OPEN GEOSOCIAL API

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LET'S TALK ABOUT PRODUCTS NOT DATA
SOCIETAL PRODUCTS

A New Mandate

- Enable Civil Earth Observations Capabilities For The Benefit Of Society
- Provide Information for Societal Benefit
- Deliver Information in A Timely Manner to End-Users and Decision Makers
- Ensure That Users Can Both Find and Visualize the Data
TODAY’S REALITY & CURRENT PRESSURES

A NEW MANDATE

- Data Available
- # Scientists
- Science Problems
- Funding
- Products/Applications
- # End Users

Today
OPPORTUNITY

A LITTLE MORE PRODUCTS TO MANY MORE USERS
-> SOCIETAL BENEFITS -> CREATE MORE DEMAND...
-> GENERATE MORE FUNDING FROM MORE SOURCES

FROM A PURE SCIENCE PERSPECTIVE, IS THIS A BETTER PLACE TO BE?
OPENING BHAG

“Big Hairy Audacious Goal”, Jim Collins

TO RESPOND TO NEW MANDATE

Open Geo-Social API

Empowers People to Quickly Discover, Share and Mimic to Turn [Earth Science Data] Products Into [Societal] Actionable Information.
OPEN GEO-SOCIAL API

- Generate User Products That Can Be Used As Actionable Information

- Tag your Products To Make Stories and Push Stories to Social Networks To Enable Discovery

- Use An Ubiquitous Product Distribution Format for the Net. Think Mobile Platforms

- Provide A Higher Level Hypermedia API To Shield Users From Infrastructure Details. You Want To Make It Easy to Generate, Access, Download Products
GEOSS ARCHITECTURE FOR DISASTERS

ON-DEMAND
LOW-LATENCY PRODUCTS

Product Publishing Servers

Regional Nodes
(SERVIR, PRC...)

SHARE, DISCOVER

MOBILE APP

DISADVANTAGED USER

MODELS
LOW LATENCY PRODUCT FORMAT: TOPOJSON (A VARIANT OF GEOJSON)

WE HAVE THE CAPABILITY TO GENERATE TOPOJSON ONBOARD (C++)

EXAMPLE: HOT PIXELS: 2KB COMPRESSED (AS DATA NOT JPG)

[WE HAVE DONE: FLOOD MAPS, BURN SCARS, LANDSLIDES…]

OR EASILY PUSHED TO A MOBILE PLATFORM

CAN BE VISUALIZED ON WEB AND SHARED WITH OTHERS WITHOUT ANY SPECIAL SOFTWARE
SCIENCE DATA ON SOCIAL NETWORKS

NEAR REALTIME NOTIFICATIONS

Geo Bliki
32 secs · OJO · vi

Dalia! Here is an example of the landslide we talked about...

geoss.landslide
Landslide gg34 happened in Mexico, near 68 fatalities.

geojson.io

geojson.io

geojson.io

geobiki @geobiki · Feb 27
AMS Hot Spot Processing using WCPS
geojson.io/...id=gist:caplare... Collapse
10:28 AM · 27 Feb 2014 · Details

geobiki @geobiki · Mar 9
"Facebook is intrinsically inadequate as a social environment for sharing vital earth science information" Really? @NASA @NASASocial?
CALL TO ACTION

DEFINE PRODUCT SEMANTICS SO WE CAN SHARE [GEOSS/ESIP/OGC]

PUBLISH MORE PRODUCTS USING HIGHER LEVEL GEOSOCIAL API

LETS COLLABORATE FOR DISASTERS…

AND PARTICIPATE:

- AIP-7 PILOTS… TALK TO STU FRYE stuart.w.frye@nasa.gov
- GEO-APPATHON
Thank You

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