

LEADERS IN LUXURY

by Miriam Cain

YACHTS

The megayacht REV Ocean has been designed with one overarching purpose — to make our ocean healthier. As a marine biologist, CEO Nina Jensen has spent more than a decade campaigning for conservation, first as secretary-general for WWF Norway, and more recently as a board member of the Business for Peace Foundation. Miriam Cain talks to Jensen, who is now at the helm of REV Ocean's incredible mission to save our seas.



REV Ocean is the world's largest and most advanced research vessel

Nina Jensen CEO, REV Ocean

Joining the REV Ocean team in 2018, Jensen also serves on the Advisory Board of the Global Opportunity Report and is a member of both the Adjudication Committee for the Nordic Council Nature and Environment Prize and the Expert Committee of the Thor Heyerdahl Award. All of these qualifications make her the ideal person to introduce the theme of responsible luxury to a new audience in the yachting industry.

What exactly is REV Ocean, and what is its purpose?

As the world's largest and most advanced research and expedition vessel, REV Ocean has been designed with one purpose — to save life in the ocean. It's a simple goal with a very complex solution, and REV Ocean is designed to be an effective tool in that solution.

How important is REV Ocean's mission?

The destruction of our ocean is arguably the biggest threat known to our planet. Not only does the ocean provide us with more than 50% of the oxygen we breathe, but it also regulates our climate, provides an essential food source for billions of people around the world, and employs hundreds of millions of people — and these are just the tangible benefits. There are also thousands of intangible benefits that are often not factored into the equation. With REV Ocean I believe that we can help find solutions to the issues facing our oceans, which, in essence, come down to three main areas: climate change, overfishing and plastic pollution.

Where will REV Ocean's maiden voyage take her?

Our aim is for REV Ocean to embark initially on a pole-to-pole voyage, but of course a lot depends on the timing of her delivery. Many of the areas we want to travel to are inhospitable even at the best of times and only accessible at certain times of the year, so where we will go really depends on the delivery date, and it is not yet clear when this will be. However, the overall plan is to be brave and bold in our scientific research and to take REV Ocean to all parts of the world's oceans; REV Ocean is a global and all-encompassing mission.



How will scientists be able to access REV Ocean?

We have established an independent scientific committee consisting of global experts in their respective fields of climate change, plastics and fisheries to help guide us in our selection process. These global experts, in collaboration with the Research Council of Norway, will be completely independent and objective, ensuring the scientific credibility of REV Ocean. What is certain is that applicants will only be selected if their project contributes to REV Ocean's mission, and one of our requirements is that all of their findings be openly shared with the scientific community for the benefit of everyone.

Many yacht owners are increasingly aware of their responsibility for safeguarding our oceans, but REV Ocean is leading by example. As a scientific research vessel, how does she compare to a superyacht?

She will have dual roles. Her primary mission is for scientific research, but she will also be used for superyacht charter. Guests will be able to join scientific experts in an immersive, once-in-a-lifetime expedition. We hope that if we set an example and show how this can work then other megayacht and superyacht owners will follow suit, and be encouraged to put their own vessels forward for scientific research purposes. There are some fantastic initiatives available to yacht owners, including marine conservation programs such as The International SeaKeepers Society.

As the largest yacht in the world, how eco-friendly is REV Ocean?

The complex logistics involved in the construction of REV Ocean mean that she will never be truly 'green,' and we would not try to pretend otherwise, but we have done our absolute best to integrate sustainability into all aspects of her build and future operations. From the materials used and their sourcing, to



the ultra-quiet hybrid propulsion, sustainability has been at the forefront of every decision — otherwise we would already have failed in her mission to protect our oceans before even starting. Everything we use on board has been sustainably sourced, and we have developed specific food, clothing and water programs that eliminate waste. Any carbon that cannot be eliminated for practical reasons is offset through mangrove restoration, and there are no single-use plastics on board.

How important is it that others follow in REV Ocean's wake?

Our hope is that REV Ocean will be a source of inspiration to the superyacht industry, not only in terms of her build but in the way she is operated. Finding positive ways in which the yachting and boating industry can contribute to protecting the ocean is of vital importance and, certainly, this should begin with the owners, who themselves get so much joy from the ocean that giving back should be a priority. From switching to alternative fuels or energy sources to implementing environmental best practices on board, there are many ways in which a yacht can be run efficiently and sustainably.

What do you believe the future holds for our ocean?

I am optimistic that with great effort and collaboration, we can make a change and over the next decade start to turn the tide on ocean conservation. revocean.org

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elite
traveler
SUMMER 2022





From above
Barefoot, a concept by Winch, has been designed in conjunction with the Water Revolution Foundation; a 100-ft solar vessel; Espen Øino



NEW-AGE DESIGN

The size of superyachts and their requirement for complete autonomy means that they are difficult to make entirely eco-friendly; but the industry, as a whole, seems to be becoming more and more mindful of its image and indicating a desire to change. Fortunately, there are now also an increasingly large number of owners with a genuine desire to mitigate their personal impact on the ocean, so the industry is leaning toward increasingly greener yachts.

Many yacht designers are committed to using locally sourced and recycled materials, and major shipyards have embraced less traditional but more sustainable solutions, both in the build process and in their facilities. Here, we talk to a few yachting pioneers about their efforts to ensure their fleets include more eco-friendly materials.

Optimizing propulsion, engines and hull design, and continuous advances in the field of software and onboard technology are potentially the most important developments in the yachting industry. Proving that a sustainability-within-luxury design and an award-winning build need not be mutually exclusive, renowned designer Tim Heywood believes it is the designer's responsibility to create something that answers the client's defined mission statement, while championing as much environmental sustainability as possible. "To achieve this, all factors must be carefully considered, from the use of recycled steel and aluminum for the yacht's structure, to the repurposing of interior elements and the use of more natural materials," he says. "Considerable savings can then be made, both in terms of energy consumption and even possibly in build time," says Heywood. "However, there will always be a green premium, and this is something that the industry and clients will have to adapt to." Having designed yachts for more than 40 years, Heywood has witnessed a huge increase in the importance of the environment

for his clients. "The pace for change for more eco-responsible yachting is increasing considerably with every new project, with clients more concerned than ever to leave the ocean clean for their children and grandchildren to enjoy. And obviously, longer term, we also need to replace fossil fuels and consider alternative power sources as they develop," says Heywood.

Naval architect and yacht designer Espen Øino, responsible for some of the world's iconic yacht designs, including the lightweight, aluminum *SilverFast* and research yacht *REV Ocean*, agrees. "The environment is a top priority for almost every client I meet, and it has

moved way beyond the normal greenwashing that we witnessed in the past," he says. "Just three years ago many clients wouldn't even mention the environment, but now, with the combination of obvious climate change that we can all feel and see, and the restricted availability of fuel due to recent turbulent events, every client is asking about ways to make their yacht more sustainable. And many are willing to go much further and invest seriously in finding solutions.

"As designers, we have a role to fulfill," says Øino. "We are the first line of communication with the client, so we are considered advisors in this respect." So many

decisions are made that will have an impact on the carbon footprint of a yacht build. "From the general arrangement, to the propulsion, to the hull design and materials used, every facet of a yacht's design will have an impact on its environment," explains Øino. "The actual marine platform chosen makes a considerable difference on the yacht's carbon footprint," says Øino. "Multihull yachts, slender displacement type hulls, catamarans and trimarans are all better for the environment, because there is less resistance while cruising, so there's less propulsion and less fuel used. All hull types have pros and cons, but there are plenty of good choices.

"When designing the engine room on a new build, we now always consider future propulsion solutions, and try to factor in reasonable access so we can add the required machinery in the future," explains Øino. "We are future-proofing new yachts for whatever energy supply comes into play, whether this will be liquified natural gas, gas or hydrogen. With the current situation, the race for a solution is certainly speeding up."

It isn't only energy-efficient hull design and energy-efficient propulsion that make a yacht more sustainable, though. It is important to remember that most yachts consume far more fuel running generators for the hotel load than for their propulsion when cruising. "Having established patterns of use with repeat owners and their captains, we can see that the majority of owners

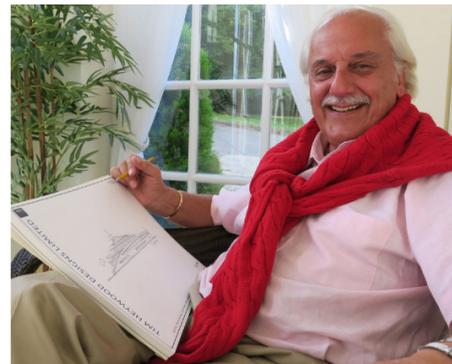
and charter clients spend the majority of time either at anchor or in port; between 80% and 85% of the time, in fact," says Øino; those figures have been confirmed by the Water Revolution Foundation. "It is extremely important that efforts are made to look at the auxiliary systems running the hotel load." From the air-conditioning, lighting and laundry to the way the yacht is used, clever design that reflects the way clients use their yachts appears to be the way forward. "Most yachts have excessive interior spaces that are rarely used," says Øino. "Formal dining rooms, two or three lounges — all of these spaces are kept air-conditioned,

while the majority of time is actually spent out on deck. My ideal yacht would include air-conditioned accommodations, with the rest of the yacht open to the elements but with wind and rain protection. I believe this would have a huge impact on the energy balance."

Sustainable design also extends to the use of materials and, as a reflection of the zeitgeist these days, interior designers are using more natural, sustainable and renewable materials within yacht interiors. Products like recycled stone and marble, cork, palm leather, coconut wood and nontoxic dyes can all be used to the same effect as more traditional woods, stones and leathers. In some cases, they can deliver a more unique and interesting finish, while many sophisticated synthetic alternatives have the added advantage of being more durable than their natural counterparts. Going one step further, many designers now work with suppliers by using by-products that would otherwise be discarded. At leading design company Winch Design, sustainability is woven into the DNA of every project, and the studio even has a library of sustainable materials to be considered by their clients, be it for their superyacht or private jet. "It is entirely possible for an entire yacht to use only sustainable materials for everything from wall paneling to flooring to soft furnishings," says Aino Grapin, CEO at Winch Design. "Our recent yacht concepts, Barefoot and Moonlight, penned for the new *Amels 60*, were designed in conjunction with the Water Revolution Foundation. The two distinct interiors utilize beautiful materials, such as fabric made from orange fibers, reclaimed wood, aloe vera and air-treated sand, to create interior spaces that are both sustainable and in keeping with the quality of the finest superyachts."

As clients become more conscious of the environment and their personal contribution to ocean conservation, they also require the companies that they work with to align with their values. "Over the past few years, I have seen a shift in attitude towards simply requiring the best in quality and aesthetics to an absolute need to incorporate sustainability into the same quality of finish," says Grapin. But with such high expectations, how can yacht designers cater to clients' new demands while still meeting the luxury brief and also being practical? "Fortunately, a lot of the environmentally responsible materials we work with actually have better durability. Replacing leather and previous veneers, for example, with faux leather made from pineapple leaves, allows us to create a luxury feel, but with a product that can be manipulated to any color, pattern and effect," says Grapin. "There are several beautiful and intriguing alternatives available; we just need to be open-minded."

Heywood says: "Everything about yacht building is dictated by our clients' personal preferences — as it should be — but a responsible designer can still steer the client through the profusion of solutions to every possible feature, with one eye to sustainability and one to good taste."



Above
Winch-designed
Prevail

From left
Tim Heywood;
Aino Grapin

Photos: Andreas Lindlahr, Adam Duke, Guillaume Plisson

