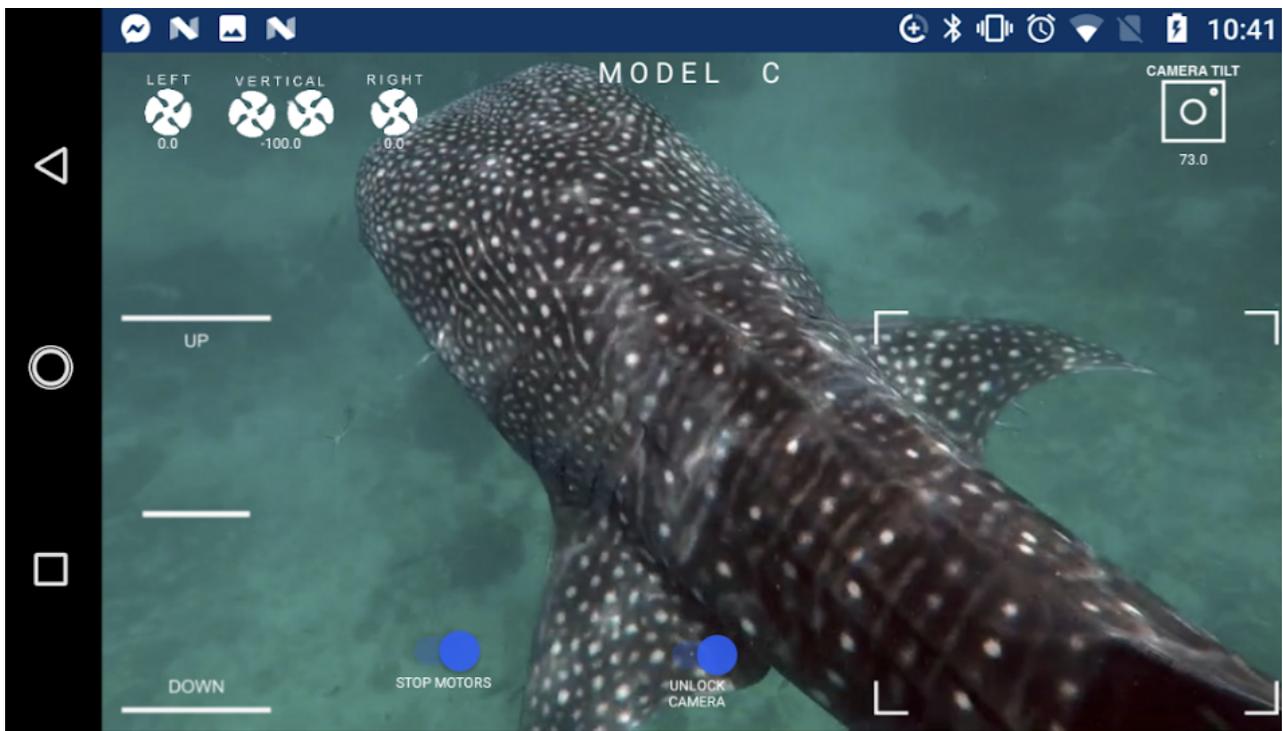


# blue dot ROV



## Model C v0.1.0 User's Manual

You'll need:

Model C ROV
Topside WiFi Module
WiFi-enabled Android Device

Tools:

Phillips Screwdriver
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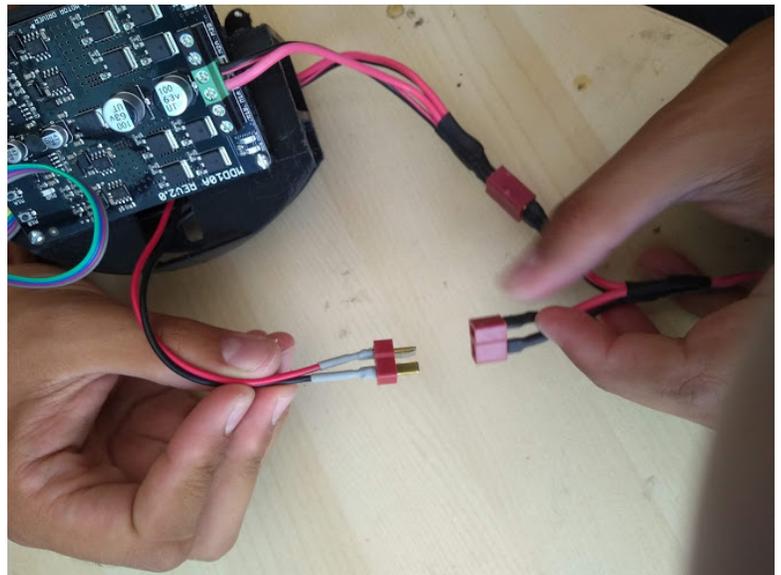
### Before you dive

#### Step 1

12 hours before you dive, place the desiccant packet inside the pressure sphere. This will prevent fog from forming inside the dome during your dives.

#### Step 2

Plug the battery into the main power T-plug. (Make sure the arming key is not plugged in – if it is, you might drain your battery before your dive)



#### Step 3

Seal the pressure sphere.

With your screwdriver, use a 6-32 ½ machine screw and a 6-32 nut to fasten the forward dome to the rear dome at each pre-tapped hole on the dome rims. Tighten until you see a bead form around each screw and nut. Proceed to repeat for

all pre-tapped holes in a star-like pattern. Before you dive, make sure there is a bead all around the o-ring.

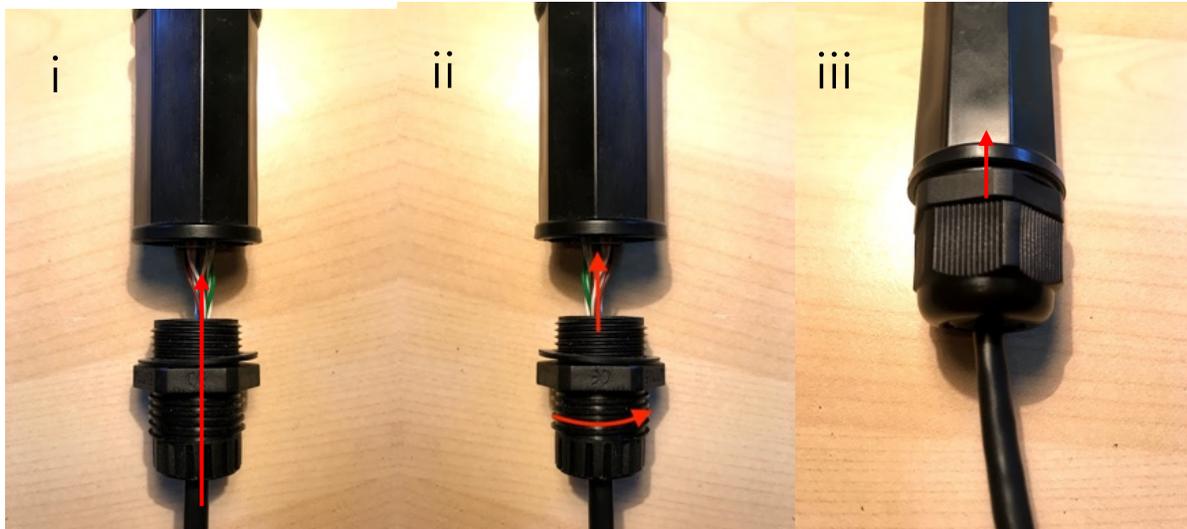


**WARNING:** It is your responsibility to ensure the pressure sphere is properly sealed. Your ROV's warranty does not cover damage due to water ingress. We recommend testing your pressure sphere's seal in a bathtub without electronics onboard before your first dives.

## When you dive

### Step 1

- i. Plug in the WiFi Module to the Model C's ethernet jack.
- ii. Then, screw-on the inner caps.
- iii. Finally, screw on the outer.



These seals prevent damage to the ethernet pins should the connection be splashed.

### Step 2

Insert the key. **CAUTION:** When the tab clicks into place, the right vertical motor should spin up to let you know the Raspberry Pi is booting up. The lights inside the pressure sphere should now turn on.



### Step 3

After the Model C is turned on, turn on the WiFi module's power block. Press the button, and the LEDs should light up.

### Step 4

On your android device, sign into the Blue Dot ROV WiFi signal (GL-MTxxx). The password is "goodlife"

### Step 5

Open the Blue Dot Mobile App. After a few seconds, should now see a live stream from inside the Model C's acrylic sphere.

### Step 6

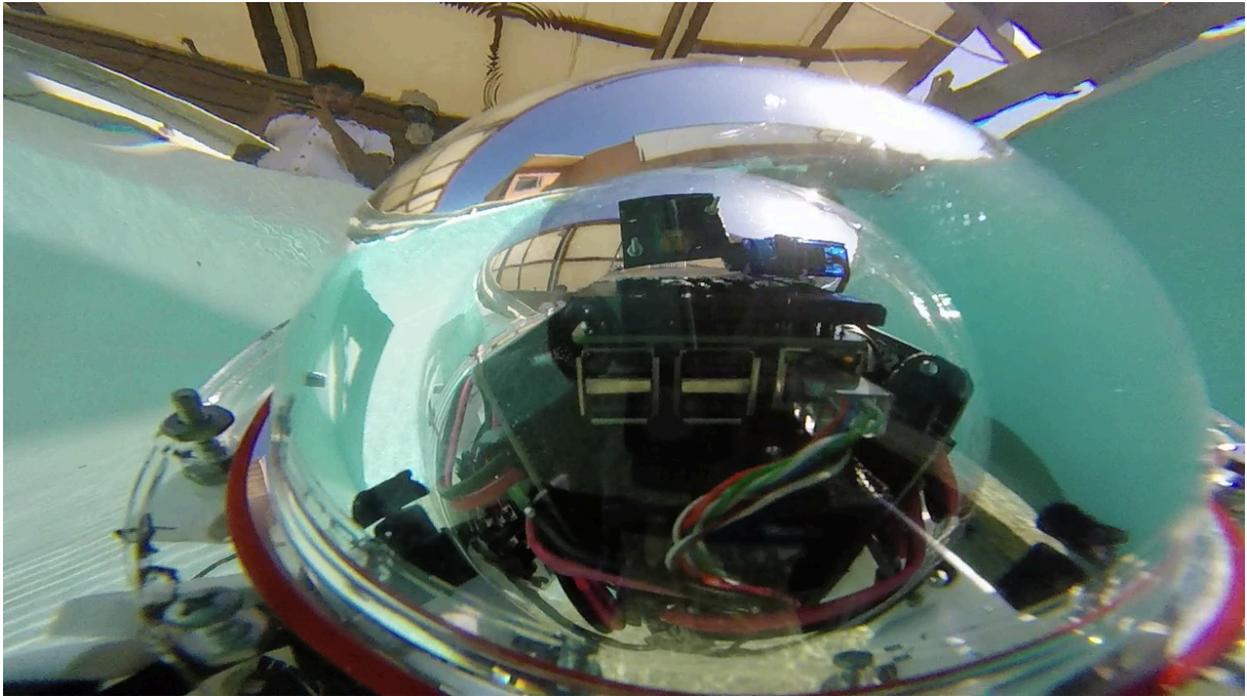
Do a final check of your ROV's o-ring (make sure there is still a bead surrounding the dome interior).

If you are sure the pressure sphere is sealed, put your sub in the water!

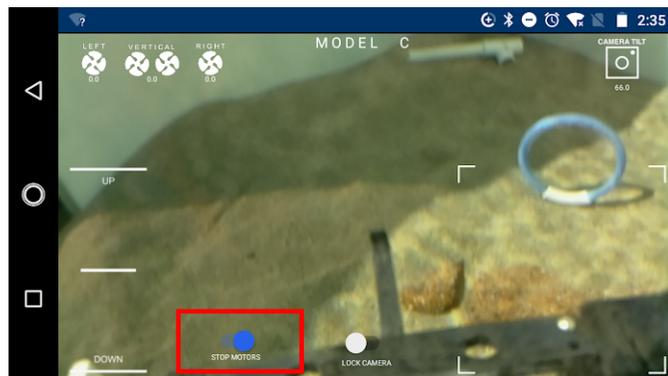


**WARNING:** It is your responsibility to ensure the pressure sphere is properly sealed. Your ROV's warranty does not cover damage due to water ingress. We recommend testing your pressure sphere's seal without electronics onboard before your first dives.

## Step 7 Piloting your ROV

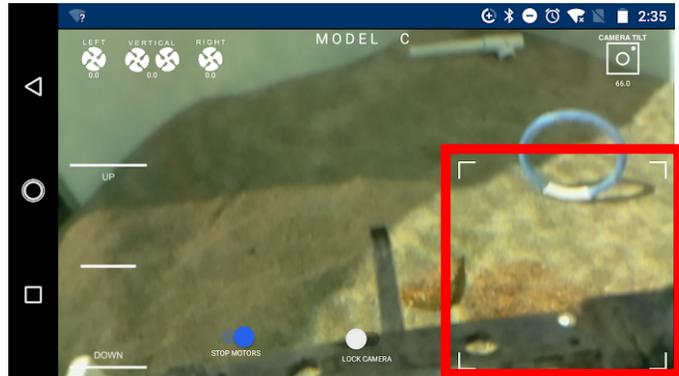


- To enable motor control, click the "ARM MOTORS" button.

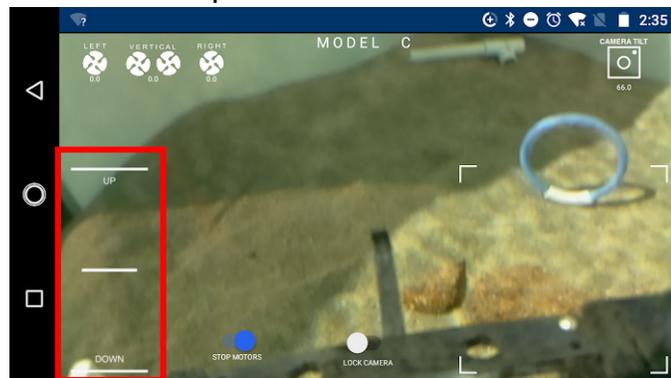


- To resize the video stream, click "resize" and pinch or expand the image to the correct size
- To record video, click the "RECORD" button.

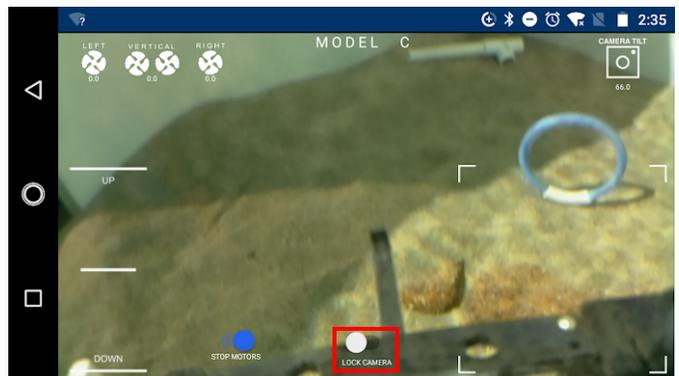
- The box on the bottom right corner of your screen will control your ROV's horizontal motion. To move forward, move your thumb towards the front of the box. To turn left, move your thumb to the left, etc.



- The scale on the bottom left controls vertical motion. Move your thumb toward the top to move the ROV upward. Likewise, slide your thumb toward the bottom to move down.



- To adjust the camera's tilt, click the "unlock camera" button. Then, tilt your android device in the direction you'd like your camera to point. To hold the camera in that orientation, click the button again to lock the camera into place.



## Step 8 After your dive:

*Your ROV battery can last up to a half hour if you use your motors continuously, and over an hour if you maneuver using short bursts of motion.*

- When you're finished diving, recover the ROV and remove the key
- Rinse the exterior with fresh water to remove salt buildup
- Dry the exterior thoroughly to prevent corrosion.
- Open the pressure sphere to recharge or replace the battery