

UNOLS Meetings

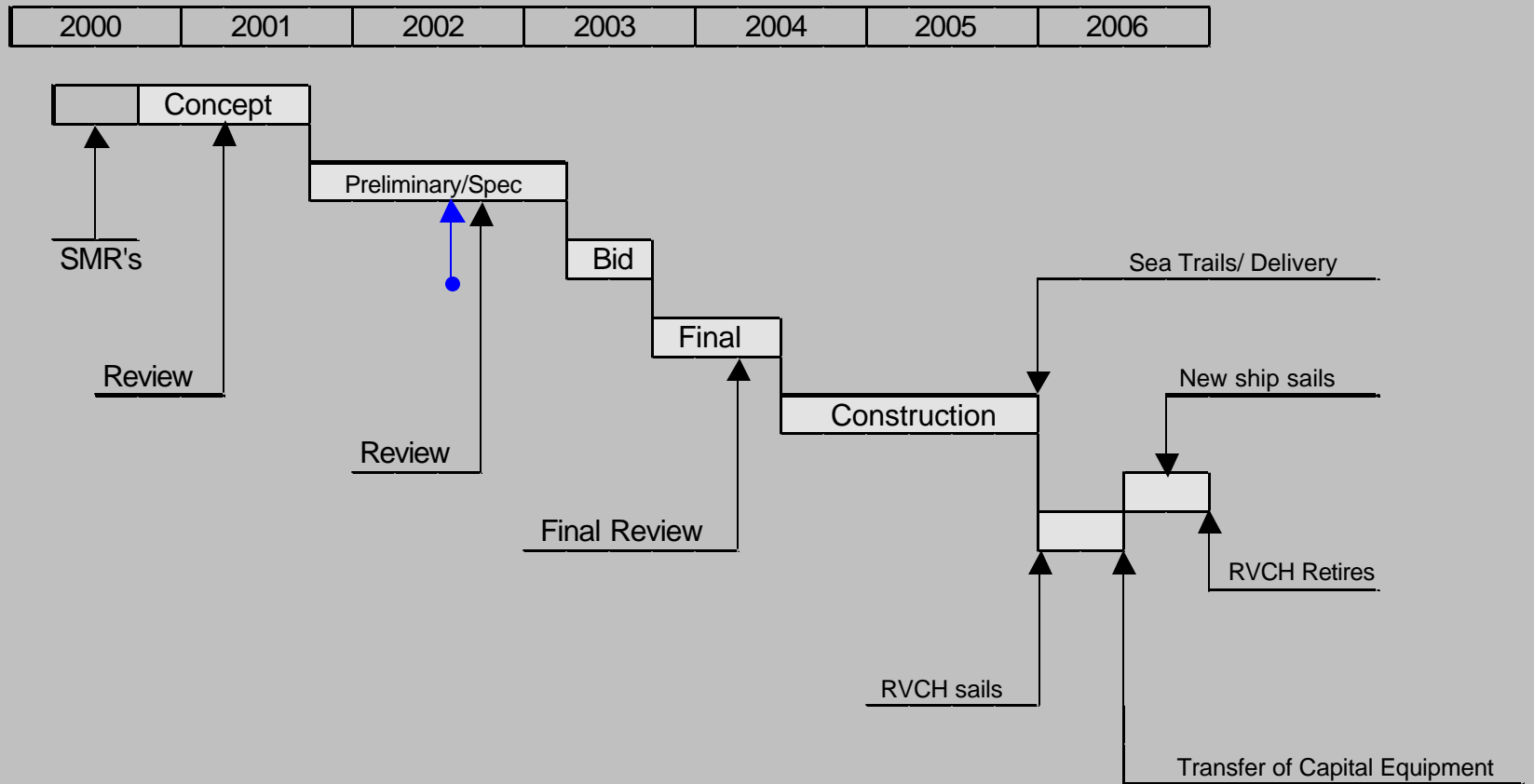
September 2002

RVCH Replacement Vessel Status

Preliminary Design Phase: Specification and drawings ready for bid by early 2003.

- Shipyard selected mid-2003 for “Final” design phase.
- Begin cutting steel in mid- 2004 (Perhaps early 2004).
- Delivery/Sea Trials in 2005.

Timetable RVCH Replacement Vessel



Currently Underway

RVCH Replacement Vessel

- Web site:

www.ocean.udel.edu and click on “Ships and Facilities”

- Design details, structure, and systems being developed.
- DYNACON selected to design and supply “Scientific Load Handling Systems” through competitive proposal process.
- NCE to begin underwater noise predictions based on arrangement and machinery lists. FEA of engine room deck and hull section.
- Shipyard “Pre-qualification” process started.
- Model Testing Program begun.

Model Testing Program

RVCH Replacement Vessel

- Tank Tests – November 4-5th (Vienna Model Basin)
- Focus:
 - Normal issues: Hull resistance, lateral stability, zig-zag maneuvers, etc.
 - Noise Issues: Propeller cavitation, angle of Z-drive cavitation inception, cavitation of hull appendages.

Underwater Radiated Noise Goal: “Below ICES curve at 8 knots”

- Funded by ONR – Results to be shared with UNOLS and Fleet Renewal Process.

Science Review

RVCH Replacement Vessel

- DRVC meeting held September 18th – Focus primarily on details/arrangement of labs, aft deck, and van connection with full scale mock-up.
- Numerous arrangement improvements made!
- Followed by FIC review (~November) – digital photos and written comments from DRVC meeting.
- “Final” Science review after yard selection and before construction.

DRVC Meeting

September 2002

Review of Full Scale Mock-Up



*Wet Lab Review: Dr. David Kirchman Dr. Tom Boyd,
Dr. Rob Sherrell,, and Jared Boyd (Bay Marine)*

DYNACON Group on "aft deck"



DRVC Meeting

September 2002

Review of Full Scale Mock-Up



“Dry Lab”

Wrap-up discussion on “aft deck”: Capt. Lee Black, Bob Henry (Bay Marine), Dr. David Burdige, Capt. Matt Hawkins, Jared Boyd (Bay Marine), Tim Deering (Technician)



Tonnage Issues

RVCH Replacement Vessel

- Vessel kept under 500 gross tons International (ITC) and 300 gross tons domestic (GRT) for regulatory and manning reasons – Flexibility and lower operating cost.
- **HOWEVER** – Vessel built to “sub-Chapter U” (Inspected R/V) standards in virtually all respects.