

R/V Rachel Carson



The Challenge

- Replace the 50+ year old R/V Clifford A. Barnes



Initial Plan

- Design and build a replacement vessel



Unable to secure funding for design/build of a new vessel

R/V AORA



UK Fisheries Research Vessel – found for sale online

Timeline - Milestones

- ✓ Identified RV AORA for sale in England late Dec 2016
- ✓ Visited / inspected RV AORA – Mar 2017
- ✓ Vessel Purchased – 8 Aug 2017 - \$1.07M
- ✓ Shipyard Contract – major maintenance, some modifications – complete 5 Oct 2017
- ✓ Load Rachel Carson in Rotterdam for transport to US – 28 Oct 2017
- ✓ Arrive West Palm Beach, FL – 11 Nov 2017
- ✓ Rachel Carson moored in Ft. Pierce, FL awaiting next load/transport
- ✓ Load Rachel Carson on next transport ship – 30 Nov 2017
- ✓ Arrive Victoria, BC 25 Dec 2017
- ✓ Move Rachel Carson to UW 28 Dec 2017
- ✓ Jan-Apr 2018 – prep for science, develop processes /procedures
- ✓ Apr 2018 – enter service, retire R/V Barnes
 - ✓ First cruise – 7-11 April
 - ✓ Eight cruises completed as of 27 Sept



Drydocked at MacDuff Shipyard - Fraserborough, Scotland



Shipyard Work

MacDuff Shipyard, Fraserborough, Scotland



- Engine maintenance
- Harbor Generator engine replacement
- Electrical system repairs
- Battery bank replacements
- Stern Bulwark removal
- Gantry cross beam removal
- Move crane / winch controls
- Hydraulic system maintenance (inc. fitting/piping renewals)
- Stateroom modifications (incr. berthing from 9 to 13)
- Drydock Inspection – shafts, rudders, through hull fittings
- Painting touch up & top coat plus full blast/paint for aft end of ship

Rachel Carson Prep for Science Ops

since arrival at UW

- Summary of what's been accomplished since RC arrival at UW
 - Improved egress from lower berthing
 - Installed new Engine Room CO2 fire fighting system
 - Hydraulic controls (winches, crane) upgraded including addition of wireless controls
 - Cross decked winches from Barnes to Carson
 - Completed Gantry Modifications
 - Added 115V 60 Hz power for labs & Pilothouse
 - Added Shore Power converter
 - Completed important Engine Maintenance
 - Replaced Port Generator control
 - Added fire extinguishing system for Hydraulic Space

- Replaced stern tube cooling failing piping/fittings
- Completed major maintenance on watertight closures
- Added 2nd life raft – now 28 person capacity
- Cross decked CTD system from Barnes
- Added Rosepoint electronic charting
- Added SCS
- Verified Data network
- Added VHF radio & multiple remotes
- Installed met sensors & integrated into data system
- Got ES-60 & EK-60 working
- Completed US Coast Guard inspection
- Completed JMS inspection
- Accepted as a UNOLS vessel in the U.S. Academic Research Fleet 24 July

Ready for science!



Near term priorities:

- Gain experience & determine best practices
- Get the word out – need more users!!
- ID & prioritize needed improvements
- Raise funds for more upgrades



The Old and the New



First Science Cruise

- Ocean Acidification in Puget Sound (Dr. Jan Newton)



“ I'm very impressed by the ship! Frankly, I sort of fell in crush with the ship. I know its early, but I'm so very pleased. “

Getting right to work doing science





