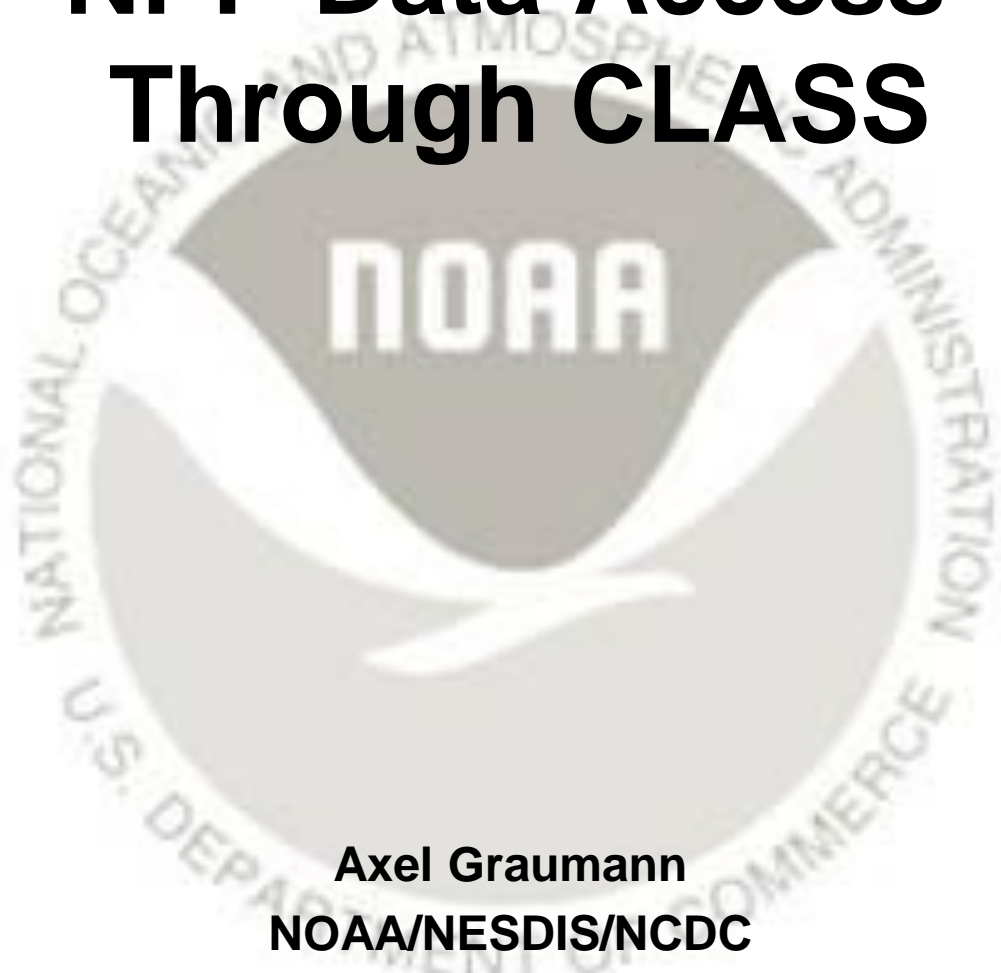




# **NPP Data Access Through CLASS**



**Axel Graumann  
NOAA/NESDIS/NCDC  
Climate Services and Monitoring Division**



# NPP Data for Archive

- **Operational Data**
  - **Visible/Infrared Imager Radiometer Suite (VIIRS)**
    - RDR, SDR, EDR, ARP and IP
  - **Cross-track Infrared Sounder (CrIS)**
    - RDR and SDR
  - **Advanced Technology Microwave Sounder (ATMS)**
    - RDR and TDR
  - **Cross-track Infrared and Microwave Sounder Suite (CriMSS)**
    - EDR
  - **Ozone Mapping Profiler Suite (OMPS)**
    - RDR, SDR, EDR and IP
  - **Clouds and the Earth's Radiant Energy System (CERES)**
    - RDR



# NPP Data for Archive (2)



- **Auxiliary Data:**
  - **Mission Schedules**
  - **Mission Notices**
  - **Revolution Number File**
  - **CERES Auxiliary Files**
- **Ancillary Data:**
  - **Two-line Elements (TLEs)**
  - **Official Static and Dynamic Ancillary Data**
- **Release Packages:**
  - **Software**
  - **Documentation**
  - **Supporting Data (Ancillary Data)**
  - **Test Data**
- **Calibration/Validation Data (still being worked)**

# CLASS – Data Ingest

- **Ingest data from the NPP Ground Segment**
  - **Operational products sent to CLASS after 6 hour delay**
    - > **Guarantees complete/best products are delivered**
  - **Data available from CLASS within 24 hours of generation**
  - **CLASS validates files that are ingested**
  - **Aggregated products are ingested by CLASS**
    - > **Searches are based on the aggregated products but users can order deaggregated products**

| <b>NPP Sensor</b> | <b>Granules Per Orbit</b> | <b>Granule Len (sec)</b> | <b># Granules Agg</b> | <b>Storage Agg Len (sec)</b> |
|-------------------|---------------------------|--------------------------|-----------------------|------------------------------|
| CrIS              | 191                       | 32                       | 10                    | 320                          |
| ATMS              | 191                       | 32                       | 10                    | 320                          |
| VIIRS             | 71                        | 85.7                     | 4                     | 342.8                        |
| OMPS              | 160                       | 38                       | 160                   | 6080                         |
| CERES             | 10                        | 660                      | 1                     | 660                          |

# CLASS – Search Types

- **Search types (web interface)**
  - **Search (after selecting data family)**
    - > **Search parameters for operational data:**
      - Spatial, temporal, datatype, satellite id, and node
    - > **Searches for ancillary/auxiliary data based on date range**
    - > **Offers Detailed Display window for browse images and granule/file level metadata**
  - **Quick Search and Order (most power users will likely go this route)**
    - > **Search by region, date/time, datatype, satellite id and node**
    - > **Skips inventory review and jumps to shopping cart page.**
    - > **Allows access to larger number of files per order (over 3000 files in most cases)**
      - **Users can request “block order” status for even greater volumes of data**
  - **More specific searches (under testing mode)**
    - > **File name pattern searches**
    - > **Orbit number – specific or range**

# CLASS – Order Types

- **Small Orders**
  - Click on ‘Search’ button for inventory listing
    - > Select files to order by checking box on each row
    - > Generally, up to 100 selected files can be ordered
- **Large Orders**
  - Click on ‘Quick Search and Order’ button to skip inventory and browse
    - > No file selection (i.e. skip Search Results to preview listing or browse images)
    - > Can order over 3000 files (configurable by data family)
    - > Max file limits based on expected level of delivery efficiency
- **Block Orders**
  - Click on ‘Quick Search and Order’ button to skip inventory and browse
    - > Generally 2 to 3 times more data per order
    - > For users needing higher volumes of data (TB’s of data)
    - > Need good bandwidth
    - > Please contact CLASS Help Desk and ask for ‘Block Order’ access
    - > Order split into batches (sub-orders) and processed one at a time
- **Standing Orders (Subscriptions)**
  - Provides automatic distribution of near real-time products
  - Products can be ftp ‘pushed’ or ‘pulled’
  - Contact the CLASS Help Desk for subscription access

# CLASS – Data Delivery

- **Delivery Options**
  - **File Transfer Protocol (FTP)**
    - > Ad hoc orders from CLASS usually available on FTP server within 24-48 hours
    - > Asynchronous orders – most of the data archived on tape
    - > CLASS plans to keep most recent 3-6 months of NPP data on disk for faster delivery
    - > Users actively get the data from the ftp server
    - > Files remain on-line for 120 hours (5 days)
    - > Request for extension via CLASS Help Desk
  - **Physical media delivery**
    - > Options are magnetic tape (only LTO tapes and External Disk Drives (1 Tb or greater capacity))
    - > Service costs apply for handling, shipping and media
    - > Place request via CLASS Help Desk

# CLASS Web Tutorial - Step by step



1. **CLASS Home Page**
2. **User Account**
3. **User Preferences**
4. **CLASS Home Page with Data Family listing**
5. **Search Page (5a,5b and 5c)**
6. **Search Results Page (regular search performed)**
7. **Detailed Display Page**
8. **Granule Metadata Display**
9. **Search Results Page - selected products for order**
10. **Shopping Cart Page – submitting small order (10a and 10b)**
11. **Alternate Search – large order using ‘Quick Search and Display’ (11a and 11b)**
12. **Shopping Cart Page – submitting large order**
13. **Order Confirmation Page**
14. **Order Status Page**
15. **Order Details Page**
16. **Email Notification example**





# 1. CLASS Web Interface

www.class.noaa.gov



NOAA HOME WEATHER OCEANS FISHERIES CHARTING SATELLITES CLIMATE RESEARCH COASTS CAREERS

NOAA



# NOAA

COMPREHENSIVE LARGE ARRAY-DATA  
STEWARDSHIP SYSTEM (CLASS)  
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION



>> CLASS Home >> Login >> Register >> Help

CLASS Help All NOAA

>> SEARCH

- Around CLASS**
- >> Home
- >> Search for Data
- >> Upload Search
- >> Shopping Cart
- >> Order Status
- >> Help
- User Account**
- >> User Profile
- >> User Preferences
- Advanced Options**
- >> Download Keys
- Release Info**
- >> Version 5.2  
September 05, 2009
- Other Links**
- >> CLASS Home
- >> NODC
- >> NCDC
- >> NGDC
- >> NESDIS
- >> NOAA
- >> DOC

Please select a product to search  >> GO



Hurricane Katrina  
GOES 08/28/05

## NEWS

### Attention:

Orders placed after 20 June may be delayed due to maintenance.

### Attention Jason-2 Users:

Due to a software bug in the data processing system at ESPC, 117 of the level-2 J2-XGDR files were corrupted prior to reception by CLASS. See the [CLASS Help News](#) for details.

### Attention NOAA POES Users:

On 2 June 2009 at 0000 UTC, NOAA-19 became the primary afternoon satellite to support NOAA's weather satellite mission. All Local Area Coverage (1 km data) scheduled passes will switch from NOAA-18 to NOAA-19. [Please click here](#) for the full notice.

### NOAA To Hold 6th GOES Users' Conference:

The 6th GOES Users' Conference, Bringing Environmental Benefits to a Society of Users, organized by the National Oceanic and Atmospheric Administration (NOAA) will be held on 3-5 November 2009 in Madison, Wisconsin. [Click here](#) for more details.

## SEARCH FOR DATA

- Environmental Data from Polar-orbiting Satellites
- Environmental Data from Geostationary Satellites
- Defense Meteorological Satellite Program (DMSP)
- Sea Surface Temperature data (SST)
- RADARSAT
- Altimetry / Sea Surface Height Data (JASOII-2)
- Other - Miscellaneous products in CLASS

## SEARCH COLLECTION METADATA

>> GO

## ABOUT

The Comprehensive Large Array-data Stewardship System (CLASS) is an electronic library of NOAA environmental data. This web site provides capabilities for finding and obtaining those data.

Home Search for Data Upload Search Shopping Cart Order Status Help User Profile User Preferences  
Download Keys CLASS Help Desk Suggestions Privacy Policy Disclaimer



# 2. Register to create user account



NOAA HOME WEATHER OCEANS FISHERIES CHARTING SATELLITES CLIMATE RESEARCH COASTS CAREERS NOAA

**NOAA** COMPREHENSIVE LARGE ARRAY-DATA STEWARDSHIP SYSTEM (CLASS)  
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION

» CLASS Home » Logout » Help CLASS Help All NOAA  » SEARCH

Please select a product to search  » GO

### User Profile for agrumann2

\*Last Name:  \*First Name:   
 \*Password:  \*Verify Password:   
 \*Email Address:   
 Address 1:   
 Address 2:   
 Address 3:   
 City:  State:   
 Zip Code:  Country:   
 Phone:  Fax:

\* denotes required fields

### Subscriptions

New Subscription Email:

#### Existing Subscription Email List

When data matching your subscription criteria is met, a message will be sent to each email address listed below.

Remove

User account can be created with a minimum of information.



# 3. Set up your User Preferences



# NOAA

## COMPREHENSIVE LARGE ARRAY-DATA STEWARDSHIP SYSTEM (CLASS)

NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION

[» CLASS Home](#) [» Logout](#) [» Help](#)

[» CLASS Help](#) [» All NOAA](#)

Please select a product to search

- Around CLASS**
- [» Home](#)
- [» Search for Data](#)
- [» Upload Search](#)
- [» Shopping Cart](#)
- [» Order Status](#)
- [» Help](#)
- User Account**
- [» User Profile](#)
- [» User Preferences](#)
- Advanced Options**
- [» Download Keys](#)
- Release Info**
- [» Version 5.2  
September 05, 2009](#)
- Other Links**
- [» CLASS Home](#)
- [» NODC](#)
- [» NCDC](#)
- [» NGDC](#)
- [» NESDIS](#)
- [» NOAA](#)
- [» DOC](#)

## User Preferences

### Online Search Preferences

My default search preference is by

dataset name  search criteria

### Notification Preferences

I want to be notified by email when my order is received

No  Yes

I want to be notified by email when each line item is complete

No  Yes

I want to receive by email a summary of my order when processing is complete

No  Yes

### Delivery Preferences

Include digital signature when available

No  Yes

Prepend TBM/ARS headers to my data sets

No  Yes

Include delivery manifest

No  Yes

NPP companion files to deliver with data

Auxiliary Data   
Geolocation  
ODAD

De-aggregate NPP Data Products

No  Yes

NPP companion files to deliver with software

Test Data

NPP companion files to deliver with test data

Software

JASON XGDR files to deliver

Dataset  Metadata

### AVHRR Data Extraction Preferences



# 4. Select Data Family for Search



- Around CLASS**
- >> Home
- >> Search for Data
- >> Upload Search
- >> Shopping Cart
- >> Order Status
- >> Help
- User Account**
- >> User Profile
- >> User Preferences
- Advanced Options**
- >> Download Keys
- Release Info**
- >> Version 5.2  
September 05, 2009
- Other Links**
- >> CLASS Home
- >> NODC
- >> NCDC
- >> NGDC
- >> NESDIS
- >> NOAA
- >> DOC



### NEWS

**Attention:**  
Orders placed

**Attention J:**  
Due to a softw

**Attention NOAA POES Users:**  
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- Visible/Infrared Imager/Radiometer Suite (VIIRS)
- MSPPS Orbital Data (MSPPS\_ORB)
- NPP Auxiliary Files (NP\_AUX)
- NPP Documentation (NPDOCL)
- NPP Mission Notices (NP\_MSNNICE)
- NPP Official Dynamic Ancillary Data (NP\_ODAD)
- NPP Official Static Ancillary Data (NP\_OSAD)
- NPP Software Release Pkg (NP\_SW)
- NPP Spacecraft (NP\_SPCRFT)**
- NPP Test Data Release Pkg (NP\_TD)
- OSTM/Jason-2: Ancillary Files (J2-ANC)
- OSTM/Jason-2: Auxiliary Files (partially restricted)(J2-AUX)
- OSTM/Jason-2: Level-2 Geophysical Data Records (J2-XGDR)
- OSTM/Jason-2: NRTAVS QA Reports (J2-QA)
- OSTM/Jason-2: Orbit Information (J2-ORBINFO)
- OSTM/Jason-2: Telemetry (restricted)(J2-TEL)
- Ocean Color SeaWiFS Products (OC)
- Ozone Mapping and Profiler Suite (OMPS)
- Pathfinder (from AVHRR) (AVHRRPF)
- Radiation Budget Data (RBUD)
- Sea Surface Temperature (100 KM Global) (SST100)



- SEARCH FOR DATA**
- mental Data from ng Satellites
- mental Data from ary Satellites
- e Meteorological ogram (DMSP)
- face Temperature
- AT
- y / Sea Surface Height l-2)
- Miscellaneous CLASS

SEARCH COLLECTION METADATA >> GO

**ABOUT** +  
The Comprehensive Large Array-data Stewardship System (CLASS) is an electronic library of NOAA environmental data. This web site provides capabilities for finding and obtaining those data.





# 5a. Search for Data



# NOAA

## COMPREHENSIVE LARGE ARRAY-DATA STEWARDSHIP SYSTEM (CLASS)

NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION



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[» CLASS Help](#) [» All NOAA](#)

[» SEARCH](#)

NPP Visible/Infrared Imager/Radiometer Suite (VIIRS)

[» GO](#)

### Around CLASS

- [» Home](#)
- [» Search for Data](#)
- [» Upload Search](#)
- [» Search Results](#)
- [» Shopping Cart](#)
- [» Order Status](#)
- [» Help](#)

### User Account

- [» User Profile](#)
- [» User Preferences](#)
- [» Advanced Options](#)
- [» Download Keys](#)
- [» Release Info](#)
- [» Version 5.5.2](#)
- [» September 06, 2011](#)

### Other Links

- [» CLASS Home](#)
- [» NODC](#)
- [» NCDC](#)
- [» NGDC](#)
- [» NESDIS](#)
- [» NOAA](#)
- [» DOC](#)

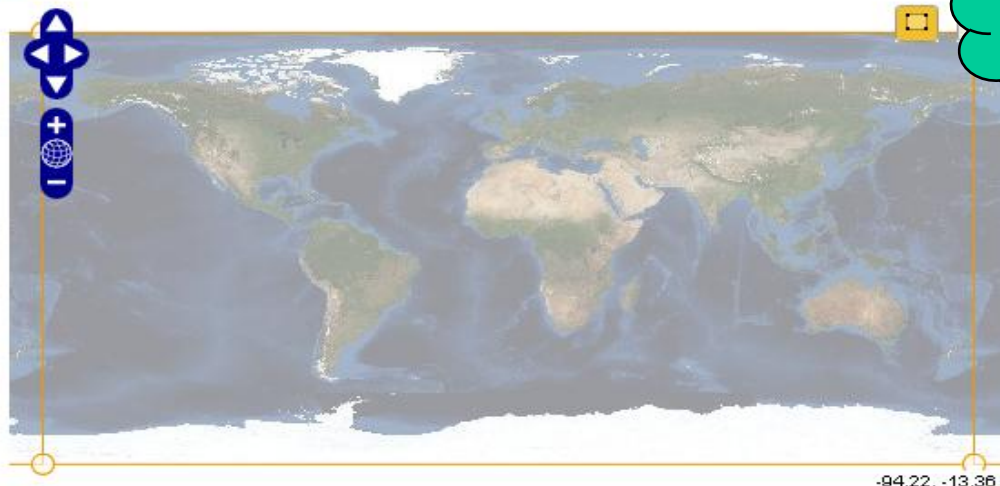
## Search - VIIRS

### Data Description

NPP Visible/Infrared Imager/Radiometer Suite (VIIRS) - The Visible Infrared Imager / Radiometer Suite (VIIRS) will combine the radiometric accuracy of the Advanced Very High Resolution Radiometer (AVHRR) currently flown on the NOAA polar orbiters with the high (0.65 kilometer) spatial resolution of the Operational Linescan System (OLS) flown on DMSP. The VIIRS will provide imagery of clouds under sunlit conditions in about a dozen visible channels (or frequency bands), as well as provide coverage in a number of infrared channels for night and day cloud imaging applications.

### Details - Metadata, Documentation

### Spatial



Use map or enter coordinates for spatial searching on a region

|          |     |
|----------|-----|
| 90       |     |
| -180     | 180 |
| -90      |     |
| Max Area |     |

# 5b. Search for Data

## Temporal

**Start Date**  
(format: YYYY-MM-DD)   **Start Time (UTC)**  
(format: HH:MM:SS)

**End Date**  
(format: YYYY-MM-DD)   **End Time (UTC)**  
(format: HH:MM:SS)

**Specify the range of the times for:**  Each Day Or  The Entire Range Of Days

### Advanced Search

#### Datatype

- VIIRS 1st M Band Imagery EDR
- VIIRS 2nd M Band Imagery EDR
- VIIRS 3rd M Band Imagery EDR
- VIIRS 4th M Band Imagery EDR
- VIIRS 5th M Band Imagery EDR
- VIIRS 6th M Band Imagery EDR
- VIIRS Active Fires ARP
- VIIRS Aerosol (aggregated) EDR Ellipsoid Geolocation
- VIIRS Aerosol Optical Thickness (AOT) EDR
- VIIRS Cloud Aggregated EDR Ellipsoid Geolocation
- VIIRS Cloud Base Height EDR
- VIIRS Cloud Cover Layers EDR
- VIIRS Cloud Effective Particle Size EDR
- VIIRS Cloud Mask Intermediate Product
- VIIRS Cloud Optical Thickness EDR
- VIIRS Cloud Top Height EDR
- VIIRS Cloud Top Pressure EDR
- VIIRS Cloud Top Temperature EDR
- VIIRS Day Night Band SDR
- VIIRS Day Night Band SDR Ellipsoid Geolocation
- VIIRS Diagnostic RDR

#### Node

- Ascending
- Descending
- Either

#### Satellite

NPP  

Below Spatial are the Temporal inputs including start and end dates and start and end times. You can search on specific time range daily. Maximum date range is 366. Then check datatype(s) and select Node

# Step 5c: Search for Data

- VIIRS Moderate Resolution Band 08 SDR
- VIIRS Moderate Resolution Band 09 SDR
- VIIRS Moderate Resolution Band 10 SDR
- VIIRS Moderate Resolution Band 11 SDR
- VIIRS Moderate Resolution Band 12 SDR
- VIIRS Moderate Resolution Band 13 SDR
- VIIRS Moderate Resolution Band 14 SDR
- VIIRS Moderate Resolution Band 15 SDR
- VIIRS Moderate Resolution Band 16 SDR
- VIIRS Near Constant Contrast (NCC) EDR Ground Track
- Mercator (GTM) Geolocation
- VIIRS Near Constant Contrast Imagery EDR
- VIIRS Net Heat Flux EDR
- VIIRS Net Heat Flux EDR Geolocation
- VIIRS Ocean Color/Chlorophyll EDR
- VIIRS Quarterly Surface Type IP
- VIIRS Science RDR
- VIIRS Sea Ice Characterization EDR
- VIIRS Sea Ice Characterization EDR Geolocation
- VIIRS Sea Surface Temperature EDR
- VIIRS Snow Cover/Depth Binary Map EDR
- VIIRS Snow Cover/Depth Snow Fraction EDR
- VIIRS Surface Albedo EDR
- VIIRS Surface Type EDR
- VIIRS Suspended Matter EDR
- VIIRS Telemetry Diagnostic RDR
- VIIRS Telemetry RDR
- VIIRS Vegetation Index EDR





# 6. Search Results Page



## NOAA

COMPREHENSIVE LARGE ARRAY-DATA STEWARDSHIP SYSTEM (CLASS)  
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION



» CLASS Home » Logout » Help

» CLASS Help » All NOAA  » SEARCH

- Around CLASS
- » Home
- » Subscriptions
- » Search for Data
- » Upload Search
- » Search Results
- » Shopping Cart
- » Order Status
- » Help
- User Account
- » User Profile
- » User Preferences
- Advanced Options
- » Download Keys
- Release Info
- » Version 5.5.2  
September 06, 2011
- Other Links
- » CLASS Home
- » NODC
- » NCDC
- » NGDC
- » NESDIS
- » NOAA
- » DOC

NPP Visible/Infrared Imager/Radiometer Suite (VIIRS)  » GO

### Search Results - VIIRS (click here for a printable listing)

Recently Searched Data Sets:  » GO

Currently you have 541 hits out of 0 entries.  
There are 6 (VIIRS) items in your shopping cart. The shopping cart limit is 100.

Shopping Cart:

Page 1

Jump To

| View Details                     | Shopping Cart            | Inventory ID | Satellite | Datatype  | Start Date/Time         | End Date/Time           | Dataset Name   | Beginning Orbit Number |
|----------------------------------|--------------------------|--------------|-----------|---|-------------------------|-------------------------|--|------------------------|
| <input type="button" value="1"/> | <input type="checkbox"/> | 2846073      | NPP       | Sea Surface Temperature Environmental Data Records (VIIRSSSEDR) | 2011-07-20 13:33:03.506 | 2011-07-20 13:38:43.901 | VSSTO_npp_d20110720_t1333035_e1338439_b2_5277_c20110720193843_910395_noaa_ops.h5 | 25277                  |
| <input type="button" value="2"/> | <input type="checkbox"/> | 2849123      | NPP       | Sea Surface Temperature Environmental Data Records (VIIRSSSEDR) | 2011-07-20 13:38:45.130 | 2011-07-20 13:44:25.525 | VSSTO_npp_d20110720_t1338451_e1344255_b2_5277_c20110720194426_000962_noaa_ops.h5 | 25277                  |
| <input type="button" value="3"/> | <input type="checkbox"/> | 2852633      | NPP       | Sea Surface Temperature Environmental Data Records (VIIRSSSEDR) | 2011-07-20 13:44:26.754 | 2011-07-20 13:50:05.370 | VSSTO_npp_d20110720_t1344267_e1350053_b2_5277_c20110720195007_091547_noaa_ops.h5 | 25277                  |
| <input type="button" value="4"/> | <input type="checkbox"/> | 2859783      | NPP       | Sea Surface Temperature Environmental Data Records (VIIRSSSEDR) | 2011-07-20 13:50:06.599 | 2011-07-20 13:55:46.995 | VSSTO_npp_d20110720_t1350065_e1355469_b2_5277_c20110720195548_171113_noaa_ops.h5 | 25277                  |
| <input type="button" value="5"/> | <input type="checkbox"/> | 2860543      | NPP       | Sea Surface Temperature Environmental Data Records (VIIRSSSEDR) | 2011-07-20 13:55:48.224 | 2011-07-20 14:01:28.619 | VSSTO_npp_d20110720_t1355482_e1401286_b2_5277_c20110720200130_241968_noaa_ops.h5 | 25277                  |
|                                  |                          |              |           | Sea Surface   |                         |                         |  |                        |





# 7. Detailed Display Page



NOAA HOME WEATHER OCEANS FISHERIES CHARTING SATELLITES CLIMATE RESEARCH COASTS CAREERS



## NOAA COMPREHENSIVE LARGE ARRAY-DATA STEWARDSHIP SYSTEM (CLASS)

NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION



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[» CLASS Help](#) [» All NOAA](#)  [» SEARCH](#)

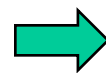
Visible/Infrared Imager/Radiometer Suite (VIIRS)

In Shopping Cart

### Data Set Detailed Display:

|                                |   |
|--------------------------------|---|
| Inventory ID                   | 123189730   |
| Satellite                      | NPP   |
| Instrument Short Name          | VIIRS   |
| Datatype                       | Sea Surface Temperature Environmental Data Records                              |
| Start Date/Time                | 2003-01-25 08:33:37.150   |
| End Date/Time                  | 2003-01-25 08:35:01.659   |
| Dataset Name                   | VSSTO_npp_d20030125_t0833371_e0835016_b00015_c2010060901_3653920793_noaa_ops.h5 |
| Dataset Size                   | 19708272  |
| Ingest Date/Time               | 2010-06-24 17:21:22   |
| Ingest Status                  | COMPLETE_A  |
| Operational Mode               | 29  |
| Beginning Orbit Number         | 15  |
| Ascending/Descending Indicator | Ascending   |
| Product Type                   | VSSTO   |
| Data Type Family               | VIIRS   |
| Collection Short Name          |   |
| Dataset Source                 | nesdi   |
| Ancillary Type Tasked          | Official  |

### + Aggregation Cross References and Granule Details



- Around CLASS**
- [» Home](#)
- [» Search for Data](#)
- [» Upload Search](#)
- [» Search Results](#)
- [» Shopping Cart](#)
- [» Order Status](#)
- [» Help](#)
- User Account**
- [» User Profile](#)
- [» User Preferences](#)
- Advanced Options**
- [» Download Keys](#)
- Release Info**
- [» Version 4.0.4](#)  
June 8, 2006
- Other Links**
- [» CLASS Home](#)
- [» NODC](#)
- [» NCDC](#)
- [» NGDC](#)
- [» NESDIS](#)
- [» NOAA](#)
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[Download Keys](#) [CLASS Help Desk](#) [Suggestions](#) [NESDIS Privacy Policy](#) [Disclaimer](#)

# 8. Granule Metadata Display

>> DOC

Aggregation Cross References and Granule Details

| Aggregation Cross Referencing           |  |
|---|--|
| <b>Geolocation</b>                      | There is no geolocation for this record.   |
| <b>Granule List:</b><br>NPP001212068152 | <b>Granule Details:</b>  |
| <b>Granule ID</b>                       | NPP001212068152  |
| <b>Band ID</b>                          |  |
| <b>Creation Date/Time</b>               | 2010-06-09 01:35:55.932  |
| <b>Processing Mode</b>                  |  |
| <b>Spacecraft Maneuver</b>              | Normal Operation   |
| <b>LEOA Flag</b>                        | Not LEOA State   |
| <b>Day Night Flag</b>                   | Day  |
| <b>Cloud Cover</b>                      |  |
| <b>Granule Status</b>                   | N/A  |
| <b>Percent Missing Data</b>             | 0.0  |
| <b>Percent Erroneous Data</b>           | 0.0  |
| <b>Percent Not-Applicable Data</b>      | 74.5394  |
| <b>Graceful Degradation</b>             | Y  |
| <b>Quality Summary Names</b>            | Bulk Sea Surface Temperature<br>EDR Summary Quality, Bulk Summary Range Check, Degradation Summary - Bulk S<br>ea Surface Temperature, Degradation Summary - Skin S<br>ea Surface Temperature, Exclusion Summary - Bulk Sea<br>Surface Temperature, Exclusion Summary - Skin Sea<br>Surface Temperature, Skin Sea Surface Temperature<br>EDR Summary Quality, Skin Summary Range Check |
| <b>Quality Summary Values</b>           | 1, 0, 13, 13, 11, 11, 1, 0   |
| <b>North Bounding Coordinate</b>        | -27.2464   |
| <b>South Bounding Coordinate</b>        | -36.9716   |
| <b>East Bounding Coordinate</b>         | 96.7933  |
| <b>West Bounding Coordinate</b>         | 63.5703  |
| <b>G-Ring Latitude</b>                  | -27.2464, -29.7108, -32.0398, -35.5643, -36.9716, -34.5033, -31.9106, -30.565  |
| <b>G-Ring Longitude</b>                 | 94.561, 95.6563, 96.7933, 80.885, 64.0167, 63.8058, 63.5703, 79.4466   |
| <b>Reference ID</b>                     | 4c0eaffb-e3bb5-0a180212-5634<br>c682   |
| <b>Granule Version</b>                  | A2   |
| <b>Software Version</b>                 | 11.5.02.00   |
| <b>Auxiliary Data</b>                   | There is no auxiliary data for this granule.   |
| <b>Official Dynamic Ancillary Data</b>  | There is no Official Dynamic Ancillary Data for this granule.  |
| <b>Official Static Ancillary Data</b>   | There is no Official Static Ancillary Data for this granule.   |
| <b>Software</b>                         | There is no software for this granule.   |
| <b>Documentation</b>                    | There is no documentation for this granule.  |



# 9. Select Products for Order



NOAA HOME WEATHER OCEANS FISHERIES CHARTING SATELLITES CLIMATE RESEARCH COASTS CAREERS

NOAA COMPREHENSIVE LARGE ARRAY-DATA STEWARDSHIP SYSTEM (CLASS) NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION

» CLASS Home » Logout » Help

CLASS Help All NOAA  » SEARCH

» NPP Visible/Infrared Imager/Radiometer Suite (VIIRS) » GO

**Search Results - VIIRS**  
(click here for a printable listing)

Recently Searched Data Sets: VIIRS » GO

Currently you have 541 hits out of 0 entries.  
There are 6 (VIIRS) items in your shopping cart. The shopping cart limit is 100.

Shopping Cart:     Page 1 Jump To

| View Details | Shopping Cart                       | Inventory ID | Satellite | Datatype   | Start Date/Time         | End Date/Time           | Dataset Name   | Beginning Orbit Number |
|--------------|-------------------------------------|--------------|-----------|--|-------------------------|-------------------------|--|------------------------|
| 1            | <input checked="" type="checkbox"/> | 2846073      | NPP       | Sea Surface Temperature Environmental Data Records (VIIRSSSEDR ) | 2011-07-20 13:33:03.506 | 2011-07-20 13:38:43.901 | VSSTO_npp_d20110720_t1333035_e1338439_b2 5277_c20110720193843 910395_noaa_ops.h5 | 25277                  |
| 2            | <input checked="" type="checkbox"/> | 2849123      | NPP       | Sea Surface Temperature Environmental Data Records (VIIRSSSEDR ) | 2011-07-20 13:38:45.130 | 2011-07-20 13:44:25.525 | VSSTO_npp_d20110720_t1338451_e1344255_b2 5277_c20110720194426 000962_noaa_ops.h5 | 25277                  |
| 3            | <input checked="" type="checkbox"/> | 2852633      | NPP       | Sea Surface Temperature Environmental Data Records (VIIRSSSEDR ) | 2011-07-20 13:44:26.754 | 2011-07-20 13:50:05.370 | VSSTO_npp_d20110720_t1344267_e1350053_b2 5277_c20110720195007 091547_noaa_ops.h5 | 25277                  |

After selections are made click on Goto Cart button



# 10a. Submit Order

NOAA HOME WEATHER OCEANS FISHERIES CHARTING SATELLITES CLIMATE RESEARCH COASTS CAREERS

**NOAA** COMPREHENSIVE LARGE ARRAY-DATA STEWARDSHIP SYSTEM (CLASS)  
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION

» CLASS Home » Logout » Help

CLASS Help  All NOAA  » SEARCH

Please select a product to search  » GO

### Shopping Cart

Total size of selected data sets: 206,707,560 Bytes    You will be notified at: Axel.Graumann@noaa.gov

Number of data sets: 3    Order Comment: VIIRS SST Order 1

Cost: Free    Delivery Method: Electronic (FTP - Free)

**Advanced Options**

### VIIRS

| Order                               | Dataset Name   | Include Digital Signature |
|-------------------------------------|--|---------------------------|
| <input checked="" type="checkbox"/> | <b>Click on a dataset name to see the dataset details</b>  | <input type="checkbox"/>  |
| <input checked="" type="checkbox"/> | VIIRSSSEDR<br>VSSTO_npp_d20110720_<br>t1344267_e1350053_b2<br>5277_c20110720195007<br>091547_noaa_ops.h5 | <input type="checkbox"/>  |
| <input checked="" type="checkbox"/> | VIIRSM1SDR<br>SYM01_npp_d20110720_<br>t1350065_e1355469_b2<br>5277_c20110720195548<br>682219_noaa_ops.h5 | <input type="checkbox"/>  |
| <input checked="" type="checkbox"/> | VIIRSSSEDR<br>VSSTO_npp_d20110720_<br>t1350065_e1355469_b2<br>5277_c20110720195548<br>171113_noaa_ops.h5 | <input type="checkbox"/>  |



# 10b. Submit Order (Advanced Options)



# NOAA

## COMPREHENSIVE LARGE ARRAY-DATA STEWARDSHIP SYSTEM (CLASS)

NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION



- Around CLASS**
- >> Home
- >> Subscriptions
- >> Search for Data
- >> Upload Search
- >> Search Results
- >> Shopping Cart
- >> Order Status
- >> Help
- User Account**
- >> User Profile
- >> User Preferences
- Advanced Options**
- >> Download Keys
- Release Info**
- >> Version 4.0.4  
June 8, 2006
- Other Links**
- >> CLASS Home
- >> NODC
- >> NCDC
- >> NGDC
- >> NESDIS
- >> NOAA
- >> DOC

Please select a product to search  >> GO

### Shopping Cart

Total size of selected data sets: 19,708,272 Bytes    You will be notified at:

Number of data sets: 1    Order Comment:

Cost: Free    Delivery Method:

#### Advanced Options

Include delivery manifest:  No  Yes

Include checksum in delivery manifest:  No  Yes

Auxiliary Data

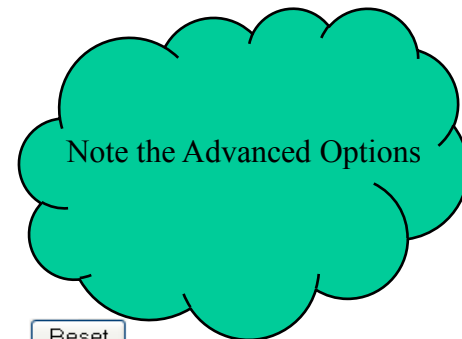
**Geolocation**

ODAD

NPP companion files to deliver with data:

Package Geolocation with NPP Data Products:  No  Yes

De-aggregate NPP Data Products:  No  Yes



PlaceOrder

Commit Changes

Remove All

Reset

### VIIRS

VIIRS Results

VIIRS Search Page

| Order                               | Dataset Name   | Include Digital Signature           |
|-------------------------------------|--|-------------------------------------|
| <input checked="" type="checkbox"/> | Click on a dataset name to see the dataset details   | <input checked="" type="checkbox"/> |
| <input checked="" type="checkbox"/> | VIIRSSSEDR<br>VSSTO_npp_d20030125_t0833371<br>_e0835016_b00015_c2010060901<br>3653920793_noaa_ops.h5 | <input checked="" type="checkbox"/> |



# 11a. Alternate Search



NOAA HOME WEATHER OCEANS FISHERIES CHARTING SATELLITES CLIMATE RESEARCH COASTS CAREERS

NOAA



# NOAA

## COMPREHENSIVE LARGE ARRAY-DATA STEWARDSHIP SYSTEM (CLASS)

NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION



[» CLASS Home](#) [» Logout](#) [» Help](#)

[CLASS Help](#)

[All NOAA](#)

[» SEARCH](#)

### Around CLASS

- [» Home](#)
- [» Subscriptions](#)
- [» Search for Data](#)
- [» Upload Search](#)
- [» Search Results](#)
- [» Shopping Cart](#)
- [» Order Status](#)
- [» Help](#)

### User Account

- [» User Profile](#)
- [» User Preferences](#)
- [» Download Keys](#)

### Advanced Options

- [» Download Keys](#)

### Release Info

- [» Version 5.5.1.2](#)
- [» August 02, 2011](#)

### Other Links

- [» CLASS Home](#)
- [» IODC](#)
- [» ICDC](#)
- [» IGDC](#)
- [» NESDIS](#)
- [» HIOAA](#)
- [» DOC](#)

NPP Visible/Infrared Imager/Radiometer Suite (VIIRS)

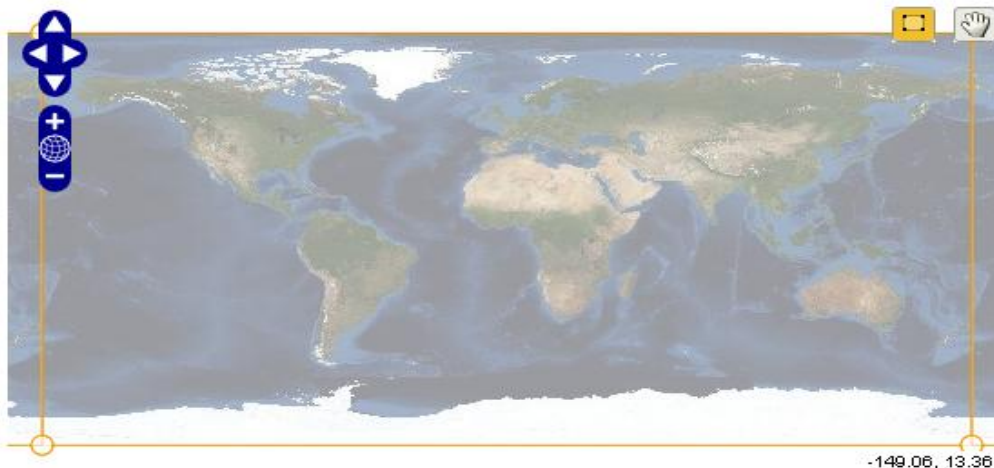
[» GO](#)

## Search - RIP\_NOGRD

### Data Description

NPP Retained Intermediate Products - Non-Gridded (RIP\_NOGRD) - Intermediate Products (IPs) are a data processing by-product that is required for generation of an operational product, such as EDR. The RIPs are temporary products that were not intended for operational users. Because of the scientific value of some of these RIPs they have been identified as valuable for calibration and validation efforts. Non-gridded RIPs are delivered as granules, corresponding to the operational products they are used to produce. Each granule covers a defined time span and an integer number of scans.

### Spatial



|          |     |     |
|----------|-----|-----|
|          | 90  |     |
| -180     |     | 180 |
|          | -90 |     |
| Max Area |     |     |

Note: XY Plane searches are resized to enforce a minimum lat/lon difference of 0.1 degrees.



# 11b. Search Page

## Datatype

- Aerosol Model Information
- Aerosol Optical Thickness
- Atmospheric Vertical Moisture Profile Line-of-Sight Infrared
- Atmospheric Vertical Moisture Profile Line-of-Sight Microwave
- Atmospheric Vertical Temperature Profile Line-of-Sight Infrared
- Atmospheric Vertical Temperature Profile Line-of-Sight

## Microwave

- Bright Pixel
- Calibrated Dual-Gain Band
- Cloud Base Height
- Cloud Cleared Radiances
- Cloud Cover-Type
- Cloud Layer-Type
- Cloud Optical Properties
- Cloud Top Parameters
- Ice & Night Water Cloud Top Temperature
- Ice Concentration
- Ice Quality Flags
- Ice Reflectance/Temperature
- Ice Weights
- Infrared Surface Emissivity
- Microwave Surface Emissivity
- Nadir Total Column Ozone First Guess
- On-board Calibrator
- Parallax Corrected Cloud Optical Properties
- Parallax Corrected Cloud Top Parameters
- Skin Temperature
- Snow Ice Cover
- Surface Reflectance
- Surface Temperature
- VIIRS Un-Aggregated 750m Dual-Gain Band G

## Node

- Ascending
- Descending
- Either

## Satellite

## Instrument Short Name

Click on button below the green arrow to go directly to the Shopping Cart page for large orders not needing granule level previews. Maximum file limits vary.



# 12. Shopping Cart Page for Large Order



NOAA HOME WEATHER OCEANS FISHERIES CHARTING SATELLITES CLIMATE RESEARCH COASTS CAREERS

NOAA



# NOAA

## COMPREHENSIVE LARGE ARRAY-DATA STEWARDSHIP SYSTEM (CLASS)

NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION

» CLASS Home » Logout » Help

» CLASS Help » All NOAA

» SEARCH

Around CLASS

- » Home
- » Subscriptions
- » Search for Data
- » Upload Search
- » Search Results
- » Shopping Cart
- » Order Status
- » Help

User Account

- » User Profile
- » User Preferences

Advanced Options

» Download Keys

Release Info

» Version 5.5.1.2  
August 02, 2011

Other Links

» CLASS Home

» NODC

» NCDC

» NGDC

» NESDIS

» NOAA

» DOC

Please select a product to search

» GO

### Shopping Cart

Total size of selected data sets: 95,462,698,725 Bytes

You will be notified at:

Axel.Graumann@noaa.gov

Number of data sets: 1941

Order Comment:

NPP Surface Temp data

Cost: Free

Delivery Method:

Electronic (FTP - Free)

+ Advanced Options

PlaceOrder

Commit Changes

Remove All

Reset

Quick Search Criteria for RIP\_NOGRD

Estimated 1941 hits. Estimated size 95,462,698,725 bytes.

|                    |            |
|--------------------|------------|
| Datatype           | RIPNGIVSTP |
| Start Date:        | 2011-07-20 |
| Start Time:        | 00:00:00   |
| End Date:          | 2011-07-21 |
| End Time:          | 23:59:59   |
| Northern Latitude: | 90         |
| Southern Latitude: | -90        |
| Eastern Longitude: | 180        |
| Western Longitude: | -180       |

Delivery Preferences to be applied are set **User Preferences**

Max number of data sets will vary by data family. The upper limits will likely increase after launch.

Note summary of order – no listing of files provided





# 13. Order Confirmation



## NOAA

### COMPREHENSIVE LARGE ARRAY-DATA STEWARDSHIP SYSTEM (CLASS)

NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION



[» CLASS Home](#) [» Logout](#) [» Help](#)

CLASS Help  All NOAA

[» SEARCH](#)

Please select a product to search

#### Around CLASS

- [» Home](#)
- [» Search for Data](#)
- [» Upload Search](#)
- [» Shopping Cart](#)
- [» Order Status](#)
- [» Help](#)

#### User Account

- [» User Profile](#)
- [» User Preferences](#)

#### Advanced Options

- [» Download Keys](#)

#### Release Info

- [» Version 5.2](#)
- [September 05, 2009](#)

#### Other Links

- [» CLASS Home](#)
- [» NODC](#)
- [» NCDC](#)
- [» NGDC](#)
- [» NESDIS](#)
- [» NOAA](#)
- [» DOC](#)

### Shopping Cart

#### Confirmation:

Thank you for placing your order with the Comprehensive Large-Array data Stewardship System.

Your confirmation number is: 21058403.

When data becomes available, you will be notified at this address: drew.saunders@noaa.gov.

#### Data Usage Survey

We are collecting information on data usage. This is a voluntary survey. What will be the primary use of the product/service?

- Education
  Scientific research
  Business
  Personal
  Legal
  Other



# 14. Order Status Page

**NOAA** COMPREHENSIVE LARGE ARRAY-DATA STEWARDSHIP SYSTEM (CLASS)  
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION

- Around CLASS**
- » Home
- » Search for Data
- » Upload Search
- » Shopping Cart
- » **Order Status**
- » Help
- User Account**
- » User Profile
- » User Preferences
- Advanced Options**
- » Download Keys
- Release Info**
- » Version 5.2  
September 05, 2009
- Other Links**
- » CLASS Home
- » NODC
- » NCDC
- » NGDC
- » NESDIS
- » NOAA
- » DOC

Please select a product to search  » GO

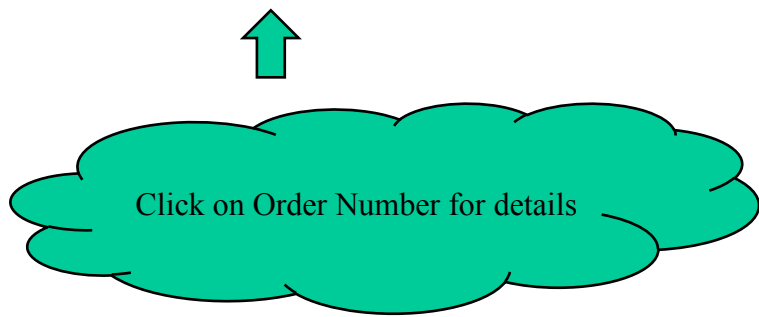
## Order Status

Currently, there are 37777 line items in progress.

Number of hours you would like to use to search for your order information. For example, enter 36, to find all of your orders placed with the last 36 hours. The default is 168 hours (7 days).

Order number to search for. An order number contains numbers only.

| Order Number    | Order Type | Total Items | Total Size | Status | Order Comment |
|-----------------|------------|-------------|------------|--------|---------------|
| <b>21058403</b> | USER       | 8           | 1714197488 | Ready  |               |





# 15: Order Details



# NOAA

## COMPREHENSIVE LARGE ARRAY-DATA STEWARDSHIP SYSTEM (CLASS)

NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION



[» CLASS Home](#) [» Logout](#) [» Help](#)

[» CLASS Help](#) [» All NOAA](#)

[» SEARCH](#)

Please select a product to search

- Around CLASS**
- [» Home](#)
- [» Search for Data](#)
- [» Upload Search](#)
- [» Shopping Cart](#)
- [» Order Status](#)
- [» Help](#)
- User Account**
- [» User Profile](#)
- [» User Preferences](#)
- Advanced Options**
- [» Download Keys](#)
- Release Info**
- [» Version 5.2](#)
- [» September 05, 2009](#)
- Other Links**
- [» CLASS Home](#)
- [» NODC](#)
- [» NCDC](#)
- [» HGDC](#)
- [» NESDIS](#)
- [» NOAA](#)
- [» DOC](#)

## Details for Order Number 21058403

[Go Back to Order Summary List](#)

|                                    |                |                                |                        |
|------------------------------------|----------------|--------------------------------|------------------------|
| <b>Order Number:</b>               | 21058403       | <b>Date and Time:</b>          | 2010-06-17 19:57:14    |
| <b>Order Type:</b>                 | User interface | <b>Email Address:</b>          | drew.saunders@noaa.gov |
| <b>Order Status:</b>               | Order Ready    | <b>Total Electronic Items:</b> | 8                      |
| <b>Total Items:</b>                | 8              | <b>Delivered Items:</b>        | 0                      |
| <b>Available Items:</b>            | 8              | <b>Failed Items:</b>           | 0                      |
| <b>Estimated Size (Bytes):</b>     | 334686552      | <b>Real Size (Bytes):</b>      | 1714197488             |
| <b>Order Summary Notification:</b> | Yes            | <b>Item Notification:</b>      | No                     |
| <b>Include Delivery Manifest:</b>  | No             |                                |                        |
| <b>Order Comment:</b>              |                |                                |                        |

This order contains 16 datasets

Page 1



| Line Item | Dataset Name  | Time of Last Activity | Status     | Download                |
|-----------|---|-----------------------|------------|-------------------------|
| 25350093  | VSSTO_npp_d20030125_t0833371_e0835016_b00015_c2010060901_3653920793_noaa_ops.h5 | 2010-06-17 20:00:13   | Pull Ready | <a href="#">www ftp</a> |
|           | GMTCO_npp_d20030125_t0833371_e0835016_b00015_c2010060901_3653921327_noaa_ops.h5 | 2010-06-17 20:00:13   | Pull Ready | <a href="#">www ftp</a> |
| 25350103  | VSSTO_npp_d20030124_t1459331_e1505130_b00000_c2010060814_2641492673_noaa_ops.h5 | 2010-06-17 20:00:13   | Pull Ready | <a href="#">www ftp</a> |
|           | GMTCO_npp_d20030124_t1459331_e1505130_b00000_c2010060814_2641562286_noaa_ops.h5 | 2010-06-17 20:00:13   | Pull Ready | <a href="#">www ftp</a> |
| 25350113  | VSSTO_npp_d20030125_t0156442_e0158087_b00011_c2010060818_5537367320_noaa_ops.h5 | 2010-06-17 20:00:13   | Pull Ready | <a href="#">www ftp</a> |
|           | GMTCO_npp_d20030125_t0156442_e0158087_b00011_c2010060818_5536092155_noaa_ops.h5 | 2010-06-17 20:00:13   | Pull Ready | <a href="#">www ftp</a> |
| 25350123  | VSSTO_npp_d20030125_t0205169_e0206414_b00011_c2010060819_0041012776_noaa_ops.h5 | 2010-06-17 20:00:13   | Pull Ready | <a href="#">www ftp</a> |
|           | GMTCO_npp_d20030125_t0205169_e0206414_b00011_c2010060819_0041012960_noaa_ops.h5 | 2010-06-17 20:00:13   | Pull Ready | <a href="#">www ftp</a> |
| 25350133  | VSSTO_npp_d20030125_t0450171_e0455571_b00012_c2010060822_1541974384_noaa_ops.h5 | 2010-06-17 20:00:13   | Pull Ready | <a href="#">www ftp</a> |
|           | GMTCO_npp_d20030125_t0450171_e0455571_b00012_c2010060822_1241665113_noaa_ops.h5 | 2010-06-17 20:00:13   | Pull Ready | <a href="#">www ftp</a> |



# 16. Email notification of completed order



NOAA COMPREHENSIVE LARGE ARRAY-DATA STEWARDSHIP SYSTEM

A SERVICE OF:

NOAA NATIONAL DATA CENTERS

CLASS has processed your order number 21058403. The total size of this order is 1714197488 bytes.

Comments for this Order: The following item(s) are available for you to ftp copy. The procedure to copy is as follows:

```
ftp ftpopout.nsof.class.noaa.gov                - Logon to CLASS system
anonymous    - FTP user id
user@internet - FTP password
binary       - Changes transfer mode to binary
cd 21058403  get VSSTO_npp_d20030125_t0833371_e0835016_b00015_c20100609013653920793_noaa_ops.h5 get
GMTCO_npp_d20030125_t0833371_e0835016_b00015_c20100609013653921327_noaa_ops.h5 get
VSSTO_npp_d20030124_t1459331_e1505130_b00000_c20100608142641492673_noaa_ops.h5 get
GMTCO_npp_d20030124_t1459331_e1505130_b00000_c20100608142641562286_noaa_ops.h5 get
VSSTO_npp_d20030125_t0156442_e0158087_b00011_c20100608185537367320_noaa_ops.h5 get
GMTCO_npp_d20030125_t0156442_e0158087_b00011_c20100608185536092155_noaa_ops.h5 get
VSSTO_npp_d20030125_t0205169_e0206414_b00011_c20100608190041012776_noaa_ops.h5 get
GMTCO_npp_d20030125_t0205169_e0206414_b00011_c20100608190041012960_noaa_ops.h5 get
VSSTO_npp_d20030125_t0450171_e0455571_b00012_c20100608221541974384_noaa_ops.h5 get
GMTCO_npp_d20030125_t0450171_e0455571_b00012_c20100608221241665113_noaa_ops.h5 get
VSSTO_npp_d20030125_t0501395_e0507195_b00012_c20100608222141943438_noaa_ops.h5 get
GMTCO_npp_d20030125_t0501395_e0507195_b00012_c20100608221620684553_noaa_ops.h5 get
VSSTO_npp_d20030125_t0213478_e0215123_b00011_c20100608190035614983_noaa_ops.h5 get
GMTCO_npp_d20030125_t0213478_e0215123_b00011_c20100608190035434077_noaa_ops.h5 get
VSSTO_npp_d20030125_t0213478_e0215123_b00011_c20100608190219659042_noaa_ops.h5 get
GMTCO_npp_d20030125_t0213478_e0215123_b00011_c20100608190219660135_noaa_ops.h5 - Copies data to your system bye (or quit) - Ends
FTP session
```

Alternatively, you can also pick up your data via <http://wwwpop.nsof.class.noaa.gov/download/21058403>

NOTE: You must pick up your data within 48 hours of this notice.

Thank you.

<< DO NOT reply to this e-mail as it is automatically generated. >> << Please direct questions to the Help Desk: >>

NOAA/CLASS User Assistance National Climatic Data Center 151 Patton Avenue Asheville, NC 28801-5001 Internet: [class.help@noaa.gov](mailto:class.help@noaa.gov).