IMO Symposium on Alternative Fuels
Zero Carbon Fuels in the Clean Maritime Plan
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Agenda

1. How DfT & MCA fit together
2. Policy Landscape for alternative fuels
3. Clean Maritime Demonstration Competition
4. COP26
5. MCA’s role
6. The challenge
7. What have we done
How DfT & MCA fit together

- UK’s ministry for all transport policy, including maritime: shipping, ports and harbours, security, safety at sea, crew training and certifications, sea passengers and vessel registration.
- Leads development of strategy & policy on shipping emissions (GHG & air quality), including development of alternative fuels.
- The UK’s maritime regulator.
  - Subject matter experts for UK at the IMO
  - Development of domestic regulation and translation of international obligations into UK law.
  - Survey and Inspection activity and enforcement.
  - UK Ship Register.
- Separate dedicated team with no regulatory approval capacity (Maritime Future Technologies) created.
Net zero by 2050: need a propulsion revolution

Source: Frontier, Scenario analysis: take-up of emissions reduction options and their impacts on emissions and costs: report, 2019
In 2050, zero emission ships are commonplace globally. The UK has taken a proactive role in driving the transition to zero emission shipping in UK waters and is seen globally as a role model in this field, moving faster than other countries and faster than international standards. As a result, the UK has successfully captured a significant share of the economic, environmental and health benefits associated with this transition.

**Maritime 2050**

**Vision**

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**Clean Maritime Plan**

- **Economic & technical research:**
  - Emission reduction pathways
  - Economic opportunities

- **2025 & 2035 aspirational targets**
  - GHGs & air quality
  - Underpinned by net zero

- **Policy commitments:**
  - Economics
  - Infrastructure
  - Innovation
  - Regulation.

**Transport Decarbonisation Plan**

Implementing net zero
Alternative fuel scenarios for the UK

Indicative alternative fuel scenarios published to support ongoing policy development as part of the Clean Maritime Plan:


Need for ongoing refinement of this work as we learn about technology & costs, in combination with further development of policy to steer towards trajectory for net zero by 2050
Clean Maritime Demonstration Competition

What?
- £20m grant funding competition, open to applications across the UK, to enable the development and commercialisation of mid-TRL clean maritime technologies
- Announced in November 2020 as part of Prime Ministers 10 Point Plan for a Green Industrial Revolution
- One-year programme to support a raft of *feasibility studies and demonstrations* which will set out investment-ready projects for future government or private sector investment.
- Open to range of different fuel types

Why?
- Promote deployment of clean maritime technologies and zero emission vessels – putting UK maritime sector at forefront of a global green industrial revolution.
- Support feasibility studies to provide blueprint for a network of projects/places ready for future investment
- Identifying which technologies are best suited to different operational scenarios, to support market and policy development

When?
- Aim to launch in mid-March, and award funding mid summer 2021
- Landmark opportunities at COP26
COP26

Operation Zero
Coalition of industry leaders across the North Sea’s offshore wind sector, working together towards having decarbonised vessels operating within the North Sea’s offshore windfarms by 2025.

Supported by DfT Technology Roadmap for decarbonising O&M vessels, to be published in coming months. Will consider fuels.

Clydebank Declaration
Ambitious global initiative encouraging Governments to form Clydebank Partnerships, in which two or more signatory members pledge to working toward decarbonising a shared maritime route forming a Green Corridor, considering the need to stimulate investment in fuels.
IMO Symposium on Alternative Fuels
MCA & the Maritime Future Technologies Team

Version 1.0

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February 2021
MCA’s regulatory responsibility

- Primary legislation Merchant Shipping Act 1995.

- Branches of the MCA are responsible for developing and updating most of the secondary legislation that falls under the MSA, on behalf of the “Shipping” Minister and Secretary of State for Transport.

- This includes the development and updating of legislation which implements international instruments like SOLAS, MARPOL, STCW and MLC but also includes domestic and some inland waterway legislation.

- We also enforce merchant shipping legislation through our Maritime Investigations Branch.
• Age old challenge that regulation is not able to keep pace with innovation in industry (primarily around Digitisation and Environmental) – emphasised by the prescriptive nature.

• We either become an enabler to the implementation of technologies without adequately understanding the risks or more likely become a blocker.

• We are entering a time where there needs to be a rapid change in technology (especially in the Emission Reduction space) compared to a relatively steady state.

• Divergence in technical solutions and a need for an un-bias holistic perspective to bring it all together and drive change.
What have we done?

- Formation of a dedicated team – Maritime Future Technologies.
- Building internal technical capacity and structure to manage input from external support as required.
- No regulatory approval function – this is key.
- Structured to enable us to be dynamic, fast paced, and collaborative, reflecting the pace of change in industry.
- Focus is on Emission Reduction and Autonomy.
What will the team do?

- Facilitate the implementation of Projects
- Support Regulatory Change
- Influence Change