

Certified Demand Side Manager Detailed Course

Course Details

- Date: January 14 - 17, 2019 (Training 1/14 - 1/16 ; Exam 1/17)
- Time: 8:00 A.M. - 5:00 P.M.
- Capacity: 20 attendees
- Provider: Association of Energy Engineers (AEE)

Estimate Enrollment Fee

In-House @ SCPPA

- \$1,990/per attendee (minimum 12 attendees), or
- \$1,920/ per attendee (assuming 20 attendees)

Course Overview

This program offers a powerful training and career-enhancing opportunity for those who are responsible for developing, designing, implementing, managing or administering Demand Side Management (DSM), Demand Response (DR) and Load Management programs. The following professionals will especially benefit from attending this training and certification preparatory seminar:

- DSM Program Managers / Administrators / Coordinators
- Utility Regulatory Team Members
- DSM Analysts
- Regulatory Specialists
- State or Public Regulators
- Public Purpose Program Administrators
- Conservation and Energy Efficiency Analysts
- Utility DSM Program Administrators / Coordinators
- Resource Managers
- DSM Program Inspection Analysts
- DSM Program Design Analysts
- DSM Program Impact Engineers/Analysts
- DSM Consultants and Vendors

The CDSM program provides a comprehensive understanding of all of the necessary components that will be required to successfully offer, facilitate and then ultimately retire a DSM or DR program. The course starts at understanding the history of DSM and DR all the way to wrapping up the course with a four-hour hands-on workshop where the participants, working in Teams guided by the instructor, will develop and initiate a DSM or DR program, along with making modifications to the programs.

As more and more DSM and DR programs are being implemented by utilities, states and government entities, having a comprehensive and broad understanding of all of the critical facets of such programs is vital for those involved in directing, managing, administering, and supporting them.

The main sessions of the course include:

- Understanding the history and drivers behind DSM and DR programs
- How to plan for and financially evaluate and justify DSM and DR programs
- Understanding all the cost-effectiveness tests including viewpoints, inputs, and calculations
- Designing and implementing new DSM and DR programs and pitfalls to avoid ensuring their ongoing cost effectiveness
- Managing the DSM and DR program through the programs life
- Verifying and reporting DSM and DR programs benefits for meeting customer, as well as regulatory requirements
- Exploring potential future DSM and DR programs
- Developing and modifying a DSM or DR program through an in-depth case study/working session

Course Agenda

Day 1 - AM:

Welcome and Introductions

Introduction to the Program

- Purpose of the course
- Eligibility requirements
- Purposes and benefits of DSM

The History of Demand Side Management (DSM)

- Definition of DSM
- DSM benefits
- History of DSM programs
 - Legislation
 - Federal Acts
 - Energy Policy Acts
- Driving factors for DSM programs
- Purchase power impacts
- DSM program types
 - DSM load shapes
 - Energy savings only
 - Energy and demand savings
 - Demand savings only

- Load curtailment
- Demand response
- Economic/incentive demand response
- Customer, utility, contractor perspectives of DSM programs

Day 1 - PM:

Planning DSM Programs

- Financial terms
- DSM programs fundamental evaluation formula
- Net present value and present value with interest tables
- DSM Program Validation
 - Pros/cons
 - What's included, what's not
 - Case study
- Methods of evaluation
 - Total Resource Cost (TRC)
 - Rate impact test (RIM)
 - Participant Test
 - Program administration test
- Acceptable data and precautions
- Data input needs and analysis
- Characteristics of programs
- Rate making methodology
- Rates and DSM
- Balancing the program with other corporate goals
- Utility revenue (coupled and decoupled)
- Pit falls of some, how it may be a double negative

Day 2 - AM:

Designing DSM Programs

- What information is required to design an effective program?
- Consideration prior to design
- DSM design process
- Steps of the design process
- Measures and baseline determination
- Technical potential data
- Sensitivities
- Design process information needs
- Participation
- Free riders and paid non-participants
- Greenhouse gas emissions (determining, valuing)
- Portfolio standard impacts
- Determining the rebate/incentive

- Making the program manageable and steering clear of potential issues
- Outsourcing DSM programs

Implementing DSM Programs

- Key stakeholders involved
- Filing Strategies
- Understanding the filing process
- Responsibilities of the Utility versus the PSC/PUC
- Implementation process
- Program policies and documentation
- Compliance and program integrity
- Communication and marketing
- Communication with stakeholders
- Use of Contractors
 - When to use
 - When not to
- RFP's and contracts
- Technology

Day 2 - PM:

Managing the Operation of DSM Programs

- Managing DSM programs
- Maturity roadmap
- Effective engagement and oversight
- Overcoming and preventing pitfalls in program operation
- Program trending for program adjustments, changes, retirement
- Data and analysis for trending
- Effective planning/trending

Verification and Analysis of DSM Programs

- Purpose and types of measurement and verification (M&V)
- Steps in M&V
- Technology and test equipment supporting M&V
- M&V advice on monitoring programs
- Cautions when performing M&V
- Types of M&V
 - Initial M&V
 - Ongoing M&V
 - Need for consistency
 - Duplicable M&V
- Measuring program effectiveness
- Effective reporting metrics and responses to audits
- Interrogatory response strategies

Day 3 - AM:

Future DSM Programs

- DSM changers
- Utility revenue
- Market structure and deregulation
- Local and regional changers
- Environmental
- Building codes
- Economy
- Smart grid and technology
- Consumer
- Balancing generation and renewables
- Energy security

Program Review

- Planning
- Designing
- Implementing
- Managing
- Analysis
- Adjusting

Day 3 – PM:

Case study/working session of a DSM Program

In-depth working session on taking a required/desired DSM program from the initial inception of the idea through implementation to the analysis of the programs participation and one future adjustment consideration

Exam Review

Day 4 – AM:

Certification Exam – 4 hours (120 questions)