# HERO Program Residential Eligible Product List

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California HERO Program Residential Eligible Product List

All Products

In addition to the HERO Product Eligibility Specifications listed below, it is the sole responsibility of the HERO Contractor and property owner (Project Stakeholders) to meet or exceed applicable local, state, and/or federal permitting, codes, and standards. Project Stakeholders are fully and solely responsible for ensuring products are installed in accordance with all applicable manufacturer specifications, warranty guidelines, and industry best practices. All products are to be installed as real property that is not intended for removal over the useful life of the product.

Renewable and Alternative Energy

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<tr>
<th>PRODUCT CATEGORY</th>
<th>PRODUCT TYPE</th>
<th>ELIGIBILITY SPECIFICATIONS</th>
<th>MAXIMUM PRODUCT LIFE (YEARS)</th>
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</table>
| Alternative Energy     | Advanced Energy Storage System        | 1. System must be pre-approved and listed in the HERO Eligible Product Database  
2. System must have obtained certification from a nationally recognized testing laboratory for one of the acceptable standards:  
   a. UL 1973  
   b. UL Subject 9540  
   c. IEC62842-2  
   d. IEC 62109  
   e. UL 1741  
   f. Other equivalent standard  
3. System must maintain roundtrip efficiency ≥ 63.5%  
4. System must carry a minimum 10-year manufacturer warranty | 10 |
|                        | Electric Vehicle Charging Station     | 1. Product must certified as meeting the Underwriters Laboratory Subject 2594 Standard Testing for Charging Stations  
2. Product must be a Level 2 charger with SAE J1772 standard charging plug | 10 |
|                        | Fuel Cell Power System                | 1. System must be certified as meeting the ANSI/CSA America FC1 standard | 15 |
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<tbody>
<tr>
<td></td>
<td></td>
<td>1. Product must be certified by the Small Wind Certification Council as meeting the requirements of the AWEA Small Wind Turbine Performance and Safety Standard (9.1-2009)</td>
<td>20</td>
</tr>
<tr>
<td>Alternative Energy</td>
<td>Small Wind Turbine</td>
<td>1. Product must be listed as California Energy Commission as SB1-compliant product</td>
<td>20</td>
</tr>
<tr>
<td>Solar Electric</td>
<td>Solar Inverter</td>
<td>1. Product must be listed as California Energy Commission as SB1-compliant product</td>
<td>20</td>
</tr>
<tr>
<td></td>
<td>Solar Panel</td>
<td>1. Product must be listed as California Energy Commission as SB1-compliant product</td>
<td>25</td>
</tr>
<tr>
<td>Solar Thermal</td>
<td>Solar Pool Heater</td>
<td>1. Product must have the OG-100 Collector Certification by the Solar Rating and Certification Corporation (SRCC)</td>
<td>15</td>
</tr>
<tr>
<td></td>
<td>Solar Water Heater</td>
<td>1. System must have the OG-300 System Certification by the Solar Rating and Certification Corporation (SRCC)</td>
<td>15</td>
</tr>
<tr>
<td>Energy Efficiency</td>
<td>Air Sealing</td>
<td>1. Air sealing should be performed to BPI, ENERGY STAR, and/or ASHRAE 62.2 guidelines for air sealing, ventilation, and weatherization</td>
<td>10</td>
</tr>
</tbody>
</table>
|                     | Attic Insulation      | 1. R-value ≥ 38  
2. Product should be installed following ENERGY STAR guidelines                                                                                                                                                       | 25                           |
|                     | Cool Roof - Prescriptive | 1. Product must be listed in the CRRC or ENERGY STAR product directories.  
2. Low-Slope Roof (≤ 2:12) Efficiency:  
   a. Aged (3 yrs.) Solar Reflectance ≥ 0.5  
3. Steep-Slope Roof (> 2:12) Efficiency:  
   a. Aged Solar Reflectance ≥ 0.15                                                                                                                                     | 25                           |
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| Building Envelope| Cool Roof - Performance      | 1. If a Cool Roof - Prescriptive roofing product is not specified, one of the following performance measures must also be implemented in the scope of work:  
   a. Provide an air-space of at least 1” between the top of the roof deck and the bottom of the roofing product  
   b. Insulate attic floor to R-value $\geq 38$  
   c. Seal & Insulate attic HVAC duct work to R-8 and $\leq 6\%$ leakage  
   d. Install an eligible radiant barrier (Reflectivity $\geq 0.9$ and Emittance $\leq 0.1$) with reflective side facing air space  
   e. Insulate above roof deck to R-value $\geq 4$  
   f. Install roof construction with thermal mass with a weight of at least 25 lb/ft^2 | 25 |
|                  | Heat Reflective/Cool Wall Coverings* | 1. Product must be a preapproved HERO Cool Wall Coating product  
2. Product must have solar reflectance $\geq 0.5$ as tested to ASTM C1549-09 standard  
3. Product primary application surface must be exterior wall surfaces of conditioned buildings  
4. Trim, soffit, and/or fascia may be included in work scope as secondary items, as applicable  
5. Product is only eligible to be installed on properties located within CA Building Climate Zones 4-10 and 12-15 | 20 |
|                  | Insulated Siding             | 1. R-value $\geq 2$  
2. Certified as meeting ASTM D7793 standard and listed by Vinyl Siding Institute or certified as meeting an alternative equivalent standard  
3. Primary application surface must be exterior walls of conditioned buildings  
4. Trim, soffit, and/or fascia may be included in work scope as secondary items, as applicable | 25 |

*Heat reflective/cool wall covering products are only eligible within LA County HERO Program boundaries.*
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| Building Envelope | Radiant Barrier | 1. Radiant Barrier type products must be installed with reflective side facing an open air space and meet the following performance ratings:  
   a. Reflectivity ≥ 0.9  
   b. Emittance ≤ 0.1  
   2. Radiation Control Coating type products must be installed to face an open air space and meeting the following performance ratings:  
   a. Emittance ≤ 0.25 | 20 |
| Under Floor Insulation |  | 1. R-value ≥ 19  
   2. Product should be installed following ENERGY STAR guidelines | 25 |
| Wall Insulation |  | 1. R-value ≥ 13  
   2. Product should be installed following ENERGY STAR guidelines | 25 |
| Heating, Ventilation, and Air Conditioning (HVAC) | Air-Source Heat Pump | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
   2. Efficiency requirements:  
      a. Split System Efficiency:  
         • SEER ≥ 14  
         • HSPF ≥ 8.2  
      b. Package System Efficiency:  
         • SEER ≥ 14  
         • HSPF ≥ 8.0 | 15 |
| Attic Fan |  | 1. Product must be equipped with a thermostat control | 15 |
| Biomass / Wood Stove |  | 1. Product must be certified and listed on the EPA Certified Wood Stoves list | 15 |
| Boiler |  | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
   2. Efficiency requirements:  
      a. Oil: AFUE ≥ 80%  
      b. Gas: AFUE 75% | 20 |
| Ceiling Fan |  | 1. Product must be ENERGY STAR Certified | 10 |
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| Heating,         | Central Air Conditioner | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency requirements:  
   SEER ≥ 14  
   a. Capacity <45,000  
      • EER ≥ 12.2  
   b. Capacity ≥ 45,000  
      • EER ≥ 11.7  
*15 years in CSCDA HERO Program boundaries | 20* |
| Ventilation, and Air Conditioning (HVAC) | Duct Replacement | 1. Duct system leakage:  
   a. Partial Replacement:  
      ≤ 15% total system nominal flow  
   b. Full Replacement:  
      ≤ 6% total system nominal flow  
2. Duct Insulation R-Value ≥6 | 20 |
|                 | Duct Sealing | 1. Ducts should be sealed with UL-181 listed duct sealing materials (mastic, foil tape, duct board, aeroseal, etc.) | 20 |
|                 | Evaporative Cooler | 1. Product must be listed in California Energy Commission Appliance Efficiency Database  
2. Window installed product is not eligible | 10 |
|                 | Furnace | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency requirements:  
   a. Oil: AFUE ≥ 83%  
   b. Gas: AFUE ≥ 80% | 20 |
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| Heating, Ventilation, and Air Conditioning (HVAC) | Geothermal Heat Pump | 1. Product must be ENERGY STAR Certified  
2. Closed Loop Water-to-Air Efficiency:  
   a. EER ≥ 14.1  
   b. COP ≥ 3.3  
3. Open Loop Water-to-Air Efficiency:  
   a. EER ≥ 16.2  
   b. COP ≥ 3.6  
4. Closed Loop Water-to-Water Efficiency:  
   a. EER ≥ 15.1  
   b. COP ≥ 3.0  
5. Open Loop Water-to-Water Efficiency:  
   a. EER ≥ 19.1  
   b. COP ≥ 3.4  
6. DGX Efficiency:  
   a. EER ≥ 15.0  
   b. COP ≥ 3.5 | 15 |
| Heat/Energy Recovery Ventilator | 1. Product must be certified by the Home Ventilation Institute (HVI) | | 10 |
| Hydronic Radiant Heating System | 1. System must be powered by one of the following high-efficiency heating sources:  
   a. Boiler (AFUE ≥ 85%)  
   b. Gas Storage Water Heater (EF ≥ 0.67)  
   c. Gas Tankless Water Heater (EF ≥ 0.90)  
   d. Electric Heat Pump Water Heater (EF ≥ 2) | 15 |
| Mini-Split Air Conditioner | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency requirement:  
   a. SEER ≥ 14 | 20* |
| *15 years in CSCDA and LA County HERO Program boundaries | Mini-Split Heat Pump | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency requirement:  
   a. SEER ≥ 14  
   b. HSPF ≥ 8.2 | 15 |
| Ventilation Fan | 1. Product must be ENERGY STAR Certified | | 10 |
| Whole House Fan | 1. Product must be listed in California Energy Commission Appliance Efficiency Database | | 20 |
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<td>Lighting</td>
<td>Lighting Control</td>
<td>1. Product must be listed in the California Energy Commission Appliance Efficiency Database.</td>
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<td>2. Eligible control types include:</td>
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<td>a. Automatic Time-Switch</td>
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<td>b. Daylight/Photo-Sensor</td>
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<td>c. Dimmer</td>
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<td>d. Occupant/Motion/Vacancy Sensor</td>
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<td>Lighting Fixture*</td>
<td>1. Product must be ENERGY STAR Certified</td>
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<td>*Outdoor lighting fixtures are not eligible for HERO Financing in WRCOG or CA HERO Program bounds</td>
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<td>Automatic Pool Cover</td>
<td>1. Product must be UL certified as meeting ASTM F1346 Standard Performance Specification</td>
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<td>2. COP ≥ 4.5</td>
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<td>Gas Pool Heater</td>
<td>1. Product must be listed in California Energy Commission Appliance Efficiency Database</td>
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<td>2. Thermal Efficiency ≥ 83%</td>
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<td>Pool Pump</td>
<td>1. Product must be ENERGY STAR Certified</td>
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<td>2. Single Speed Pump Efficiency:</td>
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<td>a. EF ≥ 3.8</td>
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<td>3. Multi-Speed Pump Efficiency:</td>
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<td>a. EF ≥ 3.8 for most efficient speed</td>
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<td>Water Heating</td>
<td>Electric Heat Pump Storage Water Heater</td>
<td>1. Product must be ENERGY STAR Certified</td>
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<td>2. Efficiency:</td>
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<td>a. EF ≥ 2.0</td>
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<td></td>
<td>Gas Storage Water Heater</td>
<td>1. Product must be ENERGY STAR Certified</td>
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<td>2. Efficiency:</td>
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<td>a. EF ≥ 0.67</td>
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<td>Gas Tankless Water Heater</td>
<td>1. Product must be ENERGY STAR Certified</td>
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<td>2. Efficiency:</td>
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<td>a. EF ≥ 0.90</td>
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</table>
| Water Heating          | Hot Water Delivery System                         | 1. System must meet the EPA WaterSense Guide for Efficient Hot Water Delivery Systems definition for one of the following water delivery options:  
  a. Dedicated Recirculation Line  
  b. Whole House Manifold System  
  c. Demand-initiated Recirculating System  
  d. Core Plumbing System                                                             | 25                          |
| Windows, Doors, and Skylights | Door                                              | 1. Product must be NFRC Certified  
  2. Opaque (No Glass) Efficiency:  
   a. U-Factor = Any  
   b. SHGC = Any  
  3. ≤ 1/2-Lite (Some Glass) Efficiency:  
   a. U-Factor = Any  
   b. SHGC = Any  
  4. > 1/2-Lite (Mostly Glass) Efficiency:  
   a. U-Factor ≤ 0.32  
   b. SHGC ≤ 0.25                                                                 | 25                          |
| Skylights and Tubular Daylighting Device | Skylights and Tubular Daylighting Device          | 1. Product must be NFRC Certified  
  2. Efficiency:  
   a. U-Factor ≤ 0.58  
   b. SHGC = Any                                                             | 20                          |
| Window                 | Window                                            | 1. Product must be NFRC Certified  
  2. Efficiency:  
   a. U-Factor ≤ 0.32  
   b. SHGC ≤ 0.25                                                            | 25                          |
| Window Film            | Window Film                                       | Product must be NFRC Certified                                                                                                                                         | 10                          |
# California HERO Program Residential Eligible Product List

## Water Efficiency

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</thead>
</table>
| Indoor Water Efficiency| Faucet*      | 1. Product must be WaterSense Qualified  
2. Flow rate ≤ 1.5 GPM  
3. Must be permanently installed  

*High-efficiency faucet fixtures are not eligible for HERO Financing in WRCOG or CA HERO Program bounds.* | 15              |
|                        | Gray Water System | 1. System must meet California Plumbing Code, Chapter 16A  
2. Eligible system types include:  
   a. Single Fixture  
   b. Multi-Fixture Simple (≤ 250 GPD)  
   c. Multi-Fixture Complex (> 250 GPD)  | 20              |
|                        | Showerhead*    | 1. Product must be WaterSense Qualified  
2. Flow rate ≤ 2.0 GPM  

*High-efficiency showerheads are not eligible for HERO Financing in WRCOG or CA HERO Program bounds.* | 15              |
|                        | Toilet*        | 1. Product must be WaterSense Qualified  
2. Toilet and urinals fixtures are eligible  
3. Flow rate ≤ 1.28 GPF  

*High-efficiency toilet fixtures are not eligible for HERO Financing in WRCOG or CA HERO Program bounds.* | 20              |
| Outdoor Water Efficiency| Artificial Turf | 1. Product must be water and air permeable  
2. Product must be non-toxic and lead free  
3. Product installation must carry ≥ 10 year warranty | 10              |
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| **Outdoor Water Efficiency**      | Artificial Turf Premium      | 1. Product must be water and air permeable  
2. Product must be non-toxic and lead free  
3. Product installation must carry ≥ 15 year warranty                                                                                                                                   | 15                            |
|                                  | Drip Irrigation               | 1. Product installed in turf, garden, planter, or flower bed area                                                                                                                                                                              | 10                            |
|                                  | Drought Tolerant Landscaping  | 1. Product installation area must replace existing live turf grass or other irrigated area  
2. Products must be installed to limit excess site runoff  
3. Requested financing amount may only include:  
   a. Removal of existing landscape material  
   b. Site preparation for installation  
   c. Installation of eligible hardscape/groundcover material  
   d. Installation of eligible irrigation options  
4. Requested finance amount may NOT include:  
   a. Installation of live plants or biodegradable plant material  
   b. Removal/replacement of pre-existing hardscape areas (i.e. driveways, pools, etc.)  
   c. Installation of water features (i.e. ponds, fountains, etc.)  
   d. Installation of any other products not listed in specification #3  
Full Specifications                                                                                                                                 | 20                            |
|                                  | Rainwater Catchment System    | 1. Sized to hold ≥ 50 gallons at one time  
2. Must be permanently installed                                                                                                                                                                                                                 | 20                            |
|                                  | Sprinkler Nozzle*             | 1. Product must be on SoCal Water Smart Qualified Sprinkler Nozzle product list  
*High-efficiency sprinkler nozzles are not eligible for HERO Financing in WRCOG or CA HERO Program bounds.                                                                                                                                  | 10                            |
|                                  | Weather-Based Irrigation      | 1. Product must be WaterSense Qualified                                                                                                                                                                                                       | 10                            |
Florida HERO Program Residential Eligible Product List

All Products

In addition to the HERO Product Eligibility Specifications listed below, it is the sole responsibility of the HERO Contractor and property owner (Project Stakeholders) to meet or exceed applicable local, state, and/or federal permitting, codes, and standards. Project Stakeholders are fully and solely responsible for ensuring products are installed in accordance with all applicable manufacturer specifications, warranty guidelines, and industry best practices. All products are to be installed as real property that is not intended for removal over the useful life of the product.

Renewable and Alternative Energy

<table>
<thead>
<tr>
<th>PRODUCT CATEGORY</th>
<th>PRODUCT TYPE</th>
<th>ELIGIBILITY SPECIFICATIONS</th>
<th>MAXIMUM PRODUCT LIFE (YEARS)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Alternative Energy</td>
<td>Advanced Energy Storage System</td>
<td>1. System must be <a href="#">pre-approved</a> and listed in the HERO Eligible Product Database</td>
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</tr>
<tr>
<td></td>
<td></td>
<td>2. System must have obtained certification from a nationally recognized testing laboratory for one of the acceptable standards:</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>a. UL 1973</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>b. UL Subject 9540</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>c. IEC62842-2</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>d. IEC 62109</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>e. UL 1741</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>f. Other equivalent standard</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>3. System must maintain roundtrip efficiency $\geq 63.5%$</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>4. System must carry a minimum 10-year manufacturer warranty</td>
<td></td>
</tr>
<tr>
<td>Electric Vehicle</td>
<td>Charging Station</td>
<td>1. Product must be certified as meeting the Underwriters Laboratory Subject 2594 Standard Testing for Charging Stations</td>
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<td></td>
<td></td>
<td>2. Product must be a Level 2 charger with SAE J1772 standard charging plug</td>
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<tr>
<td>Fuel Cell Power System</td>
<td></td>
<td>1. System must be certified as meeting the ANSI/CSA America FC1 standard</td>
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## Florida HERO Program Residential Eligible Product List

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<td>1. Product must be certified by the Small Wind Certification Council as meeting the requirements of the AWEA Small Wind Turbine Performance and Safety Standard (9.1-2009)</td>
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<tr>
<td>Solar Electric</td>
<td>Solar Inverter</td>
<td>1. Solar inverters must be listed by the <a href="http://www.floridasolarcenter.org">Florida Solar Energy Center(FSEC)</a></td>
<td>20</td>
</tr>
<tr>
<td></td>
<td>Solar Panel</td>
<td>1. Solar panels must be listed by the <a href="http://www.floridasolarcenter.org">Florida Solar Energy Center(FSEC)</a></td>
<td>25</td>
</tr>
<tr>
<td>Solar Thermal</td>
<td>Solar Pool Heater</td>
<td>1. Product must have the Solar Thermal Certification by FSEC or OG-100 Collector Certification by the Solar Rating and Certification Corporation (SRCC)</td>
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</tr>
<tr>
<td></td>
<td>Solar Water Heater</td>
<td>1. System must have the Solar Thermal Certification by FSEC or OG-300 System Certification by the Solar Rating and Certification Corporation (SRCC)</td>
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</tr>
</tbody>
</table>

### Energy Efficiency

<table>
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<tr>
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<tbody>
<tr>
<td>Building Envelope</td>
<td>Air Sealing</td>
<td>1. Air sealing should be performed to BPI, ENERGY STAR, and/or ASHRAE 62.2 guidelines for air sealing, ventilation, and weatherization</td>
<td>10</td>
</tr>
</tbody>
</table>
|                     | Attic Insulation | 1. R-value ≥30  
2. Product should be installed following ENERGY STAR guidelines                                                                                                                | 25                         |
Florida HERO Program Residential Eligible Product List

<table>
<thead>
<tr>
<th>PRODUCT CATEGORY</th>
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<th>ELIGIBILITY SPECIFICATIONS</th>
<th>MAXIMUM PRODUCT LIFE (YEARS)</th>
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</thead>
</table>
| Building Envelope  | Cool Roof – Performance             | 1. If a Cool Roof - Prescriptive roofing product is not specified, one of the following performance measures must also be implemented in the scope of work:  
   a. Provide an air-space between the top of the roof deck and the bottom of the roofing product  
   b. Insulate attic floor or above roof deck  
   c. Seal & Insulate attic HVAC duct work  
   d. Install an eligible radiant barrier  
   e. Other roof construction to meet solar reflectance and emittance requirements                                                                                           | 20                          |
|                    | Heat Reflective/Cool Wall Coverings | 1. Product must be preapproved HERO Cool Wall Coating Product  
   2. Product must have solar reflectance $\geq 0.5$ as tested to ASTM C1549-09 standard  
   3. Product primary application surface must be exterior wall surfaces of conditioned buildings  
   4. Trim, soffit, and/or fascia may be included in work scope as secondary items, as applicable                                                                             | 20                          |
|                    | Insulated Siding                    | 1. R-value $\geq 2$  
   2. Certified as meeting ASTM D7793 standard and listed by Vinyl Siding Institute or certified as meeting an alternative equivalent standard  
   3. Primary application surface must be exterior walls of conditioned buildings  
   4. Trim, soffit, and/or fascia may be included in work scope as secondary items, as applicable                                                                               | 25                          |
<table>
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<tr>
<th>PRODUCT CATEGORY</th>
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</table>
| Building Envelope                            | Radiant Barrier                 | 1. Radiant Barrier type products must be installed with reflective side facing an open air space and meet the following performance ratings:  
                                    |                                 |   a. Reflectivity ≥ 0.9                                                                  | 20                         |
|                                              |                                 |   b. Emittance ≤ 0.1                                                                   |                             |
|                                              |                                 | 2. Radiation Control Coating type products must be installed to face an open air space and meeting the following performance ratings:  
                                    |                                 |   a. Emittance ≤ 0.25                                                                  |                             |
|                                              | Roofing                         | 1. Low-Slope Roof (≤ 2:12) Efficiency Rating: Aged (3 yrs.) Solar Reflectance ≥ 0.5  
                                    |                                 | 2. Steep-Slope Roof (> 2:12) Efficiency Rating: Aged Solar Reflectance ≥ 0.15 | 20                         |
|                                              | Under Floor Insulation          | 1. R-value ≥ 13                                                                     | 25                         |
|                                              |                                 | 2. Product should be installed following ENERGY STAR guidelines                        |                             |
|                                              | Wall Insulation                 | 1. R-value ≥ 13                                                                     | 25                         |
|                                              |                                 | 2. Product should be installed following ENERGY STAR guidelines                        |                             |
| Heating, Ventilation, and Air Conditioning (HVAC) | Air Source Heat Pump           | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
                                    |                                 | 2. Efficiency requirements:  
                                    |                                 |   a. Split System:  
                                    |                                 |     • SEER ≥ 14            | 15                         |
|                                              |                                 |     • HSPF ≥ 8.2                                                                    |                             |
|                                              |                                 |   b. Package System:  
                                    |                                 |     • SEER ≥ 14            |                             |
|                                              |                                 |     • HSPF ≥ 8.0                                                                   |                             |
|                                              | Attic Fan                       | 1. Product must be equipped with a thermostat control                               | 15                         |
## Florida HERO Program Residential Eligible Product List

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</thead>
<tbody>
<tr>
<td>Heating, Ventilation, and Air Conditioning (HVAC)</td>
<td>Biomass / Wood Stove</td>
<td>1. Product must be certified and listed on the EPA Certified Wood Stoves list</td>
<td>15</td>
</tr>
</tbody>
</table>
|                                         | Boiler                        | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency requirements:  
   a. Oil: AFUE ≥ 80%  
   b. Gas: AFUE ≥ 75% | 25                          |
|                                         | Central Air Conditioner       | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency requirements:  
   a. Split System:  
      • SEER ≥ 14  
   b. Package System:  
      • SEER ≥ 14 | 15                          |
|                                         | Duct Replacement              | 1. Duct system leakage: ≤ 4 cfm per 100 square feet  
2. Duct Insulation R-Value ≥6 | 25                          |
|                                         | Duct Sealing                  | 1. Ducts should be sealed with UL-181 listed duct sealing materials (mastic, foil tape, duct board, aeroseal, etc.) | 20                          |
|                                         | Furnace                       | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency requirements:  
   a. Oil: AFUE ≥ 83%  
   b. Gas: AFUE ≥ 80% | 20                          |
# Florida HERO Program Residential Eligible Product List

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</table>
| Heating, Ventilation, and Air Conditioning (HVAC) | Geothermal Heat Pump | 1. Product must be ENERGY STAR Certified  
2. Closed Loop Water-to-Air Efficiency:  
   a. EER ≥ 17.1  
   b. COP ≥ 3.6  
3. Open Loop Water-to-Air Efficiency:  
   a. EER ≥ 21.1  
   b. COP ≥ 4.1  
4. Closed Loop Water-to-Water Efficiency:  
   a. EER ≥ 16.1  
   b. COP ≥ 3.1  
5. Open Loop Water-to-Water Efficiency:  
   a. EER ≥ 20.1  
   b. COP ≥ 3.5  
6. DGX Efficiency:  
   a. EER ≥ 16.0  
   b. COP ≥ 3.6 | 15 |
| | Heat/Energy Recovery Ventilator | 1. Product must be certified by the Home Ventilation Institute (HVI) | 10 |
| | Hydronic Radiant Heating System | 1. System must be powered by one of the following high-efficiency heating sources:  
   a. Boiler (Oil: AFUE ≥ 87%, Gas: AFUE ≥ 90%)  
   b. Gas Storage Water Heater (EF ≥ 0.67)  
   c. Gas Tankless Water Heater (EF ≥ 0.90)  
   d. Electric Heat Pump Water Heater (EF ≥ 2) | 15 |
| | Mini-Split Air Conditioner | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency: SEER ≥ 14 | 15 |
| | Mini-Split Heat Pump | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency requirements:  
   a. SEER ≥ 14  
   b. HSPF ≥ 8.2 | 15 |
### Florida HERO Program Residential Eligible Product List

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<tbody>
<tr>
<td>Heating, Ventilation, and Cooling (HVAC)</td>
<td>Ventilation Fan</td>
<td>1. Product must be ENERGY STAR Certified</td>
<td>10</td>
</tr>
<tr>
<td></td>
<td>Whole House Fan</td>
<td>1. Product must be listed in California Energy Commission Appliance Efficiency Database</td>
<td>20</td>
</tr>
<tr>
<td>Lighting</td>
<td>Lighting Control</td>
<td>1. Product must be listed in the California Energy Commission Appliance Efficiency Database. 2. Eligible control types include: a. Automatic Time-Switch b. Daylight/Photo-Sensor c. Dimmer d. Occupant/Motion/Vacancy Sensor</td>
<td>20</td>
</tr>
<tr>
<td></td>
<td>Lighting Fixture*</td>
<td>1. Product must be ENERGY STAR Certified</td>
<td>20</td>
</tr>
<tr>
<td></td>
<td>Automatic Pool Cover</td>
<td>1. Product must be UL certified as meeting ASTM F1346 Standard Performance Specification</td>
<td>10</td>
</tr>
<tr>
<td>Pool Equipment</td>
<td>Electric Heat Pump Pool Heater</td>
<td>1. Product must be listed in California Energy Commission Appliance Efficiency Database 2. COP ≥ 4.0</td>
<td>10</td>
</tr>
<tr>
<td></td>
<td>Gas Pool Heater</td>
<td>1. Product must be listed in California Energy Commission Appliance Efficiency Database 2. Thermal Efficiency ≥82%</td>
<td>10</td>
</tr>
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</table>
| Water Heating    | Electric Heat Pump Storage Water Heater | 1. Product must be ENERGY STAR Certified  
2. Efficiency:  
   a. EF ≥ 2.0 | 10 |
|                  | Gas Storage Water Heater | 1. Product must be ENERGY STAR Certified  
2. Efficiency:  
   a. EF ≥ 0.67 | 10 |
|                  | Gas Tankless Water Heater | 1. Product must be ENERGY STAR Certified  
2. Efficiency:  
   a. EF ≥ 0.90 | 10 |
|                  | Hot Water Delivery System | 1. System meets the [EPA WaterSense Guide](https://www.epa.gov/watersense) for Efficient Hot Water Delivery Systems definition for one of the following water delivery options:  
   a. Dedicated RecirculationLine  
   b. Whole House ManifoldSystem  
   c. Demand-initiated Recirculating System  
   d. Core Plumbing System | 25 |
| Windows, Doors, and Skylights | Door | 1. Product must have a Florida Building Code or Miami-Dade Product Approval Number  
2. Product must meet energy efficiency requirements stated in Florida Building Code  
3. Climate Zone 1  
   a. U-Factor ≤ 0.65  
   b. SHGC ≤ 0.25, not required if no glass  
4. Climate Zone 2  
   a. U-Factor ≤ 0.40  
   b. SHGC ≤ 0.25, not required if no glass | 25 |
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</table>
| Windows, Doors, and Skylights    | Exterior Window Shading Device | 1. Product must shade to at least one window or door  
2. Product must be one of the following styles:  
a. Patio Cover  
b. Fixed Awning  
c. Operable Awning  
d. Operable Shutter  
e. Solar Screen  
3. Other exterior structural products including, but not limited to, sunroom enclosures, exterior decks, balconies, roof overhangs, detached/free-standing arbors, detached/free-standing pergolas, and/or carports are **NOT** eligible | 10                          |
|                                 | Skylights and Tubular Daylighting Device | 1. Product must have a Florida Building Code or Miami-Dade Product Approval Number  
2. Product must meet energy efficiency requirements stated in Florida Building Code  
3. Climate Zone 1  
   a. U-Factor ≤ 0.75  
   b. SHGC ≤ 0.30  
4. Climate Zone 2  
   a. U-Factor ≤ 0.65  
   b. SHGC ≤ 0.30 | 15                          |
|                                 | Window                          | 1. Product must have a Florida Building Code or Miami-Dade Product Approval Number  
2. Product must meet energy efficiency requirements stated in Florida Building Code  
3. Climate Zone 1  
   a. U-Factor ≤ 0.65  
   b. SHGC ≤ 0.25  
4. Climate Zone 2  
   a. U-Factor ≤ 0.40  
   b. SHGC ≤ 0.25 | 25                          |
|                                 | Window Film                     | 1. Product must be NFRC Certified | 10                          |
## Wind Resistance

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<thead>
<tr>
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</table>
| Wind Resistance  | Door         | 1. Product must have a Florida Building Code or Miami-Dade Product Approval Number  
2. Product must meet impact resistant requirements stated in Florida Building Code  
3. Product must have been verified to meet one of the acceptable set of standards for opening protection  
   a. TAS 201, TAS 202, TAS203  
   b. ASTM E 1886, ASTM E1996  
   c. Other equivalent standards | 20 |
| Wind Resistance  | Garage Door  | 1. Product must have a Florida Building Code or Miami-Dade Product Approval Number  
2. Product must meet impact resistant requirements stated in Florida Building Code  
3. Product must meet one of the referenced standards for opening protection  
   a. TAS 201, TAS 202, TAS203  
   b. ASTM E 1886, ASTM E1996  
   c. Other equivalent standards | 20 |
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</table>
| Wind Resistance       | Roofing                                         | 1. Product must have a Florida Building Code or Miami-Dade Product Approval Number  
2. Product must meet wind resistant requirements stated in Florida Building Code  
3. Product must be manufactured and installed to withstand at a minimum of 110 mph ultimate design wind speed | 20                          |
|                       | Roof-to-Wall Connections                        | 1. Product must meet requirements stated in Florida Building Code                                                                                                               | 20                          |
|                       | Roof-Deck Attachments                            | 1. Product must meet requirements stated in Florida Building Code                                                                                                               | 20                          |
|                       | Secondary Water Barrier                         | 1. Product must meet requirements stated in Florida Building Code                                                                                                               | 20                          |
|                       | Skylights and Tubular Daylighting Device        | 1. Product must have a Florida Building Code or Miami-Dade Product Approval Number  
2. Product must meet impact resistant requirements stated in Florida Building Code  
3. Product must meet one of the referenced standards for opening protection  
   a. TAS 201, TAS 202, TAS203  
   b. ASTM E 1886, ASTM E1996  
   c. Other equivalent standards | 15                          |
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| Wind Resistance  | Storm Shutter| 1. Product must have a Florida Building Code or Miami-Dade Product Approval Number  
2. Product must meet impact resistant requirements stated in Florida Building Code  
3. Product must meet one of the referenced standards for opening protection  
  a. TAS 201, TAS 202, TAS203  
  b. ASTM E 1886, ASTM E1996  
  c. Other equivalent standards  
4. Impact protection systems and flexible wind abatement systems are eligible under Storm Shutters. | 20 |
|                  | Window       | 1. Product must have a Florida Building Code or Miami-Dade Product Approval Number  
2. Product must meet impact resistant requirements stated in Florida Building Code  
3. Product must meet one of the referenced standards for opening protection  
  a. TAS 201, TAS 202, TAS203  
  b. ASTM E 1886, ASTM E1996  
  c. Other equivalent standards | 20 |
Missouri HERO Program Residential Eligible Product List

All Products

In addition to the HERO Product Eligibility Specifications listed below, it is the sole responsibility of the HERO Contractor and property owner (Project Stakeholders) to meet or exceed applicable local, state, and/or federal permitting, codes, and standards. Project Stakeholders are fully and solely responsible for ensuring products are installed in accordance with all applicable manufacturer specifications, warranty guidelines, and industry best practices. All products are to be installed as real property that is not intended for removal over the useful life of the product.

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</table>
| Alternative Energy | Advanced Energy Storage System      | 1. System must be [pre-approved](https://www.hero_program.com) and listed in the HERO Eligible Product Database
2. System must have obtained certification from a nationally recognized testing laboratory for one of the acceptable standards:
   a. UL 1973
   b. UL Subject 9540
   c. IEC62842-2
   d. IEC 62109
   e. UL 1741
   f. Other equivalent standard
3. System must maintain roundtrip efficiency ≥ 63.5%
4. System must carry a minimum 10-year manufacturer warranty |
|                  | Electric Vehicle Charging Station    | 1. Product must certified as meeting the Underwriters Laboratory Subject 2594 Standard Testing for Charging Stations
2. Product must be a Level 2 charger with SAE J1772 standard charging plug |
|                  | Fuel Cell Power System              | 1. System must be certified as meeting the ANSI/CSA America FC1 standard                                                                                           | 15                          |
# Missouri HERO Program Residential Eligible Product List

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<td>Alternative Energy</td>
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<td>1. Product must be certified by the Small Wind Certification Council as meeting the requirements of the AWEA Small Wind Turbine Performance and Safety Standard (9.1-2009)</td>
<td>20</td>
</tr>
<tr>
<td>Solar Electric</td>
<td>Solar Inverter</td>
<td>1. Product must be listed as California Energy Commission as SB1-compliant product</td>
<td>20</td>
</tr>
<tr>
<td>Solar Electric</td>
<td>Solar Panel</td>
<td>1. Product must be listed as California Energy Commission as SB1-compliant product</td>
<td>20</td>
</tr>
<tr>
<td>Solar Thermal</td>
<td>Solar Pool Heater</td>
<td>1. Product must have the OG-100 Collector Certification by the Solar Rating and Certification Corporation (SRCC)</td>
<td>15</td>
</tr>
<tr>
<td>Solar Thermal</td>
<td>Solar Water Heater</td>
<td>1. System must have the OG-300 System Certification by the Solar Rating and Certification Corporation (SRCC)</td>
<td>15</td>
</tr>
<tr>
<td>Energy Efficiency</td>
<td>Air Sealing</td>
<td>1. Air sealing should be performed to BPI, ENERGY STAR, and/or ASHRAE 62.2 guidelines for air sealing, ventilation, and weatherization</td>
<td>10</td>
</tr>
</tbody>
</table>
| Building Envelope      | Attic Insulation   | 1. R-value ≥ 38  
2. Product should be installed following ENERGY STAR guidelines                          | 20                          |
|                        | Cool Roof - Prescriptive | 1. Product must be listed in the CRRC and/or ENERGY STAR product directories  
2. Low-Slope Roof (≤ 2:12) Efficiency Rating: a. Aged (3 yrs.) Solar Reflectance ≥ 0.5  
# MISSOURI HERO PROGRAM RESIDENTIAL ELIGIBLE PRODUCT LIST

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<th>PRODUCT CATEGORY</th>
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<th>ELIGIBILITY SPECIFICATIONS</th>
<th>MAXIMUM PRODUCT LIFE (YEARS)</th>
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</thead>
</table>
| **Building Envelope** | **Cool Roof - Performance** | 1. If a Cool Roof - Prescriptive roofing product is not specified, one of the following performance measures must also be implemented in the scope of work:  
   a. Provide an air-space of at least 1” between the top of the roof deck and the bottom of the roofing product  
   b. Insulate attic floor to R-value ≥ 38  
   c. Install an eligible radiant barrier (Reflectivity ≥ 0.9 and Emittance ≤ 0.1) with reflective side facing air space  
   d. Insulate above roof deck to R-value ≥ 4  
   e. Install roof construction with thermal mass with a weight of at least 25 lb/ft² | 20 |
|                  | **Insulated Siding**   | 1. R-value ≥ 2  
   2. Certified as meeting ASTM D7793 standard and listed by Vinyl Siding Institute or certified as meeting an alternative equivalent standard  
   3. Primary application surface must be exterior walls of conditioned buildings  
   4. Trim, soffit, and/or fascia may be included in work scope as secondary items, as applicable | 20 |
|                  | **Radiant Barrier**    | 1. Radiant Barrier type products must be installed with reflective side facing an open air space and meet the following performance ratings:  
   a. Reflectivity ≥ 0.9  
   b. Emittance ≤ 0.1  
   2. Radiation Control Coating type products must be installed to face an open air space and meeting the following performance ratings:  
   a. Emittance ≤ 0.25 | 20 |
|                  | **Under Floor Insulation** | 1. R-value ≥ 25  
   2. Product should be installed following ENERGY STAR guidelines | 20 |
|                  | **Wall Insulation**    | 1. R-value ≥ 13  
   2. Product should be installed following ENERGY STAR guidelines | 20 |
# Missouri HERO Program Residential Eligible Product List

<table>
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<tr>
<th>PRODUCT CATEGORY</th>
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</table>
| Heating, Ventilation, and Air Conditioning (HVAC) | Air Source Heat Pump | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency requirements:  
a. Split System:  
   • SEER ≥ 14  
   • HSPF ≥ 8.2  
b. Package System:  
   • SEER ≥ 14  
   • HSPF ≥ 8.0 | 15 |
| | Attic Fan | 1. Product must be equipped with a thermostat control | 15 |
| | Biomass / Wood Stove | 1. Product must be certified and listed on the EPA Certified Wood Stoves list | 15 |
| | Boiler | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency requirements:  
a. Oil: AFUE ≥ 80%  
b. Gas: AFUE ≥ 75% | 20 |
| | Ceiling Fan | 1. Product must be ENERGY STAR certified. | 10 |
| | Central Air Conditioner | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency requirements:  
a. Split System:  
   • SEER ≥ 13  
b. Package System:  
   • SEER ≥ 14 | 15 |
| | Duct Replacement | 1. Duct system leakage:  
a. Partial Replacement:  
   ≤ 15% total system nominal flow  
b. Full Replacement:  
   ≤ 6% total system nominal flow  
2. Duct Insulation R-Value ≥6 | 20 |
| | Duct Sealing | 1. Ducts should be sealed with UL-181 listed duct sealing materials (mastic, foil tape, duct board, aeroseal, etc.) | 20 |
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| Heating, Ventilation, and Air Conditioning (HVAC) | Evaporative Cooler | 1. Product must be listed in California Energy Commission Appliance Efficiency Database  
2. Window installed product is not eligible | 10 |
| | Furnace | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency requirements:  
   a. Oil: AFUE ≥ 83%  
   b. Gas: AFUE ≥ 80% | 20 |
| | Geothermal Heat Pump | 1. Product must be ENERGY STAR Certified  
2. Closed Loop Water-to-Air Efficiency:  
   a. EER ≥ 14.1  
   b. COP ≥ 3.3  
3. Open Loop Water-to-Air Efficiency:  
   a. EER ≥ 16.2  
   b. COP ≥ 3.6  
4. Closed Loop Water-to-Water Efficiency:  
   a. EER ≥ 15.1  
   b. COP ≥ 3.0  
5. Open Loop Water-to-Water Efficiency:  
   a. EER ≥ 19.1  
   b. COP ≥ 3.4  
6. DGX Efficiency:  
   a. EER ≥ 15.0  
   b. COP ≥ 3.5 | 15 |
| | Heat/Energy Recovery Ventilator | 1. Product must be certified by the Home Ventilation Institute (HVI) | 10 |
| | Hydronic Radiant Heating System | 1. System must be powered by one of the following high-efficiency heating sources:  
   a. Boiler (AFUE ≥ 85%)  
   b. Gas Storage Water Heater (EF ≥ 0.67)  
   c. Gas Tankless Water Heater (EF ≥ 0.90)  
   d. Electric Heat Pump Water Heater (EF ≥ 2) | 15 |
| | Mini-Split Air Conditioner | 1. Product must be AHRInrated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency requirement:  
   a. SEER ≥ 13 | 15 |
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| Heating, Ventilation, and Air Conditioning (HVAC)     | Mini-Split Heat Pump    | 1. Product must be AHRI rated or pre-approved and listed in the HERO eligible product database.  
2. Efficiency requirements:  
   a. SEER ≥ 14  
   b. HSPF ≥ 8.2                                                                                                                                                                                                                                                                   | 15                          |
|                                                        | Ventilation Fan         | 1. Product must be ENERGY STAR Certified                                                                                                                                                                                                                                                                                                                                 | 10                          |
|                                                        | Whole House Fan         | 1. Product must be listed in California Energy Commission Appliance Efficiency Database                                                                                                                                                                                                                                                                                                                                 | 20                          |
| Lighting                                              | Lighting Control        | 1. Product must be listed in the California Energy Commission Appliance Efficiency Database.  
2. Eligible control types include:  
   a. Automatic Time-Switch  
   b. Daylight/Photo-Sensor  
   c. Dimmer  
   d. Occupant/Motion/Vacancy Sensor                                                                                                                                                                                                                                                                                  | 20                          |
|                                                        | Lighting Fixture        | 1. Product must be ENERGY STAR Certified                                                                                                                                                                                                                                                                                                                                 | 20                          |
| Pool Equipment                                        | Automatic Pool Cover    | 1. Product must be UL certified as meeting ASTM F1346 Standard Performance Specification                                                                                                                                                                                                                                                                                                                                 | 10                          |
|                                                        | Electric Heat Pump Pool Heater | 1. Product must be listed in California Energy Commission Appliance Efficiency Database  
2. COP ≥ 4.5                                                                                                                                                                                                                                                                                                  | 10                          |
|                                                        | Gas Pool Heater         | 1. Product must be listed in California Energy Commission Appliance Efficiency Database  
2. Thermal Efficiency ≥ 83%                                                                                                                                                                                                                                                                                  | 10                          |
|                                                        | Pool Pump               | 1. Product must be ENERGY STAR Certified  
2. Single Speed Pump Efficiency:  
   a. EF ≥ 3.8  
3. Multi-Speed Pump Efficiency:  
   a. EF ≥ 3.8 for most efficient speed                                                                                                                                                                                                                                                                               | 10                          |
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| Wastewater Treatment   | Septic System Rejuvenation        | 1. Product must include a custom product application and specifications that meet the following criteria  
   a. Motor: Less than 0.5 HP  
   b. Variable Speed Control  
   c. Modulating On and Off Recirculation  
   d. Less than 270 kWh per month of energy consumption  
2. Product that meet the definition of a residential microbial inoculator/generator system  
3. Requested financing amount may only include:  
   a. Installation of the rejuvenation system to an existing residential treatment tank  
   b. Components and modules such as microbial inoculator/generator system and aerobic bio-reactor that are required for septic system rejuvenation  
4. Requested financing amount may NOT include:  
   a. Installation or replacement of a septic tank | 20                          |
| Water Heating          | Electric Heat Pump Storage Water Heater | 1. Product must be ENERGY STAR Certified  
   2. Efficiency:  
   a. EF ≥ 2.0 | 10                          |
|                        | Gas Storage Water Heater          | 1. Product must be ENERGY STAR Certified  
   2. Efficiency:  
   a. EF ≥ 0.67 | 10                          |
|                        | Gas Tankless Water Heater         | 1. Product must be ENERGY STAR Certified  
   2. Efficiency:  
   a. EF ≥ 0.90 | 10                          |
|                        | Hot Water Delivery System         | 1. System meets the EPA WaterSense Guide for Efficient Hot Water Delivery Systems definition for one of the following water delivery options:  
   a. Dedicated RecirculationLine  
   b. Whole House ManifoldSystem  
   c. Demand-initiated Recirculating System  
   d. Core Plumbing System | 15                          |
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| Windows, Doors, and Skylights          | Door                  | 1. Product must be NFRC Certified  
2. Opaque (No Glass) Efficiency:  
   a. U-Factor = Any  
   b. SHGC = Any  
3. ≤ 1/2-Lite (Some Glass) Efficiency:  
   a. U-Factor = Any  
   b. SHGC = Any  
4. > 1/2-Lite (Mostly Glass) Efficiency:  
   a. U-Factor ≤ 0.35  
   b. SHGC = Any     | 20                        |
| Windows, Doors, and Skylights          | Exterior Window       | 1. Product must shade to at least one window or door  
2. Product must be one of the following styles:  
   a. Patio Cover  
   b. Fixed Awning  
   c. Operable Awning  
   d. Operable Shutter  
   e. Solar Screen  
3. Other exterior structural products including, but not limited to, sunroom enclosures, exterior decks, balconies, roof overhangs, detached/free-standing arbors, detached/free-standing pergolas, and/or carports are NOT eligible  
4. Interior window shading products are NOT eligible | 10                        |
| Skylights and Tubular Daylighting Device| Skylights and Tubular Daylighting Device | 1. Product must be NFRC Certified  
2. Efficiency:  
   a. U-Factor ≤ 0.60  
   b. SHGC = Any     | 20                        |
| Window                                 | Window                | 1. Product must be NFRC Certified  
2. Efficiency:  
   a. U-Factor ≤ 0.35  
   b. SHGC = Any     | 20                        |
| Window Film                            | Window Film | 1. Product must be NFRC Certified     | 10                        |