

## **Project Feasibility / Financial Modelling for Solar Rooftops**

The Bendigo Sustainability Group and Community Power Hub have undertaken many hundreds of assessments of energy use and solar PV need for community and commercial buildings and residences.

Project feasibility for community owned solar rooftop projects starts with getting a recent electricity bill. This give us the tariffs paid and the information required to access the smart meter data via the PowerCor MyEnergy facility.

The tariffs and smart meter data are entered into the Renew tool, Sunulator (available free online) and various sized solar rooftop systems are evaluated for return on investment (ROI). We are usually looking for simple pay-back period of around 4 to 5 years and more than 50% self-consumption of solar generated kWh's. Higher percentage exported kWh's makes projects more dependent on the Feed-in-Tariff (FiT), which can vary each year. We don't mind oversizing solar PV systems as storage batteries could be installed in the future when battery prices reduce quite substantially.

Financial modelling has been developed for various alternative models, including:

1. PPA / RRA model with / without SPV in between host and investors. Both fixed and variable payments catered for. The usual period of time for the investment entity with SPV and variable payments is 10 years. Without SPV and fixed payments, term of investment can be as short 5 years.
2. Loan Note model with fixed or variable payments over various periods of time, for example 5 or 7 years. These models have only been developed for loans made directly between investors and hosts but we are also investigating an option involving a partnership. Fixed payments means less admin and hence shorter term can be viable.

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**May 2020**