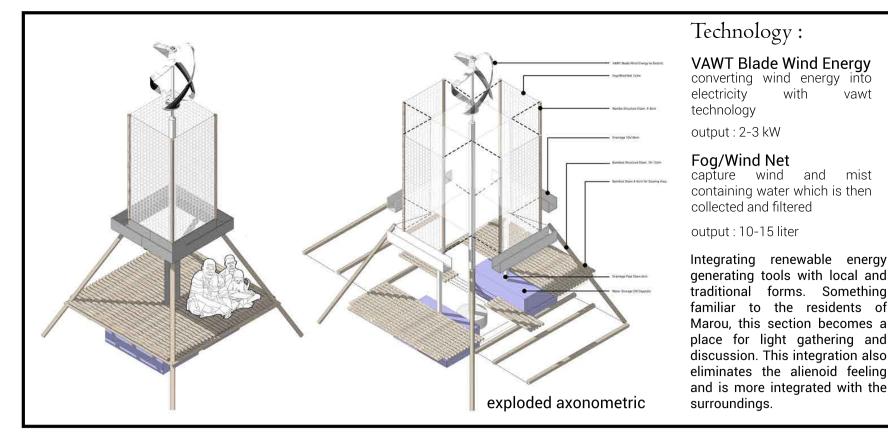
## Constructibility and Materiality

Material becomes crucial in relation to procurement and also influences the construction that will be made on site. Most of the buildings and installations use materials that are common to Marou Village, such as wood and bamboo, with a nail or rope connection system. Most of the buildings and installations use materials that are common to Marou Village, such as wood and bamboo, with a nail or rope connection system.

The building and installation seamlessly integrate renewable energy-producing goods with local materials and local construction techniques. The tower uses bamboo as a facade and functions to hold drainage and also builds a facade structure to stretch the fog net. The net material uses recycled material from previously used nets, resulting in a local installation and a sense of ownership by



Roof Water Tank Fiberglass

Bamboo Facade and Structure

Drainage 20x10cm

- Pipe Diam. 10cm

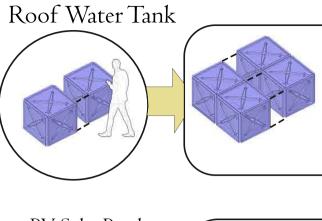
VAWT Blade Wind Energy converting wind energy into electricity with vawt use in Marou Village. The solar panels are electricity with solar panel and shaped like a traditional Marou roof, with a flat battery. technology part on the top and a sloped roof on the right output: 2-3 kW

There are two types of solar panel arrangement capture wind and mist and structure with different functions. The PV then collected and filtered containing water which is then panel structure (C) functions as storage, where the right and left sides of the PV panel function as walls and the floor of the building is the existing contour land. Integrating renewable energy generating tools with local and

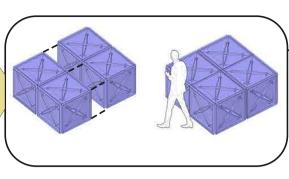
## Selecting Goods, Material for Procurement

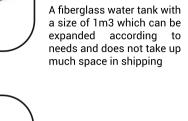
The materials used are materials that can be combined and processed on site. In accordance with the directions for shipping goods by ship and in several types of sizes, the materials are adjusted for medium-sized ships. Raw materials can be combined on site and can involve the community in the work and manufacture.

The materials used also use materials that are familiar to the local people, so that the work and management can be arranged by the local community. Some large materials require a fairly large ship size, such as VAWT for towers.

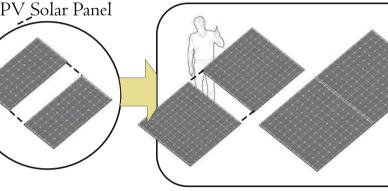


exploded axonometric

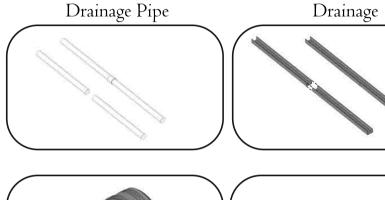


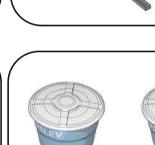


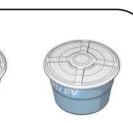
transported by ship with their origincal market sizes which will then be adjusted



PV Panel 1x2m that can be combined with other PV panels on site







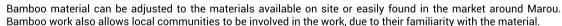


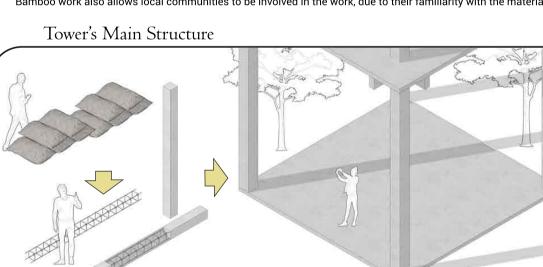


Bamboo Facade & Structure

Rain Water Tank







The tower is made with concrete cast in place on site. Materials are procured on site according to needs, foundation work and structural calculations can be assisted by external contractors. In the long term, this could also involve the

output : 2-3 kW Fog/Wind Net capture wind and mist

The process of water treatment, water storage and electricity storage into batteries is made in one place, namely at the depot. This makes it easier to control and becomes a place of learning for the community in managing renewable energy.

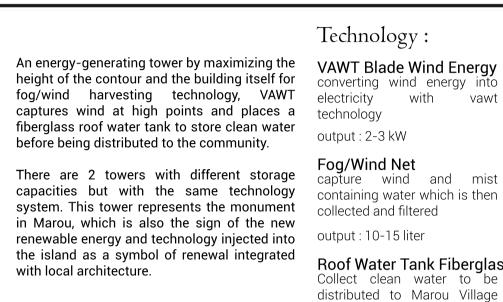
Clean Water Tank being pump to the tower of befor being use directly by t



1 Connection between vertical bamboo and horizontal bamboo. 2 Connection between horizontal bamboo with structure column.





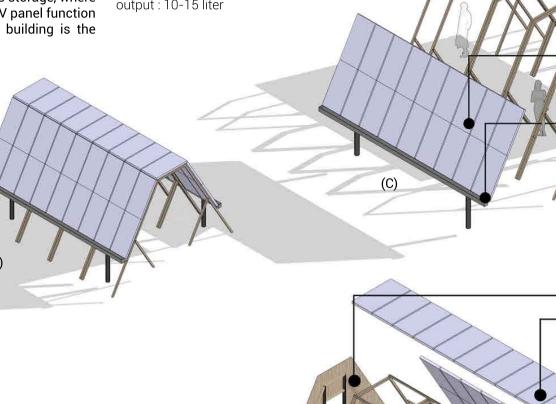


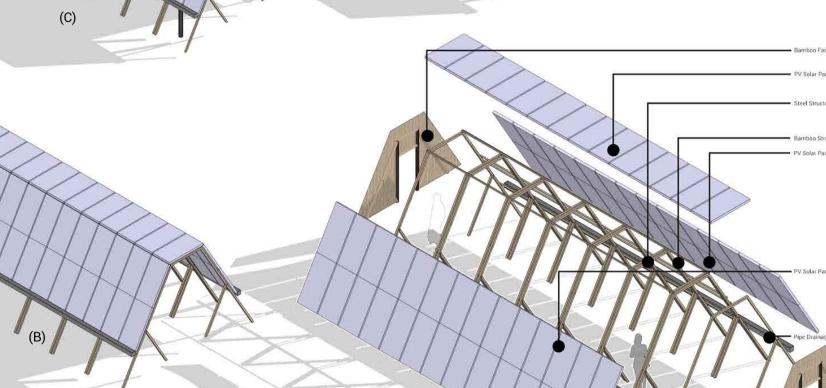
containing water which is then Roof Water Tank Fiberglass Collect clean water to be distributed to Marou Village using gravity output : 96 m3

## Technology: The solar panel area is the main source of PV Solar Panel electricity for generating electricity for daily converting sun energy into

output : 80kW

Drainage & Pipe collect water from rain which is





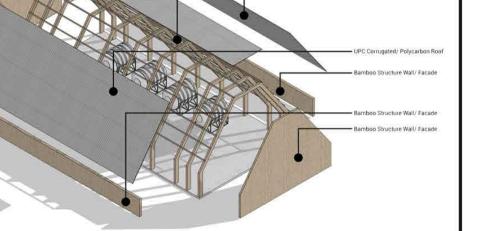
exploded axonometric

solar panel area. **Water Filtration** Managing rainwater into clean water that can be used by Marou Village

collect rain water from the

Technology:

Rain Water Tank



community in its construction.