Groundwater Natural Resource Damages Assessment: A New Restoration Tool for Massachusetts

Dale C. Young, Director
Karen I. Pelto, Case Manager
EEA
NRD Assessment & Restoration Program

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TOPI CS

• **Overview**
  - Natural Resource Damages (NRD) Assessment and Restoration
  - Natural Resource Trustees
  - MA NRD Program

• **MA Water Policies and Practice**
  - Commonwealth
  - Local

• **Textron/ MMR NRD Groundwater Restoration**
  - $1 M Settlement
  - EEA Request for Proposals
  - Eligible Projects
Overview of NRD

- **Statutory Basis**
  - CERCLA, CWA, OPA, State MGL 21E

- **Liability**
  - For injury, destruction, loss of natural resources
  - Resulting from
    - Discharge of oil
    - Release of hazardous substance

- **Natural Resources**
  - Land
  - Fish, Wildlife, Biota
  - Air
  - Water, Groundwater, Drinking water supplies...
  - Belong to, managed by, held in trust by, controlled by Federal, state govt., or Indian Tribe
How is NRD different than cleanup?

A release of oil or hazardous materials...

**Cleanup**

EPA, MA DEP, U.S. Coast Guard

- Assess extent of contamination
- Control source
- Reduce risk to human health & environment

**NRD**

Trustees: EEA, USFWS & NOAA

- Assess extent of injuries
- Restore resource
- Compensate public for loss of resource
Trustees of natural resources on behalf of the public

**FEDERAL**
- Dept. of Commerce
  - NOAA
    - Coastal resources
    - Anadromous fish
    - Marine mammals
    - Marine Sanctuaries
- Dept. of Defense
  - Military Installations
- Dept. of Energy
  - DOE Facilities

**STATE**
- EEA Designated by Governor
- All resources plus groundwater

**TRIBAL**
- Federally recognized Tribes
Steps in NRD

- **Assess Injury**: Adverse change in chemical/physical qualities/viability

- **Quantify Damages**

- **NRD Demand to RP**
  - Damages
    - Cost to restore resource
    - Value of lost services
      - Physical & biological functions of resource
      - Human Use Services: e.g. Water supply or Recreational Use
      - Ecological Services: e.g. Wildlife Habitat
    - Trustee Assessment Costs

- **Use NRD for Restoration** *(CERCLA)*
  - Restore
  - Replace or
  - Acquire equivalent of injured resource
NRD Concepts

• **Mandatory Criteria**
  - Discharge of oil or release hazardous substance/material
  - Natural resources affected
  - Quantity or Concentration sufficient to cause injury
  - Assessment data available @ reasonable cost
  - Response actions will not sufficiently remedy the injury
MA NRD Program

Staffing
• Currently 2 staff

EEA NRD Trust Fund
• Damages
  • For Restoration
• Trustee Assessment costs
  • For Assessments/Program Support

Cases Settled
• 12 Cases to Date
• Additional Cases in Negotiations
Colrain Acid Spill
$30,000

GE Housatonic River, Pittsfield
$19.7 Million

Holyoke Coal Tar
$500,000

Nyanza, Ashland
$3.1 Million

New Bedford Harbor,
$20.2 Million

Textron:
$1.3 Million

Bouchard:
In Negotiations

Mystic River, Medford
$26,801

Charles George, Tyngsboro
$1.2 Million

Chelsea Creek:
Posavina, $155,000
Global/Irving, $312,500

Everett Coal Tar/Island End,
$300,000

PSC, Palmer
$157,000

Total NRD Settlements
$47 Million

MA NRD Cases Settled
Chelsea Creek: Posavina, $155,000
Global/Irving, $312,500

Everett Coal Tar/Island End,
$300,000

Holyoke Coal Tar
$500,000

Total NRD Settlements
$47 Million
MA Water Policy and Practice

• MA Water Supply Policy Statement
  – ensure that water is available in sufficient quantity and quality to meet current and future needs

• MA Water Policy
  – Keep water local
  – Protect clean water and restore impaired waters
  – Protect and restore fish and wildlife habitat
  – Promote development strategies consistent with sustainable water resource management
MA Water Policy and Practice

- **MA Aquifer Protection**
  - Wellhead Protection required for public water supplies
  - **Drinking Water Grant Program**
    - Local acquisition of land to protect water supplies
    - FY 09 awarded $2,767,625

- **Acting Locally**
  - Zoning bylaws
    - Aquifer Protection Districts
    - Groundwater Protection Districts
OVERVIEW

TEXTRON NRD SETTLEMENT @ MMR

• State and Federal Trustees
  - Settled NRD w/ Textron Systems Corporation @ MMR
  - Based on Textron operations @ MMR J ranges

• Total NRD settlement: $1.3 Million
  - To be used for
    • Restoration of Injured Resources
    • Reimburse Trustee Assessment costs

• Consent Decree entered
  - In US District Court Feb. 2008
Textron Consent Decree

Payment to State: $1 Million

- **NRD funds to EEA**
  - Based on claims for GW injury @ J-Range
    - **$40,000**: Assessment costs

- **$460,000**: Restoration
  - In accordance w/ MGL 21E & Trustee MMR MOA
  - U.S. will **not** assert any right to funds

- **$500,000**: Restoration
  - In accordance w/ CERCLA & Trustee MMR MOA
  - Before Trustee expend funds
    - Publish Draft Restoration Plan
    - Provide notice to other Trustees
    - U.S. reserves right to dispute EEA jurisdiction
Textron Consent Decree

Payment to Federal Trustees: $300,000

• Funds to NOAA
  - $25,000: Assessment costs

• Funds to DOI
  - $100,000: Assessment costs

• Funds to Dept. of Defense
  - $175,000: Restoration
    • Based on NRD claims by DoD
    • Managed by DOI
    • In accordance w/ CERCLA & MMR Trustee MOA
    • Before expend funds
      - Publish Draft Restoration Plan
      - Provide notice to other Trustees
EEA RFR

- Funding Solicitation - Request for Response (RFR)

- NRD Funds: $960,000

- RFR Solicitation released Jan. 12, 2009

- RFR Responses received March 11, 2009
  - 11 Eligible Responses
  - Interagency Review Team
Eligible Projects

1) **Restore, replace, and/or acquire equivalent** of resources/services relating to GW injured by releases at J Ranges.

2) **In terms of cost, do not limit ability to accomplish goals** & serve Upper Cape Cod & its communities.

3) **Consistent w/ federal, state, local law, regulation, or policy**

4) **Not “otherwise required” per statute, regulation, etc. unless** such public project benefits GW resources such as:
   a) Accelerate pace of project performance which represents a calculable & substantial GW restoration benefit or
   b) Increase likelihood of project performance as pre-requisite to substantial GW restoration or to further substantial GW restoration.

5) **Not inconsistent with ongoing or anticipated clean-up**, i.e. Rapid Response Actions or Final Decisions.
Eligible Projects

- **Strong linkage to GW resources/services**
  - For ecosystems & humans

- **Located On Upper Cape/ Sole Source Aquifer**
  - Sandwich, Bourne, Falmouth, Mashpee

One of the following:

- **Protect quality of current & potential DWS**
- **Protect quantity of current & potential DWS**
- **Integrate management of current & potential DWS & WWT**
Eligible Projects

- Protect quality of current & potential DWS
  - Protect aquifers
  - Protect groundwater recharge areas
  - Protect drinking water watersheds
  - Protect environmentally sensitive lands/critical habitats
Eligible Projects

- **Protect quantity of current & potential DWS**
  - Implement measures to conserve water
  - Implement measures to provide recharge to aquifers
    - including offsets that mitigate impacts to water-dependent ecosystems
Eligible Projects

- Integrate management of current & potential Drinking Water Supplies & Wastewater Treatment
- Emphasis on land, energy, water & regional benefits
Opportunities for Public Input

• **Developing Restoration Project Proposals**
  - Via State procurement process
  - RFRs issued by EEA
    • Eligible applicants
      - All private entities; local, state, federal and tribal governments; academic institutions; non-profit and commercial organizations.

• **Public Comment on Draft Restoration Plans**
  - Prior to expenditure of public funds where required per CERCLA
Questions?

- **EEA Contacts**
  - Dale Young, NRD Director
    - Dale.young@state.ma.us
    - 617-626-1134
  - Karen Pelto, Case Manager
    - Karen.pelto@state.ma.us
    - 617-626-1007
  - EEA NRD Program website
    - http://www.mass.gov/?pageID=eoeeahomepage&L=1&L0=Home&sid=Eoeea