Deirdre
Byrne
1NOAA National Oceanographic Data Center, Silver Spring MD, USA
Yongsheng Zhang, NOAA National Oceanographic Data Center-CICS/ESSIC/UMD, Silver Spring MD, USA
Oral
In its role as the US archive for oceanographic data, the NOAA National Oceanographic Data Center (NODC) provides scientific stewardship of the data including near real-time and delayed-mode product distribution, rigorous archive services, custom products, and long-term data stewardship for the Jason-2/Ocean Surface Topography Mission (OSTM) and future satellites in the Jason series including Jason-3 and Jason-CS. Our presentation outlines our basic services, highlighting the following upgrades:

• Primary Datasets: O/I/GDR. Within the past few years, NODC has instituted a mirror service, replicating all GDRs directly from NOAA's Data Distribution Service. This has reduced the latency of providing the OGDR to the public to under an hour. The OGDR is currently distributed through NODC and experimentally, through Amazon Web Services (cloud). Service of all level-2 X-GDR products continues to be provided through ftp, http, OPeNDAP, and THREDDS Data Sever (TDS).

• Enhanced Data Rich Inventory (RI): Data Quality Monitoring (DQM) of 23 variables in the Jason-2 GDR/IGDR is provided on a per-pass basis. Eight statistical indices are computed at the time of ingest of each data file into the archive and stored in CF-compliant NetCDF format. Visualization of these statistics is provided via a Live Access Server (http://data.nodc.noaa.gov/las/) and Jason-2 DQM homepage (http://www.nodc.noaa.gov/SatelliteData/Jason2/qa.html), and they are publicly accessible via ftp, http, OPeNDAP and TDS at data.nodc.noaa.gov. DQM was instituted for the OGDR this year and is currently experimental.

• Derived products: Our Data Quality Monitoring system also automatically generates cycle-mean 3.0°x1.0° and 0.25ox0.25o grids for the monitored I/O/GDR variables (including SLA and SWH). The 3.0°x1.0° gridded I/GDR data (in NetCDF format) are accessible via ftp, http, OPeNDAP and TDS (http://www.nodc.noaa.gov/SatelliteData/Jason2/).

• Data discovery: While Jason-2/OSTM products news and RSS-feed webpages have been developed for improved data access, data discovery has been enhanced by implementation of a Geoportal server (http://data.nodc.noaa.gov/geoportal). Experimental file-level search for the OGDR, including cloud access, is also being tested.

• Preparation for future Jason missions: Archive, access and quality monitoring tools developed for Jason-2 are being generalized into NOAA the Jason Ground System (NJGS) to support Jason-2 and Jason-3 simultaneously in the future. This will allow for a consistent, integrated access to data from the two satellites.
OSTS session
Outreach, Education and Altimetric Data Services
Download to PDF