## **DAY 1 > 26 JUNE 2024**

Carbon Capture, Utilization, Storage & Blue Hydrogen

**Chair Welcoming Remarks: Opening Plenaries and Carbon Capture Technologies** 

**CaptureMap: Market Developments** for the CCUS industry

A Path to Carbon-Neutrality **Accelerates Today** 

**Advancing CCUS Technologies to** Scale the Industry

**Lessons Learned from the Mikawa Post Combustion Capture Pilot Plant** 

**Direct Air Capture: Making It Happen** 

Meeting the Needs of Every Emitter -**CCUS Solutions for Today & Tomorrow** 

**Considerations for Combined Cycle Generation with Carbon Capture** 

Panel Discussion: Biotechnology in **Carbon Capture** 

**Strategic Forum** 

**Chair Welcoming Remarks and Opening Plenaries** 

In conversation with Greg Matlock: BIL and IRA- where are we now?

Carbon Capture Strategies: A US and **Global Perspective** 

**Prioritizing a Just Transition for the** Hydrogen Hubs (H2Hubs) Program

> **Hydrogen Project Financing** Masterclass

**Public and Private Partnerships to Accelerate Hydrogen Financing** 

Leadership Roundtable- Net zero targets and leading the energy transition

Hydrogen Production, Storage, and Infrastructure **Development** 

**Chair Welcoming Remarks: Low Carbon Hydrogen Production** 

**Decarbonizing Hydrogen Production** with Biofuels Chemical Looping

Hydrogen as a Pathway to a **Sustainable Future** 

**Hvdrogen Horizons** 

**Next Generation Electrolyzers for** Green Hydrogen

**Electrolyzer Economics Unveiled: Navigating the Cost Landscape** for Successful Green Hydrogen **Implementation** 

**Responsible Manufacturing of PEM Membranes to Advance the Hydrogen Economy** 

**New Electrolyzer Paradigms: What's** hype and what's worth watching?

**Fuel Cell Technology** 

**Chair Welcoming Remarks: Fuel Cells for Heavy Duty Applications** 

Recent Innovations in Electrolyzer & **Fuel Cell Technology** 

**Deploying Fuel Cell Electric Vehicles** 

**Model-based Approach for** Optimization of Propulsion System of a Heavy-Duty Class 8 Fuel Cell **Electric Vehicle** 

**Durable and Efficient Air Management System for HD Fuel Cell Applications** 

Panel Discussion: Comparison of Fuel Cells & ICE Powertrains in **Heavy-Duty Mobility** 

Low-Carbon Fuels and Propulsion

**Chair Welcoming Remarks: Opening** Plenaries and Hydrogen Fuels for **Heavy Duty Transport** 

**Enabling Project Economics With** the Use of Carbon Capture

**Building a Bridge to Hydrogen** 

**Hydrogen Embrittlement** 

**Hydrogen Injection Systems for Internal Combustion Engines** 

**Novel High Density Hydrogen for Heavy Transport** 

**Panel Discussion: Scaling Up Hydrogen Production for Heavy-Duty Mobility in the US: A Strategic Imperative** 

## **LUNCH & NETWORKING OPPORTUNITIES**

Chair Welcoming Remarks: Carbon **Transport and Infrastructure** 

**CO2 Transport Pipeline Best Practices** for Carbon Management Business

**CO2 Compression Technologies and Recent Improvements on Integrally Geared Compressors for CO2 applications** 

**High Efficiency Cooling Systems for Carbon Capture, Transportation** and Storage

**Control Valve Challenges and Solutions in CCUS Applications** 

**Panel Discussion - Retrofitting Existing Infrastructure for Carbon Transport** 

**Chairman Welcoming Remarks: Carbon Capture Project Finance** 

**Investing in Tomorrow** 

**Development of an Advanced Cost Estimation Tool for Carbon Capture, Utilization, and Storage Projects** 

Leadership Roundtable: Surviving **Beyond Subsidy: Building a CCS Business Model That Lasts** 

**Chairman Welcoming Remarks: The Hydrogen Value Chain** 

The Hydrogen Value Chain: Opportunities, Challenges, and **Potential Solutions** 

**Accelerating Scale Up of the Hydrogen Economy with Systems-Level Strategic Evaluation** 

**Latest Developments and Experiences in Certifying Hydrogen Readiness of Power Plants and Other Existing Infrastructure** 

Panel Discussion- Ports as a **Gateway to Market Lift-off for Hydrogen and it's Derivatives**  **Chairman Welcoming Remarks: Fuel Cells for Aviation and Marine** 

**Cryogenic Cooling of Hydrogen based Aircraft Propulsion System** 

**Challenges and Solutions when** introducing Hydrogen as a Fuel for the Maritime Sector

Panel Discussion- Hydrogen as the Energy Nexus: Combining ZEV **Fueling and Grid Support** 

**Chairman Welcoming Remarks: Low-Carbon Aviation** 

**Dual Hydrogen-Jet Fuel Medium Range** Aircraft-a path to zero emissions

**CO2 Utilization for eFuels** 

Panel Discussion- The Role of SAFs in Green Aviation

## **DAY 2 > 27 JUNE 2024**

Carbon Capture, Utilization, Storage & Blue Hydrogen

Chair Welcoming Remarks: First of a **Kind Projects** 

**Beneficial Early Adopters of Carbon** Capture

Learnings from the Delivery of FOAK **CCUS FEED Projects** 

**BioEnergy with Carbon Capture -**Unlocking the value of additional revenue streams

**Utilizing Carbon for Enhanced Oil** Recovery

An Offshore Contractor in CCS -Noble Corp's Initial Lessons from the **Greensand Project and Other Initiatives** 

**Panel Discussion- The Latest Developments in Monitoring**, **Reporting and Verification** 

**Strategic Forum** 

**Chair Welcoming Remarks: Energy** Security and the Global Hydrogen Market

**Scaling Technologies for the Future** 

**Site Selection Considerations for** the Hydrogen Industry

Securing Your Hydrogen Future: Safeguarding Assets, Protecting People & Ensuring Compliance

Green & Low-Carbon Hydrogen in the US: focus on certification & transparency for global market access

Panel Discussion-Hydrogen **Markets Outside of the US** 

Hydrogen Production, Storage, and Infrastructure **Development** 

**Chair Welcoming Remarks: Hydrogen Infrastructure** 

Oxygen Utilization from Electrolysis **Plants: Use Cases and Viability** 

**Efficient Electrolysis Waste Heat** recovery for Water Purification

**Balanced Approach of Materials Selection for Hydrogen Services** 

Polyimide for Hydrogen Wear and **Sealing Applications** 

THera™ SEAL: the next gen sealing solution for high pressure gaseous hvdrogen storage

**Run-time Optimized Compressors** for LH2, Green Ammonia and **Pipeline Processes** 

Panel Discussion- Hydrogen Safety for Storage and Transportation

**Fuel Cell Technology** 

Chair Welcoming Remarks: Fuel Cell **Development and Manufacturing** 

1Hz - Think Big, Start Small - How to Ramp up Fuel Cell and Electrolyser **Production** 

In-line Inspection for Fuel Cell and **Electrolysis Production** 

**Development of advanced sintering** technology for industrial applications at Idaho National Laboratory

**Production Technology for Bipolar Plates of Fuel Cells and Electrolyzers** - Anything but Simple

Advancements in Gas Diffusion Layers **Designs for Next Generation High Performance Fuel Cells** 

**Panel Discussion- Powering the** Hydrogen Future: fuel cells for remote and back-up power systems Low-Carbon Fuels and Propulsion

**Chair Welcoming Remarks: Marine** and Stationary Applications

A net-zero approach to CO2 emissions - CCU & PtX

Panel Discussion: eFuels- Exploring the potential of eFuels in marine and shipping

Live Demonstration of an Agile **No-Cost Screening Tool for the** Feasibility of Hydrogen-Fueled **District Energy Systems** 

**Hydrogen Powered Gas Turbines** 

An evaluation of hydrogen fuel use and handling for industrial stationary equipment

## **LUNCH & NETWORKING OPPORTUNITIES**

**Chair Welcoming Remarks: Blue** Hydrogen

**Technologies of Choice for Mega Scale production of Low Carbon Energy Vectors** 

Low Carbon Hydrogen Technology optimization - moving projects forward to achieve Net Zero targets

**Panel Discussion- A pathway to** blue: pioneer's experience in applying today's evolving standards to an existing facility's low carbon products

**Chairman Welcoming Remarks:** Thought Leadership and the Future of Carbon Markets

**Assessment of Climate Change Mitigation Strategies** 

Panel Discussion: Regulation of CO2 Storage in North America: Managing **Risk and Ensuring Compliance with Permits and Licenses** 

**Panel Discussion- The Role of Voluntary Carbon Markets in Net** Zero

**Chair Welcoming Remarks: Pilot Projects and Novel Hydrogen Production Methods** 

**The Economics of Small-Scale Hydrogen Pilot Projects: Challenges** and Lessons Learned

> Carbon-Negative Hydrogen **Production**

**Decentralizing Hydrogen: Innovations and Impacts in a Global** Context

> **Panel Discussion: Digital Technologies**

**Chair Welcoming Remarks: Fuel Cell Optimization** 

In-situ poisoning: an advanced method for the determination of the impact of organic/inorganic substances on PEM **Fuel Cell membranes** 

**Optimization of Power Output of PEM Fuel Cells in Terms of Temperature** and Humidity of Operation

**The New Frontier of Fuel Cell Filtration and Separation** 

**Panel Discussion: Using Simulations** to Improve Fuel Cell Efficiency and **Durability** 

**Chair Welcoming Remarks** 

Panel Discussion: eFuel Production **Outside of the US** 

**Beyond Hydrogen: Striving for** a Low Carbon Future through **Ammonia and E-Methane** 

E-Methanol: A Convenient Liquid **Hydrogen Carrier and a Carbon**neutral Drop-in Fuel to replace Gasoline, Diesel and Marine Bunker Oil

> Panel Discussion: Hydrogen **Derivatives**