Workforce Training Program Overview

Reforming Electric Energy Systems
Curriculum Workshop
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The Workforce Training Program Facilitates:

- Development of a trained and skilled workforce
- Implementation of a national clean-energy smart grid
- Providing the next generation of skilled technicians, engineers, and managers for the electric power industry
Three Topic areas:

**Topic A:** Developing and Enhancing Workforce Training Programs for the Electric Power Sector

**STEPS:** Strategic Training and Education in Power Systems

**Topic B:** Smart Grid Workforce Training
Topic A: Developing and Enhancing Workforce Training Programs:

• Provides new strategies and programs for industry.

• Addresses the entire electricity delivery system:
  • Transmission
  • Distribution
  • Electrical equipment manufacturing
STEPS: Strategic Training and Education in Power Systems

• Supports Colleges and Universities in developing new curricula.
• Addresses building, operating, and maintaining a modern electricity system.
• Courses target
  • Power electronics
  • Information and communications technologies
  • Policy
  • Economics
Topic B: Smart Grid Workforce Training

- Targets power sector personnel directly related to smart grid.
- Increases workforce capacity and capability of electric power companies and smart grid technology manufacturers.
- Addresses skills shortages in a variety of power sector disciplines.
Goals/Objectives:

- Raise awareness and interest in careers in electric utilities
- Address predicted employment needs due to worker retirement
- Provide training
  - Demand energy response
  - Distributed Generation
  - Energy Utilization/Optimization
  - Cost Simulations
- Train professionals at all levels of utility hierarchy.
- Promote excellence in electric power education and research.
- Develop outreach activities to ignite public interest in smart grid technology.
Benefits:

- Up to 175,000 technicians, staff, and management positions filled with qualified personnel.
- Skilled workforce educated in energy conservation and renewable energy.
- Increased investment in advanced laboratory equipment, faculty development, and academic research.
- Increased skills and pay rates for technicians and displaced workers.
- Increased awareness of cyber security issues.
- Support for the development of a technical class capable of maintaining the next generation of smart grid technologies.
Workforce Training Program Timeline:

• The solicitation was issued on 9/21/2009

• Agreements were awarded between April 2010 and September 30, 2010.

• All projects are not to exceed 3 years; making a targeted project end date of September 2013.
Workforce Training Program Statistics:

Total Awards: 52 awards

Total Dollar Amount of Awards: $98,927,504

Topic A: 22 awards Totaling $13,849,875

Topic B: 19 awards totaling $54,820,263

STEPS: 11 awards totaling $27,646,317
Workforce Development Training Projects
Topic A and STEPS

Number of Projects in State

1 2
Topic B

Number of Projects in State
1 2 3
Overall Status:

Phase 1:

• Completion of Benefits and Metrics Plan
• Completion of Project Management Plan.

Phase 2:

• Project Task Implementation

• As of the 1/31/11, 45 of the 52 projects had proceeded to Phase 2.
• The project scopes and objectives vary and have unique milestones and implementation schedules.
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