



Building  
Performance  
Institute, Inc.

California Energy Commission  
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Via email to: [docket@energy.ca.gov](mailto:docket@energy.ca.gov); Docket number 12-HERS-1 "Regulation of Home Energy Rating Programs for Residential Dwellings"

**RE: Building Performance Institute Comments on Regulation of Home Energy Rating Programs for Residential Dwellings**

Docket 12-HERS-1  
California Energy Commission

Thank you for the opportunity to comment on the Regulation of Home Energy Rating (HERS) Programs for Residential Dwellings and the associated workshop. The California Energy Commission (CEC) held a public workshop on Informational Proceeding to Improve the HERS Program (March 6, 2013) and invited public responses to a set of questions regarding different aspects of the California HERS Program. BPI appreciates this opportunity to comment and we look forward to ongoing participation in the improvement of the HERS QA and Certification Program. We commend the Commission and Staff on the tremendous effort of promoting this open discussion.

BPI is the nation's premier building performance credentialing, quality assurance and standards setting organization. BPI develops technical standards using an open, transparent, consensus-based process built on sound building science, and is accredited as a standards developer by the American National Standards Institute, Inc. (ANSI). More than 150 programs across the U.S. rely on BPI standards and professional credentials as the foundation of their REE, carbon reduction, and weatherization activities including 52 Home Performance with ENERGY STAR® (HPwES) programs, manufacturer high performance programs and manufacturer commissioning.

BPI offers the following:

- national standards to ensure top quality, consistent protocols are being followed throughout the home performance and weatherization workforce including standards relating to Heating, Air Conditioning/Heat Pump, and Multifamily Boiler Operation;
- certification of individuals in building analyst, heating, air conditioning/heat pump, shell/envelope, multi-family, and manufactured housing designations;
- accreditation of contracting companies committed to delivering quality home performance improvements;
- quality assurance to verify conformance with BPI Standards and provide feedback for continuing improvement; and
- partnerships with testing organizations that deliver BPI services in their market.

BPI limits its response to certification and conflict of interest inherent in the quality assurance process and respectfully submits the following comments and recommendations.

The HERS provider system was originally created with an inherently flawed structure of vertically integrated conflict of interest, which has manifested over time. When all training, certification, registry, and quality assurance (QA) activities are embodied in one provider--no matter how well intentioned that provider is--the monopoly positions

itself for problems. Each provider is in a monopolistic position with regard to its raters. Add to that vertical integration the fact that the contractor directly selects and hires the HERS rater for specific projects, and the vertical chain of conflicted interest is complete. Contractor pays rater, therefore rater does not want to fail contractor. Rater pays provider for training and certification. Provider gets paid for registry entries completed by the rater. Provider does not want to reduce rater's productivity or take any actions that would bring into question the technical skills of the people they train and certify. The providers are not in an appropriate place to provide QA on their own raters. When asked by Commissioner McAllister if he had ever disciplined or decertified a rater for technical reasons, Mike Bachand of CalCERTS answered "No". Of course not, to do so would reflect poorly on CalCERTS training. No other provider would likely react differently. Ethical considerations are not well categorized for discipline, relying on personal judgment, by the same people that trained the rater. Again, it reflects on the screening and training process of the provider. The provider is inherently limited in its ability to provide effective, let alone cost-effective QA on its own sources of income.

To have different results, different strategies must be applied. A clear separation between trainer and certifying body is necessary. A clear separation between rater and QA provider is necessary. A separation of training from the other processes would lend credibility while reducing the likelihood for conflict of interest that can result from a situation where the trainer is vested in the skill of the candidate they test and for whom they ultimately provide QA. Opening the training process to a wide variety of training organizations, including community colleges, non-profits, and for-profits with a proper application process would separate training. Allow the providers to offer the certification exams and maintain the registry. The QA process should be third-party, and could be funded with a small surcharge (similar to a systems benefit charge) on each rating entered into the registry and pooled by all providers to fund the QA mechanism.

QA will always have a positive impact on the customer experience if it is inherently conducive to integration in the ultimate business model of the contractors. To accomplish this, QA must be standardized, applying tested processes that have been developed with customer satisfaction in mind. The process can be implemented in an effective but minimally invasive QA, while enhancing the customer experience and promoting the professionalism of the contractors who properly follow the codes or standards they are expected to comply with. They can then determine how to integrate QA into their own business processes.

As a first rule, the customer experience is best safeguarded by revoking the right to participate in a program for contractors and raters that chronically do not comply with QA standards. The grounds for revocation must be clearly identified in advance. QA should never hold surprises. QA is simply part of a company Quality Management System (QMS) that integrates goals, processes and continual improvement. Customer Focus is the first principle of a QMS. This is true for manufacturers, utility customer services and government services as well as contractors and raters, whether or not they are part of an energy efficiency program. QMS considers the customer impact of all operations and ensures that operations have positive customer impact.

BPI offers QA services to programs through direct contracting, and directly to contractors through its Accredited Contractor program nationwide. BPI's guidance and "lessons learned" for providing QA that has a positive impact on customers – and contractors -- include the following.

- Conduct QA primarily through contractor documentation, verified by field audits.
- Limit on-site field audits (at customers' homes) for each contractor to 5% or less of completed (customer has been billed) home performance jobs.
- Schedule field audits in cooperation with contractors and only with ready acceptance by the customer, at a customer-convenient time.

- Simplify and integrate QA into the job with appropriate leave behinds, customer surveys via postcard, email, or phone, and potentially by encouraging customers to self-select for QA on-site visits.
- Convey in all customer communications that the audit, although independent, is part of the contractor's own quality assurance and continual improvement program.
- Do not convey any audit observations or conclusions regarding the audit to customers.
- Provide immediate feedback to contractors.
- Provide guidance to contractors regarding how to make QA a customer-positive part of an internal QMS.

BPI contractor accreditation offers standardized QA that aligns with these successful practices. BPI contractor accreditation is a nationally accepted approach that has been proven effective in multiple program environments, and has allowed programs to offer legitimate third-party QA through BPI without adding burdensome program costs, because of the accreditation structure which allows costs to be subsidized by programs or shared with contractors.

Because BPI can provide consistent QA and statewide program criteria, its methodology continues to be included in program design. BPI has been conducting QA in the NYSERDA program -- by far the largest program in the nation -- for more than a decade and provides nationwide coverage. There is no entity more experienced in providing quality assurance services. BPI QA at the rate of 5% on-site field audits on completed contractor jobs has shown impressive results. Although NYSERDA has an implementation contractor that does a statistical oversampling -- in essence "QA on the QA" -- no significant problems have been uncovered at the rate that QA is done by BPI. (California has no method of performing QA on the QA when implementation contractors are used.) The California HERS rating system would benefit from a proper QA methodology and plan, as well as from a true third-party QA provider.

The requirements for an effective QA program include:

- QA Protocols and Standards to be applied must be clear and documented for all parties (contractors, raters, and QA inspectors), so everyone is on the same page going in, and knows how to effectively explain the process and interact with the client.
- QA is tiered to provide adequate sampling at various levels of contractor skill and experience as well as rater skill and experience, including prior history, without overburdening the contractor or their customers, or interfering with the sales process.
- QA protocols are conducted as a statistical sampling of completed work to identify problem areas and provide guidance for continuous improvement. As statistical principles demonstrate, you will get better results from a smaller sampling that is done consistently and accurately, than if you attempt to sample the entire population and have inconsistent sampling protocols or poor data collection.

Thank you for your consideration of these recommendations. BPI is committed to a robust, national home performance program that supports both national and local objectives, while ensuring a viable contractor business model that provides persistent, sustainable results for programs and the homeowner.

Respectfully submitted,

Building Performance Institute

By: /s/ Tiger Adolf

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