

DISCLAIMER: Emtion Pty Ltd, Trading as Microtec Engineering, do not take any responsibility for any damage caused installing this product

## **MICROTEC ENGINEERING**

### **EXTERNAL WARNING LIGHT INSTALLATION INSTRUCTIONS**

#### **TADANO AML-LA(C)**

**ESTIMATED TIME OF INSTALLATION: 4 HOURS**

#### **Required Parts**

- 1x Activation box
- 7-core cable
- 1x External warning light
- General purpose kit consumables

# **TADANO AML LC/LA LIGHT INSTALLATION**

*Read all instructions before commencing*

## **PRE-INSTALLATION CHECKS**

1. Set up machine on full outriggers and raise the boom so there are no errors or buzzers active. Set-up computer for main hook, full outriggers.
2. Raise any hook to an ATB alarm situation. Check that the crane motions winch up, luff down, and tele out functions are cut off. Check that the “safe” crane motions winch down, tele in and luff up are operable.
3. Whilst still in alarm condition, switch the ATB over-ride and verify that the unsafe functions are now operable. \*note: be careful not to overwind hook
4. Repeat steps 2-3 with the other hook.
5. Change the boom selection switch to jib setting that causes computer to goto 100% moment. In this state, check that all unsafe motions (Luff down, winch up, Tele out) are in-operable and safe functions (luff up, winch down, tele in) are operable.
6. Turn the AML over-ride switch ‘on’. Test that all unsafe functions are operational with the over-ride switch on. Beware: Autostop functions will not operate during over-ride.
7. While crane is still in 100% moment, verify that the buzzer alarm is sounding.

➤ Should any of these tests fail call Microtec for service

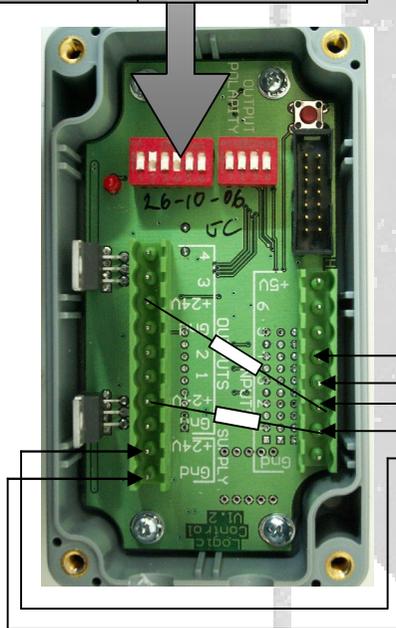
## **INSTALLATION OF INPUTS**

### **PREINSTALLATION PREPARATION**

1. Isolate batteries during installation with isolator switch.
2. Remove seat in cabin
3. Remove side panel located on the left hand side of seat to expose connections to fuse box, radio, relay’s etc.
4. Fit the activation box in a clear area behind this panel. If no place behind panel is suitable, it can be fitted externally. It is preferable for installation that this unit is kept near this area though.

# CONNECTIONS TO TADANO AML LA/LC

SWITCH NO.	SWITCH POSITION
1	Off
2	Off
3	Off
4	On
5	Off
6	On



❖ Unused from 7 core cable may be cut off from the loom.

Use ferrule crimps provided to make the connections to the activation box. You may also need to shorten the length of the ferrules so the lid can close easily.

SEE NOTE 3

SEE NOTE 4

AML-LA(C)  
CN2 PIN 1  
Red/White-blue

AML-LA(C)  
CN2 PIN 4

swapped

CRANE CCT.

SEE NOTE 2

CRANE CCT.

SEE NOTE 1

SWAPPED

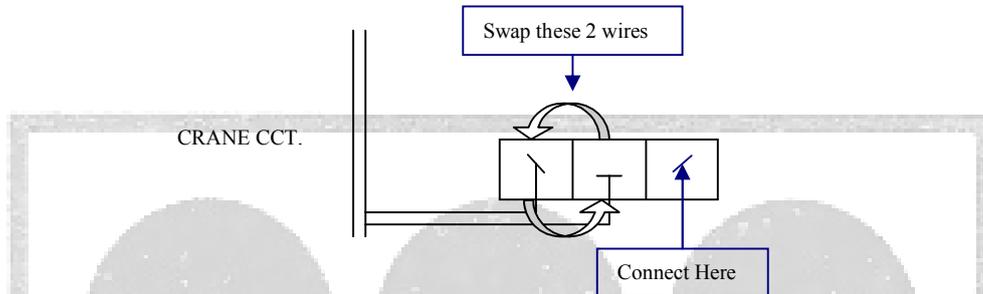
24V

SEE NOTE 5

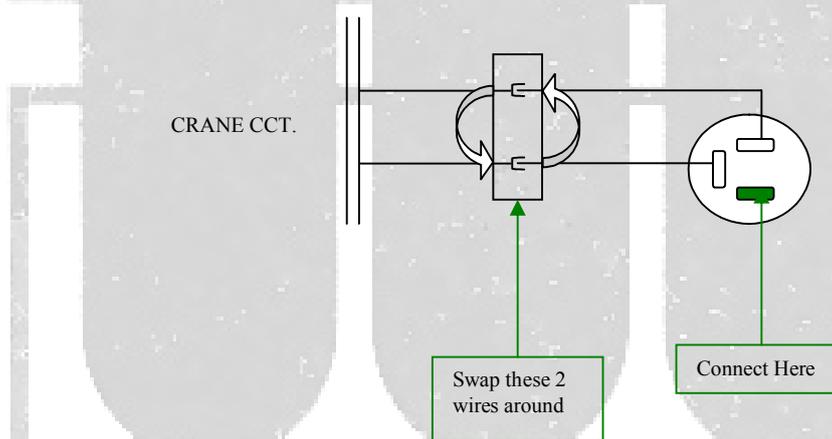
PTO SWITCH

## NOTES

- 1
- Take off the panel that holds the switches for the ATB O/R. Inspect the back of the switch and confirm that 1 out of the 3 contacts is free (As shown in picture below).
  - Using a soldering iron, swap the 2 wires connected to the switch around.
  - Solder the blue wire from the loom to the free contact on the switch.



- 2
- Confirm that the O/R switch is a key operated switch.
  - Follow the wires from the back of the switch to a 2-pin connector. Using a small flat screwdriver, remove the male pins from the connector and swap them around.
  - Connect the green wire to the spare contact of the switch (as shown in the diagram below).



- 3
- Remove the CN2 connector from the back of the AML. Follow the looms coming out of CN2 until you get to several connectors. Locate the following wire: Red/White-blue.
  - Using a multi-meter, perform a continuity test from CN2 pin1 to the Red/White-blue wire found at the connector. This should read approx 0-3Ω. (This confirms that you have found the correct wire).
  - Using an ezy-tap crimp connector or solder and heatshrink, connect the red wire from the loom to the Red/White-blue wire.

- 4
- Return to the connectors from CN2 of the AML. Locate the following wire: Yellow/Green-Red.
  - Using a multi-meter, perform a continuity test from CN2 pin 4 to the Yellow/Green-Red wire found at the connector. This should read approx 0-3Ω. (This confirms that you have found the correct wire).
  - Using an ezy-tap crimp connector or solder and heat-shrink, connect the yellow wire from the loom to the Red/White-blue wire.
- 

- 5
- Locate the AML fuse. This should be written on the fuse box lid .
  - Connect the white wire to the ‘fused’ side of the AML fuse. Use the piggy-back female blade terminal supplied.
  - To find the ‘fused’ side:
    - ⇒ remove the AML fuse and then turn PTO on
    - ⇒ measure either side of the fuse holder to see which side has +24V
    - ⇒ Turn the PTO switch off
    - ⇒ Replace the fuse. The fused side is the end that didn’t have +24V when fuse was removed
  - Locate a suitable earth point. On the metal back plate which the relays are mounted on, there should be a common earth point.
  - Connect the eye terminal to the black wire and fix to the common earth point.
- 

#### EXTRA NOTES

#### WIRE COLOUR CODE:

EXAMPLE: Red/Yellow-Blue

- Red = Main wire colour
- Yellow = Vertical line colour
- Blue = Horizontal line colour