

ARGO Float Deployments

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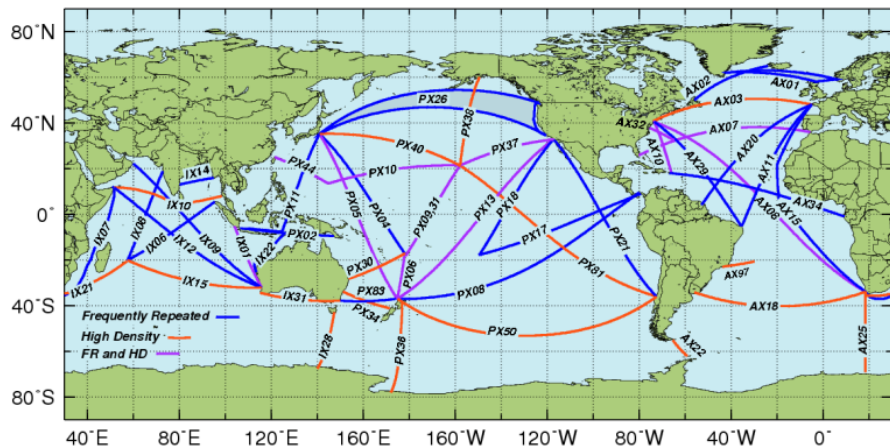
Miami, Florida

Many thanks to:

- Paula Rychtar
- Jim Luciani
- Pete Gibino
- Rob Niemeyer

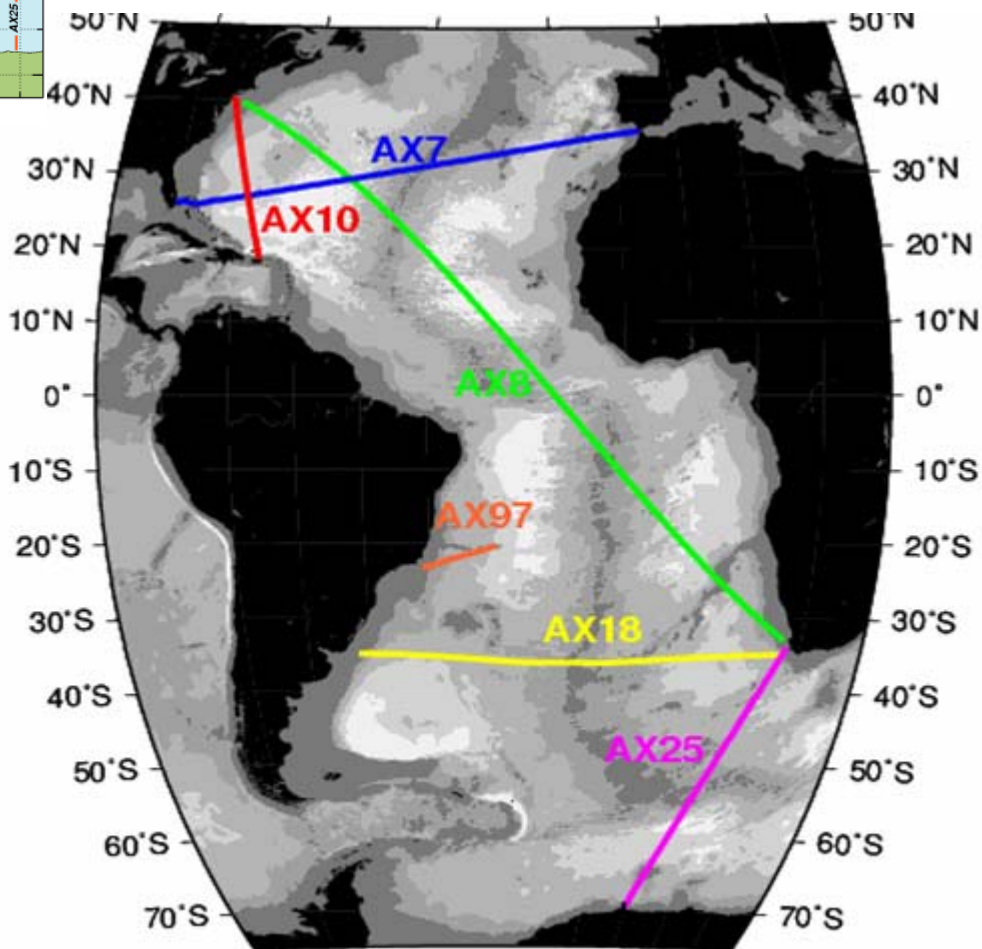
And especially:

- Tim Kennifick
- Gus Mckay

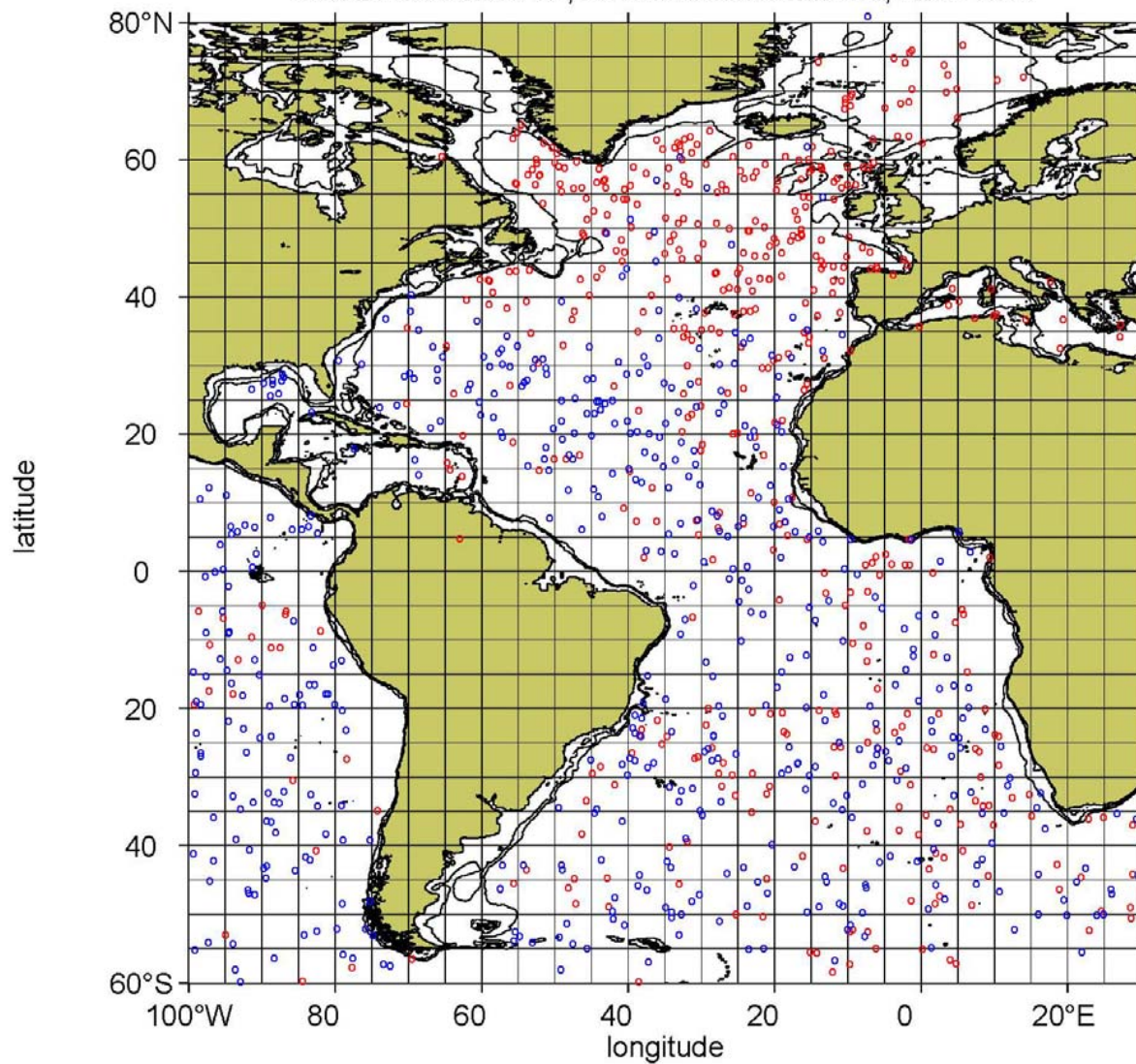


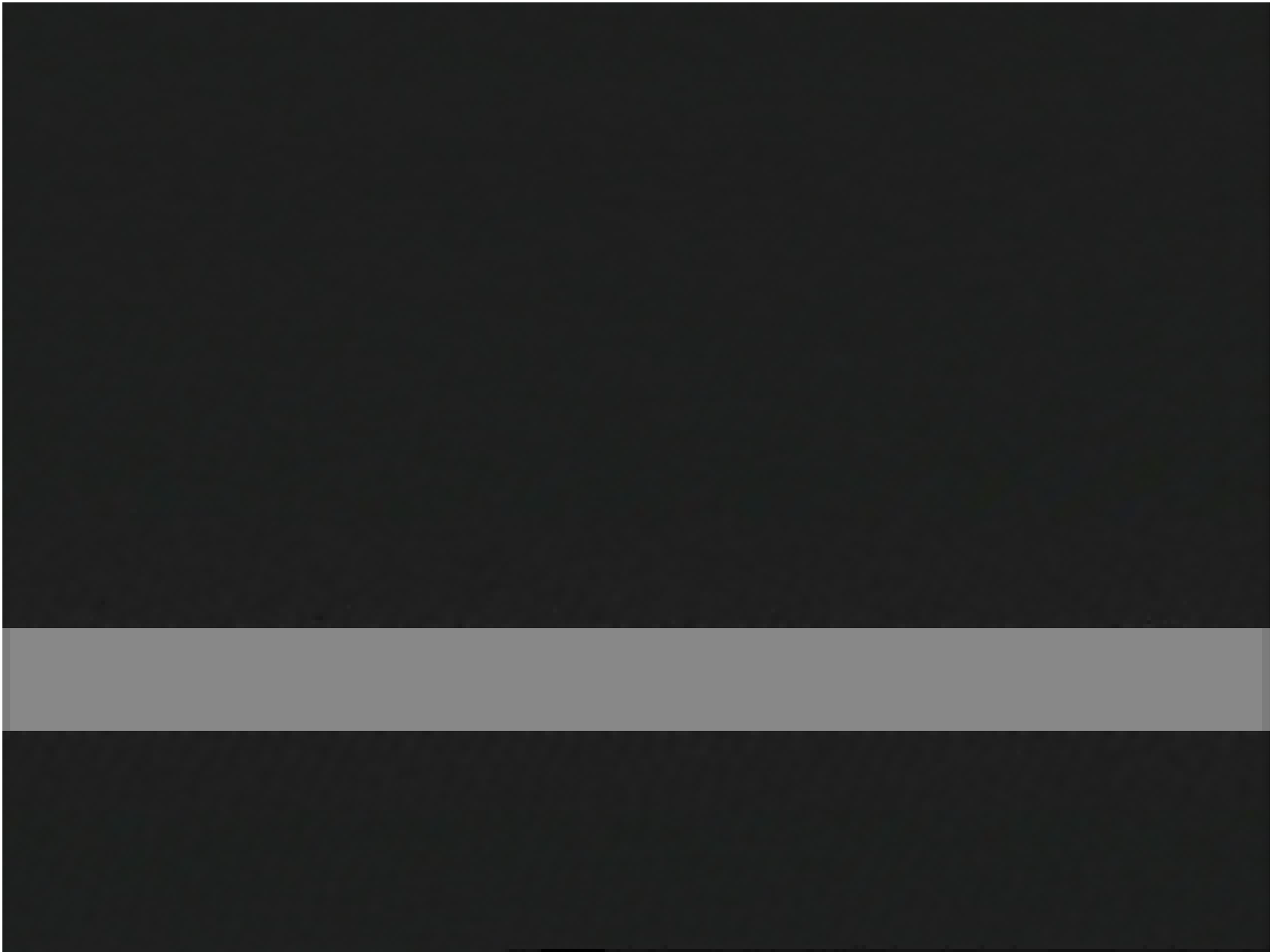
Worldwide VOS Lines

Atlantic Hi-Density XBT Lines



ARGO November 22, 2010 Red: international; Blue: USA





Normally, ARGO floats are shipped directly to the ship that they will be deployed from.

They are usually stored on the main deck, protected from the weather.

When the rider joins the vessel, the floats are then turned on. Most floats are very similar, but there are different requirements for float deployments:

Deployment instructions for APEX Argo floats

Equipment:

APEX ARGO Float



Deployment ropes (x2)

Cardboard casing consisting of:

- 5-panel (85"x17") box
- 24"x24" squares with slits (x2)
- 36"x17" rectangles with oval hole (x4)

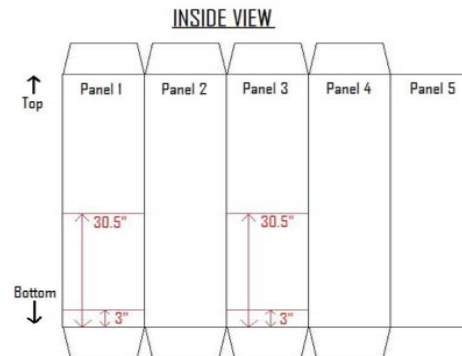


- Wooden plates with ropes (x2)
- Wax thread
- 'Lifesaver' candies (x4)



Construction of box:

- Measure and mark 3" and 30.5" from the bottom fold on the inside of panels 1 and 3 of the box.



- Glue “pyramids” along upper side of 3” and 30.5” lines on panels 1 and 3 of the box, with the oval holes facing up.



- Drill holes through base of pyramids and box on panel 3, roughly in centre of base of pyramid. Ensure holes large enough to thread rope attached to wooden plates.



- Thread ropes through holes with wooden plates inside “pyramids”, flush up to the “pyramid” base.



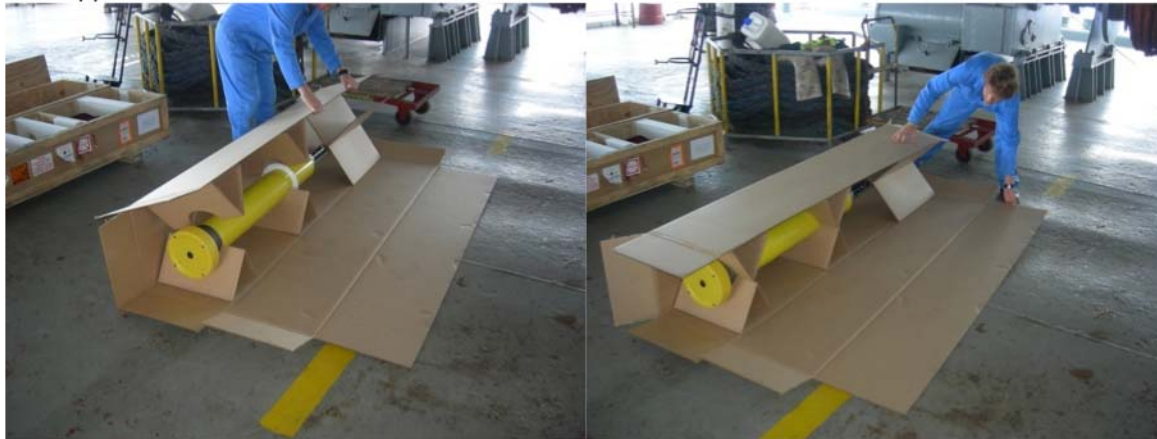


- Remove float from shipping crate. **Always ensure rubber plug is inserted into base of float and that plugs are removed from CTD!**
- Place float onto panel 3 “pyramid” holders in the oval openings such that the antenna points to the top of the box. Float should lie with base of float on bottom side of lower “pyramid” and the deployment ring on top side of upper “pyramid” in order to restrict movement.





- In the case of the Iridium antennae (not pictured), place x in panel 3 on the top side of the float such that the antenna butts up against the x, restricting movement.
- Fold panel 1 over so it is opposite panel 3 and the “pyramids” now surround the float from opposite sides.



- Roll the box through 180° onto bearers, such that the box now lies on the open side with the handles facing upwards. The box is off the ground to make tying it in the next few steps easier.



- Cut 2 lengths of the wax thread each ~8' long.
- Tie a loop in one end of the thread, feeding this through 2 “Lifesaver” candies. Pull loop back over candies and tighten. Repeat for other thread and candies.



- Wrap the thread around the box once, feeding through the candies on the other end of the thread.
- **Be careful to feed through candies only and not the loop in the other end of the thread.**

- Do a trucker's hitch to tighten thread around box.



- Repeat for the other thread. The threads should be positioned near the rope handles for maximum strength. Be careful of the candies, they have good tensile strength but are brittle and crush easily.



- The box should now be secured shut.
- Write "forward" on the end of the box with the base of the float and "aft" on the antenna end of the box. This will be the direction the box must face when deploying whether off the port or starboard side of the ship.



WHOI SOLO Float Instructions:

SOLO Float Launch Instructions Delayed Start

**For those experienced with SOLO Float Deployments,
note the change in starting up the floats.**

**The floats can now be woken up with the magnet, up to
90 days prior to deployment. So now they can be started
with the magnet at some convenient location and time
even prior to being loaded upon the vessel.**

Step 1: Fill out the basic information on the *Float Launch Sheet* and remove the plastic wrap and release cover from cardboard box. The release cover is a cardboard panel and is labeled “Remove Before Launch”.

Step 2: Open the panel on the side of box labeled “Reset” and slide the double magnet over the area marked reset on the instrument. This becomes the “Start” time on the Log Sheet. It works best if the magnet is slid across the reset mark, around the perimeter of the pressure case.



Step 3: Reach inside the window labeled “bladder” and you will be able to depress the sleeve bladder slightly. It will remain inflated for 15 minutes. Do not miss this inflation, as this is the only “feedback” that the float has been successfully woken up.

If the float does not go through these steps, you can re-swipe the magnet without causing any harm. Also, the reset switch may have rotated with respect to the reset mark on the pressure case, so make sure to pass the magnet all around the pressure case. Once the float begins the sequence do not re-swipe.

If the air bladder fails to inflate do not launch the float.

These procedures can be performed up to 90 days prior to the deployment day.

To Deploy:

Step 4: Attach a slip line to the 4 loops of the bridle on the top of the box. The line provided is 3/8” Dacron and 150 ft long.

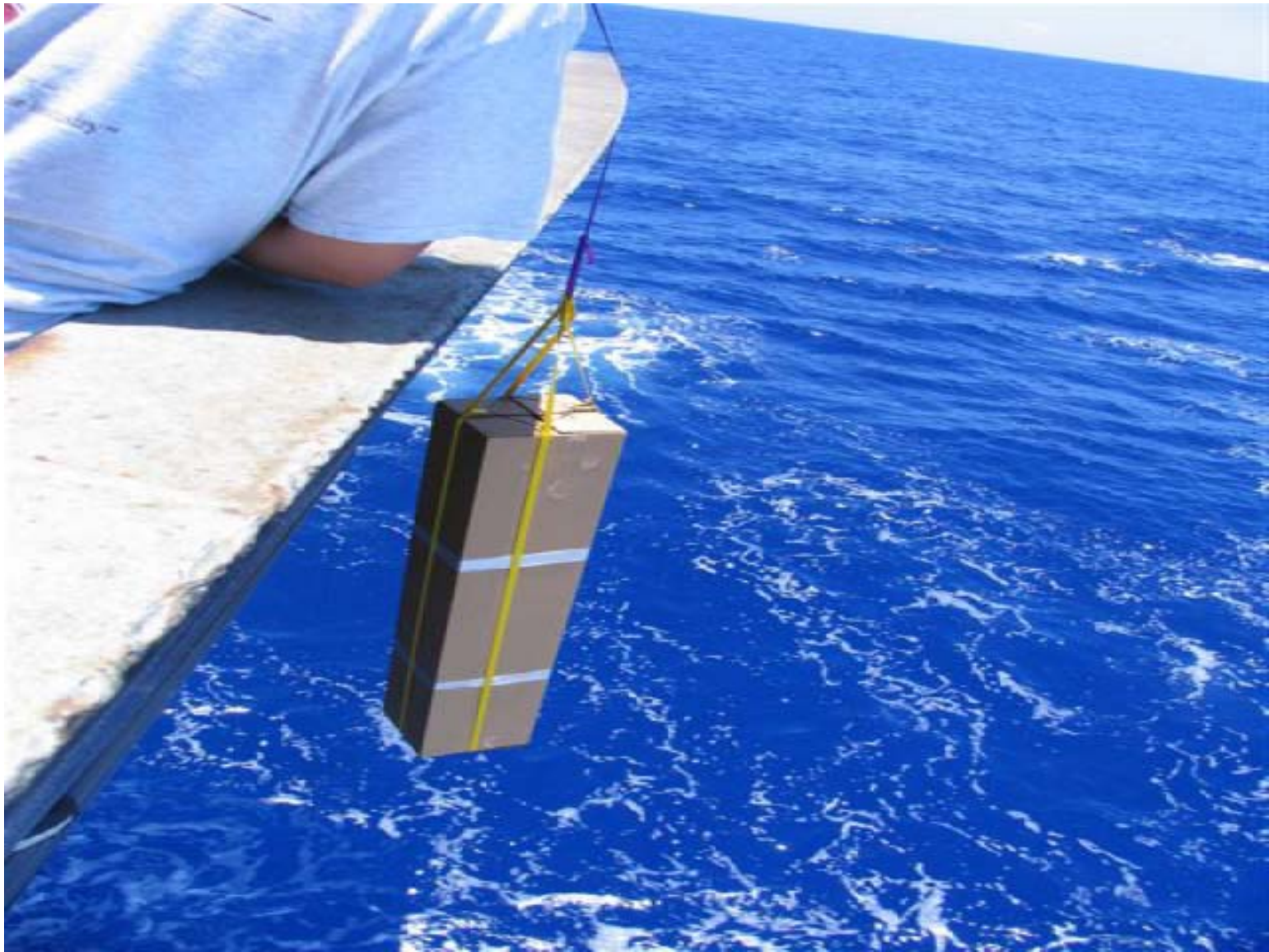
Step 5: Lower the box to the water. There is no need to slow the ship. When the release mechanism gets wet it will release the box from the bridle and the entire box will slip away. The box is sealed with water-soluble tape and is totally biodegradable.

If possible, rinse the launch bridle and release mechanism with fresh water.

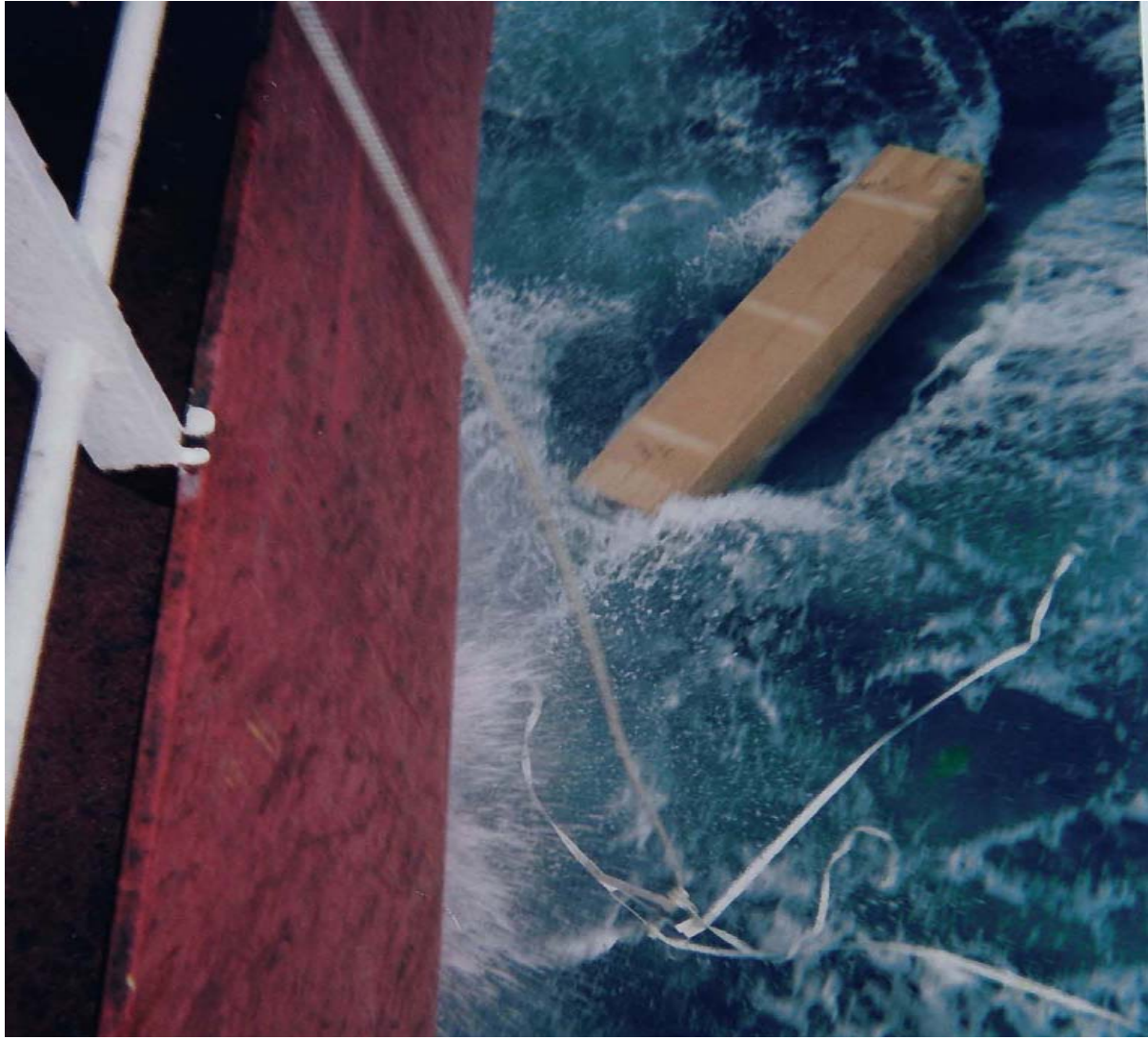
Step 6: Fill in the launch date, position, time, etc. on the launch sheet.













We are looking forward to continuing this collaboration with all you wonderful PMO's.

<http://www.aoml.noaa.gov/phod/argo/index.php>

<http://wo.jcommops.org/cgi-bin/WebObjects/Argo>

Thank you