



USDA Satellite Imagery Archive

Access and Availability of Resourcesat-1 AWiFS Data for Agriculture

Robert Tetrault

USDA Satellite Imagery Archive

Robert.tetrault@usda.gov

(202) 690-0130



Topics

- How to get ResourceSat-1 data (and other data) that is in the USDA-SIA
 - Archive Explorer
- USDA Satellite Imagery Archive and its role.
- How to order data that is not in the USDA-SIA
 - Special Imagery Purchases

How to get ResourceSat-1 Satellite Data (and other data) that is in the USDA-SIA

- ResourceSat-1 data that is in the USDA-SIA is *free* to participating USDA agencies.
 - Logon to Archive Explorer,
 - Search the collection,
 - Add to shopping cart, and
 - Place an order.
- CDROM arrives via FedEx.
- ResourceSat-1 data is purchased with a Tier 2 license which allows redistribution to Federal/Civil agencies.

USDA-SIA Standing Orders

- **USDA-SIA tasks ASRC-MS with a standing order for field-level resolution satellite imagery.**
 - CCC section 4 funds are used.
- **Imagery is purchased based on contract specifications**
 - Delivered on time (5 days after acquisition date for North America; 10 days for other areas.)
 - Less than 50 percent cloudy.
- **Imagery arrives; is processed; and available for FAS-PECAD directly and participating agencies through Archive Explorer.**

USDA Satellite Imagery Archive Overview of Functions, Budget and Mission

- The USDA Satellite Imagery Archive (USDA-SIA) was formed March 16, 2000 by a MOU signed by the Under Secretaries of:
 - Farm, Foreign Agricultural Service
 - Marketing and Regulatory Programs
 - Natural Resources and Environment
 - Research, Education and Economics
 - Chief Economist
 - Chief Information Officer

Goals of the USDA-SIA

- Cost-sharing program to maximize the cost effectiveness of Department expenditures on satellite imagery.
- Reduce the per-image price paid by spreading acquisition costs over all USDA agencies and facilitate cost sharing.
- Take advantage of contracts already in place.
- Benefit from leveraging the power of a single USDA purchasing body.

Why is it at FAS?

- FAS already purchases global imagery datasets.
 - AVHRR, SPOT-Vegetation, Landsat, IRS-AWiFS
- FAS has contracts in place to purchase satellite imagery and receives unprecedented discounts on satellite imagery through the contract.
- FAS has the global satellite imagery archive.
- FAS has incorporated these duties into its Code of Federal Regulation.

Code of Federal Regulation Title 7, Section 2-43

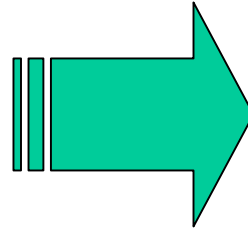
- (45) Support remote sensing activities of the Department and research with satellite imagery including:
- (i) Providing liaison with U.S. space programs;
 - (ii) Providing administrative management of the USDA Remote Sensing Archive and the transfer of satellite imagery to all USDA agencies;
 - (iii) Coordinating all agency satellite imagery data needs; and
 - (iv) Arranging for acquisition, and preparation of imagery for use to the extent of existing capabilities.

USDA-SIA Services

1. **Distribute satellite imagery from the USDA-SIA to participating USDA agencies. Manage the contract.**
 - Search and discovery through web-based Archive Explorer.
2. **Purchase satellite imagery for the USDA-SIA.**
 - Requirements defined by FAS for foreign purchases.
 - Requirements defined by FSA and other domestic agencies for US coverage.
3. **Purchase other satellite imagery upon request**
 - Special imagery purchases are defined by requirement of the agency requesting service and by transfer of funds.

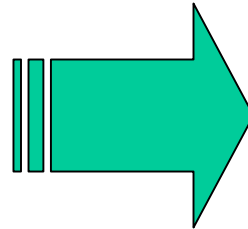
Services Matched to Funding

1. Distribution of imagery and management of USDA-SIA.



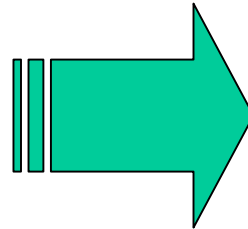
1. Participating agencies pay an annual subscription fee.

2. Satellite imagery purchase.



2. CCC annual investment.

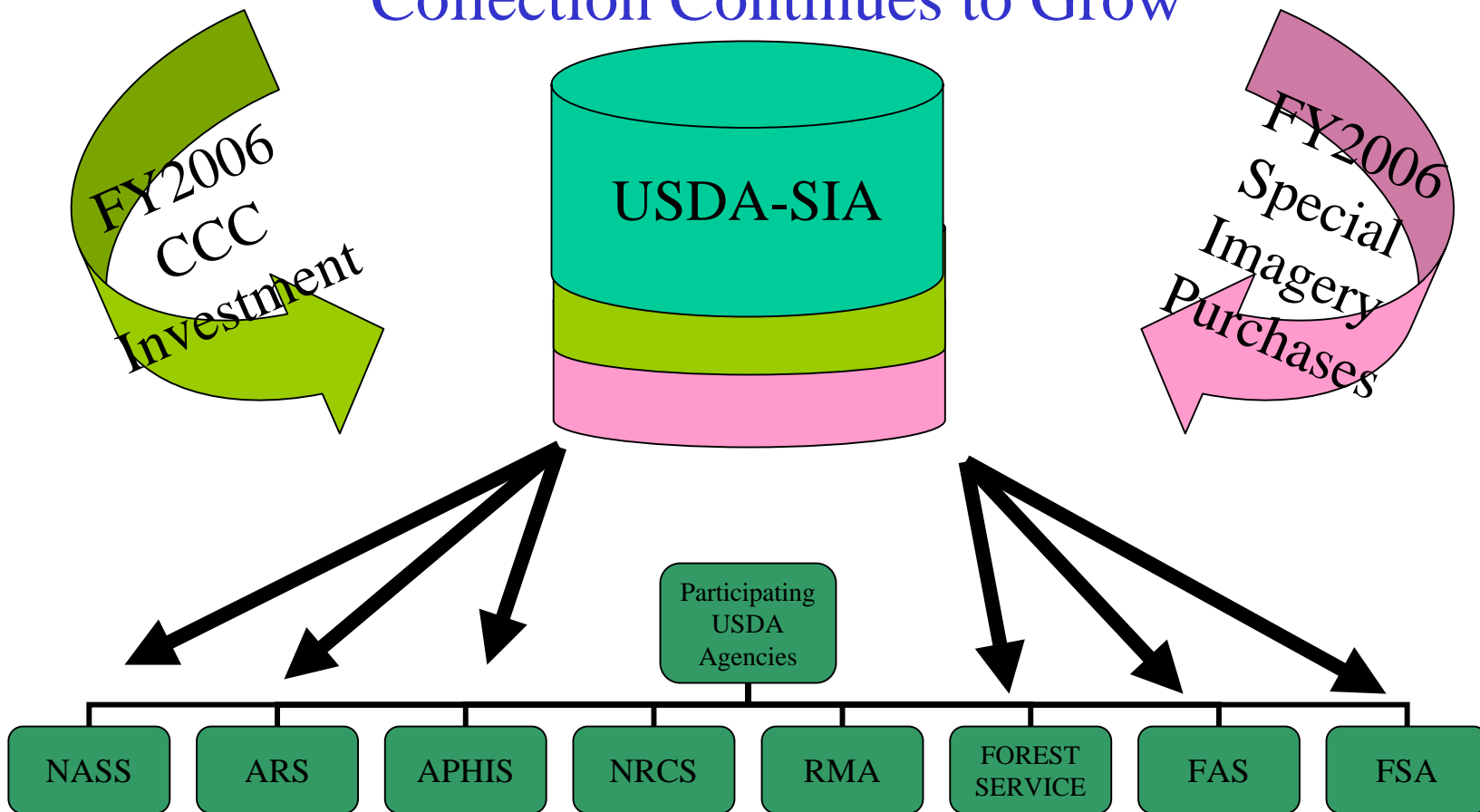
3. Special satellite imagery purchases.



3. Transfer of funds via AD-672.

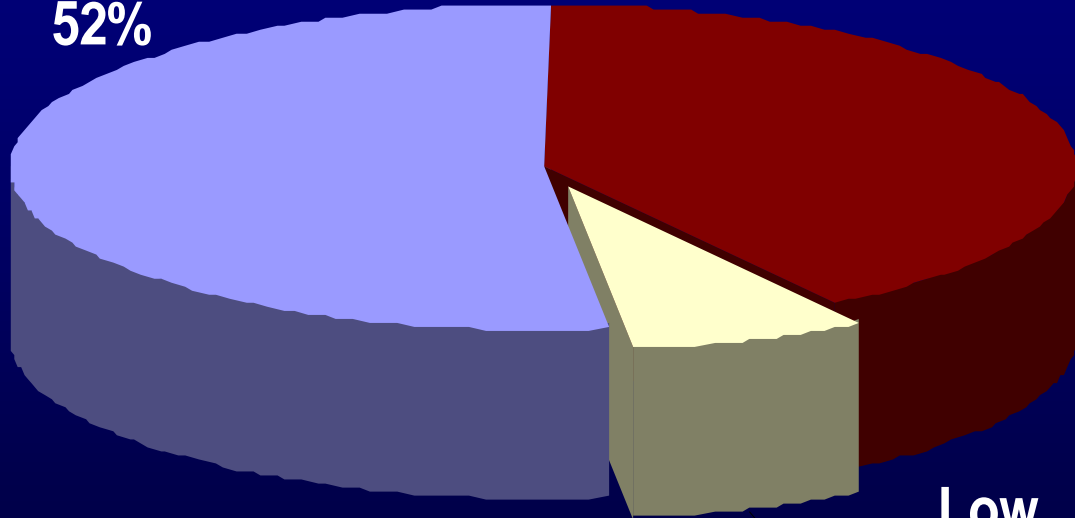
USDA Satellite Imagery Archive

USDA-SIA Benefits from Cooperation and the Collection Continues to Grow



USDA Satellite Imagery Archive Purchases by Resolution

High
Resolution
52%



Medium
Resolution
41%

Low
Resolution
7%

USDA Satellite Imagery Archive

Satellite Imagery Vendors under contract with ASRC MS

- 1. MDA Geospatial Services-Radarsat International**
- 2. Earthsat (MDA Federal)**
- 3. Eurimage**
- 4. Space Imaging (GeoEye)**
- 5. OrbImage (GeoEye)**
- 6. Digital Globe**
- 7. SPOT**

750 products and services

- Multipsectral imagery (2.8 to 60 meters)
- Pan imagery (0.6 to 10 meters)
- Radar
- Services

How to get Satellite Data not in the USDA-SIA

Ordering satellite data through USDA-SIA :

1. Contact Bob Tetrault (COTR) to place an order
 - robert.tetrault@usda.gov
 - Call Bob Tetrault at 202-690-0130
2. Send detailed requirements (Agency to USDA-SIA)
3. Review bids (Agency and USDA-SIA)
4. Transfer funds via AD-672 (Agency to USDA-SIA)
5. Receive imagery