

CIOSS Local (OSU) Council of Fellows Meeting, 2 December 2009

Present: Curt Davis (Chair), Hal Batchelder, Dudley Chelton, Ricardo Letelier, Roger Samelson, Ted Strub, Amy Vandehey

1) Ted Strub summarized CIOSS' status: We are in the 7th year of our 10-year nominal life. In two years, NESDIS will begin the process of deciding if they want an ocean remote sensing CI in the future. If they do, they will write and issue a call for proposals in the Federal Register. Ingrid Guch and Paul DiGiacomo have been asked to begin formulating a description of what they would want in a new ocean-remote sensing CI. Ingrid's most recent comment was that a new CI would probably only get core funds for Administration (\$250K), not for research. If we are serious about wanting to be part of a new ocean-remote-sensing CI, we should begin documenting our experience and lessons learned from that experience, to provide a rationale for a continued need in NESDIS for an ocean-remote-sensing CI.

2) Ted Strub pointed out that COAS is a formal partner in the new CICS CI that has a lead node at U. MD and a secondary node at N. Carolina State Univ and NCSC (Asheville). Even if CIOSS ceases to exist, this connection would allow NOAA to send funds to COAS PI's who are partners with NOAA colleagues in various projects. The CICS focus is Climate and Satellites, which include our interests in CDRs and Cal/Val. Using either a continuing CIOSS existence, the CICS connection or other means (Cooperative Agreements of some kind), COAS PI's will be able to continue any partnerships they establish now with NOAA beyond the formal CIOSS end date. This is reflected in the list of priorities for the projects that should be funded with the next 3 years of CIOSS resources:

- Projects that strengthen or establish partnerships with NOAA colleagues in STAR-SOCD (Satellite Oceanography and Climate Division, Paul DiGiacomo), or colleagues in other parts of NESDIS or NOAA in general, which bring funding to COAS PI's from NOAA. Our ocean color projects and connections to CoastWatch fall into this category.
- Projects that develop capabilities that will be useful to NOAA and thus allow proposals to NOAA for internal funding in the future, in partnership with NOAA colleagues (within the IOOS program, CoastWatch, VIIRS, Cal/Val, etc.). Continuing to develop data-assimilating circulation and ecosystem models is an example of these types of capabilities. Another would be developing the capability to help with cal/val activities for SST, scatterometry, altimetry, etc. from international satellites, since we'll be using more of these in the future.
- Projects that help NOAA to develop programs that will provide us with opportunities to propose to in the future. Getting NOAA to develop programs that provide funding for coastal altimetry, coastal scatterometry, coastal SST, coastal modeling, etc., would fit in this category.

PRESENT PROJECT STATUS:

3) Curt Davis summarized two ocean color projects, one for MERIS and another for VIIRS. He is using CIOSS core funds to work with 300 m color products from MERIS, collected at a station in Canada. He is archiving the data here and making it available to Dave Foley at the West Coast CoastWatch node. He is also working with Dave to develop and evaluate products from MERIS data. There is increasing interaction with Mike Ondrusek in SOCD. In a second type of project, Curt is funded by IPO to help prepare for VIIRS (launching a prototype in June 2011 aboard

NPP and the first official VIIRS sensor on satellite C1 in 2014). Approximately \$250K per year is scheduled to fund this work into the future (2016?).

4) Ricardo Letelier summarized efforts to replace the X-band receiving station. He is submitting a proposal to NASA for \$150K/year for three years to replace the receiving station, identify new products needed by the user community (bloom indices, color frontal locations, etc.). He needs to talk with Kent Hughes (CoastWatch) to see if NOAA will contribute to this effort. There are also funds from the NESDIS "Ground Systems" line that are slated to come to CIOSS over the next three years (\$60K, \$60K and \$30K). In the first two years, \$30K in each year is meant to purchase computers to help in the ground processing of color data for MODIS, VIIRS, MERIS, etc. The other funds are for labor, to complete the development of merged (using all sensors) color products. In a second project, Ricardo is using CIOSS core funds to use HOTS bio-optical data in comparison to MODIS fields. He will also use the HOTS data with SeaWiFS, VIIRS and MERIS data in order to be able to merge them into a single, merged, ocean color product.

5) Dudley Chelton described recent contacts with colleagues in CICS-MD, continuing attempts to find colleagues with connections to NCEP for funding of his air-sea interaction studies. He felt he made some useful connections to the CICS and U. MD scientists, but they also have had little luck in working directly with NCEP. One positive connection to NCEP has been established in Bob Grumbine, who has recently taken over the production of the Real-time Global SST fields.

6) Hal Batchelder provided some examples of fields of Chlorophyll-a and oxygen concentration from an ecosystem model that he and Yvette Spitz are adding to a ROMS model (similar but not identical to what Alexander is running in real-time). These fields are encouraging but still need more effort. They are modeling fields from 2002 to compare to GLOBEC field data, using a mix of boundary conditions from 2002 and 2008. They will next model the spring-summer season in 2008 and write this up for publication.

NEXT YEAR'S PROJECTS:

7) After these positive reviews of progress, the meeting finished with a brief discussion of projects and funding levels for next year's Omnibus Proposal. The amounts discussed were roughly:

\$ 45K: MERIS/MODIS high-resolution merged color products (Davis)

\$ 45K: HOTS/MODIS optical data comparison, moving toward CDR's (Letelier)

\$ 60K: Transition of SCAT, ALT, Model and other products to public web sites (Strub-Risien)

\$ 43K: SMILE High School Program

\$ 83K: DA Physical Modeling and Ecosystem/Oxygen Modeling

\$224K: Admin (Task I)

These total \$500K. In addition, we expect:

\$ 60K: Ground Systems funds for the processing and merging fields from multiple color sensors

\$225K: VIIRS funds from the IPO, preparing for cal/val for VIIRS using present color sensors

\$150K: ? End-of-year funds. These are highly uncertain but have helped in the past.

This level of funding is still below the approximately \$1M/year that STAR would like to see to justify continuing an ocean remote sensing CI in the future.