

**Revised List of Evaluation Projects
For the
Contract Period 2003 through 2005**

March 5, 2004

I. Introduction

This document contains the revised list of the Public Service Department's evaluation projects for the state's Energy Efficiency Utility¹ (EEU) during the current contract cycle (2003-2005). The projects listed reflect input from the Public Service Board and Efficiency Vermont. The revisions made it necessary to combine and redefine the scope of several evaluation projects listed in the original plan and as a result the revised plan only contains four projects as compared to ten the original plan. The first project listed in this current plan is a scoping study to determine the specific scope of issues that need to be addressed in projects 2 & 3. The request for proposals (RFP) for the fourth project, which involves assessing the EEU's performance, has already been issued. Projects listed as 8 through 10 in the original evaluation plan have been excluded in this current plan pending further discussions with the Public Service Board.

II. Evaluation Projects

1. Scoping Study

The purpose of this study is to identify the specific scope of evaluation projects 2 & 3, recommend an efficient evaluation implementation structure, and to assist in writing the request for proposals for those projects. This study will need to be complete in a very short time frame because the other RFP's cannot be issued until this scoping study is complete. The scoping study will include the following tasks:

- Review all the previous EEU evaluation studies to specifically identify the all the key residential and commercial and industrial market indicators that need to be addressed in this evaluation cycle.
- List potential options that address methods to track market indicators on an ongoing basis
- List potential options that address methods to conduct a statewide appliance saturation survey. This would include a method to track the penetration of energy star appliances
- List potential options on how to track commercial and industrial new construction activity including remodeling and renovations.
- Assist in refining the scope and cost estimates and with writing the RFP's of projects 2 & 3.

Timeframe:

Issue RFP	3/12/04
Receive Proposals	3/31/04
Award Contract	4/15/04
Project Complete	5/28/04

Budget \$40,000

2. Commercial and Industrial Market Impacts & Research Strategic Market Assessment

The scope of this project will include:

- Update key market indicators needed to assess market impacts as identified in the scoping study
- Update C&I equipment baselines
- Update C&I new construction baseline

¹The term Energy Efficiency Utility ("EEU") refers to EVT activities and BED core DSM activities.

- Develop baseline for multifamily new construction and determine size of market
- Recommend a methodology to determine size of C&I new construction market on an ongoing basis and method to track it on an ongoing basis
- Assessment of availability, stocking and distribution chain for high efficiency equipment and recommendations on how EVT could effectively intervene to encourage improvement
- Assessment of design and installation practices for lighting HVAC and recommendations on how EVT could effectively intervene to encourage improvement.
- Research on Non-Participation
 - This task will involve conducting research on specific and/or groups of commercial and industrial customers identified in the scoping study that are not fully using EVT's services and determine why. The study will then make recommendations on how the EVT could modify its services to increase participation. This task will also rely on research already conducted by EVT on this issue.
- Develop case studies that take a close look at a variety of specific projects in the C&I sector to highlight new technologies or new applications of existing technologies and to investigate measure performance and savings levels for specific applications. This type of information should be useful to other companies, as well as for energy planning purposes for the Department, EVT and the state's electric utilities.

Timeframe:

Issue RFP	6/15/04
Receive Proposals	7/15/04
Award Contract	7/30/04
Project Complete	12/30/04

Budget \$375,000

3. *Residential Market Impacts & Research Strategic Market Assessment*

The scope of this project will include:

- Residential lighting usage and characteristics
 - The original plan had hope that this project would be able to take advantage of studies conducted in other states. However, there have not been many studies conducted recently so more primary research will be necessary than first thought. One such research task may include partnering with Massachusetts utilities in a lighting logger study that is to be conducted in 2004. An issue that definitely needs to be addressed are how compact fluorescents are being used by customers that are large volume participants in the rebate program.
- Refrigerator life expectancy
 - This task will rely on literature review of past studies.
- Appliance Saturation Survey
 - An appliance saturation survey will provide information on how many Vermont households currently have different appliances and the penetration of Energy Star appliances. The result will be useful for resource planning as well as better characterizing the residential appliance market.
- Appliance Sales Data Survey
 - This study will provide information to better understand changing trends in sales of energy start appliances. The appliance sales data study will need to take into account purchases by Vermonters in adjacent states. Since this survey and the appliance saturation survey could benefit these other parties, the possibility of performing a joint study will be investigated. If other parties were to agree to a

joint study the amount budgeted for this activity could be reduced because other participants would help co-fund the effort.

- Update Residential new construction baseline
- Research on Non-Participation

This task will involve conducting research on specific and/or groups of residential customers identified in the scoping study that are not using these services and determine why they are not participating. One group that has will definitely be addressed is homebuilders. The study will then make recommendations on how the EVT could modify its services to increase participation. This task will also rely on research already conducted by EVT on this issue.

Timeframe:

Issue RFP	6/15/04
Receive Proposals	7/30/04
Award Contract	8/15/04
Project Complete	1/30/05

Budget \$375,000

4. Annual Savings Verification and Assessment of Minimum Performance Standards and Performance Awards Indicators

The Department will continue to conduct its annual verification of EVT's savings. This process includes ongoing input into EVT's savings assumptions, feedback to EVT on savings claimed from custom projects, review of EVT's measure-level savings in its central database, review of other analysis tools, and comparison of savings to billing history. While most of the work is performed during the two months between the submittal of EVT's annual report and the Contract Administrator's verification report, ongoing review and feedback occurs throughout the year.

The verification results will be used in association with other data to assess whether EVT has met its minimum performance standards and performance awards indicators in accordance with the formulas established in EVT current contract with the Board.

Timeframe:

Issue RFP	2/17/04
Receive Proposals	3/12/04
Award Contract	4/4/04
Project Complete	12/1/04

Budget \$150,000

Summary of Evaluation Projects & Budgets

Evaluation Project	Budget	Schedule	
1. Scoping Study	\$40,000	Issue RFP Receive Proposal Award Contract Project Complete	3/12/04 3/31/04 4/15/04 5/28/04
2. Commercial and Industrial Market Impacts & Research Strategic Market Assessment	\$375,000	Issue RFP Receive Proposal Award Contract Project Complete	6/15/04 7/15/04 7/30/04 12/30/04
3. Residential Market Impacts & Research Strategic Market Assessment	\$375,000	Issue RFP Receive Proposal Award Contract Project Complete	6/30/04 7/30/04 8/15/04 1/30/05
4. Annual Savings Verification and Assessment of Minimum Performance Standards and Performance Awards Indicators	\$150,000	Issue RFP Receive Proposal Award Contract Project Complete	2/17/04 3/12/04 4/4/04 12/1/04
Evaluation Consultant/Quality Control	\$50,000		
Evaluation Project Management	\$70,000		
Total Expenditures & Encumbrances	\$375,709		
Unallocated Funds	\$139,199		
Total Budget	\$1,574,908		