

Solar for renters: Designing policies to promote investment

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Investment in rooftop solar photovoltaic panels on rental properties is still being stalled by property investor perceptions that they would receive minor returns, with most benefits flowing to renters. Policies seeking to increase the deployment of solar on rental properties will need to overcome this perception by bringing all stakeholders in the rental market – investors, renters, and property managers – to understand the value of solar.

The policy problem

At present, renters are very unlikely to find a home to rent that has rooftop solar; as of 2017-18, around 4 percent of renters in Australia had rooftop solar, compared to 25 percent of homeowners. This limits the ability of renters to benefit from decreased electricity bills associated with solar installation. To change this situation, it is necessary to understand what property investors perceive as core barriers to installing rooftop solar on rental properties and to assess the feasibility of policy design mechanisms to address these barriers.

“...perceptions of an unfavourable distribution of benefits is the key barrier limiting investments in solar...”

The findings

Our findings suggest that investors’ perceptions of an unfavourable distribution of benefits is the key barrier limiting investments in solar on rental properties, with the substantial upfront cost of solar being another major barrier. We found that policy options that reduce upfront costs, i.e., interest free loans, appear to appeal to only a minority of property investors. Further, a mechanism to distribute feed-in tariff payments to property investors via bill management by a third-party not-for-profit was not preferred by any property investor groups, suggesting that exploration of different benefit distribution mechanisms is necessary. We tentatively find that some property investors are less averse to paying for solar when they perceive that tenants will pay higher rents for a property with solar, but these findings are not robust across model specifications and cannot be considered conclusive. This is, however, the most promising area for future policy design and future research.

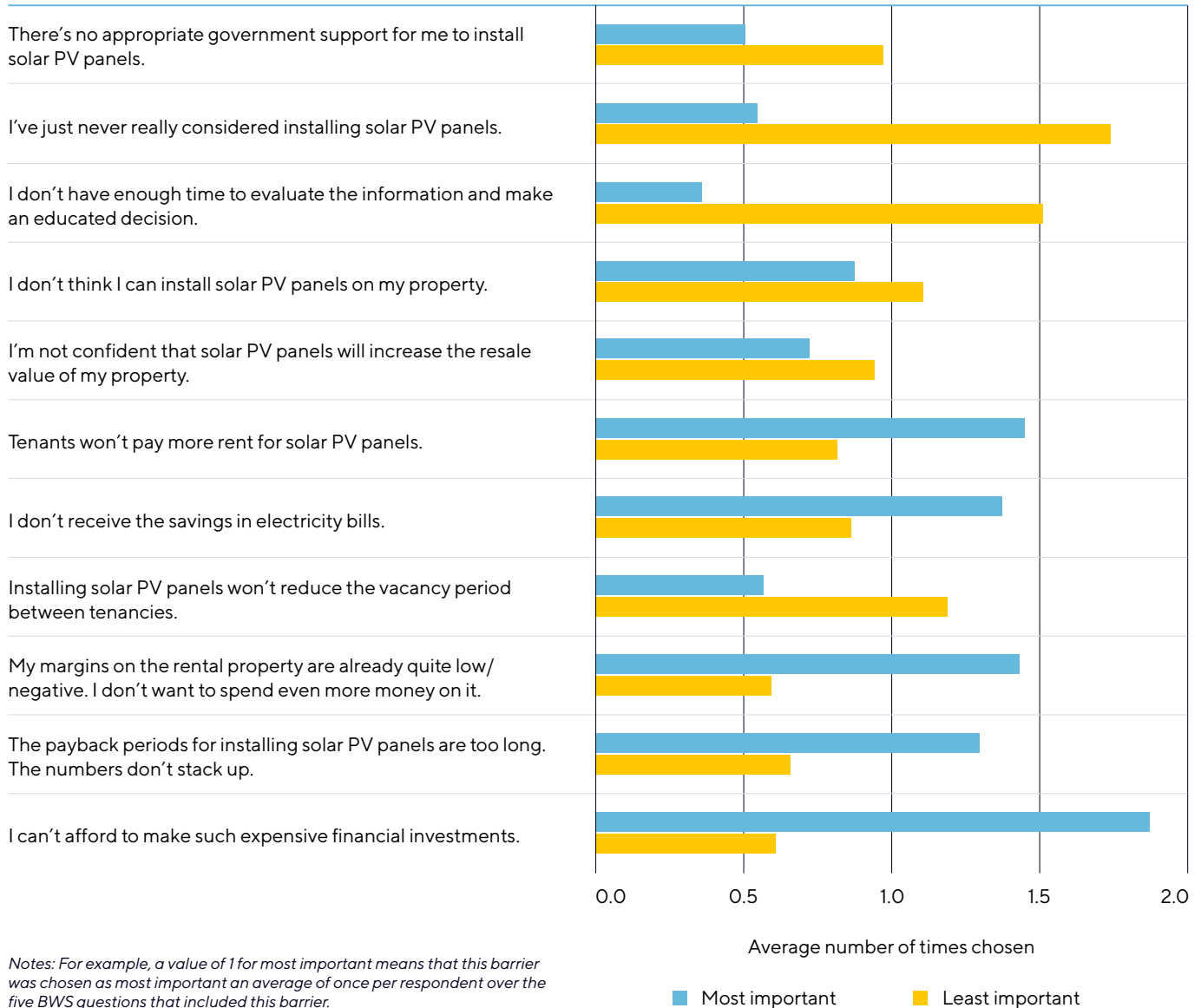
Recommendations for policy, developed based on analysis findings, prior academic literature, and perspectives of key stakeholders, are to:

- **Improve the benefit-cost trade-off for property investors**, particularly through an increased appreciation of the value of solar in the rental market and an accompanying confidence for all stakeholders in the appropriateness of higher rents for solar properties.
- **Make different options available for repayment of system costs**, for example by offering both the option to repay the system costs upfront as well as an option to spread the costs out over time.
- **Implement an education campaign to highlight existing and new knowledge about willingness-to-pay by renters for properties with solar PV**. A major barrier to investment in solar PV is a belief by property investors and property managers that renters would be unwilling to pay higher housing rents.
- **Consider active monitoring and disclosure** of the performance of solar PV systems to the rental market (to provide the market with assurance that a system is operating well).
- **Targeted actions such as state supported trials** to build investor confidence in returns on investment and familiarity amongst property managers may be another measure to increase the visibility of the value of solar.
- **Further consider opportunities for co-creation** between stakeholders in designing policies to promote solar PV on rental properties.

The study

Data were collected using a three-stage approach. First, semi-structured interviews of three property investors, six property managers, and four state and local government policymakers informed design of a best-worst scaling survey. Second, an online best-worst scaling survey assessing relative perceptions of barriers to investment in solar for rental properties was completed by 931 property investors in Australia. Third, findings of the best-worst scaling survey informed design of a discrete choice experiment to test hypothetical policy options, with this online survey completed by 147 property investors in Australia. Latent class models were used to analyse results of both surveys, allowing visibility of the differences in preferences between groups.

Figure : Average number of times that respondents chose each barrier as most and least important (n = 931 respondents making 11 selections each)



Recommended reading

Ambrose, A.R., 2015. *Improving energy efficiency in private rented housing: Why don't landlords act?* Indoor Built Environ. 24, 913–924. <https://doi.org/10.1177/1420326X15598821>

Best, R., Esplin, R., Hammerle, M., Nepal, R., Reynolds, Z., 2021. *Do solar panels increase housing rents in Australia?* Hous. Stud. 0, 1–18. <https://doi.org/10.1080/0/02673037.2021.2004094>

Dodd, T., Nelson, T., 2022. *Australian household adoption of solar photovoltaics: A comparative study of hardship and non-hardship customers.* Energy Policy 160, 112674. <https://doi.org/10.1016/j.enpol.2021.112674>