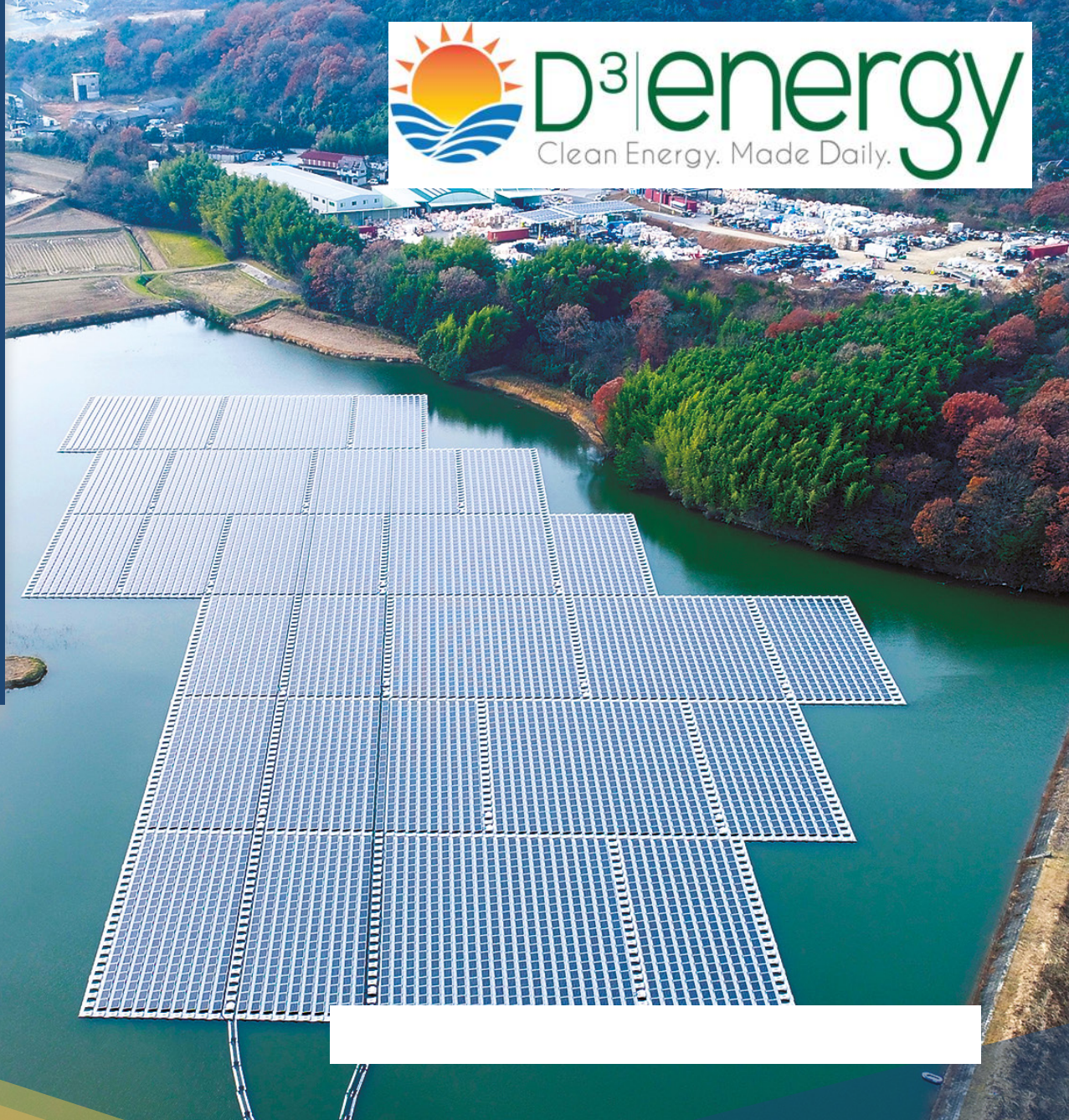




# The Floating Solar Expert Company Profile



[www.cieleterre.net](http://www.cieleterre.net)



[www.D3Energy.com](http://www.D3Energy.com)





D3Energy is a premier solar developer, exclusively developing floating solar (FPV) projects with expertise in all areas of FPV from early stage development & engineering, installation, service, and maintenance.

D3Energy has engineered and/or developed projects all over the world, including multiple projects in the state of Florida, New Zealand's first ever floating solar array, water storage reservoirs in the Caribbean, and various other projects here in the U.S. Most recently, D3Energy developed and installed an FPV system for the U.S.'s largest electric company, Florida Power & Light at Miami International Airport. D3Energy believes FPV is the 'wave' of the future in the solar industry.

Our manufacturing partner, Ciel & Terre has been distributing its industry leading solution, Hydrelío® since 2011. As the floating solar pioneer and expert, they provide their solution all over the world. Today, there are over 200 FPV systems, in 30 different countries, generating over 690MWp that utilize the Hydrelío® technology.

D3Energy and Ciel & Terre have entered a partnership to market and develop floating solar systems, primarily focused on the United States.





# TABLE

- p.3 About Us
- p.4 Historical Milestones
- p.5 What We Offer?
- p.6-7 Why Floating Solar?
- p.8 Hydrelío<sup>®</sup> Technology
- p.9 Projects Overview
- p.10 Collaborations & Partnerships
- p.11 Worldwide Presence
- p.12 Contact Us



## ALL RIGHTS RESERVED

The entire contents of this document are the property of Ciel & Terre<sup>®</sup> or its partners and are protected by copyright.



# ABOUT US

---

Initially specialized in the integration of rooftop and ground-mounted PV systems, Ciel & Terre® has then followed the path of innovation to develop the **patented technology 'HYDRELIO®'**, an optimized floating system for solar plants to be installed on water.

Ciel & Terre® has been distributing its solution and developing floating PV plants for commercial, industrial, and local government institutions since 2011. As the **floating solar pioneer and expert**, we provide our solution all over the world through strategic partnerships.

Today, **200 floating PV farms**, equivalent to over **375 MWp**, utilize Hydrelío® technology and this number is expected to reach more **690 MWp in 2020**.



14

YEARS  
EXPERIENCE



13

LOCAL  
OFFICES



160

COLLABORATORS  
WORLDWIDE

# HISTORICAL MILESTONES

55

Traditional PV plants installed



200

Floating PV plants installed



70 MWp

The largest floating PV plant using Hydrelio® technology



TRADITIONAL PV

FLOATING PV

2006

Foundation of Ciel et Terre



2009

Arch'Helios® – patented rooftop racking system

2010

Hydrelio® – patented floating PV system

Installation of the first prototype in 2011 (*Piolenc, France, 15 kWp*)

Full orientation towards an innovative concept, 'floating solar'.



2013 - Okegawa, Japan, 1,080 kWp

2013

Ciel et Terre International – C&T Holding

Ciel Terre Japan – first office abroad

Installation of the world's first MW-scale floating PV plant (*Okegawa*)

2015

Floating Solar UK – JV in the UK | CT East Asia Ltd. – JV in China

Techwin Co., Ltd – License in South Korea

2016

Ciel et Terre USA Inc.

CT Taiwan – JV in Taiwan

2017

Ciel et Terre ASEAN & Oceania

Akuo Energy – License in France

2018

Ciel et Terre India

Sunlution | F2B – Licenses in Brazil

2019

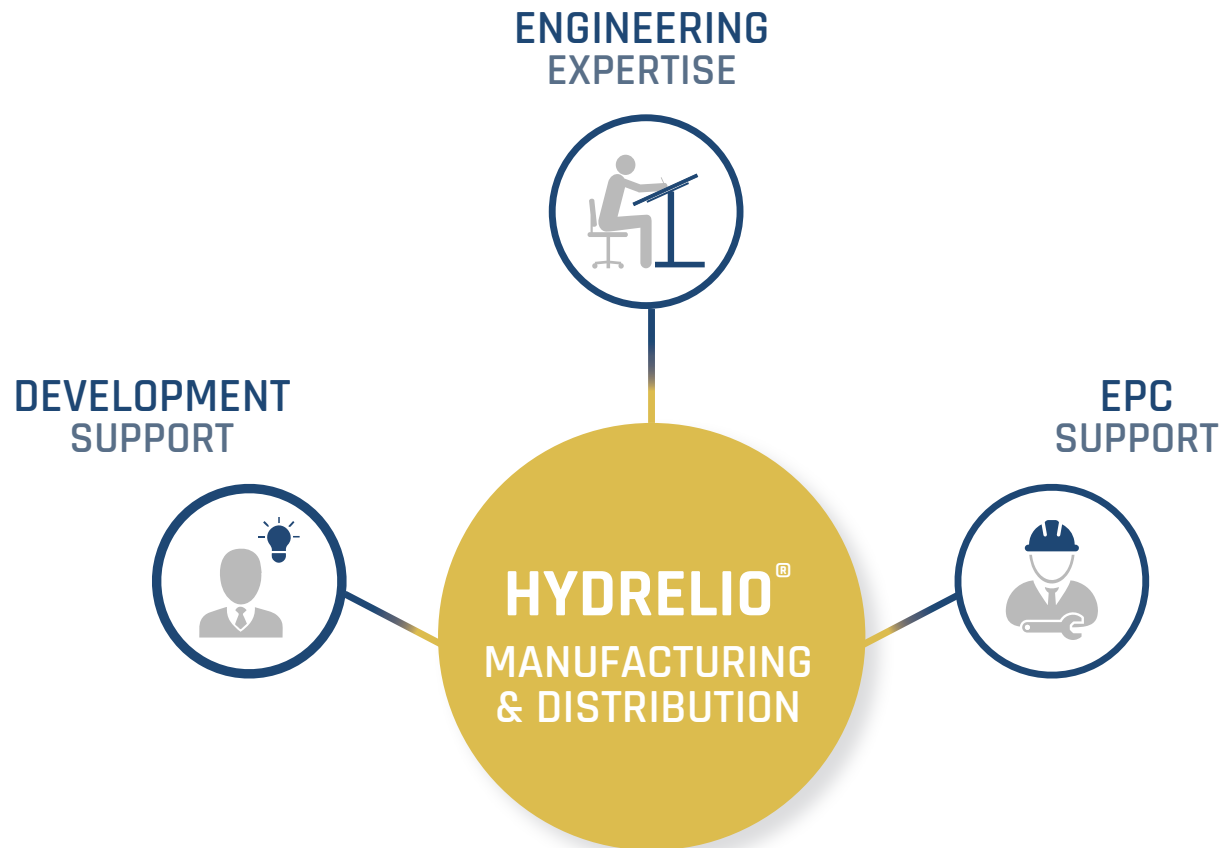
Ciel et Terre ASEAN & Oceania – Second Office in Thailand

2020

Laketricity, a Ciel & Terre company

# WHAT WE OFFER? EXPERTISE WITH CUSTOMIZED SOLUTIONS

Over the years, Ciel & Terre® has gained a recognized expertise and a strong experience in the installation of large-scale floating PV plants on artificial and fresh water reservoirs. Our team has a thorough understanding of floating PV's challenges and is able to assist you all along the project development process. Our expertise encompasses: feasibility study, engineering design (Hydrelío® and anchoring), supply of anchoring systems, construction training and supervision, as well as consulting solutions.



# WHY FLOATING SOLAR? AN ALTERNATIVE TO TRADITIONAL PV

Floating solar particularly makes sense in areas **where valuable land is scarce and/or expensive**, for various reasons: necessity to preserve agricultural and natural lands, areas with a high population density, small or island countries... Suitable ground is costly and land is rarely available for solar projects near to grid infrastructures. Taking advantage of these existing but unused water surfaces – often close to the most intensive energy users, namely industrial and urban areas – prevents massive infrastructures, expensive transport and distribution, and technical losses.

Hydrelio® technology is the perfect solution for **many types of water bodies**, including **dams, quarry lakes, irrigation or water-treatment ponds**. Additionally, these man-made reservoirs are typically unobstructed from the sun, kept out of sight, and located near energy-intensive consumption sites making these spaces ideal candidates for solar PV systems.



“ The Third  
Pillar of  
The Solar  
Industry ”

@PVTech Magazine



## ENVIRONMENTAL BENEFITS



- Neutral or positive environmental impact, no danger to existing ecosystems
- Minimizes evaporation by covering water
- Improves water quality and reduces algal bloom thanks to the platform's shading
- Limits reservoir erosion by reducing wave action

## SOCIAL BENEFITS

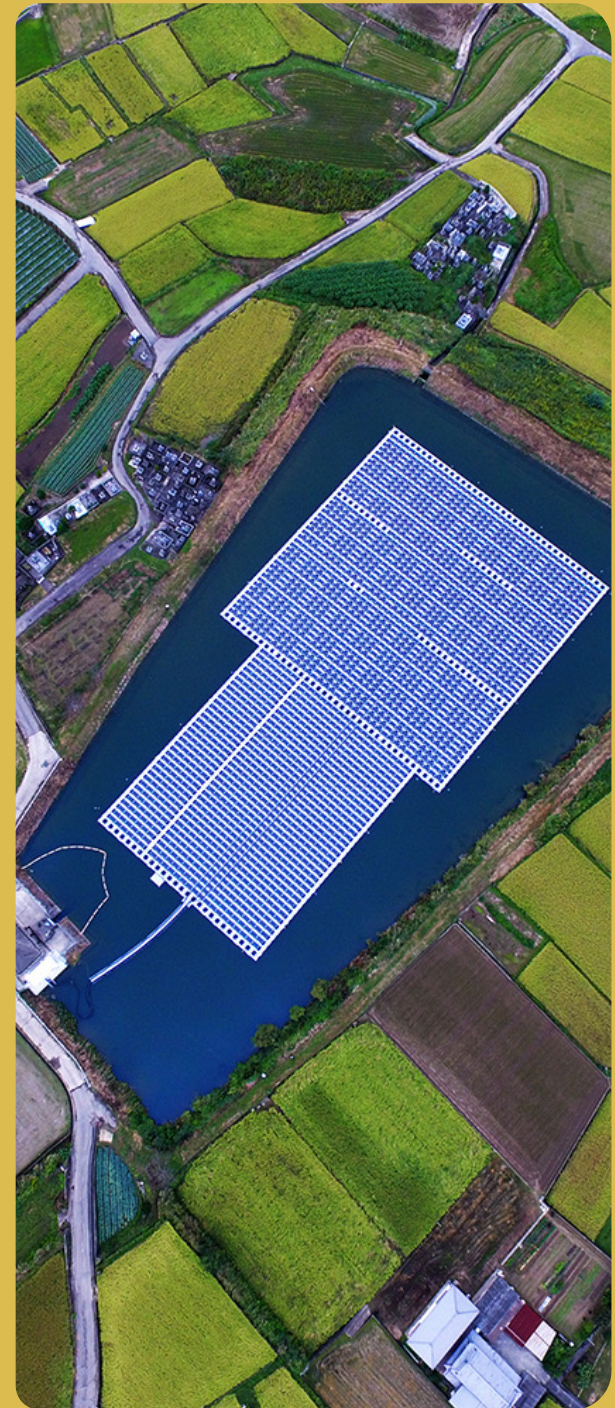


- Preserves valuable land and water for other uses
- Rehabilitates contaminated areas with clean energy
- Compatible with recreational activities
- Amenity, positive aesthetics

## ECONOMIC BENEFITS



- Converts unused spaces into profitable areas
- Reduces grid-connection costs and major infrastructures investments
- Smoothest & fastest development processes
- Enhances electricity generation thanks to water's natural cooling effect





# HYDRELIO<sup>®</sup> TECHNOLOGY

40+

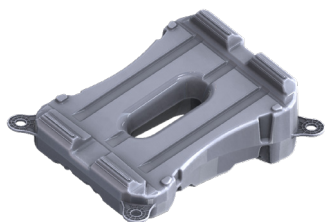
LINES OF  
MANUFACTURING

7

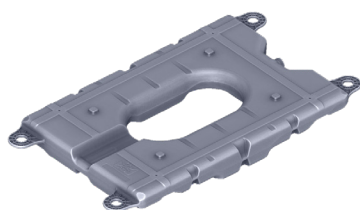
REGISTERED  
PATENTS

9

YEARS OF  
CONTINUOUS R&D



**Hydrelion<sup>®</sup> Classic**  
The standard version



**Hydrelion<sup>®</sup> aiR**  
The 'airy' version



**Hydrelion<sup>®</sup> Equato**  
The low-tilt version

The Hydrelion<sup>®</sup> product line is composed of 3 products adapted and designed in accordance with regions' and markets' specificities.

**Developed in 2010** and largely deployed across **30 countries**, Hydrelion<sup>®</sup> technology is continuously optimized thanks to R&D efforts and manufactured as per a strict quality process in any country.

Lab-tested and field-proven worldwide, Hydrelion<sup>®</sup> is recognized as the 'standard' in the floating PV industry, and has successfully demonstrated its **durability and bankability**.

**THE HYDRELIO<sup>®</sup> CONCEPT:**  
'SOLAR, ON WATER'

Blow-molded HDPE floats supporting PV modules, and assembled together to form a floating PV platform.



**RELIABLE,  
STRAIGHTFORWARD,  
ECO-FRIENDLY.**



# PROJECTS OVERVIEW



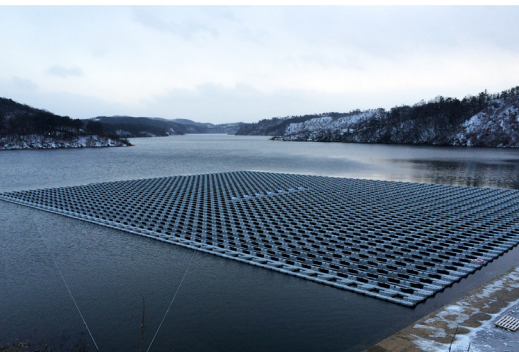
England | 6,338 kWp



Japan | 2,313 kWp



China | 32,686 kWp



South Korea | 495 kWp



Netherlands | 1,845 kWp



USA | 4,403 kWp



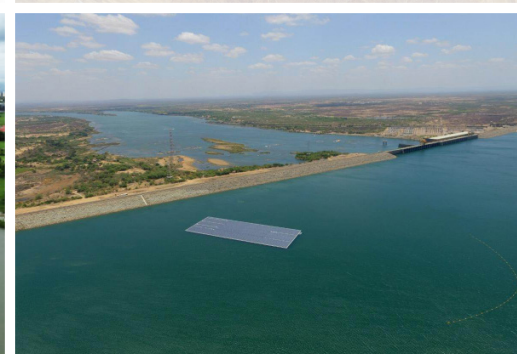
Taiwan | 4,023 kWp



Cambodia | 2,835 kWp



India | 450 kWp



Brazil | 1,004 kWp



France | 17,015 kWp

**690+**  
**MWp**

in total

## TRACK-RECORD

**200 Projects**  
Connected

**In 30 Countries**  
on the 5 continents

**IPP PROJECTS**  
(INDEPENDANT POWER PRODUCER)

**40 Floating Plants**  
Equivalent to **50+ MWp**

**70+ Million Euros**  
Invested



# COLLABORATIONS & PARTNERSHIPS

At Ciel & Terre®, we aim to **deliver high quality services to our customers**, by investing in R&D to improve our system and recruiting experts of the solar market. Our team – mainly composed of **engineers and business developers** – counts 150 collaborators worldwide and will accompany you throughout the development of your floating PV projects.

We are proud to develop our activity all over the world, setting up partnerships based on **trust, transparency and mutual willingness** to share best practices, knowledge and experiences.



**Bernard PROUVOST**  
Founder & Chairman



**Alexis GAVEAU**  
CEO

OUR MOTTO

PROXIMITY,  
QUALITY,  
INNOVATION.



Since 2015, we have integrated the Japanese company **TCC (Tokyo Century Corporation)** as a valuable shareholder. With 50 years of experience, TCC ranks among the **world's largest institutional investors** by managing billions of dollars of assets, positioning solar energy as a key target for its bankability and sustainability.



**Noria Invest** is a French family fund building a portfolio of minority **investments in small and medium size companies** in the Ecological Transition sector.



**Cap3RI** is a **public-private venture** focusing on Northern France companies dedicated to Responsible Business.



**BPI** is a **Public Investment Bank**, who has been a long-term partner for Ciel et Terre since the early years as a lender.



**Itochu Corporation** is a **Japanese trading company**, which is international and multisectoral. It is a shareholder of TCC.



# WORLDWIDE PRESENCE



Founded in France, Ciel & Terre® has been expanding since its creation and continuously entering new markets. We provide our floating solar solutions all over the world through our subsidiaries and partners.

## 15+

### AGENTS & DISTRIBUTORS

#### EMEA

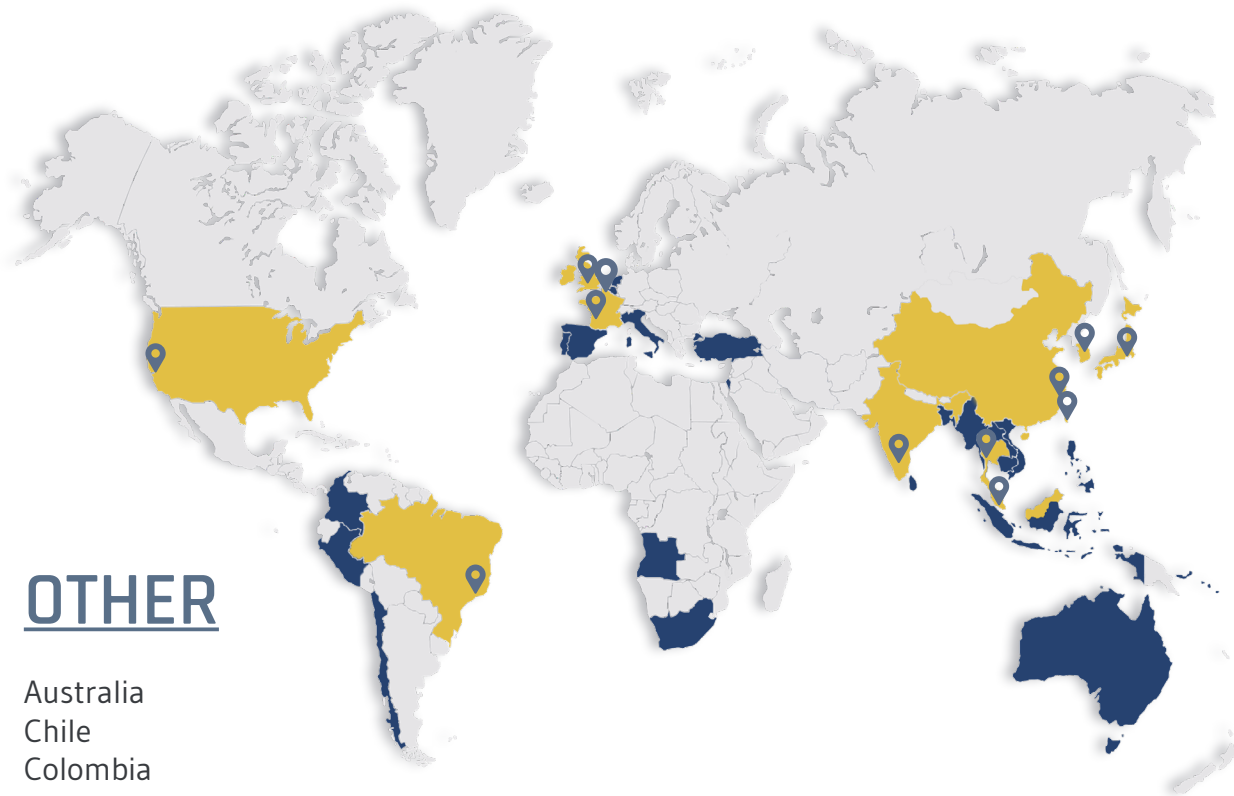
Portugal  
Belgium  
Netherlands  
Spain  
Italy  
Israel  
South Africa  
Angola  
Turkey

#### ASIA

Indonesia  
Philippines  
Vietnam  
Cambodia  
Laos  
Myanmar  
Sri Lanka  
Bandaglesh

#### OTHER

Australia  
Chile  
Colombia  
Peru



 Local Offices

 Agents & Distributors