# Queensland Community Housing Energy Upgrades program

## Energy upgrade options table

This information helps community housing providers understand available energy efficiency upgrades, their benefits and considerations to help choose the right upgrades for each community housing dwelling in your portfolio.

Visit the Australian Government's Your Home website for more information about different types of energy upgrades and their benefits.

| Upgrade option | Benefits | Considerations |
|---|---|---|
| **Heat pump and solar hot water systems** | • Heat pump water heaters and solar hot water systems can use up to 70% less energy than traditional electric resistance hot water systems[1]. | • Hot water systems have a higher initial cost, however the long-term savings on energy bills can make them a cost-effective choice.<br>• Heat pump systems require a well-ventilated area to operate efficiently. |
| **Ceiling insulation** | • An affordable and very effective way to improve a dwelling's energy efficiency and thermal comfort (to ensure it is warmer in winter and cooler in summer).<br>• Prevents hot air from entering in summer and warm air escaping in winter, reducing energy usage for heating and cooling. | • A site visit will need to take place.<br>• See program guidelines for eligibility requirements.<br>• Power will need to be switched off when the installer is at the tenant's dwelling installing ceiling insulation. This is a mandatory requirement under the *Electrical Safety Regulation 2013*[2].<br>• Installation costs can vary depending on factors such as the roof type, pitch, height, condition of electrical wiring, and whether existing insulation or debris needs to be removed. |
| **Solar PV** | • Will reduce energy bills as less electricity from the grid is being used.<br>• 25–30-year lifespan if maintained.<br>• Generates your own power and reduces reliance on the main electricity grid. | • Rooftop solar panel location and orientation will affect the amount of electricity generated.<br>• The roof's age and condition should be assessed prior to installing solar. Ensure its lifespan matches the solar system's lifespan.<br>• Tenant education recommended to ensure they get the best out of their solar.<br>• Regular cleaning and occasional inspections are necessary. |
| **Split cycle air conditioner** | • Split cycle air conditioning unit uses less electricity compared to some other climate control options, such as portable air conditioning systems.<br>• Some systems provide both heating and cooling.<br>• A highly effective cooling option. | • Can increase energy consumption.<br>• Uses more energy than ceiling fans or portable fans.<br>• The unit should be appropriately sized for the space, and proper placement is crucial for optimal performance. |
| **Electric cooktops and ovens** | • Induction cooktops are the most energy efficient type of electric cooktop. | • Switching from gas to electric can incur additional costs, including installing new outlets, capping off the gas line, and upgrading the electrical panel to accommodate the new appliances. |

[1] Department of Climate Change, Energy, the Environment and Water. *Hot water systems*. Energy.gov.au. https://www.energy.gov.au/households/hot-water-systems
[2] Queensland Government. (2013). *Electrical Safety Regulation 2013* (Part 3, Division 1, Section 14). https://www.legislation.qld.gov.au/

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|---|---|---|
| | | • These costs can be included in the rebate amount, as enabling costs. |
| **External window shading** | • Keeps homes cooler in summer, so tenants use less energy and feel more comfortable.<br>• Allows natural light while blocking glare and excess heat. | • Different types of shading provide varying levels of sun protection.<br>• When choosing shading, select durable materials that can withstand weather conditions. |
| **High performance window glazing** | • Improves energy efficiency by reducing heat transfer, keeping homes cooler in summer and warmer in winter, which can lower heating and cooling costs. | • Higher cost compared to standard glazing options, due to advanced materials and technology. |
| **Draught proofing** | • An affordable option to improve energy efficiency in the home.<br>• Minimises heat loss in winter and heat gain in summer, resulting in lower energy bills.<br>• Helps maintain a consistent indoor temperature by minimising draughts and reducing temperature fluctuations, creating a more comfortable living environment. | • Over-sealing a dwelling can lead to poor indoor air quality and moisture problems if adequate ventilation is not maintained. |
| **LED lighting** | • LED lighting is a cheap and effective way to reduce energy consumption and save money over time due to their energy efficiency and long lifespan.<br>• Less maintenance compared to other lighting options. | • Higher initial cost than a traditional light bulb.<br>• Ensure the LED lights provide adequate brightness.<br>• This upgrade will need to be installed in conjunction with another eligible upgrade. |
| **Direct Current (DC) ceiling fans** | • Helps distribute air evenly, creating a more comfortable indoor environment.<br>• A low-cost, effective option to create a comfortable indoor temperature. | • Ensure the upgrade fits within the home's existing structure and does not interfere with other features such as bunk beds, cupboards, wardrobes.<br>• Ensure the fan installed is a DC fan, which is more energy efficient than AC fans.<br>• This upgrade will need to be installed in conjunction with another eligible upgrade. |