



# Ocean Surface Topography Science Team Meeting (OSTST)

October 20-23, 2015

## Broadview Radar Altimetry Toolbox

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# Summary

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1. Project overview
2. Project status
3. Future phases

# Summary

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## 1. Project overview

## 2. Project status

## 3. Future phases

# 1. Project overview

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- The project started in 2005 from the joint efforts of ESA and CNES with the Basic Radar Altimetry Toolbox (BRAT).
- The **Broadview Radar Altimetry Toolbox** project is the evolution of the existing BRAT, including:
  - New datasets
  - New features
  - New GUI
- The project aims at reaching out to both **novice** and **expert** users of the Altimetry Science Community.
- Gather feedback from the User Community.

# Summary

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1. Project overview

**2. Project status**

3. Future phases

## 2. Project status

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- **Release A** (BRAT 3.3.0) was released in **September 2015**, available for downloading in the website.
- This version includes:

### NEW DATASETS

- Sentinel-3 L1B and L2
- Jason-3
- CryoSat-2 Baseline C
- CryoSat-2 Ocean Products
- SARAL AltiKa
- HY-2A

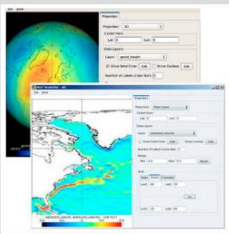
### NEW FEATURES

- CODA Library Upgrade
- NetCDF 4 Upgrade
- Porting to 64 bits
- KMZ/KML Export Update
- Python API Upgrade
- Import to GPOD analysis

## 2. Project status

**NEW WEBSITE**

**www.altimetry.info**



Toolbox



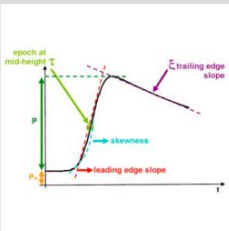
Code Access



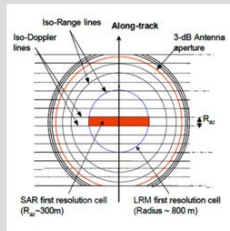
Data Access



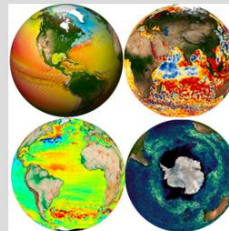
Webs / Documents



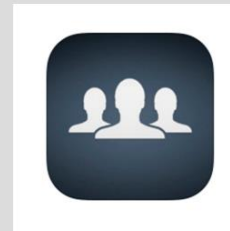
Tutorial



SAR Tutorial



Thematic Use Cases



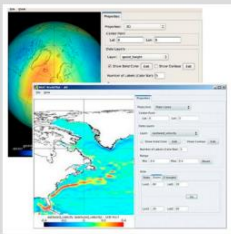
HelpDesk / Forum

- Download the Toolbox and its User Manual
- Download open source code
- Propose modifications and/or new contributions  
<https://github.com/BRAT-DEV/main>
- Access to data

## 2. Project status

**NEW WEBSITE**

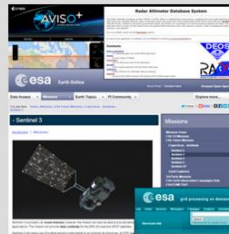
**www.altimetry.info**



Toolbox



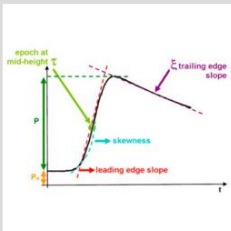
Code Access



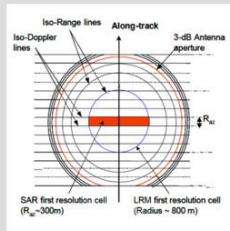
Data Access



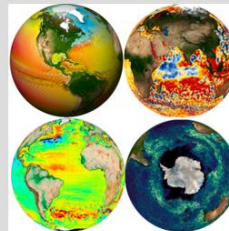
Webs / Documents



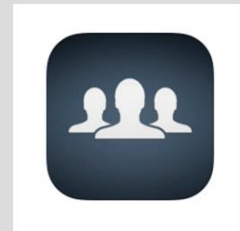
Tutorial



SAR Tutorial



Thematic Use Cases



HelpDesk / Forum

- Access a catalogue of all ESA main reference documents and websites
- Read written tutorials
- Watch video tutorials
- Access use cases
- Contact the consortium through the helpdesk



# Summary

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- 3. Future phases**

### 3. Future phases – Release B

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- **Release B** will be delivered in **March 2016**.
- It will include

#### NEW DATASETS

- Sentinel-3 L1A and L1B-S
- ERS REAPER

#### NEW FEATURES

- Visualisation functions improvement
- New GUI

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#### NEW GUI

Based on **user feedback**, new mock-ups for the **Broadview Radar Altimetry Toolbox** have been created.

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#### NEW FEATURES

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#### NEW GUI

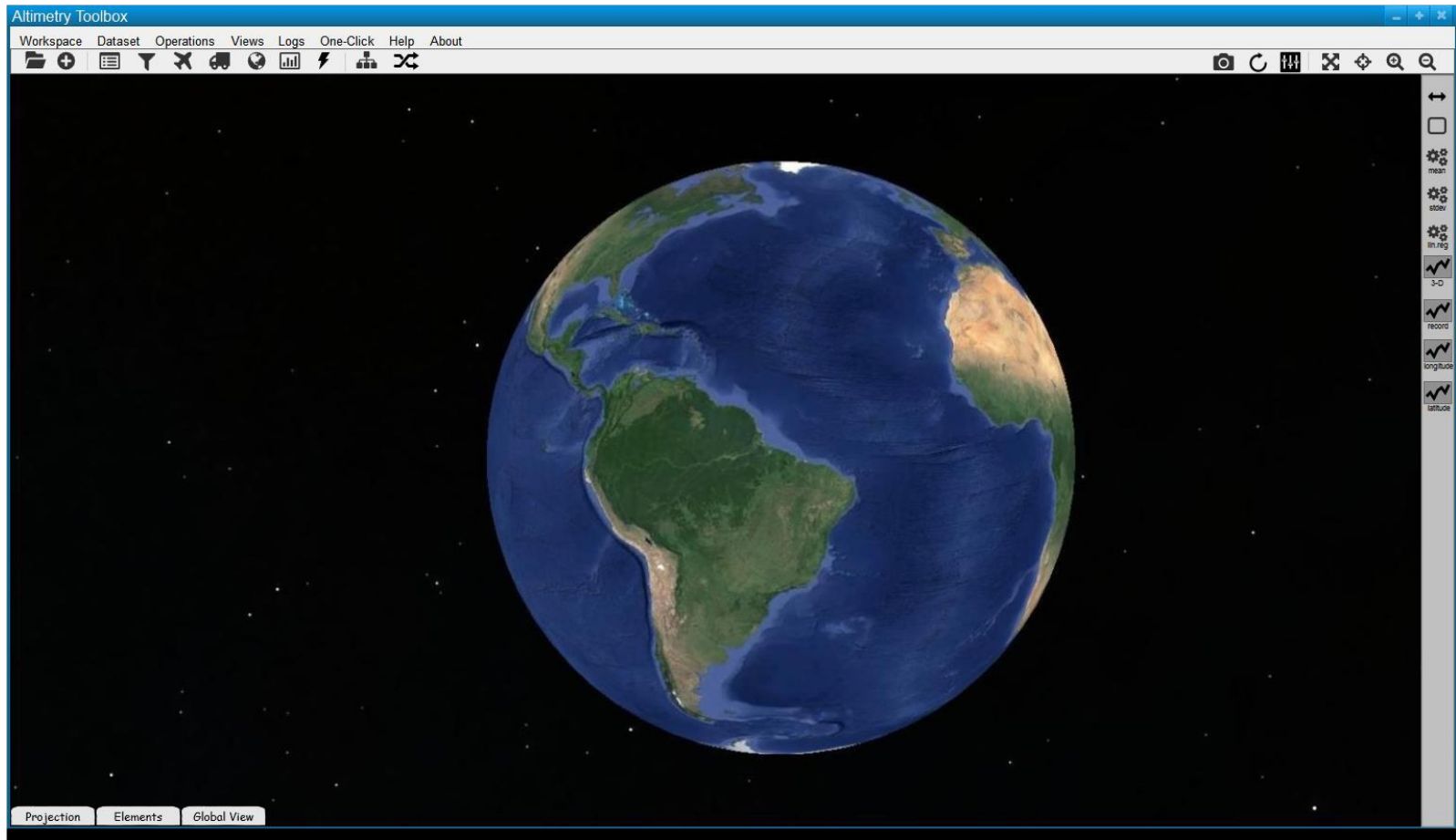
Based on **user feedback**, new mock-ups for the **Broadview Radar Altimetry Toolbox** have been created.

The **final user interface** will be defined during the design of release B with the inputs from the users' community.

### 3. Future phases – Release B

**NEW GUI**

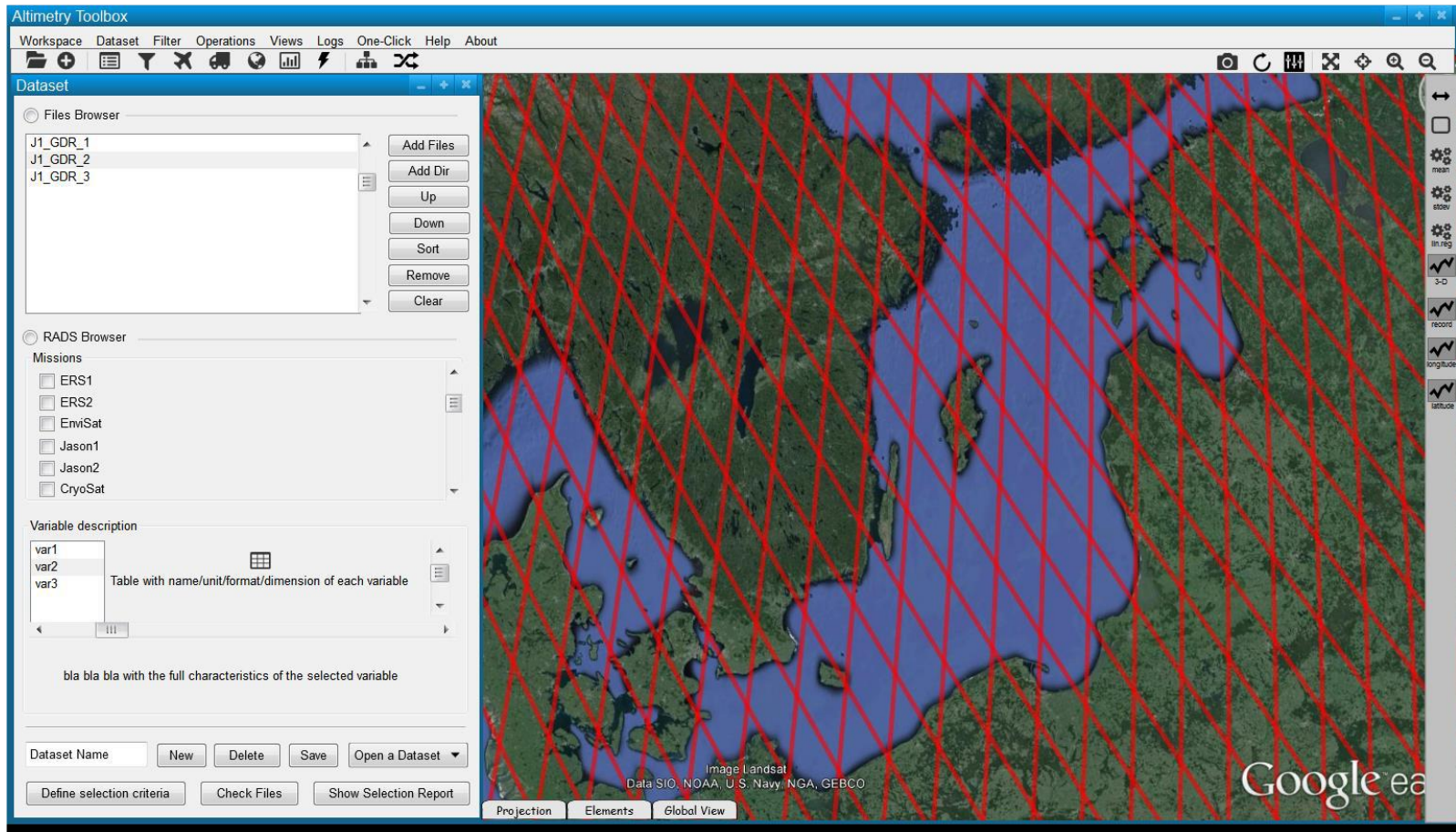
**Main window**



### 3. Future phases – Release B

**NEW GUI**

**Workspace and datasets**

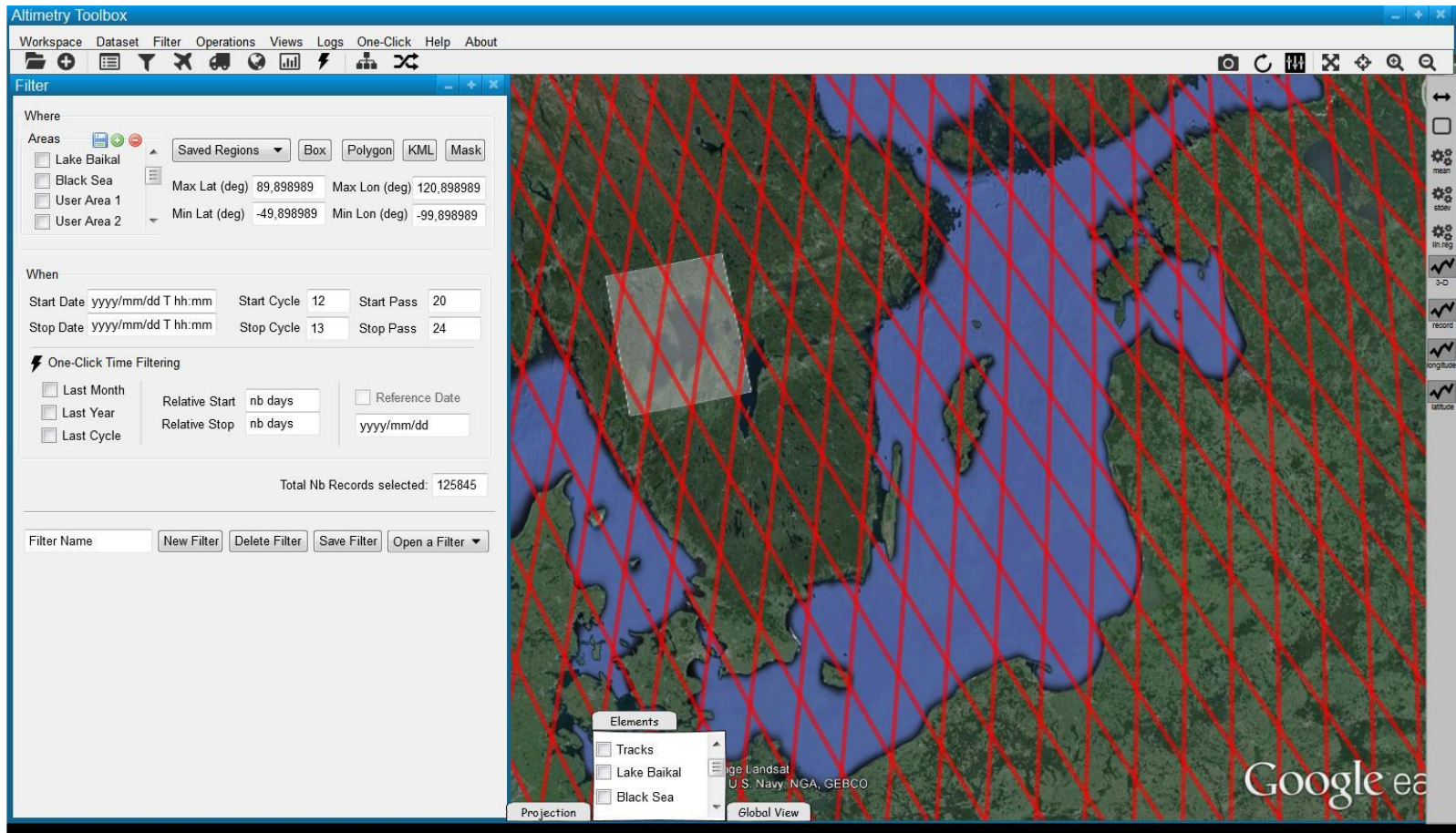




# 3. Future phases – Release B

**NEW GUI**

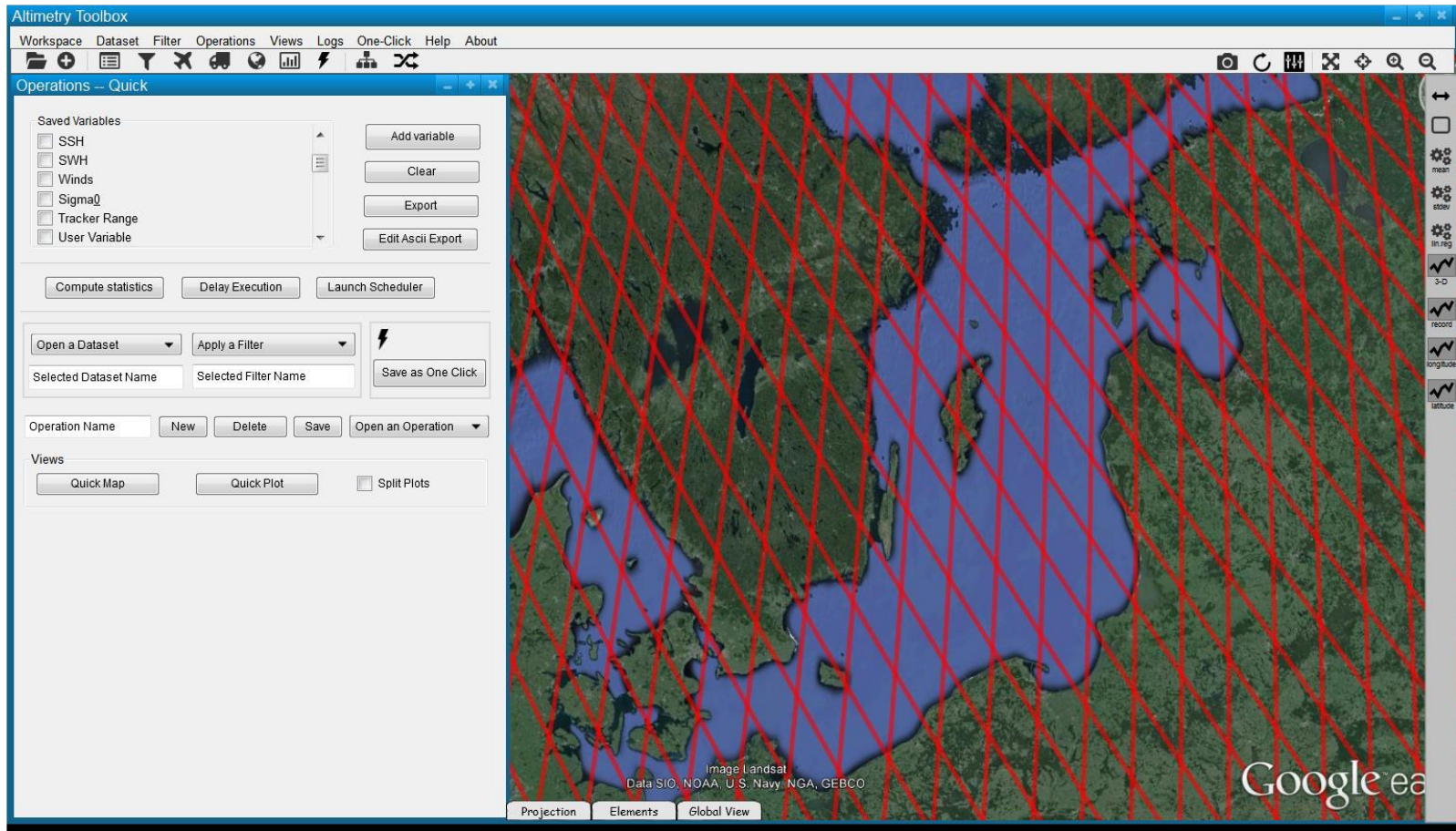
**Filters**



### 3. Future phases – Release B

**NEW GUI**

**Operations - Quick**

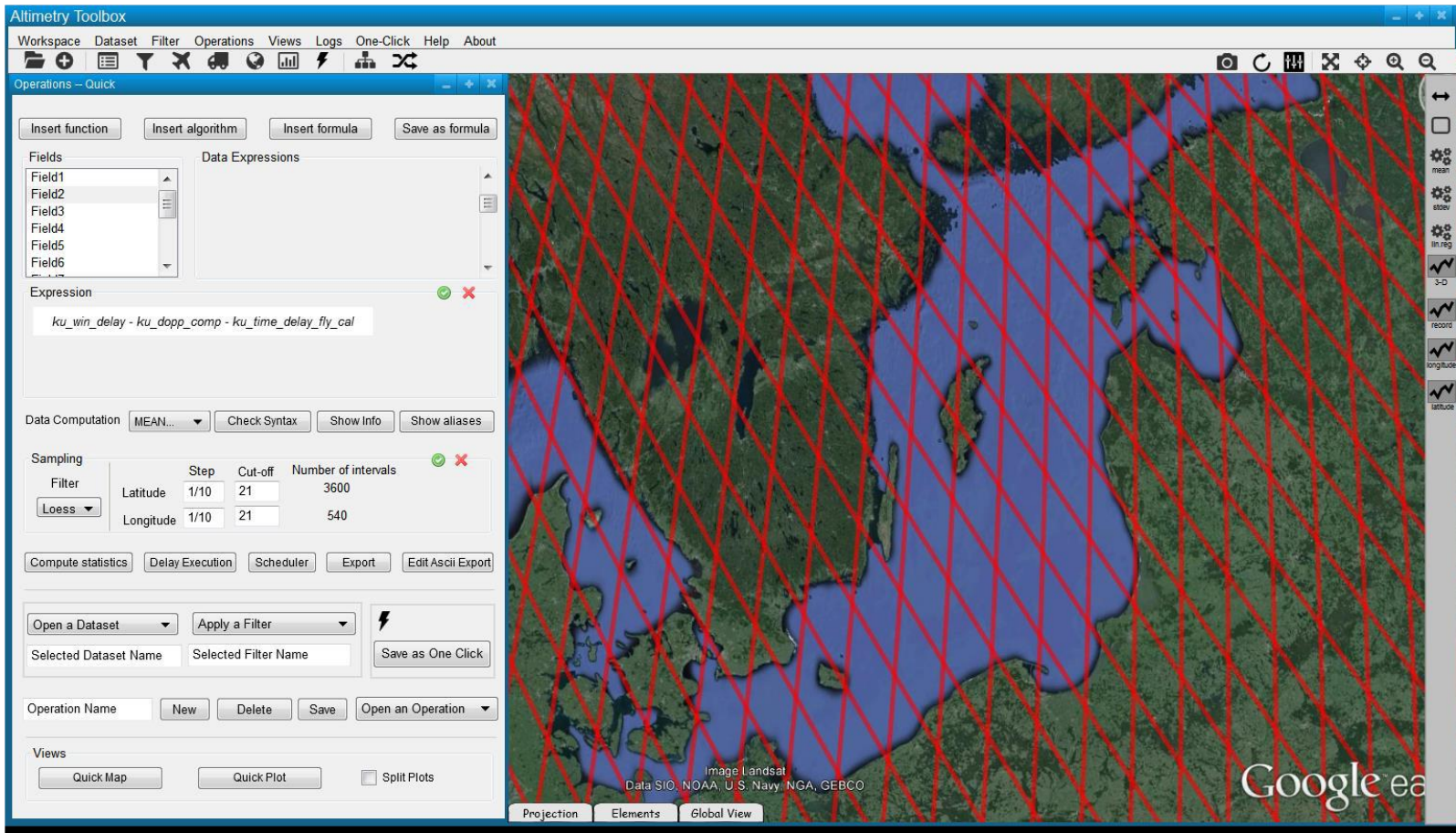




# 3. Future phases – Release B

**NEW GUI**

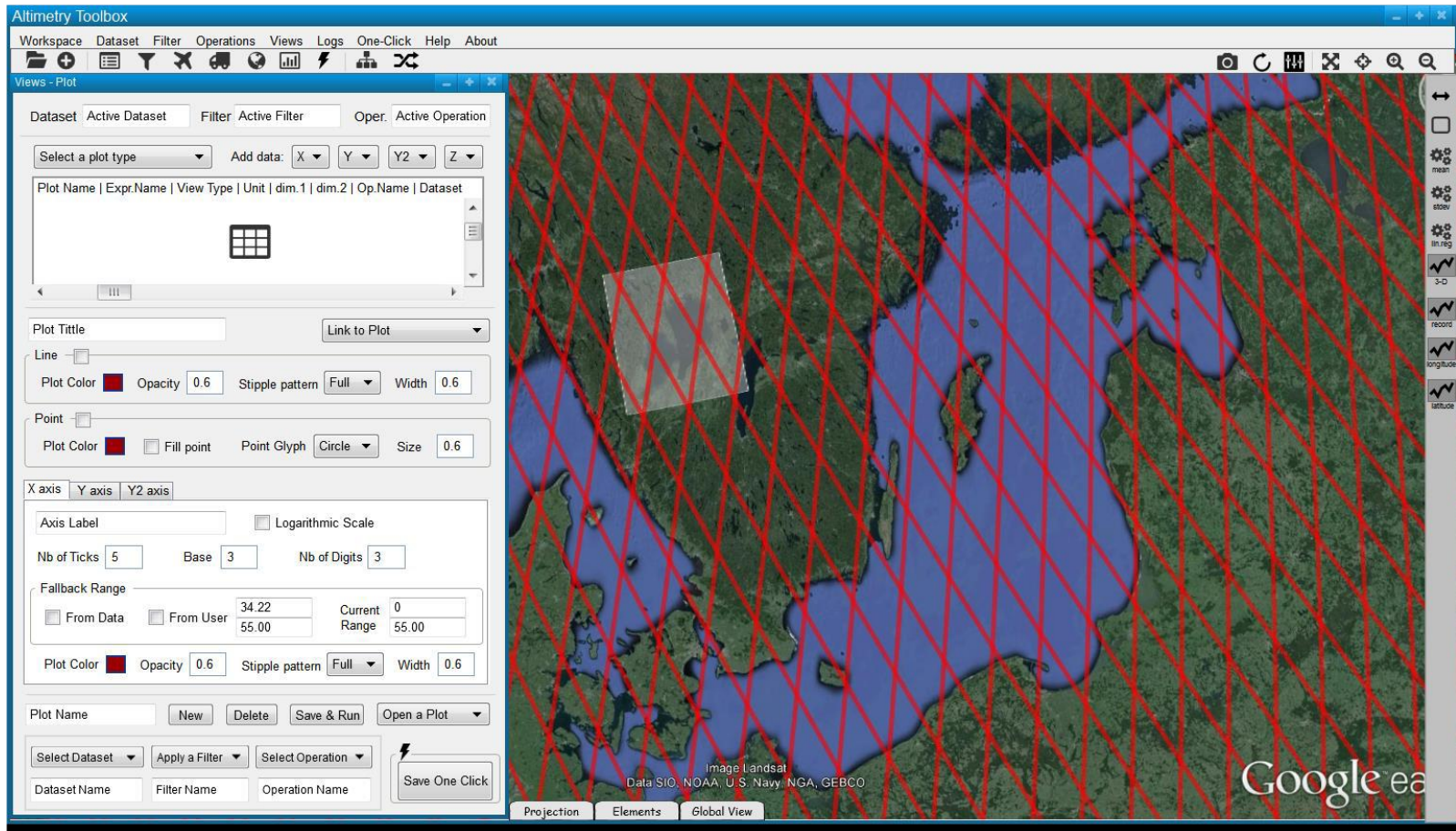
**Operations - Advanced**



### 3. Future phases – Release B

**NEW GUI**

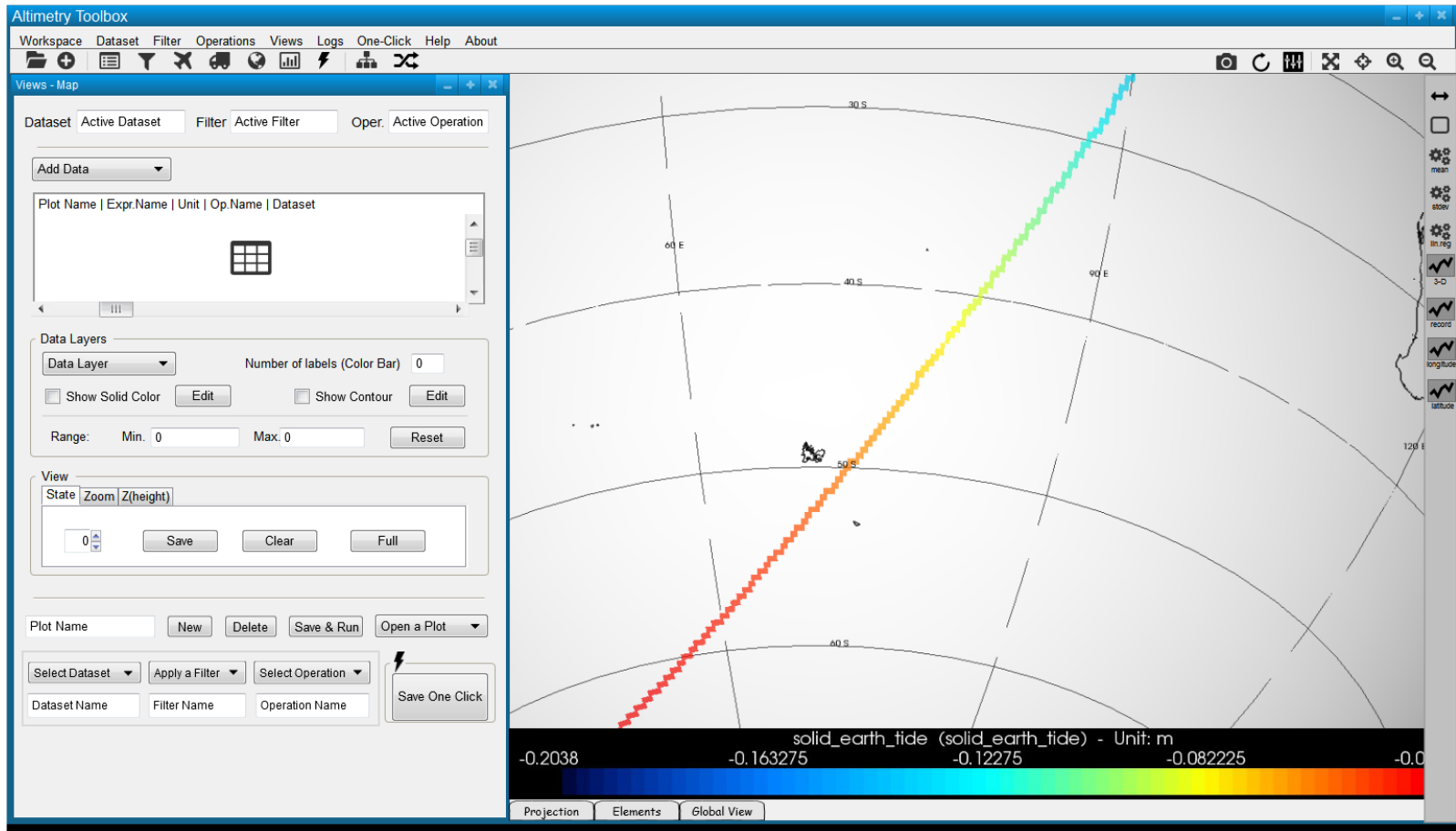
**Views - Plot**



### 3. Future phases – Release B

**NEW GUI**

**Views - Map**

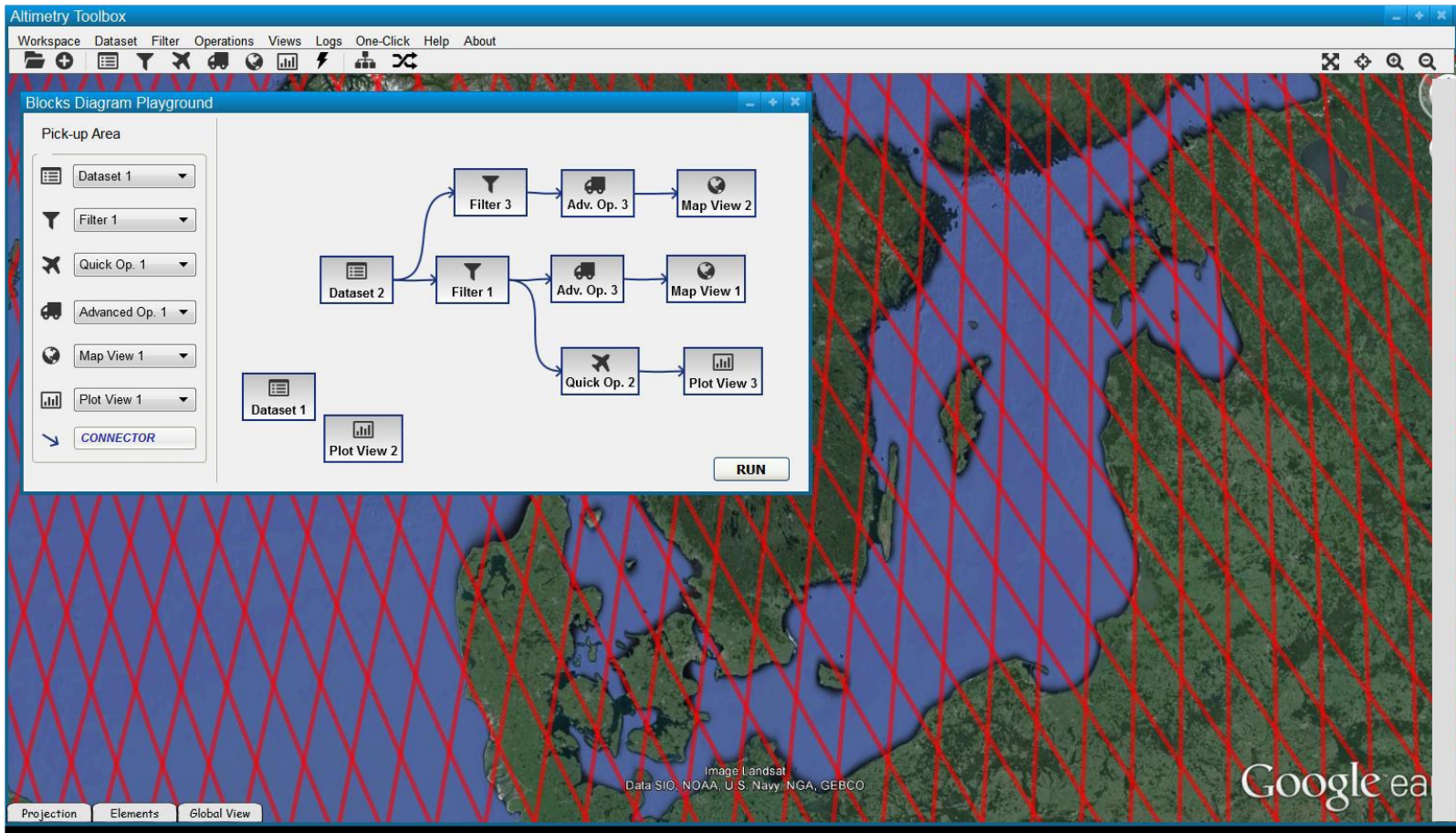




### 3. Future phases – Release B

**NEW GUI**

**Block Diagram**



### 3. Future phases – Release C

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- **Release C** will be delivered in **September 2016**.
- It will include

#### NEW DATASETS

- Coastal / inland waters formulas update
- Dataset interpolation improvement
- ASCII export improvement
- CFI libraries inclusion

#### NEW FEATURES

- River and Lake products
- Geosat GDR
- EnviSat reprocessed



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**Thanks for your attention!**

**Broadview Radar Altimetry Toolbox**

