



GLOBAL
MARITIME
FORUM

Braving rough seas



Global Maritime Forum
Annual Summit

New York | 22-23 September 2022





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Foreword



Welcome to the summary report of the Global Maritime Forum's Annual Summit 2022 in New York. Spanning two days of collaborative discussions, the Annual Summit gathered more than 200 senior leaders from the maritime sector and beyond to embrace long-term thinking and explore industry-wide challenges and opportunities, seeking to identify solutions to the complex challenges no organization can tackle alone.

The event took place at Brooklyn Navy Yard, known as the "can-do shipyard" for building and repairing 5,000 ships during World War II. The parallels with the rough seas facing the maritime industry today seem clear.

The war in Ukraine and its effects on global food and energy prices, as well as the complex issues of shipping's energy transition, shifting trade patterns and the resilience of supply chains, create uncertainty about what the future holds. Overcoming these challenges will require new types of collaboration and an unprecedented mobilization of resources.

We remain optimistic. During the Annual Summit, we were blown away by participants' willingness to engage in collective long-term thinking and adopt a "can-do" mindset. This approach is crucial to safeguarding the benefits of global seaborne trade in the wake of a changing geopolitical landscape, turning ambition on shipping decarbonization into action and making human sustainability a priority, both at sea and onshore.

It is our hope that Global Maritime Forum's Annual Summit inspires global maritime leaders to make the brave decisions needed to create the maritime industry we want and need. We invite all who attended the Annual Summit in New York and those who read through the following pages to stubbornly stick to that "can-do" mindset while navigating the rough seas ahead.

Jan Dieleman
Chair
Global Maritime Forum

Johannah Christensen
Chief Executive Officer
Global Maritime Forum

Executive summary

The Global Maritime Forum's Annual Summit 2022 in New York took place at a time when the world and, as a consequence, the maritime industry are facing rough seas: the most significant war in Europe since World War II; a global food, energy and cost-of-living crisis; the growing impact of climate change; and a potential global economic crisis.

The more than 200 decision-makers gathered at the Annual Summit rolled up their sleeves. They embraced a “can-do” attitude, worked collaboratively to better understand the changes happening in the world and devised concrete ways in which the maritime industry can brave the rough seas ahead to benefit global society.

From ambition to action in decarbonization

Unsurprisingly, shipping **decarbonization** was at the top of the participants' agenda. Earlier years' focus on the level of ambition was replaced by a **focus on action** and, for some, a growing frustration with the pace of progress, given the urgency of the challenge.

A chief concern was the energy industry's ability to ramp up **production of zero-emission fuels** at a pace commensurate with what the maritime industry will need to achieve decarbonization in alignment with objectives set by the Paris Agreement. This calls for strengthened engagement with the energy sector and governments to put in place the necessary infrastructure and incentives to accelerate production and move towards price parity for zero-emission fuels.

There were also **grounds for optimism** as more parts of the value chain – including the financial sector, energy producers and customers – are now actively engaging in collaborations to get the transition going and accelerate the pace of change.

The discussions showed much alignment around the potential to use **Green Corridors** to introduce zero-emission vessels and fuels in commercial operations. It was also clear that **more work needs to be done**, for instance, in developing new business and ownership models, creating shared roadmaps to build confidence for suppliers and investors, and finding ways of using green premiums and government support to mitigate the increased costs and risks.

The **critical role of policy** was also highlighted, as new policy frameworks are needed to make zero-emission shipping commercially viable at scale. There is currently a crucial window of opportunity to influence the IMO negotiations. To reach a zero-in-2050 target, participants suggested a **basket of policy measures**, including a carbon tax, a ban on new fossil-fueled vessels by 2035 and a fuel standard. However, the **equity** concerns of developing countries must be addressed to get an agreement at the International Maritime Organization (IMO).

While the decarbonization of shipping will require the introduction of new fuels and technologies, there is a **considerable emissions reduction potential in the short term** – estimated at up to 200 million tons of CO₂ annually – by improving operational efficiency. However, this will not be simple to achieve. It will require new contracts and business models that **transform split incentives into shared incentives**, increased data collection and data transparency, and strong leadership to overcome internal frictions and barriers.

Attracting and retaining talent in maritime

Human sustainability was also high on the agenda at the Annual Summit. It was seen as essential for the maritime industry to attract and retain the diverse workforce it needs to successfully deal with current and future challenges.

The starting point for discussions was a realization that global competition for talent is increasing and **the maritime industry needs to change**. Actions identified include investing more in education and providing good working conditions – not least for seafarers – while also becoming better at articulating the industry's value proposition. Improving diversity while creating more inclusive workplace cultures was also seen as necessary.



It was also clear that listening to and **engaging with young maritime professionals** is key to bridging the generational gap and finding new ways to meet the expectations of the workforce of the future in terms of purpose, flexibility, career options and decent work conditions.

Preserving global benefits of seaborne trade in the face of uncertainty

The ongoing geopolitical turmoil and COVID-19-induced disruptions of global supply chains also led participants to discuss the **future of global trade** and question whether the existing model of globalization could survive, despite the obvious economic and societal benefits.

Participants saw an opportunity to actively articulate the **benefits of global seaborne trade** to governments and other stakeholders. This could help shipping continue to fulfill its role as a critical driver of economic development and provider of food and energy access, for instance, by treating access to the shipping of essential goods, such as grain, fertilizer and the like, as **a global public good** and generally excluding essential goods from sanctions.

Key principles for transforming the maritime industry

While participants worked in smaller groups to address specific challenges, their discussions also revealed several cross-cutting themes.

One such theme was the need to revisit existing business models to ensure that company-level incentives are better aligned with societal needs. **Creating shared incentives** instead of split incentives was seen as critical for driving positive change, whether in terms of improving operational efficiency, building more resilient supply chains or catalyzing investment in Green Corridors.

Another recurring theme was the need to **increase engagement with outside stakeholders**, as many of the significant challenges facing the maritime industry are bigger than shipping. This is true for decarbonization but also true when striving to preserve the societal benefits of international seaborne trade in a time of geopolitical upheaval or when attracting a new generation of talent.

The **importance of equity** was also prominent in many discussions, although the concrete meaning of it was sometimes harder to agree on. Equity was seen as important in the design of global decarbonization policy, both as an objective in its own right but also to build the necessary political support. Equity and fairness were also seen as fundamental in creating a maritime industry that is attractive to the diverse workforce of the future, as the next generation of talent is likely to gravitate towards those that address these issues adequately.

But one of the most important cross-cutting themes was the **collective courage** and willingness of participants to embrace change and take action to shape the future of the maritime industry. This inspires a sense of optimism that we can collectively brave the rough seas ahead. The Global Maritime Forum's Annual Summit 2023 in Athens on October 18-19 will offer an opportunity to come together once more to share the concrete results of this collective can-do attitude and determine the next steps on our shared journey.

Our shared journey

Day 1



Braving rough seas

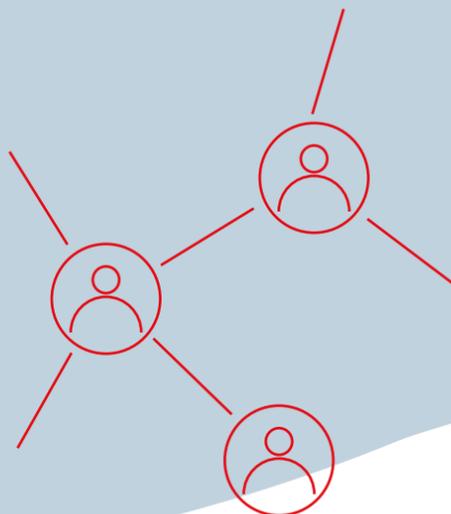
The Annual Summit was opened by Jan Dieleman, Chair of the Global Maritime Forum, who outlined the key issues and choices ahead for the world and the global maritime industry. His welcome remarks were followed by a keynote address by Rebeca Grynspan, Secretary-General of the United Nations Conference on Trade and Development (UNCTAD), who stressed the importance of global seaborne trade to the world. To set the scene for ambitious action, the opening plenary was closed by a high-level panel on raising ambition on shipping decarbonization.



Scanning the horizon

Following the opening plenary, participants broke up into smaller working groups, which they returned to throughout the day to share knowledge and ideas. Their first assignment was to gain insights from experts and thought leaders on significant shifts and change drivers that will directly or indirectly impact the global maritime industry.

After sharing insights with their group members, participants were again invited to deepen their knowledge. Across five learning sessions, they listened, debated and reflected on what is needed to prepare for the emerging future.



Closing of day 1

In a collective debrief, participants shared what they had learned throughout the day, synthesized their learnings into principles to guide collaborative action, and prepared to tackle the challenges and opportunities identified on day two of the Annual Summit.

Day 2



Ignite talk

Day two of the Annual Summit was opened by Jane Nelson, Founding Director of the Corporate Responsibility Initiative at Harvard Kennedy School. Jane invited participants to consider the questions at hand through the lens of collaboration and systems thinking.



Action areas

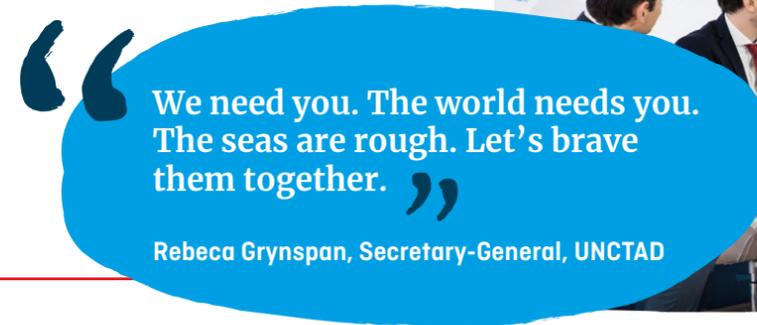
In working groups of their choice, participants rolled up their sleeves to develop actionable ideas for addressing key challenges and opportunities in the maritime industry. Building on discussions from day one, the working groups focused on Green Corridors, shipping emissions regulation, short-term action to reduce emissions, the need for human sustainability and trade and supply chains.



Building momentum

In a final plenary, participants shared the outcomes of their group work. They also discussed the role of individual and collective industry leadership in shaping the future of global seaborne trade to ensure sustainable economic development and human wellbeing.

Responding to global crises, raising climate ambition



“ We need you. The world needs you. The seas are rough. Let’s brave them together. ”

Rebeca Grynspan, Secretary-General, UNCTAD



The first day of the Annual Summit commenced with an address by Rebeca Grynspan, UNCTAD’s Secretary-General. Rebeca thanked the participants, who spanned the maritime trade supply chain, for doing their utmost to brave the rough seas resulting from the war in Ukraine. She cautioned that bravery is needed more than ever to face a vicious cycle of reinforcing crises: COVID-19 and its consequences, climate change, war and the resulting cost-of-living crisis, which could turn into a food crisis.

She highlighted that these cascading crises mean three things:

- First, the issues are systemic, and only systemic action can solve them.
- Second, they lead to cascading inequalities and consequently fragility. Conversely, resilience is increased when inequality gaps are bridged.
- Finally, they lead to cascading instability.

She urged the maritime industry to prepare today for the crises of the future, especially as the role of maritime trade in prosperity is enormous and will only become more important in the future. Navigating the current crises will be rough, costly and messy, she noted, but will also present new opportunities: longer shipping routes, new supply chains, new ports, more ships, terminals and bunkering stations, and the job and growth opportunities they bring with them.

She finished her address with a plea to the maritime industry to continue supporting the movement of grain and fertilizers out of Ukraine and Russia, as both are crucial to ensuring the world has access to enough food next year.

The UNCTAD Secretary-General’s address was followed by a panel discussion on raising the ambition on maritime decarbonization.

Andreas Rangel Ahrens, Head of Climate, Inter IKEA Group stressed that companies like IKEA must address each and every part of their value chain, including their shipping activities, to achieve the level of decarbonization deemed necessary by science. IKEA is a founding member of Cargo Owners for Zero Emission Vessels (coZEV), whose target is to only use net zero fuels by 2040 in its members’ supply chains. Andreas pointed out that in a year since its establishment, coZEV has doubled its membership; growing these kinds of partnerships, he added, is crucial. He stressed that coZEV’s target is not ambitious but simply what science says is needed. The question is not what to do but how to do it: how to establish policy and regulation, how to agree on the best source of fuels, how to produce those fuels, which Green Corridors to prioritize and much more.

Jeremy Nixon, CEO, Ocean Network Express highlighted two key components for shipping to reach the next stage in its emission-reduction journey. First, a transparent, predictable, understandable and universal market-based measure to level out costs between traditional and new green fuels. To make such a market-based measure a reality, he urged industry leaders to push for real progress in the upcoming meetings of the IMO’s Marine Environment Protection Committee. Second, he encouraged maritime stakeholders to seize the window of opportunity to work together with energy companies in developing green fuel supplies or run the risk of being left behind in the race to secure sufficient green fuels.

Jane Lubchenco, Deputy Director for Climate and Environment, White House Office of Science and Technology Policy added that international shipping continues to be a key sector in enabling the world to keep 1.5°C within reach. However, shipping is not currently on a trajectory to meet this target. She noted the U.S. government is working to make sure green shipping is a highlight of COP27, with opportunities for progress both inside and outside the scope of formal negotiations. She added that policymakers need industry leaders to come forward and bring others with them. Finally, she stressed that the world does not have the luxury to fail in the fight against climate change, or the luxury of time.

Svein Tore Holsether, President and CEO, Yara International pointed out that climate change is happening right now – impacting yields, food cost and food security – and all have a responsibility to act. Much of the infrastructure needed to decarbonize (e.g., ships to transport ammonia and terminals) is already in place for the fertilizer industry and can be used to support the shipping industry to scale up faster. However, the industry also needs to create partnerships across the whole value chain and move in parallel with regulation to create the certainty that will catalyze the billions of dollars of investment needed to decarbonize shipping.

“ I wouldn’t say [we have] ‘high’ ambition; it’s what is needed. We know what is needed, so let’s work together on it. ”

Andreas Rangel Ahrens, Head of Climate, Inter IKEA Group

“ The urgency is understood, the ‘why’ is there, so we need to make this happen immediately. ”

Svein Tore Holsether, President and CEO, Yara International



Scanning the horizon

Expert presentations

Challenges and opportunities in reaching net zero

David Doherty, Global Head of Oil Research, BloombergNEF

Bryan Fisher, Managing Director, Climate-Aligned Industries, Rocky Mountain Institute

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

Vineet Mittal, Chairman, Avaada Group

The global energy transition to reach net zero emissions by 2050 will require substantial investments and unprecedented levels of collaboration between industries. The maritime sector stands to gain from working closely with other “hard-to-abate” sectors, like aviation and steel, and utilizing the transition playbook that proved successful for solar and wind power. Demand aggregation across sectors and players is key to creating a market for scalable zero-emission fuels by providing the economic conditions to unlock production and transport capacity investments. Cargo owners, for example, are coming together through the Cargo Owners for Zero Emission Vessels (coZEV) platform to create a niche premium market for zero-emission shipping and incentivize ship owners to secure the necessary fuel deals.

To accelerate the transition, the maritime industry would benefit from a “carrot and stick” approach that includes both carbon pricing and incentives such as subsidies towards cost parity between zero-emission fuels and fossil fuels.

Reaching net zero by 2050

David Doherty discussed the level of investment required to fully decarbonize the global economy by 2050 as well as the dilemmas and opportunities faced by the maritime industry.

ENERGY TRANSITION REQUIRES 10X INVESTMENT BY 2040

David pointed out that the transition to net zero is a political, economic, social and environmental given, requiring substantial investment. BloombergNEF estimates that low- and zero-carbon investments will reach US\$815 billion in 2022, while fossil fuel investments will amount to US\$905 billion – a ratio of just below 1:1. However, to achieve net zero by 2050, investment in renewables must reach 4:1 in the 2020s and 10:1 in the 2040s.

REVISING ASSUMPTIONS MIGHT HELP UNLOCK INVESTMENT

Scenarios, such as those provided by the IEA and IPCC, play a crucial role in deciding on investments in the energy transition. However, such scenarios might need revisiting. Will the assumptions about energy efficiency gains – delivered, for example, by digital solutions – hold? What impact will the current energy crisis have, as Europeans are reinvesting in coal and fossil fuels?

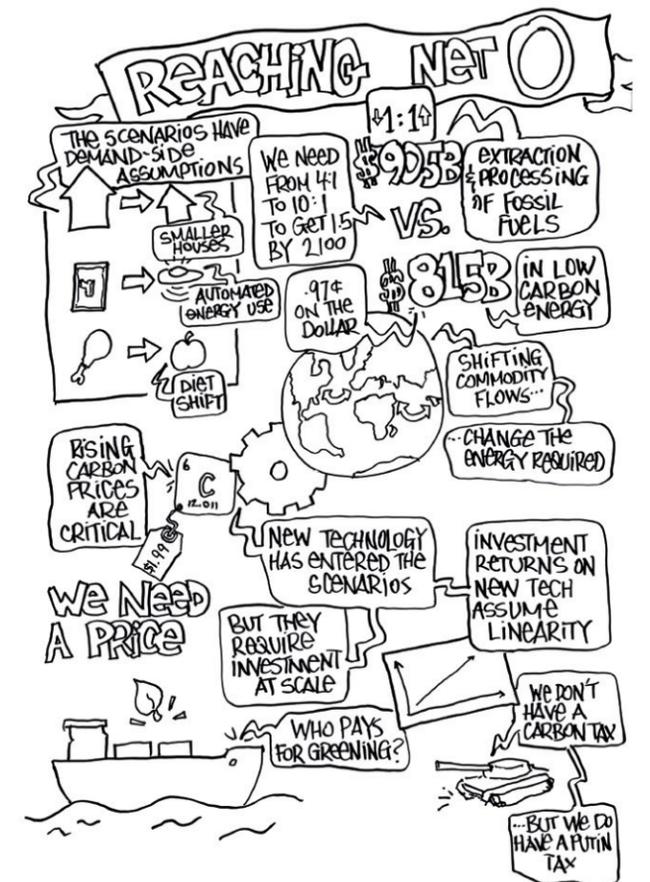
Participants highlighted that investors in the maritime sector want a better understanding of the transition drivers, effective emissions policy and pricing, and clear market signals from banks and customers. One of the questions posed was whether cargo owners are ready to make the long-term contracts needed to lower the costs of zero-emission shipping by 2040, to which some of the larger cargo owners have pledged.



David pointed out that, while more certainty about future conditions would naturally be welcomed, immediate action remains critical, be it in improving fuel efficiency, cold ironing or addressing air pollution.

CHANGING COMMODITY FLOWS WILL IMPACT THE MARITIME INDUSTRY

The energy transition is also likely to lead to changes in the flows of fuel commodities. China’s oil and coal consumption is projected to peak in 2026-27, while changing national demand patterns will divert fossil fuel flows from the Middle East towards closer markets in Africa and Southeast Asia. With the demand for critical materials to build the renewable energy infrastructure expected to grow rapidly, the projected movement of such commodities will also need reassessing.





WORKING ACROSS SECTORS TO LOWER TRANSITION COSTS

Bryan pointed out that industry coordination and demand aggregation in multisector ecosystems could lead to the initial development of 25 to 35 hydrogen hubs worldwide, with shipping ammonia and steel being the lower-cost use cases. Transparent data and shared infrastructure across sectors would be key to pursuing these collaboration opportunities. This could entail clear tracking and verification rules and stratified but comparable standards across fuels and industries.

For the maritime industry, exploring potential synergies with other sectors to lower costs is crucial, particularly in anticipation of competition for resources as each sector ramps up its decarbonization efforts.

How customers are driving climate action: The case of coZEV

Ingrid Irigoyen explored the role of cargo owners in creating demand for scalable zero-emission fuels and, consequently, for shipping decarbonization.

DEMAND AGGREGATION TO CREATE A MARKET AND UNLOCK INVESTMENT

Ingrid introduced Cargo Owners for Zero Emission Vessels (coZEV), a cargo-owner-led platform for collaboration that enables maritime freight customers to come together and use their brand power and economies of scale to accelerate maritime decarbonization.

coZEV members are leading the way in setting the ambition for zero-emission freight by 2040. In the absence of robust public policy to lower transition costs, commercial incentives for cargo owners are insufficient. By aggregating demand and engaging actors across the entire value chain, coZEV aims to create a niche premium market for zero-emission shipping. In doing so, it can demonstrate the business



Decarbonizing hard-to-abate sectors

Drawing on his work in the Mission Possible Partnership (MPP), Bryan Fisher explored what the maritime industry can learn from other hard-to-abate sectors like aviation and steel. MPP is an alliance of climate leaders focused on decarbonizing the world's highest-emitting industries (aviation, shipping, heavy road transport, steel, cement, chemicals and aluminum), with the Getting to Zero Coalition representing the shipping industry.

LESSONS FROM OUTSIDE SHIPPING: A PLAYBOOK FOR DECARBONIZATION

Bryan started by sketching what progress in the transition to net zero should look like by 2030 for the sectors considered hard to abate: 10-15% of jet-fuel demand from sustainable aviation fuel, 5% scalable zero-emission shipping fuels and 200 zero-emission vessels, 7 million zero-carbon trucks, 100 net-zero steel plants and over 20 cement plants with carbon capture, usage and storage. This would require US\$200-300 billion in investment per year until 2030.

Despite different sectors having different decarbonization requirements and different starting points, abundant opportunities exist to learn from each other and from industries that are further ahead in the transition curve. As an example, the scale-up plan for sustainable aviation fuel and maritime zero-emission fuels closely follows the solar and wind playbook: Long-term power purchase agreements created the initial incentives for buyers willing to pay a premium for cleaner energy inputs and stable government incentives, such as production tax credits. This created momentum towards cost parity with fossil fuels.

case and support the development and scale-up of solutions for zero-emission fuels. coZEV has seen fast growth in commitments, with nine companies signing the initial ambition statement and membership doubling in less than a year.

ADDRESSING THE BARRIERS TO LONG-TERM COMMITMENTS

To commit a volume of cargo in aggregate over an extended period, cargo owners must enter multi-year contracts, subject to price fluctuations and high financial-risk-management costs. These are further complicated by uncertainties around fuel adoption pathways, fuel availability and vessel readiness; for example, they raise questions around the ideal duration of fuel offtake agreements or the time lag for the adoption of methanol and ammonia on retrofitted vessels.

Addressing these barriers will require many solutions, both for the short-term and full long-term decarbonization. Ingrid put forward some ideas:

- Setting up a mechanism for fuel-cost assessment that reflects the expected price reduction over time
- Increasing contract length to reflect the longer procurement of scalable zero-emission fuels (SZEF) relative to fossil fuels but allowing for risk sharing over the duration of the contract
- Creating a commodity-forward market for SZEF in addition to the physical market, providing longer-term price visibility
- Developing a credible book and claim system for shipping – similar to that of the Sustainable Aviation Buyers Alliance for sustainable aviation fuel – to reduce the need for fuel transport and signal the market.



Energy transition: Catching up to climate change?

Vineet Mittal and David discussed the political and economic levers needed to incentivize the energy transition in the maritime industry.

INVESTING IN CREATING HYDROGEN AND AMMONIA MARKETS

David pointed out that, as a society, we're not on track for emission reductions and also lagging (by order of magnitude) on emission-reduction financing. Identifying and scaling feasible zero-emission fuels is urgent for the maritime industry to make the necessary investments in fuels and ships, including retrofitting.

For Vineet, hydrogen and ammonia markets are essential to catalyzing shipping decarbonization. India's decarbonization target for fertilizers (100% green sourced by 2035) and Europe's ambition to scale up green hydrogen and ammonia are examples of the signals required to create such markets. While nowadays only low volumes are being traded, once countries such as Germany begin importing large quantities of hydrogen, the importance of markets will become evident.

Clean fuel ecosystems that allow for demand aggregation and multisector offtake will lower costs and improve the financially viable transport of hydrogen and ammonia. Simultaneously, port-side investments in retrofitting oil and gas infrastructure for hydrogen can help accelerate the transition.

CARROT AND STICK: INCENTIVES AND CARBON PRICING WORKING IN TANDEM

Participants emphasized the importance of a "carrot and stick" approach involving incentives to make decarbonization profitable and a sufficiently high carbon price. The EU's Fit for 55 legislation will offer a starting point in 2023, but participants agreed the industry needs to work closely with the IMO to deliver a price on shipping emissions.

David highlighted that the maritime industry is also likely to be impacted by carbon footprint regulations. With the EU, U.S. and China developing taxes on the carbon footprint of imported goods, including the transport of goods, the motivation to implement matching domestic carbon taxes increases, lest the tax revenues are diverted elsewhere.

Scanning the horizon

Expert presentations

Charting the shifting geopolitical landscape

Eugene Rumer, Director and Senior Fellow, Russia and Eurasia Program, Carnegie Endowment for International Peace

Patricia M. Kim, David M. Rubenstein Fellow, John L. Thornton China Center and the Center for East Asia Policy Studies, The Brookings Institution

W. Gyude Moore, Senior Policy Fellow, Center for Global Development

The Russian invasion of Ukraine and increasing tension between China and the United States pose serious threats to global trade, while demographic shifts – not least in Africa – may create new opportunities. With the world increasingly split along new fault lines, the future of international free trade is uncertain, and the maritime industry must prepare to navigate a more complex geopolitical landscape.

By strongly articulating the benefits of seaborne trade for the delivery of essential goods, such as food and energy, industry leaders may help mitigate the impact of geopolitical turbulence on global seaborne trade – although it is unlikely to change the fact that there are rough seas ahead.

Global security and the war in Ukraine

Eugene Rumer explored how the Russian invasion of Ukraine will shape the political order in Europe and beyond, as well as its implications for global governance and trade in the 21st century.

THE SHIFTING POWER DYNAMICS OF THE NEW COLD WARS

Eugene opened with an overview of the geopolitics underpinning the invasion of Ukraine. For him, the dynamic of competition between the U.S. and Russia represents a return to the 19th-century understanding of geopolitical power and the “old normal” of the Cold War.

From this perspective, Eugene postulated that the war and resulting sanctions would continue for years. Neither Ukraine nor Russia seems willing to end the war at its current point, at least not on the terms proposed by the other side. Furthermore, a change in Russia’s position is not expected, even if President Putin is no longer at the helm.

Russia’s political and military actions also challenge global governance, redrawing terms of alignment as the world calibrates to shifting power dynamics.

WAR AND POLITICAL UNCERTAINTY WILL CONTINUE TO AFFECT GLOBAL TRADE

The war in Ukraine and rising tensions pose threats to international free trade, most clearly through sanctions but also through disrupting the supply of food and fertilizers to the developing world. Energy security is under threat in Europe, where fossil fuels from Russia represent a sizeable portion of overall energy imports. Meanwhile, Russia’s exports of discounted fossil fuels to some countries have increased geopolitical tensions across the globe.

Finally, Eugene explored the impact of the ongoing war on shipping’s workforce – and the resulting impact on global trade – given that Ukrainian and Russian seafarers make up nearly 15% of the maritime workforce.



U.S.-China tensions: A zero-sum game?

Patricia M. Kim delved into escalating U.S.-China tensions and their implications for both the future of trade and the maritime industry’s ability to deal with global challenges such as climate change.

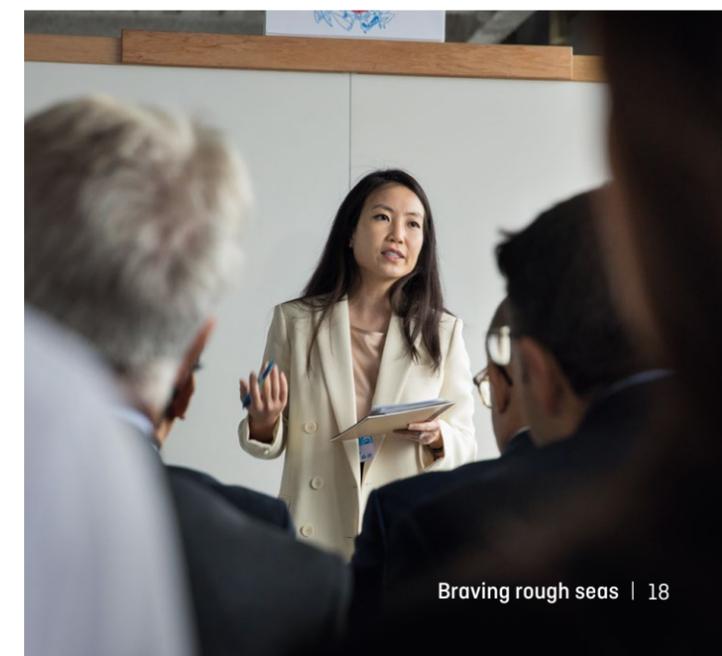
U.S.-CHINA RELATIONS AT THEIR LOWEST POINT

For Patricia, the relationship between the U.S. and China is likely at its lowest point in modern history. China’s rapid military expansion and its coalition with North Korea are critical factors for the U.S.’s growing concern. Concurrently, the risk of outright conflict has risen with the intensifying U.S. military presence in the Asia Pacific, along with China’s claims of U.S. interference in Taiwan.

Additionally, the U.S. is concerned about China’s movement toward Russia. The two countries have emerged as vital economic and military partners, despite having considered each other rivals just a decade ago. Although China is not providing direct military support to Russia in the war in Ukraine, it has, despite the reputational costs, expressed support for Russia’s decision to enter the war.

CONFLICT IS LIKELY TO DISRUPT THE ENERGY TRANSITION

U.S. and China are drifting towards a zero-sum relationship, increasingly convinced the other is changing the status quo. Patricia emphasized the importance of avoiding a new cold war. With a clear Western trade dependence on China, a conflict between the two countries would disrupt the maritime sector and have ripple effects on the global economy. Furthermore, with China being the world’s largest ship manufacturer, worsening tensions would only hinder shipping decarbonization and the energy transition more broadly. For Patricia, this is a time when cooperation is most needed, but also very difficult to achieve.





Unlocking Africa's potential

W. Gyude Moore discussed the socio-economic and demographic trends that are set to make the African continent a greater player in global politics and the global economy.

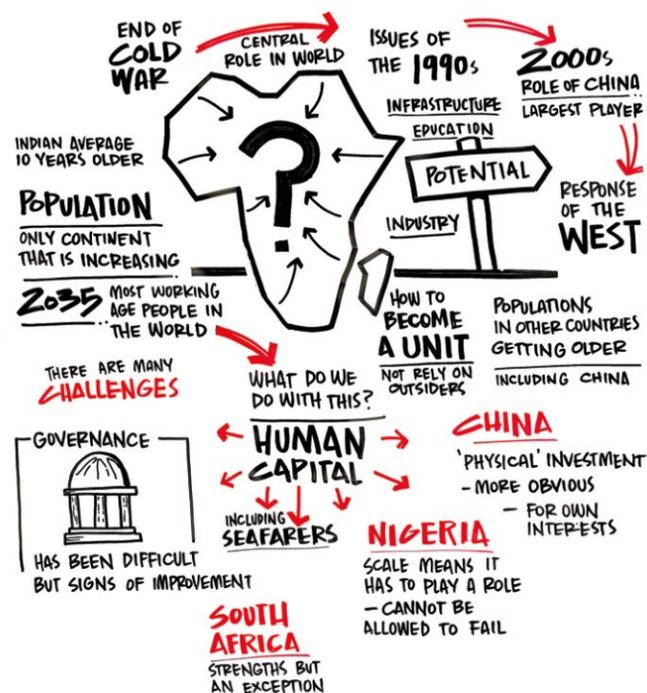
RISING GEOPOLITICAL INTEREST IN AFRICA

Since joining the World Trade Organization in 2001, China has invested heavily in African infrastructure and healthcare systems to pave the way for commercial agreements with African governments. By increasing exports to China, African economies have grown in step with Chinese influence on the continent. This has provided an impetus for Western powers to become more active in the continent in order to remain competitive with China.

Gyude cautioned that, in the face of increasing geopolitical interest, it is crucial to understand that African leaders are looking for real partnerships and a place at the table – rather than being treated as clients or proxies, as was the case during the Cold War.

AFRICA'S KEY ROLE IN FILLING THE GLOBAL WORKFORCE GAP

Gyude also argued that Africa will be the primary competitive source of skilled labor by 2035, which will have implications for the global supply of seafarers. In most developed countries, demographic trends show an aging population and a diminishing workforce in multiple industry sectors. Meanwhile, Africa's population has a median age of 18.5 years and the continent will have the most working-age people by 2035. This creates an opportunity for the maritime industry to attract African talent, for instance as seafarers; but it will require partnering with African stakeholders and investing in training and upskilling.



Risks and opportunities in a changing geopolitical landscape

Patricia, Gyude and Eugene came together in a panel discussion on how geopolitical events such as the war in Ukraine, escalating great-power rivalry and major economic and demographic changes around the world are shaping the future of international trade – and how the maritime industry might respond to such changes.

GEOPOLITICAL TENSIONS MAY SPLIT THE WORLD IN TWO

Eugene and Patricia pointed out that, due to increasing geopolitical tensions, countries and alliances within the political landscape have visibly split, with implications for global commerce.

Since the invasion of Ukraine, China doubled down on its partnership with Russia and, due to Western sanctions, became the largest importer of Russian energy. Concurrently, the U.S. is eager to reduce its reliance on China. However, complete economic decoupling from China is not realistic at this point and might not even be desirable; it raises the likelihood of the world splitting into two blocs if friction between the superpowers cannot be resolved.

RESPONDING TO THREATS TO GLOBAL TRADE

In the face of mounting tension and disruptions, the maritime industry can play a role in ensuring that global trade continues to meet the world's needs for food, fertilizer and other essential goods. Participants pointed out that shipping can be seen as a global public good that must be preserved, even in times of conflict.

OPPORTUNITIES FOR THE MARITIME INDUSTRY IN AFRICA

Reiterating the opportunity for the maritime industry to tap into the expanding African workforce, Gyude noted that maritime programmes will be crucial to training seafarers from Africa. However, he argued for expanding established maritime programmes to serve regional seafarer training needs, instead of duplicating efforts by establishing multiple new domestic programmes.



Scanning the horizon

Expert presentations

Navigating the uncertainties of global trade

Martin Humphreys, Global Lead, Transport Connectivity and Regional Integration, World Bank Group

Jan Hoffmann, Head, Trade Logistics Branch, United Nations Conference on Trade and Development

Marc Levinson, Author of *The Box: How the Shipping Container Made the World Smaller and the World Economy Bigger*

Faced with the dual shock of a pandemic and the Russian invasion of Ukraine, the world's economy is edging toward a recession. If this leads to deglobalization and a reduction in global trade, it would have serious implications for the maritime industry. For example, lower trade volumes, higher interest rates and higher fuel prices could create barriers to shipping decarbonization.

The maritime industry faces other challenges, including responding to the food and energy crises triggered by the war in Ukraine, which have disproportionately impacted developing countries. Longer-term risks of climate change and geopolitical disruptions also heighten the need for greater resiliency to future shocks.

Outlook on global economy and trade

Martin Humphreys shared the World Bank's global economic outlook and explored the implications of a potential global recession for the maritime industry.

DUAL SHOCK LIKELY LEADING TO A GLOBAL RECESSION

The global economy has experienced a dual shock of the COVID-19 pandemic and Russia's invasion of Ukraine, with ongoing repercussions. These shocks have led to supply chain disruptions, a sharp uptick in commodity prices and heightened policy uncertainty. Furthermore, intensifying geopolitical tensions, growing stagflationary concerns and rising financial instability have cast a cloud over the economic outlook.

According to a World Bank report published in September 2022, the likelihood of a global recession in the short term has increased significantly. Although economic forecasts do not explicitly point to a worldwide recession in 2022, every global recession since 1970 has been preceded by a significant weakening of global growth in the previous year, as is the case now. Furthermore, all previous global recessions coincided with sharp slowdowns or outright recessions in several major economies.

MARITIME FUTURE LINKED TO THE HEALTH OF THE GLOBAL ECONOMY

The maritime industry depends on the global economy's demand for transport services. The bleak economic outlook and potential decrease in the global value of trade, therefore, raise important questions: Could an economic slowdown, in combination with strained supply chains and geopolitical tensions, reconfigure the world economy towards deglobalization? Could a downturn decelerate the speed of shipping decarbonization? For Martin, the answers to these questions are uncertain, but they reflect the link between the health of the global economy and trade and the maritime industry's future.

Responding to the food and energy crisis

Jan Hoffmann built on the UNCTAD Secretary-General's keynote speech, elaborating on the factors driving the global food, energy and cost-of-living crises caused by the war in Ukraine.

REDUCED SUPPLY AND HIGHER SHIPPING RATES DRIVING FOOD CRISIS AND INFLATION

Jan distinguished between the war's impacts on food and energy commodities. For low-value goods with limited substitutes such as basic foodstuffs, demand rises as prices increase. The reduced supply of grain due to the war in Ukraine raised food prices, increasing the demand for grain and, consequently, for shipping. The rerouting of cargo due to blockages in the Black Sea also rose ton-mile demand, exerting upward pressures on freight rates.

Jan explained that the rise in shipping freight rates could end up contributing to 1.5 percentage points of inflation in 2022 and transport costs now make up a relatively higher share of the final delivered price of foodstuffs, disproportionately affecting developing countries.

HIGHER ENERGY PRICES MAY AFFECT SHIPPING DECARBONIZATION

Conversely, energy consumers tend to reduce demand when prices are high. This has accelerated the push for the energy transition, with developed economies looking to reduce their reliance on imported gas. However, the crisis is also likely to raise the cost of ammonia, which today is produced from natural gas. As ammonia is also likely to fuel zero-emission ships, the energy crisis may affect the pace of shipping decarbonization.





Future of supply chains

Marc Levinson shared his views on the forces driving reshoring and how the need for resilience might shape tomorrow's supply chains.

RESHORING DRIVEN BY COST OPTIMIZATION, NOT RESILIENCE

The current crises, coupled with the growth rate of global trade slowing to 2008 levels, have led many to ask whether we are entering an age of deglobalization and region-centric production. Marc argued that global events do not induce reshoring for resilience purposes, despite headlines suggesting so. Instead, shifts in production location take place gradually and are usually motivated by cost optimization and technological changes.

COST OF RESILIENCE NOT YET PRICED IN

Resilience is not conventionally priced into supply chains, as risk mitigation comes at a cost and thus reduces the competitiveness of risk-averse companies. When supply chains function optimally, driven by Just-in-Time operations, inventory costs are immaterial, as inventory is not held for long and interest rates have been historically low. Inventory costs become more significant during crises, as seen in the increased need to hold stock due to supply chain bottlenecks during the past two years.

The expectation of future disruptions caused by climate change and geopolitical tensions have motivated discussions about the pricing of risks into today's fragile supply chains. In the short term, Marc argues, reactive production duplication strategies will create redundancies that sacrifice economies of scale. However, in the long term, supply chain resiliencies can be generated if risks are adequately priced in.



Maritime's response to shifts in global trade

Martin, Jan and Marc joined up to discuss the shifts in global trade, and the challenges and opportunities these might represent for supply chain resilience.

To open, the panelists were asked if peak trade growth had been reached or whether this downturn would be only a blip, followed by a return to pre-crisis growth levels. Jan highlighted that changes in trade patterns were already noticeable (e.g., the volume of imports in developing countries is down, some trade is moving from China to South-East Asia due to low intraregional costs, ports are shutting down and shipping networks are starting to decline), but that, in such a complex environment, forecasting was extremely difficult.

For example, digitalization efforts have, in many areas, created both demand and supply efficiencies, smoothing out pandemic-related disruptions.

CHALLENGES OF CRISIS RESPONSE IN CONFLICT AREAS

Participants also pointed out several complications of operating in the Black Sea. Operating in conflict areas may align with societal expectations but clash with the due diligence requested by intermediaries such as banks, investors and insurance providers, which are crucial to such operations. Although fertilizers and grains are exempt from the sanction regime, operational safety and reputational risk pose challenges.

SEEKING SOURCES OF RESILIENCE IN THE FACE OF CRISES

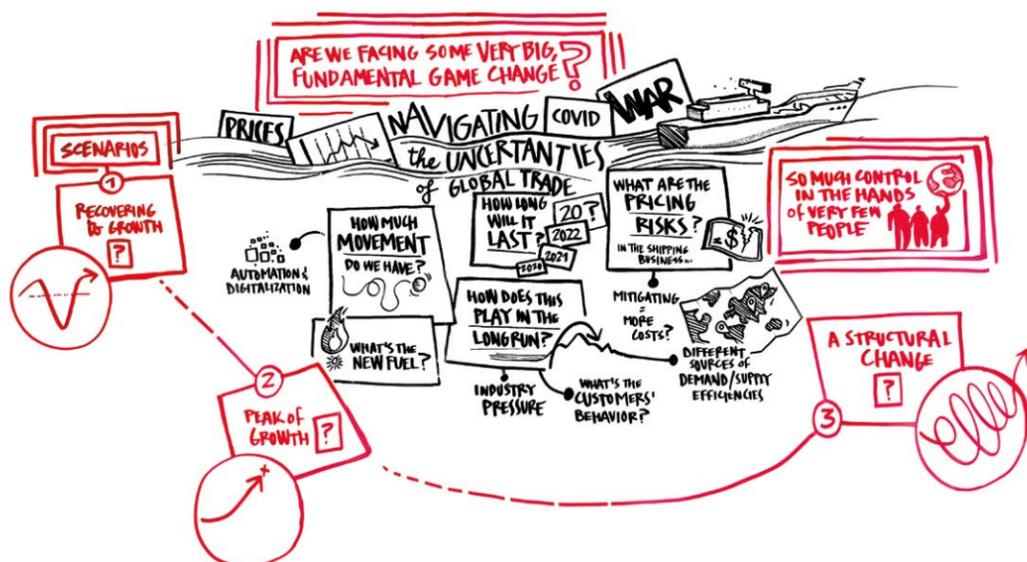
Marc suggested that the end of "free money" puts a steeper price on inventory and creates incentives for more resilient supply chains. Participants agreed more resilient supply chains were needed, but in a highly competitive environment it was uncertain how this could be achieved without losing out on competitiveness. Nonetheless, there was interest in identifying how resilience might lead to cost reductions, such that the maritime sector can contribute to building a more sustainable and equitable economy despite global shocks.

Participants agreed that, when confronted with supply chain disruptions, tonnage and infrastructure cannot be made immediately available, so "soft" measures need to be fully exploited.

UNCLEAR EFFECT OF AN ECONOMIC DOWNTURN ON PACE OF DECARBONIZATION

Opinions were mixed on how the economic outlook might affect the pace of maritime decarbonization. Some argued that in the absence of a thriving global economy, the shipping sector may be unwilling – and perhaps unable – to make the necessary investments into low-/zero-carbon vessels and fuels at the required pace. Conversely, some participants rebutted that record-high fuel prices make the case for reducing reliance on a few fossil-fuel-exporting countries. This might also motivate a global and decentralized market for zero-emission bunker fuel.

In any case, panelists and participants agreed the shipping sector will need to continue to decarbonize, digitalize and more – regardless of the economic outlook, be it business-as-usual or in the context of a global recession.



Scanning the horizon

Expert presentations

Public scrutiny and ESG driving change in global supply chains

Ian Urbina, Director and Founder, The Outlaw Ocean Project

Virginia Haufler, 2022-23 Fulbright Canada-Pierre Elliott Trudeau Fellow, Joint Chair in Contemporary Public Policy, McGill Institute for the Study of Canada

Valerie Smith, Managing Director and Chief Sustainability Officer, Citi

Elisabeth Fauvelle Munck af Rosenschöld, Global Sustainability Manager, Supply Chain Operations, IKEA Group

A wide range of stakeholders – lenders, insurers, consumers, NGOs and media – are placing increasing pressure on all parts of global supply chains to report on and improve their environmental, social and governance (ESG) performance. This has led to the establishment of a growing number of ESG standards and ratings.

While most current standards are voluntary, there are clear advantages in joining early on – from market incentives to the opportunity to get ahead of regulation. Credible initiatives, based on transparent data, are essential to avoid accusations of greenwashing or even litigation.

In maritime, environmental factors have been top of mind so far, but social issues related to salary, overtime, working conditions, diversity, talent attraction and harassment are rising to the top of the agenda.

The power of public scrutiny: Lessons from the high seas

Ian Urbina explored how increased public scrutiny and transparency will impact the maritime industry and its practices.

Ian started by sharing his investigations about lawlessness on the high seas, captured in *The Outlaw Ocean* book and podcast. Travelling aboard vessels in Africa, Asia and Europe, Ian witnessed illegal fishing, intentional dumping, arms trafficking, slavery and the murders of crew and stowaways, and he identified the urgency of investigative journalism at sea. Ian points out there is real momentum for scrutiny within the maritime space, with investigations by journalists and NGOs increasing in the past two years.

CALLS FOR INCREASED TRANSPARENCY ACROSS THE SUPPLY CHAIN

Consumers, banks and insurers are asking for more transparency, with drones, social media, big data and open-sourced data increasingly used to expose issues within supply chains. Ian predicted the industry will start facing more litigation with legal precedents within three to five years and urged maritime leaders to act now to anticipate these risks.

Given the industry's involvement in global value chains – from raw material extraction to the final disposal of products – requirements for shared responsibility within the supply chain cause concerns. For example, a transport operator may face risks in terms of human trafficking or illegal transportation complicity, even when playing a small part in a supply chain. Based on



Ian's experience, smaller vessels tend to present higher risks due to the absence of contracts, flag registration problems, etc.

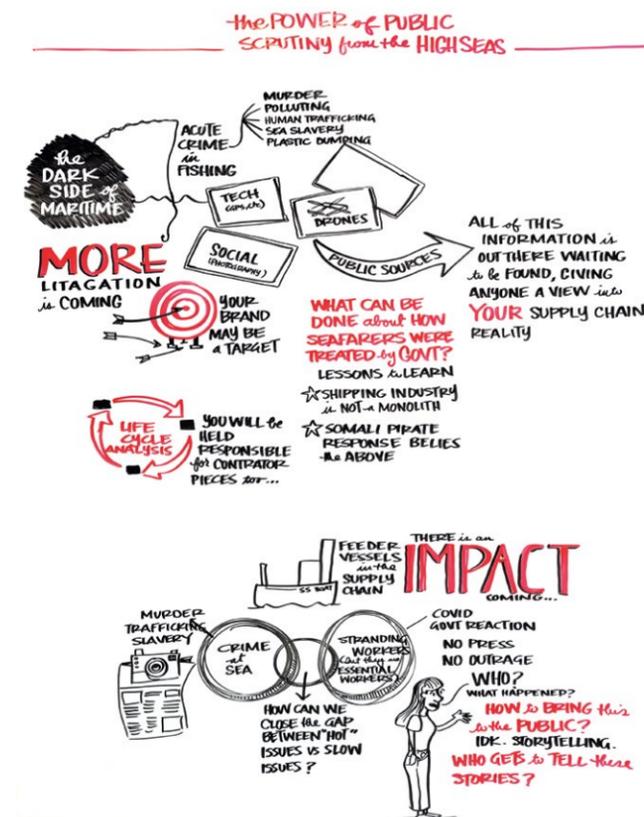
Ian suggested that where there is potential responsibility across the whole life cycle, the shipping industry could adopt Life Cycle Analysis (LCA), a method already used in greenhouse gas emissions analysis. For example, to anticipate and assess risks within the supply chain of a piece of furniture, LCA would assess working conditions, compliance with safety standards, links to illegal deforestation, etc.

PUBLIC SCRUTINY CAN HELP DRIVE CHANGE ON HIDDEN ISSUES

Ian pointed out that while "hot" stories about crime at sea get the most airtime, "slower" issues, such as the plight of seafarers stranded during the pandemic, could have benefited from more public scrutiny as a way of accelerating government and industry response.

More stories about solutions and concrete examples of best practices are required to change public perception of the maritime industry. For Ian, villain journalism is not the best solution; systemic analysis is essential.

Participants agreed key industry change moments arise when different supply chain actors work together to find solutions. This was the case with COVID-19 (when the industry came together to request 'key worker' status for seafarers to prioritize access to vaccination) and could work for other issues as well, as illustrated by initiatives like the All Aboard Alliance, which seeks to improve diversity and inclusion across the industry.



Environment, Social and Governance (ESG) action in the global supply chain

Virginia Haufler focused on the expansion of multi-stakeholder, voluntary ESG standards and the challenge of monitoring social issues (the “s” in ESG) across global supply chains.

Virginia opened by reminding participants that environmental, social and governance (ESG) investment now represents over US\$15 trillion in value – more than a third of all assets in five of the world’s largest markets – with US\$3 trillion earmarked for ESG in supply chains.

PROLIFERATION OF ESG STANDARDS FOR SUPPLY CHAINS

As investors, lenders and insurers incorporate ESG considerations into their decision-making, ESG standards and ratings are becoming more common and increasingly impacting the maritime industry. There are currently an estimated 800 public-private or multi-stakeholder ESG initiatives for supply chains. In addition, due to the global nature of supply chains, standards put forward by major companies or institutions like the European Union or the Organization for Economic Co-operation and Development (OECD) tend to apply globally. This proliferation of standards has, in some cases, led to overlaps and inconsistencies, creating difficulties for companies that operate globally.

MULTIPLE INCENTIVES FOR COMPANIES TO JOIN ESG STANDARDS

Nevertheless, there is a compelling business case for maritime companies to join or create standards, for example for greenhouse gas emissions reduction. Market incentives also come from financial institutions – for instance, insurance premiums or interest rates linked to ESG considerations – and, as consumer demand for transparency increases, from other businesses in the supply chain.

Given the dynamic interplay between voluntary standards and regulation, companies may also benefit from joining a voluntary standard initiative early on to get on the front foot regarding future policy or, in some cases, preempting the need for government involvement.

THE CHALLENGE OF SOCIAL IN MARITIME ESG

Virginia pointed out that, currently, ESG efforts target primarily environmental factors, with a smaller number of initiatives addressing social and governance factors. Governance ratings tend to focus on internal governance issues, which are easier to tackle than corruption, while social ratings face challenges in objectively quantifying social issues. Within the maritime industry, there are limited written standards, except for the Maritime Labour Convention; a more comprehensive basket is needed, focusing on issues such as salary, overtime, work conditions, diversity, talent attraction and harassment. The example of the code of conduct and self-assessment tool on seafarers’ rights developed by the Sustainable Shipping Initiative and the Institute for Human Rights and Business was shared as an invitation to the industry to come together to find solutions.

ESG pressures: Responding to stakeholder expectations

Virginia, Valerie Smith and Elisabeth Fauvelle Munc of Rosenschöld came together to discuss the growing ESG pressures from financial, commercial and governmental stakeholders, as well as the opportunities and challenges created by increased transparency and collaboration.

PUBLIC-PRIVATE COLLABORATION FOR ESG GOALS

Virginia pointed out that, with pressure coming from a multitude of stakeholders, ESG initiatives – such as standards, ratings and rankings – are generally developed by public-private or multi-stakeholder partnerships. In these partnerships, the private sector contributes resources and expertise, while the public sector sets the agenda and establishes the norms. This helps create legitimacy and credibility with governments and the public.

Such standards tend to be voluntary and, although various transparency mechanisms are employed (e.g., reporting, certifications, peer reviews, external audits, etc.), enforcement remains an issue. Nevertheless, learnings from the application of voluntary standards often inform future regulation.

VOLUNTARY STANDARDS SUPPORT FIRST MOVERS

Valerie agreed that voluntary standards are essential to ESG and sustainability, with climate change being an area of particular acceleration. She highlighted the example of the Glasgow Financial Alliance for Net Zero (GFANZ), a global coalition of financial institutions

launched at COP26 committed to accelerating the decarbonization of the economy in line with the Paris Agreement. The absence of a third-party standard is one of the main challenges GFANZ faces in its mission to reorient finance towards this objective.

COLLABORATION AND CREDIBLE DATA ARE KEY TO AVOIDING GREENWASHING

Elisabeth shared how IKEA is responding to consumers’ calls for transparency and sustainability. Customers want to know what is happening throughout the value chain, the products’ origins, working conditions, etc., and are often willing to pay more for sustainable options. IKEA follows a policy of transparency, providing data-based reporting and sharing the challenges ahead.

IKEA’s sustainability journey started in 2000 with its first supplier code of conduct, which aimed to send a clear signal and bring positive change across the entire value chain. Through collaboration, the company has sought to influence its direct sphere, as well as its second- and third-tier suppliers.

Elisabeth acknowledged the increasing complexity of the ESG landscape and that collaboration and innovation are required to continue improving existing standards. With litigation around false sustainability allegations rising globally, initiatives like the Poseidon Principles demonstrate the importance of backing sustainability claims with accurate data.



Scanning the horizon

Expert presentations

Winning the talent race

Michelle Mahony, Managing Partner, Daggerwing Group

David Kiron, Editorial Director, MIT Sloan Management Review

Faced with increasing competition for talent, the maritime industry must rethink its value proposition for the workforce. Employees' expectations have changed, and they now prioritize flexibility, purpose, career prospects and decent working conditions. To attract and retain the diverse talent it needs, the industry must show that its culture is changing and becoming more inclusive. In particular, it must address discrepancies between the working conditions of seafarers and onshore employees to ensure an inclusive environment for all.



Prioritizing the employee experience

Michelle Mahony explored how employees' priorities have changed and how organizations need to create a culture that acts as a talent magnet.

DECENT PAY IS NO LONGER ENOUGH

Michelle pointed out that COVID-19 produced a seismic shift in how people view work and what they want from their employers. Younger employees, in particular, now tend to prioritize purpose, belonging and flexibility over pay. Many organizations have been left scrambling to attract and retain a skilled and diverse workforce. But the maritime industry faces additional barriers, including long working hours, risk of isolation, lack of diversity and few opportunities for remote working.

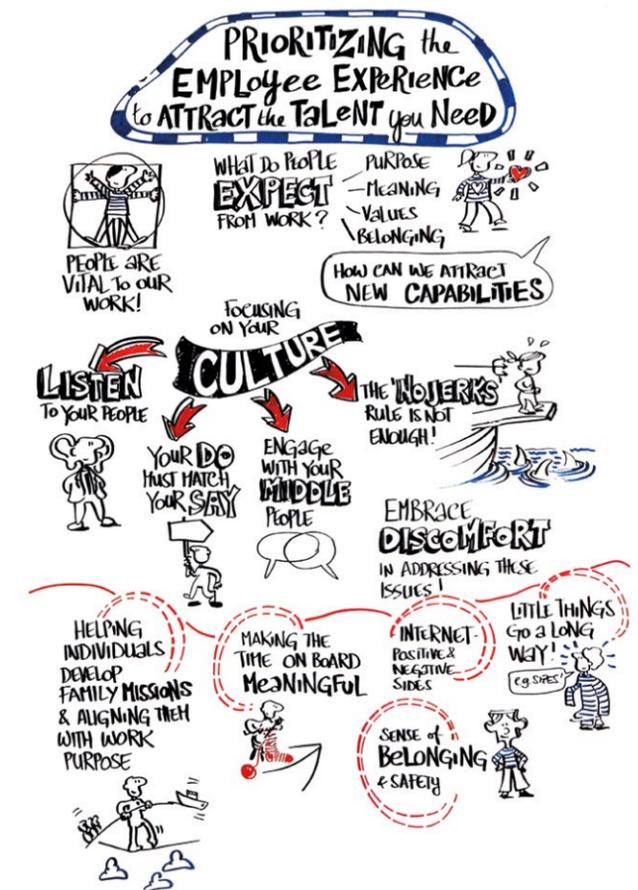
TO RETAIN TALENT, INVEST IN AN INCLUSIVE CULTURE

To retain valuable employees and attract talent, organizations must go beyond standard recruitment efforts. Maritime leaders need to invest in their organization's culture across five critical areas of action:

- Listen to your people to understand their experiences
- Walk the talk as leaders
- Make your people leaders accountable
- Enforce the "no jerks" rule thoroughly across the organization, or risk losing all credibility
- Embrace the discomfort and own mistakes.

Michelle emphasized the role of middle managers, who are the lynchpins of culture but often are neither sufficiently aware of the business case (the why) nor adequately equipped to deliver (the how). They're also not often rewarded for attracting and retaining a diverse and inclusive team.

Participants pointed out that the industry has been excessively focused on reducing costs. Providing adequate shore leave, appropriately sized equipment (e.g., boiler suits) and unlimited free Wi-Fi onboard are relatively simple ways to acknowledge and address employees' needs. Michelle urged the industry to implement small, cumulative steps rather than waiting for disruptive changes.





Aligning the workforce approach with business strategy

David Kiron explored how companies can adapt their management practices to better respond to the changing needs of the workforce.

CREW: COST OR ASSET?

David argued that workplace culture and conditions can vary substantially, depending on whether companies define their workforce as a cost or an asset. This is particularly noticeable regarding seafarers, who are often recruited and managed via third parties.

Participants suggested the maritime industry could learn from the trucking industry. When faced with driver shortages, trucking companies shifted their focus from providing truck drivers with jobs to offering them careers.

BRIDGING THE SHORE-SEA DIVIDE

David pointed out that, despite being touted as vital to the industry, seafarers often work under poor conditions (for example, long hours, no shore leave, no access to Wi-Fi) and don't have the same benefits and conditions as onshore employees in the same company. When asked to reflect on this, some participants identified the pressure for cost reductions at sea as a significant obstacle to providing adequate work conditions to seafarers. Others shared how their company policies ensure all employees – at sea or onshore – have access to the same benefits and contracts.

In general, there was a sense that when culture on ships is seen as a sub-culture, a wall is created inside the organization separating sea and shore employees. David emphasized the importance of fostering a sense of “one company, one culture,” particularly for the younger generation of employees, who put a high value on purpose and belonging.



How to win the talent race

Michelle and David then led a discussion on the trends impacting talent recruitment and retention and how the maritime industry can provide an inclusive environment attractive to a diverse workforce.

ACCESS TO TALENT AS A STRATEGIC PRIORITY

Michelle advised maritime leaders to view the labor force as a changing and dynamic entity whose choice architecture has dramatically expanded since COVID-19. Employees not only bring a new set of expectations but increasingly leverage technology to gather information about potential employers, forcing companies to articulate their value proposition more clearly than ever. As such, understanding and building the labor pool of the future ought to be a strategic priority for maritime leaders.

CREATING AN INCLUSIVE ENVIRONMENT FOR ALL

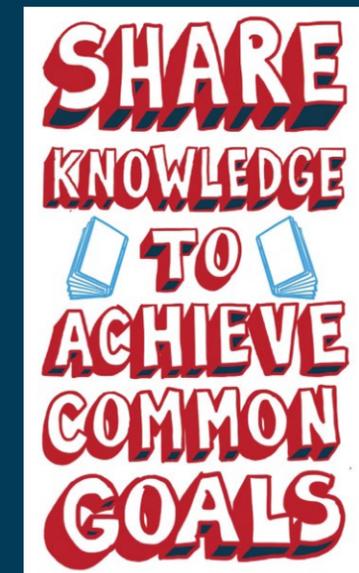
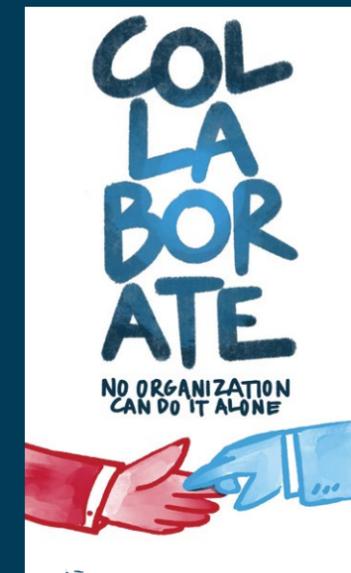
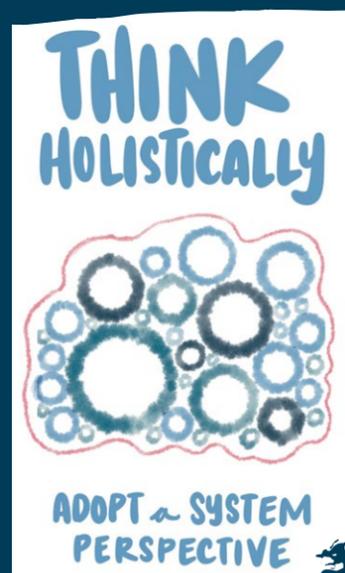
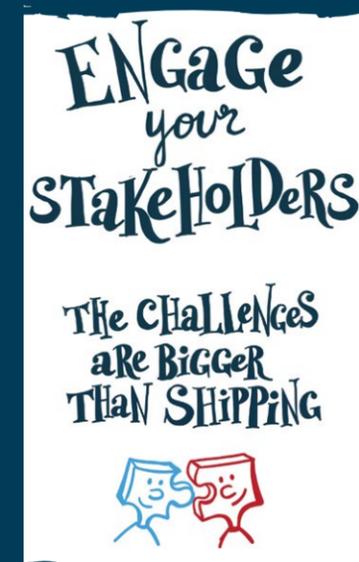
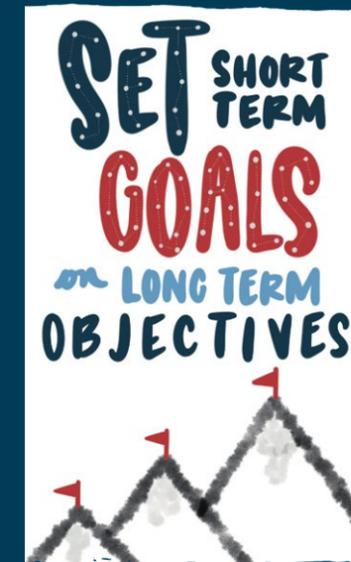
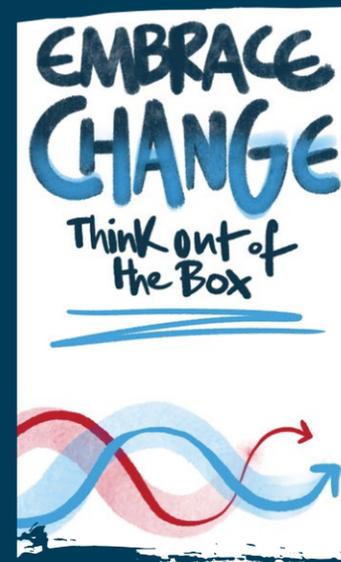
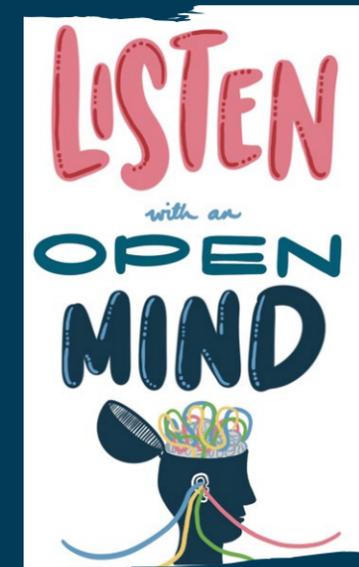
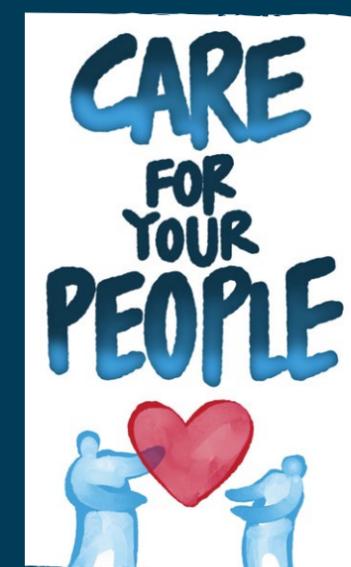
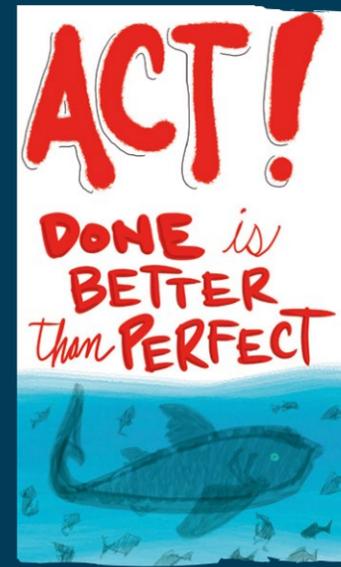
Returning to the topic of the sea-shore divide, David highlighted that even short-term contracts could be fair and help the seafarers feel part of a company's culture. Equally, gender-inclusive contract terms, such as maternity leave clauses, would help attract more female talent to the workforce.

Participants proposed that “do-no-harm” clauses across the value chain could help address social inclusivity – the “s” in ESG. A participant suggested that the industry should treat all its people better – not only its employees but also their families, and not just on ships but also between voyages.

Principles for braving rough seas

At the close of the first day of the Annual Summit, participants came together for a plenary session to share the day's reflections.

They were asked to present the outcomes of their discussions in the form of principles that can help guide collaborative action.



Welcome reception

Kindly hosted by Dorian LPG, Eagle Bulk Shipping, International Seaways, Marine Money, M.T. Maritime Management, New York Shipping Exchange, Northern Navigation and Ridgebury Tankers



Summit dinner
Kindly hosted by the Baltic Exchange



Changing the system, catalyzing action

Day two of the Annual Summit was kicked off by Jane Nelson, Founding Director of the Corporate Responsibility Initiative at Harvard Kennedy School. Her ignite talk focused on how individuals and organizations can catalyze, enable and support systems-level change. Jane opened by stating that many of the initiatives participants are part of are already systems leadership in action.

She enumerated three types of collective action that can drive systems change, all of which are already underway in shipping:

Developing and spreading industry-wide norms and standards for ethical and responsible conduct

These norms often start as voluntary frameworks and are gradually incorporated into regulation. She named the Poseidon Principles, Sea Cargo Charter, Neptune Declaration and the Maritime Anti-Corruption Network as examples of this type of collective action. She added that all represent a good start but encouraged the industry to make them even more robust in terms of performance and accountability.

Mobilizing and catalyzing large-scale collective investment in innovation around a particular objective

Jane cited the First Movers Coalition and the Getting to Zero Coalition – and especially the work on Green Corridors – as examples of this type of action. She suggested there could also be potential for a global maritime sustainable development fund; this fund could focus, for example, on training and capacity building in Africa, supporting humanitarian assistance programmes or aiding other areas where collective investment in innovation is needed.

Innovative policy dialogue

This type of dialogue can take the form of progressive policy advocacy coalitions that come together to communicate key asks of governments at global and national levels. Jane pointed out the We Mean Business Coalition's role in making COP21 in Paris – where the Paris Agreement was signed – a success. She suggested the maritime industry could participate in this form of collective action by forming a joint commitment between leadership organizations in shipping, mining, energy, consumer goods and food on one or two key policy asks for governments.

Jane also highlighted three areas of collaborative leadership to apply at the organization level:

Understand key stakeholders

in the internal and broader ecosystem, or “listen, listen, listen.” The more diverse the stakeholders, the more likely fresh ideas will emerge. It is especially important to listen to vulnerable stakeholders.

Understand levers for change,

whether they are cultural levers, behavior change levers, financial levers, gaps in data, company policy changes, etc. For example, this could mean embedding the issue at hand in board discussions – making it part of incentives, training, safety shares or value shares – and embedding it into day-to-day business planning, strategy and operations.

Understand yourselves,

your resilience and your core group of supporters. Being a first mover requires courage. Understanding your purpose, passion and core coalition of champions can help leaders make difficult, risky and sometimes lonely decisions.



Shipping is a crucial conduit between production and prosperity.

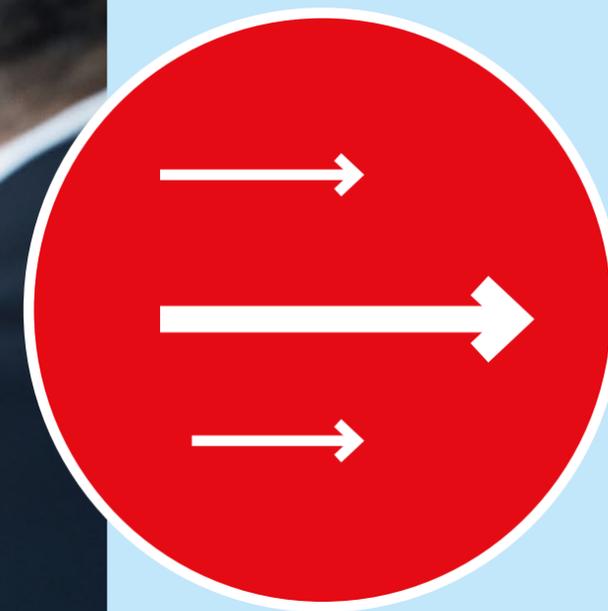
Systems leadership is imperfect solutions to impossible problems.



Working group outcomes



Building on the discussions from day one, participants devoted the second day of the Annual Summit to working in groups of their choice to develop actionable solutions to the maritime industry's systemic challenges.



Green Corridors: Moving from ambition to action

As the work on Green Corridors picks up speed, collaboration will be key to removing critical obstacles. This working group zoomed in on the need for coordination between value chain actors and supportive government measures.

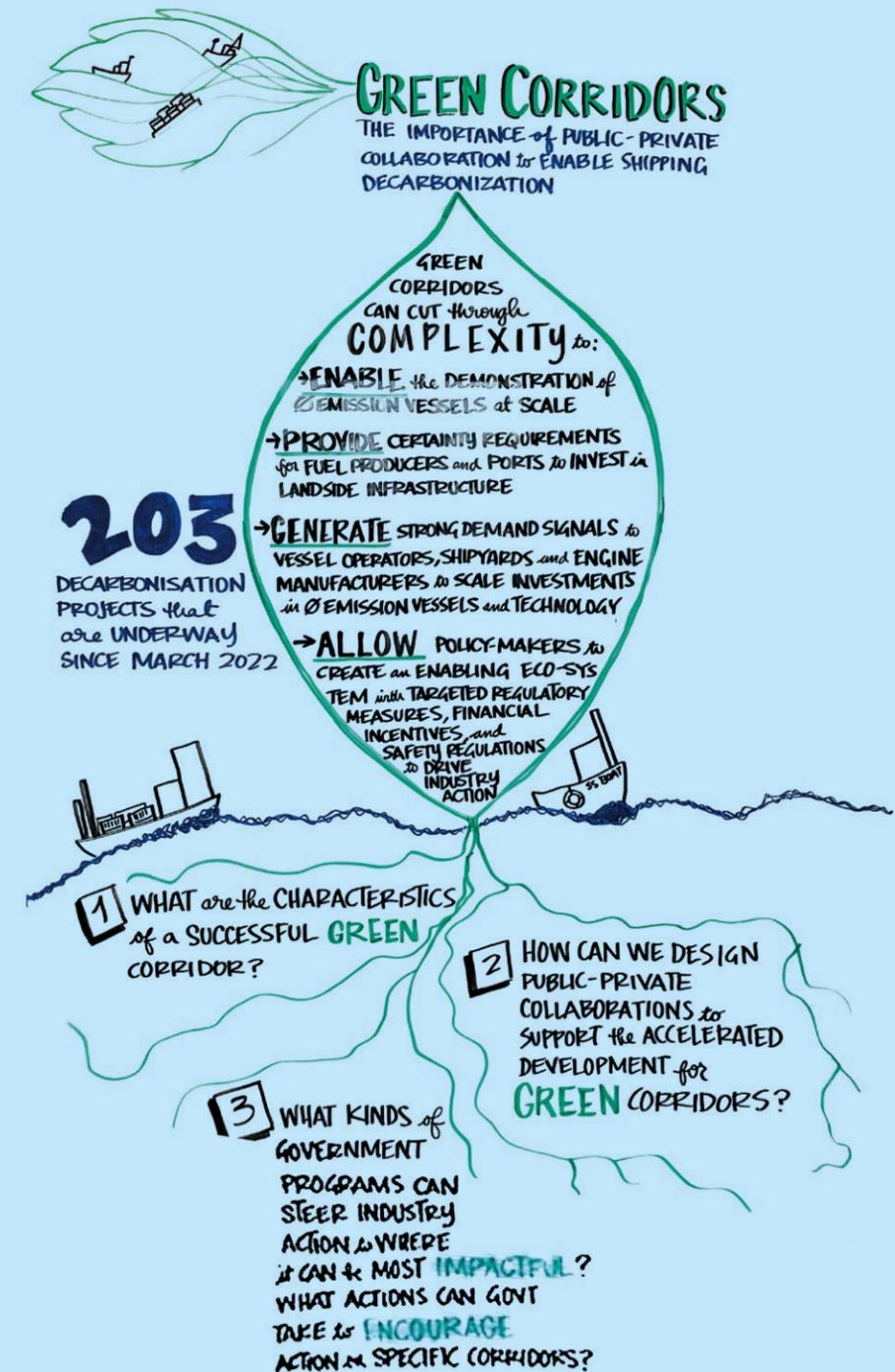
The idea of maritime Green Corridors has become central to the industry's plans to decarbonize. Green Corridors – zero-emission routes catalyzed by a combination of public and private actions – can leverage advantageous conditions such as relatively simple operational patterns, high-value trade flows, potential access to zero-emission fuel production or a supportive stakeholder environment to get a head start on demonstrating and deploying zero-emission solutions at scale. One year since governments signed the Clydebank Declaration for green shipping corridors, approximately 20 initiatives have been launched by ports, industry, governments and research institutions.

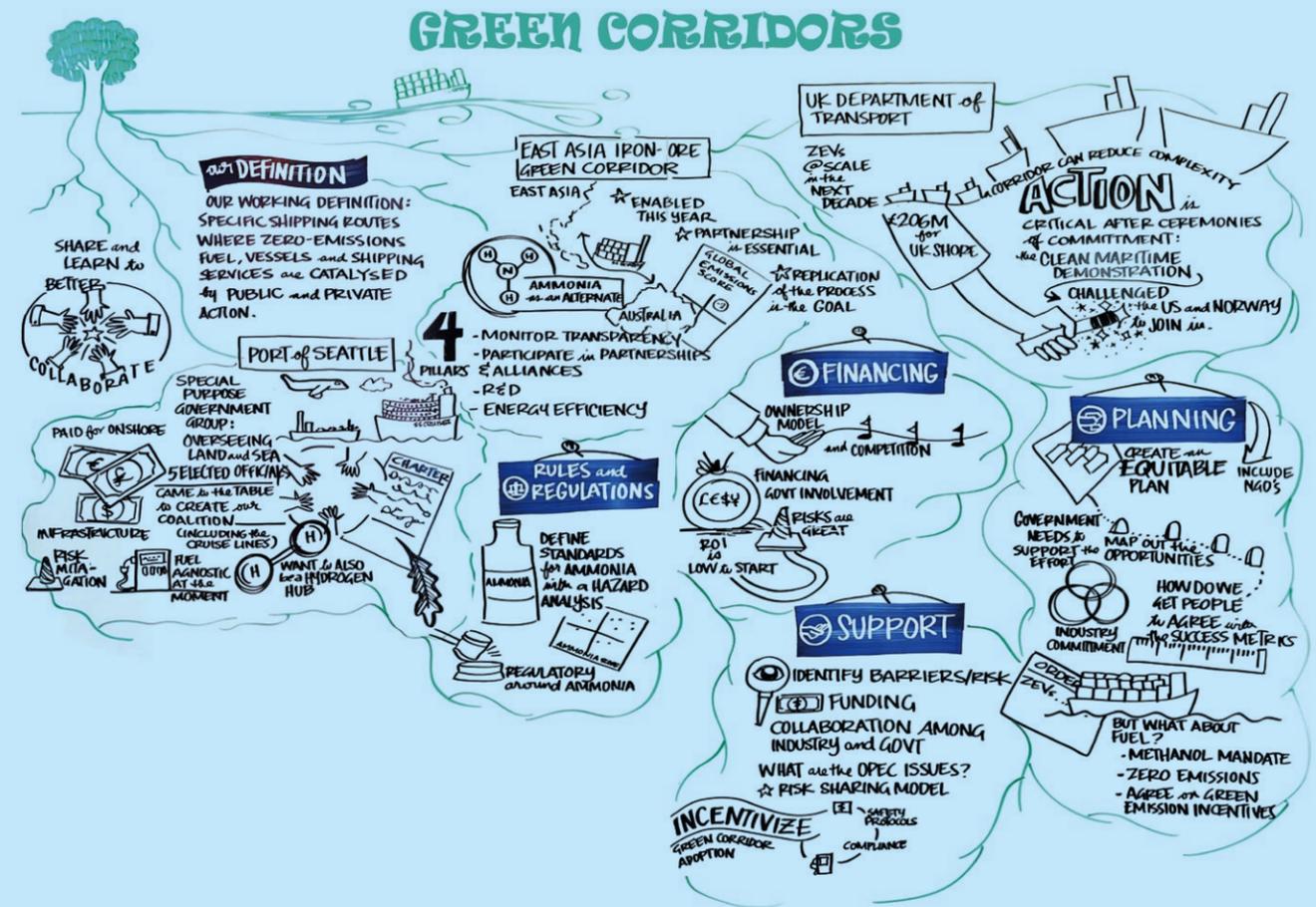
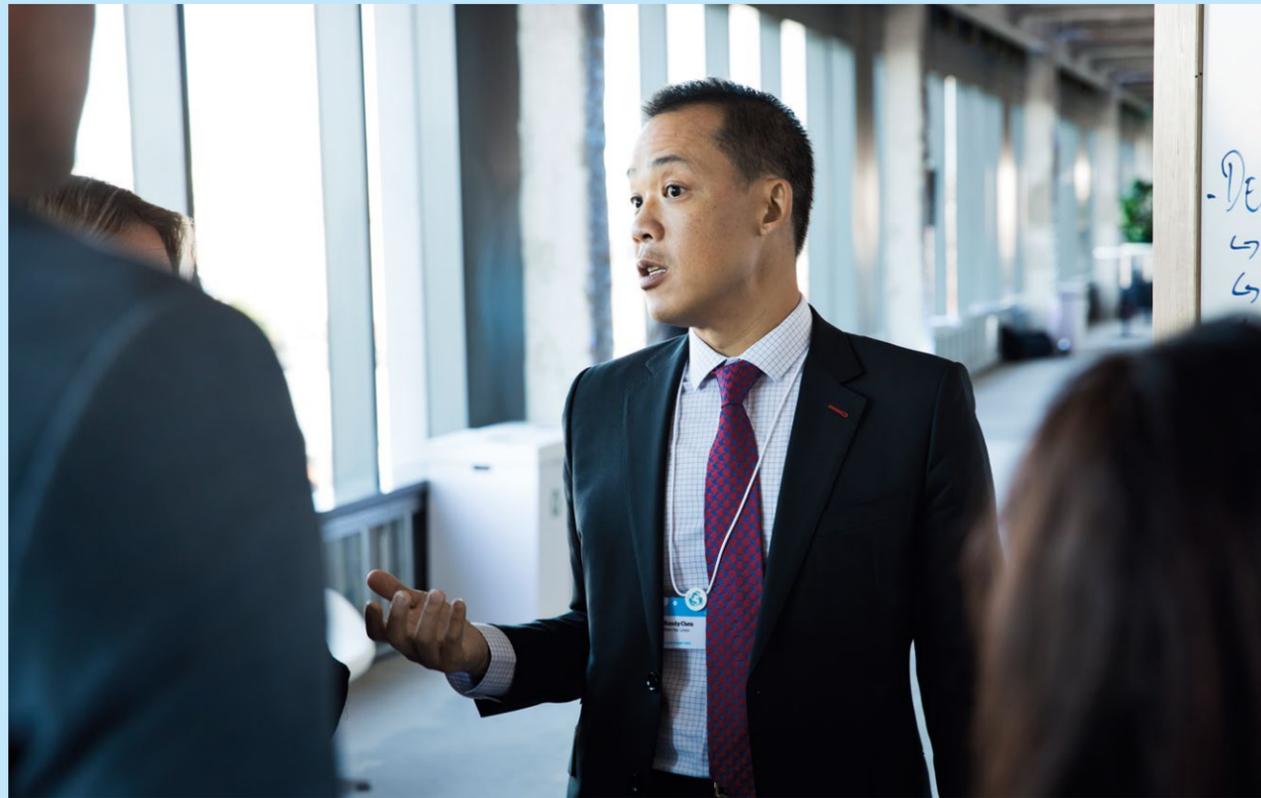
This working group considered some of the critical success factors for such initiatives and set out to design real-world strategies for maximizing the impact of Green Corridors. Participants divided into smaller groups focused on finance, planning and infrastructure, rules and regulations and supporting first movers. Their first task was to design a "Magic Remote Control" that could resolve critical challenges at the push of three buttons. Once these buttons had been programmed, participants heard from three different corridor initiatives: one led by the Port of Seattle, one led by shippers and shipowners transporting iron ore out of Australia and one started by the Government of the United Kingdom. Participants were then asked to consider these real-world examples and turn their magic buttons into actual proposals for green shipping design.



Key actions

- Develop shared implementation roadmaps to provide visibility and confidence in the timing and nature of investments
- Carry out ammonia safety demonstrations
- Mobilize public funding to support transition, particularly to close the fuel cost gap





POTENTIAL NEW OWNERSHIP MODEL

One of the most significant changes proposed came from the finance group. Participants suggested that Green Corridors would imply a new ownership model, with green shipping services provided in a utility model, underwritten by long-term contracts and government guarantees. They also suggested changing the nature of the vessel as an asset.

SHARED ROADMAP TO GIVE CONFIDENCE TO SUPPLIERS AND INVESTORS

Participants working on planning and infrastructure identified the need for coordinated planning. This might mean, for instance, creating a shared roadmap or implementation plan that spans the activities from fuel producers to cargo owners and gives visibility and confidence in the timing and nature of investments. Shared plans should also underpin discussions between shipowners, charterers and fuel producers and ensure suppliers get the necessary demand signal.

AMMONIA SAFETY DEMONSTRATIONS BY 2025

The rules and regulations group focused on ammonia as a shipping fuel and identified the need for ship operators, ports and class societies, amongst others to commit to pilot and demonstration projects establishing the safe handling from cargo storage to engine by 2025.

COMBINING GREEN PREMIUM AND PUBLIC FUNDS FOR COST AND RISK SHARING

The group discussing how to support first movers emphasized the operational expenditures associated with Green Corridors – i.e., fuel costs. Given the high costs associated with zero-emission fuels in the first years of these corridors, both public and private support were deemed necessary. The ability to leverage both a green premium from industry and dedicated public funds was seen as the backbone of a successful cost and risk-sharing model for a Green Corridor.



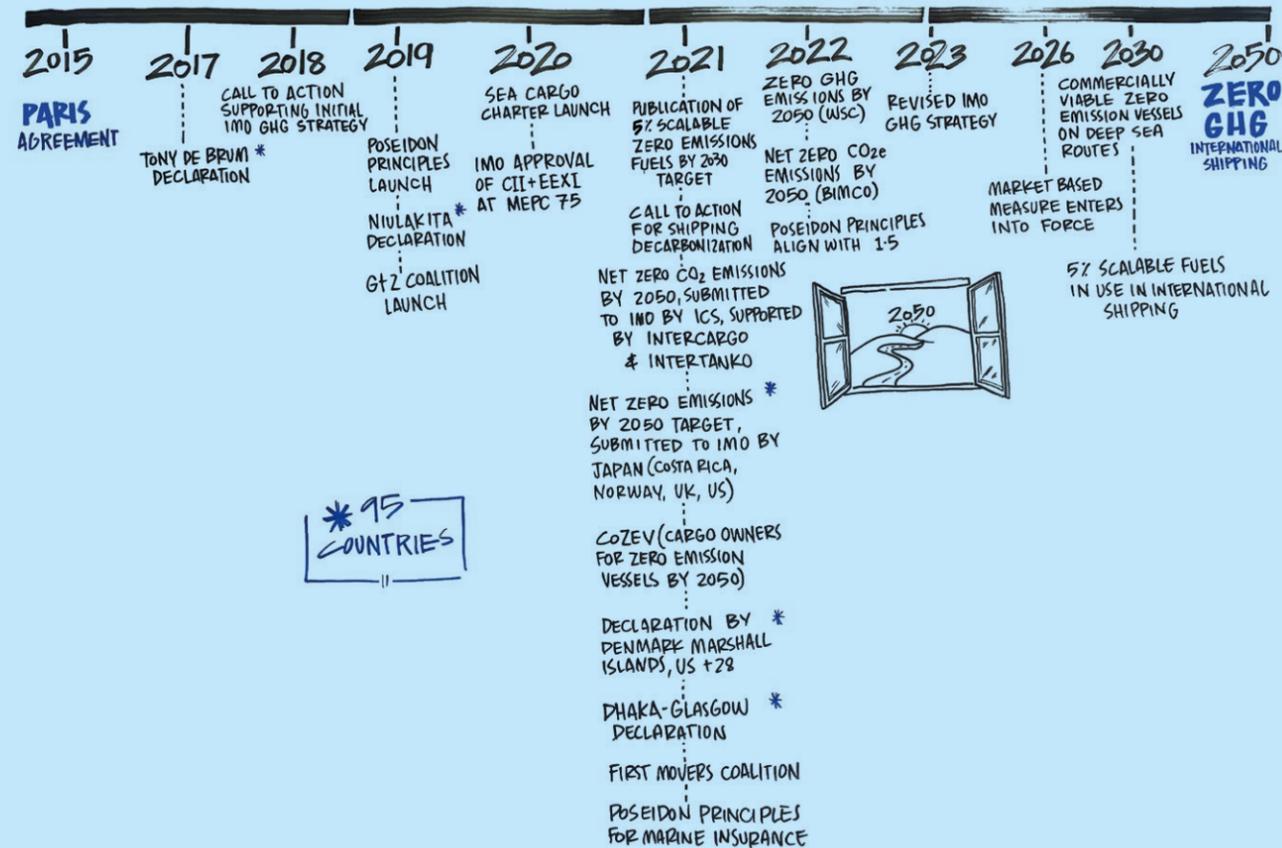
Do you want to learn more?

Critical window of opportunity for decarbonization policy at IMO

The IMO's revised greenhouse gas strategy will determine the future of shipping decarbonization. This working group called for ambitious targets and an equitable transition.

As zero-emission fuels and technologies are making strides and the alarming messages from the Intergovernmental Panel on Climate Change (IPCC) are coming across loud and clear, industry and government leaders are increasingly rallying to raise the ambition at the International Maritime Organization (IMO). The IMO plans to revise its initial greenhouse gas (GHG) strategy by mid-2023, which means there is a unique window of opportunity to inform future decarbonization regulation.

This working group discussed the opportunity for the industry to inform policymaking such that the outcome sets out a clear commitment to full decarbonization while providing the policies to make zero-emission shipping commercially viable. The session also explored the opportunity for governments to agree on a regulatory framework that is equitable, effective and sensitive to the needs and priorities of each government.



Key actions

- Advocate for ambitious decarbonization targets and supporting measures in IMO's revised greenhouse gas strategy
- Advocate for an equitable and just transition, for example by reserving part of carbon pricing revenues for small island developing states and the least-developed countries



THE ELEPHANT IN THE ROOM: EQUITY AND TRUST

Participants began by bringing up the elephant in the room: the issues standing in the way of a positive outcome at the Marine Environment Protection Committee meeting in London in July 2023. The top issue related to equity and the possibility that a range of countries concerned about the negative impacts of a full decarbonization target on their economies may block progress. Other issues included the misalignment between ministries in some countries and between stakeholders, as well as a lack of trust and common purpose.

FULL DECARBONIZATION BY 2050 AND A BASKET OF SUPPORTING MEASURES

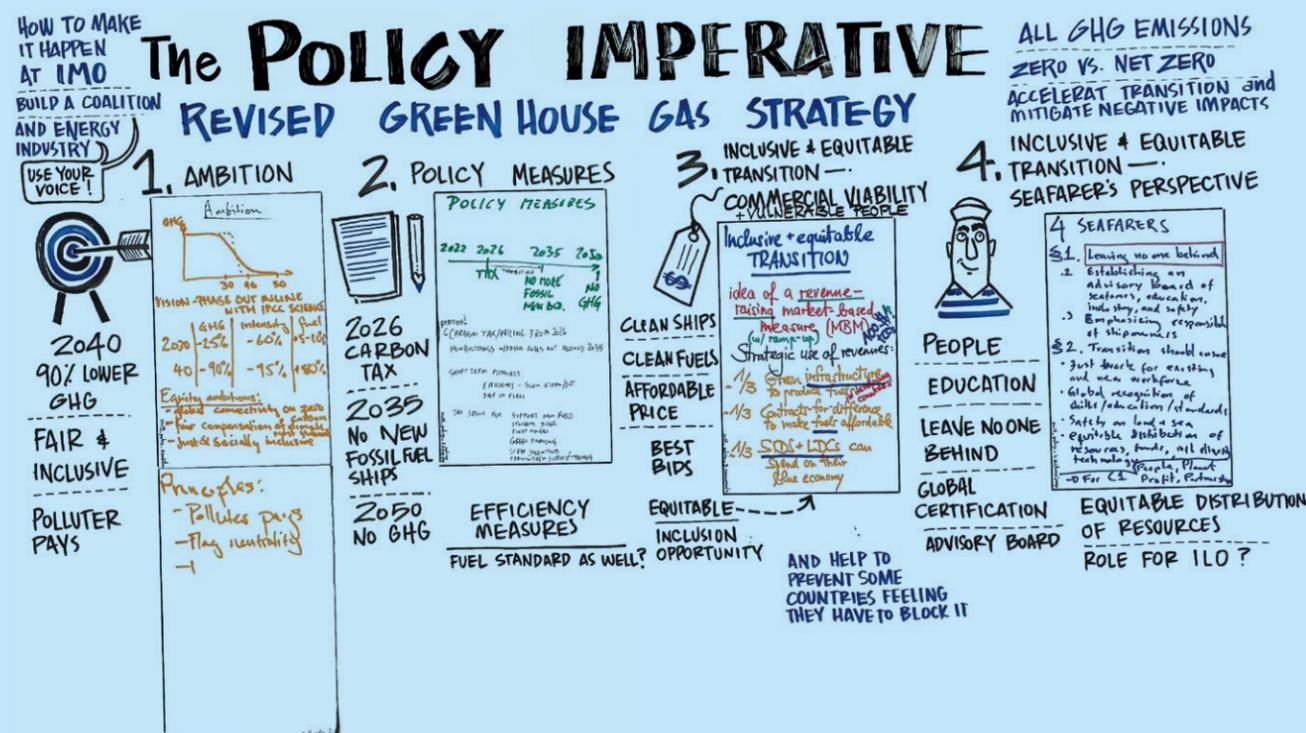
Participants representing the maritime industry, governments and experts then worked together to draft the ideal revised GHG strategy. They defined a vision of phasing out greenhouse gases in line with IPCC science and achieving full decarbonization no later than 2050. They also set tangible interim targets for 2030 and 2040, and applied the “polluter pays” principle.

To reach this ambition, participants proposed a basket of policy measures, including a carbon tax, a ban on new fossil-fueled vessels by 2035 and a fuel standard, combined with efficiency measures to encourage near-term emission reductions.

CARBON TAX REVENUES TO PROVIDE INVESTMENT AND COMPENSATION

Equity was at the center of the proposed GHG strategy, encompassing global connectivity around zero-emission fuels and fair compensation for negatively affected states. The participants recommended that, while part of the revenue generated through a carbon levy should be reinvested in green infrastructure and used to level the costs of zero-emission fuels to accelerate the transition, another part should be reserved for small island developing states and the least-developed countries. Concerns of middle-income countries should also be acknowledged, as well as their opportunities as potential producers and exporters of zero-emission fuels.

Participants also discussed the importance of ensuring decarbonization considers seafarers’ needs, for instance, related to training and safety.



“ To be 1.5 aligned does mean zero by 2050, but it also means a 90% reduction by 2040. That is a big challenge. But I don’t think it’s one you need to be afraid of, and I think that if you communicate fear about that challenge, you will fail to inspire the IMO and those who can help you achieve it to embrace it as well. That community needs two things: confidence and empathy. We’re asking governments to embrace radical change. We need to listen to what they’re terrified about and factor it into the solution. ”

Dr Tristan Smith, Associate Professor at UCL Energy Institute, Co-Founder UMAS

Do you want to learn more?

Efficiencies can unlock up to 25% emissions savings

Short-term actions that improve the technical and operational efficiency of existing vessels will play a critical role in reducing emissions today. They will also make the long-term transition to more expensive zero-emission fuels and new zero-emission vessels more manageable.

Operational and technical efficiency are key to achieving 2030 and 2050 greenhouse gas emissions reduction targets in line with the Paris Agreement. Up to 25% in fuel savings can be unlocked by changing how vessels are operated today. The failure to optimize speed is often driven by pressure from customers and contractual chartering arrangements, where a cost for one party becomes a profit opportunity for the other. However, research suggests that optimizing operational efficiency has the potential to reduce annual emissions by more than 200m tons of CO₂ and reduce annual fuel costs by US\$50 billion at today's prices.

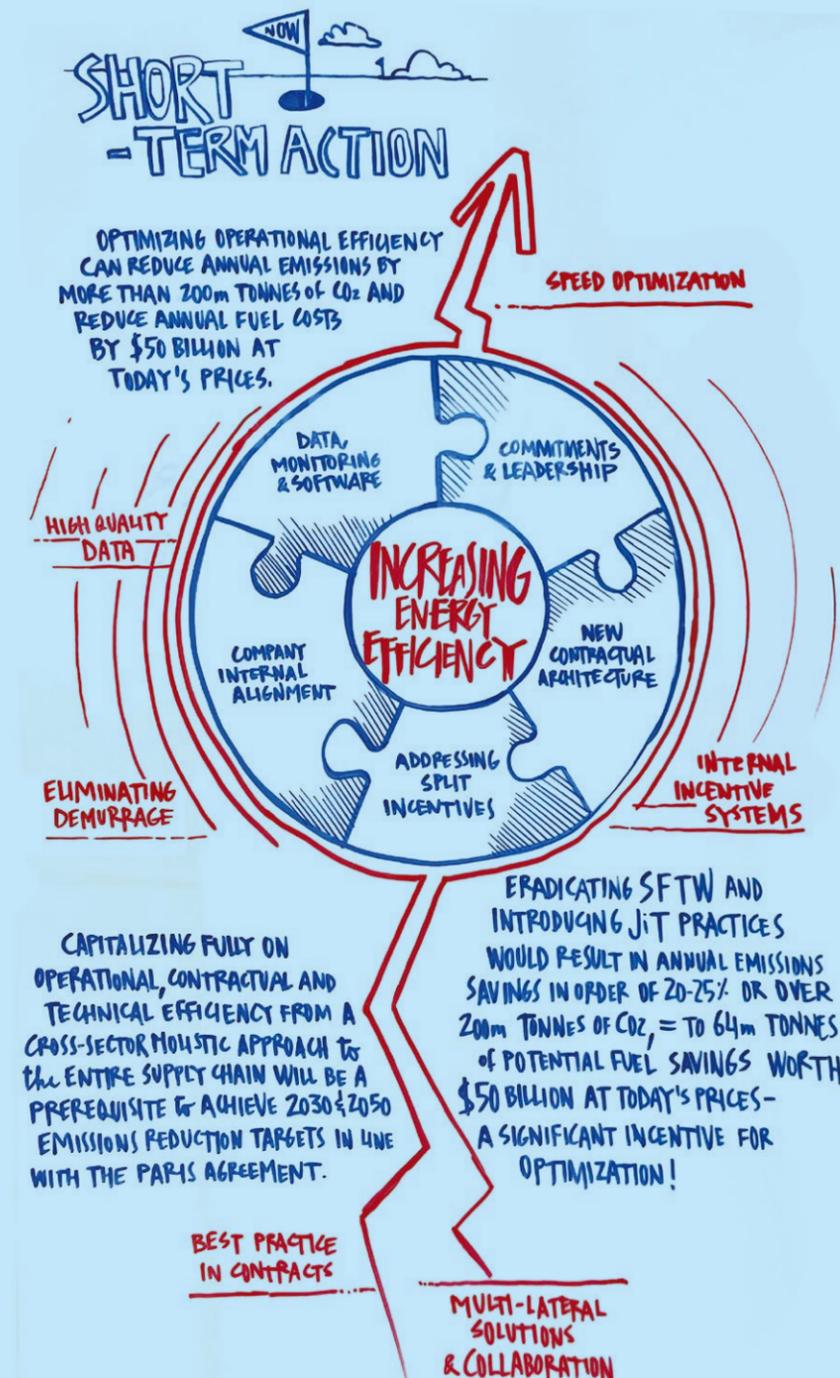
This working group debated the role of operational and technical efficiency in curbing emissions from the maritime shipping sector in the near term. Participants discussed how shipping stakeholders can work together to unlock this potential and set out a plan for what needs to happen during 2023 to shift shipping decarbonization into the next gear.

“ We need to start making people aware of the potential of short-term action to reduce emissions. Let's not forget we're talking about 20-25% savings. That's 200 million tons of CO₂ in the atmosphere we can save. ”

Hugo De Stoop, CEO, Euronav

Key actions

- Improve cross-sector data transparency and availability to encourage trust, collaboration and accountability
- Review contracts to promote fuel and emission savings, including benefit-sharing clauses
- Create conditions for efficiency measures by aligning across departments, internal KPIs, and corporate policy.



Working group outcomes

Efficiencies can unlock up to 25% emissions savings

CROSS-INDUSTRY COLLABORATION REQUIRES TRUST AND ACCOUNTABILITY

Participants pointed out that emission reduction, fuel savings and cost savings represent a powerful trifecta of opportunities, which is currently inhibited by a lack of communication between stakeholders. Enhanced data transparency and availability to all supply chain members will lead to increased trust, a requisite for collaborative action. However, data collection and sharing may need to go beyond the transport segment of the value chain to include trading and commodity markets. Standardized data protocols, some of which are under development, also require cross-industry collaboration.

Additionally, there is a need for accountability – for example, through the establishment of the correct indicators – which will drive change and eventually enable the tracking of goals.

ADDRESSING SPLIT INCENTIVES WITH INNOVATIVE CONTRACTS

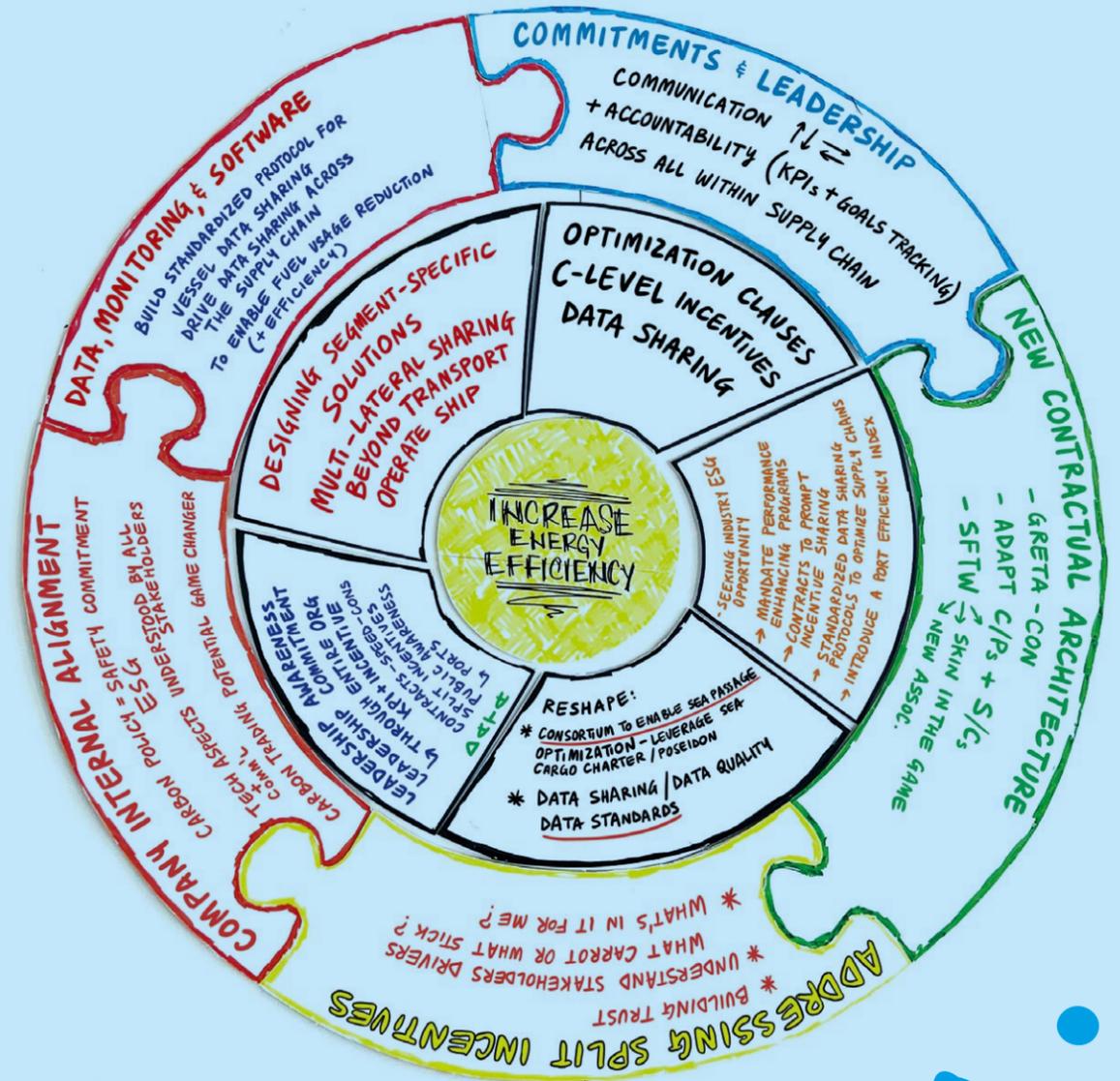
To cut emissions, the shipping sector needs a new contractual architecture to tackle the practice of “Sail Fast, Then Wait” and allow speed adjustments and sea passage optimization. The contracts could also include optimization clauses with incentives or even mandate performance-enhancing programmes by the shipowner.

To address the issue of split incentives between shipping stakeholders, participants proposed contractual agreements for benefit sharing. However, designing such “shared incentives” requires a good understanding of each party’s drivers. When one shipowner expressed doubts about whether solutions to the split-incentive issue between shipowners and charterers could apply to a time charter, several charterers and shipowners offered examples of benefit-sharing contracts already successfully used in practice. This difference of views demonstrates the need to increase awareness of existing solutions and to bring more actors into the conversation.

LEADERSHIP COMMITMENT IS KEY FOR INTERNAL ALIGNMENT

Participants suggested that companies seeking internal alignment around short-term actions could benefit from implementing carbon policies into their business plans, with carbon trading commonly seen as a potential game changer.

The working group specifically addressed the importance of leadership commitment to decarbonization goals and encouraged all shipping stakeholders to collaborate to achieve the best potential emission-saving outcome.



“ Let’s be accountable for what we communicate and what we commit to. Start having the difficult conversations. That means that we set the goals, we set the KPIs, but we also track against them. ”

Eman Abdalla, Global Operations & Supply Chain Director, Cargill Ocean Transportation

Do you want to learn more?



Creating a tide of talent by improving overall human sustainability

For the workforce of the future, purpose, flexibility, inclusivity and decent work conditions trump stability and financial rewards. Participants in this working group pointed out that increased accountability on human sustainability issues will make the maritime industry more attractive to the next generation of talent.

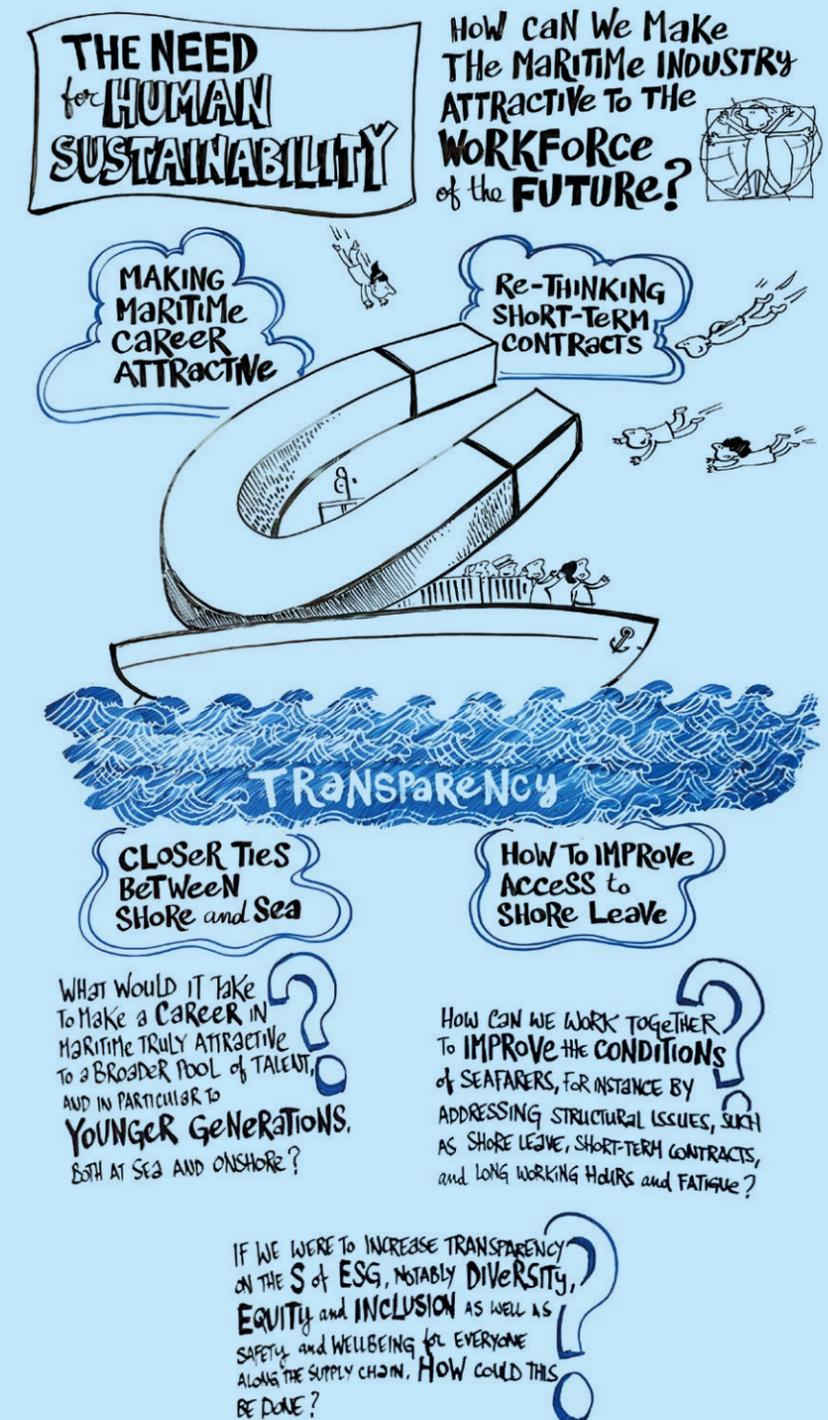
The way companies treat employees is increasingly under scrutiny. In the maritime supply chain, appeals have come not only from young professionals but also from governments, investors, customers and the public for the industry to significantly improve its overall transparency on human sustainability. Faced with increasing difficulty in attracting and retaining talent, industry leaders recognize the importance of collectively improving the “s” in ESG (environment, social and governance).

The participants in this working group thus explored what it will take for the global maritime industry to become truly attractive to the diverse workforce of the future. Winners of the Future Maritime Leaders essay competition contributed to the discussion and shared the outcomes of a workshop with more than 30 young maritime professionals recently hosted by the Global Maritime Forum.



Key actions

- Develop reliable social indicators for the maritime industry, for example by expanding the scope of Neptune Declaration Indicators
- Create a forum for the industry to engage with young maritime professionals
- Invest to build and train the workforce of the future





DIFFERENT PERSPECTIVES ON WHAT MAKES A CAREER ATTRACTIVE

Industry participants and young professionals concurred on the importance of purpose but had different views on what else makes a career attractive. The industry participants suggested the deciding factors included stable and financially rewarding employment, international opportunities and the employer’s responsible behavior, while the young professionals emphasized diversity, inclusion, flexibility, decent work conditions and career prospects. Both groups agreed the maritime industry’s value proposition is lagging behind other industries when it comes to addressing the career priorities of younger generations.

COMMITTING TO TRANSPARENCY ON HUMAN SUSTAINABILITY

On this basis, participants explored the benefits of a more ambitious pursuit of transparency and mutual accountability on human sustainability issues. This would lead to faster progress across the industry and help shape a strong, appealing ESG narrative to attract talent.

Several group members discussed developing reliable “s” indicators for the maritime industry. Some proposed indicators were measures on equitable remuneration, physically and psychologically safe work environment, staff retention, employee engagement, diversity, inclusion, sense of belonging and workforce fatigue.

CREATING A GLOBAL FORUM FOR MARITIME YOUTH

Participants discussed how to ensure that young professionals’ voices are actively heard. The group suggested a global forum to directly engage future maritime leaders in addressing human sustainability in the industry and making it more attractive to younger talent.

COLLECTIVELY INVESTING IN EDUCATING FUTURE TALENT

Participants also explored how companies can work together to build, train and educate the skilled workforce of the future. For example, companies could collectively fund new educational programmes, student scholarships, sea-shore integrated training programmes, case competitions and maritime programmes targeting children and young people in elementary and high schools.

MAKING THE MARITIME SECTOR’S TERMINOLOGY MORE INCLUSIVE

Part of the discussions focused on challenging some of the ways in which talent is currently categorized and organized in the industry. Participants pointed out the need to update talent categories to reflect more current, inclusive approaches to talent management (e.g., from “able-bodied” to “able-skilled” or from “seafarers” to “maritime professionals”).



Do you want to learn more?

Serving the trade needs of a global society in times of crisis

Collaboration across the value chain is required to build more resilient supply chains and safeguard the benefits of global seaborne trade. For this working group, ensuring the steady and fair distribution of critical goods might offer a start.

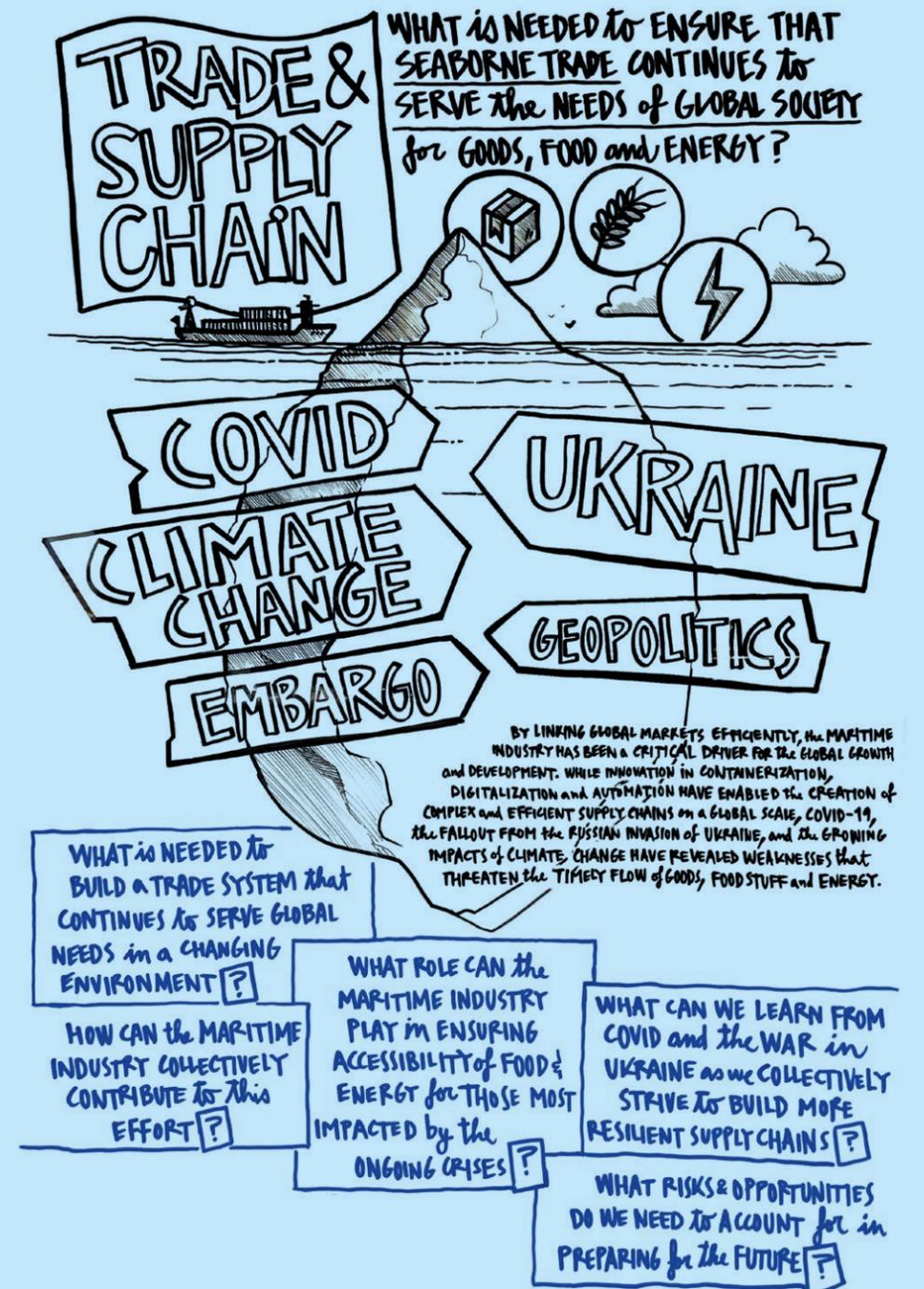
COVID-19 and the war in Ukraine have created disruptions across global supply chains, with the resulting food, energy and cost-of-living crises carrying disproportionate impacts across the world.

This working group explored the lessons learned from cascading disruptions and the partnerships needed to create more robust supply chains in times of emergency, particularly for critical goods.



Key actions

- Leverage the concept of shipping as a public good to inspire public-private collaboration in times of crisis
- Continue exploring opportunities for aligning industry incentives with the need for more resilient supply chains



RESILIENT SUPPLY CHAINS FOR CRITICAL GOODS

The working group explored potential emergency procedures for safeguarding essential supplies such as food and energy. One of the ideas put forward was “reverse sanctions,” in which the shipping of certain basic goods would be carved out from sanction policies. Corridors for critical goods were also mooted, akin to Green Corridors where specific trade routes enable the deployment of zero-emission shipping. Here, the steady and affordable provision of certain goods along set trade routes could help mitigate the price and supply distortions arising in crises and disasters. The group agreed that supranational oversight of any emergency response framework was needed to ensure credibility and transparency crucial to partnerships across the value chain.

PRESERVING THE ESSENTIAL ROLE OF SEABORNE TRADE

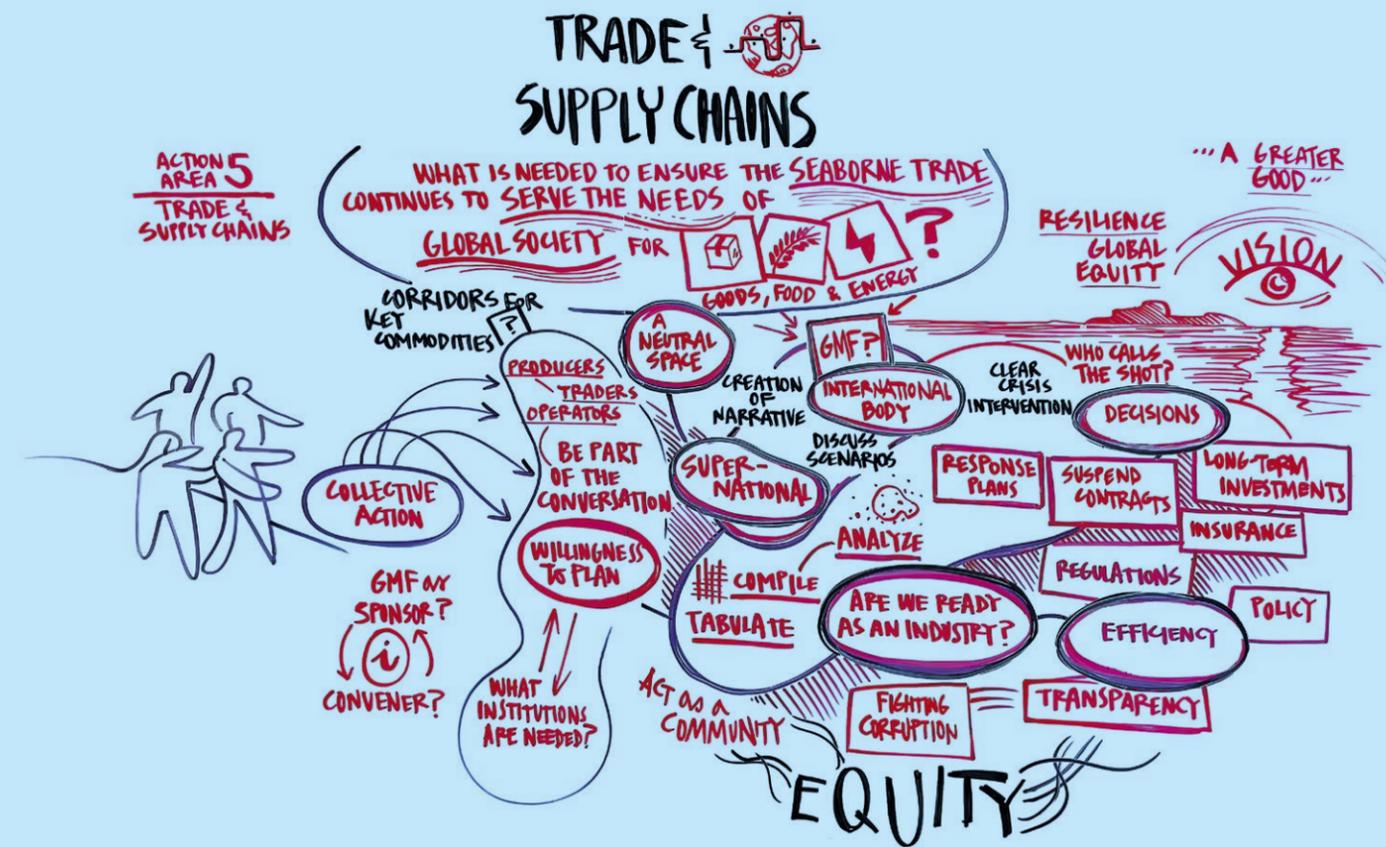
Participants also discussed the impact of reduced shipping availability on developing countries, as capacity has been diverted to more profitable routes during the pandemic. In response, the idea of shipping as a public good was raised; given that seaborne trade is a critical driver of economic growth and food and energy access, all stakeholders have a stake in

ensuring a robust and resilient system. This could inspire public-private collaboration toward building a more sustainable and equitable global trade system that would allow shipping to continue fulfilling its critical role in this.

PUBLIC-PRIVATE DIALOGUE TO ALIGN INCENTIVES

Nonetheless, the working group acknowledged that building resilient supply chains to guarantee the steady supply of critical goods in times of crisis would challenge the way the industry operates. During a crisis, surfeit capacity is urgently needed. Yet, currently, there is no commercial rationale to hold excess capacity in a non-crisis, given the Just-in-Time model that shipping relies on. Additionally, inefficiencies often create opportunities for the industry. Several questions were raised: Is there an interest in ironing out supply chain volatility at the risk of eliminating commercial opportunities? Who would, and should, make the long-term investment into contingency? What business models could address such misaligned or split incentives?

Participants concluded that broader stakeholder engagement – in particular, public-private dialogue – is required to explore win-win solutions that improve resilience and ensure equity in times of crisis.



“What is that space that allows the maritime sector to articulate something brave to the conflicting countries, conflicting ideologies in the world? If we were to think of certain essential goods and services – for example, the transportation of food and fertilizer – that could become some sort of sanction-free items? Is it possible to perceive certain goods as global public goods under even different types of crises, whether they be infectious diseases, or war or a new kind of conflict.”

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

Do you want to learn more?

Building momentum



In a **final conversation**, participants shared key takeaways from the two days of collaborative discussions. They focused on the priorities that emerged from the discussions, especially those that require working with others to tackle.



Human sustainability

“The ‘s’ [in ESG] is where it all happens. We all have to agree on what kind of people, how we’re going to get them and what it is going to cost to ensure that we have the right people today while thinking of 5, 10, 15, 20 years from now.”

Gerardo Borrromeo, Vice Chairman and CEO, Philippine Transmarine Carriers

Trade and supply

“The maritime industry has thrived on taking advantage of when there is a dislocation in the market, when there are supply chain challenges, when there are inefficiencies. We talked about “reverse sanctions” – finding three or four particular products or goods that are particularly valuable for society, and find a way to get those priority treatment.”

Marcus Baker, Global Head of Marine & Cargo, Marsh Speciality

Short-term action

“We need to start making people aware of the potential of short-term action to reduce emissions. Let’s not forget we’re talking about 20-25% savings. That’s 200 million tons of CO₂ in the atmosphere that we can save. If people don’t want to do it for the planet, they can do it for their wallet.”

Hugo De Stoop, CEO, Euronav

Seafarers

“Transport workers have become much more visible because of the pandemic. We must learn the lessons of the pandemic, and we must be able to deliver the sustainability for the maritime professionals. It is critical that we keep up the pressure.”

Stephen Cotton, General Secretary, International Transport Workers’ Federation

Green Corridors

“Done is better than perfect. None of us have huge teams to do this. My call to action would be: Reach out to people who run Green Corridors if you have something you can contribute. I have realized over the past two days that there is so much I don’t know. You might have pieces of the puzzle.”

Saskia Mureau, Director Logistics & Digital, Port of Rotterdam

Decarbonization and climate goals

“Let’s keep going, let’s double down on our efforts on shipping decarbonization. We’ve got storm clouds on the global economy. Let’s not get blown off course; let’s keep the discipline and show that shipping can do it.”

Jeremy Nixon, CEO, Ocean Network Express

Policy

“We may have these great ideas in this room. It’s how we articulate them outside of this room. Talk to the others, talk to the governments who may be an obstacle.”

Ambassador Albon Ishoda, Government of the Republic of the Marshall Islands



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Abhishek Pandey, Global Head, Shipping Finance, Standard Chartered Bank; **Adam M. Goldstein**, Executive Chairman, DLT Global; **Adriaan Rueppell**, Managing Director, Reederei Nord; **Agata Ramallo Garcia**, Vice President, Sustainability, Target; **Alan Ginsberg**, Chief Financial Officer, McAllister Towing & Transportation; **Alessio La Rosa**, Global Head of Freight, COFCO International; **Alex Staring**, Chief Operating Officer, Euronav; **Alexander Enström**, Executive Vice President, Marine, Hempel; **Alexander Saverys**, Chief Executive Officer, CMB; Alicia Eastman, President, Intercontinental Energy; **Alisa Kreynes**, Head, Ports and Shipping, C40; **Andrea Olivi**, Global Head of Wet Freight, Trafigura; **Andreas Nordseth**, Director General, Danish Maritime Authority; **Andreas Povlsen**, Managing Director and Head of Maritime Funds, Hayfin - Greenheart Management Company; **Andreas Rangel Ahrens**, Head of Climate, Inter IKEA Group; **Andreas Sohmen-Pao**, Chairman, BW Group; **Andrew McKeran**, Chief Commercial Officer, Lloyd's Register; **Andrian Dacy**, Managing Director, Global Head Transportation Group, JP Morgan; **Angela Chao**, Chair and Chief Executive Officer, Foremost Group; **Anne H. 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Partners

The Global Maritime Forum is supported by a visionary group of leading industry partners who share the Forum's ambition of creating a common platform to drive positive change that benefits not only their organizations and the industry, but society as a whole.

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Zodiac Maritime

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Welcome
The world has changed significantly over the past few years and many of the disruptions and changes will impact the maritime industry. As you think back to 2020 consider what has shifted in the world that should shape our future. Answer the question below.

What do you think will be the most significant disruption to the maritime industry in the next five years?



GREEN CORRIDORS

THE IMPORTANCE OF PUBLIC-PRIVATE COLLABORATION IN ENABLING SHIPPING DECARBONIZATION

GREEN CORRIDORS CAN CUT THROUGH COMPLEXITY BY:

- ENABLING FULL DEMONSTRATION OF GREENSHIP IN VESSELS AT SCALE
- PROVIDE CERTAINLY REQUIREMENTS FOR FUEL PRODUCERS AND PORTS & INFRASTRUCTURE LANDSIDE
- GENERATE STRONG DEMAND SIGNALS & VESSEL OPERATORS, SHIPYARDS, AND ENGINE MANUFACTURERS TO SCALE INVESTMENTS IN EMISSION VESSELS AND TECHNOLOGY
- ALLOW POLICY MAKERS TO CREATE AND TARGET REGULATORY MEASURES, FINANCIAL INCENTIVES, AND SAFETY REGULATIONS TO DRIVE INDUSTRY ACTION

203 DECARBONISATION PROJECTS HAVE BEEN UNDERWAY SINCE MARCH 2022

1 WHAT ARE THE CHARACTERISTICS OF A SUCCESSFUL GREEN CORRIDOR?

2 HOW CAN WE DESIGN PUBLIC-PRIVATE COLLABORATIONS TO SUPPORT THE ACCELERATED DEVELOPMENT FOR GREEN CORRIDORS?

3 WHAT KINDS OF GOVERNMENT PROGRAMS CAN STEER INDUSTRY ACTION & WHERE IT CAN BE MOST IMPACTFUL? WHAT ACTIONS CAN GOVT TAKE TO ENCOURAGE ACTION IN SPECIFIC CORRIDORS?

The POLICY IMPERATIVE

AMBITION AND ADDITIONAL TARGET PRINCIPLES

INCLUSIVE AND EQUITABLE COMMERCIAL VIABILITY

POLICY MEMBERS

INCLUSIVE & EQUITY: THE SEAMEN'S PERSPECTIVE

Annual

SHORT-TERM ACTION

OPTIMISING OPERATIONAL EFFICIENCY CAN REDUCE ANNUAL EMISSIONS BY MORE THAN 20% THROUGH: 1) REDUCING FUEL CONSUMPTION BY 5% THROUGH BETTER TANKER'S PRACTICES

2) REDUCING FUEL CONSUMPTION BY 5% THROUGH BETTER TANKER'S PRACTICES

3) REDUCING FUEL CONSUMPTION BY 5% THROUGH BETTER TANKER'S PRACTICES

Summit

THE NEED FOR BUDGETAL SUSTAINABILITY

MEETING MARITIME ENERGY ATTRACTING

CLOSING THE ACCESS GAP

HOW CAN WE DESIGN PUBLIC-PRIVATE COLLABORATIONS TO SUPPORT THE ACCELERATED DEVELOPMENT FOR GREEN CORRIDORS?





About the Global Maritime Forum

The Global Maritime Forum is an international not-for-profit organization dedicated to shaping the future of global seaborne trade to increase sustainable long-term economic development and human wellbeing.

Learn more at www.globalmaritimeforum.org