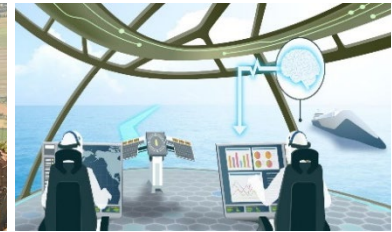


14th Symposium on
High-Performance Marine Vehicles – “Technologies for the Ship of the Future”



Cortona / Italy, 29-31 August 2022



Topics: ultra-efficient & zero-emission ships / EEXI & CII issues / alternative fuels / electric ships
advanced designs / shipyard 4.0 / future materials / future use of oceans / blue economy /
intelligent & connected ships / future antifouling / biomimetic marine technologies

Organiser: Volker Bertram (volker@vb-conferences.com)

Advisory Committee:

Carlo Bertorello	Naples University	Robert Dane	Ocius	Kohei Matsuo	NMRI
Carsten Bullemer	Maritime Data Systems	Stefan Harries	Friendship Systems	Geir Axel Oftedahl	Semcon
Emilio Campana	CNR	Thomas Hildebrandt	Numeca	Pierre Sames	DNV
Roy Campe	CMB	Jan Kelling	Hasytec	Noah Silberschmidt	Silverstream Technologies
Andrea Coraddu	TU Delft	Jiulun Liu	Wuhan Univ Technology	Teus van Beek	Wärtsilä

Venue: The conference will be held at the “Oasi Neumann Hotel” in Cortona/Italy

Format: Papers to the above topics are invited and will be selected by a selection committee.
Proceedings will be electronic pdf version in colour.

Deadlines: anytime Optional “early warning” of interest to submit paper
18.5.2022 First round of abstract selection (1/3 of available slots)
18.6.2022 Second round of abstract selection (remaining 2/3 of slots)
1.8.2022 Final papers due (50 € surcharge for late submission)

Fees: **650 € / 350 €** regular / PhD student – early registration (by 1.8.2022)
750 € / 400 € regular / PhD student – late registration

Fees are subject to VAT
Fees include proceedings, lunches and coffee breaks, and conference dinner
Fees apply also to authors

Sponsors: Tutech Innovation, Ecap Marine, Hasytec – further to be announced

Media Partner: Hansa

Information: volker@vb-conferences.com or volker.bertram@dnv.com

Sneak preview of planned papers (only first author displayed)

Anriette Bekker (Stellenbosch University) - *Mariner 4.0 Digital Twin*

Volker Bertram (DNV) – *Towards a biocide-free antifouling future exploring lesser travelled paths*

Ulrich Bernhardt (DNV) – *Effective Digital Training Solutions to Support the Maritime Digital and Decarbonization Transitions*

David Connolly (Silverstream Technology) – *Proving Energy Savings in Air Lubrication Technology*

Robert Dane (Ocious) – *Cooperation Makes it Happen: Autonomous Drones with Sustainable Propulsion*

Colm Dudley (Warwick University) - *WarwickSub: Human-Powered Submarine Project as Test Platform for Advanced Technologies*

Jonathan Evans (StrucTEAM) - *Sustainability developments for composite materials in maritime applications*

Ramesh Babu Govinderaj (DNV) – *Additive Manufacturing for Maritime Applications*

Tim Heusinger von Waldegge (Fraunhofer) - *Underwater hull cleaning by laser: Feasibility and prospects*

Thomas Hildebrandt (Numeca) – *Using Machine Learning for Rapid Propeller Design Tools based on Numerical Series*

Thomas Hipke (Fraunhofer IWU) - *Metal Foams in Shipbuilding*

Morten Løvstad (DNV) - *The Decarbonizing Quest for Future Bulk Carriers*

James Mason (Univ Manchester) - *Stochastic Uncertainty in Fuel-Optimised Ship Routing: How Weather Forecasts Hinder the Carbon Savings from Wind-Assisted Weather Routing*

Ruben J. Paredes (ESPOL) - *Optimal conceptual design of a zero-emission interisland service craft*

Lars Ravens (Ecap Marine) – *Clean Power Solutions for the Maritime World*

Jonas W. Ringsberg (Chalmers TU) - *Analysis of uncertainties in the prediction of fuel saving from WASP installations*

Benjamin Scholz (DNV) - *Recent Developments in Maritime Fuel Cell Technology Projects*

Fabian Thies (Chalmers TU) - *Hull form optimization for wind-powered and wind-assisted ships*

David Thomson (AVEVA) - *The Maritime Galaxy of the up-and-coming Metaverse*

Vincent Schneider (Fraunhofer CML) - *The development of a battery hot swap prototype for use on the Autonomous Surface Vehicle SeaLion*

Svend Soyland (Nordic Energy) – *First Experience with Hydrogen and Ammonia as Shipping Fuels*

Syb ten Cate Hoedemaker (Maritime Battery Forum) – *Overview of Current Status of Maritime Batteries*