



GX1 GX2 GX2-HD GX3 GX4 GX5 GX6

Congratulations on the purchase of your new Lone Star Marine Drum Winch. All Lone Star Marine Drum Winches come with a **5 Year Recreational Warranty** on the motor, gearbox, and solenoid, and switch gear, plus a **Lifetime Warranty** on water ingress in the motor and gearbox. LSM winches are made to get wet, making them the perfect option for deck mounts or wet wells. Please adhere to the guidelines below for installation. Please fill out and return the warranty portion of this document along with a copy of your purchase receipt within **30 days** to activate the warranty on your new winch. Warranty transfer is only available with original purchaser receipt.

Standard Inclusions

Your new GX Winch Kit should include an anchor winch, switch panel with circuit breaker, solenoid, and nut and bolt kit. GX1, GX2, GX3, GX4 anchor winches include a backing plate. GX5, GX6 anchor winches include large washers used in lieu of a backing plate.

Maintenance and Use

The Lone Star Marine range of drum winches are robust and reliable and will last years and years with very little maintenance. However, to keep your winch looking and performing at its best there are a few simple guidelines to follow.

- Do Not use your anchor winch for any other purpose than retrieving your anchor without prior written consent. This Warranty does not cover damage caused by misuse.
- Do Not jam the anchor into the bow sprit (anchor davit) upon retrieval. Repeatedly doing so can shorten the life of your transmission and damage your vessel. When your anchor is close just tap the switch until fully raised. If using chain guard leave the last meter off ahead of the chain for an indication of proximity.
- Do Not engage the up switch after the anchor is fully locked in to the bow sprit. This may damage the bow sprit, your vessel, or cause the transmission to lock up.

-Do Not attempt to free a fouled anchor without tying the anchor line off first. This may damage your vessel, bow sprit, or the winch.

-Do Not engage the winch while the boat is underway. Doing so will most certainly cause damage to the vessel and could cause injury or death. **Lone Star Marine claims no liability in the event of intentional or accidental discharge of the anchor while the boat is underway.**

-Do Not attempt to remove the emergency manual release while pressure is on the drum. The drum must be in a neutral position to use this feature.

-Always dis-engage the circuit breaker when the winch is not in use.

-Lightly rinse your winch & chain with freshwater periodically after use.

-A light spray with inox or other lubricant annually over the unit is ideal for moored vessels, vessels little regular washing, or before layup periods.

-Release tension on the winch & dis-engage the circuit breaker before putting the boat away for extended periods of time.

Manufacturing Guarantee

All LSM GX series winches are manufactured in Australia under strict Quality Control conditions. We guarantee this product to be free from Mechanical & Electrical defect on the date of purchase.

Use this product at your own risk

Lone Star Marine or its distributors will not be liable in the event of damage, accident, injury, or death as the result of use, misuse or installation of this product. Lone Star Marine or its distributors will not be liable in the event of damage, accident, injury, or death as the result of mechanical or electrical failure of this product. Always keep hands away from the winch and rope while in operation. LSM winches are very powerful and can cause serious injury if hands, fingers or other body parts are caught between the drum and cradle or caught up in the rope & chain. Please keep children and pets away from this product while in use.

Warranty-Recreational Use

The GX series features a 5 + Life Warranty. The motor, transmission, solenoid, & switch gear are covered against normal wear and use. The motor and transmission are also covered for Life against Water Ingress. Warranty does not cover solenoids or switch panels with water damage. Warranty does not cover electrical cable or rope and chain. Warranty does not cover anchor loss or rope and chain replacement. Warranty does not cover bow sprit or vessel damage due to use or misuse. Warranty does not cover damage from faulty installation or undersized cable.

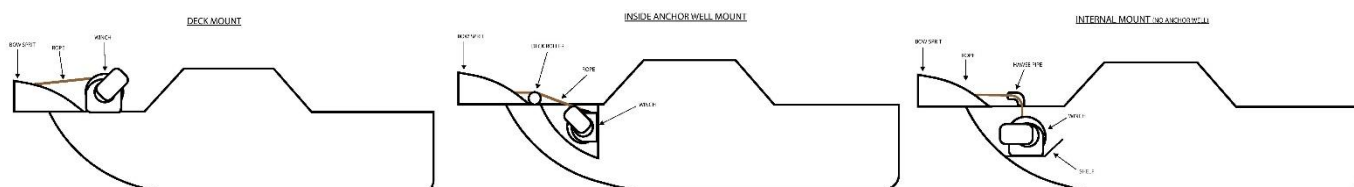
Warranty-Commercial Use

LSM Winches feature a 2 Year Warranty for Commercial Use. Warranty does not cover solenoids or switch panels with water damage. Warranty does not cover electrical cable or rope and chain. Warranty does not cover anchor loss or rope and chain replacement. Warranty does not cover bow sprit or vessel damage due to use or misuse. Warranty does not cover damage from faulty installation or undersized cable.

Terms and Conditions

- Always have your winch installed by a professional. LSM will not warranty damage or malfunction due to improper installation.
- Use cable size recommended in this document for each winch. LSM does not warranty motor damage due to undersized cable or faulty connections.
- Winches are to be used for raising and lowering your anchor only. LSM will not warrant winches used for any other purpose without prior written consent.
- In the event of a warranty claim or fault email a description of the issue to your retailer or sales@lonestarmarine.com.au along with the place and date of purchase, a description of your issue & a picture if applicable. LSM or their distributors may request additional information and pictures. LSM values our customers and will determine the most efficient course of action to get you back on the water as soon as possible.
- Damaged items will be replaced or rebuilt at the discretion of LSM.
- Freight & Labour charges may be covered through our dealer network only (if applicable & at the discretion of LSM and our Offices) and will only apply to mechanical or electrical defect from normal wear and use.

Common Fitting Styles

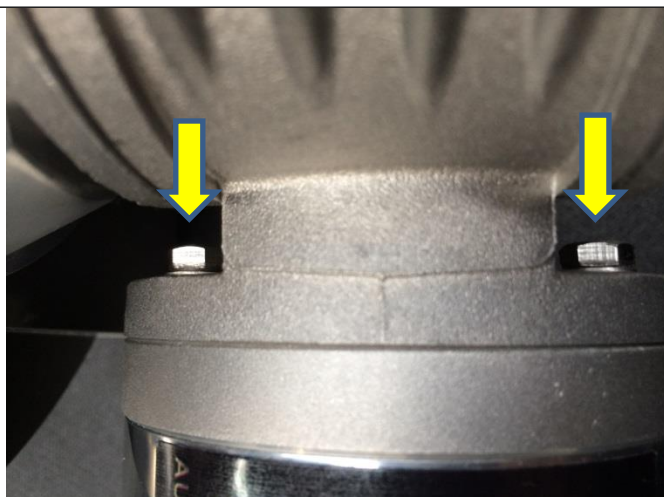
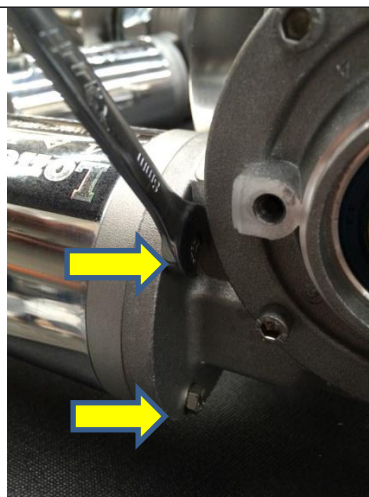
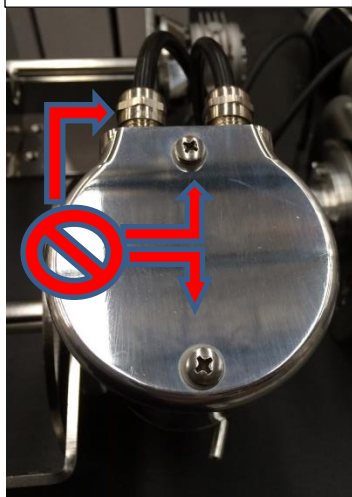


Installation Notes & Advice

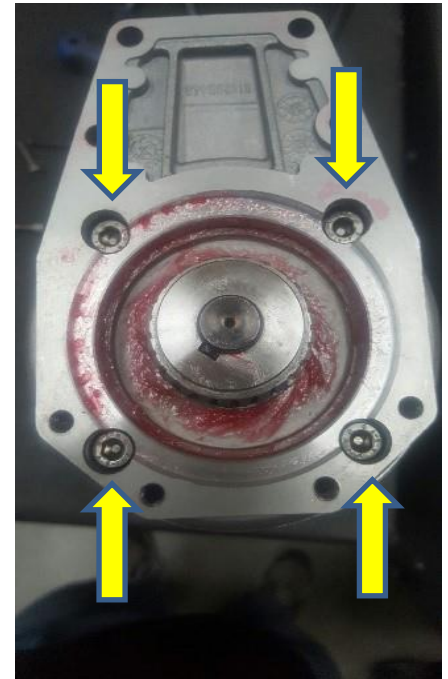
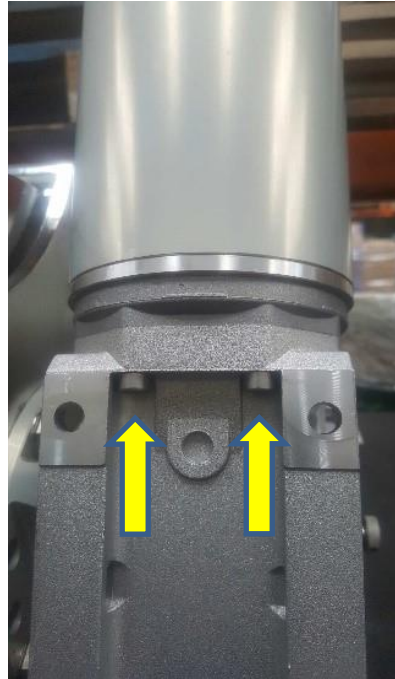
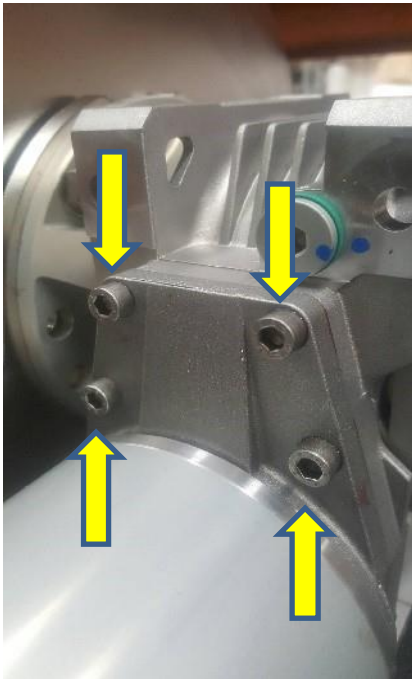
Changing Motor Gland Orientation

Motors are assembled and waterproof sealed in house. **DO NOT remove disassemble or attempt to modify the cable glands or bolts pictured at the top of the motor.**

GX1, GX2, GX3-Motor Glands (where the cables come out) are adjustable to 4 different orientations (N, S, E, W) for easier fitting on your application. For deck mounting face the glands down or away from the front of the boat. They should not face the sun or direct water spray. To adjust the motor glands the motor must be removed from the gearbox and repositioned using the four bolts pictured. Note these bolts require an 8mm wrench. The gearbox collar will have to be removed to access the 2 bolts on the drum side.



GX4, GX5, GX6 Motor Glands (where the cables come out) are adjustable to 4 different orientations (N, S, E, W) for easier fitting on your application. To adjust the motor gland position the motor must be removed from the transmission, turned, and re-attached. GX4, GX5, GX6 transmissions require an Allen key for this operation. There is no need to remove the collar from the transmission or drive from the shaft. Remove the six cap head bolts from the transmission coupling. The motor with coupling attached can then be removed from the transmission. Once motor with coupling are removed change motor orientation by removing the 4 internal cap head bolts and re-position the coupling on the motor.



Changing Motor Orientation on Drum All Models

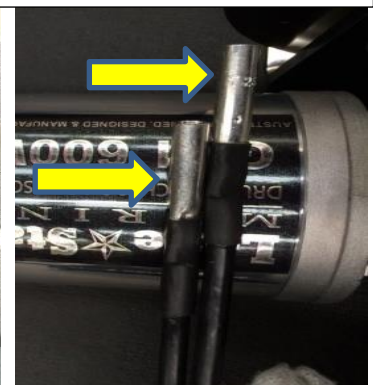
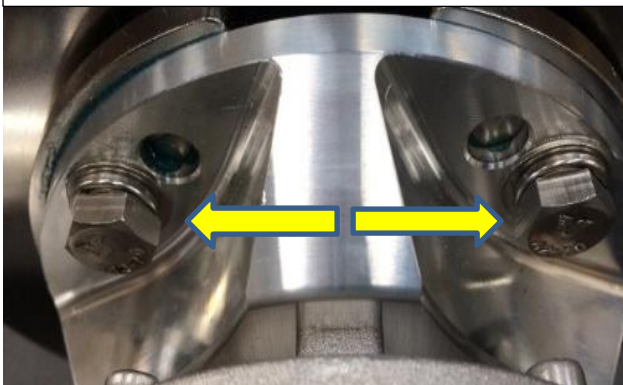
Gear/Motors are adjustable to 24 different positions. To adjust the Gear/Motor remove the four bolts around the transmission collar and replace bolts into new holes provided. There are 8 drilled holes in the cradle and 3 adjustment holes per position in the collar. Note the Bearing cover plate (underneath) must also line up to the chosen holes. **Some positions only allow 3 bolts to be used as one hole will be in the void above the shaft. This is ok, only 3 bolts are required for Installation & operation.**

Emergency Manual Release

To disengage the drum for emergency manual release, turn the thumb wheel counter-clock wise. You will require 50mm (appr. 2 inches) of clearance. Tie rope off before disengaging if on water. **Drum must be in a neutral position with no pressure on the rode.**

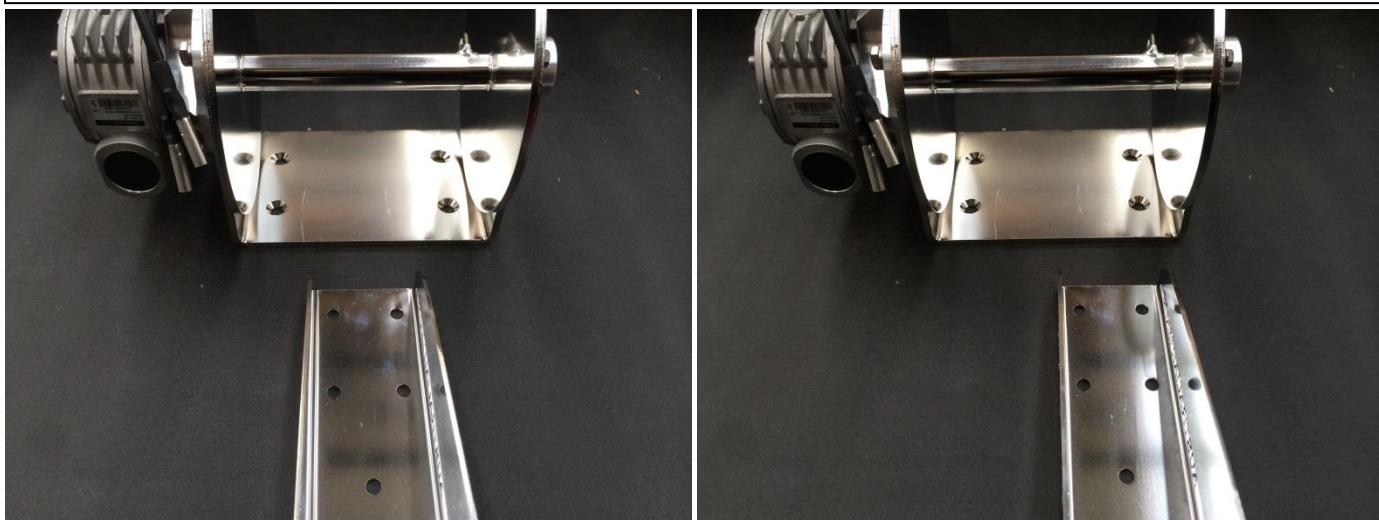
Connecting Motor to Power

L4 connections slide into the barrel crimps provided. Use a swage to crush the barrel crimp ensuring a solid connection. Slide epoxy filled heat-shrink provided over join and apply heat to insulate. There is no permanent positive or negative as the motors are reverse polarity.



Aligning Drum to the Bow Sprit (anchor davit)

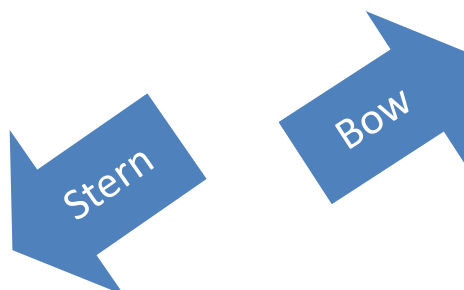
Drum should be central to the bow sprit (anchor davit). This will provide the best line lay and prevent un-even filling of the spool and overflow to one side. The drum can be off centre by a maximum of 20% of the drum width without issue. Mounting your winch to one side of the bow sprit (anchor davit) will result in overfilling to one side.



Drum Cradle Orientation

GX1, GX2, GX3 anchor winches have a symmetrical bi-directional frame and can face either direction when mounted both internally or externally.

GX4, GX5, GX6 winches have an asymmetrical frame & stiffener on the rear side of the cradle. This stiffener should face the stern when mounted to the top deck. If mounted internally it can face either direction.



Have further questions on installation & use?

Visit our Lone Star Marine Winch **You Tube** Channel for videos on the GX Series.

Enjoy using your new winch!

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3/16 Malibu Circuit

Carrum Downs, VIC 3201

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ABN: 67 130 554 062

sales@lonestarmarine.com.au

www.lonestarmarine.com.au

WARRANTY ACTIVATION FORM

All fields to be completed by the owner of the vessel to activate the winch warranty.

Boat Owners Details:

Full Name:	Date: / /
Address:	
Phone:	
Email:	

Boat and Purchase Details:

Winch model purchased: <input type="radio"/> GX1 <input type="radio"/> GX2 <input type="radio"/> GX3 <input type="radio"/> OTHER-	
Place of purchase:	Date of purchase: / /
Boat make and model:	
Boat registration:	
Original purchase receipt attached: <input type="radio"/> Yes <input type="radio"/> No	

"I have read this document in its entirety and agree to use this product at my own risk."

Signature: _____

Once completed return to:

P.O. Box 1001 Seaford
Victoria, Australia 3198

Alternatively, scan and email to sales@lonestarmarine.com.au or (North American sales) info@hammermarine.com

Enjoy using your new winch!



GX & Gen Series Anchor Winch Troubleshooting Guide

Key Parts

- **Winch Motor**-This is the tubular part of the drum winch to which the leads are attached. Your winch model number will be on a sticker on the motor. Please ensure you have the model number when calling for assistance.
- **Winch Gearbox**-This is what the winch motor is attached to. The gearbox has an input though the side that the drum shaft goes through. The gearbox is what spins the drum.
- **Solenoid**-This is usually mounted behind the dash of the boat. It will have 4 posts on top that connect to the:
 - 1 Positive connection from the circuit breaker (front right)
 - 1 Negative directly from your battery (front left)
 - 2 connections to the winch motor. Note these are interchangeable as the motors are reverse polarity. (rear right and left)The 3 small connections on the front are for:
 - Outside connections go to the Up/Down switch on the dash.
 - Middle connection goes to the Neg post on top of the solenoid (front left)
- **Circuit Breaker**-In the switch panel, the resettable circuit breaker should say MP on the front. Push the blue button to disable the circuit, push the yellow paddle back up into the set position to engage the circuit.
- **Switch**-This is a toggle or rocker switch set in the facia next to the circuit breaker. Note only the spade terminals on the left-hand side are used, all terminals on the right-hand side should remain empty.
 - Top and bottom posts should connect to the front outside terminals on the solenoid.
 - Middle post should connect to the AUX side of the circuit breaker.
- **Gearbox Collar**-This connects the gearbox to the side of the drum cradle.
- **Drum Cradle**-U shaped bracket that holds the drum
- **Drum**-Shaft with two circular flanges welded on each end, this is what holds the rope & chain.

Customer Service

sales@lonestarmarine.com.au +61 (03) 8774.4582

1.1 **New Install-Winch not working:**

"I have installed the winch and it is not firing up."

Please ensure all steps below have been taken in order before calling for assistance:

- Ensure all battery cable connections are tight.
- Ensure battery cable has been crimped into motor leads with a swage or other device. If it has not you will not have a good connection and performance will suffer, you may also have sporadic issues.
- Ensure solenoid has not been mounted directly to aluminium. If the boat is aluminium, mount the solenoid to Teflon or other non-conductive material, then mount that to the boat.
- Ensure solenoid is mounted with terminals facing up
- Ensure switching wire connections between rocker switch and solenoid are properly crimped and tight.
- Ensure a jumper lead is connected from AUX post on the circuit breaker to the middle spade pin on the left hand side, back of the rocker switch.

1.2 **Previous Install-Winch not working:**

"Was working fine last season, but now it will not function."

- Is the solenoid engaging?
Is the solenoid clicking when the up or down switch is engaged?
If the solenoid is making a "brrrrrr" sound of multiple partial clicks per second, this is a power supply issue. It means your solenoid is not getting enough power through it to turn the winch motor. 95% of the time this is due to:
 - Bad connections either at the battery, circuit breaker, or solenoid.
 - Low Battery Voltage.
 - Corroded connections or cable inside the sheath.Please check all connections, battery voltage, and ensure cable is not corroded inside the sheath before calling for assistance.
If the solenoid is making a single click sound carry on to next step below.
- Solenoid appears to be engaging, a single click can be heard when the up or down button is pressed. Note: this still does not guarantee the solenoid is functioning correctly continue to instructions below.

1.3 **Checking Motor, Circuit Breaker, & Solenoid**

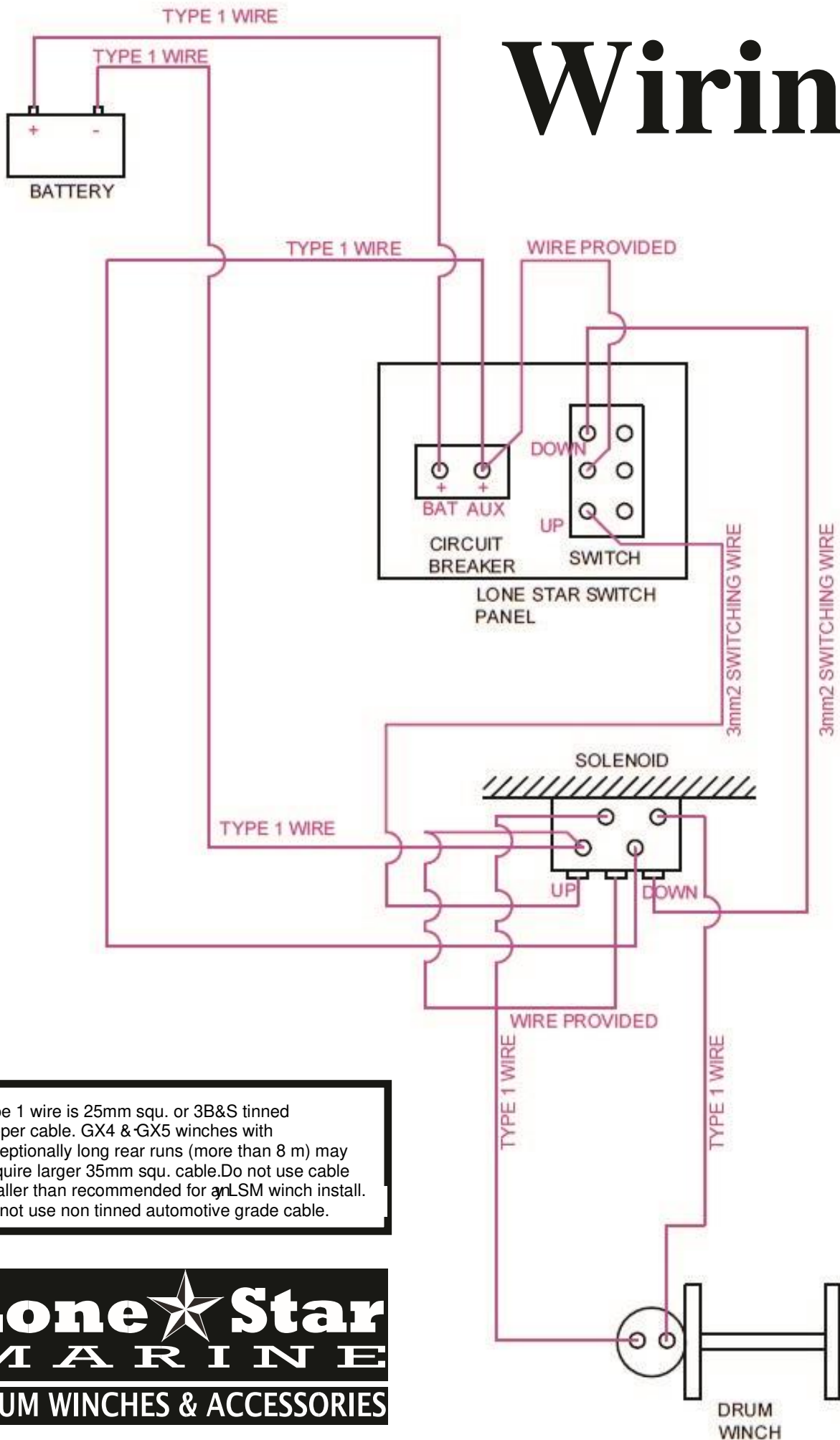
Note the steps below MUST be completed in order for a correct diagnosis.

- To Check the Winch Motor
 - Grab a spare battery and take it to the area where the solenoid is mounted
 - Disconnect the leads from the solenoid that go to the winch motor. Note these are on the two rear posts on the solenoid.
 - Touch them to the battery. The winch should fire up in one direction. When reversed it should fire up in the other direction.

Note: If the motor works in both direction the issue will lie with the power supply, solenoid, or circuit breaker.

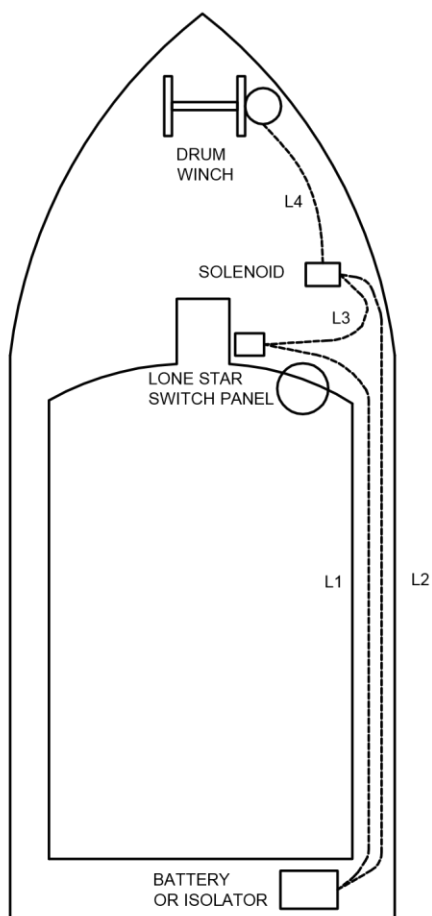
- Checking the solenoid and circuit breaker
 - Reconnect the motor leads to the solenoid
 - On the back of your circuit breaker there is a battery pos coming in on the left-hand stud (BAT), and a battery positive going out on the right-hand stud (AUX). Disconnect the lead from the left-hand stud and add it to the right-hand stud. Ensure the nut is done up tight connection the leads together.
 - Engage the operating switch up and down. If the winch works your issue is with the circuit breaker. Contact Lone Star for a replacement.
 - If it does not work the issue is most likely within your solenoid. Contact Lone Star for replacement.

Wiring



Type 1 wire is 25mm squ. or 3B&S tinned copper cable. GX4 & GX5 winches with exceptionally long rear runs (more than 8 m) may require larger 35mm squ. cable. Do not use cable smaller than recommended for an LSM winch install. Do not use non tinned automotive grade cable.

Lone Star
MARINE
DRUM WINCHES & ACCESSORIES

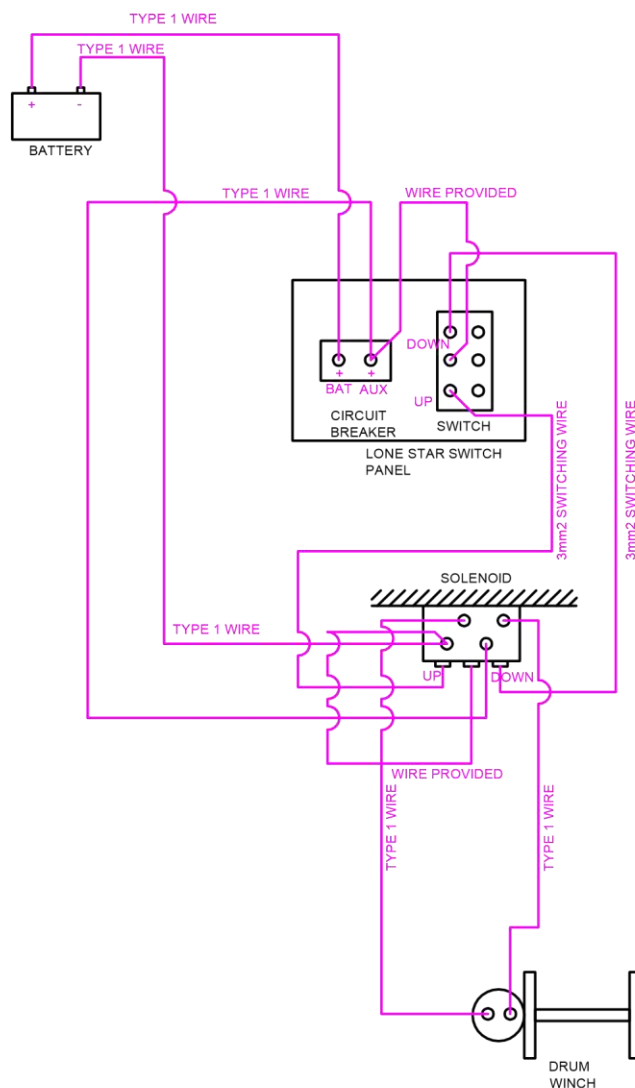


L1- BATTERY OR ISOLATOR TO SWITCH PANEL

L2- BATTERY TO SOLENOID

L3- SWITCH PANEL TO SOLENOID

L4- SOLENOID TO WINCH MOTOR



Cable:

Type 1 wire is 25mm squ. or 3B&S tinned copper cable. GX4 & GX5 winches with exceptionally long rear runs (more than 8 m) may require larger 35mm squ. cable. Do not use cable smaller than recommended for any LSM winch install. Do not use non tinned automotive grade cable.

NOTE: IF UP AND DOWN IS RUNNING OPPOSITE, SWITCH THE UP AND DOWN WIRES ON THE SWITCH PANEL



DRUM WINCH WIRING DIAGRAM

