

Comments by UCONS, LLC to the Northwest Power and Conservation Council on its Report Addressing Northwest Residential Electric Bills

UCONS and our policy staff have reviewed and congratulate the Council on its July 2016 “report on residential electricity use, annual bills, income and poverty by utility type and service area characteristics” (the Report). The Report’s information and analysis underscore the importance of helping hard to reach residential customer classes, which is also a highlight of the Council’s 7th Power Plan and accompanying Action Plan.

We worked closely with the Council and CRAC members in 2015 in support of language in the 7th Power Plan addressing the potential for increased cost effective conservation in the hard to reach residential customer sectors, especially those customers living in manufactured homes. On behalf of those customer classes, we were gratified to see the 7th Power Plan call out and emphasize manufactured homes as an example for targeting residential conservation. The Plan not only recognizes the considerable potential for saving energy in manufactured homes, it also acknowledges that ratepayers who reside in such homes generally are greatly in need of energy efficiency services. In its Action Plan to support model conservation standards, the Plan states in MCS-1:

Manufactured Homes: The manufactured home segment may face special challenges related to income, ownership, building codes, and some difficult-to-implement conservation measures specific to manufactured housing and their heating systems. The assessment should determine whether the adoption of measures in the manufactured home segment is on pace to complete implementation of nearly all remaining cost-effective potential over the next 20 years. Where expected shortfalls appear, specific barriers to implementation should be identified and solutions targeted at those barriers. While this market segment has been successfully targeted with a limited set of conservation measures (e.g. duct sealing), a more comprehensive approach that identifies and implements an entire suite of cost-effective measures during a single visit may be more cost-efficient.

Based on our prior audits and services to nearly 41,000 IOU and public utility manufactured home customers in Washington since 1994, UCONS offers the following comments in response to the Council Report:

1) On page 1, the Report notes that the annual residential customer in the region paid just over \$1000 per year for electricity.

We note that the average manufactured home residential customer in Washington paid over \$1600 per year for electricity. This much higher amount is due to several factors, including: inefficient home design; few comprehensive conservation programs are available to this sector; and a much larger fraction of customers in manufactured homes do not have the option to use natural gas for space and water heating.

2) On page 2, the Report states, “the higher penetration of electric space and water heating in public utility service areas is due to more limited access to natural gas....” We note that the location of many manufactured home parks outside urban areas causes this customer class to have much more limited access to natural gas service from publicly owned and investor owned utilities.

3) On pages 17-18, the Report addresses “underlying causes of differences in the average use per residential customer.” Cited factors include:

- Saturation of electric space and water heating
- Saturation of electric space heating technologies
- Differences in housing stock mix
- Housing stock vintage
- Energy efficiency investments

We concur that these 5 building stock and equipment factors have a significant impact on differences observed between public and private utility residential customer electricity consumption and corresponding electric bills. But we note that these same 5 factors create the “perfect storm” for the manufactured home sector as all 5 factors apply to this customer class (in both the public and private utility sector).

4) On page 18, the Report addresses space and water heating fuel market share by utility type. We note that for all customer sectors, the fuel market share may be correct, but it is not correct for the manufactured home customer class. In Washington, less than 30% of manufactured homes are served by natural gas. We further note that over 70% of Washington manufactured homes are within 70 miles of the I-5 corridor. We have found this to be typical for all west coast states.

5) On page 21 (Table 11) the housing stock market share by vintage is presented. We do not know the statistics or sample size employed for this table, but can report that our audit on over 40,000 manufactured homes in Washington produced slightly different results. The average date of construction of the homes we have audited is 1984, with the following distribution of vintages:

Pre 1980 (35%)

1980-1992 (55%)

1993-2006 (7%)

Post 2006 (3%)

6) On page 26 (Table 16) the Report breaks down population in poverty by utility ownership type. We have found that the 14-15% share in poverty to closely adhere to the many customers we have served in manufactured homes. We note for Council consideration that it may be helpful to expand this table to also show those customers who are “lower income” or “just above” the poverty threshold. The vast majority of customers in manufactured homes are unable to pay for even a portion of 7th Power Plan cost effective measures, and very few utility rebates cover the cost of most cost effective measures. As a result, this customer class is often left behind, except for the 15% who qualify for low-income assistance. This fact requires special attention by regulatory agencies in order to capture all cost effective conservation services. This challenge can be mitigated, however, by providing on-bill financing or assistance for cost effective measures. We are diligently working with the region to support this idea.

Thank you for this opportunity to provide comments on this excellent Report.

Sincerely,



Christine Hanhart

Marketing Manager