



GLOBAL  
MARITIME  
FORUM

# Currents of Change

Annual Summit 2024  
Tokyo





**Currents**  
of **Change**

**Annual Summit 2024**  
**Tokyo**





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## Foreword

Within these pages, you will find a summary of the many discussions that took place at the Global Maritime Forum's Annual Summit 2024 in Tokyo. Based on the feedback we heard in the days and weeks following the event, the Annual Summit's return to Asia brought fresh perspectives and strengthened existing bonds among our rapidly growing community of action.

Participants told us that key conversations on shipping's decarbonisation and the treatment of seafarers have now advanced to a new level of maturity. While there was much to report on the industry's progress, there was also wide acknowledgement of how far we have yet to go. Many reported that the small working groups that are a hallmark of the Annual Summit prompted frank and pragmatic discussions on how to create practical, actionable solutions and continue to move the industry forward.

Held in the vibrant metropolis of Tokyo, one of the world's most influential financial and cultural centres and a vital maritime hub, the Annual Summit featured intense debates on the future of the shipping industry, particularly around accelerating the sector's decarbonisation, improving seafarer well-being, and strengthening governance and accountability.

It was an honour to be joined by International Maritime Organization Secretary-General

Arsenio Dominguez, whose confidence in the global regulatory body's ability to deliver clear incentives to boost the use of low- to zero-emission fuels was music to the ears of many. His assurances provided further evidence that the industry's decarbonisation is no longer a matter of 'why' but of 'how'.

This year's Summit also made clear that the treatment of seafarers must become a higher priority. Platitudes will no longer suffice; instead, the industry needs to move toward developing universal principles and standards to provide clear guidance on improving crew welfare.

This was one of the "uncomfortable conversations" that have gained momentum in recent years as the industry has become more willing to openly discuss its shortcomings. The appetite for these conversations was evident in Tokyo, as the need for strengthened maritime governance emerged as a key theme. Participants focused on the threats to the industry's resilience and reputation posed by geopolitical challenges, a growing dark fleet, and lax enforcement of existing regulations.

While the coming months will better reveal the concrete initiatives that resulted from our time together in Tokyo, we hope this report will capture the exchange of ideas that led us to leave Japan feeling confident about the industry's ability to successfully navigate the currents of change.

**Jan Dieleman**  
Chair  
Global Maritime Forum

**Johannah Christensen**  
Chief Executive Officer  
Global Maritime Forum



## Executive summary

Held under the theme “Currents of Change”, perhaps the biggest change revealed by the Global Maritime Forum Annual Summit 2024 was how far the shipping industry has advanced since the last time the event was held in Asia. The sector’s biggest challenges looked much different at the 2018 and 2019 Summits in Hong Kong and Singapore than they did in Tokyo.

This could be felt in the notable shift in the tenor of discussions. Debates over why the shipping industry should decarbonise have changed to how to make it happen. Conversations about whether the sector should do more to retain and attract talent have shifted to a recognition that it must act now. And uncomfortable topics once off limits are now being addressed head-on.

### Policy clarity is coming

This shift was easy to sense in the Annual Summit’s many workshop discussions, expert presentations, and plenary sessions that focused on shipping’s decarbonisation.

Some of the first hurdles in eliminating carbon emissions from ships have already been overcome. The International Maritime Organization (IMO) has provided a clear roadmap for achieving net-zero emissions by 2050. This is no longer just an aspirational moonshot; it is a plan advancing before our very eyes. Zero-emission capable ships are already at sea. The fuel production pipeline grew by 50% in 2024. Commercial mechanisms to connect fuel producers and buyers are starting to emerge. In short, the decarbonisation of the industry is no longer a matter of if. It’s a matter of how.

The Summit revealed that even the ‘how’ is coming into sharper focus. IMO Secretary-General Arsenio Dominguez emphasised that the regulatory body is advancing precisely as planned with its revised greenhouse gas strategy. He expressed confidence that the clarity industry leaders have been clamouring for, including a goal-based marine fuel standard and an emissions pricing mechanism, will come in 2025.

Regulations like FuelEU Maritime and the extension of the EU’s Emissions Trading System (EU ETS) to the maritime sector are also helping to advance the business case for decarbonisation. But the Summit discussions also stressed that regulations will only go so far. Finding commercial solutions that make sound business sense, along with government support that can bridge the initial price gap, will need to do the rest.

### Promising new fuel auction mechanism

One of the biggest challenges the industry has faced is cracking the code on how to successfully ensure an adequate supply of the zero-emission fuels needed for the energy transition. Fuel producers have been hesitant to scale up production without secure offtake agreements, while buyers are wary of committing to zero-emission alternatives before prices get closer to today’s carbon-based marine fuels – something that can’t happen without scaling up production. This so-called ‘chicken-and-egg’ dilemma has long vexed the industry, but the solution felt closer in Tokyo than ever before.

That was evident by the massive interest in a tangible example presented by **Susana Moreira, Executive Director and Co-Chair of H2Global Foundation**. H2Global is an auction mechanism being used by the German government to stimulate the market for hydrogen-based fuels. While different ways to aggregate fuel demand and overcome the “timing gap” between fuel project development and shipping companies’ readiness to commit have been explored before, none have generated quite the same level of post-Summit buzz as H2Global. When combined with buyer-side consortia like the Zero Emission Maritime Buyers Alliance, it may provide the model to enable fuel offtake at scale.

### Moving forward – together

Summit participants were also eager to hear about the advancements underway in green corridors, the specific trade routes being established to spur zero-emission shipping. Just after the conclusion of the Summit, the Global Maritime Forum released the third edition of the Annual Progress Report on Green Shipping Corridors. It demonstrated continued growing interest across the maritime value chain, with a 40% increase in initiatives worldwide.

**Rio Tinto’s Head of Commercial Operations Laure Baratgin**, whose company is supporting the Australia-East Asia Iron Ore Green Corridor, said the development of green corridors is “already in a much different place today” than just two years prior. **Saskia Mureau, Director of Customer Digital at the Port of Rotterdam**, wondered if that progress is going unnoticed in the industry, however. Mureau, whose port has teamed up with both Singapore and Gothenburg on green corridor initiatives, said the movement’s successes in trialling different commercial structures need to be better communicated so they can spur further breakthroughs.

## About the Annual Summit

The Global Maritime Forum’s Annual Summit brings together around 200 C-suite leaders from across the maritime spectrum who have the will to address the most pressing issues facing the industry. Invitees are selected to ensure an adequate representation of the entire maritime value chain and give each segment, geography, and stakeholder group an equal say in the proceedings.

The Annual Summit primarily consists of workshop-style discussions that encourage participants to work in groups to seek collaborative responses to various challenges we face.

The working sessions are supplemented by briefings with leading experts who will inspire and challenge the conversations, as well as a few keynote sessions and panel discussions featuring top government officials and business leaders.

The purpose of the Annual Summit is not merely to discuss industry issues but to catalyse collective initiatives that can increase sustainable long-term economic development and human well-being. The Annual Summit is thus highly collaborative, and all participants are expected to share, inspire, and learn.

Among green corridor projects, ammonia and methanol are emerging as the most popular fuel pathways, reflecting a larger industry-wide trend. Some concern was expressed that a two-tiered system is emerging among the companies focusing on these fuels, with a handful of first movers starting to clearly pull ahead of the rest of the pack. While some participants predicted that the next 12-18 months would reveal the true front-runners in next-generation fuels, others suggested that the entire notion may no longer be accurate. As **GasLog CEO Paolo Enozi** put it, "There are no first movers anymore because we're all on the move."

### Priority decarbonisation actions

- Adopt robust mid-term policy measures at the IMO, including an economic instrument such as a levy with dedicated support for zero-emission fuels
- Agree and adopt mechanisms that ensure that the costs of the transition are borne in a just and equitable manner
- Develop more innovative commercial arrangements to share costs and risks across first movers in the whole value chain
- Find ways for national governments to bridge the gap for first movers on zero-emission fuels, for example through mechanisms such as H2Global

### Moving seafarers up on the agenda

While it could be argued that the industry is in a race to the top on decarbonisation, the same cannot be said for investing in improvements that benefit the sector's workforce. The landscape here seems much more uneven, with some companies doing extremely well and others lagging far behind and facing little to no recourse.

The shipping industry is experiencing a labour shortage, and if a career at sea is to become more attractive, more ambitious standards for human sustainability are needed. The Annual Summit included several calls for the establishment of universal principles for crew welfare, but concrete details were few and far between.

The industry's progress in decarbonisation should serve as inspiration for righting the ship on its long-standing challenges in retaining and attracting talent. Improving the working and living conditions of seafarers deserves as much focus as emission-cutting technologies. As Secretary-General Dominguez both bluntly and rightly put it, that is not the case today: "We're not really investing in the human element."

Reversing this will require a change in mindset, a shift from the defensive to the aspirational. The good news is that this seems to be underway. With working groups focused on defining what "good" looks like for working conditions at sea, ensuring that all seafarers are in a physically and psychologically safe environment, and examining the sector's responsibilities toward local communities, the Annual Summit demonstrated that human safety and welfare are very much on the industry's collective radar.

The Summit also included a first-hand account of a promising seafarer well-being initiative.

**Captain Radhika Menon of Synergy Marine Group** detailed her participation in the All Aboard Alliance's Diversity@Sea pilot project, in which 12 leading shipping companies committed to creating a better onboard work environment by implementing a series of practical measures. These include a better gender balance among crew, establishing gender-appropriate restrooms and changing facilities, providing 24/7 internet connectivity and inclusive personal protective equipment, and ensuring that all workers have access to an anonymous helpline.

### Priority human sustainability actions

- Explore a more standardised approach to collecting global data on poor industry practices such as crew abandonment, violence and harassment, and inadequate safety practices
- Develop better standards for working conditions at sea, with the goal of improving seafarers' well-being, safety, and sense of belonging
- Create a standardised 'seal of approval' to clearly distinguish between companies that offer attractive working and living conditions and those that do not
- Pursue a better balance between the working conditions offered at sea and those offered in shore-based positions



### Having the difficult conversations

The 2024 Summit also introduced new themes that are likely to receive more focus in the years ahead.

The biggest of these is the need for more robust maritime governance and stronger enforcement of existing regulations. This includes turning a critical eye to long-established industry practices like the use of flags of convenience, also known as open registries. This common practice, in which shipowners register a vessel in a country other than their own, is largely used to take advantage of lenient regulations, lower taxes, and cheaper labour. As some of the responses to **Basel Institute on Governance Founder Mark Pieth's** presentation on the topic suggested, this isn't necessarily a conversation the industry seems willing to have. But it is one that it needs to have.

Flags of convenience undermine the legitimacy of maritime governance at a time when confidence in the sector's frameworks is most needed. The rapid expansion of the dark fleet, which operates with little to no regard for international law, the environment, or crew safety, was described by **Lindsey Keeble, Managing Partner at Watson Farley & Williams**, as "the number one issue" at the Annual Summit. It's hard to disagree with that assessment when the presence of this parallel fleet threatens to not only damage the industry's already not-so-stellar reputation but to set back all the positive progress made in recent years.

Complex topics like open registries, the dark fleet, and shipping's environmental responsibilities don't have easy solutions, but discussing them frankly is a step in the right direction. Participants' willingness to expand the Summit's focus will lay the necessary groundwork for eventual solutions.



#### Priority governance actions

- Develop a common framework for risks and coordinate mitigation strategies across industry and governments
- Explore potential solutions for limiting the growth of the dark fleet and its impact on the wider shipping community

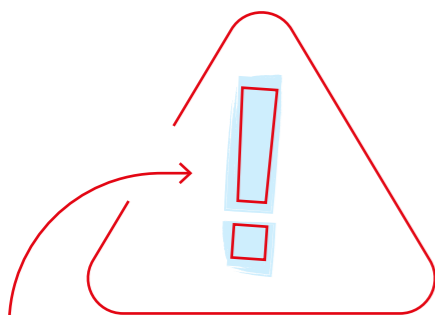
### Imperfect progress

Solutions to the industry's challenges – those both old and new – require courage. They require collaboration, not just among those who attend the Global Maritime Forum Annual Summit but throughout the entire maritime value chain and across all geographies. And these solutions may also require borrowing a concept from the 2024 host country.

The traditional Japanese philosophy of wabi-sabi teaches us to embrace change, impermanence, and imperfection. The transition to zero-emission fuels and the ongoing efforts to improve human sustainability will not be perfect. There will be setbacks along the way, but these can be viewed as learning opportunities rather than failures. The road to net zero by 2050 will be long and difficult, but rather than only focusing on that far-off goal, it is important to also celebrate the individual victories, whether that is a single ship converting to alternative fuels or the first commercial voyage along an established green corridor.

The teaching to accept imperfection is also worth remembering when the IMO reaches its long-sought mid-term measures in 2025. They are unlikely to please everyone, but such is the nature of compromise.

Compromise should also entail having more diverse voices at the table. The Tokyo Summit ended with the announcement that Antwerp will be the 2025 host city. As one of Europe's primary gateways to the rest of the world, it is hoped that the Annual Summit 2025 will build on the momentum established in Japan and include representatives of even more countries in the shipping industry's imperfect, but important, progress.



## How we work

The Global Maritime Forum Annual Summit is a bit different than most industry gatherings. While the format includes a few plenary sessions and keynote addresses, most of the event consists of workshop-style discussions. These are designed to encourage participants to collaborate in small groups to seek collective, actionable responses to the various challenges facing the maritime sector.

Rather than sit passively in the audience, participants are at the centre of the action and actively shape the direction of the event. Everyone is expected to share their insights, offer their opinions, and learn from one another. This can be something of a departure from what they are used to, so with roughly 40% of those gathering in Tokyo attending their first-ever Annual Summit, **Global Maritime Forum Senior Advisor Randall Krantz** took some time to introduce our way of working and ask return attendees to share their advice with newcomers.

### Be honest, be curious, speak up

Noting that this was the first time that the Annual Summit had been held in Tokyo and that many people in the room had travelled a long way to get there, Krantz stressed the importance of committing to active participation, which would require “doing things a little bit differently than what you’ve seen before”.

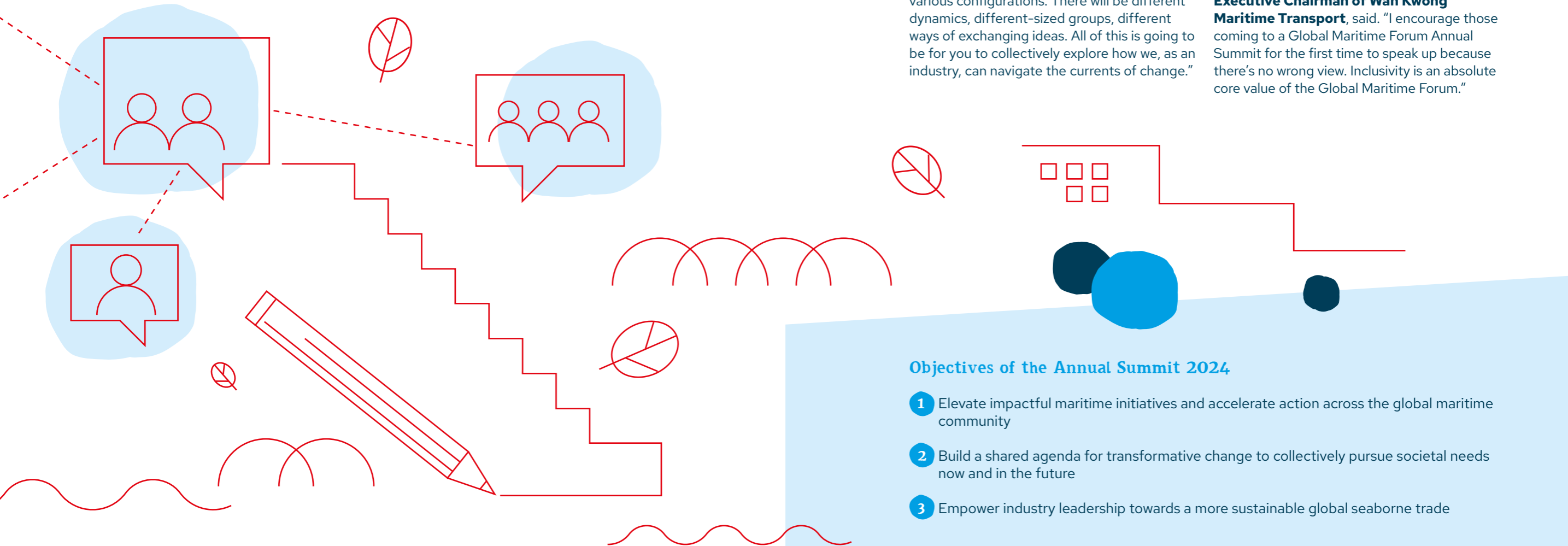
“In short, the Global Maritime Forum way is to put all of the collective experience in a room, all of that brain power, and put it to work,” Krantz said. “So that’s what we’re going to do over the next two days. You’ll be part of a collaborative process that will take various configurations. There will be different dynamics, different-sized groups, different ways of exchanging ideas. All of this is going to be for you to collectively explore how we, as an industry, can navigate the currents of change.”

Krantz asked those who had attended a previous Annual Summit to share their advice to first timers.

“Be honest and speak your mind,” **Semiramis Paliou, Director and Chief Executive Officer of Diana Shipping Inc.**, urged.

“Be curious. There are very few conferences that we’re in where we have the entire value chain in one room. So be curious, ask questions, and seek to understand,” suggested **Claire Wright, Head of Hanwha Ocean Europe**.

“Participation is absolutely key,” **Hing Chao, Executive Chairman of Wah Kwong Maritime Transport**, said. “I encourage those coming to a Global Maritime Forum Annual Summit for the first time to speak up because there’s no wrong view. Inclusivity is an absolute core value of the Global Maritime Forum.”



### Objectives of the Annual Summit 2024

- 1 Elevate impactful maritime initiatives and accelerate action across the global maritime community
- 2 Build a shared agenda for transformative change to collectively pursue societal needs now and in the future
- 3 Empower industry leadership towards a more sustainable global seaborne trade



## Navigating the currents of change



The Annual Summit 2024 formally got underway in the serene confines of Happo-en, a traditional Japanese garden replete with koi ponds, centuries-old Bonzai trees, and trickling waterfalls.

The tranquil setting belied the turbulent geopolitical situation that would permeate both the evening's opening panel discussion and the two full days of the Annual Summit that followed.

**Jan Dieleman, Global Maritime Forum Chairman and President of Cargill Ocean Transportation**, kicked things off with a nod to the Annual Summit's theme, 'Currents of Change'.

"We can all see them. Disruptive forces that the maritime industry – any industry really – needs to consider when operating today and when planning for the future," he told the assembled audience of some 300 industry and local leaders. "We live in a world with increasing global and regional competition; a complex multi-polar world that is harder to predict."

Dieleman stressed that those seated in the audience have the power to determine how the industry will collectively respond to today's uncertainties and shape tomorrow's solutions.

"At its core, the Annual Summit is a gathering of people with influence who, through conversation and ideas, can enact change. These people are you," he said. "Let's not be afraid to have tough conversations, even if it feels uncomfortable. Courage is contagious."

## Wabi-sabi

Dieleman then invoked the Japanese concept of wabi-sabi, which reminds us to see the beauty in impermanence and imperfection. Participants were encouraged to keep this in mind, not only as they sought compromise and progress over the coming days, but in the run-up to the highly-anticipated spring 2025 meeting of the International Maritime Organization (IMO), in which the regulatory body is expected to develop financial and technical measures to incentivise the use of low- to zero-emission fuels and thus accelerate the sector's decarbonisation.

"Decarbonisation is complex and not a linear journey, and there are a lot of other things happening in the world, including wars and political unrest. On top of that, the industry is in the middle of IMO negotiations and currently in a 'wait-and-see mode'," he said. "We need to get the momentum going again. I am hopeful that the Summit will do exactly that and am confident the IMO will make a good compromise – one that will not satisfy everyone, but that is the nature of compromises."

## Responding to disruption

Dieleman then handed things over to Global Maritime Forum CEO Johannah Christensen, who highlighted the concurrent challenges facing the industry.

"This year's Summit is taking place within the context of an increasingly challenging geopolitical landscape, economic instability, and supply chain disruptions that have practically become the norm," Christensen said. "The emergence of the dark fleet is challenging the robustness of maritime governance frameworks. At the same time, the sector needs to attract talent in an increasingly complex environment of new fuels and new technologies. These are just a few of the currents of change that we will spend the next few days discussing."

Christensen then introduced the panel that would kick off those conversations. Brought to the Happo-en stage were: **IMO Secretary-General Arsenio Dominguez; Takeshi Hashimoto, President and CEO of Mitsui O.S.K. Lines; Laure Baratgin, Head of Commercial Operations at Rio Tinto; and Naoko Ishii, Special Presidential Envoy for Global Commons at the University of Tokyo.**

The panellists engaged in a wide-ranging 90-minute discussion that explored the geopolitical, environmental, and economic disruptions facing seaborne trade and emphasised the need for collaboration across various sectors and countries to address these challenges.

With the overarching themes of realising the shipping industry's sustainable transformation and creating safer and more inclusive environments for seafarers, several key areas of focus emerged.



## “Transform our industry sooner rather than later”

While **IMO Secretary-General Arsenio Dominguez** opened the panel discussion by saying the regulatory body is ready to “take the lead” on reducing shipping emissions, he stressed that he wanted to hear directly from the various stakeholders in the room on how policy and industry action can complement one another.

“We know that the decarbonisation of shipping is not just going to be achieved by the set of regulations that we adopt next year, and that will enter into force in 2027,” he said. “This is a good opportunity for you to share with us what you have done ahead of the finalisation of our measures, taking into account that there are already operational and technical measures in place that are reducing emissions and enhancing the efficiency of ships.”

Dominguez also stressed the importance of working closely with other stakeholders—like the energy sector and environmental ministries around the world—to share learnings and find mutually beneficial solutions.

Among his co-panellists, there was wide agreement that the industry needs to accelerate decarbonisation beyond IMO policies.

“We definitely recognise the necessity to transform our industry sooner rather than later, and now is a quite critical stage,” **Takeshi Hashimoto, President and CEO of Mitsui O.S.K. Lines**, said. “Just being a simple follower of trends is not enough; we really want to accelerate the industrial atmosphere to encourage change. The very important first step is to demonstrate that the shipping industry is serious about accelerating this transformation.”

## Green corridors begin to show what’s possible

The notion of demonstrating what is possible was picked up by **Rio Tinto’s Laure Baratgin**, whose company has become a first mover with the Australia-East Asia Iron Ore Green Corridor, one of dozens of initiatives looking to create specific trade routes where the feasibility of zero-emission shipping is catalysed by private and public action.

“We started the green corridor project in 2022, and we are already in a much different place today,” she said. “Beyond trialling some technical issues, we are working toward finding a model for aggregating fuel to make this corridor real and affordable.”

The third edition of the Annual Progress Report on Green Shipping Corridors, released just after the conclusion of the Summit, now counts over 60 green corridor initiatives worldwide. But Baratgin pointed out that demonstrating the safety of new fuels like ammonia and finding ways to finance shipping decarbonisation remain major concerns.

“Market-based measures, whether they are supply-related, fuel-related or demand-related, are extremely important,” she said, adding that the current cost of emissions reduction is \$200 to \$250 per tonne of CO<sub>2</sub>.

Though the panel agreed that market mechanisms would play a key role, none believed that they would be enough to fully close the cost gap between conventional fuels and the much more expensive zero-emission alternatives. Collaboration across governments and industries will be essential to ensuring green fuel adoption.

## Urgency and collaboration

**Naoko Ishii, Special Presidential Envoy for Global Commons at the University of Tokyo**, provided a stark reminder of the urgency of the situation by pointing out that scientists believe we have already exceeded six of nine planetary boundaries.

“We have started to destroy our stable, resilient planetary system, and we are already witnessing the consequences of that,” she said. “You don’t need me to tell you that; you can just read a newspaper. Things have been changing dramatically and we can feel that something is really going wrong.”

Ishii said correcting course will require a collaborative, multi-stakeholder approach to shifting the current economic system, which is out of harmony with the planet’s boundaries.

“We need courageous leaders to take the first step, and the best first movers are coalitions rather than individual actors,” she said, adding that she was encouraged by the way green corridors are demonstrating the power of bringing various stakeholders together to catalyse progress.



*World Economic Forum: Scientists say we’ve crossed six of nine planetary boundaries.*

## Investing in people

The panel also spent significant time discussing how to improve working conditions for the world’s roughly two million seafarers, an issue taking on increasing importance as the industry struggles to recruit and retain talent. Secretary-General Dominguez was particularly blunt in his assessment.

“As an industry, we don’t invest enough in our people,” he said. “We should provide the same kind of working conditions at sea that we provide to those working in offices on land. We should be able to provide seafarers with internet free of charge so they can feel more connected to their loved ones. We should look after seafarers in cases of criminalisation, and we should reduce abandonment.”

Baratgin called it “totally unacceptable” that a 2023 Lloyd’s List report found that at least 215 deaths occurred at sea in 2022, a number that in all likelihood is only “the tip of the iceberg” given the lack of transparency on the issue.

“We have to commit to uplifting the safety and welfare of seafarers, and we should insist that welfare is not a nice-to-have, it is human rights,” she said.

In addition to the recommendation to provide free, reliable internet service on board, panellists also suggested other ways to prioritise seafarers as the sector transitions to a more sustainable future. Among them were ensuring that proper training, certification, and safety protocols are in place before implementing new fuels and technologies; enhancing mental health support and resources for workers who face isolation, fatigue, and other stressors; and strengthening collaboration between industry, unions, and regulators to develop and enforce policies that protect seafarer rights and welfare.

At the conclusion of the panel discussion, Dieleman returned to the stage to bring things full circle.

“We talked about courage earlier on, and I think courage starts with having a candid conversation. This was an excellent example of a candid conversation, including some pointed questions. We have now planted the seed, and will return to these topics over the next couple of days,” he said.



# 変化の潮流を航海する

## NAVIGATING the CURRENTS of Change



**Welcome!**

THANK YOU TO OUR PARTNERS!  
WE NEED TO HELP EACH OTHER NAVIGATE THE CURRENTS...  
How to MAKE THE INDUSTRY MORE SUSTAINABLE?  
How to TACKLE THE SITUATION OF PEOPLE?

Nothing is Perfect!  
**WABI SABI**

OPTIMISM IS FADING

REGULATION IS KEY

PROBLEMS HAVE CHANGED...

CHANGE HAPPENS WITH SMALL STEPS TAKEN BY MANY!

**Panel**

IMPORTANT DECISIONS TO BE MADE

DECARBONISATION MUST BE ACHIEVED THROUGH

**INTERACTION**

WITH OTHER SECTORS

WHAT HAVE YOU ACHIEVED?

**SAFETY** IS A CHALLENGE...

AUSTRALIA IS THE NATURAL USER OF AMPHONIA...

**GREEN CORRIDOR**

WHAT WAS DIFFICULT? WHAT EASY?

WE NEED TO

**ACCELERATE**

WHICH ISSUES DO WE NEED TO ADDRESS

SHIP DECARBONISATION IS EXPENSIVE!

ALL ACTORS MUST PARTICIPATE!

FINDING AGGREGATION OF FUEL TO MAKE THIS AFFORDABLE

THE TIMELINE DEPENDS ON

**SAFETY**

BY 2030 ALL SHOULD BE IN PLACE!

IT'S AN ENTIRE PLANETARY PROBLEM!

WE ARE AT A CRITICAL JUNCTURE

SOMETHING IS ALREADY OUT OF BALANCE...

**GLOBAL COMMONS**

A COMMON **VISION** IS KEY!  
**PRICING & FINANCE**  
**TECHNOLOGY**

WE NEED TO CREATE A **CONTAGION!**

**SEAFARERS**

THE WAY OF WORKING HAS SHIFTED, BUT WORKING CONDITIONS ARE NOT EQUAL

CRIMINALISATION OF SEAFARERS

**OPPORTUNITY** IN SKILLING FOR NEW TECHNOLOGIES

LISTENING TO OPINIONS, BRINGING EVERYBODY TO THE TABLE  
LISTENING TO CONCERNS, FINDING COMMON THREADS...  
How DO WE ACHIEVE CONSENSUS ON EXPECTATIONS?  
**TRANSPARENCY**

SAFETY IS A PROXY FOR PRODUCTIVITY, HEALTH.

WE NEED TO COMMIT TO HUMAN SAFETY

KEEP FOCUS ON PEOPLE

**WE HAVE A HISTORY OF INTERNATIONAL COOPERATION**

SHARING THE BURDEN, SUPPORT FROM THE **BROADER COMMUNITY**  
WE NEED A COURAGEOUS **LEADER**  
INVOLVE ALL STAKEHOLDERS

WE NEED TO INCENTIVIZE OUR CHARTERERS TO IMPLEMENT THESE TECHNOLOGIES!

THERE ARE **LOW HANGING FRUITS!**

LOW CAPEX

**TRAINING & CERTIFICATION**  
How CAN WE PROTECT SEAFARERS, WHEN WE WEREN'T ABLE TO DO IT DURING COVID?

CO-INVEST & CO-OWN

**COLLABORATIONS**

WE NEED TO INCENTIVIZE OUR CHARTERERS TO IMPLEMENT THESE TECHNOLOGIES!

THERE ARE **LOW HANGING FRUITS!**

LOW CAPEX

**COLLABORATION VS COMPETITION**  
COMPETITION CANNOT GO AGAINST SEAFARERS' SAFETY  
OVERCOMING BARRIERS WITH CREATIVITY

**NEW LEVELS**  
How DO WE DECIDE WHAT TO START USING?  
**SUPPLY ABILITY**

**NUCLEAR PROPULSION** IS ONE OF THE OPTIONS, NOT RULED OUT!

CATALYSING THE EFFORT ON THE GREEN CORRIDOR

**DIGITAL** IS TODAY!  
EXCHANGING DATA ON ESTIMATED AND ACTUAL TIME OF ARRIVAL

EVERY LITTLE STEP COUNTS!  
E-RUNNING



# What shipping needs to know in an increasingly turbulent world

The first full day of the Annual Summit 2024 began with a sobering look at the implications of global challenges outside the maritime industry's control.

After welcoming participants and explaining how the Annual Summit works, **Global Maritime Forum**

**Senior Advisor Randall Krantz** set the stage for the morning's opening plenary discussion by acknowledging that the discussions in Tokyo were being held "against a backdrop of a lot of uncertainty".

"Geopolitical tensions are running high, which is probably an understatement. The global economic outlook is uncertain, and the maritime industry must deliver on major investments and adjust dynamically to support this flux, all while remaining focused on long-term sustainability goals that are going to fundamentally transform the industry," Krantz said.

To take stock of the increasingly turbulent world, Krantz welcomed two accomplished experts in exploring the impacts of global power struggles, regional conflicts, and shifting economic policies: **Shruti Mehrotra, Managing Director, Seismic Ventures and Former Special Advisor, Soros Economic Development Fund;** and **Hirohichi Mizuno, Special Advisor to the CEO of MSCI, Inc. and the former Special Envoy of the UN Secretary-General on Innovative Finance and Sustainable Investments.**

## Planning for armed conflict and trade wars

Mizuno began the conversation by calling the increasing tensions between the United States and China "the biggest geopolitical change" in recent years.

"Based on the amicable relationship between those two nations, the world really enjoyed free global trading and had very efficient global logistics, which is no longer the case," he said. "A big redesign of the global supply chain is taking place. Asset owners really need to think about how that redesign is going to affect each country's economy, and which industries will benefit from this shift and which will suffer."

Mehrotra opened her remarks by giving a bird's-eye view of the significant challenges facing the world, including the ongoing war in Ukraine and the potential for widespread regional conflict in the Middle East, before diving into how the increasing tensions between the United States and China are shifting global trade patterns and creating regional alliances.

"Goods are coming out of China and getting value-added in other countries, and that sort of re-shifting of intermediary relationships will definitely continue to evolve," she said. "The way that [maritime industry leaders] respond may need to be significantly more modular and diversified."



She stressed that, with global conflicts unlikely to be resolved anytime soon, the executives in attendance will need to be limber enough to respond to unpredictable threats while also remaining focused on their future planning and sustainability agendas. This includes detailed scenario planning and building adaptability into business operations.

"We're in a time where almost all the ways of thinking about things, particularly politically, have been thrown out of the window," Mehrotra said. "I'm usually not in the business of quoting management guru types, but I'll do that now. [Austrian-American consultant and author] Peter Drucker said, 'The best way to predict the future is to create it.' That's what you all need to do. Make a 20-year plan and sell that vision to your shareholders, your board, and your employees, and be decisive about it."

## Corporate governance and business diplomacy

Mizuno echoed Mehrotra's concerns, saying that corporate boards have an obligation to think long-term.

"I think we need to really revise the role of the board and corporate governance. The CEO is often incentivised by his or her own short-term performance, which can be hard to balance with the long-term sustainability strategy of the company," he said. "The CEO still has to take charge, but the board should focus less on short-term strategies and CEO performance and more on long-term strategies."

Mizuno also advocated for the financial industry to bridge the gap between short-term market performance and the long-term sustainability of businesses, highlighting the potential of environmental, social, and governance (ESG) investments to promote this shift.

Both speakers emphasised that while the current environment is fraught with uncertainty, it also presents opportunities for businesses to effect positive change by engaging directly with policymakers to foster collaboration and collective action.

Mizuno added that today's CEOs feel more empowered to speak up about geopolitical events. This was evidenced by the many executives who were quick to denounce Russian aggression in Ukraine and pull their businesses out of Russia as a result.

"I've talked to a lot of different political leaders, and they are actually hoping that businesses will continue to engage in these conversations. This is the time for businesses to step up, not only engaging their own policymakers and their own constituency but to more generally act as business diplomats," he said.

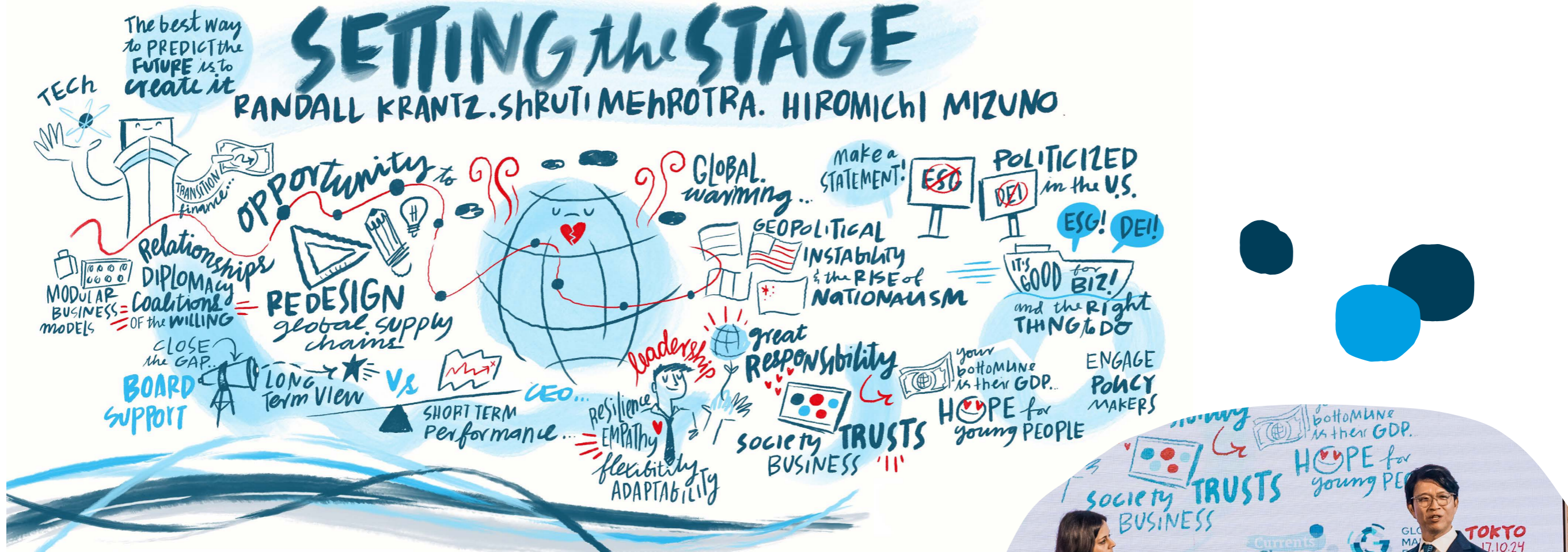
The panellists agreed that business leaders must take public stances on the issues that matter most, like environmental stewardship. They also criticised recent corporate moves to abandon or downplay diversity, equity, and inclusion (DEI) strategies.

"The argument for DEI, of course, is it's the right thing to do," Mehrotra said. "But it's also good for business. Diversity makes you more adaptive. Diversity makes you more responsive. Diversity makes companies more resilient over time."



Summit participants address today's geopolitical situation.





### Scratching the surface

Throughout the discussion, Mizuno and Mehrotra emphasised the importance of adaptability, empathy, and a human-centric approach to navigating the turbulent times ahead. They encouraged the attendees to step back, think strategically, and leverage their collective expertise and influence to create a more sustainable and resilient global maritime industry.

With the frank conversation on global uncertainties, supply chain disruptions, and the importance of long-term decision-making and business diplomacy, Mizuno and Mehrotra set the stage for the deep-dive discussions that would touch on these topics and more later in the day.





## Collaboration in action

The maritime industry has advanced on multiple fronts since the first Annual Summit in Hong Kong in 2018. As a way to demonstrate that progress, the Tokyo Summit featured an interactive 'Impact Fair' that highlighted the work of nine distinct projects, some born out of previous Summits and others completely independent of the Global Maritime Forum. Spread throughout the Otemachi Mitsui Hall & Conference venue, participants were invited to visit as many of the stands as they could over the course of 75 minutes. While they

were welcome to linger as long as they wanted at each stand, the more entrepreneurial participants could collect custom-made stamps at each station and complete a full Japan-themed 'passport'. The Impact Fair allowed participants to learn directly from high-level champions of transformative initiatives that showcase the maritime community's impactful work in areas such as shipping decarbonisation, diversity and inclusion, talent attraction, ship recycling, and more.



### All Aboard Alliance

The All Aboard Alliance drives collaboration to make the maritime industry more diverse, equitable, and inclusive. Represented by **Hafnia CEO Mikael Skov** and **SOL-X Executive Director Meei Wong**, the Alliance presented its Diversity@Sea project, which aims to address the industry's gender imbalance by not only increasing the number of women at sea but also transforming the conditions and culture onboard to be more inclusive for all seafarers.

### Global Centre for Maritime Decarbonisation

**Global Centre for Maritime Decarbonisation CEO Lynn Loo** used the impact fair to focus on the organisation's initiative to enable ammonia as a marine fuel and lower the barriers to adoption. This project specifically addresses the safety aspects of handling ammonia so findings can inform and shape future ammonia bunkering procedures and guidelines. At the fair, Loo showcased the successful ammonia bunkering trials carried out in Australia's Pilbara region.

### International Association of Maritime Universities

**Takeshi Nakazawa, Executive Director of the International Association of Maritime Universities**, presented the association's Global Maritime Professionals initiative, which aims to address the fast-changing needs and gaps in maritime HR due to the rapidly changing environment of the industry. The project defines what knowledge, skills, and attitudes a maritime professional should have and seeks to guide the development of higher educational systems through a joint "body of knowledge" at an institutional level.

### Getting to Zero Coalition

**Jesse Fahnestock, Director of Decarbonisation at the Global Maritime Forum**, explained how Getting to Zero Coalition members can use the new Action Framework to assess and track the industry's tangible progress on decarbonisation. The newly designed framework can be used to evaluate actions, identify gaps, and provide insights to shape policy, all aimed at getting zero-emission fuels into operation by 2030 and fully decarbonising the industry by 2050. Fahnestock demonstrated how the framework will drive real change by helping companies track and share their decarbonisation progress, fostering collaboration and the exchange of best practices.

### Poseidon Principles

After five years of existence, the influential Poseidon Principles have driven significant engagement among leading financial institutions, resulting in greater transparency and accountability around the climate impact of signatory portfolios. The initiative has also set a precedent for similar financial frameworks in other sectors, such as aviation and steel. The Principles' chair and co-chair – **Michael Parker, Chairman for Global Shipping, Logistics and Offshore at Citi**, and **Paul Taylor, Global Head of Maritime Industries at Société Générale** – used the impact fair to explain how the global framework for responsible ship finance is impacting the climate alignment of investments.



## Poseidon Principles for Marine Insurance

The Poseidon Principles for Marine Insurance were the first sector-specific climate alignment framework that enabled insurers to measure and report emissions data. The initiative's chair and vice chair, **Patrizia Kern, Marine Strategy Consultant at Swiss Re Corporate Solutions**, and **Sundeep Khera, Global Head of Hull at AXA XL**, respectively, explained how the Poseidon Principles for Marine Insurance foster transparency by requiring marine insurers to annually report the climate alignment of their portfolios. The data sourcing will evolve to allow use of estimates and modelled data, thus getting new insights into fleet emissions.

## Sea Cargo Charter

The Sea Cargo Charter provides a global framework for assessing and disclosing the climate alignment of chartering activities conducted by charterers and shipowners. Signatories include the Sea Cargo Charter Clause in their charter parties, encouraging their stakeholders to drive behavioural change in the industry. Represented at the impact fair by its vice chair, **Cargill Ocean Transportation Global Operations and Supply Chain Director Eman Abdalla**, the Sea Cargo Charter enhances transparency by standardising how emissions are reported and assessed.

## Silk Alliance

The Silk Alliance aims to establish a green shipping corridor by advancing the use of zero-emission fuels. As **Philippa Charlton, Chief Marketing Officer at Lloyd's Register**, explained at the fair, the ultimate goal is to enable a significant shift towards sustainable maritime fuel adoption that contributes to the industry's target of 5-10% adoption of zero-emission fuels by 2030. After conducting multiple workshops, the Silk Alliance has developed an implementation plan and a project proposal that outlines the strategic steps for the next two years.

## Zero Emission Buyers Alliance

**Zero Emission Buyers Alliance (ZEMBA) President and CEO Ingrid Irigoyen** used the impact fair to highlight the successes of the maritime sector's first-ever buyers' group. ZEMBA facilitates forward procurements that allow its members to bilaterally purchase the environmental attributes associated with zero-emission shipping services. Through its first two-year contract (2025-2026), 17 members collectively committed to purchase the environmental attributes associated with over one billion twenty-foot container miles of zero-emission shipping on a route from Singapore to Rotterdam. ZEMBA members will achieve at least a 90% reduction of greenhouse gases on a life cycle basis relative to fossil fuel-powered shipping, collectively avoiding at least 82,000 metric tonnes of CO<sub>2</sub>e.





## Addressing the nexus of energy, security, and social challenges in shipping

In this plenary session, industry and government leaders took a hard look at the dual uncertainty of balancing technological innovation with regulatory changes.

The panel represented the breadth of stakeholders that will need to work together to address the complex interplay between energy security, sustainable innovation, and geopolitical factors. Participating were: **Shin Watanabe, Senior Managing Executive Officer at Sumitomo Mitsui Finance and Leasing Company (SMFL); Lola Fadina, Director of Maritime at the UK Department for Transport;** and **DK Kim, Vice Chairman of Hanwha Ocean.**

### Adapting to a multi-fuel future

Kim started the conversation by discussing how Hanwha Ocean, one of Korea's largest shipbuilders, is approaching long-term planning in today's uncertain environment.

He said his company, like others, is embracing a flexible approach to ship design, allowing clients to adapt retrofit-ready vessels to a range of fuels, including liquified natural gas (LNG), bio-LNG, ammonia, and hydrogen. He said Hanwha Ocean's new gas turbine technology can deal with multiple fuel types and operate as a hybrid system when combined with batteries. This allows Hanwha Ocean's clients to invest in ships that can adapt to shifting fuel demands without being locked into a single choice.

**"We have a multi-layered approach to our technology development, and we want to future-proof our ships so that whatever happens in terms of the fuel, our ships will be ready,"** Kim said.

He went on to highlight how Hanwha's clients increasingly value "risk-adjusted returns" over upfront costs, preferring adaptable technology that can withstand a fluctuating regulatory landscape. More than anything, clients are seeking not just ships but assurances of long-term viability.

### Steering through uncertainty

The current uncertainty around future fuels isn't just a concern for shipbuilders and their clients. SMFL's Watanabe addressed the complexities financial institutions face in a multi-fuel future.

He explained that SMFL is diversifying its investment portfolio across various fuel types and technologies. Rather than betting on one eventual winner, SMFL supports a range of options, from LNG and dual-fuel systems to hybrid solutions that combine alternative fuels with electric power.

**"From the perspective of a large financial institution, it's essential to engage with multiple stakeholders—such as shippers, operators, and shipowners—to understand their preferences and strategies,"** Watanabe said. **"Based on these insights, we aim to diversify our portfolio, allocating capital across a range of fuel types and technologies to stay resilient."**

Watanabe further noted that "a pragmatic approach" helps manage risks and allows the company to accommodate regional differences in fuel preferences, which often differ depending on local policies and resources. This regional fragmentation in fuel demand could limit liquidity and the ability to scale economies around certain fuel technologies. This means shipowners and financiers may have to pay a premium to access fuels that are not widely adopted in a particular region.

### Collaboration is key

Looking at things from a government perspective, Fadina explained the UK's layered approach, which operates at the international, regional, and domestic levels. She shared how multilateral cooperation, particularly within the IMO, is critical to creating a level playing field for shipping decarbonisation. Simultaneously, regional initiatives like green corridors allow countries to trial sustainable shipping solutions on a smaller scale. This collaboration, she explained, not only helps reduce emissions but also fosters innovation in cleaner fuels and technologies. She highlighted the UK Shore programme as a notable example – a £200 million project leveraging private investment to advance emission reductions through cross-sector collaboration.

Fadina also noted the unique contributions of research institutes, which offer critical insights into scaling challenges and the practical implementation of alternative fuels, supporting the industry's sustainable evolution.

**"Data-driven decision-making is essential to crafting effective policies that support both environmental goals and economic growth,"** Fadina stressed.

When asked how individual governments can navigate global supply chain complexities, Fadina said it was important to leverage representative bodies and government partnerships. Such collaboration offers invaluable insights into the entire value chain, from raw materials to end-consumers, including the strategic investments made by different shipping companies.

**"After COVID-19, there is a better understanding of the role the shipping industry plays in the world, regarding world trade, supply chains, and decarbonisation,"** Fadina added. **"On the seafarer side, there is an opportunity for different stakeholders to come together to create a better environment. This is not the sole responsibility of the government."**





### Turning challenges into opportunities

As the discussion unfolded, geopolitical risks emerged as a recurring theme. Supply chain dependencies and regional fuel shortages are reshaping how different industry actors strategise globally but are also creating opportunities for companies resilient enough to adapt.

Watanabe highlighted that LNG, once seen as a bridge fuel, is now at the centre of a geopolitical tug-of-war. While it may not be the greenest choice, LNG is still crucial for fuel security in regions where renewables aren't yet viable.

"We may need to rely on LNG longer than we'd like, but we see there's an opportunity to innovate new technologies to offset emissions and eventually achieve zero-emission shipping," Watanabe said.

In a similar vein, Kim addressed the industry's reliance on China for shipbuilding, a dependency that is now under scrutiny. He noted a growing trend among clients to opt for South Korean shipyards, particularly for their high-tech, future-proof vessels. Such a shift, in his view, represents both a risk and an opportunity as companies diversify their supply chains to mitigate regional dependencies.

### ESG and fuel risks

The conversation then took a turn toward the industry's "license to operate" – an increasingly important issue as more stakeholders demand accountability in environmental, social, and governance (ESG) practices. When asked about the impact of these issues on the sector, Fadina confirmed that public perceptions and regulatory standards in shipping are taking shape due to emerging ESG expectations.

The panel recognised the challenge posed by introducing new fuels like ammonia, which offer environmental benefits but also come with additional safety risks.

"Ammonia has an essential role in decarbonisation, but an incident involving ammonia could impact public trust and shape regulations in ways we can't fully predict," Fadina explained.

This points to the delicate balance between innovation and safety as an area where government and industry must work closely to meet regulatory expectations and maintain a positive public image.

### A collaborative path forward

As the session drew to a close, the panellists recognised the importance of collaborative action across sectors and regions. Both Kim and Watanabe emphasised the need for strong stakeholder communication to align goals and facilitate progress throughout the value chain.

"We have a long way to go, but with the right infrastructure and a reliable supply of green energy sources, multi-stakeholder collaboration will be crucial to drive significant progress," Kim said.

The discussion concluded on a hopeful note, with the panellists agreeing on the importance of collective commitment, open communication, and data-driven decision-making.



Advancing

shipping  
decarbonisation





## Plotting the route to a zero-emission future

When 200-plus of some of the brightest minds from across the maritime value chain gathered in Tokyo for the Global Maritime Forum Annual Summit, they had just over a year to adjust to the new and more ambitious decarbonisation targets set by the IMO.

Adopted in July 2023, the global regulator's revised greenhouse gas emissions reduction strategy set a "by or around 2050" target for getting to net zero and introduced a new benchmark of having zero- or near-zero-emission fuels make up at least five percent of international shipping's energy use by 2030.

While many in the industry have applauded the new decarbonisation roadmap, there is much anticipation for the next step in the IMO's policy strategy. An April 2025 meeting of the regulator's Marine Environment Protection Committee (MEPC) is expected to provide additional clarity by developing concrete "mid-term measures" meant to guide the industry's decarbonisation efforts over the years to come.

With the Annual Summit held some six months before the details of these measures were to be hammered out, many of the discussions in Tokyo focused on how to bridge the gap between the aspiration of a zero-emission future and the current realities of the maritime sector.

### The tipping point: IMO's forthcoming mid-term measures

The outcomes of the IMO negotiations are likely to have far-reaching consequences for the industry. This meant that Summit participants were not only keen to hear from IMO Secretary-General Arsenio Dominguez (see [page 42](#)), but there was also intense interest in a deep-dive session led by **MEPC Chair Harry Conway**.

Conway, who is also Liberia's alternate permanent representative to the IMO, said the MEPC's spring meeting will be crucial. Specific regulatory measures, including a goal-based marine fuel standard and the potential introduction of an emissions pricing mechanism, are expected to be approved at the meeting, formally adopted in October 2025, and then enter into force in 2027. This development is likely to influence how the industry approaches emissions reductions, providing both a regulatory framework and financial incentives to drive compliance.

The ultimate goal of complete decarbonisation by 2050 includes key milestones along the way: a 20-30% reduction in emissions by 2030 and a 70-80% reduction by 2040. The checkpoints are meant to gradually transition the industry, but meeting these ambitious targets will require substantial investment, innovation, and industry-wide cooperation, particularly in the adoption of alternative fuels.

To get there, Conway said the IMO is adopting an approach he called "the five C's"—compromise, consensus, collaboration, cooperation, and commitment. He said MEPC negotiations must navigate different viewpoints and national interests, which by their nature require compromises since each stakeholder brings a unique set of concerns

to the table. Moving forward will require a delicate balance, but the ultimate aim is to reach a shared outcome that benefits the environment while safeguarding the viability of the shipping industry.

The IMO has said that its regulations will be continuously revised as new data and evidence become available, allowing for adjustments as the industry gains more experience and insights into what works in practice.

While both Conway and Dominguez stressed that the IMO would provide the clarity that industry leaders have been clamouring for, the state of the negotiations at the time of the Summit—with targets and timelines adopted by concrete measures still undefined—led to some concerns that the industry was idling in 'wait-and-see' mode.

### Technological efficiency: The other lever for decarbonising shipping

But a session led by **Bo Cerup-Simonsen, CEO of the Mærsk McKinney Møller Center for Zero-Carbon Shipping**, highlighted how the industry already has plenty of tools at its disposal to reduce emissions.

This can be seen by the fact that over the past 15 years, emissions from shipping stagnated while shipping volumes increased. This isn't just due to the adoption of new, investment-heavy technologies. Much more cost-efficient operational efficiency measures and practices, such as slow steaming, are also reducing the sector's carbon footprint.

Optimising energy efficiency offers immediate and affordable emission reductions. Cerup-Simonsen said that when evaluating the cost of emission reduction measures, it is useful to rank them according to cost per abatement. Energy efficiency practices like slow steaming,

hull cleaning, and antifouling paint are among the easiest and cheapest ways to reduce emissions, and it makes sense to prioritise these while keeping in mind that even small actions can make a big difference when done collectively.

One of the simplest, most immediate ways to reduce emissions is to slow sailing speeds and move away from the common industry practice of "sail fast then wait". Rather than only considering sailing speeds from a commercial point of view, Cerup-Simonsen suggested that regulatory frameworks like the Carbon Intensity Indicator (CII) could be used to set speed limits for certain ship types to bring down emissions.

While Cerup-Simonsen highlighted the industry's significant progress in implementing efficiency best practices, he said the fragmented nature of shipping makes wider adoption difficult. Shipowners often face challenges in making investment decisions, such as assessing costs, operational benefits, implementation feasibility, and potential risks.

Openly sharing cost and performance data on existing and emerging technologies can reduce uncertainty, encourage investment, and enable new forms of partnership, Cerup-Simonsen said.



## Cracking the chicken and egg dilemma

While existing technologies for energy and operational efficiencies must play a major role in reducing emissions, much of the industry's overall decarbonisation strategy rides on the eventual large-scale adoption of zero-emission fuels.

However, although ships capable of burning these fuels are coming and projects to produce millions of tonnes of the fuels have been announced, few shipping companies have secured an adequate supply. A session led by **Susana Moreira, Executive Director and Co-Chair of H2Global Foundation**, looked at what is holding the market back and how to best break the deadlock.

At present, there is no viable commercial market for hydrogen-based fuels like ammonia and methanol, largely because of their high cost. This has led to a 'chicken-and-egg' dilemma. Buyers are hesitant to commit to zero-emission fuels before costs come down, which requires scaling up production. However, scaling up production requires buyers to make commitments. Further complicating the situation is the aforementioned 'wait-and-see' approach to coming regulations.

This has left the market for clean fuels stuck in a loop, with just 7% of hydrogen-based fuel projects reaching a final investment decision in 2024, according to the International Energy Association. Nearly everyone in the shipping industry agrees that the market needs to get going, but a clear mechanism for doing so is yet to emerge.

Enter H2Global, a green market-making instrument being employed by the German government to stimulate the market for hydrogen-based fuels.



Under the scheme, the Hydrogen Intermediary Company (Hintco)—an entity established by H2Global—buys hydrogen derivatives on long-term contracts and sells them on to users on short-term contracts. Both sets of contracts are awarded through a competitive bidding process, with the supplier with the lowest bid awarded the purchase contract and users with the highest bids awarded sales contracts. Any gap between the purchase and sales prices is then compensated, reducing the cost premium for the winning users.

The World Economic Forum and Boston Consulting Group have identified three main issues holding back zero-emission shipping fuels: a lack of clear demand signals, an expectation gap in terms of offtake agreements, and a lack of credible third-party cost estimates. Moreira suggested that H2Global tackles all three. It can provide large-scale offtake contracts to stimulate demand and bridge the gap between the ten-year contracts preferred by the producers and the more flexible terms sought by buyers. Plus, all prices set through the mechanism are made public.

Although initiated by the German government, Moreira said that H2Global is envisaged as a platform that can be used by other governments and organisations. She noted that H2Global is engaging stakeholders in the maritime industry and exploring auctions targeting shipping.

## Opportunities for the Global South

While Moreira's presentation focused on a promising development out of Europe, a joint presentation from **James Mnyupe, Economic Advisor to the Namibian President and Namibia's Green Hydrogen Commissioner**, and **Alexander Saverys, Chief Executive Officer of Compagnie Maritime Belge (CMB.TECH)**, highlighted how developing countries are well-positioned to produce the zero-emission fuels the industry needs to decarbonise.

Mnyupe and Saverys used their collaboration to establish hydrogen production facilities and related projects in Namibia's Erongo region as a case study to demonstrate how developing countries can become leading producers of clean fuels like green hydrogen and ammonia. Mnyupe highlighted his country's favourable conditions for companies like CMB.TECH to invest in hydrogen production facilities: plentiful sunshine, easy access to the sea, and a stable government with an advantageous regulatory regime.

Their joint venture, Cleanergy Solutions Namibia, includes a solar park linked to an electrolyser that will use desalinated water and solar energy to produce green hydrogen. Bunkering infrastructure that will enable ships to refuel with zero-emission alternatives is also under development, potentially transforming Namibia into a strategic refuelling hub along key shipping routes. The project envisions eventually scaling up production to export green hydrogen, contributing to Namibia's economic growth.

Mnyupe and Saverys also highlighted the importance of providing tangible benefits to local communities. The initiative includes a "hydrogen academy" to educate and train locals, ensuring the transfer of knowledge and skills, and some of the desalinated water used in the project will be made available for local use.

Mnyupe and Saverys said they hoped their collaboration would inspire similar projects because investments like these are needed if the shipping industry's energy transition is to transpire at a truly global scale. Many developing nations have access to the renewable resources necessary to produce the green fuels that shipping and other sectors will need in the years to come. The key, they said, is derisking investments in these countries and allowing them to deliver the end product themselves. Financial support for infrastructure development, blended finance models, and grant funding can all play crucial roles in attracting private capital.





## Conquering the currents, mobilising for change

On the final day of the Annual Summit, participants worked in 13 small groups to address the challenges and opportunities outlined in the previous days' plenary discussions and deep-dive presentations.

Participants chose the topic that best matched their interests and expertise. They then spent the bulk of the day critically examining their chosen subject and searching for common ground and actionable ideas with their peers.

Following the working groups, all Annual Summit participants gathered one last time to cap off their time together in Tokyo in a final plenary session. Here, each group selected a representative to share a summary of their discussions with the larger crowd, highlighting their conclusions and identifying what remains to be done to lead a transformative change within global seaborne trade.

### Industry action on decarbonisation

Those who focused on decarbonisation action were up first, with **ETFuels CEO Lara Naqushbandi** kicking things off on behalf of the **'Securing offtakes: Bridging gaps between suppliers and buyers'** working group.

Naqushbandi said her group investigated the barriers to signing the offtake contracts needed to kickstart the availability of e-fuels. Noting that ammonia and methanol each present their own specific challenges, the group decided to simplify the discussion by focusing solely on methanol.

Some of the most significant obstacles they identified were the high price of alternative fuels, long contract durations, and the lack of infrastructure for getting the fuel from the production plant to the port and then on to ships.

But the biggest roadblock is what they dubbed "the timing gap". With e-methanol projects taking up to six years to develop, offtake agreements would need to be signed within the next few years for the fuels to be available in the 2030s. However, shipping companies are hesitant to make commitments so far in advance, given ongoing uncertainties about IMO regulations and which fuels will be most competitive in the 2030s. This is not just holding back individual projects but also the readiness of the entire fuel ecosystem, they said.

It was agreed, however, that most of these challenges are manageable. Suggested short-term solutions included building clean energy marine hubs to produce the fuels in the cheapest locations globally and then export them for use in bunkering hubs. In the medium term, creating fuel buyers' alliances and pooling demand from land-based markets were seen as ways to enable offtakes at scale.



In her report-out to the closing plenary, Naqushbandi highlighted some of the existing offtake initiatives like the H2Global auction mechanism and the Zero Emission Maritime Buyers Alliance (ZEMBA) but said much remains to be ironed out when it comes to "the nitty-gritty of actually getting commercial offtakes to happen between buyers and sellers". Recognising that fuel prices will likely be impacted by the IMO negotiations over the coming months, the group recommended prioritising aspects like certification, route optimisation, and demand aggregation now and saving the more commercial and price-related aspects until there is more clarity.

### "We're all on the move"

The next working group summary came from **GasLog CEO Paolo Enoizi**. Speaking on behalf of the **'First mover business case: Risks and opportunities'** group, he started by suggesting that the session title might be a misnomer.

"There are no first movers anymore because we're all on the move," Enoizi said.

The group nonetheless agreed that there are still risks associated with moving faster than others and that plenty of inspiration can be found from companies that are a bit "more mature in their thinking".



Regulations like FuelEU Maritime, which is subsidising the deployment of low-emission fuels, are enabling the first-mover business case. The extension of the EU's Emissions Trading System (EU ETS) to the maritime sector was also seen as a key enabler, though some group members expressed concerns about the perceived lack of clarity on how ETS funds would be used.

This group also saw promise in existing initiatives, saying that H2Global and ZEMBA served as great examples of how to aggregate demand while boosting the visibility of decarbonised shipping options. They also recommended that shipping companies get better at sharing existing knowledge so others can learn from the successes and failures of those further along in their decarbonisation journeys.

When it came to challenges to the first-mover business case, the group said that there are still issues with shipyard capacity and that true economies of scale can only be achieved by partnering with other industries on energy demand.

The group stressed that taking action now will reduce the likelihood of managing stranded assets in the future. One representative of the shipping finance sector told the group that there are ongoing discussions on when to stop financing conventionally fuelled ships.



### The next step for green corridors

The next to report to the plenary session was **Saskia Mureau, Director of Customer Digital at the Port of Rotterdam**, who represented the working group entitled 'The next step for green corridors: Commercial innovation'.

Mureau said the successes of green corridor initiatives worldwide—a Global Maritime Forum report released shortly after the Summit found that the number of new initiatives grew by 40% in just one year—don't seem to be fully recognised by the industry as a whole.

"A lot of great work has happened in these green corridors, but somehow, we have failed to distribute that knowledge," she said. "There's a real task in making sure that people know what the learnings are: the type of fuels, the [fuel] price gap, the commercial structures that have been trialled and have worked."

Despite the growth in green corridor projects, securing enough new shipping fuels to reach deployment remains a significant roadblock. It was suggested that green corridor initiatives collaborate with other sectors on demand aggregation and explore opportunities for building cross-sector coalitions.

Mureau said her group had settled on three recommendations for advancing green corridors:

- Setting common definitions and standards
- Seeking governmental support to close the price gap between fossil fuels and low- or zero-emission alternatives
- Using current commercial structures to bring existing green corridor initiatives closer to real-world implementation.

### The technology 'snowball effect'

The decarbonisation action working group summaries were rounded out by the 'Technology helping technology: Digital solutions, efficiency strategies, and new fuels' group, represented by **ZeroNorth Chief Sustainability Officer Lora Jakobsen**.

This group examined the roles that vessel technology, operational efficiency, and usage practices play in the green fuel transition. Participants predicted that there would soon be a "snowball effect" in technology adoption, though it remains uncertain whether the eventual "avalanche" will favour methanol, ammonia, or another fuel. At this stage, the most important thing is the initial movement. As one group member put it: **"When considering the adoption of alternative fuels, we need to determine how to start the avalanche."**



The group discussed the need for standardisation and baselines in energy efficiency and green fuel technologies to help mitigate owners' investment risks and gain access to financing, noting that operators are currently outpacing owners when it comes to energy efficiency and technology.

"How do we get owners to act? This is, of course, a conversation that needs to be had between owners and operators, and it might be that we won't ever solve that. Still, by getting people into the room together, there's a better chance of it happening," Jakobsen said.

She noted that the very makeup of the group—whose 11 members included executives representing tanker shippers, engine manufacturers, shipbuilders, shipowners and managers, logistics services, and classification societies—pointed to the necessity of involving all relevant stakeholders, including governments and the IMO.

### How finance can unlock decarbonisation

Other decarbonisation-focused groups looked at how investments and policies can ensure a broad transition that reaches all regions and segments.

The first of these to report to the closing plenary was the working group that zeroed in on 'The role of finance in delivering full-scale decarbonisation'. Speaking on behalf of his collaborators, **Stephen Fewster, Global Head of Shipping Finance at ING**, said they had homed in on three key aspects: the financing of vessels and land-based infrastructure, the role of public support in de-risking and scaling investment, and strategies for unlocking opportunities in the Global South.





When it comes to financing vessels, Fewster said that “a very clear and workable definition of what a green ship is” is desperately needed, whether that comes from the IMO or the International Association of Classification Societies, and that the finance industry wants to see more “transparency from the owners themselves” in the form of annual sustainability reports that are independently audited and verified.

“If we have those things, then we feel, as a finance industry, we could then go to the regulator and insist that they give us a lower capital weighting, which would mean that we could offer reduced pricing,” Fewster said. The group also spent considerable time discussing how governments can support private-sector investments. One suggestion was for public authorities to develop a template of what is required to get the proper development and operating permits, which would allow the fast-tracking of needed projects. Governments were also encouraged to support the industry’s decarbonisation by supporting public-private partnerships, providing concessionary finance, and/or offering feed-in tariff schemes to provide fuel producers a guaranteed, above-market price.

Finally, Fewster said that with the high average costs of capital and the low levels of existing infrastructure in the Global South, long-term offtake contracts would go a long way in reducing costs and investment risks. The group suggested that multilateral institutions and export credit agencies should play a role in enabling this.

### Supporting a just and equitable transition

The Global South was also a focus of the ‘Ensuring a broad transition’ working group, which was represented by **Nikolaus H. Schües, Owner and CEO of F. Laeisz and President and Chair of BIMCO**. The group explored what is needed to realise the IMO’s target of a “just and equitable” energy transition and worked to identify the policies and industry action needed to achieve it.

Given that the transition to zero-emission shipping will raise trade costs, the international community will have to find mechanisms to support those countries most impacted. While broad economic support will be necessary, many countries will also have opportunities for investment in the value chains for zero-emission shipping, such as fuel production and port infrastructure.



Schües said the group discussed the need to identify the specific countries with long-term competitive investment potential based on factors like climate, demographics, and political stability.

Once the countries are identified, it becomes a matter of exploring mechanisms like tax incentives and development funds to invest in infrastructure or subsidise products. The group cautioned against “a second round of colonialism” if private companies and wealthier nations make investments solely out of their own interests. They said market forces should drive investment and technology choices.

### ‘We need to move now’

The last to report on decarbonisation policy was the working group ‘Getting to Zero: What industry needs from the IMO negotiations’. Group spokesperson **Andreas Enger, CEO of Høegh Autoliners**, said that discussions about decarbonising shipping have advanced to the point where it is now “all about getting the commercial model to work”.

This meant that the group’s advice to the IMO was simple: provide clarity. The group said it wanted the regulator to develop a clear global fuel standard to set reductions on the emissions intensity of shipping fuels, which will directly spur investments in zero-emission shipping. Equally important is establishing a levy to create a level playing field for investments.

“We need to get to a meaningful levy, and we need some clarity on how this levy will be put to use,” Enger said. “The simple issue is that this levy is going to increase the cost of emitting carbon and reduce the cost of the zero-carbon alternatives.”

The group expressed hope that the IMO would make good on its promise to formally adopt key elements of its revised greenhouse gas strategy in 2025, saying that there was no time to waste.

“The window of opportunity is pretty narrow because the EU is already starting to make its own system,” Enger said. “If the IMO does not move fast in creating something global, we are going to get a maze of regional systems that will be very difficult to untangle. So we need to move now.”



## IMO Secretary-General: Decarbonisation on track, but further engagement needed

The Annual Summit 2024 was held at a critical moment for the realisation of the shipping industry's emissions reduction plans. Leaders gathered in Tokyo just a few short weeks after the conclusion of the IMO's most recent Marine Environment Protection Committee meeting (MEPC 82) and less than six months before the committee would meet again for MEPC 83. Far from just a routine meeting, MEPC 83 has been eyed as a key milestone in the industry's decarbonisation strategy.

The April 2025 meeting is expected to iron out the details of the so-called "mid-term measures" for realising the IMO's revised greenhouse gas strategy and ensuring a just and equitable energy transition. Among the measures expected to be approved are an emissions pricing mechanism and a global marine fuel standard that will phase in the mandatory use of lower-emission alternatives. These are then expected to be formally adopted in autumn 2025.

With that timeline in mind, many participants were keen to hear from **IMO Secretary-General Arsenio Dominguez** in a discussion moderated by **Christine Loh, Chief Development Strategist, Institute for the Environment, Hong Kong University of Science and Technology**.

Loh acknowledged that anticipation in her introduction.

"The IMO's decisions are so important that they affect every stakeholder in this room and beyond; they're all waiting to see what the IMO is going to do," she said.



Video Q&A with IMO Secretary-General Arsenio Dominguez.



### Leadership through compromise

Dominguez began by emphasising the importance of both compromise and leading by example. He stressed that with 176 member states, the IMO has to accommodate different views. To demonstrate how difficult it can be to find consensus among so many disparate viewpoints, the Secretary-General pointed to the wide range of opinions gathered in the single room.

"If I start asking each and every one of you your opinion on the pathway to decarbonisation, it would be difficult to find a common approach," he said.

While he said the IMO takes its duty to "provide guidance, clarity, and regulations," very seriously, Dominguez reminded participants that policy development should be a two-way street.

"The more that you ask from us, the more that we can provide for you," Dominguez said. "But you can also take the first steps. You can take actions that then will make their way to the IMO, and in that way, our regulatory process will be more interactive and more proactive. At the same time, the quality will increase because we're now basing everything on things that you deal with day in and day out."

Dominguez said establishing closer partnerships with industry leaders and leveraging their expertise and experience will help the IMO move from prescriptive measures to a more flexible and adaptable goal- and risk-based regulatory approach.

He stressed that everyone in the room, himself included, has an obligation to improve the industry.

"We're all recognising that the image of shipping is not great. We are responsible for that, and we are the ones that need to work on it," he said. "We're not really investing in the human element, so we aren't attracting talent. We will do our part. Some of it falls within the remit of IMO, but some of it doesn't. It's the actions that you take as the leaders in this industry that will enhance our visibility, our green credentials, our sustainability, and the way we treat and attract people."

### 'The sooner we get that data, the easier we'll be able to understand the technology'

Data safety, security, and standardisation came up repeatedly in Dominguez's remarks and the Q&A that followed. Dominguez said the IMO is working to enhance cybersecurity measures and revealed that the regulator had experienced a data hack during the COVID-19 pandemic. He also said the IMO is working on a digital strategy to better facilitate the exchange of data.

With many in the audience eager to interact with the head of the sector's global regulator, Loh opened up the floor for questions. The first came from **Søren Meyer, CEO of ZeroNorth**, who wanted to know what the IMO could do to standardise data collection and thus lower the administrative burden for crews that currently spend hours a day manually entering vessel data, which then has to be validated by shore-based workers.

Dominguez said the IMO is exploring ways to leverage technology, such as electronic certificates and artificial intelligence, to streamline data collection. But he stressed that it couldn't just be "taking a paper and transporting it into an electronic form that doesn't really facilitate the process".



He said the IMO's ongoing review of the International Convention on Standards of Training, Certification and Watchkeeping for Seafarers (STCW) provided a good opportunity to "evolve a regulatory process and look at how to reduce the administrative burden on seafarers so they can focus more on the very serious tasks they have".

Other questions on data soon followed. **Citi's Chairman for Global Shipping Michael Parker**, who also serves as Chairman of the Poseidon Principles, asked about making the IMO Data Collection System (DCS) data publicly accessible. **Sundeep Khara, Global Head of Hull at AXA XL**, seconded this, stressing that an understanding of DCS data would help de-risk the energy transition.

"The sooner we get that data, the easier we'll be able to understand the technology," Khara said.

Dominguez agreed that the DCS data is a useful tool in developing the IMO's upcoming technical and economic measures. While he said he could not pinpoint when that data might become publicly available, it is something "that continues to be on the table". The key, he said, is safeguarding data security and addressing concerns about potential misuse.

### Shipping's responsibility for the oceans

A question from **Hing Chao, Executive Chairman of Wah Kwong Maritime Transport** brought the focus to biodiversity and ocean health.

"I think everyone here is very mindful of the importance of the ocean and the shipping industry's responsibility," Chao said.

He said that turning that mindfulness into action, however, may require calculating biodiversity into future carbon pricing and wanted to know whether the IMO would be open to that.

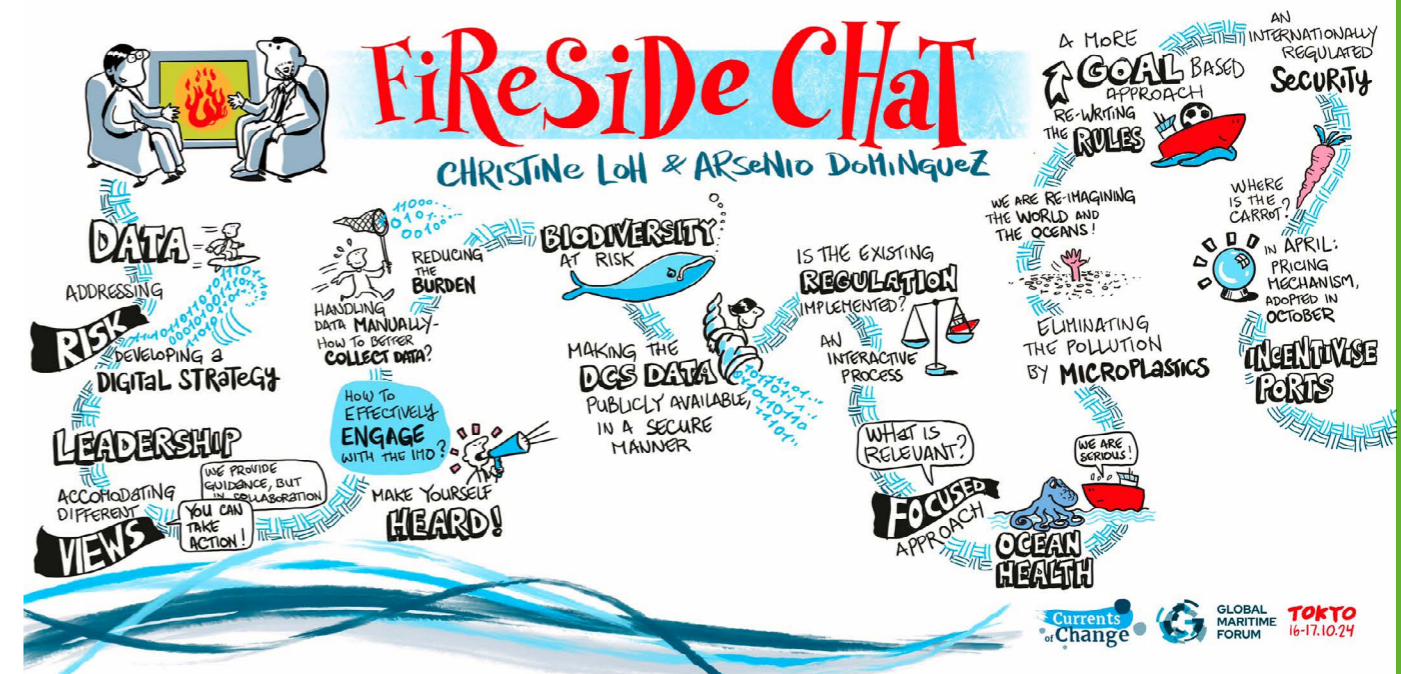
Dominguez stressed that the IMO is "serious about protecting the ocean" but that the best course of action is to strengthen collaboration with other UN agencies. He pointed to the International Convention for the Prevention of Pollution from Ships (MARPOL) and the Convention on Biological Diversity, which has a target of protecting at least 30 percent of the ocean by 2030. Dominguez said the IMO is ready to support other ocean health initiatives, like efforts by UN-Oceans to clean up plastic pollution, but cautioned that the IMO's remit only goes so far.

"The more we try to do, the less effective we are probably going to be," he said.

### "We need safe ports"

On a similar note, audience participation toward the end of the session focused on how the IMO can better involve ports despite its lack of regulatory authority on land.

"We don't just need safe ships, we need safe ports," said **Lloyd's Register CEO Nick Brown**. "[The IMO] cannot extend [its] arm into ports, but we need some international standardisation around what happens in ports and on the storage of new, more dangerous fuels."



The Secretary-General agreed that ports have a crucial role in supporting the energy transition and that standardising port infrastructure is necessary to facilitate the adoption of alternative fuels and technologies. However, he conceded that the International Association of Ports and Harbors (IAPH) is probably better situated to create uniform standards.

**James Mnyupe, Presidential Economic Advisor to The Republic of Namibia**, followed up by asking whether some of the funds raised by the IMO's coming pricing mechanism might be used to incentivise port development, particularly in emerging markets.

"The quick answer is yes, it's on the table," Dominguez replied. "For many member states, decarbonisation means support in areas like port infrastructure in order to be able to actually meet their goals."

### "We will surprise you"

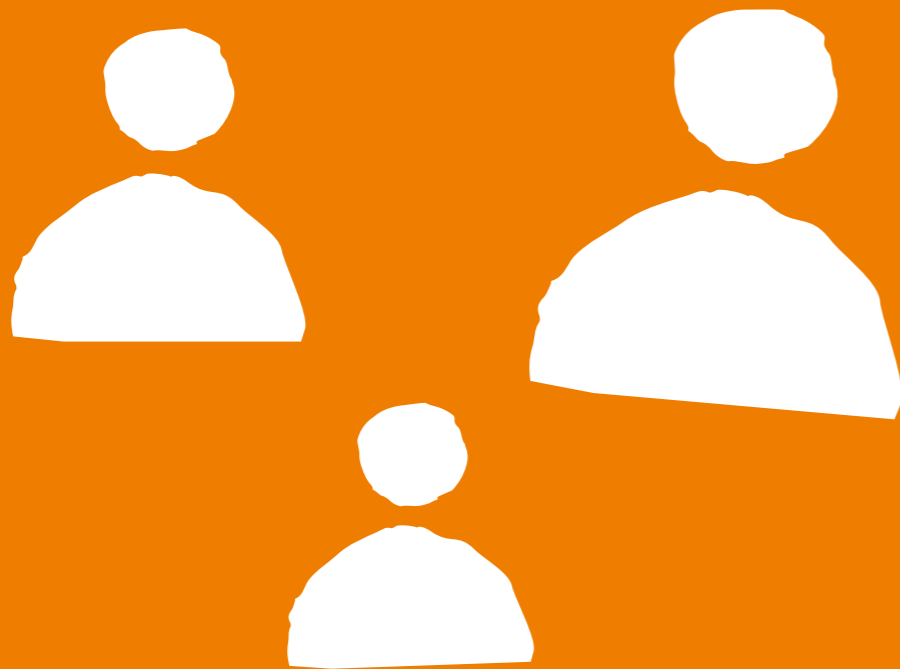
Dominguez repeatedly stressed the importance of proactive stakeholder engagement, not just with port authorities but with other diverse stakeholders involved in shipping decarbonisation, including NGOs and financial institutions. He encouraged the Summit participants to utilise existing channels, such as engagement through member states and participation in IMO meetings, to voice their concerns and provide input.

The Secretary-General wound up his remarks by telling the assembled industry leaders that they should be confident that the regulatory body will reach a successful compromise at MEPC 83.

"We will continue to surprise you all positively in the way that we'll make decisions at the IMO," Dominguez said.



# Prioritising people



**Human  
sustainability  
at sea**





## Making a career at sea safer, healthier, and more inclusive

It's hard to overstate the importance of the roughly two million men and women who staff the global merchant fleet. With approximately 90% of all trade transported by sea, these seafarers are vital to the continued flow of goods we all depend on.

Yet, the world's seafarers are all too often forced to accept poor working conditions, long hours, unpredictable contract terms, physical risks, and discrimination. As a result, the maritime industry faces both a current labour shortage and difficulty attracting the talent needed to keep seaborne trade sailing smoothly in the future.

Ways to improve the industry's treatment of its workforce and make a career at sea more appealing have been part of the Annual Summit agenda since the inaugural event in Hong Kong in 2018, leading to the Global Maritime Forum establishing a dedicated human sustainability programme in 2022.

Discussions at the Annual Summit in Tokyo focused both on the significant improvements and promising initiatives within human sustainability and the fact that the industry still has a long way to go.

### Diversity@Sea: Insights from the bridge

In a deep-dive session that highlighted some of the strides the maritime sector has made, **Captain Radhika Menon of Synergy Marine Group** focused on how the industry can become more inclusive and attractive, particularly by increasing the representation and retention of female seafarers.

As someone who has worked at sea since 1991, Captain Menon knows a thing or two about being a woman in a male-dominated field. Women still only account for less than 2% of the global seafaring workforce and efforts to attract more women are hindered by safety concerns, social isolation, and a lack of suitable policies to accommodate pregnancy and parental leave.

In her presentation, Captain Menon—the first female captain in the Indian merchant navy and the first woman to receive the IMO Award for Exceptional Bravery at Sea—touched on how leadership, inclusive practices, and daily routines on board can foster a safe and collaborative environment.



Captain Menon's presentation focused mainly on Synergy's participation in the All Aboard Alliance's Diversity@Sea pilot project, in which 12 leading shipping companies committed to creating a better work environment at sea by implementing a series of practical measures on one of their vessels (see below).

In her case, it was the Southern Reverence, on which seven of the 23 crew members were female. She said the experience demonstrated that gender diversity doesn't just create opportunities for women but benefits the entire crew.

While Captain Menon characterised her participation in the Diversity@Sea pilot as an overall success, she said there are still unique challenges facing women at sea. She encouraged shipping companies to develop policies that accommodate maternity leave and provide shore jobs for women during pregnancy, ensuring they can rejoin their careers without losing rank or seniority.

She also noted the importance of onboard internet access for maintaining contact with family and friends on shore, emphasising that seafarers spend long periods away from home and that staying connected can help reduce social isolation.

### Diversity@Sea

The Diversity@Sea pilot is a collaborative effort of the All Aboard Alliance and 12 leading shipping companies.

During the pilot, which ran from October 2023 to September 2024, the participating companies committed to having at least four female crew members on board, establishing gender-appropriate restrooms and changing facilities with proper conditions for menstrual needs, providing 24/7 internet connectivity and access to an anonymous helpline, and ensuring inclusive personal protective equipment.

The Global Maritime Forum engaged daily with more than 400 seafarers on the 12 involved vessels to learn how to best create an inclusive work environment that is free from abuse, harassment, and bullying and accommodate more flexible work-life planning.

Initial data collection revealed seven key focus areas that would bring meaningful change to the lives of men and women working at sea:

- Zero-tolerance policy for abuse, harassment, and bullying
- Flexible work contracts
- Internet access and social connectivity
- Guaranteed helpline access
- Parental support
- Inclusive personal protective equipment
- Transparent training and appraisal systems

The pilot's long-term ambition is to create a new set of shared standards for the maritime industry.

The full learnings, recommendations and guidelines will be published in March 2025, but a report detailing the preliminary findings can be found [here](#).



## Leaders as allies and allies as leaders

The challenges related to safety and inclusion at sea were also the focus of a session led by **Simon Grainge, Chief Executive of the International Seafarers Welfare and Assistance Network (ISWAN)**.

Grainge shared insights from ISWAN's experiences supporting seafarers and their families, particularly the network's focus on women. The discussion centred around the importance of allyship, creating a supportive work environment, and the role of leadership in driving cultural change in the maritime industry.

He said leadership must be visibly committed to creating a welcoming, inclusive culture and should clearly communicate expectations for what is and isn't allowed on board. While it was stressed that true organisational cultural change can only come from the top, all male crew members were encouraged to act as allies to their female colleagues and to treat them with professional respect.

In response to women seafarers being more than three times as likely to contact its helplines about abuse, bullying, harassment, or violence, and more than twice as likely as men to report mental health issues, ISWAN launched the 'Safe at sea...it takes all of us!' campaign to encourage men to act as allies.



ISWAN's allyship campaign.

While awareness-raising campaigns like this were seen as a good start, creating change can take time, as many male seafarers may have limited experience working with women. A former policeman himself, Grainge made an analogy to law enforcement, another traditionally male-dominated field in which it took decades for women to earn the respect they deserve.

A 2023 report by the All Aboard Alliance, based on interviews with 115 female seafarers, identified this lack of professional respect as one of the 15 key pain points for women at sea. The report sorts the pain points into four broad categories: employment barriers, difficulty succeeding professionally, challenging social relations onboard, and limited access to gender-appropriate products and facilities.

While the report and data collected by ISWAN have helped to shine a light on some of these issues, much of the discrimination and abuse at sea remains unreported or unacknowledged, partly due to cultural challenges and a lack of vocabulary to properly address sensitive matters. He said continued efforts should be made to improve data collection and address the challenges around underreporting of harassment and abuse, not just at ISWAN but across the industry. In the question-and-answer session following Grainge's presentation, the role regulations should play in driving change was debated.



There were some concerns that focusing only on minimum standards would not be enough to foster a positive culture. It was emphasised that while regulatory support could be helpful if properly tailored to the industry's unique challenges, it is more important to push for an industry-wide commitment to creating a truly inclusive and safe environment for all seafarers.

## Five perils for the future of seafaring

Today's uncertain world is creating new challenges for seafarers and affecting the industry's ability to retain and attract workers. **Joshua Hutchinson, Vice Chair of the Sailor's Society**, led a session focused on the greatest risks to a sustainable maritime workforce and what can be done to collectively address them.

Hutchinson said that the nature of the seafaring profession has changed considerably over the past five to ten years in response to what he identified as "five perils for the future": crime, migration, narcotics, activism, and war. As geopolitical strife increases, seafarers increasingly find themselves having to step in as humanitarians, guards, information officers, and health workers.

The risk of being targeted by militants, responding to distress calls from migrants at sea, or being unwittingly caught up in a smuggling operation takes a toll on seafarers, even if those risks don't turn into reality.

While Hutchinson said the industry could do little to eliminate these external perils, shipping companies can prepare their workers to deal with them. This can be done in part by developing initiatives to ensure mental and physical wellness, with Hutchinson saying that a healthy work environment is essential for seafarers to maintain healthy minds and healthy bodies.

Hutchinson pushed back a bit against conventional wisdom and argued that the shipping industry does not face a recruitment crisis. Instead, he said, it's a self-inflicted employment crisis caused by so many companies only offering short-term contracts. Because they offer little to no job security, young cadets often reject these offers and look for employment elsewhere. He pointed out that 70% of Southeast Asian cadets never actually get jobs on commercial vessels.

While the limited availability of steady contracts is a major deterrent for potential seafarers, it's not the biggest. In a Sailor's Society survey of some 4,000 cadets, a whopping 91% of respondents said that their number one factor when considering future employment is the way seafarers are treated. Hutchinson suggested that some of this could be addressed by promoting social engagement initiatives to combat loneliness and improve overall morale. He also said shipping companies should regularly assess and adapt strategies based on feedback from young seafarers, who often have higher expectations, and ensure that the workplace evolves with their needs.





## Beyond the minimum: Why shipping needs a more aspirational approach to human sustainability

A recurring theme of the Annual Summit was the need to better prioritise the people at the heart of global maritime supply chains. In the closing plenary, the four working groups that spent the day discussing human sustainability had plenty of findings to report back to participants, from developing universal principles for seafarer well-being to focusing diversity efforts beyond gender and better engaging with local port communities.

The first to share the outcomes of working group discussions focusing on human sustainability was **Captain Rajesh Unni, Founder and CEO of Synergy Marine Group**, who represented the group 'A new standard for life at sea'.

All too often, he said, "seafarers clearly don't feel like they're part of the team" because they are treated more as an operating cost than as valuable assets, which negatively affects morale, productivity, and retention.

Captain Unni explained that his group focused on the need to develop stronger principles for working conditions at sea that go beyond the existing standards set up by the Maritime Labour Convention. The goal should be to significantly improve seafarers' well-being, safety, and sense of belonging. While their discussion started with agreement that working conditions at sea have never been taken more seriously, there was an acknowledgement that many companies still struggle to agree on what "good" looks like, which poses a risk of different standards emerging throughout the sector.

The group explored how to develop a collective industry approach to creating a set of stronger standards for physical and mental health, safety, and connectivity. Strengthening these areas is crucial for the future of maritime operations and ensuring seafarers' long-term engagement and contribution.

In addition to improving conditions for today's maritime workforce, establishing a clear framework for improving life at sea was also seen as a critical element in making the industry more attractive to new talent. It was suggested that a first step should be the creation of a pilot programme to test and refine the standards on selected vessels.

### Overcoming different cultural opinions on diversity

The next to report a summary of its discussions was the 'Taking pride in maritime: Diversity beyond gender' working group. Represented by **Tatsuro Watanabe, Chief Sustainability Officer at Mitsui O.S.K. Lines (MOL)**, this group explored how the shipping industry can ensure that diverse employees, particularly those from the LGBT community, feel safe and welcome.

The group stressed the need for management teams to lead their own internal cultures on diversity, equality, and inclusion (DEI) matters and to provide training and education to enhance awareness.



They also advocated for "practical, pragmatic solutions" like providing gender-neutral restrooms and changing facilities and implementing zero-tolerance policies and safe reporting mechanisms so employees have a place to turn when they experience discrimination.

"Although we must start to identify universal principles, we will face difficulties due to regional and cultural differences," Watanabe said. "That is one of the biggest challenges to sort out for the continuity of our industry."

Similar to the previous group there were calls for creating a set of shared guidelines for avoiding discriminatory behaviours. But there was also an acknowledgement that, in an industry as global as shipping, there will always be differing opinions on DEI issues.



### How banks can help root out poor practices

The next group to report back to the plenary was the one tasked with answering the question, 'How can ship finance support human sustainability?' Group representative **Peter Stokes, Advisory Board Member at Ultrana**, said their discussion focused on how transparency and data can help improve working conditions at sea.

The group first set about defining the poor practices at sea, including crew abandonment, violence and harassment, inadequate safety management, lack of training, rogue recruitment practices, and seafarer criminalisation. Getting to the heart of these issues will require sourcing, collating, and analysing data, some of which is available through existing sources like union records, the Institute of Human Rights and Business, and the IMO and the International Labour Organization's joint database on seafarer abandonment.

While the group saw these data sources as crucial, they are also often fragmented. Addressing the gaps will require standardised data collection, verification, and aggregation. Only then can the data effectively influence financial decisions.

The group agreed that rectifying poor practices at sea is in the best interests of both seafarers and financial institutions.

"If crews are badly treated or inadequately trained, that will have an impact on asset quality and also on the risk of incidents, loan losses, insurance claims, etc.," Stokes said.

### What is shipping's role in society?

The final human sustainability working group also had accountability and transparency as key themes. Entitled '**International corporate citizens: Shipping's role in society**', participants explored the industry's impacts on wider society, its environmental responsibilities, and the need for better community engagement.

The group was represented by **Peter Lye, Director and Head of Shipping at Anglo American**, who said the group started its discussion by narrowing its scope.

"Initially, there was a perception that we would look at the corporate citizen concept globally, but we decided to be a bit more targeted and looked at certain communities that we engage with, particularly ports," Lye said. "That engagement was seen as key."

The group discussed shipping's impact on local communities, including air pollution, noise, and disruption, and stressed the importance of addressing those concerns while showcasing the industry's positive contributions, such as job creation. Lye allowed himself a "pat on the back" for the mining industry's engagement with local communities, which he said could provide a model for the shipping sector.

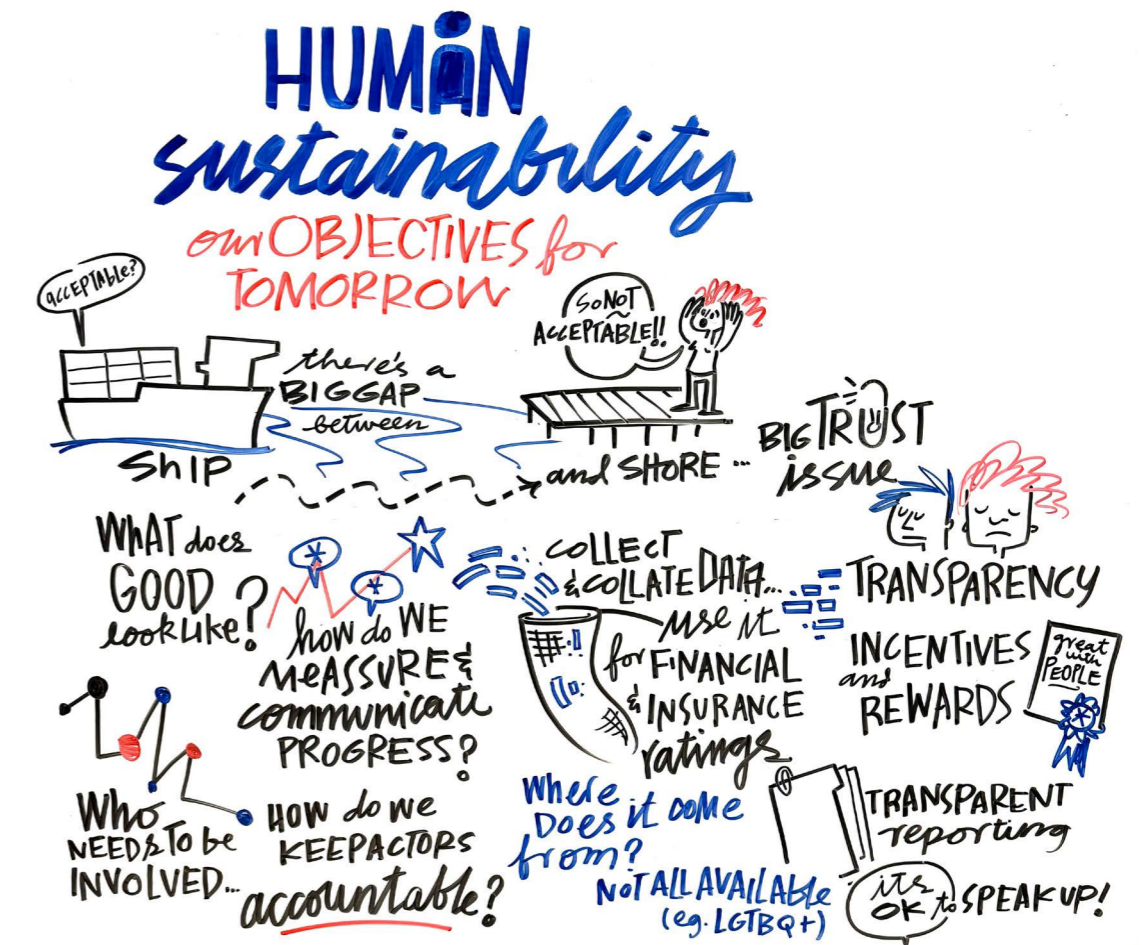


Improving seafarer standards was also a key focus. There was consensus within the group that the industry must collectively do better on seafarer safety, training, and living conditions. It was suggested that the development of a standardised 'seal of approval' could help bridge the gap between industry leaders and lagging companies.

It was suggested that all these goals will require a new way of thinking.

As one participant put it, "Transformational change starts with a shift in mindset from being defensive to becoming aspirational."

When it came to the shipping industry's environmental responsibilities, the group said that the sector needs to develop and communicate a clear position on its role in promoting ocean health and reducing air pollution.



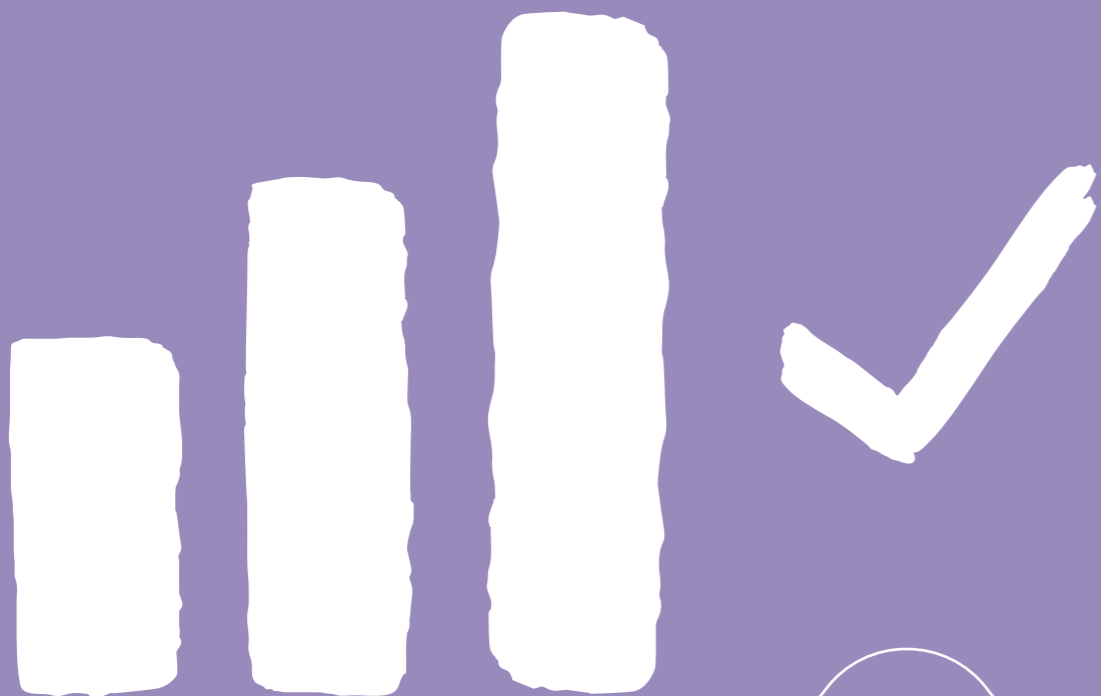




# Strengthening



maritime  
governance



## Shipping's new age of accountability

The Global Maritime Forum Annual Summit has traditionally focused on the dual challenges of decarbonising the shipping industry and improving the treatment of its workforce. Over the years, participants have brought new issues to the table and thus some of the topics discussed in 2024 extended beyond those two core areas.

Several of the expert presentations in Tokyo examined the industry's responsibility to address climate change, biodiversity loss, and pollution. Others explored technological advancements in autonomous ships and the need for collective solutions to long-existing challenges like ship recycling and flags of convenience.

While these presentations all had their own individual focus and expertise, a common thread running through them was the need for innovation, collaboration, and a holistic approach to addressing the multifaceted issues facing today's shipping industry.

### The next challenge for the green boardroom: Shipping and biodiversity

A session led by **Mary Wisz, Professor of Marine Science at the World Maritime University**, reminded participants that the sector's decarbonisation needs to be coupled with efforts to minimise biodiversity loss and pollution. With the path to net-zero emissions shaping up, albeit with many significant challenges still to address, industry leaders were encouraged to put just as much effort into conservation.

Wisz stressed that modern, efficient global trade also has downsides for ocean life. Collisions, underwater noises, leaks and spills of heavy fuel oils, and microplastic pollution are just some of the ways the shipping industry negatively impacts the marine environment.

Just as the industry has become increasingly focused on reducing its emissions in recent years, Wisz suggested that ocean health and biodiversity may be the next frontier for maritime decision-makers. She said investment decisions, including those on the new fuels essential for decarbonisation, should be weighed in part by considering their wider environmental impacts.

This isn't always easy, as solving one environmental challenge can create new ones. For example, scrubbers have been effective at decreasing ships' sulphur emissions but discharge wash water containing pollutants directly into the ocean at the expense of marine life.

Wisz advocated for a holistic approach to managing shipping's impacts on marine ecosystems, including leveraging existing frameworks like the UN Convention on Biological Diversity and the Global Plastics Treaty. She also recommended integrating biodiversity considerations into the ongoing work to establish green shipping corridors, improving the implementation of the IMO's underwater noise guidelines, and incorporating ecosystem-based criteria into financial and commercial decisions.

### Plotting a course for the future of ship recycling

One source of the microplastic pollution mentioned in Wisz's presentation comes from ship recycling, which was the focus of a session led by **Chintan Kalthia, Chief Executive Officer at R.L. Kalthia Ship Breaking**.

Here, Kalthia detailed some of the challenges and opportunities in ship recycling, particularly in light of evolving global and regional regulations. In particular focus was the Hong Kong International Convention for the Safe and Environmentally Sound Recycling of Ships. The convention, which enters into force in June 2026, aims to ensure that the disassembly and recycling of ships does not pose unnecessary risks to human health and safety or the environment. It addresses hazards like asbestos, heavy metals, and hydrocarbons, and mandates that ships maintain an inventory of hazardous materials.

The upcoming enforcement of the Hong Kong Convention, along with stricter regional regulations like the EU's Ship Recycling Regulation, will create a complex and potentially conflicting landscape, Kalthia said. Some 70-80% of shipbreaking and recycling takes place in Bangladesh, India, and Pakistan and while these nations are trying to get on the EU's so-called 'white list', they face significant challenges.

Under EU regulations, shipyards need to ensure certain sustainability standards have been followed throughout the full value chain, which is difficult to guarantee in the leading ship recycling nations.





There are also complications with transboundary waste management. On average, these ships have hundreds of kilograms of hazardous waste. Existing rules make it hard for European owners to send decommissioned ships to be recycled in South Asia, where they are of higher value to ship recyclers. When they do get ships to recycle, Asian ship recycling nations are left to deal with the environmental and social safety challenges from the management of this hazardous waste.

Kalthia warned that additional challenges might arise as the regulatory landscape around ship recycling gets further fragmented with additional upcoming Brazilian and Emirati conventions.

### Resilience and adaptation in a warming world

While Wisz and Kalthia used their presentations to look at shipping's environmental responsibility, **Ilya Marotta, Deputy Administrator and Chief Sustainability Officer** at the Panama Canal Authority, focused hers on how the maritime value chain can adapt to the realities of a world increasingly affected by climate change.

Marotta and her Panama Canal Authority colleagues have experienced the negative impacts of climate change firsthand in recent years. Droughts in the area have become increasingly frequent and intense, creating operational challenges for one of the most important arteries for global commerce. This reached a crisis point in 2023 when water levels in the canal got so low that restrictions were put in place on the ships using this vital passage between the Atlantic and Pacific Oceans. A bottleneck ensued that strained global supply chains and sent shipping costs soaring.

The Panama Canal relies entirely on rainfall that collects in two nearby artificial lakes. However, with their water levels shrinking under drought conditions, the authority is planning an additional water reservoir and implementing various measures to minimise the amount of water used for each ship's transit, including replacing its 'first-in, first-out' policy with a new reservation system.

In 2025, the Panama Canal Authority will also introduce a new system that favours the passage of more environmentally friendly vessels. Although Marotta said the details are still in the works, the system will eventually include four categories of 'green' ships based on their emissions reductions.

These changes aren't just for the benefit of global trade. Roughly half of Panama's 4.5 million residents use the two lakes for drinking water. Because the Panama Canal Authority does not own the land where the new reservoir will be built, Marotta said that community engagement is key to the project's success. The new reservoir project will take upwards of six years and \$1.6 billion to establish, so getting the community on board is vital. She said her organisation is working to clearly communicate the canal's importance to Panama's economy and explain how the new reservoir can improve the standard of living for nearby communities. The outreach also includes a focus on empowering younger generations to protect local watersheds.

### Flags of (in)convenience

Not all of the expert presentations at the Annual Summit 2024 that focused on the shipping industry's license to operate took an environmental angle.

**Mark Pieth, the founder of the Basel Institute on Governance**, focused his session on the maritime governance challenges presented by the widespread use of flags of convenience. Pieth, who recently co-wrote a book on the topic, said that the practice—in which shipowners register a vessel in a country other than their own—isn't inherently bad, but nearly everyone in the industry knows that it is largely used to take advantage of lenient regulations, lower taxes, and cheaper labour.



Pieth said that while tax avoidance is the issue most associated with flags of convenience, the practice also negatively impacts the environment, crew safety, and the rate of accidents. He argued that there are different levels of problems associated with flag states. While he said that some of the most common flag states have lax standards, there is a noted drop in oversight when it comes to the "end-of-life flags" offered by some countries. Things become even more opaque when some flags of convenience are not even issued by the countries in question but rather by private companies based outside those countries.

Pieth acknowledged at the outset of his presentation that the use of flags of convenience is a controversial topic and this was reflected by some pushback among those who attended. Some argued that the very name is outdated, as international courts tend to favour the terms 'open registries', in which ships from any country can register regardless of the shipowner's nationality, and 'closed registries', which restrict registration to ships owned by nationals or companies based in the country.

Others suggested that the focus should not be on flagging but rather on holding bad actors to account. Some agreed that port states should be given more control measures to deal with bad actors, but they cautioned that detaining too many vessels could cause port congestion.



## Progressing autonomous shipping

Another session that touched on the need for the shipping industry to rethink its traditional approaches came in the form of an update on a promising development in the Summit's host country.

**Tomoyuki Koyama, President of Japan Marine Science**, shared lessons from the MEGURI 2040 Fully Autonomous Ship Program, which in 2022 successfully trialed a container ship operating autonomously for 98.5% of its 790-kilometre journey between Tokyo Bay and Ise Bay.

Autonomous shipping has long interested the industry, as roughly three-fourths of today's maritime accidents are caused by human error and the use of optical sensors, radar, and artificial intelligence carries the promise of safer shipping. Autonomous shipping is particularly attractive in Japan, where the ageing population means that more than half of the nation's seafarers are over 50 years old, and measures to reduce manhours are likely to become increasingly important.

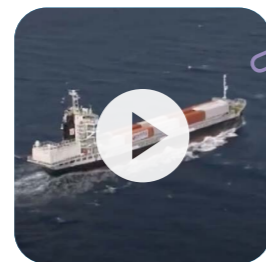
Koyama detailed the key components of the autonomous navigation system that was trialed by a consortium of 30-plus Japanese companies across the maritime value chain. Its key components include an onboard advanced routing simulation and planning system, an onboard action planning unit that controls the actions of the vessel, an onshore integrated control panel, and an onshore emergency response system.

While Koyama characterised the demonstration as a success, he said that it did identify the major challenge of slow internet connections on the open sea. This made the vessel's remote control and emergency response systems so vulnerable that the consortium behind the project has shelved the idea of fully autonomous open-sea operations for the time being. Instead, it will focus on partially autonomous shipping that can save the onboard crew both time and effort.

Nonetheless, Koyama said that fully autonomous shipping is already technically possible today. The biggest barrier is a lack of regulations. The consortium is in ongoing conversations with the Japanese government and classification societies, and the IMO is also expected to announce guidelines on autonomous shipping.

Some attendees of Koyama's presentation raised questions about how the autonomous system can communicate with other vessels. He said this isn't seen as a serious concern, given that most passage is done by simply following existing regulations on which vessel should give way, making communication between vessels rare.

Others were curious to hear more about the business case for autonomous shipping and how crew regulations might limit any labour savings. Koyama said that, for now, the commercialisation route being explored by consortium members is via the sale of component technologies both within and beyond the shipping sector.



See a short documentary on the successful trial journey of the MEGURI 2040 project.

## Expanding focus

These presentations demonstrated that technological advancements, regulatory complexities, climate change impacts, and ethical considerations demand the industry's collective attention.

Addressing challenges like the sector's environmental impact and taking advantage of opportunities like technological advancements require a collaborative, transparent, and action-oriented approach. One that balances the shipping industry's commercial interests with its responsibilities and engages externally with local communities and other sectors while also critically examining internal practices.





## Among a sea of risks, one stands out

Geopolitical instability, increasing barriers to trade, disruption from climate change, piracy, cyber-attacks, and other security threats. The Annual Summit covered many conversations on the myriad challenges outside of the shipping sector's direct control.

Yet, even against this somewhat dire backdrop, one risk was described by **Lindsey Keeble, Managing Partner at Watson Farley & Williams**, as "the number one issue that we're all discussing here today".

Keeble represented the working group 'The growth of the dark fleet', which examined the challenges posed by the expanding number of vessels that carry sanctioned goods, operate in the shadows, and threaten the legitimacy of maritime governance frameworks, sustainability, and transparency.

In her summary presentation to the closing plenary, Keeble said that although there is no universal definition of the dark fleet, the working group settled on describing it as "the fleet of vessels that operates in a parallel world with no regard to crew safety or the environment".

The group discussed how the dark fleet's operations threaten maritime security, increase the potential for ecological disasters, undermine the integrity of international shipping regulations, and threaten to set back the sector's decarbonisation progress.

**"If you have this parallel fleet, then all of the good work we're doing on sustainable finance and fuels is all irrelevant,"** Keeble said.



The concept of the dark or shadow fleet dates back at least two decades but has become a bigger issue in recent years. Since Russia invaded Ukraine in early 2022, there has been a surge in vessels engaged in dark fleet operations. Although the size of this fleet has proven highly variable—particularly in response to new regulatory measures, the Russian oil embargo, and the introduction of price controls—it has been estimated that the dark fleet encompasses as much as one-fifth of all global tankers.

These ships skirt established maritime regulations and oversight. Lacking quality protection and indemnity insurance, many are instead insured through insufficient alternative schemes. Furthermore, the true owners often remain hidden behind complex business arrangements, sometimes with no physical address.

Around 70 percent of dark fleet vessels are believed to be more than 15 years old, making them more likely to be in disrepair and more prone to accidents. In addition to the risks caused by their physical condition, these vessels also often engage in dangerous practices such as ship-to-ship transfers of sanctioned cargo and frequently turn off their automatic identification systems to avoid detection.

Dark fleet operators face little to no accountability for their environmental impact or treatment of workers.

Summit participants called on the IMO to audit flag states and suggested that ports should refuse to accept vessels sailing under the flags of states that receive poor audits. It was also suggested that the United Nations Convention on the Law of the Sea (UNCLOS), which was originally adopted in 1982, should be re-examined to ensure it "is still fit for purpose".

Industry leaders were urged to call for common standards, better articulate the risks of the dark fleet, and do more to encourage seafarers not to work on dark fleet vessels. This was seen as more effective than focusing on "the political agenda of whether sanctions are right or wrong".

But there was a certain sense of resignation that the dark fleet is here to stay. Rather than hoping to get rid of it altogether, participants were encouraged to do everything in their power to minimise it.

"I think we all know we can't stop the dark fleet, so what can we do about it? What we wanted to do was to really focus on crew welfare and safety, navigational safety, and the environmental and pollution risks," Keeble said.

### A common language around risk

With the dark fleet just one of many different potential threats to contend with, the 'Future risk resilience' working group focused on the need for common approaches to risk in the industry.

"If you think about the conversations we've had over the last two days, every one of us has said 'risk' at least once, but we all meant something different," group representative **Karrie Trauth, Senior Vice President for Shipping and Maritime at Shell**, told the closing plenary session. "How do we get to a common risk taxonomy, a common discussion, and a common framework of risks?"

While some risks can be owned and mitigated by individual companies, others are more systemic and may require coordinated action by industry and governments. The group suggested that the Global Maritime Forum could lead the development of a common framework for facilitating shared understanding and coordinated risk mitigation strategies. They also called for the establishment of general principles to guide prioritisation and potential actions.

The working group said that future risk resilience can be boiled down to two basic guiding principles: protecting safety at sea should trump all other risk considerations, and ensuring the continued functioning of global seaborne trade should take precedence over narrower commercial risks.





## A new model for global finance

“There is no future in which the shipping industry is not decarbonised. The only question is are you driving that pathway, or is somebody else driving it for you?”

**Climate finance expert Avinash Persaud** opened his keynote address by challenging the industry leaders in attendance to actively shape the sector’s path toward full decarbonisation rather than passively wait for governments to impose regulations. This, he stressed, was not only for the industry’s own benefit but also for the well-being of our planet.

“The planet has a carbon budget,” he said. “We’ve used up 85% of that budget already. When we use up the last 15%, we go past key trigger points that lead to very destabilising physical, biological, and chemical systems on the planet.”

The maritime industry, which is estimated to account for around 3% of all annual global emissions, will play a pivotal role in whether this threshold is crossed. Persaud said that the decarbonisation of shipping is inevitable, but the path that it takes is still unclear. It can be a path determined by regulations or one the industry navigates on its own terms.

Persaud is a special advisor on climate change to the president of the Inter-American Development Bank and an architect of the Bridgetown Initiative, which aims to reform global finance to better support developing countries. He said that the inspiration for rapidly decarbonising is out there for the taking and that “we are seeing transformations in front of our very eyes”. As evidence, he pointed to the fact that renewable solar and wind energy are now cheaper than fossil fuels and that the electric vehicle industry has witnessed a remarkable surge in adoption, going from 2% of car sales just five years ago to 20% today.

He said the shipping industry needs to embrace a similar proactive approach, and that the upcoming decisions made by the executives in the room would determine the winners and losers in the sector’s energy transition.



### ‘The biggest transformation of the global economy in our lifetimes’

Persaud then turned his attention to macroeconomic trends, stressing that shipping’s vital role in the world economy means that the industry must “be part of the global solutions and changes that are afoot”.

**“We are going to be witnessing the biggest transformation of the global economy in our lifetimes—the biggest change of finance and goods—and shipping may be the sector most impacted by these changes,”** he said.

Part of that transformation will depend on securing the financing required for global decarbonisation, which he said is estimated at \$10 trillion per year. Persaud argued that voluntary approaches are insufficient “magical illusions” and that stronger policy mechanisms are needed to achieve a true energy transition. He was particularly critical of the voluntary carbon credit market, which, after 20 years of discussion, is only a \$2 billion industry—a far cry from the \$10 trillion of annual decarbonisation financing needed.

“The voluntary carbon market doesn’t work because it’s voluntary, but the compliance carbon market does work,” Persaud said, adding that compliance carbon markets have an estimated value of some \$850 billion.

Persaud outlined the emerging framework for climate finance, which includes mitigation, adaptation, and loss and damage. He noted that 81% of mitigation efforts in rich countries are financed by the private sector, but the challenge is getting that capital to flow to developing countries.

He emphasised the role of multilateral development banks, such as the International Monetary Fund and others, in de-risking investments in developing countries to facilitate the flow of capital. Estimating that some 30% of needed climate finance focuses on adaptation and thus can only generate “powerful savings but no revenue,” Persaud encouraged multilateral banks to “step up to the plate” to better fund public goods like sea walls and flood drainage systems. He then looked at climate-related loss and damages, which he said will require new tax revenues.





### “No one likes paying taxes”

Though Persaud conceded that the shipping industry faces unique challenges because the technological solutions for alternative fuels and propulsion are not yet as mature as in other sectors, he argued that it should learn lessons from other industries, such as the use of taxation and subsidies to drive the renewable energy transition.

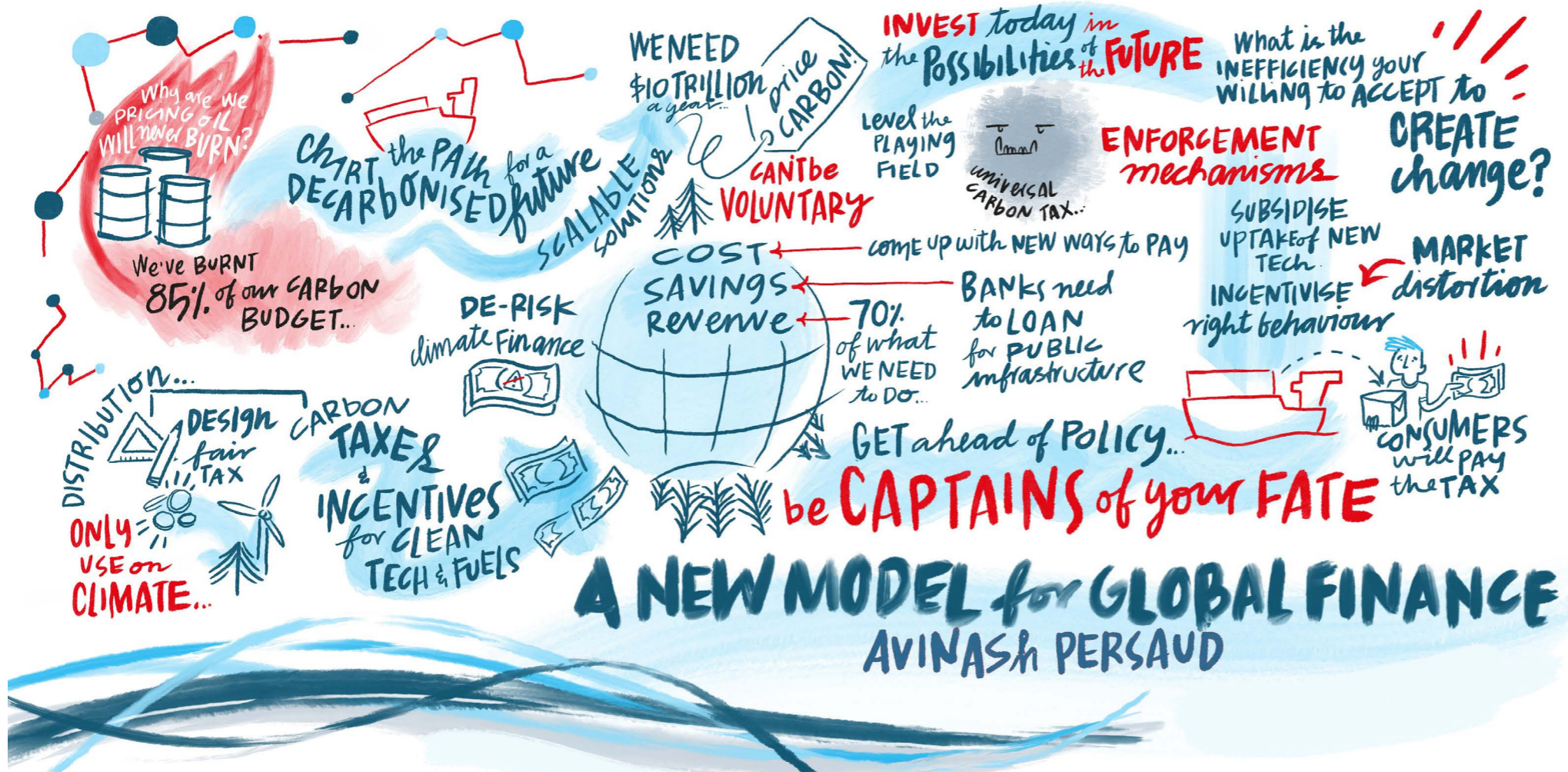
He advocated for expanding mechanisms such as the EU’s Carbon Border Adjustment Mechanism (CBAM), which accounts for the carbon content of imported goods. He predicted that similar mechanisms would be introduced in other countries, including the US, UK, and Japan, in the coming years.

He said that the design of a tax focused on carbon emissions and carbon content needs to create the right incentives for operational efficiencies and alternative solutions while providing opportunities for revenue creation. He asserted that taxation has been a critical driving factor in the renewable energy transition, but that those revenues have tended to go to the government rather than back into the industry to incentivise research and subsidy.

“So these carbon taxes are here. One of the challenges is that no one likes to pay taxes and everybody’s tax is unfair to somebody else,” he said. “The question, though, is not whether we tax or not, but how do we design taxes to make them fair?”

Persaud suggested that allocating tax revenue to support climate resilience in ports and developing countries and contributing to international loss and damage funds could promote fairness and create economic benefits.

“We don’t need to create something new; we can create fairness by relying on existing mechanisms. We can create fairness by designing measures that assure developing countries receive the revenues in a way that invests in decarbonisation and climate resilience and improves their GDP as a result,” he said. “The question, though, is are you going to be captains of your fate and develop these mechanisms yourself? Or are you going to be stewards of somebody else’s plan?”





## Taking on the challenge

In the final session of the Annual Summit, participants had one last chance to share their thoughts and reflections on the time they spent together in Tokyo.

Once again steering the conversation in his role as facilitator, **Global Maritime Forum Senior Advisor Randall Krantz** set the stage for the Summit's closing plenary.

"This is our opportunity to share the work that we've been doing and to share our thoughts and reflections on what we've just heard, not only from the working groups but over the course of our time together here," Krantz said. "Those of you gathered in this room are the ones who will need to carry out the changes we've discussed here."

With that, the floor was opened up for attendees to share some of their parting thoughts.

Shipping is such a critical enabler of economic transformation, especially for countries across the Global South. The shipping industry needs to include this in its message and work directly with local partners to unlock investments and create real opportunities.

**James Mnyupe, Economic Advisor to the Namibian President**

One key takeaway is that data should be a tool for progress, not commercialised for profit. And on seafarer well-being, despite all the initiatives, we're still missing the mark on the basics. We need to focus on getting those right.

**Eman Abdalla, Global Operations and Supply Chain Director, Cargill Ocean Transportation**

I think this Summit is the first one in which the need to decarbonise hasn't been the main issue. Partly because of what the IMO is doing, it is now the implementation that's important. I think we've now advanced to talking about systems—the system of trade, the system of shipping, the system of people. We're no longer a single-issue discussion group.

**Michael Parker, Chairman, Global Shipping, Logistics & Offshore, Citi**

As leaders, it's time to move beyond wishy-washy sustainability reports and commit to clear, auditable climate transition plans. We need to show exactly what we intend to do, be accountable for it, and ensure that sustainability is integrated into our business, not treated as an externality.

**Andrew Hoare, Global Head for Marine & Green Shipping, Fortescue**



“ The Global Maritime Forum is truly unique. It's unique with the participation, it's unique with the ambition level, and it's unique in its ability to take the transition narrative to the highest level. We all have a responsibility to continue pushing this narrative forward.

Bo Cerup-Simonsen, Chief Executive Officer,  
Maersk Mc-Kinney Møller Center for Zero  
Carbon Shipping



“ It's invigorating to see how the Global Maritime Forum has turned one of the world's biggest challenges into one of its biggest opportunities. While the boldest companies here have the power to drive change, it's also our responsibility to bring along the smaller ones that lack the resources.

Harris Antoniou, Founder & Managing  
Director, Neptune Maritime Leasing



“ One key goal for us here in Tokyo was to expand the community, and it was great to see that about a third of the attendees were new, with strong representation from Asia. This diversity of thought is crucial as we tackle the topics at hand.

Jan Dieleman, President of Cargill Ocean Transportation  
and Global Maritime Forum Chairman



“ Just a few years ago, the conversation about shipping decarbonisation was about why and what, and now it's really down to the brass tacks of how exactly we are going to do it. We're now in a completely different phase of how we are approaching this.

Johannah Christensen, Chief Executive  
Officer of the Global Maritime Forum





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# Currents of Change

Annual Summit 2024  
17 October





## Next stop: Antwerp!

As per tradition, the Annual Summit ended with the announcement of the location for our next gathering. Following the exploration of Asia's vibrant maritime landscape at the Tokyo Summit, we're heading back to Europe to further advance essential discussions shaping the future of global seaborne trade.

The Annual Summit 2025 will be held in Antwerp, Belgium on 21-22 October.

Antwerp's strategic position as Europe's second-largest port and a major hub for global shipping makes it an ideal setting to build on the progress in Tokyo.

"It's a privilege to host the Global Maritime Forum next year in the beating heart of maritime Europe. Antwerp can show the world that the shipping industry is making tangible and real progress in the energy transition and digitalisation," **Alexander Saverys, CEO of CMB.TECH**, said in Tokyo.

With the International Maritime Organization set to introduce a marine fuel standard and emissions pricing mechanism in 2025, the Summit will provide a unique opportunity to advance conversations on climate policy, zero-emission infrastructure, and the role of ports in the energy transition.

"With the IMO negotiations earlier in the year and the EU's leadership on climate action, the next Annual Summit will offer a timely platform to advance the industry's collective goals," said **Global Maritime Forum CEO Johannah Christensen**. "Tackling challenges such as seafarer well-being, geopolitical risks, and a changing trade landscape—while difficult—is critical for building a sustainable future for the maritime sector. We remain committed to prioritising these essential conversations and working toward common solutions."

The Global Maritime Forum looks forward to working with the local Belgian maritime community and hosting leading voices from around the world in beautiful Antwerp.



Why Antwerp? See our short video announcement.





## List of participants

**Akihito Hamada**, General Manager, Ship Building Division, Mitsui & Co

**Alexander Enström**, Executive Vice President, Marine, Hempel

**Alexander Saverys**, Chief Executive Officer, CMB.TECH

**Alex Hadjipateras**, Chief Operating Officer, Dorian LPG

**Allen Chan Eng Ann**, Third Engineer; Young Professional representative, MISC

**Andrea Olivi**, Global Head of Wet Freight, Trafigura

**Andreas Enger**, Chief Executive Officer, Höegh Autoliners

**Andreas Povlsen**, Managing Director, Head of Maritime, Hayfin - Greenheart Management Company

**Andrew Hoare**, Global Head for Marine & Green Shipping, Fortescue

**Angad Banga**, Chief Operating Officer, Caravel Group

**Arsenio A. Dominguez**, Secretary-General, International Maritime Organization

**Avinash Persaud**, Special Advisor to the President, Inter-American Development Bank

**Barbara Pickering**, President, Chevron Shipping, Chevron

**Basile Aloy**, Chief Executive Officer, EBE

**Ben Abraham**, Chief Executive Officer, Global Marine, Willis Towers Watson

**Beng Tee Tan**, Executive Director, Singapore Maritime Foundation

**Ben Palmer**, President, Marine, Inmarsat

**Bin Xu**, Chairman, Bank of Communications Financial Leasing

**Bjarne Foldager**, Senior Vice President, MAN Energy Solutions

**Bjorn Jebsen**, Chairman, Jebsen PTC

**Bjørn Højgaard**, Chief Executive Officer, Anglo-Eastern

**Björn Sprotte**, Chief People and Sustainability Officer, Bernhard Schulte Group

**Bo Cerup-Simonsen**, Chief Executive Officer, Mærsk McKinney Møller Center for Zero Carbon Shipping

**Bud Darr**, Executive Vice President, MSC

Mediterranean Shipping Company

**Cem Ugur**, Director Group Shipping, Tata Steel

**Chikako Matsumoto**, Managing Executive Officer, Sumitomo Mitsui Trust Bank

**Chintan Kalthia**, Chief Executive Officer, R.L. Kalthia Ship Breaking

**Christine Loh**, Chief Development Strategist, Institute for the Environment, Hong Kong University of Science and Technology

**Claire Wright**, Head of Hanwha Ocean Europe, Hanwha Ocean

**Claus V. Hemmingsen**, Chairman, DFDS

**Darren Leskoski**, Regional Vice President, North Pacific, American Bureau of Shipping

**David Libatique**, Deputy Executive Director, Stakeholder Engagement, Port of Los Angeles

**David Loosley**, Secretary General and Chief Executive Officer, BIMCO

**Denny Mohd Isa**, Chief Executive Officer, MISC Maritime Services

**DK Kim**, Vice Chairman, Hanwha Ocean

**Eddy Ng**, Group Head of Operations and Sustainability, PSA International

**Eman Abdalla**, Global Operations and Supply Chain Director, Cargill Ocean Transportation

**Erik Hånell**, President and Chief Executive Officer, Stena Bulk

**Erik Nyheim**, President and Chief Executive Officer, Höegh Evi

**Ernst A. Meyer**, President and Chief Executive Officer, Torvald Klaveness

**Feng Zhu**, Director and Vice President, China Harbor Investment

**Flemming R. Jacobs**, Non-executive Director Emeritus, Global Maritime Forum

**Gautam Khurana**, Chief Financial Officer, Precious Shipping

**Goro Kitamura**, General Manager, Corporate Sustainability, Environment Management, IR and Communication Group, Kawasaki Kisen Kaisha ("K" Line)

**Haris Zografakis**, Partner, Stephenson Harwood

**Harris Antoniou**, Founder & Managing Director, Neptune Maritime Leasing

**Harry T. Conway**, Chair, Marine Environment Protection Committee

**Hing Chao**, Executive Chairman, Wah Kwong Maritime Transport

**Hiromichi Mizuno**, Special Advisor to the Chief Executive Officer, MSCI

**Hiroyuki Ishijima**, Head of Marine Hull & Energy General Manager, Marine Underwriting Dept., Tokio Marine

**Hor Weng Yew**, Chief Executive Officer; Chairman, Singapore Maritime Foundation, Pacific Carriers Limited

**Ian Beveridge**, Chief Executive Officer, Bernhard Schulte Group

**Ilya Marotta**, Deputy Administrator and Chief Sustainability Officer, Panama Canal Authority

**Ingrid Irigoyen**, Associate Director, Ocean and Climate, Energy and Environment Program, The Aspen Institute

**Ioannis Zafirakis**, Director, Chief Financial Officer, Chief Strategy Officer, Treasurer and Secretary, Diana Shipping Inc.

**Isabelle Rickmers**, Founder and Chief Executive Officer, Turtle

**James Mnyupe**, Presidential Economic Advisor, Government of The Republic of Namibia, Namibian Ministry of Trade and Industry

**Jan Dieleman**, President, Cargill Ocean Transportation

**Jan Nørgaard Lauridsen**, Partner, Heidrick & Struggles

**Jason Anderson**, Senior Program Director, ClimateWorks Foundation

**Jeremy Sutton**, Chief Executive Officer, Swire Shipping

**Jesper Lok**, Chair, Inchcape Shipping Services

**Jian Feng Zhou**, Managing Director, Wah Kwong Maritime Transport

**Jian Rong Chen**, Vice Chairman, COSCO Shipping Energy Transportation

**Jim Lawrence**, Chairman, Marine Money

**Johan Casper Hennings**, Shipping Lawyer and Partner, Gorrissen Federspiel

**Johannah Christensen**, Chief Executive Officer, Global Maritime Forum

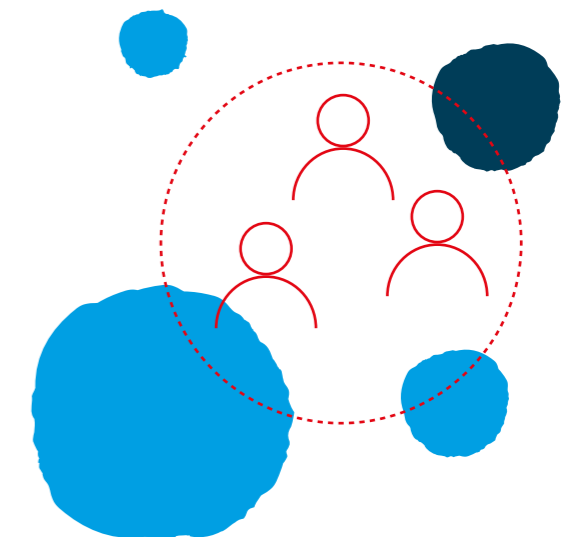
**John Hadjipateras**, Chairman, Dorian LPG

**John Rowley**, Chief Executive Officer, Wallem

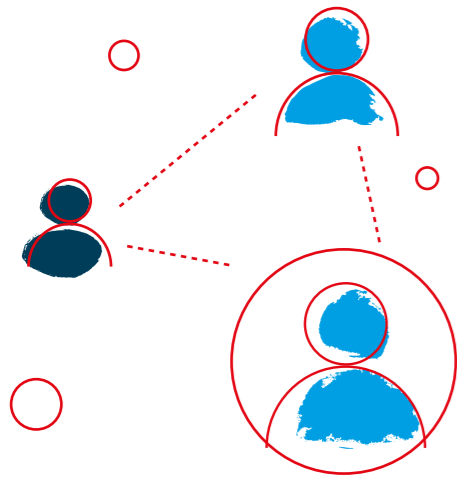
**Joseph Gowen**, Senior Vice President, Marine, World Kinect Corporation

**Joshua Hutchinson**, Vice Chairman, Sailors' Society

**Julian Bray**, Editor In Chief, TradeWinds







**Julian Proctor**, Chief Executive Officer, Purus  
**Kai Miller**, Global Director of Sustainability and Fuels Strategies, Kühne + Nagel  
**Karrie Trauth**, Senior Vice President Shipping and Maritime, Shell  
**Kathryn Upson**, Vice President Partnerships and Strategic Implementation, BP  
**Kazuhiko Kanazashi**, Managing Executive Officer, Corporate Finance Department, Division 4, Development Bank of Japan  
**Kazuki Yamaguchi**, Head of Maritime Energy Solution, Strategic Business Unit, Sumitomo Corporation  
**Keld R. Demant**, Group Chief Executive Officer, Bunker Holding

**Ken Hasegawa**, Head of Maritime Innovation Lab, Ship & Infrastructure Business Dept., Mitsubishi Corporation  
**Kenji Yanagawa**, General Manager Transportation Department, Sumitomo Mitsui Banking Corporation  
**Kenneth Lam**, Chairman and Chief Executive Officer, Sea Kapital  
**Kit Kernon**, Global Head of Shipping, Vitol  
**Kohei Iwaki**, Alternate Permanent Representative of Japan to IMO, Ministry of Foreign Affairs of Japan  
**Koichi Onaka**, Head of Transport, Tokyo Century Lease  
**Koichiro Ninomiya**, General Manager, Environment and Sustainability Strategy Division, Mitsui O.S.K. Lines

**Konstantinos Chang**, Commercial Director, Singapore, Tsakos Group  
**Kristian Mørch**, Chief Executive Officer, J. Lauritzen  
**Kwangpil Chang**, Group Chief Technical Officer; Senior Executive Vice President, HD KSOE, HD Hyundai  
**Lambros Klaoudatos**, Senior Vice President, Shipping, BP  
**Lara Naqushbandi**, Chief Executive Officer, ETFuels  
**Lars Lislegard-Bækken**, Chief Operating Officer, Gard  
**Laure Baratgin**, Head of Commercial Operations, Rio Tinto  
**Laurent Cadji**, Managing Director, Union Maritime  
**Lindsey Keeble**, Managing Partner, Watson Farley & Williams  
**Linna Fan**, Head of Shipping Finance, Bank of Communications Financial Leasing  
**Lois Zabrocky**, President and Chief Executive Officer, International Seaways  
**Lola Fadina**, Director of Maritime, Department for Transport  
**Lonnie Kishiyama**, Director, Office of International Activities, Maritime Administration, US Department of Transportation  
**Lora Jakobsen**, Chief Sustainability Officer, ZeroNorth  
**Lynn Loo**, Chief Executive Officer, Global Centre for Maritime Decarbonisation

**Makoto Oba**, Business Director, Japan, American Bureau of Shipping  
**Marcio Valentim Moura**, Global Logistics Director, Bunge  
**Mark Brownstein**, Senior Vice President, Energy, Environmental Defense Fund  
**Mark Jackson**, Chief Executive Officer, The Baltic Exchange  
**Mark Pieth**, Founder and former President, Basel Institute of Governance  
**Mark Tamsitt**, Senior Vice President, World Kinect Corporation  
**Markus Lindbom**, Chief Executive Officer and Head of Shipping, Stena AB  
**Mary Wisz**, Professor, Marine Science, World Maritime University  
**Masataka Yatomi**, General Manager, Technology Planning Department, IHI Corporation  
**Mathavan Subbiah**, Chief Executive Officer, Marine Services & Corporate Functions, Synergy Marine Group  
**Matthew McAfee**, President, Fairmont Shipping  
**Matthieu de Tugny**, President, Bureau Veritas  
**Matt Turns**, General Manager, Strategy & Business Performance, Chevron  
**Maxime van Eecke**, Chief Commercial Officer, CMB. TECH  
**Meei Wong**, Executive Director, SOL-X

**Michael Jørgensen**, Managing Director, Dry Bulk, Torvald Klaveness  
**Michael Lignos**, Senior Vice President, Shipping Operations Compliance, Navios Maritime Partners  
**Michael Parker**, Chairman, Citi  
**Michael Søsted**, Managing Director, Head of Finance and Operations, Global Maritime Forum  
**Mikael Skov**, Chief Executive Officer, Hafnia  
**Mikal Bøe**, Chief Executive Officer, Core Power  
**Milena Pappas**, Commercial Director, Star Bulk Carriers  
**Motohiko Nishimura**, Senior Managing Executive Officer, President, Energy Solution & Marine Engineering Company, Kawasaki Heavy Industries  
**Naoki Arima**, Ship & Infrastructure General Manager, Mitsubishi Corporation  
**Nicholas Brown**, Corporate Affairs Director, Marine and Offshore, Bureau Veritas  
**Nick Brown**, Chief Executive Officer, Lloyd's Register  
**Nicos Rescos**, Chief Operating Officer, Star Bulk Carriers  
**Nigel Carden**, Chairman of Thomas Miller P&I, UK P&I Club  
**Nikolaus H. Schües**, Chief Executive Officer; President and Chair, BIMCO, F. Laeisz  
**Nils Aden**, Managing Director, Harren Group  
**Panos N. Tsakos**, Principal, Tsakos Group

**Paolo Enoizi**, Chief Executive Officer, GasLog  
**Patrizia Kern-Ferretti**, Strategy Consultant, Chief Insurance Officer, Breeze, Swiss Re Corporate Solutions  
**Paul Pathy**, President and Chief Executive Officer, Fednav  
**Paul Taylor**, Global Head of Maritime Industries, Société Générale  
**Paul van Gurp**, Head of Division, Shipping Policy, Dutch Ministry of Infrastructure and Water Management  
**Peter Appel**, Partner, Gorrissen Federspiel  
**Peter Lye**, Director and Head of Shipping, Anglo American  
**Peter Stokes**, Advisory Board member, Ultramax  
**Philip Christiani**, Partner, Copenhagen Infrastructure Partners  
**Philippa Charlton**, Chief Marketing Officer, Lloyd's Register  
**Qinyan Sun**, New Construction Portfolio Team Specialist; Young Professional representative, Lloyd's Register  
**Radhika Menon**, Captain, Synergy Marine Group  
**Rajesh Unni**, Executive Chairman, Synergy Marine Group  
**Randy Chen**, Vice Chairman, Wan Hai Lines  
**Rene Kofod-Olsen**, Chief Executive Officer, V.Group  
**Richard Meade**, Managing Editor, Lloyd's List  
**Robert Desai**, Group Chief Commercial Officer, V.Group

**Roger Holm**, President, Wärtsilä Marine and Executive Vice President, Wärtsilä

**Roland-Torsten Land**, Director Maritime Industries, KfW IPEX-Bank

**Ron Wood**, Global Director Asset Management, AET Tankers

**Rosie Pipilis**, Managing Director, Plutofylax Shipping

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**Sanna Sonninen**, Maritime Director, Transport and Communications Agency, Government of Finland

**Saskia Mureau**, Director Customer Digital, Port of Rotterdam

**Satoru Otatsume**, General Manager of Next-Generation Fuels Solution Dept., ENEOS

**Saurabh Dasgupta**, Chief Commercial Officer, RightShip

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**Shivanesh Soma Sundram**, Head of Shipping Strategy, Sustainability and Business Development, Anglo American

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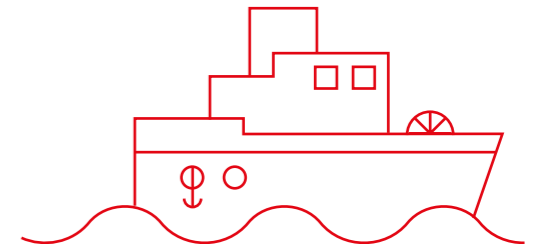
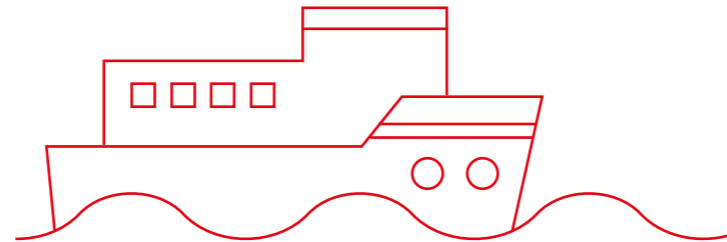




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