

## ZAYED SUSTAINABILITY PRIZE

On land and in the sea, our forefathers lived and survived in this environment.

They were able to do so only because they recognised the need to conserve it, to take from it only what they needed to live, and to preserve it for succeeding generations.

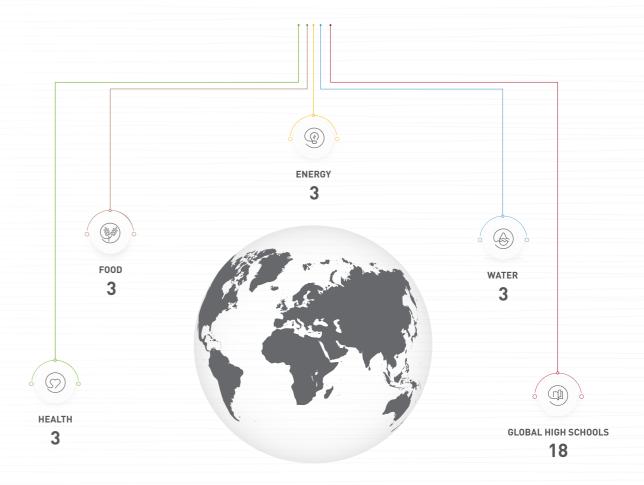
#### SHEIKH ZAYED BIN SULTAN AL NAHYAN

The late president and founding father of the United Arab Emirates 1918 – 2004



## **2020 FINALISTS**

## 30 FINALISTS



## **GIFTEDMOM**

## 2020 Finalist Health Category

GiftedMom developed a mobile app that has provided 550,000 mothers and pregnant women with access to quality healthcare and education, through the app and SMS – in Cameroon and Ivory Coast.



## ONE FAMILY HEALTH

### 2020 Finalist Health Category

One Family Health builds primary healthcare centres to expand the reach of affordable quality healthcare in Rwanda. It has impacted 2 million people at 110 clinics across 13 districts.

IMPACT

2 million people 110 clinics in Rwanda

Rwanda

HEADQUARTER

## INMED

### 2020 Finalist Food Category

INMED builds solar powered aquaponics closed systems that use 90% less water and produce up to 10 times more yield. INMED has benefitted 5,000 small-scale farmers in Jamaica, South Africa, and Peru.

, HEADQUARTER



USA

IMPACT

5,000 small-scale farmers

in Jamaica, South Africa & Peru

## THRIVING GREEN

#### 2020 Finalist Food Category

Thriving Green created a solution that grows spirulina in less-developed countries to help fight malnutrition. 500 people including children at orphanages are fed daily through its two facilities in Kenya.

IMPACT
500 people
are fed daily
in Kenya

HEADQUARTER

Germany

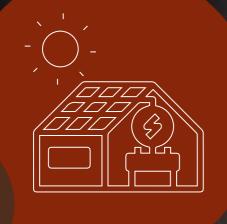
## KINGO ENERGY

#### 2020 Finalist Energy Category

HEADQUARTER

Guatemala

Kingo Energy is a pay-as-you-go service that combines a rooftop PV module with a compact battery, providing affordable clean energy to over 55,000 households impacting over 280,000 people in Colombia and Guatemala.



IMPACT

280,000 people

in Colombia & Guatemala



## AIDFI

## 2020 Finalist Water Category

AIDFI manufactures and installs affordable hybrid ram pumps, utilising the energy contained in falling water to pump water to higher elevations. It has installed 1,000 ram pumps in 520 villages, benefitting around 260,000 people, in 12 countries.



IMPACT

260,000 people in 12 countries



The Philippines

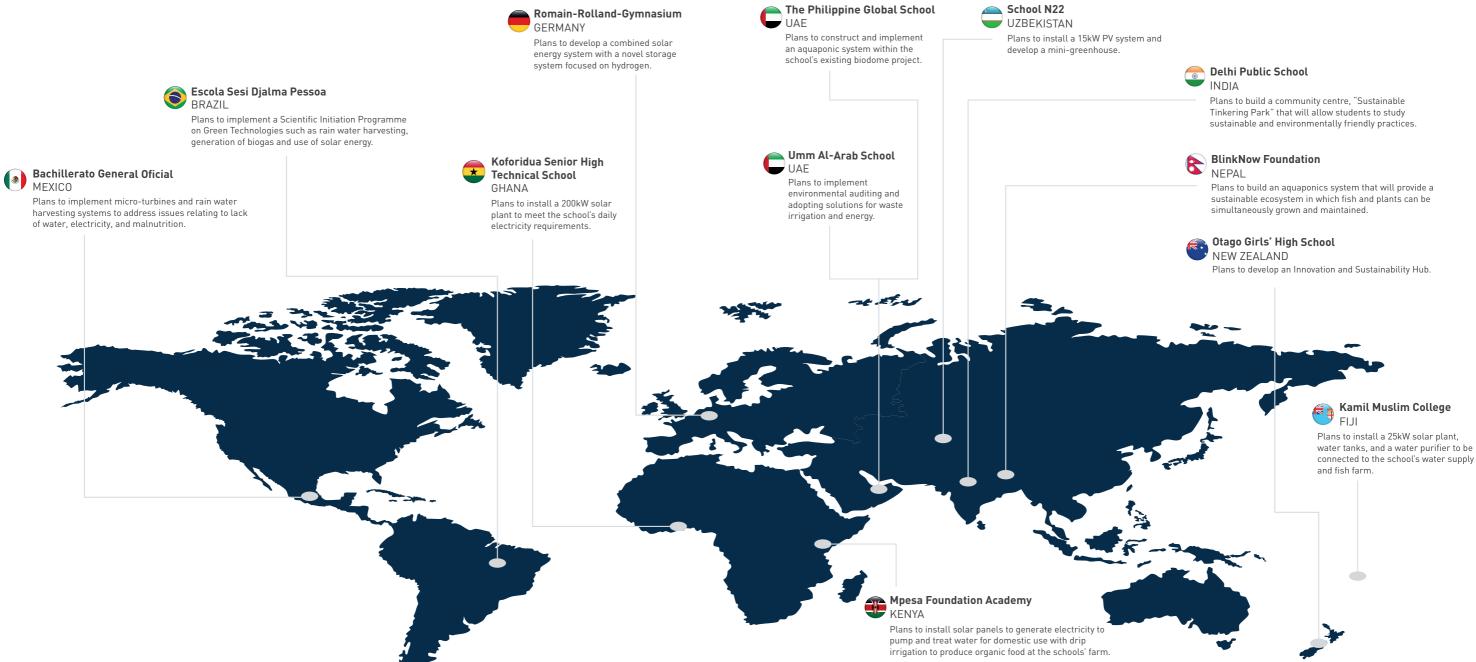
## RANMARINE TECHNOLOGY

### 2020 Finalist Water Category

RanMarine Technology developed remote controlled and autonomous aquadrones used in water treatment and water quality monitoring. It has benefitted 4 million people in Panama, United Kingdom, The Netherlands and the United Arab Emirates.

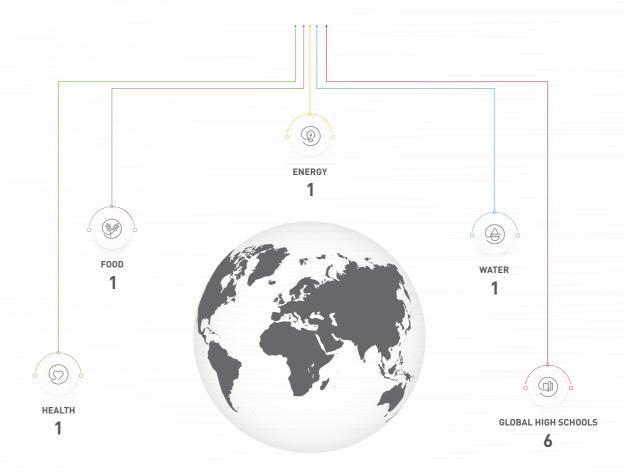


## **GLOBAL HIGH SCHOOLS**



## **2020 WINNERS**

## 10 WINNERS





## **OKUAFO FOUNDATION**

#### 2020 Winner Food Category

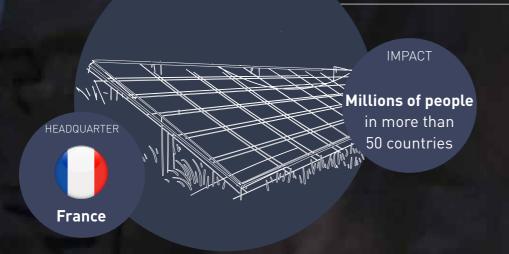
Okuafo Foundation developed a smartphone application using AI to determine and diagnose diseases in crops at an early stage without an internet connection. This has helped 30,000 farmers reduce their crop losses and improve their harvest by 50% in Ghana, Nigeria, Togo, and Burkina Faso.



## **ELECTRICIANS WITHOUT BORDERS**

#### 2020 Winner Energy Category

Electricians Without Borders (EWB) provides high quality solar equipment and training to refugee camps - ensuring long-term access to electricity and resolving social issues such as safety concerns. Millions of people have been impacted by its 129 ongoing projects in more than 50 countries. Since EWB's inception 30 years ago, it has impacted the lives of millions of people in more than 50 countries.



## **CERES IMAGING**

HEADQUARTER

USA

## 2020 Winner Water Category

Ceres Imaging created a solution that employs proprietary spectral imaging sensors and AI-based analytics to optimise water use in agriculture – saving 95 billion liters of water, per year, and serving approximately 1,000,000 acres in USA and Australia.



95 billion litres
1 million acres
in USA &
Australia

IMPACT



## HAKIMI ALIYU DAY SECONDARY SCHOOL

SUB-SAHARAN AFRICA

#### 2020 Winner Global High Schools Category

Plans to build an enviro-agricultural skill acquisition centre for student empowerment through skills development and vocational training.

PROJECT

Skills development and vocational training

COUNTR

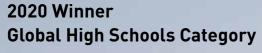


Nigeria

## **AL AMAL JUNIOR HIGH SCHOOL**

Morocco

MIDDLE EAST & NORTH AFRICA



Plans to implement a project focused on generating water through the use of clean energy.

PROJECT

Water generation

## **UNITED WORLD COLLEGE (MOSTAR)**

**EUROPE & CENTRAL ASIA** 

#### 2020 Winner **Global High Schools Category**

Plans to build one of the first sustainable buildings in Mostar,





## EUTAN TARAWA IETA JUNIOR SECONDARY SCHOOL

EAST ASIA & PACIFIC

#### 2020 Winner Global High Schools Category

Plans to install solar panels on the rooftop, develop an organic food production area, install rainwater tanks, and solar powered pumps.



## **CASE STUDIES**

# 335 million people were positively impacted by the winners



#### WE CARE SOLAR

#### 2019 Winner Health Category

Ruth Ayuo is a 23-year-old Ugandan midwife whose smile can brighten a room. When she began working at the Goma Health Center III, in the Mukono district, she faced the challenge of providing emergency care in a clinic without reliable electricity. Ruth described a delivery she conducted one night, before the facility received a Solar Suitcase provided by We Care Solar.

She arrived at the facility in the evening to admit a patient who was in active labour. The facility was in total darkness. The only source of light? Her cellphone.

"I examined the mother with a torch in my mouth and found she was ready to push the baby. I was lucky that my phone was charged so the attendant held it for me and I conducted the delivery." She described additional challenges with inadequate lighting. "It takes a long time to conduct deliveries, and cleaning up after delivery risks our health in situations where the mother is HIV positive."

While the clinic was connected to the grid, this situation was a routine ordeal for the midwives in the Mukono district of Uganda. Due to frequent power outages, they often find themselves in complete darkness. However, on 19th May 2019, Ruth's facility received a Solar Suitcase – funded by the Zayed Sustainability Prize, following We Care Solar's win at its 2019 awards.

"This was like a miracle to the facility!" says Ruth. With deliveries that can now be conducted in a clean well-lit environment, she can keep her cell phone charged and enjoys the addition of the fetal Doppler device, included in the Solar Suitcase.

"With the fetal Doppler, we are able to do fetal monitoring with ease and get accurate measures. Mothers love it and this has increased [safety across] our monthly deliveries! We thank We Care Solar for this innovation and for thinking about us."

Impact: 144,000 women and newborns gained access to affordable energy, 72,000 of whom gained access to maternal and newborn healthcare; 2,400 health workers trained in the operation and maintenance of Solar Suitcases; 53 kW of solar energy capacity provided, resulting in 2,000 kWh of energy savings; 1,646 tCO<sub>2</sub> of GHGs offset.



#### SANKU

#### 2019 Winner Food Category

Zaituni is a 24-year-old woman from Tanzania, and mother of a three-year-old child named Salma. Two years ago she moved from her village to Tanzania's largest city, Dar es Salaam, searching for a better life for herself and her daughter.

Contrary to what she hoped, life became more difficult for her and her baby. Living on under US\$1 a day, the family ate just one meal daily – a basic porridge of maize flour – some days not eating anything at all. As a result, Zaituni began to see her baby's health deteriorate. She feared Salma would end up just another statistic, in a country where 130 children die daily due to poor nutrition.

Thanks to advice from her local health centre, which advised Zaituni on the importance of essential nutrients in baby's daily diet, Salma's health began to improve after Zaituni started buying fortified flour from one of Sanku's supported mills, Isanga.

Sanku is a social enterprise that provides small African flour millers with IT-enabled fortification technology and quality nutrients, ensuring the foods that people eat the most contain critical lifesaving nutrients required to thrive and survive.

"I now only buy my flour from mills that fortify," says Zaiyuni, "because it has better nutritional quality and my daughter loves the porridge I prepare. I know this decision has saved her life."

As a result of winning the 2019 Zayed Sustainability Prize, Sanku has been able to enable 200 millers, across Tanzania, just like Isanga, to fortify their flour with lifesaving nutrients. These millers are now feeding close to one million people every day, including Zaiyuni's baby girl. With good health now assured, Salma has a million better chances for a brighter future.

**Impact:** 1 million lives reached since winning the Prize, 2 million in total, to date; 600 people trained or educated. 200 new mills established, 10 head office jobs created (doubled to 20).



#### **SUNNA DESIGN**

#### 2018 Winner Energy Category

Since 2017, Burmese Rohingya have been flocking to refugee camps in Southern Bangladesh. Already overcrowded, Cox Bazaar – the largest refugee settlement in the world – continue to receive Rohingyas, with estimates from various organisations suggesting a total of one million refugees will soon be surpassed.

With living conditions in the camps extremely precarious, the findings of NGOs and international organisations on the ground show that these refugees have already suffered from repeated violence and are often left destitute in camps, with little to no security.

Without any form of light after sunset, it was difficult for older refugees, like Samunda Khatan, to get to the toilets. Injuries and threats to safety were heightened, with many refugees also reporting cases of physical abuse towards women and children. To this end, Zayed Sustainability Prize winner (2017), Sunna Design, in conjunction with 2020 winner (Energy Category), Electricians Without Borders, saw electrification of sensitive areas such as latrines or health centres as an essential role in providing both security and access to fundamental human rights to the Rohingyas.

"Light for the Rohingyas" was therefore conceived as both an installation and education project, providing two of the main camps at Cox's Bazar, Ghumdhum and Balukhali, with around 100 solar kits (composed of three to five lamps that charge their batteries during the day), and approximately 700 solar lights and 50 solar street lights.

The project's implementation also provided work for Bangladeshi and Rohingya apprentices to be trained in understanding and installing the solar-powered equipment across these two camps, wherein 70 per cent of the population are female.

Having received training as part of the project, Sahab Uddin, a refugee and apprentice said: "This training has allowed me to regain confidence in myself and in the future, I feel empowered and valued through my work as a solar technician, within the camp."

**Impact:** In 2018, 7,000 solar street light units were installed, impacting approximately 700,000 beneficiaries.



## IMPACT 375,000 litres of water saved per day in 6 countries **HEADQUARTER Singapore**

#### **ECOSOFTT**

#### 2019 Winner Water Category

Niyati is a 17-year-old girl from Silua Village, a community of 200 people near Jabalpur, in Central India.

Up until the age of 12, all her water needs were met by a rivulet near her home. As human activity increased in the area, the rivulet became heavily polluted by household and agricultural waste. She, together with others in her village, washed themselves in the rivulet and drank dirty water from the same source.

During the dry season, even this polluted water was no longer available. Villagers would have to walk or cycle to fetch water from distant sources, several kilometres away. Proper sanitation was not offered and people were falling ill from the consumption of contaminated water.

Through a community-led transformation programme, initiated by ECOSOFTT, the villagers' lives have been dramatically changed for the better. Treated water is now supplied to each person at 75 litres per capita, per day. This is sufficient for all water needs, including drinking, cooking, showers, toilet flushing, and laundry. A toilet and bathing room has been built for each household, with a community wastewater treatment system that enables ground water recharge and nutrient recovery. With access to clean water and proper sanitation facilities comes better health, time for productive activities, and improved livelihood opportunities.

Since winning the Zayed Sustainability Prize, the growth of ECOSOFTT's network, financial resources and brand awareness has helped the organisation expand its projects into a greater number of communities, across India and Malaysia.

Thanks to better personal hygiene, health and well-being, Niyati is growing up as a fine young lady and graduating from a local high school. She looks forward to becoming a doctor or accountant one day and to bringing further development to her community.

**Impact:** 5,000 people gained access to clean drinking water; 1,000 people gained access to sanitation and hygiene; 150 people trained in the construction of water and sanitation infrastructure; and 375,000 litres of water, per day, are saved due to new efficiency measures.



#### AFRICAN LEADERSHIP ACADEMY

#### 2019 Winner Global High Schools Category - Sub-Saharan Africa

Day Zero. That was to be the day in mid-2018 that an international coastal city – Cape Town, South Africa – was to run out of water for its inhabitants. "How could this be so? How can a major city situated on an ocean run out of water?" asked African Leadership Academy (ALA) students Jesse Forrester, from Kenya, and Wuntia Gomda, from Ghana.

Motivated by this impending threat, Jesse and Wuntia wanted to do something about it. Training to become future leaders at ALA, they wondered how they could take the initiative and better manage the water resources on their campus. In addition, and for any project to have long-lasting effects, they envisaged the need to teach people suffering from water shortages how to do the same.

After consulting with science teachers, Hans Sowder and Matthew Young, Jesse and Wuntia wrote a proposal for the Zayed Sustainability Prize. Their goal: To take all of the wastewater generated by the dining hall on ALA's residential campus, approximately 1,000 litres per day, and re-use it a second time on campus, thus decreasing the water requirements of the campus.

A year later, The "Living Machine" is now a reality.

ALA's dining hall wastewater now flows through The Living Machine, a water treatment system that employs only natural ecological processes to clean wastewater. As an added benefit, biogas produced in the early stages fuels one stovetop burner in the kitchen, thus lowering ALA's carbon footprint.

Treated water is routed to the campus' extensive sprinkler system, used to irrigate the students' farm, and directed toward the newly installed aquaponics system, also built with Prize funds. Excess water is released into a natural stream meandering through campus, improving aquatic and riparian biodiversity along the way.

As part of the 24-month allocation for project completion, from winning the Prize, future plans include taking lessons learned from wastewater treatment and agriculture to address stewardship and sustainability challenges in socioeconomically challenged communities.

**Impact:** Approx. 30,000 litres of water is saved every month. Over the course of the project, over 5,000 people are estimated to be impacted.

















ZAYED SUSTAINAS PROSE



