

Introduction

The following instructions provide an easy way for users to apply Turner Designs' Antifouling Copper Tape (P/N 2300-506) to the C3 Submersible Fluorometer's Optical Head. The copper tape significantly reduces biofouling, allowing for increased accuracy and precision when making measurements during long term deployments.

Preparation

Before installing copper tape to your C3 Submersible Fluorometer's optical head, prepare the area where the copper tape will be installed by making sure to:

- Remove all existing copper tape (if any) by peeling it away from the optical head
- Clean the area using a soft cloth and warm soapy water
- Dry the area completely

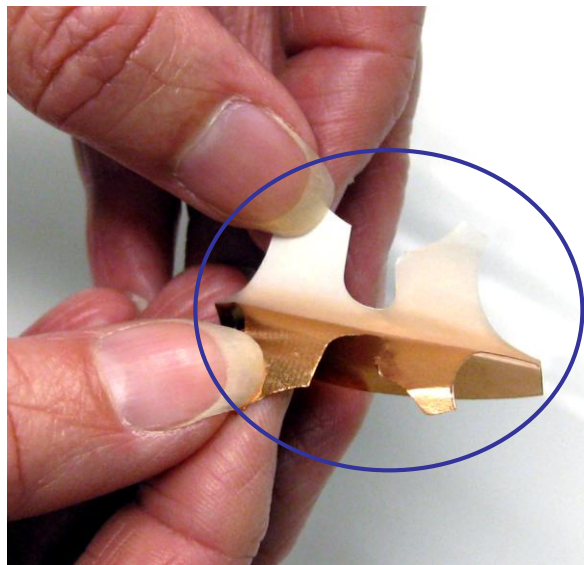
Note: *It is important to make sure the area is completely clean and dry before installing copper tape.*

Installation

- 1) Remove the adhesive backing from one of the arms of the copper tape piece



- 2) Remove the adhesive backing from the other arm of the copper tape piece



- 3) With the adhesive side down, carefully align the arms so they come close to the center plug or wiper while making sure the copper tape doesn't contact any of the sensor heads



- 4) Remove the rest of the adhesive backing from the copper tape



- 5) Press down on the copper tape allowing it to stick to the C3's optical head to check the positioning of the copper tape piece (*Note: if the tape is contacting the sensors or is outside of the inner diameter of the C3's optical head, indicated by the blue ring in the figure below, remove the copper tape piece and re-apply*)



Inner diameter of
the C3's optical
head

- 6) If the copper tape is not contacting any of the sensor heads and is within the inner diameter of the C3's optical head, use your finger to apply pressure to all parts of the copper tape to smooth any bumps, rough parts, or detached edges



- 7) Repeat steps 1-6 to apply copper tape pieces to the C3's optical head as pictured below



Recommendation for Copper Tape Replacement

The degradation rate of copper tape is dependent on environmental parameters. Some environments will cause copper tape to degrade quicker than others. Turner Designs recommends these copper tape pieces to be replaced after 90 days of use. Depending on your environment, the copper tape pieces may need to be replaced more often.