

**Annual Report – Program Year 2016 (PY16)**  
**Weatherization Assistance Program**  
**Department of Natural Resources and Environmental Control**  
**Division of Energy and Climate**  
**April 15, 2017**

**Introduction**

The annual operating budget passed by the General Assembly requires the Department of Natural Resources and Environmental Control (DNREC) to report to the Controller General and the Budget Director annually by April 15 on the status of the state’s Weatherization Assistance Program.

The Weatherization Assistance Program (WAP), overseen by the U.S. Department of Energy (DOE), reduces the energy costs for low-income households by increasing the energy efficiency of their homes. In addition, the program makes people’s homes healthier, safer, and more comfortable. The DOE estimates that the average household saves \$437 per year on their energy costs after receiving weatherization services. WAP provides an opportunity to significantly reduce the fuel assistance needed by low-income households, who spend over 14% of their total annual income on energy costs alone. Weatherization is a highly cost-effective investment; for every \$1 invested in the program, WAP returns an estimated \$2.5 to the household and society.<sup>1</sup>

The WAP has been under the jurisdiction of DNREC since early 2011, and is now implemented from within the DNREC Division of Energy and Climate (DEC). Since moving to DNREC, we have re-built the program from the ground up – focusing on providing quality services to low income Delawareans across the State. The DOE WAP requires states to contract with local agencies, otherwise referred to as “Subgrantees” or “local agency providers”, to deliver weatherization services to eligible residents. For the Program Year 2016 (PY16), defined as April 1, 2016 thru March 31, 2017, the one Subgrantee serving all of Delaware was Catholic Charities, Inc.

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<sup>1</sup> For more information, see DOE’s website: <http://www.waptac.org/WAP-Basics.aspx>

## **Synopsis of the Year's Activities**

The following bullets show a synopsis of the entire PY16. DNREC continues to comply with the federal standards which change yearly to improve the quality of weatherization workmanship and quality assurance in program management at the local level. The Program embarked on a year focused on training in PY16. The appropriated amount from DOE for training is \$129,387.00 and DNREC optimized the dollars.

Highlights of the PY16 are as follows:

- In the spring of 2016 a sister program called Pre-Weatherization Program (Pre-WAP), funded by the Delaware Sustainable Energy Utility (DESEU), began conducting free repair services for homes that are eligible for WAP but were placed into deferral due to non-energy repairs that were needed. Deferred homes receive the necessary repairs from Pre-WAP and then come back into the WAP. This greatly reduced the number of homes that had previously fallen into an indefinite deferral when clients could not afford to have repairs completed.
- As part of the training schedule for PY16, the WAP sent three Subgrantee Auditors, the State Monitor, and four weatherization Crew Leaders to attend the technical Home Performance Conference in Austin, TX in early April.
- In April 2016, DNREC conducted a mobile home training that brought all of the weatherization contractors together for a week of practical and classroom training in Ellendale. DNREC brought in a person known nationally for being a mobile home weatherization expert. Thirty five persons fully participated in the training.
- Since the Occupational Safety and Health Administration (OSHA) Ruling in January 2015, it is required that weatherization workers obtain Confined Space training. DNREC provided Confined Space Awareness training as part of the mobile home training on April 25, 2016.
- For the first time, WAP sent their staff to the Energy OutWest conference in Spokane, Washington in May; four staff attended the conference.
- In May 2016 the WAP and DNREC's Public Affairs Office produced a video of WAP client testimonials. The video was completed and placed on the WAP and Catholic Charities website. The video highlights how the Program provides weatherization services to Delawareans in need.
- The WAP staff met with the City of Wilmington on 5/12/16 to discuss obstacles that were preventing weatherization contractors from pulling permits and finalizing weatherization work. Some progress was made but there are still issues with getting weatherization contractors to work in the City. WAP recognizes the need in the City and are still working toward solutions.

- WAP finalized the Confined Space Program document to set the guidelines for the Delaware WAP contractors to stay in compliance with the OSHA Ruling for weatherization workers. The document is provided to the weatherization contractors at the time of signing new contracts with the Subgrantee in April each year.
- Since placing the Hancock Software Solutions under contract in 2011 for use in the WAP, WAP advanced the use of the software this year to connect the home energy audit in the field with uploading data directly into the software in June. This was accomplished by implementing an iPad application called the HEAT Tool which has improved the efficiency in the field and streamlined office staff applications.
- WAP continued the effort with the Utility Project; the Project will collect pertinent data and calculate energy savings as a result of weatherization services installed. Data requirements span multiple years in order to compare pre-weatherization to post weatherization values. A complete 4-year cycle of data is being gathered and preliminary results are expected by December 2017.
- In early August, WAP contracted with a local expert on Delaware crawlspaces to provide a complete education on how to handle these spaces with respect to weatherization. Immediately following the training, WAP implemented new approaches for the home energy auditors and weatherization techniques.
- For a week in September, WAP sent select Crew Leaders and installing teams to attend a 29-hour Weatherization Tactics Course at the Pennsylvania College of Technology in Williamsport, Pennsylvania, eleven persons attended.
- The WAP is celebrating its 40<sup>th</sup> year of existence in helping low-income families to reduce their utility bills and improve their home's comfort. WAP anticipates having a Governor's Proclamation at the Delaware State Fair to mark the 40<sup>th</sup> year.
- DNREC conducted the monitoring of the Subgrantee, Catholic Charities, in October 2016. It is the second monitoring conducted since Catholic Charities began with the WAP in 2014. There were no significant findings yet Program improvements have been set forth as requirements through a Corrective Action Plan.
- Beginning in February 2017, three WAP staff underwent a process improvement event using Lean to streamline their invoice approval/payment process. Preliminary results are showing that the process time was reduced from 45 days down to 7. As part of implementing the process improvements the staff performs the invoice review electronically; reducing paper waste by 93%.

- In March 2017, the WAP entered into a contract extension with Catholic Charities to continue providing WAP services in Delaware. This extension is one of a possible two that can be entered into before the contract expires in March 2019.
- A consultant is under contract to provide a third-party review of the WAP in April 2017. The elements of review are process flow, home energy auditor performance, WAP workforce development, and administration. The deliverable products are three final reports, expected in the summer 2017, which will be titled: WAP Improvement Work Plan, Energy Auditor Improvement Plan and Administration Rate Analysis.

### **Total Expenditures & Itemized List of Funding Sources**

Weatherization has traditionally been a federally funded program and has existed in Delaware since the early 1980's. In Delaware, annual federal funding for the WAP Base Grant program has varied with congressional appropriations over the course of the last 5 years between \$500,000 and \$1,000,000 per year. The appropriations for PY17 have not been announced by Congress; yet states are being directed to make all calculations for the 2017 WAP State Plans based on the previous year appropriations.

A summary of funding and expenditures is as follows:

- For PY16, WAP was appropriated \$572,294 of new DOE funds. PY16 was the last year on this grant cycle and all of the funds have been expended. Of the appropriated amount, \$412,097 was designated for weatherization of homes; sans any training, technical assistance, and DNREC administrative costs. A total of 54 Delaware homes were weatherized in PY16 with DOE funds. The new appropriation for PY17 is unknown at this time but based on the appropriations of PY2016.
- DNREC receives funds yearly from the Delaware Department of Health and Social Services (DHSS) LIHEAP (Low Income Home Energy Assistance Program) appropriation. The funds come to DNREC with zero dollars for Program administration, so the numbers provided are completely based on weatherized homes. Under an agreement DNREC has with DHSS, the WAP receives 10% of LIHEAP funds on an annual basis. Use of LIHEAP funds for WAP activities is expressly permitted by federal statute and encouraged by DOE, up to a total of 15% of federal LIHEAP appropriations. For PY16, (please be aware that WAP and LIHEAP are not

aligned in the same program year) the WAP utilized \$214,047<sup>2</sup> of LIHEAP funds toward weatherizing 47 homes in WAP PY 2016.

- Also contained in the DNREC/DHSS MOU, the agencies have agreed to dedicate 50% of “Utility funds” (authorized under 26 Del Code §1014) to the WAP; expected to be approximately \$360,000 per year. DNREC utilized \$401,603 of Utility funds (this year’s funds and some from the previous year) for weatherizing 82 homes within Delmarva Power’s service territory during the last program year. DNREC does not utilize any Utility funds for administration costs.
- 10% of the revenues from the Regional Greenhouse Gas Initiative (RGGI) are also directed to the WAP under 7 Del Code §6054. The generation of these funds is subject to market forces associated with the sale of CO2 allowances, but may be a significant source of funds for the program moving forward. In PY16, DNREC expended \$542,432 of these funds weatherizing 99 homes and these funds greatly supported the administrative functions of the Program when federal funds were exhausted (funding details are contained in the next section). There are no administrative costs included in these RGGI WAP numbers provided.
- DNREC also receives \$100,000 of General Funds for the Weatherization Assistance Program. For PY16, funds were dedicated to administrative costs for support of our WAP On-Line database (Hancock Software) and other administrative costs for the Program.

### **Planned & Proposed Activities PY 2017**

- For the WAP PY17 commencing on April 1, 2017, we will use a combination of federal WAP Base Grant funds, RGGI WAP funds, Utility funds and LIHEAP funds to weatherize approximately 360 homes in Delaware. Our 2017 General Funds will be dedicated to continued administrative costs of the program.
- The WAP is continuing with the two collaborative efforts begun in 2015, as follows:
  - A partnership with the State Division of Public Health (DPH) was started in late 2014 to provide weatherization services to clients of a new DPH/HUD effort to address lead paint issues in homes of low income Delawareans. Through our cooperative program, DPH will be doing advance lead paint remediation work prior to clients receiving weatherization services under the WAP and WAP will provide the DPH client information for homes weatherized and meet the DPH parameters as potential clients. DPH supplied the names and addresses of 47 possible clients to the WAP.

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<sup>2</sup> Based on the number of completed LIHEAP homes that had been invoiced to DNREC by March 31, 2017; the end of the WAP PY16.

Of the 47 possible clients, 16 had already been weatherized, two did not meet the eligibility requirements, 18 did not apply for weatherization, and 5 were deferred for various reasons. In PY16, WAP weatherized 6 homes that were referred by the DPH. Because the income eligibility requirements are very similar, WAP in turn supplied 97 names and addresses of possible homes that may qualify for lead remediation that were built before 1978.

- We are working with the Delaware Sustainable Energy Utility (DESEU) to partner with the DESEU to do home repair work in advance of weatherization work. So many of the homes WAP visits are “deferred” due to leaking roofs or other structural issues we cannot address with weatherization funds. Through this new partnership with the DESEU (called the Pre-WAP), their Program will make the needed repairs and make the home weatherization-ready. This Program was launched in the fall of 2015 and began full operations in the spring 2016. The Pre-WAP has repaired approximately 50 homes in PY16.

In planning for the next program year, the following are the anticipated activities:

- **Training**

- Provide training to the Crew Leaders and WAP staff at the Home Performance Conference in March 2018.
- Renew the Renovate/Repair/Paint certification for weatherization workers in July 2017.
- Begin Tool Box Talks on a regular basis to workers in the field to cover all aspects of the WAP.
- Single-family home weatherization training proposed for the fall 2017.

- **Administrative**

- Continue to make Hancock Software more efficient for use by the home energy auditors. Anticipate moving to the next level of using the Hancock software in PY18.
- Provide preliminary numbers for the Utility Project by December 2017 and refined energy savings calculations by early PY18.
- Increase the number of homes weatherized through the Delaware DPH/HUD partnership.
- Weatherize 360 homes in PY17.

- Foresee weatherizing at least another 50 homes that will be rehabilitated into weatherization-ready homes by the Pre-WAP that would have normally been deferred.
- Provide training to the DNREC and Subgrantee staff through the National Association for State Community Services Programs (NASCSPP) Conference.
- **Funding**
  - The WAP budget is a total of \$4,625,000 to support all functions.
  - Fully expend the appropriated DOE Base Grant \$572,294 by March 31, 2018 on completed weatherized homes.
  - Fully expend the \$590,000 LIHEAP funds by July 30, 2017.
  - Expend \$660,000 of RGGI WAP funds for completed weatherized homes.
  - Expend \$2,602,710 of RGGI WAP funds to support administrative functions of the Program.
  - Utilize \$200,000 of Utility funds for completed Delmarva Power weatherized homes.
  - Use the General Funds toward WAP administration.

### **Estimated Energy Savings**

In the interim while developing better techniques for calculating energy savings, WAP uses a DOE estimation for energy savings. The total number of completed homes is multiplied by 29.3MBtus. The estimated savings for PY16 are for 249 completed homes multiplied by 29.3MBtus which is 7296 MBtus.

### **Reporting metrics required by DOE**

- The number of Delaware citizens served by the Delaware WAP for PY16 is: 126 elderly, 193 children, 100 disabled, 1 Native Americans, plus the other home occupants totaling 581 citizens.
- The DOE requirement to have all final inspectors certified with a Quality Control Inspector certification is still being met in Delaware. Delaware has three certified individuals, two auditors employed with the Subgrantee and the State Monitor employed by DNREC.
- State and local quality monitors have been on-site during various aspects of weatherization work, prior to a final inspection, on over 50% of all homes weatherized to date. DOE requires only 10% of homes to be monitored after the final inspection and those monitorings are conducted by the State Monitor. In PY16, the State Monitor conducted 6 formal monitorings. The State

Monitor conducts regular, unannounced in-progress inspections during installation work throughout the year.

- The WAP Program employs 29 individuals in the program through the last program year, including contractors, office workers, and staff at the Subgrantee providing services.
- In PY16, WAP underwent an extensive training schedule for the staff and contractors; completing 2,384 man-hours of training.
- Contractors working in the program were selected based on the highly specialized weatherization skills required. The contractors continue to receive extensive and specialized training in all aspects of weatherization work, including DOE required safety training. Training is well funded by DOE and there is a 2017 training plan established to ensure that the WAP meets the Program expectations.
- All clients are certified eligible for services under DOE rules and required documentation is included in both paper and electronic files at the Subgrantee.
- All completed homes receive a detailed final inspection by a Quality Control Inspector. Any incorrect or incomplete work is resolved before final billing.