



Floating Photovoltaics: A New Way to Attenuate Climate Change on Lakes and Reservoirs

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Inglés II – 2021

An aerial photograph of a large-scale floating solar farm. The solar panels are arranged in a dense, rectangular grid on the surface of a large body of water. In the foreground, a concrete structure on the shore houses several electrical control cabinets and inverters. The surrounding landscape includes green fields and some buildings in the distance.

INTRODUCTION

MAP OF THE PRESENTATION

FLOATING SOLAR PANELS

- Features
- Functionality

USES

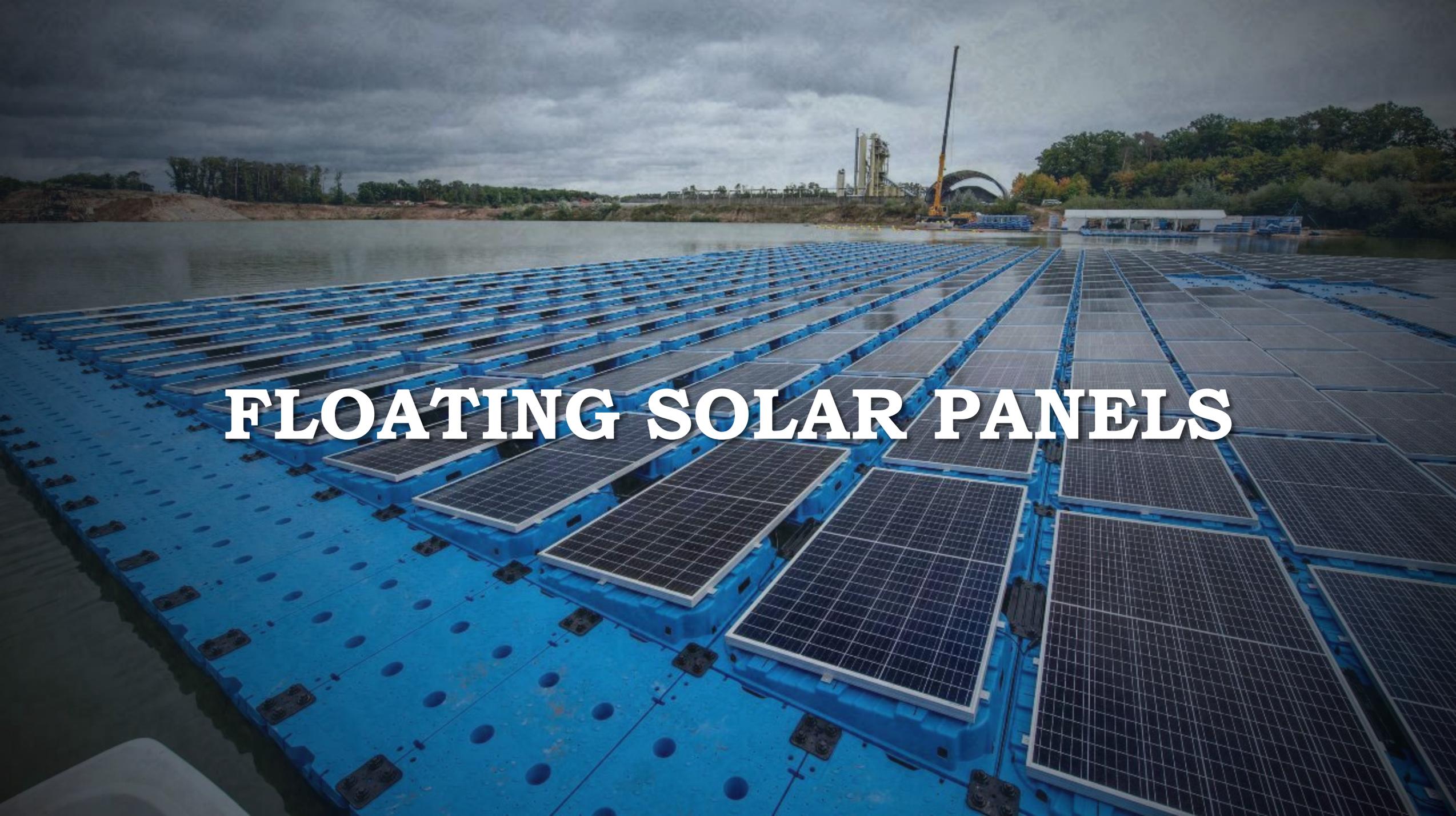
- Locations
- Conditions
- Costs

ENVIROMENTAL IMPACT

- Benefits of FPVs

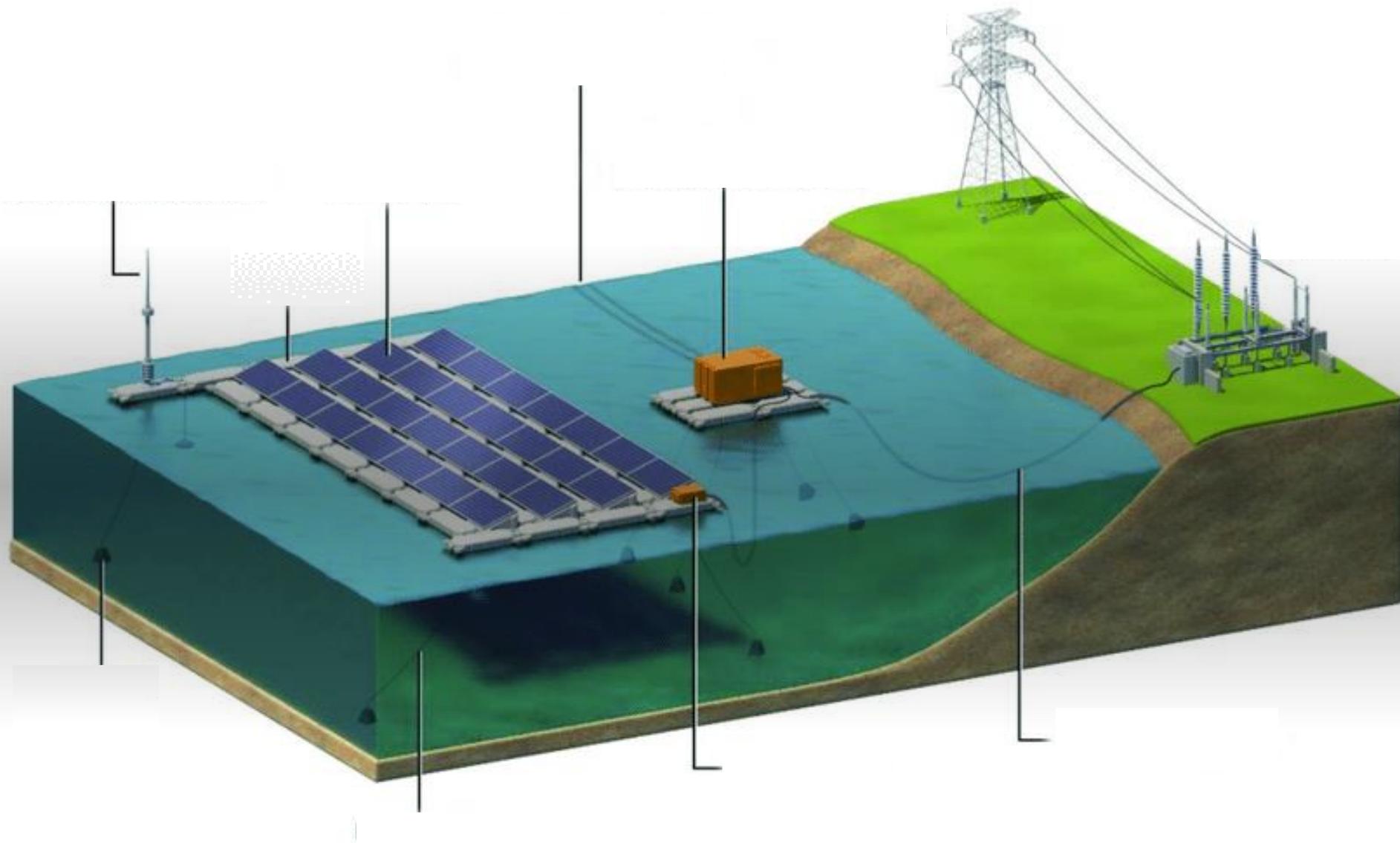
EXAMPLES

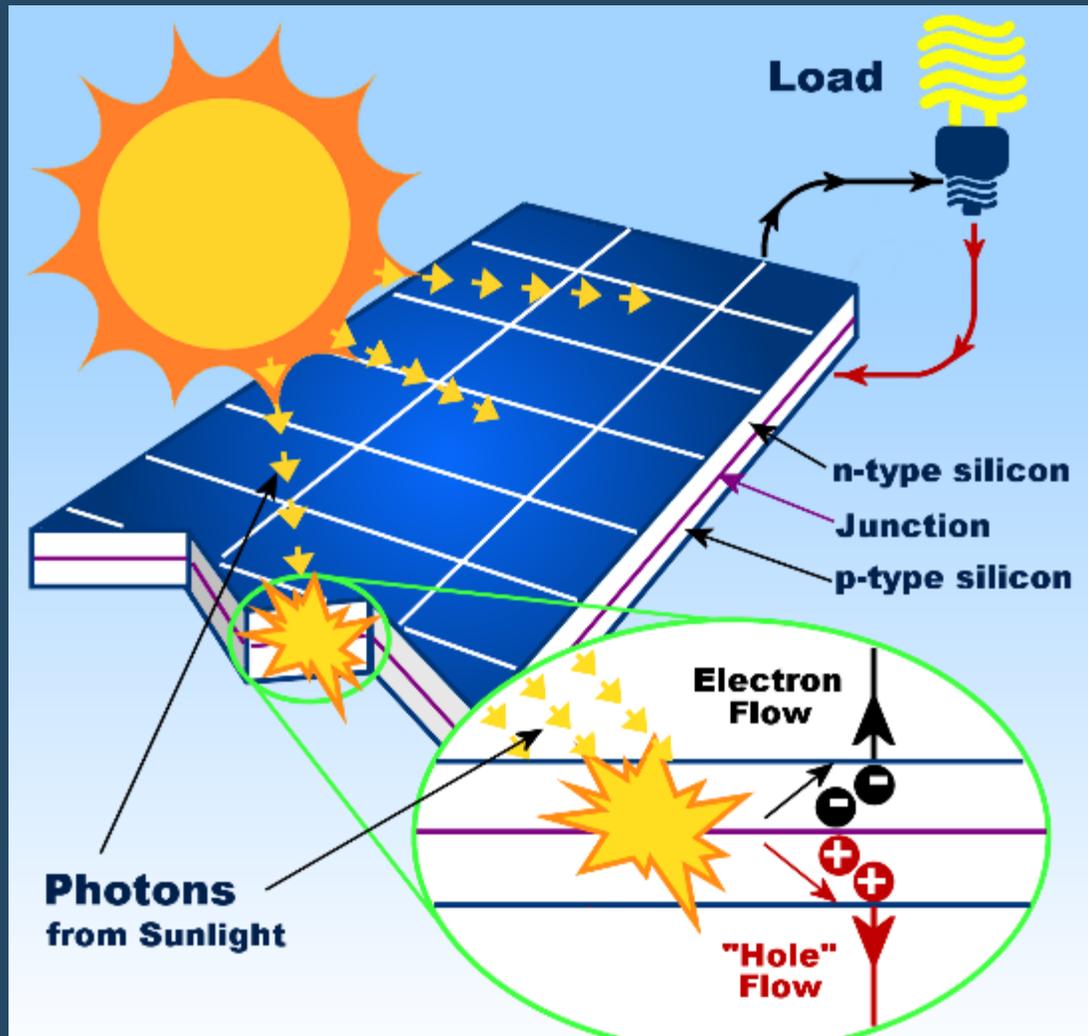
- “Aichi Project”
- “Fotovoltaico”
- “K-water”
- “Okegawa”

A wide-angle, low-perspective shot of a large-scale floating solar farm. The solar panels are arranged in neat, parallel rows on a blue floating platform that extends across a calm body of water. The sky is overcast with heavy, grey clouds. In the background, a construction site is visible on the shore, featuring a tall crane and various industrial structures. The overall scene conveys a sense of large-scale renewable energy infrastructure.

FLOATING SOLAR PANELS

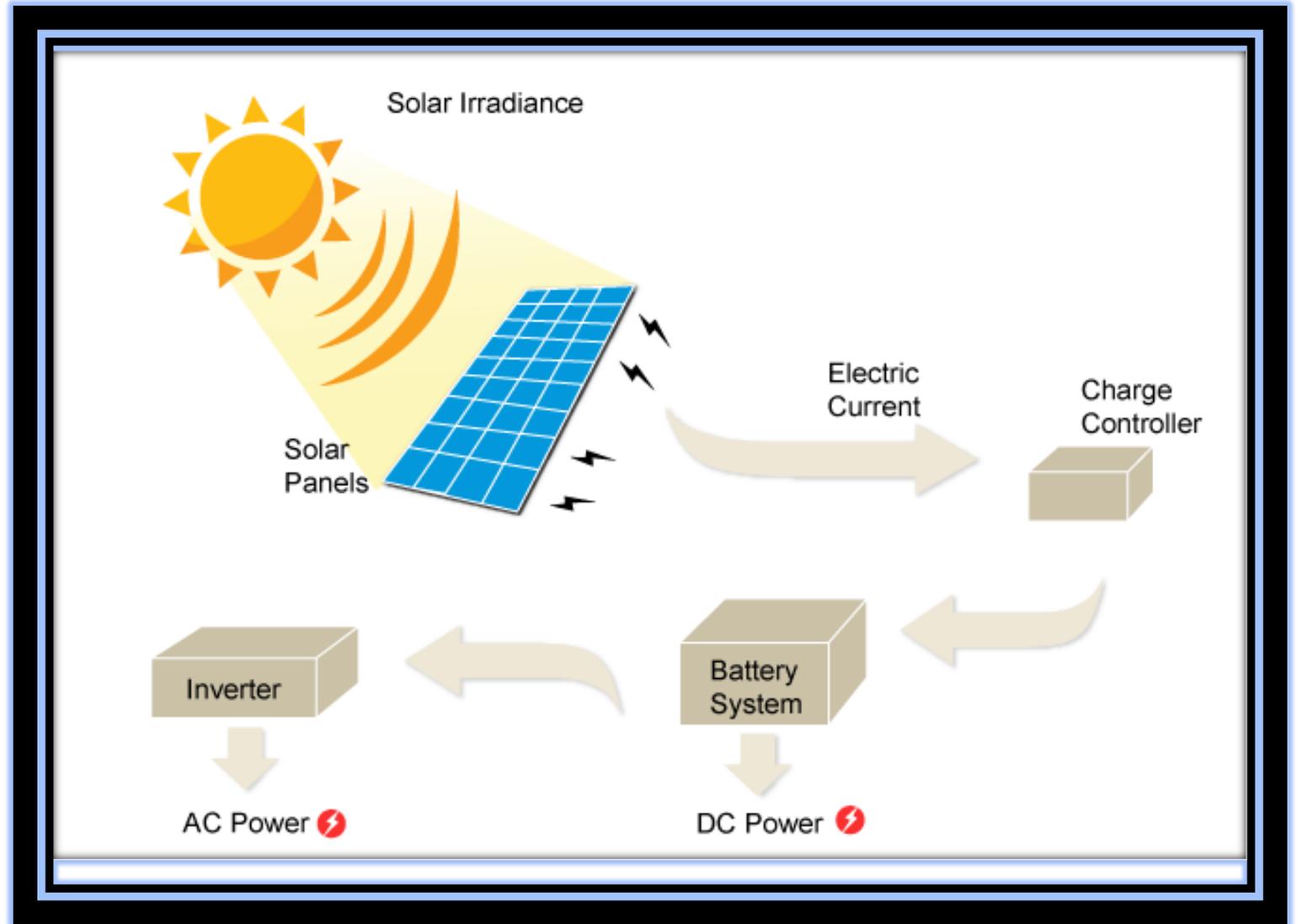
Features

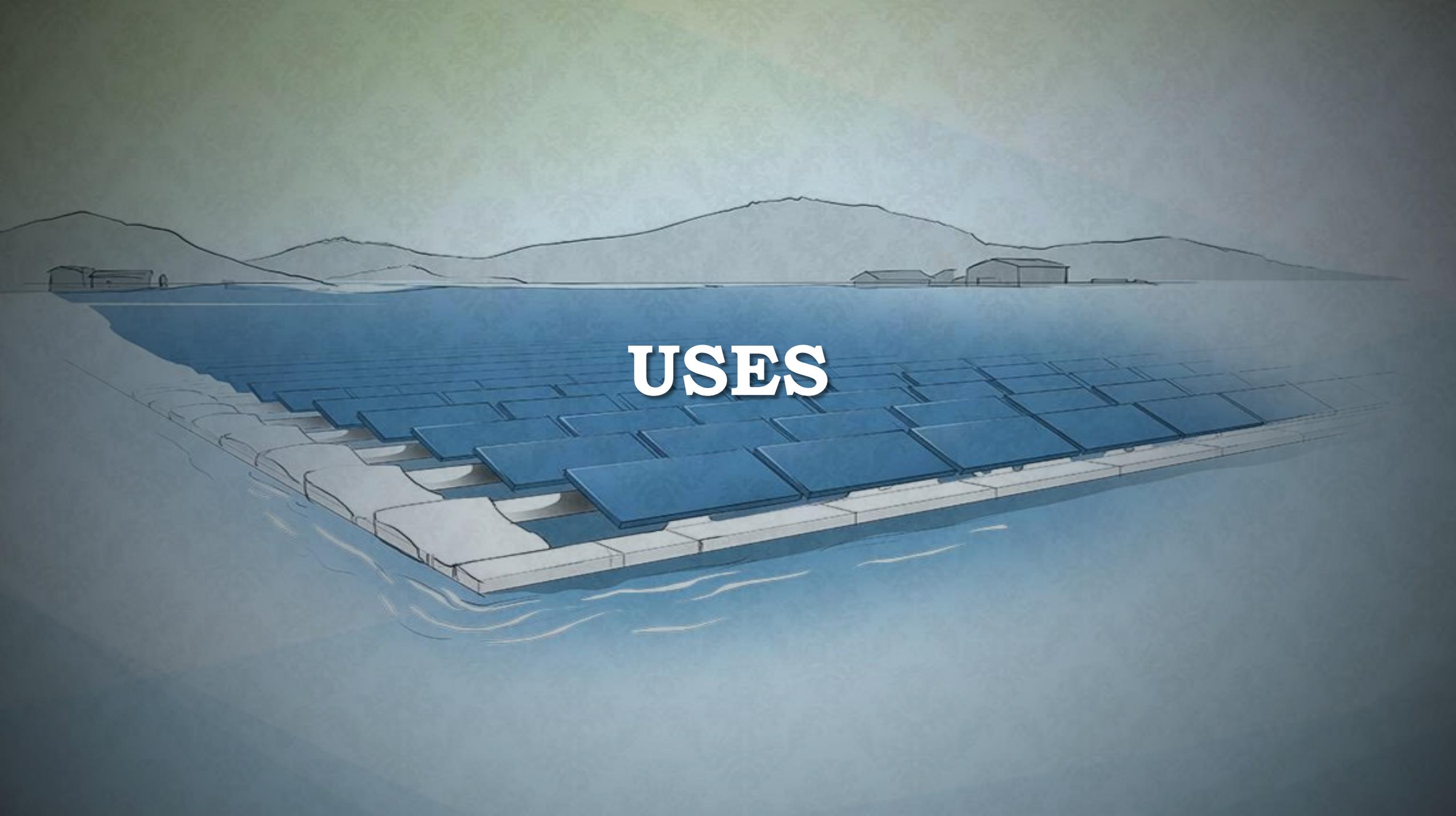




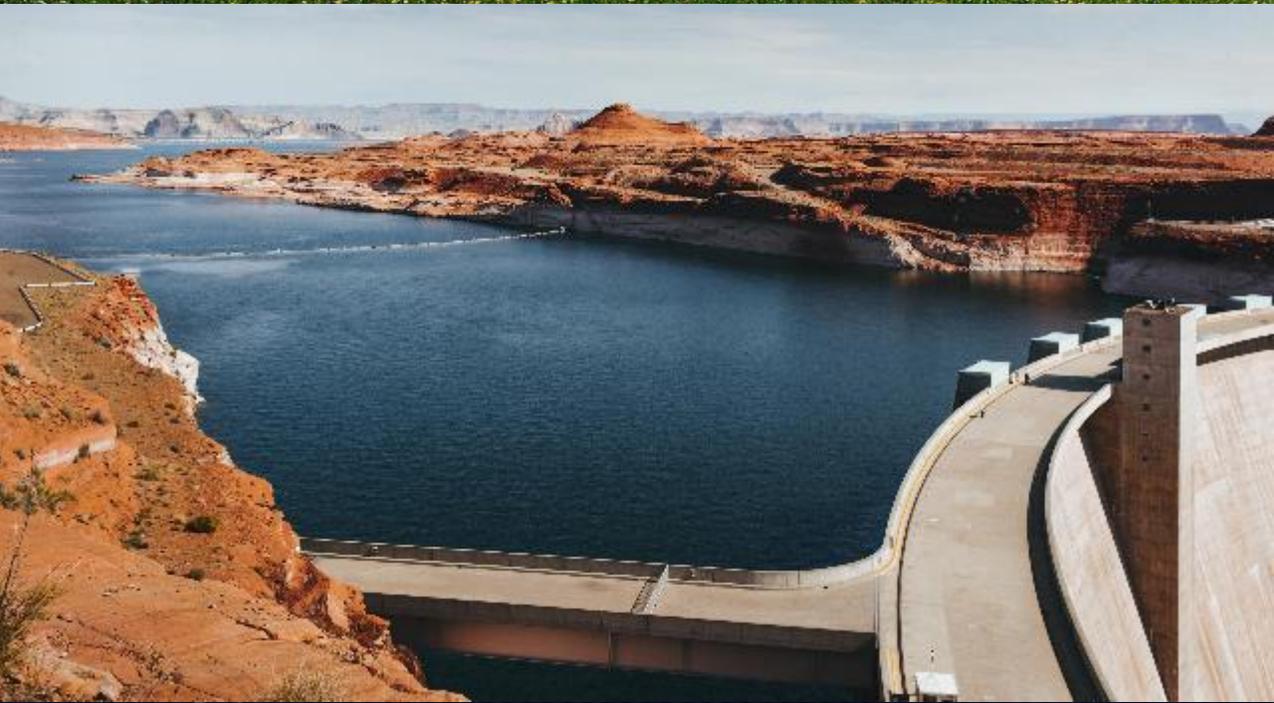
FUNCTIONALITY

Functionality





USES



LOCATIONS





CONDITIONS

COSTS



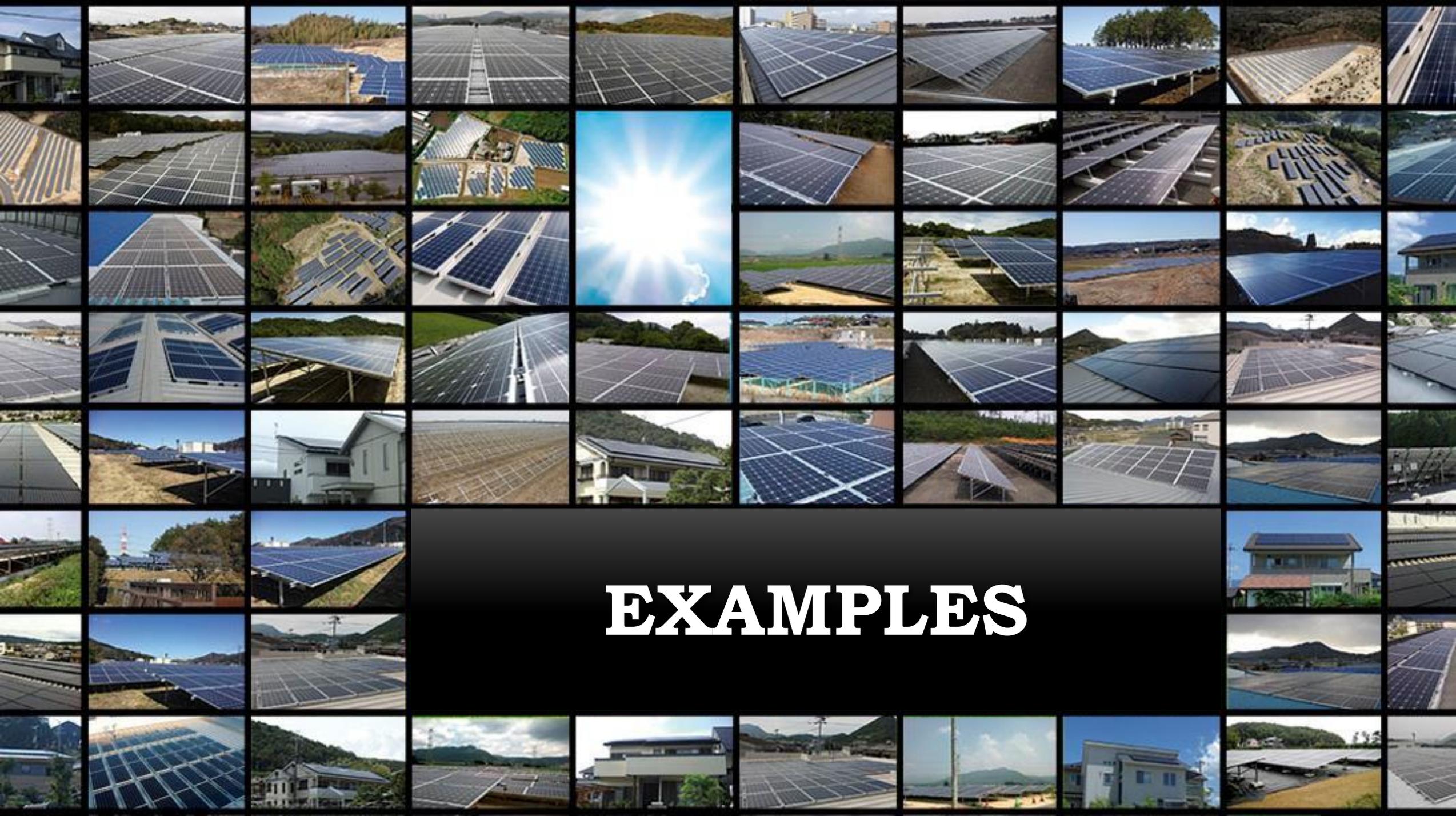
A conceptual image of a globe where the blue oceans are replaced by a grid of solar panels. The green continents are covered with lush trees and vegetation. The globe is set against a blue sky with wispy white clouds. A dark horizontal bar is superimposed across the center of the globe.

ENVIROMENTAL IMPACT

ENVIRONMENTAL IMPACT

- Reducing evaporation from water reservoirs, as the solar panels provide shade and limit the evaporative effects of wind.
- Self-cooling capabilities, which eliminates the need of extra electricity used for regular cooling.
- Improving water quality, by shading the water and as a consequence, reducing algae growth.
- Making use of space of water bodies, as opposed to using more land.





EXAMPLES



“AICHI PROJECT”- JAPAN, 2007



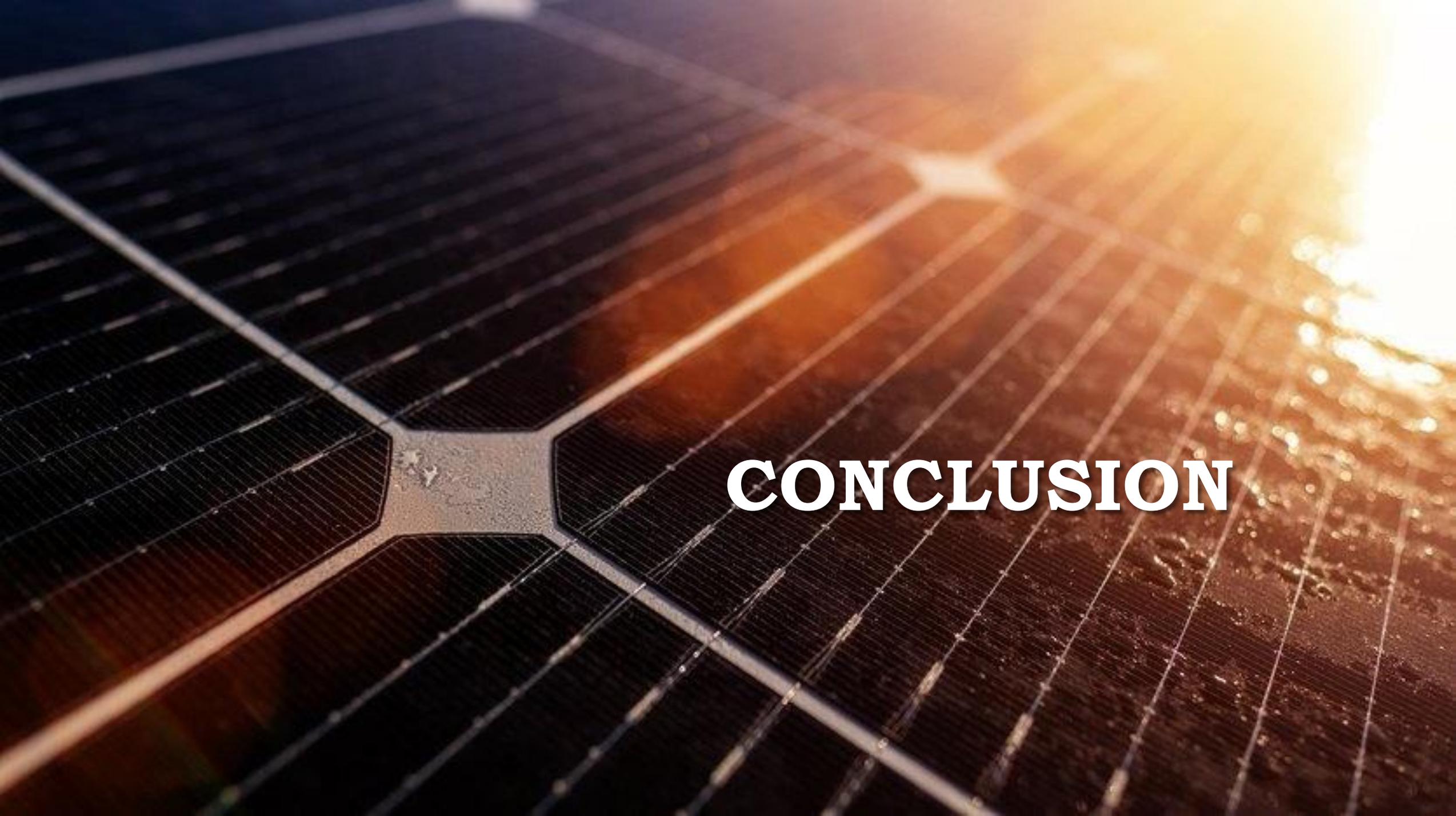
“FLOTVOVLTACO”- BUBANO, IMOLA, ITALY

“K-WATER”- HAPECHON, KOREA, 2011

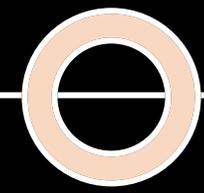
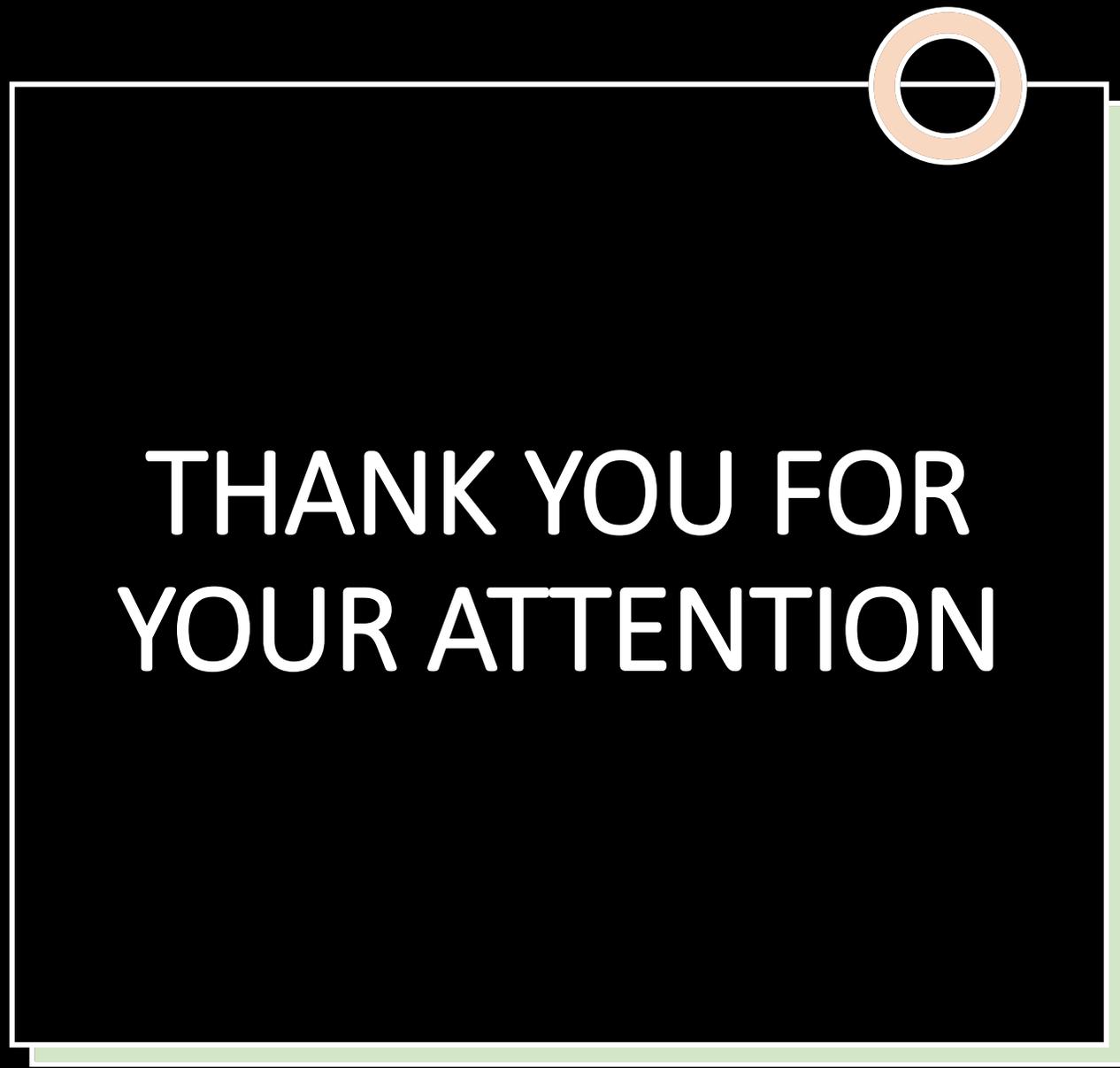


An aerial photograph of a vast floating solar farm. The solar panels are arranged in a dense, grid-like pattern on a body of water. The panels are dark blue with visible grid lines. The surrounding area includes a concrete embankment, some greenery, and utility poles in the distance under a clear sky.

“OKEGAWA” - JAPAN, 2014



CONCLUSION



THANK YOU FOR
YOUR ATTENTION

