

# Submersible Solar Water pump

they can build a greener world for future generations.

EGE Cambodia Energy Solutions is a solar solutions company based in Phnom Penh, Cambodia, providing both solar equipment and EPC services. EGE is the official and exclusive distributor of quality solar products from the French company, Eco Green Energy. Their priority is to be transparent in all our actions, which is why 100% of our products are tested and comply with several international certifications. EGE's mission is to promote the sustainable development of Cambodia by educating and collaborating with the sectors and projects that need support in their energy transition so that

The demonstration site is located in Sankor village, Sankor commune, Kampong Svay district, Kampong Thom province

The owner of the demonstration site, Mr. Cheng Bona, is an experienced farmer who owns and operates four fishponds. Fish production is his primary source of income, and he mainly focuses on fish farming and retailing.

Mr. Cheng Bona specifically cultivates and sells two main fish species: Pangasius, also known as "Trey pra," and Silver Barb, also known as "Trey chpen." These species are popular and in demand among consumers.

EGE's Solar Water Pump (SWP) has been successfully installed at Mr. Cheng Bunna's fish farm. This SWP is a highly efficient 4 HP submersible pump, specifically designed for underwater operation. The pump is installed at a depth of approximately 110 meters within a bore well that was previously drilled.

In order to power the pump, a total of fourteen 335-watt solar panels were expertly installed. These panels are strategically placed on top of the reservoir, acting as a roof. This not only provides shade and protection for the panels but also helps in reducing water loss caused by evaporation.

It is important to note that the system is an off-grid system, meaning it operates solely on solar power and only functions during daylight hours.

SWITCH to Solar









## Benefits of the solution include



### Reduced operational expenses

By using solar power, the fish farmer will reduce diesel costs that were needed to operate the diesel pumps to circulate and fill the production ponds.

តម្រោង ដ្ឋាស់ប្តូរទៅថាមពលព្រះអាទី SWITCH to Solar For a Thriving Agri-Fisheries

switchasia 🔳 🖷



#### Increase quality and quantity of production

The enclosed fish cage concentrates the location of fish which allows for more efficient feeding practices, easier on-going fish care and maintenance, and end-of-cycle harvesting. By increasing the efficiency of these practices, labour will be saved and can be directed elsewhere.



#### **Increase revenue**

This solar solution increased the sales revenue through a larger number of harvested fish, an average larger fish size, and a decrease in diesel expenditures.



**CONTACT US** 

#### **Reduction of carbon emissions**

By reducing the use of the diesel power pump there is a reduction of 2.5 t CO2 emissions per year.

( switchtosolarkh.org f SWITCH to Solar Solar Solar Solar 520 860