Avista Corp.

1411 East Mission P.O. Box 3727 Spokane. Washington 99220-0500 Telephone 509-489-0500 Toll Free 800-727-9170



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David Danner
Executive Director
Washington Utilities & Transportation Commission
P. O. Box 47250
1300 S. Evergreen Park Drive S. W.
Olympia, Washington 98504-7250

Via Electronic Mail - records@utc.wa.gov

RE: Avista Comments in Docket No. U-090222 (Review of PURPA Standards in the Energy Independence and Security Act of 2007)

Dear Mr. Danner:

Avista hereby submits for electronic filing its comments regarding the Review of PURPA Standards in the Energy Independence and Security Act of 2007, Public Law 110-140 (EISA). Avista appreciates the opportunity to provide comments and to participate in the Commission's review of the standards. The Company's comments are responsive to the questions below, contained in the Commission's March 20, 2009 Notice of Opportunity to File Written Comments.

### Comments

## I. PURPA Standards for Electric Utilities

#### A. Integrated Resource Planning

1) Should the Commission, by rule, implement part B of PURPA Standard 16 establishing cost-effective energy efficiency as a priority resource?

Avista's Comments - Yes, subject to the successful establishment of a useful definition of the characteristics defining a priority resource. This definition should incorporate all of the factors that must, of necessity, be adjusted to allow for the direct comparison of traditional resources and energy efficiency resources. At a minimum, these should include transmission and distribution losses, the monetary utility cost of emission reduction or mitigation, the customer value of decreased portfolio volatility, and a valuation of reduced externality costs. To the extent that these cannot be adequately quantified, the Commission should deem a

placeholder value for purposes of resource selection and for energy efficiency acquisition cost-effectiveness.

# 2) What is a "priority resource"?

<u>Avista's Comments</u> - A priority resource would best be defined as a resource which should receive preferences above and beyond its reduction in commodity and related avoided costs. These preferences are directly related to well-defined measure benefits, many of which are difficult to quantify and therefore often omitted from the cost-effectiveness calculations.

The Total Resource Cost (TRC) test is generally the standard applied within the Integrated Resource Plan (IRP) process for performing the integration of generation and efficiency resources. This test incorporates the avoided cost of energy savings, reduced transmission and distribution line losses, reduced generation, transmission and distribution capacity requirements and customer non-energy benefits. Reductions in environmental externalities are not included except when they result in a monetary cost savings to the utility (though this benefit is included within the societal test). There is also generally no value incorporated within the cost-effectiveness test for the reduction in portfolio volatility resulting from the adoption of efficiency measures.

To the extent that these unrecognized benefits are regarded as consistent with public policy and can be quantified, they should be incorporated into the cost effectiveness analysis. Where they are unquantifiable, a deemed placeholder value could be applied to the priority resource, similar to the 10% adder that has often been applied to efficiency resources in the past. The end result of these modifications may be a cost-effectiveness test that does not fully comply with any particular currently recognized cost-effectiveness methodology.

Does the term "priority resource" differ in affect from the requirement to pursue all cost-effective conservation? If so, how?

<u>Avista's Comments</u> - It should be recognized that cost-effectiveness can be viewed from a variety of perspectives, e.g. participant, non-participant, utility, total resource and societal. Traditionally, the TRC perspective is applied within the IRP process, an approach which appropriately represents the obligation of the utility to represent the interest of their total ratepayer population. This does not preclude the desirability of taking into consideration factors which are either not incorporated into the TRC test, or those that are within the test but are difficult to quantify or therefore generally omitted from the calculation.

To the extent that all energy efficiency values that are considered desirable from a public policy perspective are quantifiable and within the cost-effectiveness test being applied, there would be no difference between designated priority resources and cost-effective efficiency resources. However, this is often not the case. The

priority resource designation is an opportunity to (1) deem avoided cost adders to represent the value of difficult to quantify efficiency benefits and (2) modify industry-standard cost-effectiveness calculations in such a way as to lead to a stacking of resources that best fit current public policy objectives.

4) If establishing energy efficiency as a priority resource requires the acquisition of energy efficiency in aggregate that is above the cost effectiveness threshold, would its establishment as a priority resource conflict with any existing policy established in state law statute or regulation?

<u>Avista's Comments</u> - To the extent that the definition of priority resources is representative of legitimate resource costs and benefits, the designation of priority resources and cost-effective resources would be in full alignment. It may be the case that the cost-effectiveness methodology established may differ from or be a hybridization of existing industry-standard methodologies.

5) If establishing energy efficiency as a priority resource does not mean pursuing additional energy efficiency above the cost effectiveness threshold, then how would it differ from current Commission regulation and policy?

<u>Avista's Comments</u> - Defining energy efficiency as a priority resource is an opportunity to further define the benefits to be incorporated into efficiency resource valuation and to provide deemed placeholder values for those benefits that utilities may find difficult to quantify.

# B. Rate Design and Modifications to Promote Energy Efficiency Investments (electric).

1) Are there modifications to current utility block electric rate designs that could promote conservation? How would such modifications be implemented in a rulemaking?

Avista's Comments - With regard to residential electric rates, Avista has had its present three-block inverted rate structure in effect in Washington since 1981. This rate structure also acts as a de-facto seasonal rate structure applying higher incremental usage rates for customers who utilize electric space heat or airconditioning. The Company believes that its present residential rate blocks are set about right – providing a strong price signal for customers utilizing electric heat or air-conditioning (over 1,300 kWhs), and also providing a price signal for increased use beyond a "base usage" level of 600 kWhs.

What are the implications for utility conservation efforts if the incremental cost of power is higher than the cost of power embedded in rates? Under such circumstances, what, if any, incentives should be considered to encourage a utility to promote conservation between rate cases?

<u>Avista's Comments</u> – A utility facing an avoided cost that is in excess of the retail rate would have an intra-rate case incentive to pursue energy-efficiency as a

means of reducing the incremental resource costs associated with sales. However, to the extent that a majority of the utility's fixed costs are recovered through energy/volumetric charges, there is a financial disincentive to promote conservation, absent some form of mechanism to provide recovery of fixed costs, e.g. decoupling. A direct financial incentive to meet energy efficiency goals is one form of incentive to promote conservation. A decoupling mechanism, which Avista supports, is a more complete approach to address this issue. A decoupling mechanism allows the utility to promote all forms of conservation, whether they are utility-sponsored or not.

- 3) If customers supply much of the investment in energy efficiency, even when they participate in and receive utility sponsored incentives, what additional incentive could be provided by the electric rate design?
  - <u>Avista's Comments</u> Higher rates certainly increase the cost-effectiveness to the customer for energy efficiency investments. The current inverted rate structure provides a price signal for customers to implement energy efficiency measures.
- 4) Would an electric rate design with larger fixed charges reduce the customer incentive to conserve?
  - <u>Avista's Comments</u> To the extent customers are knowledgeable about the actual rate structure; larger fixed charges reduce the customer incentive to conserve.
- 5) To what extent will the penalties under Initiative 937 provide an incentive for utilities to achieve the energy efficiency goals established in Initiative 937?

Avista's Comments - The avoidance of penalties will provide utilities with an additional incentive to meet Initiative 937 requirements. The value of penalty avoidance should not be considered a benefit for purposes of establishing efficiency as a priority resource or in determining the cost-effectiveness of efficiency resources since Initiative 937 does not require utilities to go beyond the existing regulatory expectation of meeting efficiency acquisition goals that are based upon cost-effective and acquirable resource availability.

# C. State Consideration of Smart Grid Part A

1. What constitutes a "qualified smart grid system?"

<u>Avista's Comments</u> - A "qualified smart grid system" is an interrelated group of technologies and practices that enhance existing electrical systems, allowing for real time operational decision making as well as optimization of system assets.

2. Are the technologies that constitute a "qualified smart grid system" commercially available? If so, how might adoption of today's smart grid technology affect adoption of future technology refinements?

<u>Avista's Comments</u> - It is our understanding that qualification will most likely be dependent upon adherence to interoperability standards. NIST, the National Institute of Standards and Technology, is responsible for fast tracking the creation of these standards, but NIST is playing the role of facilitator and has hired EPRI to manage the effort. The effort will leverage existing technologies and standards but must also insure interoperability for future technologies. Many current technologies can be applied to Smart GRID implementations but may involve proprietary architectures. Without interoperability standards, there is inherent risk that Smart GRID investments could become stranded. NIST desires to have these standards in draft form by the end of 2009.

3. The IRP rule currently requires the lowest reasonable cost set of resources to be determined after a "detailed and consistent analysis of a wide range of commercially available sources." Does this requirement already encompass "qualified smart grid systems?"

<u>Avista's Comments</u> - Smart grid does not necessarily imply an energy resource. Some systems and components can and will revolve around being a resource and those resources are independent components, and should be evaluated appropriately. However, systems that do a multitude of things and do provide energy resource should be evaluated.

4. What level of screening and analysis of smart grid investment would constitute a demonstration to the Commission?

Avista's Comments - A demonstration project would not typically include the entire electric distribution or transmission system. It would be leveraged to validate an approach, a design, a process, etc. Differentiation from pilot or test projects may be recognized if demonstration project components in part or whole are considered useful regardless of the demonstration outcome. For example, the purchase of automatable switches for a specific automation scheme would not preclude their use elsewhere in the electric distribution system. Demonstration projects would also tend to rely on, but not be limited to, commercially available technologies that could be widely deployed upon successful demonstration. Demonstration projects are not typically research oriented although they may involve detailed analysis methodologies to determine outcomes.

5. Are the six factors listed an adequate set for reviewing smart grid investments? Should additional factors be included? If so, what additional factors? What, if

any, rules should govern measurement and evaluation of these listed or additional factors?

<u>Avista's Comments</u> - Yes, while the six factors are adequate, it is important to consider that some systems are enablers for other smart grid technologies. Certain components will not be cost effective when evaluated individually, but when included in other analytics they become beneficial. So, an additional category might be, "enabling".

#### Part C

1. What constitutes a "qualified smart grid system?"

<u>Avista's Comments</u> - A "qualified smart grid system" is an interrelated group of technologies and practices that enhance existing electrical systems, allowing for real time operational decision making as well as optimization of system assets.

2. Is there a distinction between replacing existing equipment with a "system" versus the replacement of some existing equipment with individual components?

<u>Avista's Comments</u> - In some instances there is value and efficiencies in replacing components on a system basis, even when all of the components in the system may not be at their physical end-of-life. One advantage is the simplification of future maintenance to have fewer types of components to maintain. Further, efficiencies are gained by doing an overall system analysis and change-out instead of analyzing each component separately.

3. Are the technologies that constitute a "qualified smart grid system" commercially available? If so, how might adoption of today's smart grid technology affect adoption of future technology refinements?

<u>Avista's Comments</u> - As stated previously, interoperability standards that would be used for qualification are still being defined. Uncertainty regarding qualification and/or treatment of retired assets would be a barrier to entry for many Smart GRID efforts. It is important to note that without qualification there is risk that past, present and future investments may be not be deemed appropriate. Qualification is intended to mitigate this risk for future projects.

4. What constitutes "obsolete equipment"?

<u>Avista's Comments</u> - This could be determined by the physical condition of equipment not being able to perform at safe and reliable levels (below "standard") or it could also be determined by economic obsolescence. e.g., optimal conductor sizing may determine that some existing conductor is economically inferior if the

replacement costs provide a lower life cycle cost than keeping the existing conductor in the system. Obsolete equipment may also me characterized by equipment that cannot deliver a newly desired service to customers. For example a newer mechanical meter would not be able to deliver the information to a customer that a "smart meter" could.

5. Should a cost effectiveness test be applied to the equipment replacement before recovery of book-value costs are allowed?

Avista's Comments - The smart grid program/process should not be encumbered with the potential of disallowances if the applications are justified in some form of policy, (economic, operational, etc.). I presume that a test would be performed internally (much like Asset Management and the Efficiency program) in order to prioritize where the Company could optimize improvement opportunities. On the issue of the recovery of the non-depreciated costs of existing equipment, normal, routine asset retirements resulting from replacements is just part of the ongoing process of utility operation and the retirements merely impact the observed life cycles (depreciation life) of various asset families over time.

- 6. How would net salvage value be accounted for under this standard? <u>Avista's Comments</u> - Net salvage practice can follow current accounting methodologies employed in the utility's depreciation system. Over time, as with all assets, actual net salvage (cost of removal and salvage) experience will dictate adjustments to that component of the Company's depreciation rates via periodic depreciation studies conducted in the future.
- 7. How would this standard conform to used and useful standards? <u>Avista's Comments</u> - When Smart GRID technologies are installed and operating, in whole or in part, ratepayers would begin to see benefits as intended by the implementation. This could be as simple as the installation of sensors for measurement to complete automation. Anything short of the current accounting and ratemaking treatment of utility assets will only discourage companies from embarking on this technology.

#### D. Smart Grid Information

## II. PURPA Standards for Natural Gas Utilities

## A. Energy Efficiency

1) Should the Commission, by rule, adopt Standard 5(B) establishing cost-effective energy efficiency as a priority resource?

<u>Avista's Comments</u> - Yes, subject to the successful establishment of a useful definition of the characteristics defining a priority resource. This definition

should incorporate all of the factors that must, of necessity, be adjusted to allow for the direct comparison of traditional resources and energy efficiency resources. At a minimum these should include the monetary utility cost of emission reduction or mitigation, the customer value of decreased portfolio volatility, and a valuation of reduced externality costs. To the extent that these cannot be adequately quantified, the commission should deem a placeholder value for purposes of resource selection and for energy efficiency acquisition cost-effectiveness.

## 2) What is a "priority resource"?

<u>Avista's Comments</u> - A priority resource is best defined as a resource which should receive preferences above and beyond its reduction in commodity and related avoided costs. These preferences are directly related to well-defined measure benefits, many of which are difficult to quantify and therefore often omitted from the cost-effectiveness calculations.

The Total Resource Cost (TRC) test is generally the standard applied within the IRP process for performing the integration of efficiency resources. This test incorporates the avoided cost of energy savings, reduced distribution capacity requirements and customer non-energy benefits. There is generally no value incorporated within the cost-effectiveness test for the reduction in portfolio volatility resulting from the adoption of efficiency measures.

To the extent that these unrecognized benefits are regarded as consistent with public policy and can be quantified, they should be incorporated into the cost effectiveness analysis. Where they are unquantifiable, a deemed placeholder value could be applied to the priority resource, similar to the 10% adder that has often been applied to efficiency resources in the past. The end result of these modifications may be a cost-effectiveness test that does not fully comply with any particular currently recognized cost-effectiveness methodology.

Does the term "priority resource" differ in affect from the requirement to pursue all cost-effective conservation? If so, how?

Avista's Comments - It should be recognized that cost-effectiveness can be viewed from a variety of perspectives, e.g. participant, non-participant, utility, total resource and societal. Traditionally, the Total Resource Cost (TRC) perspective is applied within the Integrated Resource Plan process, an approach which appropriately represents the obligation of the utility to represent the interest of their total ratepayer population. This does not preclude the desirability of taking into consideration factors which are either not incorporated into the TRC test, or those that are within the test but are difficult to quantify or therefore generally omitted from the calculation.

To the extent that all energy efficiency values that are considered desirable from a public policy perspective are quantifiable and within the cost-effectiveness test being applied, there would be no difference between designated priority resources and cost-effective efficiency resources. However, this is often not the case. The priority resource designation is an opportunity to (1) deem avoided cost adders to represent the value of difficult to quantify efficiency benefits and (2) modify industry-standard cost-effectiveness calculations in such a way as to lead to a stacking of resources that best fit current public policy objectives.

4) If establishing energy efficiency as a priority resource requires the acquisition of energy efficiency in aggregate that is above the cost-effectiveness threshold, would its establishment as a priority resource conflict with any state law?

<u>Avista's Comments</u> - To the extent that the definition of priority resources is representative of legitimate resource costs and benefits, the designation of priority resources and cost-effective resources would be in full alignment. It may be the case that the cost-effectiveness methodology established may differ from or be a hybridization of existing industry-standard methodologies.

5) If establishing energy efficient as a priority resource does not mean pursuing additional energy efficiency above the cost effectiveness threshold, then how would it differ from current Commission regulation and policy?

<u>Avista's Comments</u> - Defining energy efficiency as a priority resource is an opportunity to further define the benefits to be incorporated into efficiency resource valuation and to provide deemed placeholder values for those benefits that utilities may find difficult to quantify.

# B. Rate Design Modifications to Promote Energy Efficiency Investments

1. Are there any benefits from separating fixed-cost revenue recovery from the volume of transportation or sales service provided to customers that the Commission has not yet considered in either a rulemaking or in adjudication?

<u>Avista's Comments</u> - Decoupling removes the disincentive for the utility to fully promote energy efficiency and allows the utility an opportunity to recover the fixed costs authorized by the Commission. These are the primary benefits of a decoupling mechanism, which have been considered by the Commission and will be further examined in the evaluation of Avista's pilot decoupling mechanism.

2. Are there any drawbacks of separating fixed-cost revenue recovery from the volume of sales service provided to customers that the Commission has not yet considered? <u>Avista's Comments</u> - Perhaps the most significant drawback is the potential lack of understanding of decoupling mechanisms by customers. However, to the extent decoupling rate adjustments are kept relatively small, customers probably will not feel the need to fully understand these mechanisms.

3. What advantages are there in establishing *by rule* (rather than through case-by-case adjudications) an incentive for the utility to successfully manage energy efficiency that allows the utility to keep some portion of the "cost-reducing benefits" accruing from the programs?

Avista's Comments - Avista supports the concept of a rulemaking to consider establishing incentives for utilities "to successfully manage energy efficiency that allows the utility to keep some portion of the 'cost-reducing benefits' accruing from the programs." The advantages of considering this in a rulemaking are multiple. From a procedural perspective, all parties will be able to weigh in on key metrics such as cost-effectiveness tests and their application (e.g., the Total Resource Cost test and the Utility Cost Test). From a substantive standpoint, adoption of Commission policy can be determined in a manner consistent between all utilities. Case-by-case adjudications are best applied to unique utility circumstances. Avista understands that acquisition of energy efficiency is the stated "first resource" of all Washington-jurisdictional electric utilities and, as such, would merit a "statewide" analysis of potential incentives.

4. If the conservation measures near the total-resource-cost (TRC) threshold are the hardest to achieve and would provide the least amount of shared "cost-reducing benefits" to the utility, would the utility be less inclined to achieve conservation that was near the cost-effective threshold?

Avista's Comments - The most desirable public policy outcome would be to maximize the net benefit of the energy efficiency portfolio given the costs and benefits that are used to define priority resources. Given that objective, the ideal mechanism would provide utilities greater incentives to target highly cost-effective efficiency measures above marginally cost-effective measures. This is consistent with providing utilities an incentive to pursue more marginally cost-effective efficiency measures, but it also recognizes the value of focusing utility efforts on those measures that are the most valuable. Thus the utility would appropriately be "less inclined" to pursue marginally cost-effective measures, but without the elimination of an incentive for the acquisition of any cost-effective measure.

The less optimal approach of requiring utilities to acquire a designated quantity of energy efficiency resources within the constraint of retaining portfolio cost-effectiveness would tend to result in a targeting of the most easily acquired resources without regard to the cost-effectiveness of individual measure applications. The portfolio cost-effectiveness requirement is unlikely to be a

constraint since the most easily acquired measures are generally cost-effective from the participant perspective and participant and other cost-effectiveness tests are sufficiently related that other tests (notably the total resource cost test) are likely to be met as well.

5. If the utility received some portions of the cost savings from energy efficiency, should that portion of cost be added to the TRC?

Avista's Comments - The California Standard Practice Manual: Economic Analysis of Demand-Side Programs and Project (July 2002) states that the TRC test costs are to include "...program costs paid by both the utility and the participants ..." (page 18). In the subsequent sentence it is stated that the "...administrative costs, no matter who bears them, are included in this test". There is no reference to the inclusion of performance-based utility incentives within the test.

In the interests of maintaining the integrity of the standardized TRC test as a standard for the evaluation of energy efficiency programs, the costs associated with performance-based ratemaking should not be included within the TRC test. That is not to say that it should not be tracked and used as a means to evaluate the impact of performance-based ratemaking in a distinctly different analytical process.

6. Would such "cost-reducing benefits" to be shared be calculated on a measure-by-measure basis? If not, would such a sharing mechanism encourage the utility not to pursue a mix of measures that are, in sum, at the cost effective threshold?

<u>Avista's Comments</u> - If measures are aggregated and utilities are incented to maximize their acquisition subject to the constraint of maintaining portfolio cost-effectiveness, then the interests of the utility would be best served by acquiring all cost-effective measures and continuing on into pursuing progressively non-cost-effective measures until the portfolio cost-effectiveness ratio nears 1.00 (benefits equaling costs).

A sharing of net benefits on a measure-by-measure basis would avoid the pursuit of measures which are expected to be non-cost-effective and lead to an appropriate targeting of the most cost-effective measures in a manner that would align the interests of the utility and public policy.

7. Could a practical rule be fashioned that states promoting energy efficiency is one of the goals of natural gas rate design while at the same time allowing actual rate designs to vary with each company's cost structure and needs?

<u>Avista's Comments</u> - Yes, as long as the rule allows for the implementation of a decoupling mechanism. Promoting energy efficiency through rate design

typically means higher incremental rates for increased usage, which leads to lower sales volumes and an under-recovery of the utility's fixed costs. Decoupling solves this dilemma.

Please direct any questions on this matter to Linda Gervais at 509.495.4975 or Patrick Ehrbar at 509.495.8620.

Sincerely

Kelly Norwood

Vice President, State & Federal Regulation

They Norwood

cc: Service List