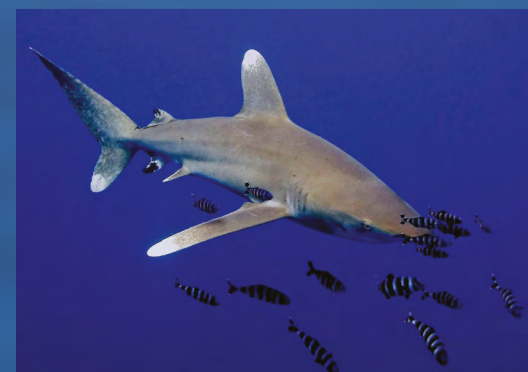


CORPORATE OCEAN RESPONSIBILITY: INDUSTRY LEADERSHIP AND COLLABORATION FOR SUSTAINABLE DEVELOPMENT AND THE BLUE ECONOMY

PAUL HOLTHUS, CEO, WORLD OCEAN COUNCIL

The ocean business community has the need and opportunity to advance sustainable development of the ocean. Working with governments, inter-governmental organizations and civil society to achieve the shared goal of a healthy, productive ocean and its sustainable use and stewardship is in the interest of responsible ocean businesses. In particular, ocean industries can play a key role in advancing ocean science in support of safe and sustainable operations through participation in “Smart Ocean-Smart Industries”. The World Ocean Council is a unique international, multi-sectoral ocean industry alliance for Corporate Ocean Responsibility.

Achieving sustainable ocean development requires a clear understanding of the status and trends in economic use of marine space and resources – as well as the potential new kinds and areas of use. Achieving a balance between ‘blue’ growth, jobs, and a sound maritime environment will largely be based on addressing the opportunities and challenges facing the diverse, extensive set of existing ocean activities. Success in improving ocean governance and sustainable marine development will require



coordinated leadership and collaboration by the diverse ocean business community. The World Ocean Council provides industry leadership in “Corporate Ocean Responsibility” to ensure both the long term health of the ocean and responsible industry use of space and resources.



“THE GLOBAL OCEAN CONTINUES TO BE HOME FOR AN EVER-INCREASING KIND, LEVEL AND EXTENT OF ECONOMIC ACTIVITY, INDUSTRY IS KEY TO OCEAN HEALTH AND SUSTAINABLE DEVELOPMENT,”

SHIPPING

International shipping traffic growth has been twice that of economic activity for the past 60 years, during which time world trade more than trebled to 45 per cent of global GDP. There are approximately 50,000 internationally operating merchant ships in service. Globally shipping is generally either as liquid cargo, e.g. oil, petroleum products, chemical, or as dry cargo/bulk goods, for which the most important are: iron ore, coal, grain, phosphates, bauxite, non-ferrous metal ores, feed and fertilizers. The most significant cargo worldwide is crude oil, which makes up about 25 percent of all goods transported by sea. Most goods otherwise travel by container ship and since 1985 global container shipping increased by about 10 per cent annually, with about 137 million containers transported in 2008.

OFFSHORE OIL AND GAS

Offshore oil and gas constitutes 45 per cent of the 2.7 billion barrels of recoverable oil left and energy firms are moving to deeper waters as shallow waters reservoirs are depleted. By 2035, deep-sea production will almost double to 8.7 million barrels a day, driven by developments in the US Gulf of Mexico, Brazil, West Africa and Australia (mainly for gas). The Gulf of Mexico remains the world’s most valuable deepwater

province, despite the many recent large finds elsewhere.

Since the discovery of ultra-deep oil reserves under a thick layer of salt off Brazil, the offshore oil and gas industry is exploring ever deeper and drilling further under the sea bed – exploring the subsalt layers 7 km below sea level (below 2.5 km of ocean water, 3 km of rock, and 2-3 km compacted salt). “Ultra-deep” wells, drilled in water at least 1.5 km deep, now account for more than half of all the world’s new discoveries.

FISHERIES

The world’s most productive fishing grounds are largely confined to areas that make up less than 10 per cent of the global ocean, often associated with areas of strong primary production of biomass in the oceans, i.e. continental shelves and upwelling areas. Marine fishery catches increased from 16.7 million metric tonnes in 1950 (86 percent of total world production) to a peak of 87.7 million metric tonnes in 1996. Since then, global landings of fish and seafood have declined, with fluctuations reflecting the variation in catches from a few highly productive areas, particularly the Northwest and Southeast Pacific that account for a large portion of pelagic species catches. Marine fisheries stabilized at about 80 million MT in 2009, and now represent 49 per cent of the world’s fish production. Based on average catches in the 2005–2009 period, the most productive fishery areas are the Northwest Pacific (25 per cent), Southeast Pacific (16 per cent), Western Central Pacific (14 per

cent), Northeast Atlantic (11 per cent), and Eastern Indian Ocean (7 per cent). The proportion of overfished stocks has increased from 10 per cent in 1974 to 30 per cent in 2009.

AQUACULTURE

Aquaculture provides half of the 15.7 per cent of marine animal protein consumed globally. Aquaculture has grown at 6.6 per cent per annum for many years, making it the fastest-growing animal-food-producing sector – much faster than the 1.8 per cent annual global population increase. While aquaculture production (excluding aquatic plants) was less than 1 million MT per year in the early 1950s, production in 2008 was 52.5 million MT, with a value of US\$98.4 billion. Aquatic plant production through aquaculture in 2008 was 15.8 million MT, with a value of US\$7.4 billion. By 2030 aquaculture will account for 65 per cent of fish protein production. World aquaculture is heavily dominated by the Asia-Pacific region, which accounts for 89 per cent of production in terms of quantity and 79% in terms of value, and is growing at more than 5 per cent a year. This is mainly because of China, which accounts for 62 per cent of quantity and 51 per cent of value.

OFFSHORE WIND AND OCEAN ENERGY

As of 2010, offshore wind farms had been installed by 12 countries, 10 of whom were in Europe. A total of 10 gigawatts (GW) of capacity had been installed, led by the UK, Denmark, the Netherlands, and Sweden.

The EU has a target of 40 GW of offshore wind power capacity by 2020 and 150 GW by 2030. The world ocean waves, currents, and tides are estimated to contain more than 5,000 times current global energy demand, with estimates that marine resources could feasibly provide 20,000 TWh of electricity per year, which is more than the entire global generation capacity. Developing technology to survive for long periods of time in the harsh marine environment presents many challenges.



MARINE, COASTAL AND CRUISE TOURISM

The number of cruise ship passengers has grown nearly twice as fast as world international tourist arrivals from 1998-2008. With about 14 million passengers in 2010, the industry is expected to grow at 8.5 per cent per year over the next decade. The 100 plus ships of the international cruise industry association account for about two-thirds of the world's cruise ships and about 70 per cent of cruise destinations are in the Caribbean, Mediterranean, Western Mexico and the South Pacific. In 2001, the North American cruise industry contributed US\$20 billion to the US economy, a US\$2 billion increase over 2000. In the Caribbean, tourism overall provides over 18 per cent of regional GDP (and more than 50 per cent in several individual nations), approximately 16 per cent of employment, and 25 per cent of foreign exchange earnings. Tourism receipts directly account for more than 75 per cent of total exports and indirectly contribute to the growth of other sectors including agriculture, construction, and manufacturing. Capital investment in the industry is estimated at US\$7.4 billion, or 21.7 per cent of total investment and generating one in seven jobs in the Caribbean.

increasingly at risk from the loss of the social license to operate. Many of the policy, practical and reputational aspects of ocean industry activities are now affected, if not dominated, by environmental concerns. These issues are affecting all industries that use ocean space and resources. This is creating important needs and opportunities for collaboration, synergies, and business benefits among the ocean business community.

CATALYZING INTERNATIONAL OCEAN BUSINESS LEADERSHIP AND COLLABORATION

The World Ocean Council (WOC) was established to address the ocean sustainability issues and opportunities critical to business. The UN Secretary-General's 2010 report on oceans and the law of the sea noted there is a need to "create awareness and understanding among industry of the ecosystem approach, marine biodiversity and marine spatial planning, develop regional ocean business councils and strengthen efforts to create a global cross-sectoral industry alliance to constructively engage in United Nations and other international processes relevant to oceans, through organizations such as the World Ocean Council."

The World Ocean Council (WOC) harnesses the potential for global leadership and collaboration in ocean stewardship by responsible ocean companies that are well placed to develop and drive solutions. Many companies want to address marine environmental issues, differentiate themselves from poor performers,



Above: As the health of the marine environment is affected by human use, there is an increasing need for ocean business community leadership and collaboration on sustainable development of the Blue Economy
Right: Paul Holthus

“THE WORLD'S OCEAN WAVES, CURRENTS, AND TIDES ARE ESTIMATED TO CONTAIN MORE THAN 5,000 TIMES CURRENT GLOBAL ENERGY DEMAND”

ADDRESSING OCEAN INDUSTRY SUSTAINABILITY CHALLENGES AND OPPORTUNITIES

The sustainable use of the dynamic, interconnected global ocean presents unique opportunities and challenges for ocean industries. As the health of the marine environment is affected by human use, ocean stakeholders are pushing for increased regulation in a variety of venues. Some of the most important governance developments are being pursued through the non sector-specific international policy processes that include oceans, e.g. the Convention on Biological Diversity (CBD) and the UN Convention on the Law of the Sea (UNCLOS), etc. Balanced, comprehensive information on industry efforts to address marine environmental issues is often not seen in these processes, and there is a need for strategic, coordinated industry participation. As a result, private sector access to ocean resources, services and space – even by companies with the best environmental record – is

collaborate within and across sectors, and engage other ocean stakeholders – and now there is a structure and process for companies to work on complex, intertwined, international ocean sustainability issues.

The WOC, with its international, multi-sectoral structure and process for leadership companies from the ocean business community is different from national or sectoral industry associations and is uniquely positioned to serve as a portal for this business community to work with other clusters and research institutions and consortia. A multi-sectoral and multi-stakeholder approach can result in cost-savings (e.g. collaborative research to develop best practices in sustainability and find science-based solutions to shared issues) and reduce the risk of costly, unplanned and unnecessary restrictions to responsible business operations in the marine environment.

Identifying problems and developing solutions must be based on good science, credible risk assessment, performance monitoring and the best available technology – and must be tackled at the scale at which the impacts are occurring. Companies with a long-term view of their ocean business are also looking to collaborate within and between industries on solutions. This not only applies to the companies that directly operate use marine space or resources, but also to the wide range of industries linked to, or dependent on, those direct ocean users. This includes marine technology, mining, manufacturing and many sectors. In fact, any company that transports its products by sea is part of the associated marine environmental impacts.

To identify and address the priority ocean needs, the WOC has created cross-sectoral industry working groups in the thematic programme areas that have emerged: ocean policy and governance; marine spatial planning/ocean zoning; operational issues, e.g. invasive species, marine debris, marine sound, marine mammal impacts, etc.; regional interests, e.g. the Arctic, Mediterranean, Caribbean; adaptation of ports and coastal infrastructure to sea level rise/extreme weather events; and the Smart Ocean-Smart Industries, i.e. data collection by industry.

Smart Oceans-Smart Industries is a flagship WOC initiative to expand, improve and better coordinate the role of industry in collecting and sharing ocean, weather and climate data. The objective of this initiative is to ensure a wide range of industry vessels and platforms are providing routine, sustained, standardized information on the ocean and atmosphere, contributing to describing the status, trends and variability of oceanic and atmospheric conditions and improving the understanding, modeling and forecasting of ocean ecosystems, resources, weather and climate. The Smart Oceans-Smart Industries programme is working to expand the number of vessels and platforms used

to collect standardized ocean, weather and climate data, improve the coordination and efficiency of data sharing and input to national/international systems and build on “ships/platforms of opportunity” programmes. At the present time, the WOC is moving forward on this initiative and defining next steps such as the value proposition and rationale for industry and science, an inventory of existing ships/platforms of opportunity programs, the “menu of options” for voluntary observations, interface requirements for platforms/payload, the principles, practice and platform for industry data sharing and access and regional pilot projects.

As the global ocean continues to be home for an ever-increasing kind, level and extent of economic activity, industry is key to ocean health and sustainable development. The private sector needs to ensure its access and social license, reduce risk, and implement solutions. The business value for the ocean business community coming from collaboration on sustainability, stewardship and science is compelling.

The WOC, the international multi-industry leadership alliance of ocean companies, has created a leadership opportunity for responsible ocean companies to address risks and opportunities and most importantly, a powerful tool in ensuring good governance for sustainable marine development. The growing ranks of WOC companies are finding direct business benefits in the synergies and economies of scale in collaborating with like-minded peers in other companies on these shared ocean industry challenges. As a result, an increasing number and range of ocean industry companies from around the world are distinguishing themselves as leaders in “Corporate Ocean Responsibility” by joining the WOC. The Smart Ocean – Smart Industries initiative of the WOC gives insight on how industry can also help in increasing ocean knowledge in support of science, society and a safe, sustainable Blue Economy.

ABOUT THE AUTHOR

Paul Holthus is the founding CEO of the World Ocean Council, the international business leadership alliance on “Corporate Ocean Responsibility”. The WOC brings together seabed mining, oil/gas, shipping, fisheries, aquaculture, tourism, offshore renewables and other ocean industries – creating unprecedented ocean business community leadership and collaboration in addressing shared marine sustainability challenges. Mr Holthus has held senior positions with the UN Environment Programme (UNEP) and international environment organizations. Since 1998, he has worked with the private sector to develop practical solutions to sustainable marine environmental development. He has worked in over 30 countries with companies, communities, industry associations, UN agencies, NGOs, foundations and governments.