Dear Sir/Madam,

Re: draft Solar Energy Facilities - Design and Development Guidelines

Thank you for the opportunity to comment on the draft Solar Energy Facilities Design and Development Guidelines.

Barwon Water is Victoria’s largest regional urban water corporation, supplying water and sewerage services to a permanent population of 285,000 people (20 percent of Victoria's regional population) across an 8,100 square kilometre service area.

Energy is a significant resource input in the provision of these services, as well as the majority contributor to our greenhouse emissions profile of around 40,000 tCO2-e/annum. We currently consume around 30,000 MWh of electricity annually.

Barwon Water has adopted a long term goal of zero net emissions by 2030. A cornerstone of this commitment is switching to 100% renewable electricity by 2025. We are investing more than $15 million over the next five years, to deliver timely, cost effective emissions reductions. This will also deliver on our pledge to the Victorian Government, now enshrined in the Statement of Obligations (Emissions Reduction) issued by the Minister for Water.

Solar energy is a key component of Barwon Water’s renewable energy program. To date, we have invested in the following major projects:

- **Barwon Water Black Rock solar farm (Connewarre, Vic)**
  1 megawatt ground-mounted solar farm commenced operation January 2018. Located behind-the-meter, supplying Barwon Water’s largest energy using site, treating sewage from the greater Geelong area.
  An expansion to 3 megawatts is currently under construction (currently the largest solar installation in southern Victoria), due to commence operation mid-2019. This will supply around 35% of the site’s annual electricity use.
- **Barwon Water Torquay solar array (Torquay, Vic)**
  260 kilowatt ground-mounted solar array commenced operation November 2018. Primarily exporting to the grid, offsetting electricity use occurring at small sites elsewhere.

- **Barwon Water Wurdee Boluc solar array and battery (Wurdiboluc, Vic)**
  300 kilowatt ground-mounted solar array and 200kWh battery currently under construction. Located behind-the-meter at Barwon Water’s largest water treatment plant, serving the Geelong supply system.

- **IWN Large-Scale Renewables PPA (details to be announced)**
  Collective of Victorian water corporations entering into a Power Purchase Agreement with a large-scale solar farm. This will supply up to 30% of Barwon Water’s renewable electricity needs through to 2030.

We provide the following feedback on the draft guidelines:

- It is not clear to a reader that the guidelines only apply to large-scale solar energy facilities. The applicability of the guidelines should be clearly highlighted in the introduction (for example through a break-out box).

- The term large-scale solar energy facility should be clearly defined in the guidelines. This could be through a combination of reference to land use terms, as well as specific criteria. For example, there may be projects that primarily feed into the grid but aren’t considered ‘large’ – perhaps a threshold capacity or land area could be used.

- The term solar energy facility (omitting the words large-scale) is used widely throughout the guidelines. To avoid users applying the guidelines to small or medium scale solar installations, the term large-scale solar facility should be consistently applied throughout the document.

Should you have any queries or wish to discuss our submission, please contact

Yours sincerely,