

Triad Project Profiles

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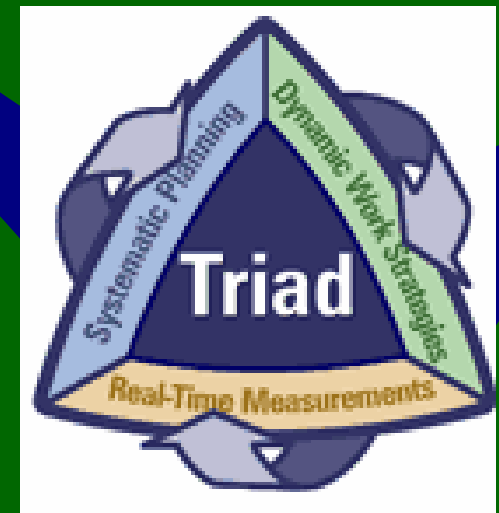
Overview

- ◆ Triad and the Triad Resource Center
- ◆ Triad Project Profiles
 - » Profile content
 - » Projects – current, planned
 - » Accessing Profiles – search and map
 - » Preview of Profile System
- ◆ Solicit additional profiles
 - » Potential projects



Triad Refresher

- ◆ The Triad approach to decision-making for hazardous waste sites offers a technically defensible methodology for managing decision uncertainty that leverages innovative characterization tools and strategies.
- ◆ The Triad refers to 3 components:
 - » **systematic planning**
 - » **dynamic work strategies**
 - » **real-time measurement systems**



Triad Resource Center

- ◆ Triad Resource Center (TRC) website was recently unveiled as a Federal/State Interagency Partnership
- ◆ TRC provides the information hazardous waste site managers and cleanup practitioners need to implement the Triad effectively.

The screenshot shows the homepage of the Triad Resource Center website. At the top, there is a navigation menu with links for 'Triad Overview', 'Triad Management', 'Regulatory Information', 'Technical Components', 'User Experiences', and 'Reference/Resources'. A search bar is located in the top right corner. The main heading is 'Triad Resource Center' with the tagline 'TRIAD: A SMARTER SOLUTION TO SITE CLEANUP'. Below this, a paragraph describes the Triad as an innovative approach to decision-making for hazardous waste site characterization and remediation. To the left of the main text is a quote from Joseph Seebode, Assistant Commissioner for Site Remediation and Waste Management at the New Jersey Department of Environmental Protection. A sidebar on the right contains a 'Subscribe' form, a 'Glossary' search box, an 'Acronyms' search box, 'Frequently Asked Questions', and links for 'E-mail this page' and 'Printable version'. A list of menu items is also visible, including 'Triad Overview', 'Triad Management', 'Regulatory Information', 'Technical Components', and 'User Experiences', each with a brief description of its content.

www.triadcentral.org

Triad Project Profiles

- ◆ Why include Triad Project Profiles?
 - » Further expand understanding of the Triad
 - » Showcase example applications of the Triad
 - » Link to case studies and other documents on Triad Projects
- ◆ Profiles are listed under “User Experiences” Tab on the TRC
- ◆ Also on www.cluin.org/products/triad



What Does A Profile Contain?

◆ Site Information

- » Site Background, Contaminants and Media of Concern, Project Results and Outcomes

◆ Project Information

- » Decisions/Objectives, Triad Project Benefits, Cost & Time Savings

◆ Triad Approach Information

- » Systematic Project Planning, Project Team Description, Real-time Measurement Technologies, Vendor Information, TQRS, Data Quality Assessments, Data Management Approach

◆ Supporting Information

- » Project Milestones, Dates of Work, Information Sources, Supporting Documents, Points of Contact

Current Projects in Profile System

Full Triad Projects

1. Cos Cob, CT, EPA
2. Marino Brothers, PA, EPA
3. Assunpink, NJ, EPA
4. Ross Metals, TN, EPA
5. McCormick and Baxter, CA, EPA
6. East Palo Alto Pesticide, CA, USACE
7. Fort Lewis Ranges, WA, USACE

Partial Triad Projects

8. China Lake, CA, Navy
9. Ross Incinerator, SD, EPA

No. of profiles by Agency

EPA - 6

USACE - 2

Navy - 1

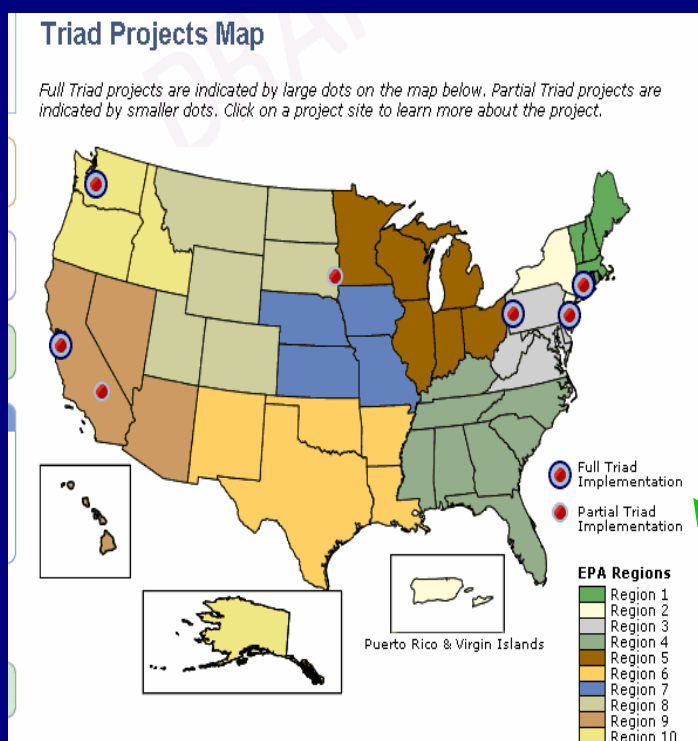
Profiles to be added soon

◆ Full Triad Projects

1. East Gate Characterization, WA, USACE
2. East Gate In Situ Thermal Monitoring, WA, USACE
3. Vint Hill, VA, USACE
4. Camp Pendleton, MD, Navy
5. Seymour Johnson AFB - AOC 33, NC, AF
6. ANL NORM Brownfields Site, MI, DOE

Accessing Profiles

- ◆ Profiles can be accessed with a search engine as well as location map



Triad Resource Center
TRIAD: A SMARTER SOLUTION TO SITE CLEANUP

Home > User Experiences > Triad Project Profiles

Triad Project Profiles

Browse the list of projects

Search Project Profiles (9 profiles)

Words or Phrases <input type="text"/>	Project Lead Type DOE Lead EPA Lead Insurance/Due Diligence
Contaminant <input type="text"/>	Technology Category Direct-Push Analytical Systems Direct-Push Geotechnical Sensors Direct-Push Groundwater Samplers
Media Acid Mine Drainage Air Particulates and Aerosols Debris (Buildings, Structures, or Equipm)	Site State Alabama Alaska Arizona
Site Type Agriculture Applications Cable and Wire Manufacturer Defense research and training installer	Site Name 791/005, 055 and 072 Runnymede Street Assunpink Creek Greenway Project - Cre Evergreen Former Infiltration Range
Remedial Phase Cleanup Design or Implementation Site Assessment (Includes ASTM Phase 1 Site Close-Out or Long-Term Monitoring	<input type="button" value="Search"/>

Full and Partial Triad Projects are identified on map of US

Full Triad Profiles and Application Examples

Expedited Characterization of Petroleum Constituents and Polychlorinated Biphenyls Using Test Kits and Mobile Laboratory Gas Chromatography at Former Cos Cob Power Plant, Greenwich, CT

1. [Site Information](#)
2. [Project Information](#)
3. [Triad Approach Information](#)
4. [Supporting Information](#)

Triad Elements Used

- Systematic Planning
- Real-Time Measurements
- Dynamic Work Strategies

At-a-Glance

- Thorough characterization of multiple contaminants in soil in a single mobilization of less than one week
- Development and application of field-based action levels for use with test kits
- Collaborative use of field-based methods and laboratory methods to manage sampling and analytical uncertainty

Summary

In the Fall of 2002, EPA Region 1 requested the assistance of the EPA Brownfields Technology Support Center (BTSC) in developing a strategy for site characterization and reuse. The BTSC assisted Region 1 with systematic planning for the Site, revising the existing Targeted Brownfields Assessment (TBA) Work Plan to incorporate the Triad approach. Following approval of the revised TBA Work Plan in December 2002, a field investigation was conducted over the course of one week in February 2003 that effectively characterized the Site for all constituents of concern. Because the investigation revealed widespread contamination in soils at the Site, the project team quickly

Full Triad



12/9/2004

Systematic Planning and Conceptual Site Model Case Study Basewide Hydrogeologic Characterization Naval Air Weapons Station (NAWS) China Lake Ridgecrest, California

1. [Site Information](#)
2. [Project Information](#)
3. [Triad Approach Information](#)
4. [Supporting Information](#)

Triad Elements Used

- Systematic Planning

At-a-Glance

- A detailed, basewide conceptual site model (CSM) was built for use as a decision making tool to support the investigation of over 300 sites and areas of concern (AOCs) addressed under the Installation Restoration Program (IRP) at NAWS China Lake
- The study used isotope geochemistry and other in-depth hydrogeologic investigation techniques to assess the groundwater pathway to potential receptors near the base
- The study clarified which sites and AOCs pose the greatest risk to surrounding receptors based on their location at the base, and which sites should be considered for no further action for the groundwater pathway
- The cost savings using this approach are estimated at 50% over traditional methods involving the construction of discrete CSMs for specific sites

Summary

The China Lake CSM was built as a decision making tool during the BHC. The construction of the CSM resulted in a better understanding of the geology and hydrogeology beneath NAWS China Lake and the surrounding region. The CSM facilitated decision-making during investigations of specific sites at the base, emission fate and transport evaluations and risk assessments with less need for site-specific

Partial Triad

Triad Profiles Website Preview

The screenshot shows a Microsoft Internet Explorer browser window displaying the Triad Resource Center website. The browser's address bar shows the URL <http://www.triadcentral.org/index.cfm>. The website features a navigation menu with tabs for Triad Overview, Triad Management, Regulatory Information, Technical Components, User Experiences, and Reference/Resources. A search bar is located at the top right. The main content area includes a logo for the Triad approach, which consists of three interconnected triangles labeled Systematic Planning, Dynamic Work Strategies, and Real-Time Measurements. Below the logo is a quote from Joseph Seebode, Assistant Commissioner for Site Remediation and Waste Management at the New Jersey Department of Environmental Protection. The main text describes the Triad as an innovative approach to decision-making for hazardous waste site characterization and remediation. A list of links is provided for Triad Overview, Triad Management, Regulatory Information, Technical Components, and User Experiences. On the right side, there are sections for a subscription form, a glossary, acronyms, frequently asked questions, and options to email the page or print it.

Triad Resource Center
TRIAD: A SMARTER SOLUTION TO SITE CLEANUP

The Triad is an innovative approach to decision making for hazardous waste site characterization and remediation. The Triad approach proactively exploits new characterization and treatment tools, using work strategies developed by innovative and successful site professionals. The Triad Resource Center provides the information hazardous waste site managers and cleanup practitioners need to implement the Triad effectively.

"The NJDEP supports and encourages the use of the Triad for sites undergoing investigation and remediation within the Site Remediation and Waste Management Program where feasible."

*Joseph Seebode
New Jersey Department of Environmental Protection
Assistant Commissioner for Site Remediation and Waste Management*

- Triad Overview**
Introduction to Triad key concepts, guiding principles, and benefits
- Triad Management**
Triad vs. traditional, cost estimation, procurement, QA/QC, logistics and implementation, and other management concerns
- Regulatory Information**
Legal defensibility, relationship to DQO process, QA/QC, and other regulatory issues
- Technical Components**
Triad and cleanup programs, systematic planning, dynamic work plans, real-time measurements, and other technical information
- User Experiences**
Triad projects map, case studies, and lessons learned

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Glossary Search and browse definitions

Acronyms ABC Search and browse acronyms

? Frequently Asked Questions

E-mail this page

Printable version

Solicit More Profiles

- ◆ We are actively seeking additional projects for profiles.
- ◆ Contractor support is available to assist in the creation of a profile.
- ◆ What to do if you have a project in mind for a profile?
 - » **Complete the Triad Project Profile form (Available on CDrom or by email – balent.jean@epa.gov)**

Other Potential Profiles

- ◆ Calloway Drum Recycling, FL, EPA
- ◆ City of Newark, NJ, EPA
- ◆ ChevronTexaco RCRA site, TX, EPA
- ◆ Moses Lake, WA, USACE
- ◆ Wenatchee Tree Fruit, WA, USACE
- ◆ McGuire, NJ, AF
- ◆ China Lake IR Program - Site 70b, CA, EPA
- ◆ Camilla Wood Site, GA, EPA
- ◆ Texarkana Wood, EPA
- ◆ North Cavalcade Wood, EPA
- ◆ Wasatch Chemical Site, UT, EPA
- ◆ RFETS, CO, EPA
- ◆ Pueblo Chemical Depot, CO, EPA
- ◆ Piazza Road Superfund Site, MO, EPA
- ◆ Bethlehem Steel, PA, EPA
- ◆ Bluffton, SC, EPA
- ◆ Milltown, NJ, EPA
- ◆ Minerec, AZ, EPA
- ◆ Poudre River, CO, EPA
- ◆ Essex Shipbuilding Museum, MA, EPA
- ◆ Greene Tannery, NH, EPA
- ◆ Hanscom Air Force Base, MA, EPA
- ◆ Loring Air Force Base, ME, EPA
- ◆ Marine Corps Air Station Tustin, CA, EPA
- ◆ Ulrichsville Site, OH, EPA
- ◆ East Palo Alto Bay Road, CA, USACE
- ◆ Hamilton Road Impact Area, WA, USACE
- ◆ Harshaw Chemical, OH, USACE
- ◆ Rattlesnake Creek, NY, USACE
- ◆ Umatilla Chemical Depot, OR, USACE
- ◆ Hill Air Force Base, UT, AF
- ◆ DOE ASAP Sites, DOE
- ◆ Allen Harbor Landfill, RI, EPA
- ◆ Ambargis Mill, NH, EPA
- ◆ Adak PCB Sites, AK, EPA
- ◆ PremCor - Hartford, IL, EPA
- ◆ Ridge Fertilizer, FL, EPA
- ◆ Ottawa Flat Glass Site, EPA
- ◆ Adak PCB Sites, AK, EPA

Thank you!

For more information

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