

**Bureau of Ocean Energy
Management, Regulation,
and Enforcement**

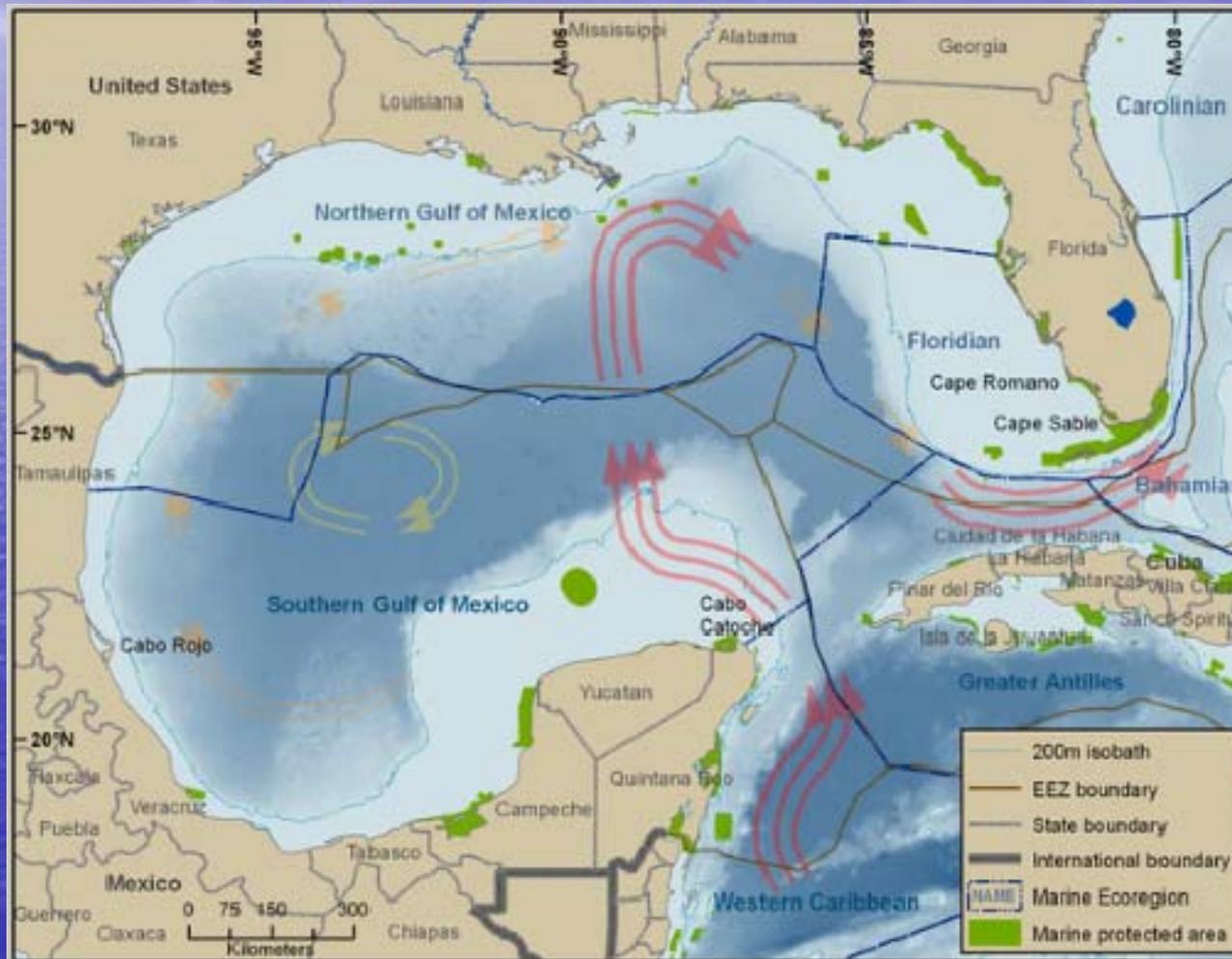
Mobile, Alabama Panel

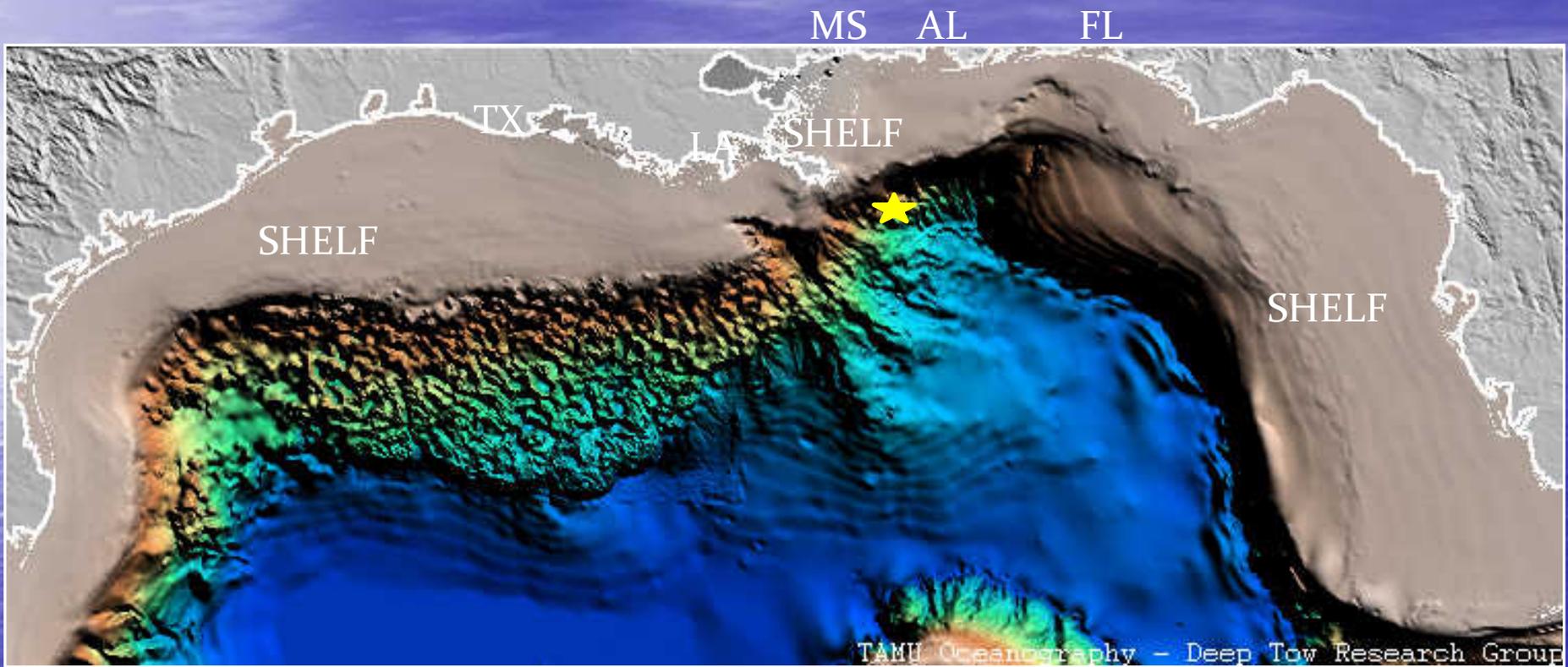
8/10/10

Dr. George Crozier



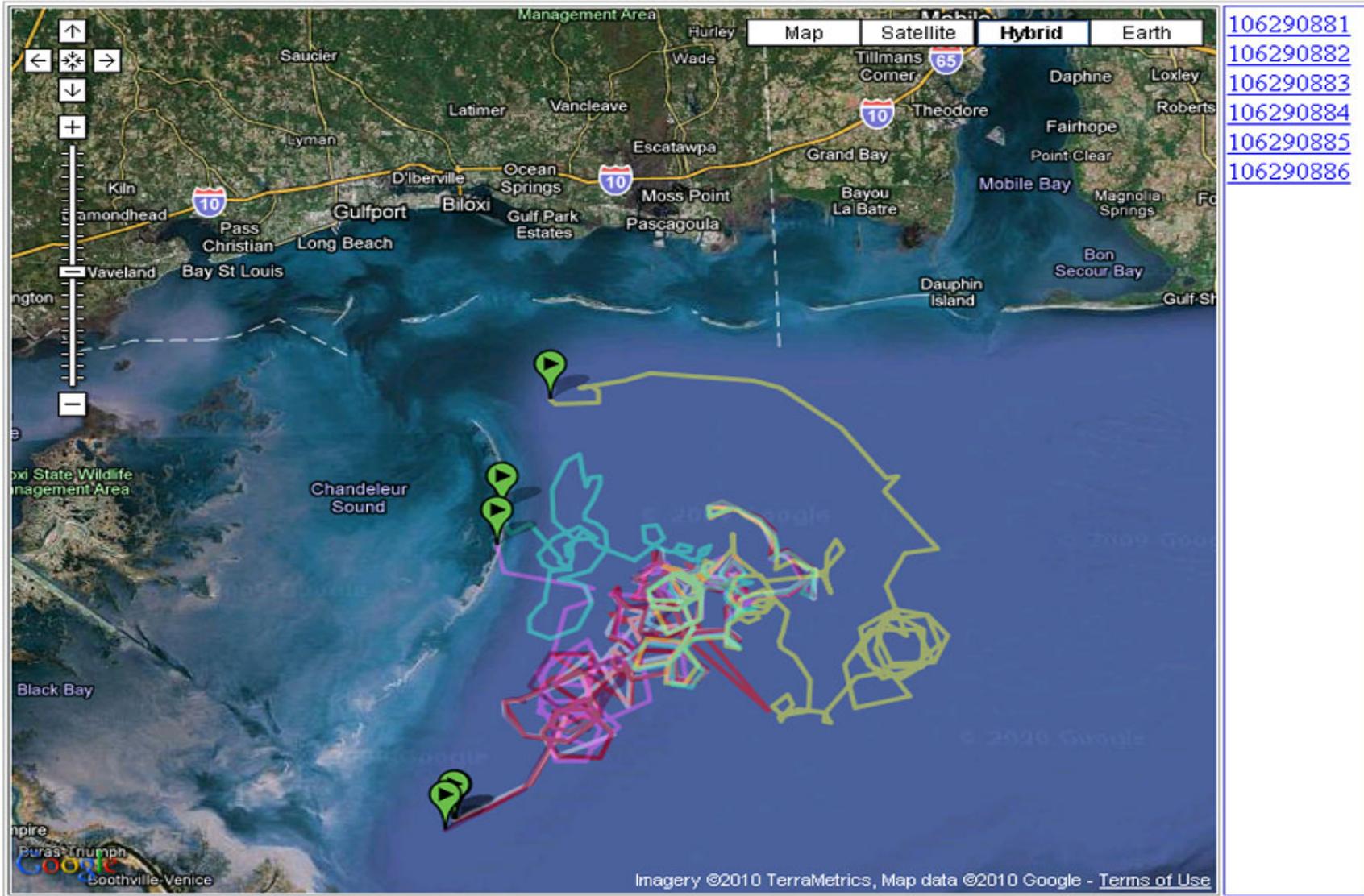
GOM Ecoregions





**Tan areas reflect continental shelf
of Northern Gulf of Mexico**

Cluster#1 deployed by DISL



Green icon = most recent fix of active unit

To focus the map: 1. Click ID on the right. 2. Zoom in or out. 3. Drag the map.

Click Satellite or Hybrid mode on the upper right for alternative display.

To see some other drifters deployed this year (mostly off New England), visit <http://www.nefsc.noaa.gov/drifter>.

ZOOPLANKTON



If It Doesn't Move



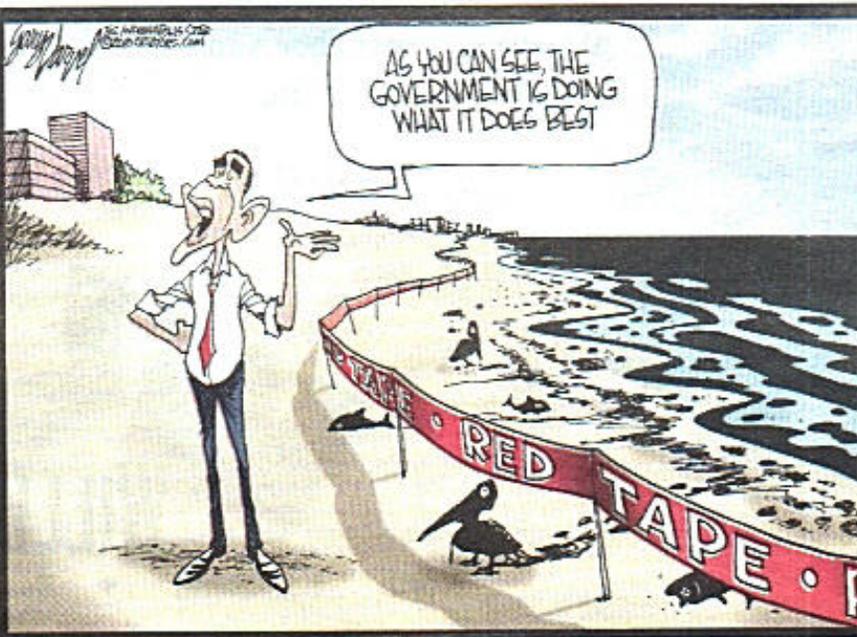
CLEANUP EFFORTS



The Inmates are Running the Asylum



'tooning in



THE FALLACY?

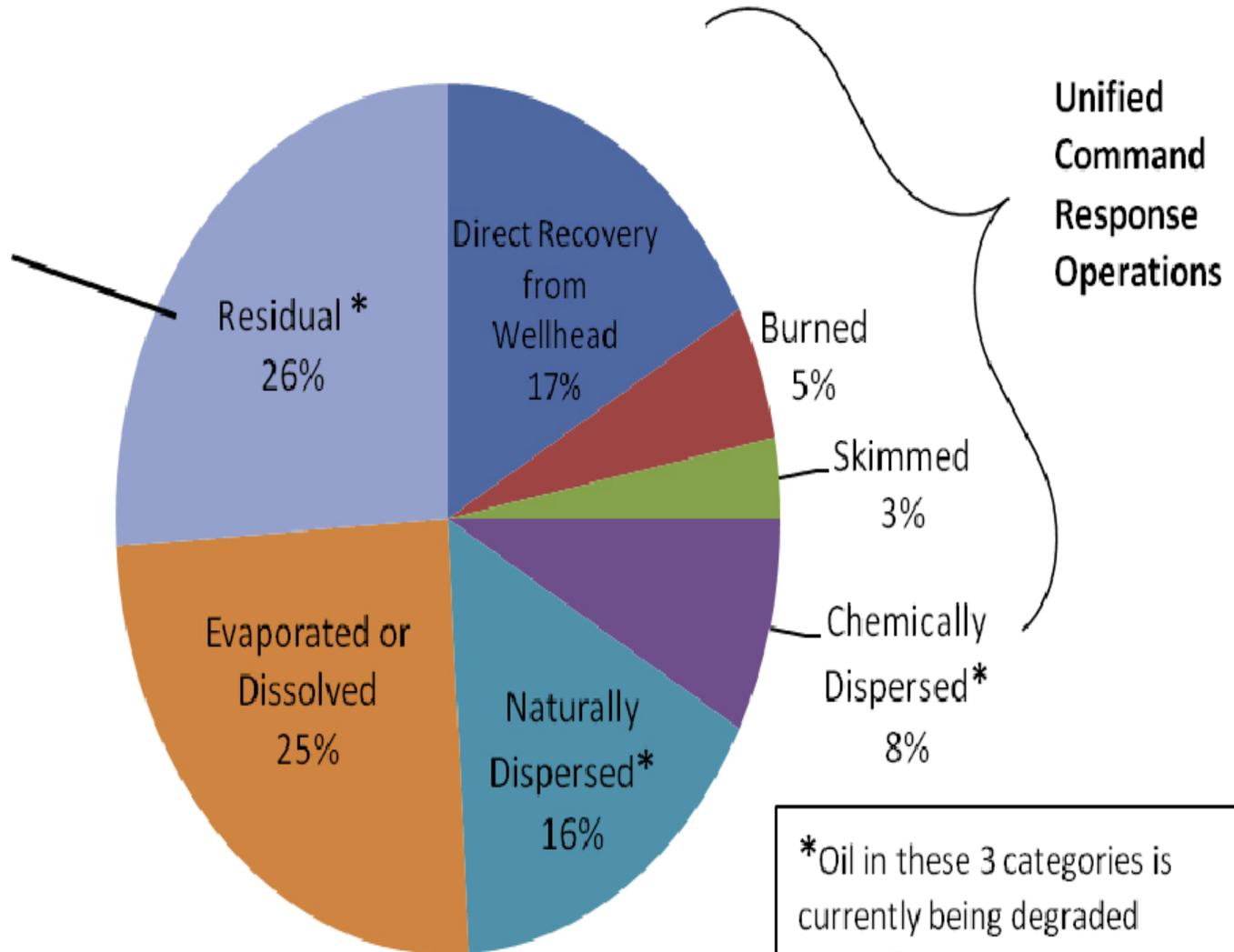
- “At its core, environmental protection entails protecting the commons. There is more than a bit of irony, and considerable opportunity for conflict, when the government obtains the science and engineering expertise needed to protect the public commons from a private company”

2010 - Pease, Craig M., Outsourcing Science and Engineering. The Environmental Forum. 27;18

Deepwater Horizon Oil Budget

Based on estimated release of 4.9m barrels of oil

Residual includes oil that is on or just below the surface as light sheen and weathered tar balls, has washed ashore or been collected from the shore, or is buried in sand and sediments.



*Oil in these 3 categories is currently being degraded naturally.

LESSONS LEARNED

- Booms are of limited value
- Booms without skimmers are even less
- Cleanup efforts bordered on hysteria
- Dispersants limit your capabilities
- Dispersants applied at depth introduce profound uncertainties
- Human system is far less resilient than "ecosystem"