U.S. EPA Presentation at Navy Public Meeting
Bayview Opera House – August 22, 2012

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Topics for EPA Presentation

- EPA Parcel E-2 Landfill Gas Testing
- Yosemite Slough

Key Regulators Overseeing the Navy's Work at Hunters Point Shipyard

- US EPA
- California Department of Toxic Substances Control (DTSC)
- California Regional Water Board (Water Board)

- California Department of Public Health
- Bay Area Air Quality Management District

The Multiple Ways Regulators Oversee the Navy's work

- Approval of Navy Workplans and Reports
- Legal rights to object and dispute Navy actions
- Onsite Inspections of the Navy's Work Crews
- Independent testing to check accuracy of Navy data

Regulators Independent Testing Strategy for 2012 and 2013

2012

- US EPA: Landfill Gas Testing at Parcel E-2

2013

- California Water Board: Groundwater Testing
- California DTSC: Soil Testing

Goals of EPA's Independent Testing of Parcel E-2 Landfill Gas

- Verify chemicals present in the landfill gas
- Evaluate the extent of landfill gas
- Determine if landfill gas constituents exceed regulatory standards
- Check if Navy data is complete and accurate
- Assist with selection of any future landfill gas treatment technology

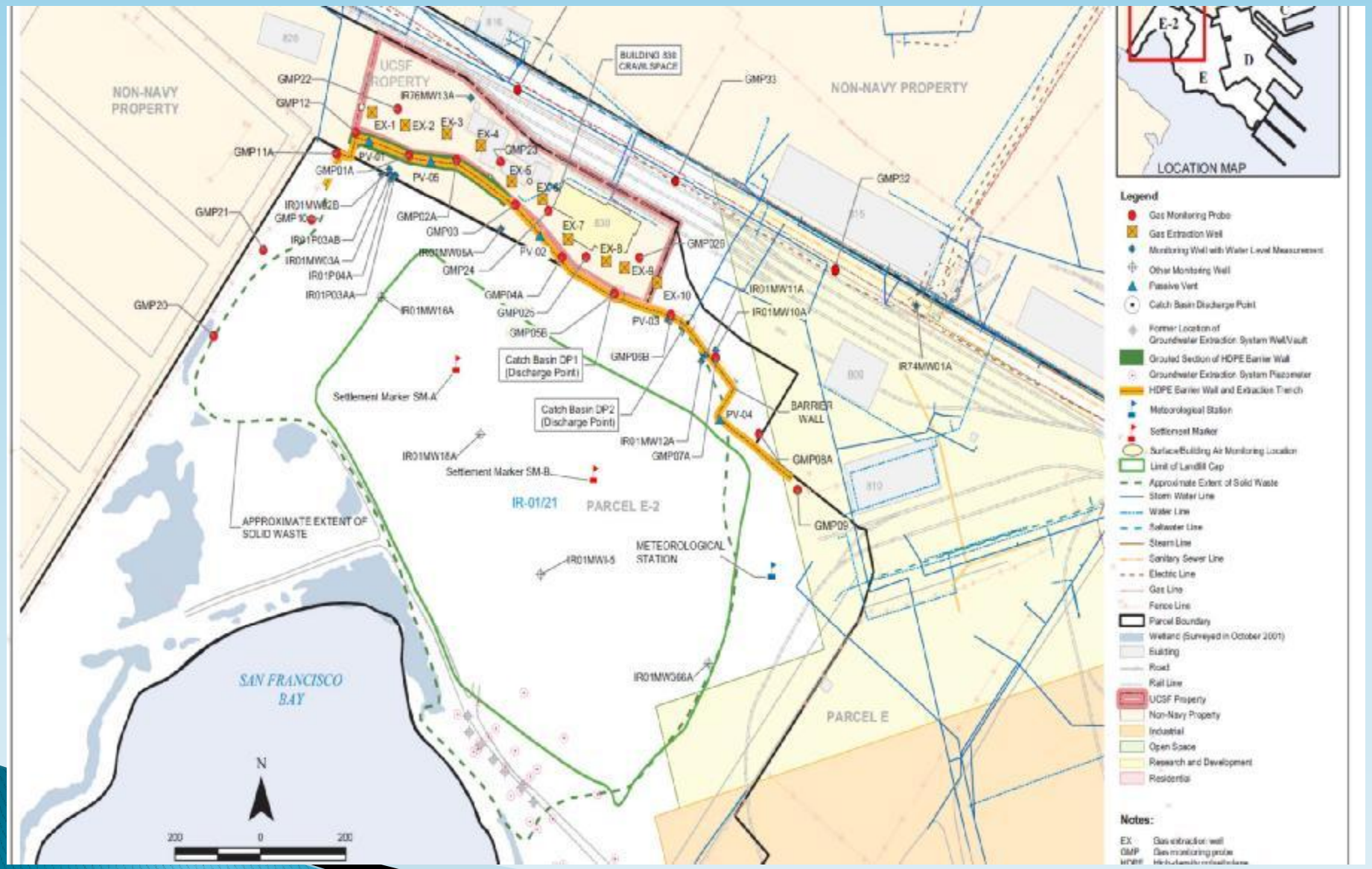
Likely Primary Contaminants in Parcel E-2 Landfill Gas

- Methane
- Volatile Organic Compounds
- Petroleum Hydrocarbons
- Hydrogen sulfide

Where Will EPA Test ?

- Nine (9) sampling locations have been selected
- Most of the Navy's E-2 current landfill Gas Monitoring Network is covered
- Sample locations will be on the west and north sides of the landfill
- EPA will use the Navy's gas monitoring wells (i.e. EPA is not drilling its own wells)

Where will EPA Test ?



Who will do the Testing ?

- Gas samples will be collected by EPA's contractor (TechLaw Inc) with assistance from Navy contractor
- Gas samples will be managed by EPA's contractor
- Work will be supervised by EPA staff
- Gas samples will be analyzed by Air Toxics Inc., a private, State-certified laboratory located near Sacramento, CA

Schedule

- Landfill Gas Testing: Mid September 2012
- Final Data Report: Mid-December 2012
- Presentation on Findings: Early 2013

How can you get involved ?

- Read EPA Landfill Gas Testing Plan
  - To be posted on EPA's website for HP Shipyard by September 7th
- Come and watch EPA collect the landfill gas samples
- Ask Questions !!!!!!!

YOSEMITE SLOUGH

Status of Planning the Remedy

Location of the Yosemite Slough Site

Yosemite Slough Regulatory Status

- Yosemite Slough is <u>not</u> a Navy cleanup site
- EPA is lead agency
- EPA is writing the cleanup plan
- EPA plans to get the responsible parties to pay and perform the cleanup action

Yosemite Slough at low tide

California State Parks Wetlands Restoration (as of January 2012)

Primary Contaminants in Yosemite Slough

- Polychlorinated Biphenyls (PCBs)
- Metals such as Lead

- Contamination is up to 5 feet deep

Risks from Slough Contamination

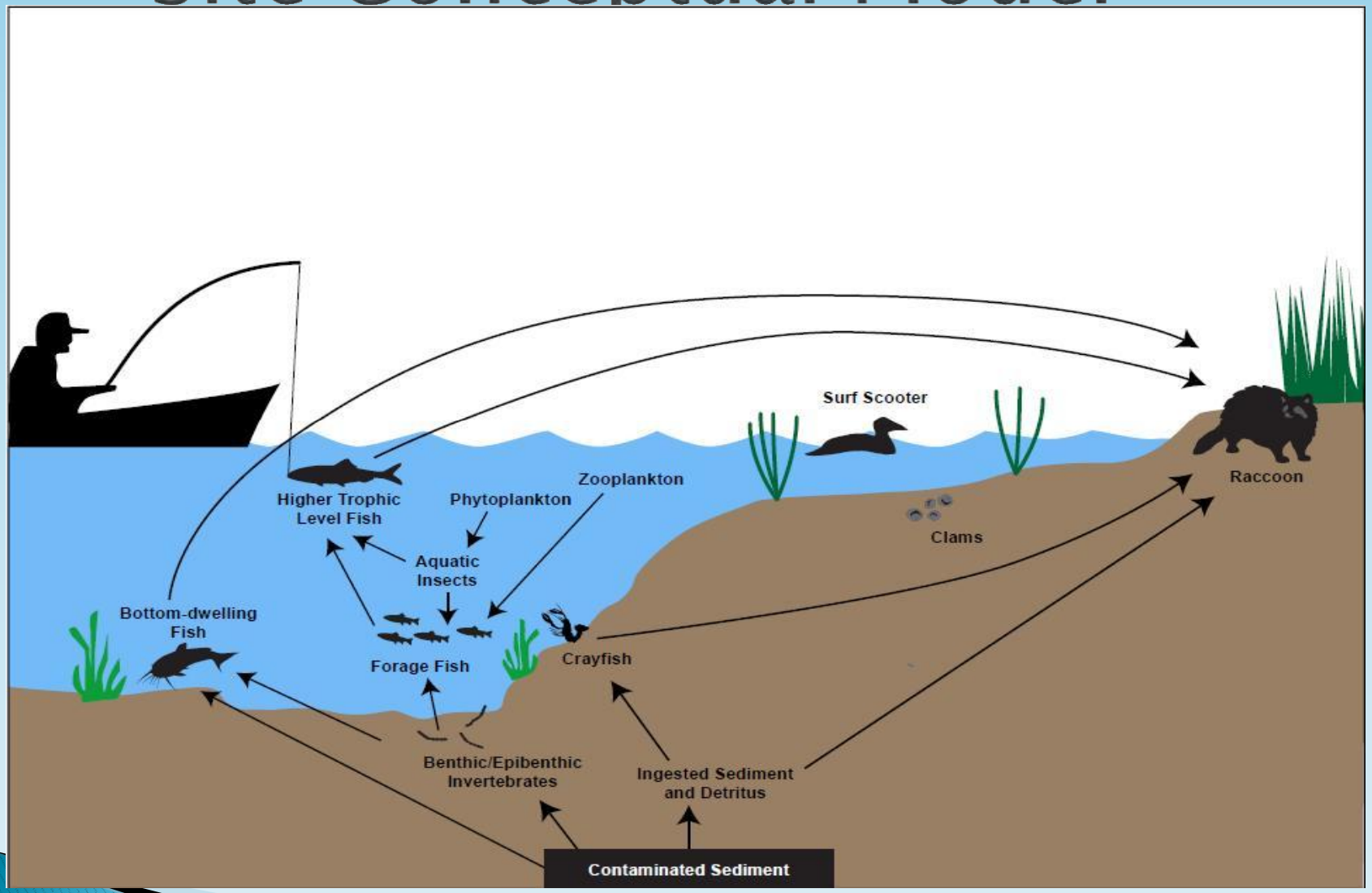
Human Health Risks:

- Consumption of fish and shellfish containing site contaminants
- Direct contact with Slough mud

Ecological Risks:

- Accumulation of contaminants (PCBs, mercury) in fish, shellfish and birds that live at the Slough or visit the Slough

Site Conceptual Model



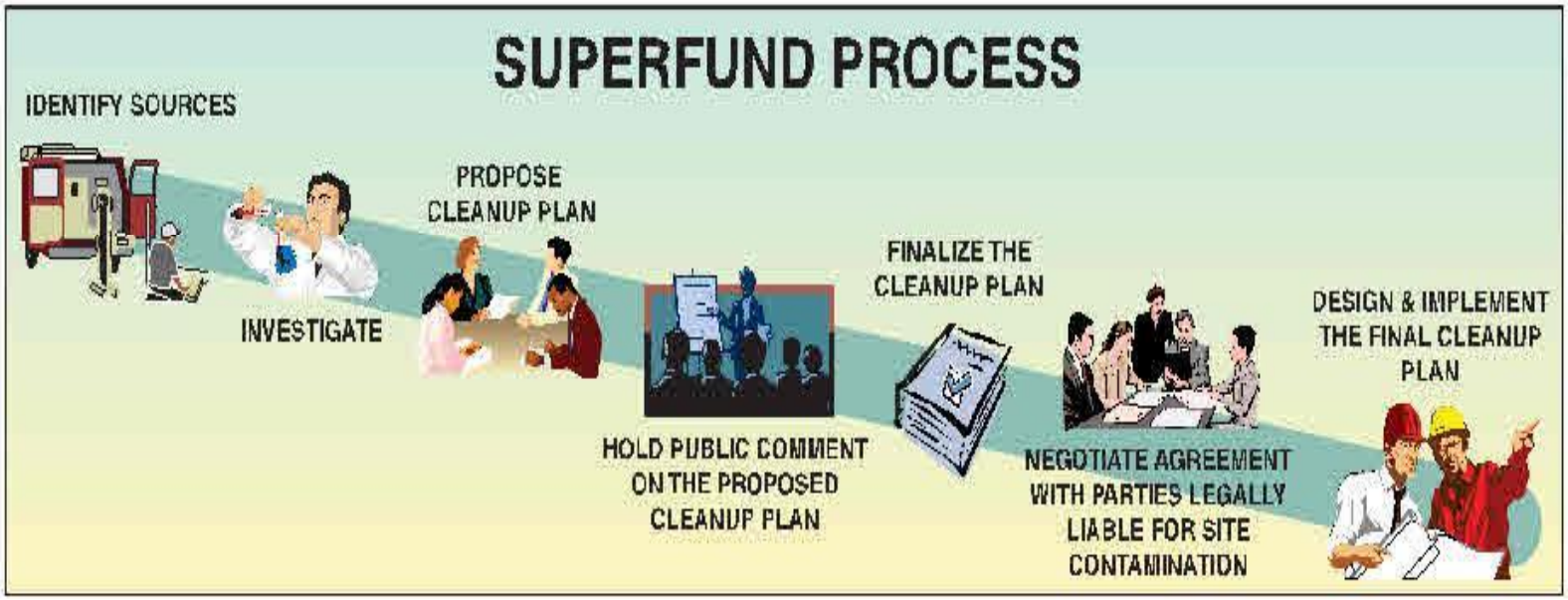
What Environmental Law is EPA Using for Slough Cleanup?

- **CERCLA**: Comprehensive Environmental Response, Compensation, and Liability Act also known as the federal Superfund Law.

- EPA's Cleanup Plan will be called an:

EE/CA: Engineering Evaluation/Cost Analysis

EPA's Site Cleanup Process



What has EPA done so far in 2012?

- Continued search for responsible parties
- Completed 3 Technical Studies
- Developed preliminary cleanup goals
- Issued a Community Involvement Plan
- Conducted periodic outreach meetings
- Begun writing up the draft cleanup plan

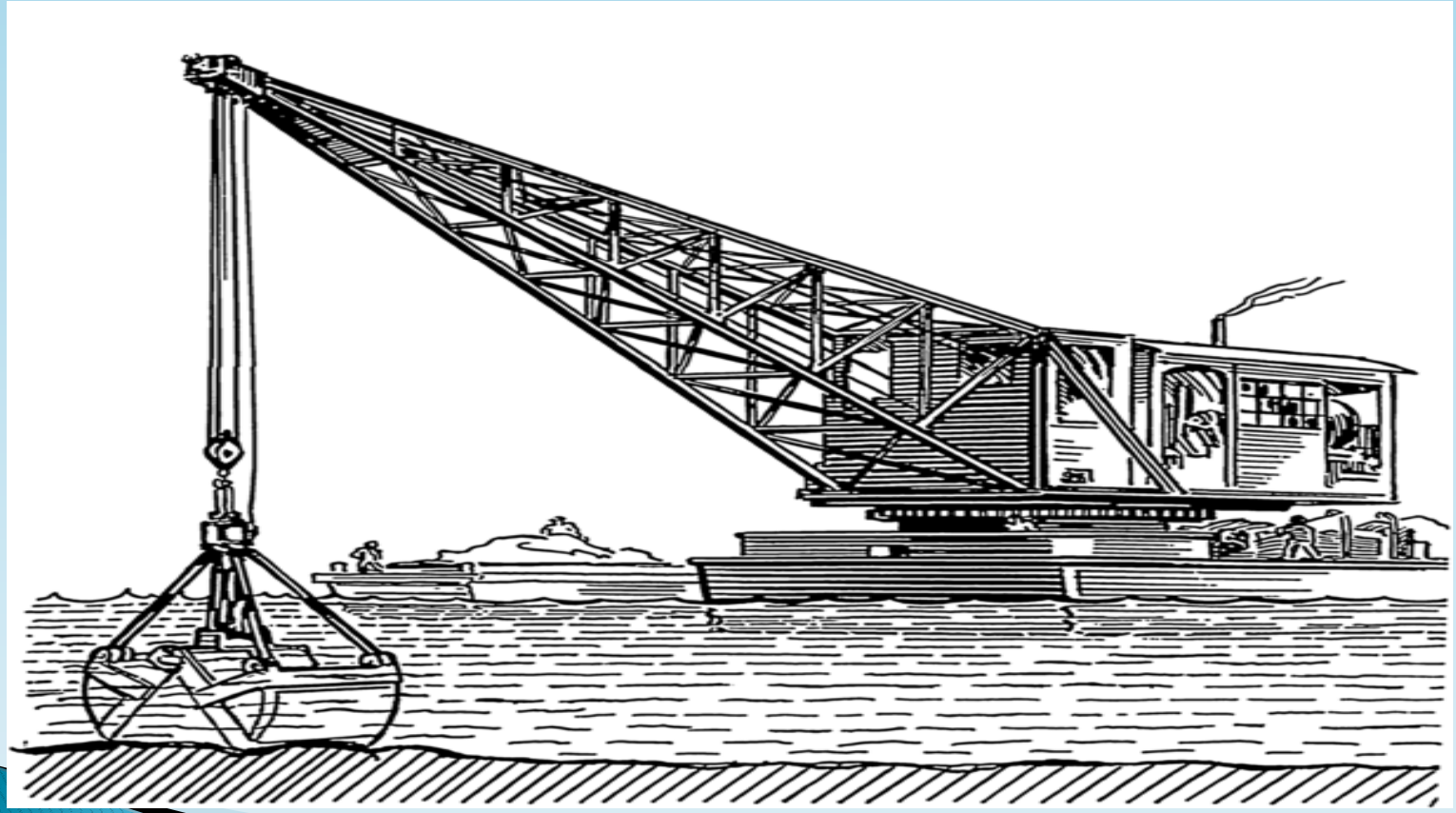
Technologies for Sediment Sites

- Monitored Natural Recovery (MNR) via natural deposition of clean sediments over contaminated sediments
- Land Use Controls
- In-situ treatment (such as activated carbon)
- Removal and backfill with clean sand
- Capping with clean sand
- Multiple Technology Remedy

Monitored Natural Recovery

In-situ Treatment of Sediments

Sediment Removal via Dredging



Clam Shell Dredge

Loading Contaminated Sediments onto a Barge

Dredging Using Long Reach Excavator

Sediment Drying

Remedy Options to be Evaluated by EPA

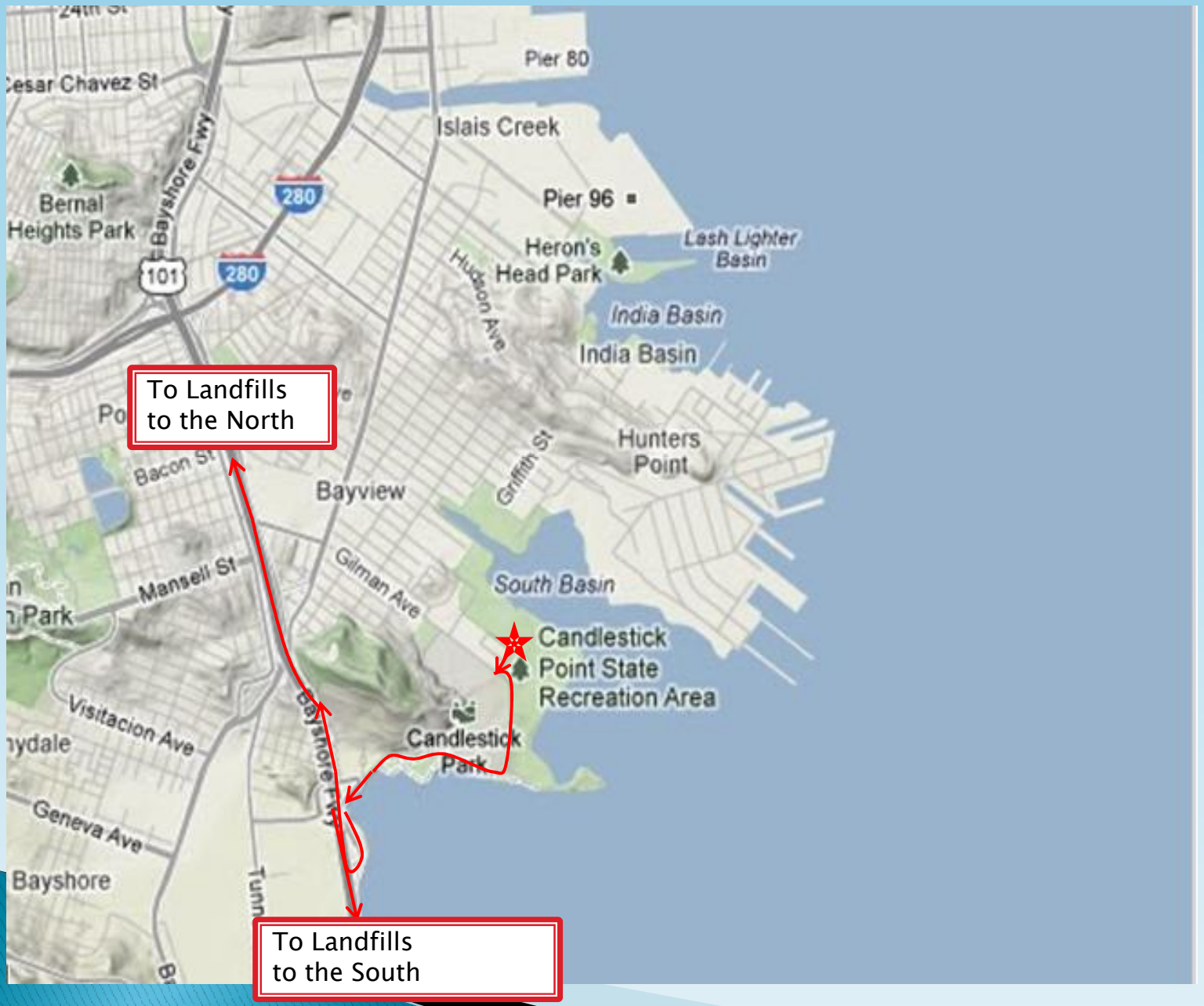
- Full Removal
- Partial Removal with a sand cap
- Partial Removal, sand cap, and natural recovery via sedimentation

Key Components for <u>any</u> Selected Site Cleanup Remedy at Yosemite Slough

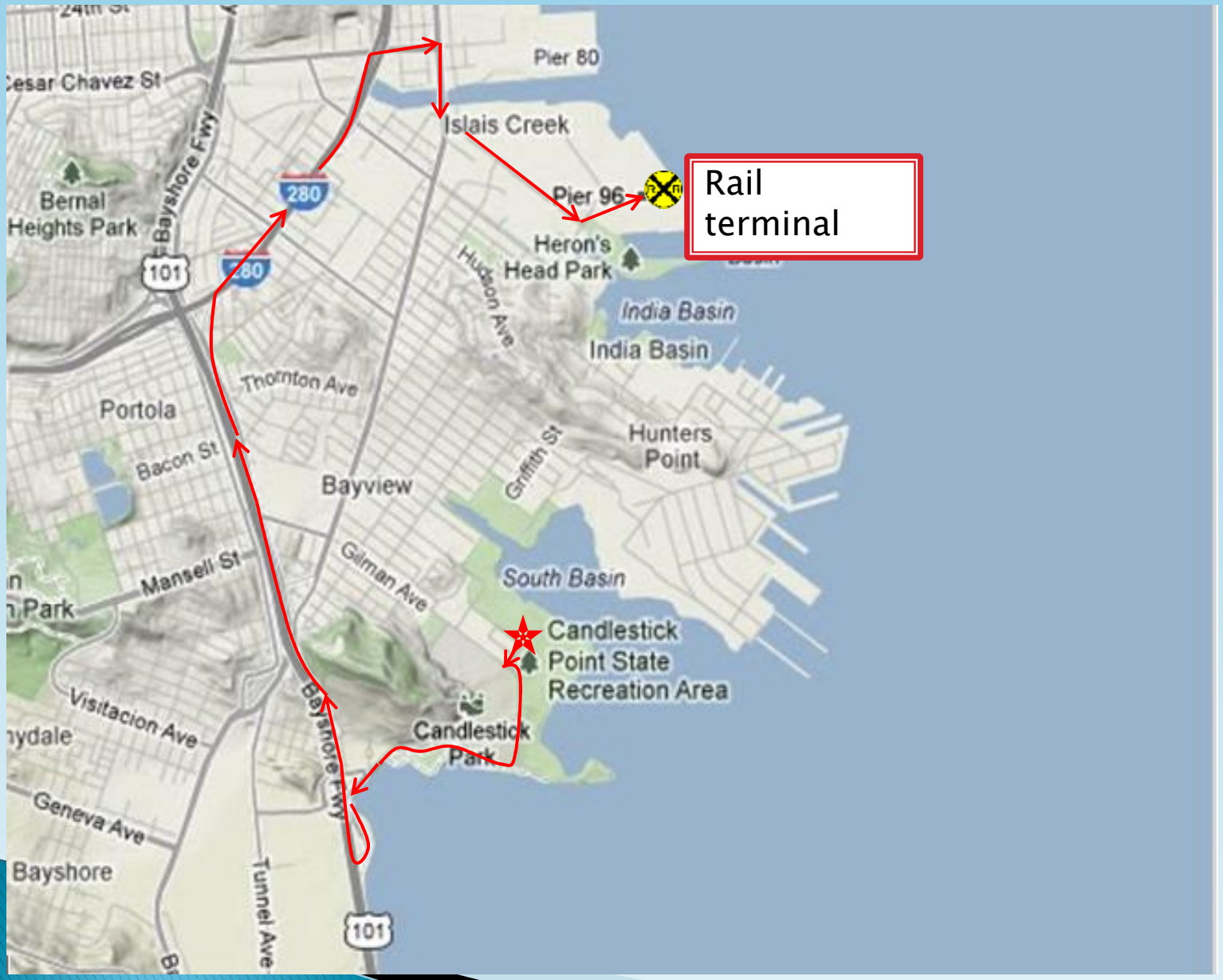
Improve Slough edges to prevent erosion into the Slough
Stop sources that could re-contaminate the Slough in the future
Coordinate with State Parks wetlands projects
Coordinate with future Navy remedy in Parcel F
Comply with Clean Water Act, Natural Resource Laws, Cultural Resources Laws
Reduce Odor and Noise during remedy
Conduct monitoring to ensure the remedy is effective in the long-term

Potential Project Staging and Sediment Dewatering Areas

Haul Routes: Trucking



Haul Routes: Truck to Rail



What is EPA's "Best Case" Schedule for Cleanup Action at Slough?

2013

- Proposed Cleanup Plan for Public Comment
- Negotiate legal agreement with responsible parties
- Start remedy design

2014

- Conduct Slough Cleanup work
  - May slip to Summer 2015

Key Challenges

- Selecting the best remedy
- Reaching a legal agreement responsible parties
- Conduct cleanup work with minimal impacts to residents and site ecology
- Prevent recontamination of the Slough after cleanup work is done
- Stay on Schedule !

How Can I Stay Informed About Yosemite Slough Cleanup?

- www.epa.gov/region9/YosemiteSlough
- Visit an Information Repository:
  - ARC Ecology Offices at 1331 Evans Avenue
  - EPA Offices at 75 Hawthorne Street
- Signup on EPA mailing list
- Call EPA:
  - Craig Cooper: (415) 947-4148
  - Jackie Lane: (415) 972-3236