

FORM FOR SCORING OF TRAINING RESOURCE TO FULFILL FEDERAL BUILDING PERSONNEL TRAINING ACT (FBPTA) CORE COMPETENCIES

The FBPTA requires Federal building personnel to demonstrate compliance with a set of Core Competencies. The General Services Administration (GSA) accepts submissions for courses, certificates, certifications, accreditations, registrations, licenses, and other qualifications that demonstrate alignment with the FBPTA Core Competencies. GSA will post resources that sufficiently map to FBPTA Core Competency requirements on the FMI webpage (www.fmi.gov) and may incorporate them into the Core Competency Web Tool. The Web Tool allows Federal buildings personnel to immediately claim credit for competencies met by completing approved training. FMI and the Core Competency Web Tool help Federal employees identify appropriate training, and allow Federal agencies to share information on training sources. To qualify for consideration, submitters complete this form describing how a specific training resource, certification / accreditation, license or other resource aligns with FBPTA core competencies through AskFMI@gsa.gov.

Initial Review Conducted By: Maria Fara

Initial Review Submission Completion Date: December 9, 2013

Technical Review Conducted By: Conrad Kelso

Technical Review Submission Completion Date: December 19, 2013

Alignment of Competency with Functional Roles

- Often Aligned with Facility Management roles (24/43 Core Competencies)
- Often Aligned with Building Operations Professional roles (6/43 Core Competencies)
- Often Aligned with Energy Management Role (7/43 Core Competencies)
- Often Aligned with more than one role (6/43 Core Competencies)

1. Please complete the following for each training course submitted for consideration:

Training provider: **Department of Energy: Federal Energy Management Program (FEMP)**

Provider address information (primary physical location, including address, city, state, zip code): **Department of Energy, Federal Energy Management Program, 5E-089, Forestal Building, 1000 Independence Avenue, Washington, D.C. 20585**

Provider's primary point of contact for this learning resource (name, primary physical location (if different from provider address information), phone, and email): **Beverly Dyer 202-586-7241, beverly.dyer@ee.doe.gov.**

Title of this training resource: **FEMP01:Commissioning of an Existing Federal Facility**

Type of training course: **web-based training**

Does this course provide CEUs (Continuing Education Units) and if so, how many and for what occupation or field? **CEUs are offered as follows: American Institute of Architects offers 4.5 Continuing Education Hours, the Green Building Certification Institute offers 4.5 Continuing Education Hours, and FEMP offers .50 CEUs for this course.**

Learning objective(s) associated with this training course: **The objectives:**

- By completing this course, you will have the skills to manage a commissioning process for an existing federal building including:
 - considering the expertise needed to lead the commissioning activity or to supplement in-house capabilities
 - determining which systems will be commissioned or whether whole-building commissioning will be employed
 - planning for the commissioning activity including key data collection, an effective kick-off meeting, and a targeted written plan
 - conducting the commissioning activity including functional performance testing, diagnostic monitoring, observation, and group and individual interviews
 - developing the master list of findings, prioritizing those findings for implementation, and employing persistence strategies once improvement strategies are completed.

Delivery method and learning methods (delivery methods may include online instruction, classroom instruction, or other means, and learning methods could include lecture, group work, essay work, quizzes, or other learning activities): **This is a web-based training course divided into 6 learning modules. Methods of instruction include use of advance organizers and review at the end of each module, short video lectures by an expert instructor, narrated information supported by visual reinforcement, interactive exercises, visual displays of information supported by roll-over text, links to more in-depth information, etc.**

Length of training (in hours): **varies by learner, but approximately 5 hours.**

URL link to information about the training course, content, and/or syllabus: **http://www.wbdg.org/education/femp01.php**

2. Review the course objective(s) that have been submitted as being aligned with required FBPTA performance criteria. Review the learning methods in the course that will support that learning objective(s).

FBPTA Core Competency Area	FBPTA Core Competency	Required FBPTA performance criteria	Based on technical review of learning objectives and skills, does this resource map to the performance criteria?	Initial Review: Are all submission requirements included?	Initial Review: Are descriptions clear and logical?	Initial Review: Are all materials referenced included with the submission?	Technical Review: Learning Objectives Reviewed	Technical Review: Skills Reviewed	Technical Review: Are there any clarifications requested?	If clarification requested, note here	Clarification Response From Provider	Technical Review: Identify other materials submitted	Technical Review: Other Materials Reviewed
1. Management of Facilities O&M	1.1 Management of Building Systems	1.1.6. Demonstrate ability to monitor and evaluate how well building systems perform.	Yes, based on the review of the learning objectives and the skills/materials covered, the topics listed should include demonstrate ability to monitor and evaluate how well building systems perform	Yes	Yes	Yes	Yes	Yes	No			Course material provided in the link	Yes
2. Performance of Facilities O&M	2.1. Operating and Maintaining HVAC Systems	2.1.1. Demonstrate ability to collect Operating Data on system.	Yes, based on the review of the learning objectives and the skills/materials covered, the topics listed should include demonstrate ability to collect operating data on system.	Yes	Yes	Yes	Yes	Yes	No			Course material provided in the link	Yes
2. Performance of Facilities O&M	2.5. Best Practices and Innovation	2.5.4. Demonstrate knowledge of ALL types of commissioning, and what is required in the Energy Independence and Security Act 2007 (EISA), FEMP O&M Best Practices Release 3.0 pg. 7.1 AND EISA SEC 432.	Yes, based on the review of the learning objectives and the skills/materials covered, the course should cover the knowledge of ALL types of commissioning, and what is required in the Energy Independence and Security Act 2007 (EISA), FEMP O&M Best Practices Release 3.0 pg. 7.1 AND EISA SEC 432.	Yes	Yes	Yes	Yes	Yes	Yes	It is not clear that the six modules addresses demonstrate knowledge of ALL types of commissioning, and what is required in the Energy Independence and Security Act 2007 (EISA), FEMP O&M Best Practices Release 3.0 pg 7.1 nor facilities benchmarking as required in EISA SEC 432: Federal Facility Management and Benchmarking Requirements. Request clarification and course content relevant to All types of commissioning, and what is required in the Energy Independence and Security Act 2007 (EISA)	As far as EISA 2007 and commissioning, EISA 2007 requires that an energy audit be conducted every 4 years. If it's warranted and economically feasible, one of the many ECM's developed from the audit would be to conduct commissioning of a system or even of the whole building, as appropriate. Therefore, these legislative requirements are covered in FEMP's energy audit course rather than this course. The concept of "value commissioning" is thoroughly covered in this course. FEMP believes that we have met all the concepts of EISA 2007 and FEMP O&M best practices in this course.	Course material provided in the link	Yes

3. Technology	3.2. Building Automation Systems (BAS)	3.2.3. Demonstrate ability to conduct trouble-shooting procedures at the equipment, system, and building levels.	Yes, based on the review of the learning objectives and the skills/materials covered, the ability to conduct trouble-shooting procedures at the equipment, system, and building levels.	Yes	Yes	Yes	Yes	Yes	Yes	Course does not appear to address "demonstrate ability to conduct trouble-shooting procedures at the equipment, system, and building level".	The purpose of commissioning is to perform in-depth functional performance testing and diagnostic monitoring to diagnose and address efficiency and maintenance issues with equipment, systems, and buildings and is thus a key trouble shooting procedure.	Course material provided in the link	Yes
4. Energy Management	4.1. Systems and Demand Reduction	4.1.1. Demonstrate knowledge of building systems and how they affect energy use	No, based on review of the learning objectives, skills/material covered, and the response from the provider, the course does not demonstrate knowledge of building systems and how they affect energy use. Although an end result of commissioning is improved energy efficiency, the course does not meet the full intent of the performance criteria.	Yes	Yes	Yes	Yes	Yes	Yes	It is not clear that the six modules address "demonstrate knowledge of building systems and how they affect energy use". Specifically, how does each building system affect total energy use and potential interactions between building systems. Request clarification and course content relevant to how building systems affect energy use.	The focus of Module 2, beginning with Screen 7, is understanding common issues with energy using equipment, building automation systems, and interactions among systems so that commissioning will be focused on improving energy efficiency. The purpose of commissioning is to better understand energy use and improve energy efficiency.	Course material provided in the link	Yes
	4.3. Commissioning and Energy Savings Performance Contracts (ESPC)	4.3.1. Demonstrate knowledge of all types of Commissioning, the differences between them, and commissioning requirements in laws and Executive Orders.	Yes, based on the review of the learning objectives and the skills/materials covered, the course should cover the knowledge of ALL types of commissioning, the differences between them, and commissioning requirements in laws and Executive Orders.	Yes	Yes	Yes	Yes	Yes	Yes	Course does not clearly address all types of commissioning (for example Value Recommissioning), differences between commissioning types, or commissioning requirements in laws and Executive Orders.	As far as EISA 2007 and commissioning, EISA 2007 only requires that an energy audit be conducted every 4 years, and if it's warranted and economically feasible, one of the many ECM's developed from that audit would be to conduct commissioning of a system or even of the whole building, as appropriate. Therefore, these legislative requirements are covered in FEMP's energy audit course rather than this course. There are no known commissioning requirements in Executive Orders. As far as Value Commissioning, the term "value recommissioning" is not recognized industry-wide by commissioning professionals and associations, so it is not used in this course. However, the concept of lower-cost, modest scale commissioning (e.g. value commissioning) is well covered in this course. FEMP believes that we have met all the concepts of EISA 2007 and FEMP O&M best practices in this course. The focus of this course is retro-commissioning for existing buildings rather than all types of commissioning. However, Module 1 identifies the various types of commissioning and their appropriate uses.	Course material provided in the link	Yes
	4.3. Commissioning and Energy Savings Performance Contracts (ESPC)	4.3.2. Demonstrate knowledge of commissioning requirements for measurement and verification, phasing, and commission agent duties.	Yes, based on the review of the learning objectives and the skills/materials covered, the course should cover knowledge of commissioning requirements for measurement and verification, phasing, and commission agent duties.	Yes	Yes	Yes	Yes	Yes	Yes	It is not clear that the six modules address "demonstrate knowledge of commissioning requirements for measurement and verification, phasing, and commission agent duties". Specifically, what are the duties of a commissioning agent. Request clarification and course content relevant to commissioning agent duties, role, qualifications, and expectations.	The role/duties/selection of a commissioning agent are discussed in detail in Module 3, Screens 12-16. Measurement and Verification (M&V) is discussed throughout the course. For example, see Module 3: Screen 19, Module 5: Screens 6, 9, 10, 18, and Module 6: Screen 5. The course is built around the phases of commissioning. See Module 4: Screen 3 for the overview.	Course material provided	Yes