak battery, which may not start the engines. A reading of 13 to 15 volts when the engine is running is normal. Readings over 15 volts may indicate regulator problems. Low or fluctuating readings may indicate loose connections, loose belts, or trouble in the regulator and alternator circuit. A voltage drop soon after the engine is shut down indicates a bad battery or a heavy load on the electrical system.

#### CLOCK

This feature is battery powered and will need to be reset each time the battery select switch is turned to the "off" position.

## FUEL METER

This feature indicates the gas tank fuel level. When reading this gauge, remember two things: (1) the accuracy of your gauge varies with the attitude of your boat in the water (trim or list), and (2) the fuel pickup tube inside the gas tank is not capable of withdrawing all of the fuel from the tank. For these reasons, never operate your boat at extremely low fuel levels.

### LOW FUEL WARNING INDICATOR

This feature indicates when the fuel level in the main fuel tank is becoming low.

## OVERHEAT WARNING INDICATOR

This feature indicates when the temperature of the cooling water circulating through the engine is too high. When the temperature exceeds the recommended operating range indicated by your engine owner's manual, immediately shut off your engine to prevent damage. Overheating is often caused by obstruction of your engine's intake on the lower unit. Check the water intake first if you experience trouble.

## SPEEDOMETER

This feature indicates boat speed in miles per hour, knots per hour, or nautical miles per hour.

## TRIP METER

This feature indicates the distance traveled since the meter was last set.

## DIGITAL TACHOMETER

## OIL LEVEL WARNING LIGHT

Refer to your engine owner's manual for information regarding oil level and warning light.

## REVOLUTIONS PER MINUTE (RPM's)

Consult your engine owner's manual for recommended operating RPM range.

## TRIM

This feature indicates the angle of thrust of the lower unit of the engine. See the PERFORMANCE section of this manual for trim angle recommendations.

## DIGITAL FUEL MANAGEMENT GAUGE

#### ECONOMIZER

The economizer feature, on the fuel management gauge, gives readings in gallons per hour and miles per gallon.

## SYNCHRONIZER

The synchronizer tells the operator when the engines are running at the same RPMs.

## TOTALIZER

The totalizer feature displays the amount of fuel consumed since it was last set. To reset the totalizer, press the SET and MODE buttons together.

The digital fuel meter can display information for the port side only, the starboard side only, and then a total consumption. For more detailed information refer to engine Owner's Manual.

## SWITCH PANEL

At the helm station you will find an accessory switch panel. These accessory switches are specified below.



## BILGE PUMP

This two-way switch serves as an overriding manual switch in the event of failure of the automatic switch in the bilge.

#### COCKPIT LIGHTS

The cockpit lights provide illumination for the cockpit area.

## FUEL

The three-position switch (MAIN-OFF-AUX) gives you separate quantity readings for each tank.

### HORN

The horn meets the requirements of the United States Coast Guard's emergency sound signaling device.

## LIVEWELL

This switch activates the livewell. Reference the Livewell/Washdown System diagram in Chapter Seven of this manual for information on the layout of this feature.

#### WASHDOWN

This switch pressurizes the washdown system. Reference the Livewell/Washdown System diagram in Chapter Seven for information of layout of this feature.

## NAVIGATIONAL/ANCHOR LIGHTS

Your yacht is equipped with lights that meet international lighting regulations. The three position switch (NAV-OFF-ANCHOR) changes the lighting configuration to running or anchor lights. Note that this switch operates the gauge lights.

## PRIMER PUMP SWITCH

The primer pumps should be activated at the initial "start-up" time. The "up" position is for the starboard engine and the "down" position is for the port engine.

#### WIPERS

This switch activates the windshield wipers.

## ACCESSORY

Switches labeled "ACC" are blank switches, and fuses labeled "ACC" are blank fuses. Both are used for non-factory installed accessories.

## NOTICE

Most accessory switch panels have indicator lights and fuse holders for each switch.

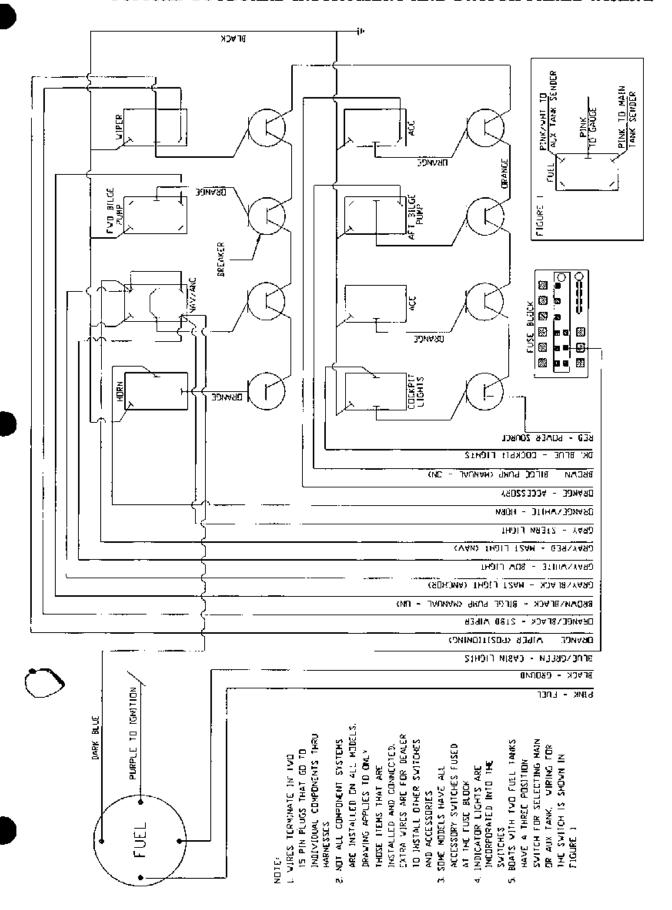
(See next page for recommended fuse amperages).

Switch identification labels are available from your dealer for non-factory installed options.

## ACCESSORY WIRING COLOR AND FUSE CHART

ACCESSORY	WIRE SIZE AND COLOR	AMPERAGE	LOCATION
LIGHTS			
BOW LIGHT	16 GA. GRAY	15.0	ACCESSORY PANEL
AFT POLE LIGHT	16 GA GRAY/WHITE	15.0	ACCESSORY PANEL
MAST LIGHT (FORWARD BULB)	16 GA GRAY/RED	15.0	ACCESSORY PANEL
MAST LIGHT (AFT BULB)	16 GA GRAY/BLACK	15.0	ACCESSORY PANEL
PANEL LIGHTS	16 GA DARK BLUE	15.0	ACCESSORY PANEL
CABIN LIGHTS	16 GA DARK BLUE/GREEN	10.0	FUSE BLOCK
COCKPIT LIGHTS	16 GA DARK BLUE	10.0	ACCESSORY PANEL
SPREADER LIGHTS	16 GA DARK BLUE/WHITE	10.0	ACCESSORY PANEL
PUMPS			
BILGE PUMP (FORWARD):			
RULE 1100	16 GA BROWN/BLACK	5.0	ACCESSORY PANEL
RULE 1500	16 GA BROWN/BLACK	7.5	ACCESSORY PANEL
AUTO FLOAT SWITCH (FORWARD)	16 GA BROWN/RED IN LINE	5.0/7.5	NEAR BATTERY
BILGE PUMP (AFT):			
RULE 1100	16 GA BROWN	5.0	ACCESSORY PANEL
RULE 1500	16 GA BROWN	7.5	ACCESSORY PANEL
AUTO FLOAT SWITCH (AFT)	16 GA BROWN/WHITE IN LIN	5.0/7.5	NEAR BATTERY
AERATOR PUMP	16 GA ORANGE/2BROWN	2.0	ACCESSORY PANEL
SHOWER SUMP PUMP (FLOAT SWITCH)	16 GA BROWN/ORANGE	4.0	FUSE BLOCK
WATER PRESSURE PUMP (CABIN SHOWE		15.0	ACCESSORY PANEL
WATER PRESSURE PUMP	16 GA ORANGE/BLUE	5.0	FUSE BLOCK
WASHDOWN PUMP	12 GA ORANGE/BROWN	15.0	ACCESSORY PANEL
LIVEWELL PUMP	16 GA ORANGE/BROWN	5.0	ACCESSORY PANEL
IN-LINE MACERATOR PUMP	12 GA ORANGE/GRAY	20.0	ACCESSORY PANEL
PRIMER PUMPS (PORT)	16 GA PINK/RED	5.0	ACCESSORY PANEL
(STARBOARD)	16 GA PINK/BLUE	5.0	ACCESSORY PANEL
MISCELLANEOUS			<u>.                                      </u>
BILGE BLOWER	16 GA YELLOW	10.0	ACCESSORY PANEL
HORN	12 GA ORANGE/WHITE	15.0	ACCESSORY PANEL
WINDSHIELD WIPER (ACTUATOR):			- 12 112
PORT	16 GA ORANGE/GREEN	5.0	ACCESSORY PANEL
STARBOARD	16 GA ORANGE/BLACK	5.0	ACCESSORY PANEL
WINDSHIELD WIPER (POSITION)	16 GA ORANGE		
WINDLASS SOLENOIDS	14 GA ORÁNGE/PURPLE	•	
	14 GA ORANGE/YELLOW		
WINDLASS POWER LEAD	4 GA RED	*	
	4 GA BLACK		
ACCESSORY	16 GA ORANGE	10.0	ACCESSORY PANEL
ACCESSORY GROUNDS	16 GA BLACK	N/A	
ACCESSORY GROUNDS MAINS	10 GA BLACK	N/A	·
HYDRAULIC TRIM TABS	16 GA HARNESS (SUPPLIED)	20.0	FÜSE BLOCK
	16 GA PINK	N/A	ACCESSORY PANEL
	A C A A TOTAL CONTRACTOR	N/A	ACCESSORY PANEL
AUXILIARY FUEL TANK (SENDER)	16 GA PINK/WHITE		
AUXILIARY FUEL TANK (SENDER) ACCESSORY PANEL POWER LEAD	10 GA RED CIRCUIT BREAKER	40.0	NEAR BATTERY
AUXILIARY FUEL TANK (SENDER) ACCESSORY PANEL POWER LEAD VHF (HARDTOP RADIO BOX) POWER LEA	10 GA RED CIRCUIT BREAKER 10 GA RED/WHITE IN LINE		
AUXILIARY FUEL TANK (SENDER) ACCESSORY PANEL POWER LEAD VHF (HARDTOP RADIO BOX) POWER LEA MEMORY WIRE	10 GA RED CIRCUIT BREAKER 10 GA RED/WHITE IN LINE 16 GA RED/PINK	40.0	NEAR BATTERY
AUXILIARY FUEL TANK (SENDER) ACCESSORY PANEL POWER LEAD VHF (HARDTOP RADIO BOX) POWER LEA MEMORY WIRE CO MONITOR	10 GA RED CIRCUIT BREAKER 10 GA RED/WHITE IN LINE 16 GA RED/PINK 16 GA RED/BLACK	40.0 20.0 2.0 1.0	NEAR BATTERY NEAR BATTERY
AUXILIARY FUEL TANK (SENDER) ACCESSORY PANEL POWER LEAD VHF (HARDTOP RADIO BOX) POWER LEA MEMORY WIRE CO MONITOR OIL SENDER (STBD)	10 GA RED CIRCUIT BREAKER 10 GA RED/WHITE IN LINE 16 GA RED/PINK 16 GA RED/BLACK 16 GA LT. BLUE	40.0 20.0 2.0	NEAR BATTERY NEAR BATTERY NEAR BATTERY
AUXILIARY FUEL TANK (SENDER) ACCESSORY PANEL POWER LEAD VHF (HARDTOP RADIO BOX) POWER LEA MEMORY WIRE CO MONITOR OIL SENDER (STBD) OIL SENDER (PORT)	10 GA RED CIRCUIT BREAKER 10 GA RED/WHITE IN LINE 16 GA RED/PINK 16 GA RED/BLACK 16 GA LT. BLUE 16 GA LT. BLUE/WHITE	40.0 20.0 2.0 1.0 N/A N/A	NEAR BATTERY NEAR BATTERY NEAR BATTERY
MAIN FUEL TANK (SENDER) AUXILIARY FUEL TANK (SENDER) ACCESSORY PANEL POWER LEAD WHF (HARDTOP RADIO BOX) POWER LEA MEMORY WIRE CO MONITOR OIL SENDER (STBD) OIL SENDER (PORT) FUEL GROUNDS	10 GA RED CIRCUIT BREAKER 10 GA RED/WHITE IN LINE 16 GA RED/PINK 16 GA RED/BLACK 16 GA LT. BLUE	40.0 20.0 2.0 1.0 N/A	NEAR BATTERY NEAR BATTERY NEAR BATTERY

## TYPICAL OUTBOARD INSTRUMENT AND SWITCH PANEL WIRING



## CHAPTER FIVE MAINTENANCE AND SERVICE

## **GENERAL**

The amount of maintenance required to keep your boat operating properly and to maintain the appearance is dependent on the use of the boat. The use of the boat include such variables as frequency of use, type of water, geographic location, etc.

Bilge areas should be kept clean and dry. Leaks found early and corrected will not cause damage. Do not allow grease and dirt to build up.

Any condition found requiring corrective action should be done by a qualified mechanic. If away from home, contact your dealer for a reference to a qualified repair shop. Make certain any changes made during maintenance conform with US Coast Guard specifications.

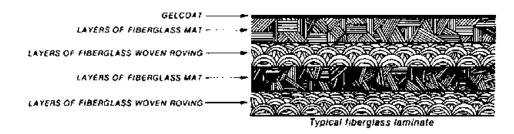
#### EXTERIOR

Your hull and deck are constructed by the hand lay-up method using the highest quality fiberglass mat and woven roving. This method of construction ensures a proper fiberglass-to-resin ratio and uniform thickness, which together result in a much stronger boat than those constructed of "chopped glass". This is an expensive process, but ensures that your Grady-White is the strongest, most durable fiberglass boat possible.

Proper maintenance of your boat is not only a source of pride but is the key to maintaining your boat's value. A few simple steps will keep your fiberglass Grady-White looking showroom bright for years.

#### FIBERGLASS FINISH

The exterior finish of your Grady-White is a thin layer of resin with a finished color pigment called gelcoat. It is used for cosmetic purposes and makes routine maintenance relatively simple. Although gelcoat has a hard smooth surface, it does contain microscopic pores that will allow surface discoloration if not kept clean.



## MAINTENANCE

Normal maintenance of your Grady-White boat is similar to the care you would give your automobile. Do not use caustic, highly alkaline cleaners or those containing ammonia. These cleaning agents may darken gelcoat. The resulting staining is a chemical reaction and can be removed with a rubbing compound then waxing.

## MAINTENANCE AND SERVICE

## CLEANING

The best way to prevent discoloration and soil build-up is to hose with fresh water after each outing or on a regular basis. This soil is the result of use and environmental pollutants. Clean the boat regularly with a mild household detergent and plenty of fresh water. Use a sponge on smooth surfaces and the deck. A brush can be used on the nonskid areas. Be sure to rinse away all grime and residue.

#### WAXING

As the gelcoat begins to lose gloss from constant exposure to the natural environment and pollutants, it will require some special attention to restore the original gloss and color. Check with a local dealer for advice on a suitable wax for that boating region. The wax film will seal the pores as well as enhance the looks of your boat. **DO NOT wax surfaces that may be walked on, as they will become slippery**. While waxing your boat, inspect the surface for any damage. Have the damage corrected as soon as possible.

Gelcoat will age or dull naturally. Discoloration's are shallow in depth. Factors that will affect the rate of discoloration are: the sun, pollution, old wax accumulation and the salt content of water. Polishing compound (fine abrasive) or rubbing compound (coarser abrasive) is recommended for use on fiberglass finishes to remove scratches, stains or severely weathered surface. These products can be applied by hand or mechanical means. The following process will restore discoloration to your fiberglass finish:

- Clean the affected area with a good detergent.
- Remove stubborn stains or discoloration by gently wet sanding only the affected areas with 600 grit "wet or dry" sandpaper. ALWAYS SAND IN ONE DIRECTION.
   Use plenty of water and sand curves in the same direction. Dry the area to make sure all the discoloration has been removed. If not repeat this process.
- Buff using a polishing compound suitable for fiberglass, an electric buffer (1750-1800 RPM.) and an 8 inch lambs' wool pad.

## **ACAUTION**

Keep buffer moving. Do not allow it to rest in one spot. Heat build up will quickly distort the surface.

- When buffing is complete, wash away compound with clear water. Then dry area.
- When the area is clean, wax the boat with a high grade automotive wax. This will enhance the gloss while providing a seal to retard staining or soil accumulation.

## ACAUTION

Compounding too often or excessive compounding can wear away the gelcoat.

#### REPAIRING

Though gelcoat is a very durable material, it is susceptible to scratches, blistering, and web-like cracks (crazing) over time. It is elastic enough, however, to withstand strong blows while flexing with the hull's movement. Gelcoat problems are cosmetic and will not effect the structural integrity of your boat.

## MAINTENANCE AND SERVICE

Some gelcoat damage and imperfections, such as nicks and scratches, can be repaired by obtaining a color match patch kit. This kit can be purchased through your Grady-White dealer. Acetone, the most suitable cleaning agent for gelcoat, can also be purchased through your dealer. Instructions are included in the patch kit.

## / WARNING

M.E.K. (Methyl ethyl ketone peroxide), gelcoat and acetone are flammable and hazardous chemicals, if not handled properly. Follow instructions on the containers carefully. After the gelcoat is catalyzed, it will soon heat up and put off fumes. When finished with catalyzed chemicals or when they start building up heat, submerse completely in water until cool.

#### **BOTTOM PAINT**

If your boat is left in the water for more than a few days at a time, the hull bottom (below the waterline) should be painted with anti-fouling paint to protect it from marine growth, and barnacles, which inhibit performance. Since anti-fouling paint slowly dissolves to prevent marine growth, inspection and cleaning of the boat bottom at least once per season is advisable. Repaint whenever necessary. We suggest the use of an epoxy barrier coat to be applied in conjunction with the anti-fouling paint to help prevent blistering.

#### **CANVAS**

Although your Grady-White boat's canvas is made using the highest quality vinyl and latest sewing techniques, your boat's canvas will not be completely leak proof. The seam holes in your canvas may stretch and tend to leak. However, you can correct much of this problem by applying paraffin, Apseal or Uniseal to the seams.

Please understand that Grady-White does not warrant the fit and design of the canvas to be entirely watertight.

#### MAINTENANCE

To maintain your boat's top and other canvas follow these steps:

Fabric should be cleaned regularly to prevent the buildup of dirt, roof particles etc., to accumulate and become embedded in the fabric. Simply brush off any debris and hose down canvas and clean with a mild solution and warm water. Do not use petroleum-based or ammonia cleaners on canvas or clear vinyl as they will yellow. For heavily soiled fabric, remove top from frame. Soak the fabric in a solution of 1/2 cup of Clorox and 1/4 cup of Ivory or Lux soap per gallon of warm water. Let soak until mildew and stains can be brushed out with a common kitchen brush. Rinse thoroughly with cold water until all soap is removed. Allow fabric to air dry completely. **DO NOT STEAM PRESS OR DRY IN ELECTRIC OR GAS DRYER**. This will damage the canvas fabric.

A water repellent was applied to you canvas during manufacturing. After intense cleaning some of the repellent may have been removed and is recommended you retreat the fabric. Do not use wax based products. Use a water based repellent such as Apseal or Uniseal. Scotchguard is effective for short term use only.

#### **SNAPS**

• Zippers and snaps will loosen with use. Use care when starting the zipper to prevent damage. Lubricate the snap buttons and zippers with petroleum jelly or paraffin. Fasteners should be unsnapped as close to the button as possible.

#### VINYL

- Clean clear vinyl thoroughly with denatured alcohol, and then apply a protective layer of clear wax. Do not use paste wax as it will turn the vinyl yellow. This process should be repeated as necessary to maintain the protective wax coating.
- Store and secure canvas before trailering.
- · Dry all canvas before storing to prevent mildew.
- Remove the top, front, and side panels and roll them up for storage. This
  procedure is necessary to prevent the front and side vinyl pieces from cracking.
  NEVER FOLD THESE PIECES!

#### STORAGE

Consider the following steps when putting your folding top canvas option in the stored position:

## 

Secure the folded top when in the stowed position, this will prevent damage or the loss of your canvas.

- Fold the top and zip it into the canvas cover provided.
- Pivot the covered top into the stowed position on the foredeck. The canvas cover
  is equipped with a strap on each side and an eyelet in each strap. Place the
  eyelet over the male fasteners located on the port and starboard foredeck.
- · Twist the male fasteners 90 degrees to engage.

#### UPHOLSTERY

Your exterior vinyl upholstery may be cleaned with a mild solution of household detergent and fresh water. Commercial cleaners for vinyl also work well.

Since the seams of your exterior upholstery are not water proof, your upholstery should be stored in the cabin or covered when not in use.

Most cabin cushions are removable and may be dry cleaned. Some cabin cushions are of a Herculon-type fabric and may be cleaned with upholstery cleaner.

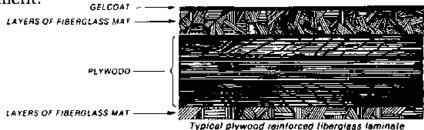
# A C A U T I O N DO NOT MACHINE-WASH THESE FABRICS.

#### DURATRIM/POLYETHYLENE/PLEXIGLAS

In the cockpit area of your boat, duratrim is used for the toe rails, and polyethylene are used for the rod racks. Duratrim has an appearance similar to teak, but requires almost no maintenance. Maintenance of your duratrim should include regular cleaning with soapy water. Apply a surface protector at least twice per year. Polyethylene can be cleaned with products such as 409, or any spray and wipe cleaner. Plexiglas, used to cover your instruments and radio box, can be maintained by use of a glass cleaner and a soft cloth.

#### HARDWARE MOUNTING

When drilling mounting holes in boat surfaces make sure each hole is sealed properly. Sealing will prevent water leakage, which is especially important in fiberglass areas that have been reinforced with plywood. A hole sealed improperly allows water inside the fiberglass, which leads to saturation of the plywood reinforcement.



#### CAULKING

Deck fittings, bow rails, window, hatches, etc., have all been caulked with the highest quality material to ensure a waterproof joint with the boat. However, the working action of normal use will tend to flex the joint and eventually break down the seal between them. Periodically inspect the caulking for leaks. When necessary, have your dealer repair the caulking.

#### STAINLESS STEEL RAILS/HARDWARE/HARDTOP FRAME

Even though your rails, hardware, and hardtop frame are made of laboratory grade 316 stainless steel, they need regular cleaning to maintain their "less staining" properties. The key to maintaining your stainless steel is to keep it clean. Try to remove all salt or dirt from your stainless steel on a regular basis. If acid rain is a problem, you should rinse your boat with fresh water after each rainfall. Also, remember to rinse your hinges on baitwell and the fish boxes regularly with fresh water. Hinges may need a small amount of penetrating oil to avoid sticking and rusting. We recommend a good quality metal preservative like T9<sup>TM</sup>.

To clean stainless steel, do the following:

- Wash with hot water and soap or a mild detergent or other commercially available stainless steel cleaners.
- After cleaning, rinse with clear water. Wipe dry with a clean soft cloth to avoid water marks.
- If discoloration or deposits persist, use a non-scratching household cleanser or stainless steel polish with a little water and a soft cloth.
- For stubborn deposits, use a plastic scouring pad or a soft bristle brush with cleanser and water. Rub lightly in the direction of the polishing lines of the finish. Too much pressure will mar the surface.

## ACAUTION

Do not use abrasive cleaning products, pads, steel wool or steel brushes. These will damage the finish.

Do not allow deposits to remain on the finish for long periods.

## MNOTICE

Do not allow salt solutions, disinfectants, bleaches or other harsh cleaning chemicals to come in contact with these surfaces. If these chemicals come in contact with stainless steel wash immediately, rinse and dry with a clean, soft cloth.

#### **SCUPPERS**

Your Grady-White boat has a self-bailing cockpit. This means that water on the cockpit floor is expelled through overboard drains and **NOT** into the bilge. The aft drains or scuppers have an external scupper flap assembly (as shown below), which restricts the flow of water back into the boat. Inspect the flaps periodically to make sure that they are free of debris. The scupper flaps will need periodic replacement.



#### SHOWER SUMP

Your shower drains into a contained "sump" which is used to prevent hair, soap, scum and bacteria from accumulating in the bilge and creating odors. We suggest you clean the sump pump out regularly. In the sump pump box there is a trap which contains a filter. Remove the filter and rinse with water to clean. Then snap the filter back into place.

#### FUEL TANK COMPARTMENT

Your fuel tank area needs to be rinsed periodically, especially when used in a salt water environment. Dirt that compiles in this area attract salt which creates salt crystals. Salt crystals can eat holes in most metal surfaces. To help prevent your fuel tank from rust and corrosion rinse with **FRESH** water. Remove access plates and check for any possible leaks and make sure all lines are secure.

The access plates on your fuel tank lid(s) are sealed with o-rings. Over a period of time the popping up of these plates cause the o-ring to wear-out. In order to ensure these plates seal properly, the o-ring needs to be replaced periodically.

#### BATTERY

Regardless of the type of power your boat uses, your batteries are extremely important. They should be secured in a non-metallic tray to avoid electrolyte spills, and battery terminals should be covered by an insulated boot.

Check the fluid level in each battery cell at least once a month. Fill the battery to the upper level with distilled water. **Never** overfill the battery.

Keep terminals clean by scrubbing them with a stiff brush and a mixture of baking soda and water. Afterwards, apply a light coat of grease. Be careful not to let any of the baking soda/water mixture enter the battery.

When not in use, check the batteries each month by using a battery hydrometer, which measures the specific gravity. The meter should read between 1250 and 1280.

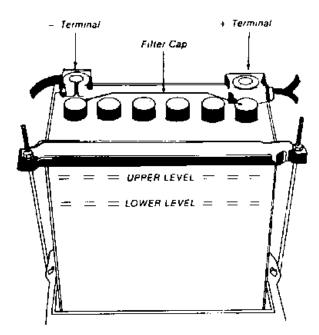
## **ACAUTION**

Never disconnect the battery when the engine is running. This can cause damage to the charging system. When replacing your battery,

DO NOT replace with a deep cycle type battery

due to your engines charging system.

#### Use ONLY cranking type batteries.



The battery contains sulfuric acid. Avoid contact with skin, eyes or clothing.

Antidote: EXTERNAL - Flush with water. INTERNAL - Drink large quantities of water or milk. Follow with milk of magnesia, a beaten egg or vegetable oil. Contact physician immediately.

Eyes: Flush with water and get prompt medical attention.

Batteries produce explosive gases. Keep sparks, flame, cigarettes away. Ventilate when charging or using in enclosed space.

Always shield eyes when working near batteries.

## KEEP OUT OF REACH OF CHILDREN

## **ACAUTION**

Remember, when disconnecting and reconnecting battery cables that the black cable must be connected to the negative terminal, and the red cable must be connected to the positive terminal of the battery. Reversing this procedure will immediately damage your system.

## CHAPTER SIX WINTERIZATION AND STORAGE

#### GENERAL

If your boat is going to be stored for the winter or for an extended period of time, there are some routine operations that should be taken care of. This information is presented as a general guide and the actual storage should be performed by a professional, qualified dealership. Prior to and during the storage process, the boat and all its systems should be checked for any maintenance and repairs necessary. Arrangements should be made during storage for any maintenance or repairs.

To avoid costly damage and delay when launching your boat, have it stored and winterized properly. Listed below are some of the general guidelines that should be considered before storage.

#### **BOAT STORAGE**

If storing your boat on the trailer, raise and block the trailer axle to prevent tire deterioration. This is an excellent time to lubricate and pack the wheel bearings per manufacturer's instructions.

Make sure the keel, chines, and transom are fully supported. Indoor storage is advantageous in many ways, particularly if your climate produces ice and snow. The storage building, should not be a sealed airtight, but should be sufficiently ventilated. Ventilation is extremely important both around and through the boat.

For outdoor storage, a canvas cover should be used to prevent "sweating". One way is to have a frame built over the boat to support the canvas. It should be a few inches wider than the boat so the canvas will clear the rails and allow passage of air. The cover should be fastened securely so that winds cannot remove it or cause it to chafe the boat. A poor covering job will cost more than the price of a well-made cover.

#### CLEANING AND LUBRICATING THE BOAT

Clean and wax your boat before storage. If you store your boat in the water, there may be a layer of growth on the bottom. As it dries, this debris will harden. Clean, scrub, and scrape the bottom promptly when the boat is removed from the water. Thoroughly remove marine growth and other foreign matter from the hull. Clean the inside of all hull openings, thru hull fittings and scupper drains. Inspect the hull bottom for any damage.

Check cleats and rails for corrosion and tightness. Clean all stainless steel as directed under MAINTENANCE. Use a good quality metal preservative like T-9<sup>TM</sup> (see page 6-3) on all metal surfaces to prevent salt water damage. Check for loose silicone, hinged, and unscated gaskets. Replace or tighten where necessary. Heavy seas pounding and twisting the hull can cause leaks in your windows, doors and hatches. Check all hinges for corrosion and lubricate.

#### WINTERIZATION AND STORAGE

#### **DRAINING AND WATER SYSTEMS**

Remove the bilge drain plug and open all valves and seacocks to keep the bilge dry. Store your boat with the bow elevated for drainage.

Drain all water tanks, lines, and pumps to prevent freeze damage. The fresh water system may be drained by running any faucet until the tank is empty. When empty, turn the faucet off to prevent pump damage. Residual water will not damage the tank. If desired, the fresh water system may have a non-toxic antifreeze added. This antifreeze can be purchased at marine dealerships or camping dealers.

To drain other lines, close seacocks and run the pumps until the lines are dry. After lines are dry, open the seacocks. In warmer climates, draining will help prevent water stagnation.

The fuel tank compartment should be rinsed with fresh water to keep salt crystals from forming thus causing rust and corrosion to your fuel tank. After rinsing, make sure all water is drained from the compartment.

#### **HEAD SYSTEM**

Empty top tank and holding tank and make sure all water is cleared. Reference Owner's Packet for manufactures information on winteriazation.

#### **FUEL SYSTEM**

Make sure your fuel does not contain alcohol. Fuels that contain alcohol will absorb humidity. The resulting condensation will separate from the fuel as temperatures drop during winter months, causing corrosion. There are also additives available to inhibit condensation. Tanks should be kept full but not overflowing, as fuel will escape from the overflow vent, causing damage to your boat.

This is a good time to have your fuel filters changed, if they have not been changed recently.

#### BATTERIES

Check the electrolyte level in your batteries and fully charge the batteries before storing. A weak battery loses its charge more rapidly than a strong battery. Ideally, you should disconnect the batteries and cover the terminals with grease to prevent corrosion. Store batteries in a cool, dry area on a wood board. Do not store batteries on concrete, because cold, moist surfaces will drain them.

When replacing battery in service, remove excess grease from terminals, recharge as necessary and reinstall in boat.

#### WINTERIZATION AND STORAGE

#### **ENGINES**

Check your engine Owner's Manual regarding the procedures for winterizing the engine. Follow these important instructions carefully, and your engine should survive the most severe weather conditions. Change all filters. Check hoses and clamps. If you have developed any vibrations during the season, look for loose engines, bent shafts, or bent propellers.

#### STORAGE CHECKLIST

The following checklist can be used as a guide and additional procedures should be developed as needed.

- Remove all loose and personal effects.
- Remove any detachable and valuable equipment and electronics. Your compass should be covered for the winter as ultraviolet rays from the sun will "cloud" the compass and make it difficult to read.
- Make sure all equipment is winterized as directed in the manufacturer's manual.
- Store all cushions indoors to prevent mildew.
- Make sure the exterior and interior of the boat is cleaned. Remove all grease, oil, salt spray, etc.
- Remove all garbage. Clean refrigerator, cabinets, lockers and leave them open, including refrigerator door. Prop fishbox lids open.
- · Empty toilet and holding tank, Flush with fresh water.
- Clean and wax all hardware.
- Lubricate all hinges, valves, back of fuse and instrument panels and any other surfaces that will rust.
- Check all underwater items. Make sure all hardware is in good condition and tight.
- Inspect electrical systems and have any repairs performed.

<sup>\*\*</sup>The T-9™ metal protection product was developed by Boeing Aviation for long-term protection of aircraft. It works by penetrating deeply into fasteners and fixtures, displacing moisture and drying to a clear wax film that lubricates and protects metals for months. T-9 can be used to protect deck hardware, engines, electronics, and fishing tackle.

#### WINTERIZATION AND STORAGE

#### GETTING BOAT OUT AFTER STORAGE

Before placing boat in the water for the boating season, have hull bottom sanded and reapply anti-fouling bottom paint, if necessary. Leave as much equipment and personal effects off the boat until after launch and final check.

#### PRIOR TO LAUNCHING

Start your own personalized list if items to check and perform prior to placing the boat in the water. A good place to compile your inspection check is from the following list.

- Check all gear and replace if necessary.
- Check thru hull fittings for cleanliness, damage and tightness.
- Check prop installation and tightness.
   Clean battery terminal posts with a wire brush or bronze wool. Install batteries, attach cables and tighten. Apply grease to post to exclude air and acid. Check all wire connections for contact corrosion and tightness.
- Check hull valves for easy operation and for condition of hose.
- Check operation of bilge pumps in manual and automatic modes. Check shower sump pump. Check operation of all DC circuits if applicable.
- Check all hose and lines on the fresh water system, install all drain plugs, and close all drain valves.

#### AFTER LAUNCHING

- With boat fully in water, check all sources of possible leaks stem to stern.
- Fill fuel system and thoroughly check out fuel system including all lines, fittings, connections, valves and filters for leaks.
- Perform maintenance on engines according to the manufacture's manual prior to returning them the service.
- Check all engine and steering control cables and linkage for operation. Lubricate cables and linkage as necessary.
- Fill fresh water system and check for leaks.
- Connect to shore power. Check out all electrical equipment, lights, hot water heater, air conditioning system, etc., these are optional on some models and may not apply to your boat.
- · Check operation of toilet (reference manufacturer's manual).
- Check and replace as necessary all safety equipment including flares, fire extinguisher, and first aid kits.
- Test run engines and generator (if installed) as directed in manufacturer's manual.

#### LIMITED WARRANTY

**REGISTRATION OF PURCHASE:** The "Federal Boat Safety Act of 1971" requires all boat manufacturers to maintain a record of all first retail purchasers and their current addresses for the purpose of notification in case of defective parts or equipment, or in case of non-compliance with standards or regulations set forth by this act. Under the act, failure to complete and return your factory warranty card for our records will waive your right to notification of defect and/or repair at manufacturer's expense.

#### FIVE YEAR HULL WARRANTY

Grady-White warrants to the original retail purchaser of each new Grady-White boat that under normal use the hulf will be free from structural defects for a period of five years from the date of delivery to the original retail purchaser. Any structural defects covered by the warranty will be repaired free of charge at either the Grady-White factory in Greenville, North Carolina, or at an authorized Grady-White dealer tocation as elected by Grady-White. Transportation to and from the point of repair will be the responsibility of the owner, with all repairs subject to prior written authorization by Grady-White Boats, Incorporated, NO BOAT IS TO BE SENT TO THE GRADY-WHITE FACTORY WITHOUT SUCH WRITTEN AUTHORITY.

#### ONE YEAR MATERIAL AND WORKMANSHIP WARRANTY

Grady-White further warrants to the original retail purchaser of each Grady-White boat that under normal use, it will be free from defects in workmanship and material for a period of 12 months from the date of delivery to the original retail purchaser. Necessary repairs under this warranty will be made free of charge at Grady-White's factory in Greenville, North Carolina or at an authorized Grady-White dealer as elected by Grady-White. Transportation to and from the point of repair will be the responsibility of the owner, with all repairs subject to prior written authorization. NO BOAT OR PART THEREOF IS TO BE SENT TO THE GRADY-WHITE FACTORY WITHOUT SUCH WRITTEN AUTHORITY.

#### **EXCLUSIONS**

This warranty specifically does not include the following:

- 1. Damage caused by abuse, negligence, vandalism, tack of maintenance, improper storage or accident.
- 2. Any statements, representations, or warranties given by dealer or other third persons other than those provided within this warranty.
- 3. Any unit which is part of a rental fleet, used for racing or commercial purposes.
- 4. The following consequential damages: a) loss of time; b) inconvenience; c) towing charges; d) expenses for travel, lodging, telephone, and gasoline; e) loss or damage to personal property or loss of revenue; f) loss of use of the boat.
- 5. This warranty specifically does not apply to engines, outdrives, propellers, controls, mechanical steering, bilge pumps, and any other part expressly warranted by the manufacturer thereof. In addition, also excluded are get coat cracking, get coat crazing, get coat blistering or fading, chrome, windshields, glass breakage, all vinyl upholstery and canvas, instruments and gauges, and leakage around windshields, windows, hatches, and other apertures.
- 6. Any boat which has been overpowered according to the maximum Grady-White recommended engine horsepower specifications on the capacity plate affixed to the boat.

#### WARRANTY CLAIM PROCEDURES

Upon the discovery of a defect, the owner is to promptly contact the Grady-White dealer from whom the original retail purchaser purchased the boat, who will effect the corrective action under this warranty upon prior written authorization from Grady-White Boats, Incorporated.

THESE WARRANTIES ARE EXPRESSLY MADE IN LIEU OF ALL OTHER WARRANTIES, DURATION OF ANY IMPLIED WARRANTY OF MERCHANTIBILITY OR FITNESS FOR A PARTICULAR PURPOSE OR OTHERWISE SHALL BE LIMITED TO AND COINCIDENT WITH THE DURATION OF THESE EXPRESSED WARRANTIES.

THIS WARRANTY SHALL NOT BE VALID UNLESS THE FACTORY WARRANTY POSTCARD IS PROPERLY EXECUTED AND MAILED WITHIN 10 DAYS OF THE PURCHASE OF YOUR GRADY-WHITE BOAT.

GRADY-WHITE BOATS, INC. P.O. Box 1527 Greenville, NC 27834-1527 REVISED 7/95

## CHAPTER SEVEN 272 SAILFISH

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#### **OPTIONAL FEATURES**

- Accessory Outlet 12 volt
- Air Conditioning
- Anchor Windlass
- Battery Select Switch
- Battery Charger
- Bow Lifting Ring
- Bow Pulpit
- Cabin Curtains
- Cockpit Shower
- Compass
- Dockside Power W/Galvanic Isolator
- Gunwale Mounted Freshwater System
- Hard Top W/Radio Box & Spreader Lights
- Hard Top Rod Holders
- Head W/Deck Pump Out
- Head Portable
- Head Portable W/In Line Macerator
- Head Marine Head W/Electric Flush
- Head Marine Head W/Holding Tank, Pump Out
- Hot Water Heater (110V) Requires Dockside Power
- Microwave Oven
- Outrigger Kit 15 Ft. (Gunwale Mount)
- Outrigger Kit 15 Ft. (Hardtop Mount)
- Outrigger Kit 18 Ft. (Lee Jr. Cabin Side Mount)
- Rod Storage Folding Cabin Rack (6)
- Seating Deluxe Helm & Companion Chairs
- Shower
- Steering Hydraulic Tilt
- Stereo/Cassette System
- Windshield Washer Starboard (Freshwater)

#### CANVAS OPTIONS

- Covers For Pedestal Chairs
- Drop Curtain
- Hardtop Curtains
- Helm Station Cover
- Vista Top W/Curtains And Boot

#### **OPERATION OF STANDARD FEATURES**

#### RIGGING COMPARTMENT

The rigging compartment is located aft of the fuel tank area. This enclosure is functional for rigging ignition protected accessories and for better passage to rigging components located aft of this compartment. This area contains two flats for mounting transducers.

## NOTICE

The rigging hatch and mounting screws must be sealed with silicone sealer after rigging is complete.

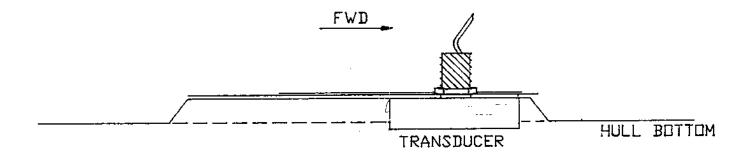
If the lid is removed, it must be resealed to insure watertight integrity.

#### TRANSDUCER FLATS

The inverted transducer flats are designed primarily for a bronze style, torpedo shaped transducer. An example of a torpedo shaped unit would be an Aero Mar Tri-Transducer. This transducer is approximately thick. This thickness allows the transducer face to protrude below the bottom of the hull. The proper installation location on the inverted flat is mounting the transducer as far forward as possible, and parallel with the keel.

## **MNOTICE**

A flush mount style transducer will not work with the inverted flat.



#### SEACOCKS

Ball valve seacocks are installed on the thru hulls. These seacocks are located under the aft rigging access plate. It is necessary for the seacock to be in the open position for proper drainage. The open position can be identified by the orientation of the handle. If the handle is in line or parallel to the body of the valve, the seacock is in the open position. If the handle is perpendicular to the body of the valve, the seacock is in the closed position.

## BILGE PUMP with FLOAT SWITCH

Your boat is equipped with an automatic float switch on the bilge pump. This will enable the bilge pump to come on automatically if a significant amount of water accumulates in the bilge. This switch is wired directly to the battery should be inspected frequently to ensure proper operation. The pump is equipped with a switch at the helm. When the switch is in the MANUAL position, the pump will run continuously. The pump should not be left in the MANUAL mode unless the bilge is being pumped out for servicing.

This switch is wired directly to the batteries. They function independently of the battery select switches and can activate the bilge pump with the battery select switches in the "off" position.

## A CAUTION

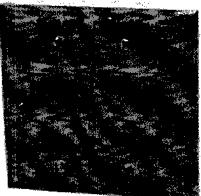
Do not run the pump dry for a prolonged period of time.

## **BILGE PUMP LOCATION**

Your 272 has two bilge pumps. One is located in the motorwell under the access plate just forward of the transom and the other one is in the cabin under the sole floor. This pump can be accessed through the access plate in the cabin floor.

#### TRIM TABS

Trim tabs are electrically-hydraulically operated and are used to modify the attitude of the boat while moving. These trim tabs may also be used to adjust the boat's running angle in adverse seas or to compensate for unusual load conditions.



TRIM TAB SWITCH



TRIM TAB

The trim tabs are operated by a two rocker switch panel and will aid in trimming the boat fore and aft for a smoother ride. The switches are marked "bow down" and "bow up". Trim tabs in the extreme "bow up" positions will have no effect on the boat's ride.

Trim tabs can improve the ride of your boat by adjusting where the water is hitting the keel line. In a slight chop, the waves may be hitting the keel of your boat around the helm area, causing an uncomfortable ride. By adjusting the trim tabs and lowering the bow, the waves will hit the keel at a more forward point, softening the ride. Experimentation with trim tabs in various sea conditions will help you determine the best positions for your boat under different load conditions.

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Trim tabs are also useful in correcting a port or starboard list. If the boat is listing to the port side, press the starboard trim tab switch toward "bow down". Press the port trim tab switch toward "bow down" to correct a starboard list. This will tend to lower the bow by pulling the higher side to a level position. If your bow is already in a low position, you may correct list by pressing the trim tab switch toward "bow up". This will cause the low side to rise and level the boat. It will also gradually improve the running angle.

Trim tabs in the extreme "bow down" position will cause the boat to come on plane with minimum bow rise. Unless you are operating at low speeds or with considerable cockpit weight, you will likely want to raise the tabs slightly when underway to avoid "plowing" water. With the tabs in the "bow down" position, you will be able to maintain a plane at the least possible RPMs.

Most drive units are equipped with an adjustable rudder trim tab. This trim tab should be adjusted to balance the steering at the speed which you travel most frequently. Variations in speed, boat load, or changes in the drive unit trim will cause the steering to pull in one direction. If the boat pulls to the left, adjust the trim tab to the left and vice-versa.

#### TRIM TAB PUMP LOCATION

The Sailfish trim tab pump is located behind the aft berth wall. The pump is accessed by removing the center section of the aft berth wall.

## MAIN CIRCUIT BREAKER

There is a 40 AMP circuit breaker located next to the accessory battery select switch. This is the main breaker protecting the wiring supplying power to the accessory switch panel. If this breaker is tripped, it may be reset by depressing the red button on the breaker box.

## OPERATION OF OPTIONAL FEATURES

#### COMPASS

The compass is located at the helm station in direct view of the operator when navigating the boat. Compensation adjustments to the compass may be made by following the instructions included in the "Owners Packet".

## ACCESSORY OUTLET - 12 VOLT

A 12 volt outlet at the helm is available as an option on all models. This outlet provides an easily accessible power supply for accessories such as cellular phones and spotlights.

## **NOTICE**

This outlet cannot be used with a cigarette lighter.

#### DOCKSIDE POWER

The dockside power option allows the use of AC equipment on board the boat. This equipment includes any permanently installed appliances such as a microwave or water heater, or it may be a household item plugged into a receptacle. The dockside power is utilized by connecting the heavy duty cable supplied with the boat to an appropriate external power source. This cable provides power to the boat's AC inlet which is wired to the AC panel. The AC panel then allows for distribution to the various appliances and outlets. See dockside wiring in the back of this chapter.

## **↑**CAUTION

Always disconnect the dockside power cable if leaving the boat unattended for an extended period of time.

#### CONNECTING THE DOCKSIDE POWER

- 1. Verify that the external power source is a 3 wire grounded system with amperage and voltage ratings compatible with the boat's AC system ratings.
- 2. Be sure there is sufficient cable length to allow for normal movement between the boat and the dock.
- 3. Turn all AC panel switches (including the main) to the "OFF" position. Turn the circuit breaker at the dock outlet to "OFF".
- 4. Connect the dockside power cable at the boat inlet first.
- 5. Connect the dockside power cable at the dock outlet and turn the dock outlet circuit breaker to "ON".
- 6. Turn the main circuit breaker to the "ON" position.

## NOTICE

If there is not any power at the AC panel after completing the above steps, check the in-line circuit breaker under the aft starboard gunwale. This breaker protects the wiring between the cable inlet and the AC panel and must be in the "ON" position for the panel to receive power.

## / WARNING

If the reverse polarity indicator on the AC panel is activated, immediately disconnect the dockside power cable and have a qualified electrician correct the fault.

## DISCONNECTING THE DOCKSIDE POWER.

- 1. Switch all circuit breakers at the boat's AC panel "OFF".
- 2. Switch the circuit breaker "OFF" at the dock outlet.
- 3. Disconnect the dockside power cable at the dock outlet first.
- 4. Disconnect the dockside power cable at the boat inlet.

## MOTICE

Keep inlet cover closed tightly when not in use.

#### AC PANEL

If your Sailfish is equipped with dockside power, you will have an AC panel. The panel wiring diagrams are found in this section. AC powered switches are noted on the next page. Some of these switches are included with optional equipment only and may not be found on your boat.

#### AC POWERED AUXILIARY SWITCHES

Dockside power must be connected to shore and the circuit breaker located under the starboard gunwale just forward of the hookup must be in the "on" position for these switches to operate. An AC panel wiring diagram and a receptacle wiring schematic are documented at the end of this chapter.

#### MAIN POWER SWITCH

The main power switch must in the "on" position to operate the auxiliary switches.

#### BATTERY CHARGER SWITCH

An amber light on the charger will shine when the battery charger is operating.

#### WATER HEATER SWITCH

This switch activates your six-gallon water heater.

## 

# TO AVOID HEATING ELEMENT FAILURE, DO NOT TURN ON THE HOT WATER HEATER UNLESS IT IS FILLED WITH WATER.

#### MICROWAVE

An outlet has been designated for microwave use only. Read all instructions in the manufacturer's Operating Manual before operation.

## HEAD OUTLET SWITCH

The ground fault head outlet is a duplex receptacle and is equipped with a cover plate. See the diagram on page 7-15 for outlet locations and wiring specifications.

## CABIN OUTLETS SWITCH

There are two cabin outlets. One is optional for the microwave on your Sailfish, and the other is a ground fault receptacle and is located on the forward wall of the galley. See the AC Panel Wiring diagram on page 7-14 for locations and wiring specifications.

#### BATTERY SELECT SWITCH

The Sailfish is equipped with three batteries, two select switches, and one ON/OFF switch. The battery select switches and two batteries are designated for the engines. The remaining battery and ON/OFF switch is used for accessories. See the Battery Select Wiring at the end of this chapter for wiring details.

If your boat is equipped with twin engines, a battery select switch connected to each engine. Either engine may be started with either battery by selecting battery #1 or battery #2 on the select switches. In normal use, select battery #1 on one switch and battery #2 on the other so both batteries will be charged simultaneously.

#### <u> A</u>WARNING

Never turn the battery select switch to the "OFF" position with the engine running as this could damage the charging system.

#### **BATTERY CHARGER**

This optional feature, is located in the aft rigging compartment near the batteries. For this charger to work, the dockside power must be operating. The charger is activated by turning the breaker switch at the AC panel to the "on" position. An amber light on the front of the charger will glow to indicate the unit is operating. The charger has a built in isolator, which senses the charging needs of all the batteries and distributes charge accordingly. At the point that all the batteries are nearly fully charged, the charger will automatically reduce the current being sent to the batteries to a maintenance level. For more information, refer to the Operation Manual for the battery charger.

#### WINDSHIELD WASHER SWITCH

Your windshield washer is controlled by a valve located in the forward wall of the deckwing. Water may be sprayed on the windshield by opening this valve with the Fresh Water System pressurized (the water pressure switch on the accessory switch panel must be in the "on" position). This water is supplied from the fresh water tank.

## **WASHDOWN OPERATION**

To operate the washdown, first open the seacock located on starboard side of the aft bilge. Depress the washdown switch on the accessory switch panel at the helm station. The washdown system will now be pressurized at the washdown faucet outlet. This faucet may be used alone or with a washdown hose. A washdown hose with a spray nozzle attached may be used intermittently without turning the switch "off", basically the same as a home yard hose with a nozzle. The washdown pump has an internal pressurization switch which will maintain water pressure as needed until the switch is turned "off" at the switch panel.

Contract to the Market

#### LIVEWELL - RAW WATER

To operate the raw water livewell, first open the seacock on the port side of the aft bilge. Then plug the drain in the bottom of the livewell box. The switch at the helm needs to be in the "on" position. The livewell will then fill with water through an inlet fitting, near the bottom of the box. The water level will rise to a point slightly below the top of the livewell and will drain overboard through a screen overflow fitting.

## NOTICE

If the seacock is left open and the pump is not "on", the boats forward motion through the water will gradually fill the box. This inadvertent filling may be prevented by closing the seacock when the livewell option is not in use.

#### **MICROWAVE**

The dockside power must be connected for the microwave to function. Refer to the Operation and Maintenance manual for specific instructions on the safe and proper use of the microwave.

#### WATER HEATER

The water heater will perform if the dockside power is connected. Follow the Operation and Maintenance manual for the proper use and care of the water heater.

#### **HEAD SHOWER**

The head shower is activated by the water pressure switch located on the accessory switch panel. After turning this switch "on", the shower water flow can be controlled by the head sink faucet.

#### COCKPIT SHOWER

To operate the cockpit shower, the water pressure switch located on the accessory switch panel must be in the "on" position. Open the flap and pull the shower wand out from the recessed deck fitting. Depress the button on the back of the wand to spray water. To reinstall the shower wand into the recessed fitting, gently feed the hose down through the deck and replace the flap onto the fitting.

## GUNWALE MOUNT FRESH WATER

To operate the gunwale mount fresh water system, the water pressure switch located on the accessory switch panel must be in the "on" position. Swing the faucet out from the recess to an accessible position. The water flow is controlled by the small white knob at one end of the recess. The faucet should be stored in the recess when not in use, to prevent damage.

#### **OUTRIGGERS**

Outriggers are an optional feature which allow you to spread the lines trolled from your boat and decrease the chance of entanglement.

#### ADVANTAGES

Advantages of outriggers include: offering bait throughout a larger area behind the boat, placing bait out of the wake zone, automatic drop back following strikes (which allows for fish to completely accept bait), and a reduction in unnecessary twisting action characteristic of artificial bait.

#### INSTRUCTIONS

For proper installation and use of your outriggers, reference the installation instruction sheet include in your boating package.

#### CARE AND MAINTENANCE

Outriggers should be washed with fresh water, a mild soap and a soft cloth. The outrigger holders are easy to reach unlike the poles which should at least be sprayed down with fresh water. Never use acidic or abrasive cleaners to clean your outriggers.

A periodic waxing of your outriggers is suggested, if your boat is frequently exposed to salt water. The wax will provide a protective coating and seal the pores of the metal. A non-abrasive, high quality marine or automotive wax is recommended. Before storage, clean and wax your outriggers.

During assembly grease all threads, bolts and tubes, where one section is inserted into another. On an annual bases you should disassemble and regrease all applicable surfaces. A periodic check for stretched or worn spreader wires on the outrigger poles are advised. If wires are stretched, they should be re-tensioned to provide even support.

## HEAD OPERATING INSTRUCTIONS

#### MARINE ELECTRIC HEAD

#### **OPERATION**

- 1. Open the inlet seacock (to the vertical position). The seacock is located under the cabin floor access plate on the starboard side.
- 2. Flush the toilet by pressing the button above the toilet.

#### EMPTYING HOLDING TANK BY USE OF OVERBOARD DISCHARGE

- 1. Open the discharge seacock (to the vertical position), which is located under the cabin floor access plate on the port side.
- 2. Turn the monitor "on" at the control panel.
- 3. Press the discharge button until the lights on the control panel indicate the tank is empty.
- 4. Turn the monitor "off" and close the discharge seacock (to the horizontal position).

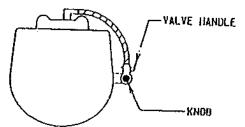
#### EMPTYING HOLDING TANK THROUGH DECK PUMP-OUT

1. Remove the cap from the deck pump-out, located on the starboard walkaround. Connect the vacuum hose and run until the tank is empty. Replace the cap on the deck pump-out.

#### HAND PUMP MARINE HEAD

#### **OPERATION**

- 1. Open the inlet seacock (to the vertical position), which is located under the cabin floor access plate on the starboard side.
- Fill the toilet with water by pulling the valve handle to the vertical position. Pump the handle two or three times.



- 3. Flush the toilet by pumping the handle two or three times, leaving the valve handle in the vertical position.
- 4. Return the valve handle to the horizontal position and pump the handle until all water is removed from the bowl. Leave the toilet in the "flush dry" position when not in use.

## EMPTYING HOLDING TANK BY USE OF OVERBOARD DISCHARGE

- 1. Open the discharge seacock (to the vertical position), which is located under the cabin floor access plate on the port side.
- 2. Turn the monitor "on" at the control panel.
- Press the discharge button until the lights on the control panel indicate the tank is empty.
- 4. Turn the monitor "off" and close the discharge seacock (horizontal position).

## EMPTYING HOLDING TANK THROUGH DECK PUMP-OUT

- 1. Remove the cap from the deck pump-out, located on the starboard walkaround.
- 2. Connect the vacuum hose and run until the tank is empty. Replace the cap on the deck pump-out.

## PORTABLE HEAD WITH IN-LINE MACERATOR

#### **OPERATION**

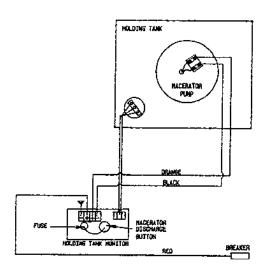
- 1. Compress the beliews pump, located on the left corner of the toilet, a few times to add water to the bowl.
- 2. Flush the toilet by pulling the slide valve handle out (located on the toilet).
- 3. Compress the bellows pump until the bowl is rinsed.
- 4. Close the slide valve handle by pushing it in fully.

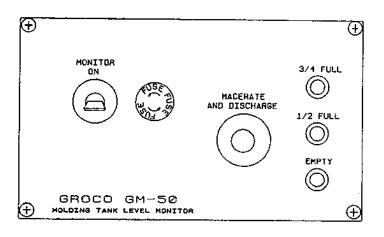
## EMPTYING RESERVOIR BY USE OF OVERBOARD DISCHARGE

- 1. Place the Y-valve in the overboard discharge position, located under the aft berth floor lid.
- 2. Open the overboard seacock, located the same as the Y-valve.
- 3. Turn "on" the head pump switch at the helm and discharge until the reservoir is empty. Close the overboard seacock.

#### EMPTYING RESERVOIR THROUGH DECK PUMP-OUT

- 1. Place the Y-valve in the deck pump-out position, located under the aft berth floor lid.
- 2. Remove the cap from the deck pump-out, located on the starboard walkaround.
- 3. Connect the vacuum hose and run until the tank is empty. Replace the cap on the deck pump-out.





WIRING

CONTROL PANEL

#### PORTABLE HEAD WITH DECK PUMP-OUT

#### **OPERATION**

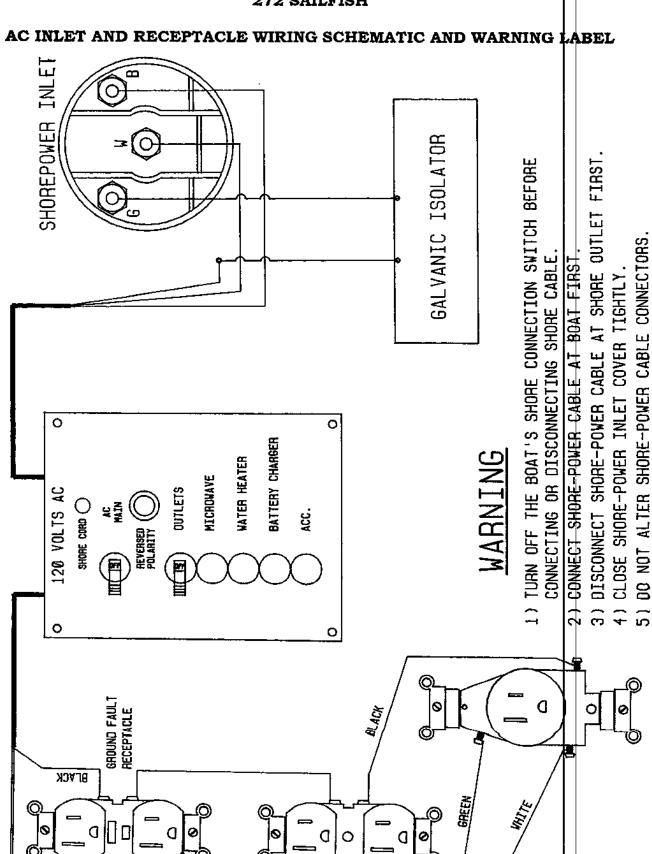
- 1. Compress the bellows pump, located on the left corner of the toilet, several times to add water to the bowl.
- 2. Flush the toilet by pulling the slide valve handle out (located on the front of the toilet).
- 3. Compress the bellows pump until the bowl is rinsed.
- Close the slide valve handle by pushing it in fully.

## EMPTYING RESERVOIR THROUGH DECK PUMP-OUT

- 1. Remove the cap from the deck pump-out, located on the starboard walkaround.
- 2. Connect the vacuum hose and run until the tank is empty. Replace the cap on the deck pump-out.

ACAUTION\_

Overboard discharge seacock must be sealed and secured in the closed position within the three mile limit.

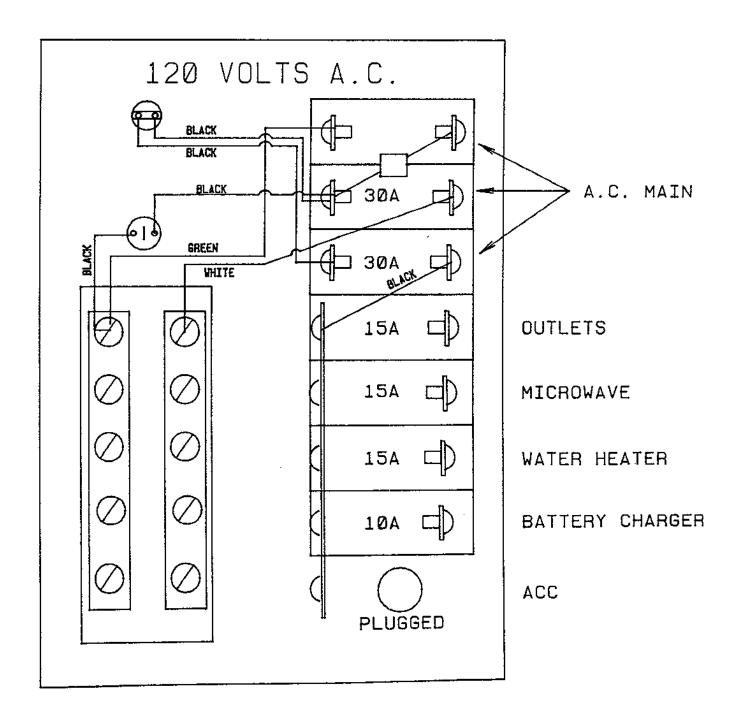


MILE

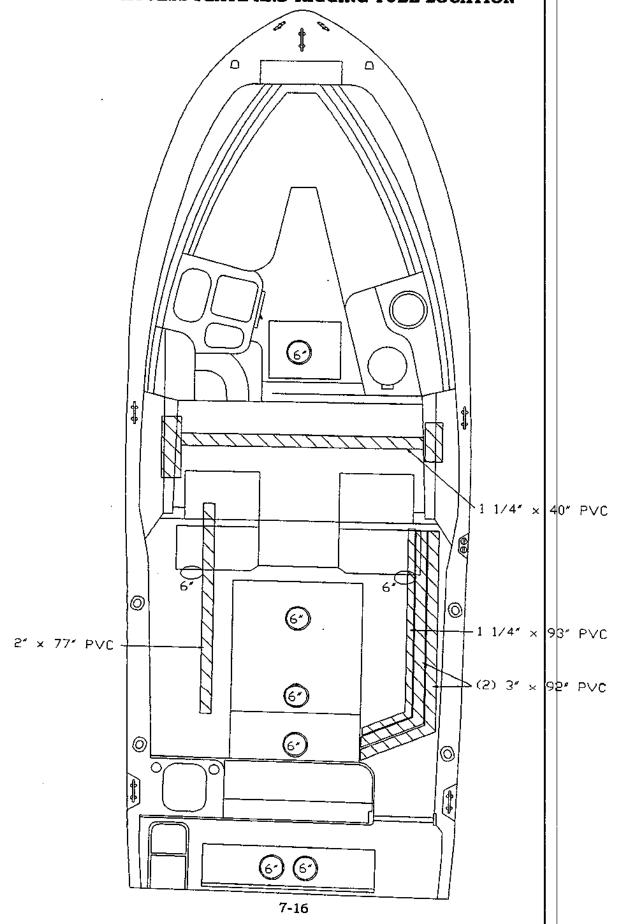
GREEN

HILLE

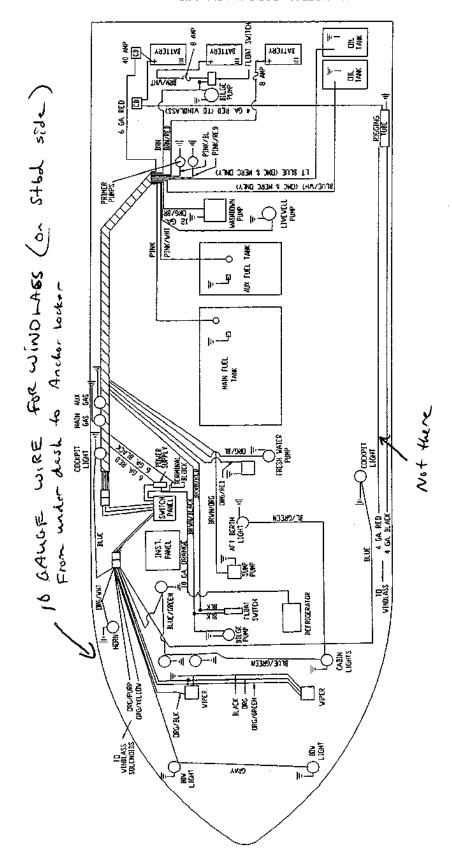
#### **AC PANEL WIRING**



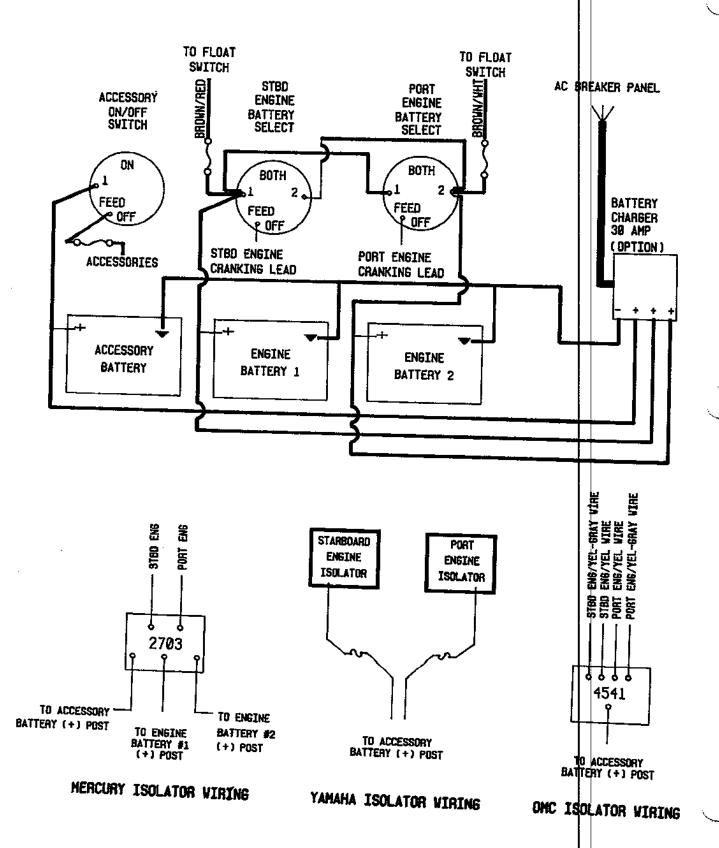
272 SAILFISH
ACCESS PLATE AND RIGGING TUBE LOCATION



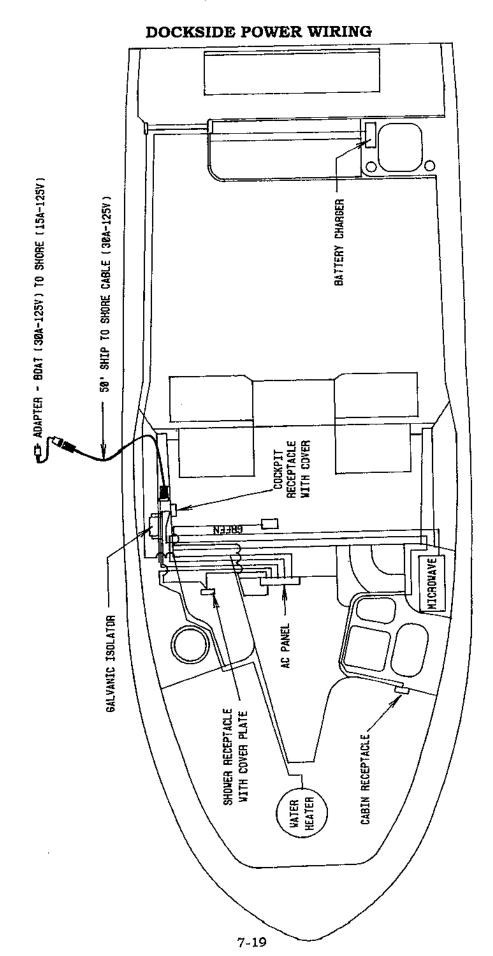
## **ACCESSORY WIRING**

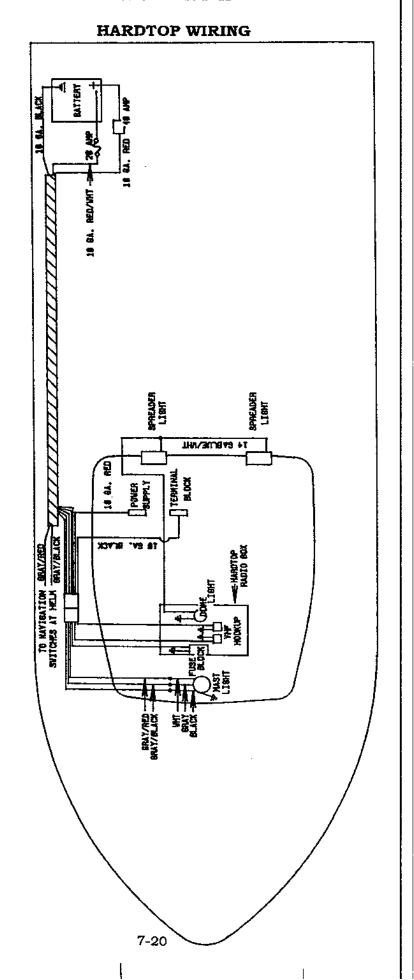


#### **BATTERY SELECT WIRING**

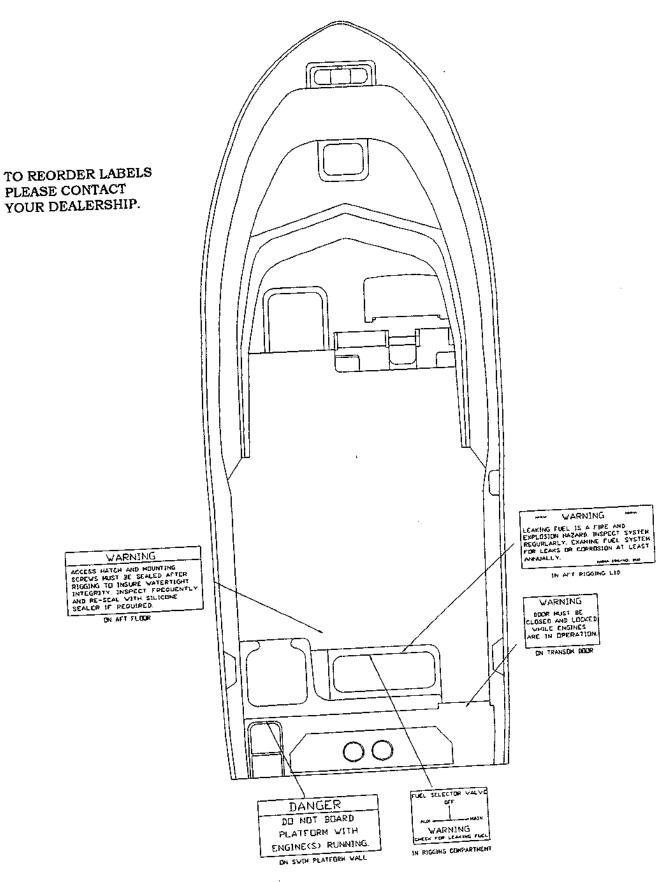


272 SAILFISH

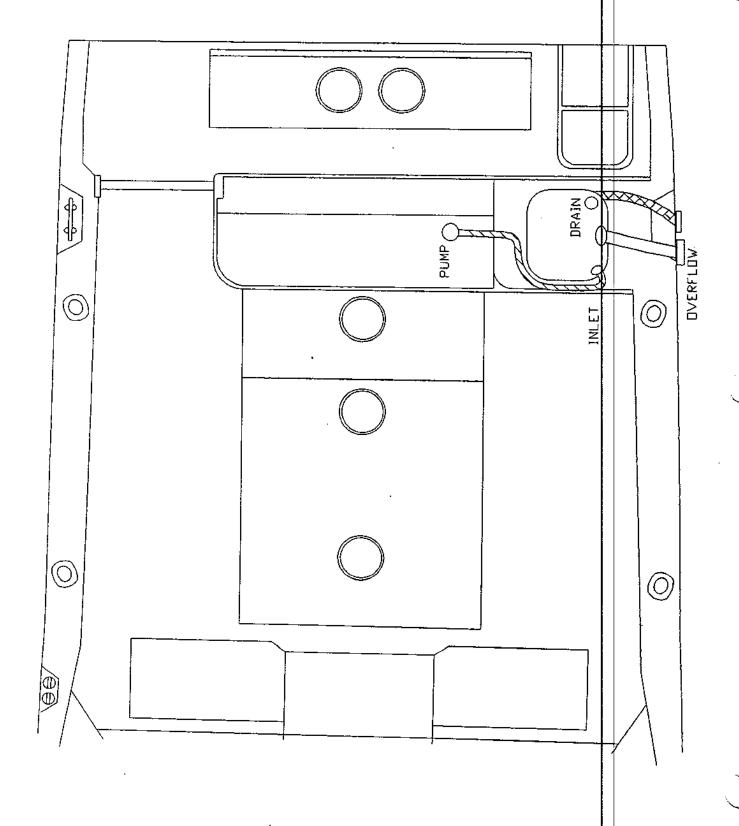




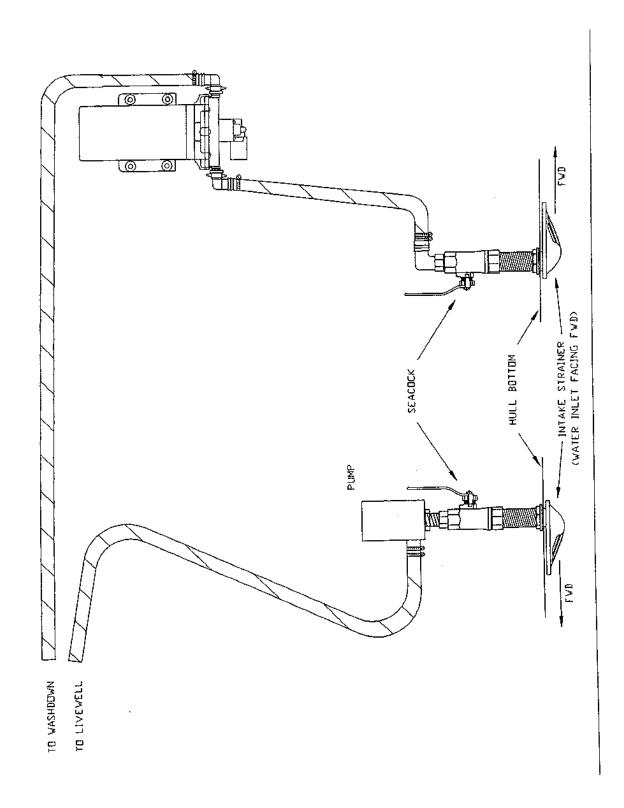
## LABELS AND LOCATION



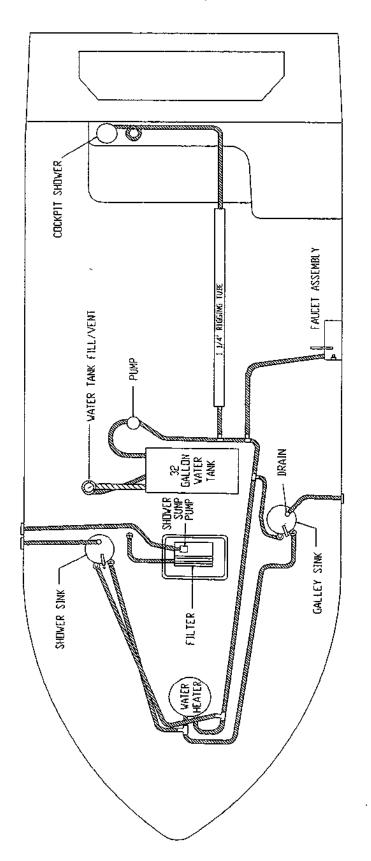
272 SAILFISH
LIVEWELL SYSTEM LAYOUT



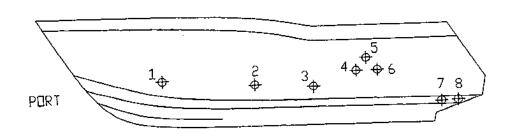
# 272 SAILFISH LIVEWELL/WASHDOWN SYSTEM

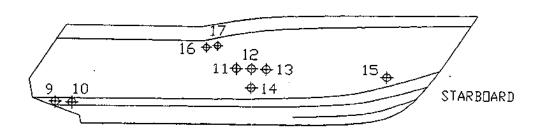


## PRESSURIZED SHOWER/HOT WATER SYSTEM



#### THRU HULL DETAIL





## T-HULL DESCRIPTION

- 1 SINK DRAIN
- 2 ICE BOX DRAIN
- 3 FISHBOX DRAIN
- 4 AFT BILGE
- 5 LIVEWELL DVERFLOW
- 6 LIVEWELL DRAIN
- 7 SCUPPER
- 8 SCUPPER
- 9 SCUPPER
- 10 SCUPPER
- 11 HEAD VENT
- 12 FWD BILGE PUMP
- 13 SHOWER SUMP DRAIN
- 14 FISHBOX
- 15 SINK BRAIN
- 16 FUEL VENT
- 17 FUEL VENT