

News from CMSS

Welcome to new PhD student

On March 1 Anna Uhd Bøge began at CMSS as a scientific assistant, and from June 1 she became the new PhD student of CMSS. The plan is that Anna will conduct a register-based PhD study, where she will investigate the occurrence of cardiovascular diseases amongst Danish seafarers throughout a period of 30 years. Furthermore, she will investigate whether the occurrence of cardiovascular diseases is dependent on occupation on board and type of vessel. Anna has a Master's degree in Medicine with Industrial Specialization from Aalborg University specializing in Biomedicine, where she previously has researched in different subjects including possible biomarkers for Alzheimer's disease. Anna has a general interest in health and hopes by the aid of her research to contribute to more knowledge about maritime health.



Anna is originally from Aalborg but looks forward to working in Esbjerg and to experience the south-western part of Jutland.

IMO has asked CMSS for assistance

CMSS will be assisting IMO in revising 'the International Medical Guide for Ships'

The World Health Organisation (WHO) has requested the International Maritime Organisation (IMO) and the International Labour Organisation (ILO) to undertake a joint revision of the International Medical Guide for Ships (IMGS), where there will be a need for IMO to provide assistance during the whole process.

WHO has developed a concept note summarizing the areas/activities to be addressed, including area/activities where IMO will be offering assistance. IMO has invited CMSS to take part in providing the necessary assistance. CMSS appreciates the invitation and has accepted. The assistance that CMSS will provide in this joint activity with WHO, ILO and IMO is in line with the Centre's strategy to increase authority services.

A team of experts has been formed for the purpose:

Senior researcher Olaf Chresten Jensen, CMSS

Professor Jesper Bo Nielsen, Head of Department, IST

Senior researcher Lisa L. Froholdt, Head of Research, CMSS

Lisa L. Froholdt will be Principal Investigator of the project and liaison to IMO.

New collaboration with Fredericia Maskinmesterskole

SDU enters a formal collaboration with Fredericia Maskinmesterskole

Lisa Loloma Froholdt, Head of Research and Senior Researcher at the Centre of Maritime Health and Society (CMSS), University of Southern Denmark has made a collaboration agreement on research and development with Resource Director Jens Færgemand Mikkelsen, Fredericia Maskinmesterskole (FMS).



The aim of the newly established collaboration agreement between CMSS and FMS is to increase collaboration within research and development. Resources will be used to develop mutual co-operation relations, e.g. through joint educational activities and research project collaborations.

The collaboration has already resulted in a research project idea in the field of green transition. Associate Professor Niels Tingleff Haastrup from FMS who has a Master's degree in Environmental Law is particularly interested in working with this subject. Both Jens Færgemand Mikkelsen and Niels Tingleff Haastrup find the project very relevant in relation to the further development of the knowledge base in the subject "Ship propulsion" at FMS.

Both FMS and CMSS already collaborate with DTU, AAU and the company Scoutbase in Svendborg. Lisa L. Froholdt is very happy to have brought about this agreement and looks forward to the further collaboration within such an important topic for the Blue Denmark.

As part of its [2020-2024 strategy plan](#), CMSS has already committed itself to [the United Nations \(UN\) Sustainability Goal #4](#), Quality in Education. In continuation of this, the agreement will pay special attention to the UN Education 2030 Agenda¹, which encourages all countries to offer Flexible Learning Paths (FLP) for their students. FLP can generate many advantages for maritime students regarding employment opportunities once they enter the labour market.

The co-operation agreement is completely in line with the many other activities that already take place in the maritime industry to secure the future of the profession, for instance The Danish Maritime Authority's focus on green shipping as well as the work carried out in Denmark's maritime cluster MARLOG².

¹ UNESCO The United Nations Education 2030 Agenda encourages all countries to develop well-articulated education systems that offer FLPs for their students. Providing multiple entry points to and progression routes between institutions, courses, or educational levels brings many benefits for individuals and society, particularly in terms of equity, employability, or efficiency in the management of resources.

²The maritime cluster organization MARLOG is Denmark's official cluster organization for the maritime industry and logistics sector and works to promote Denmark as a sustainable and innovative leading maritime and logistics powerhouse for the maritime industry and logistics. MARLOG works to promote increased competitiveness for the maritime industries and logistics through innovation, transformation, and competence development. MARLOG supports companies' green transition, digitalisation and access to knowledgeable employees. MARLOG must create value by acquiring knowledge, facilitating networks, and initiating new collaborations across the entire industry and relevant sectors.

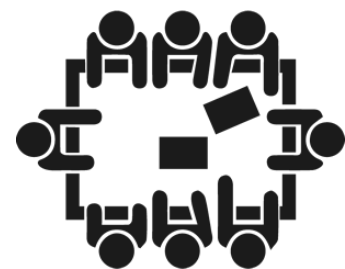
Knowledgeable Advisory Board

CMSS is privileged to have competent advisory board consisting of six members from the private and public part of the maritime industry. The group also includes the Head of Research at CMSS and the Head of Department at IST.

There are eight members in total, and today the group consists of the following persons:

Klaus Gregersen, the Danish Maritime Authority

Philippe Bauchy, the Danish Maritime Authority



Søren Pedersen, Oil Gas Denmark (new member)

René Andersen, Sea Health and Welfare

Søren Enemark, Danish Shipping

Flemming N. Christensen, the Danish Fishermen's Occupational Health Services

Lisa L. Froholdt, Head of Research at CMSS

Jesper Bo Nielsen, Head of Department at IST

The Advisory Board meets once a year, just before or after the summer holidays, for a presentation of new research results. In continuation of this, a steering group meeting is held, where the year's activities as well as current and upcoming research projects and ideas are deliberated. The strategy plan and the work with the selected research themes for the period are also discussed. In addition to the annual advisory board meeting, the CMSS management also meets with the representatives from the Danish Maritime Authority once a year to evaluate the Centre's performance contract.

The Advisory Board interacts with and guides the management of CMSS in relation to the Centre's vision and strategy and contributes with good advice to the development of its research and collaboration with both the Blue Denmark and the international maritime industry in relation to health and safety.

New member of CMSS's Advisory Board

Head of Research Lisa L. Froholdt has recently welcomed Søren Pedersen as a new member of the Advisory Board at CMSS. Søren Pedersen is HSE Expert in the industry organisation for the Danish upstream oil and gas industry, [Oil Gas Denmark in Esbjerg](#).

Søren comes from a previous position at Fredericia Maskinmesterskole, where he has worked as a research and development coordinator, and he will no doubt be able to impart a lot of knowledge to his work in CMSS. What concerns Søren right now is the need to expand the pool of employees in connection with the energy transition. "Production of oil and gas will end in 2050, and that makes Oil Gas Denmark an exciting workplace, as the industry really has to go through a change", says Søren Pedersen. "We are working on the plans. Yes, we produce oil and gas, and we are still good at what we do. We want to contribute with the knowledge we have and the many years of experience", he says. "We stand by our name and have a lot of knowledge and know-how about risk assessment and safety training", he adds. At the moment, he is busy telling the story of the company and the task they are facing right now.

Søren hopes to contribute to CMSS through his interest in education and by collaborating on projects. "Among other things, your project with ESVAGT, I think it could well be a bridge builder to working with employees' health. I have noticed the article in the media about your project. You look at health in many ways. I often say that fact-based science is necessary, and that we need to include it in our discussions. I have also written some articles myself and use that knowledge in many contexts". Søren would very much like to help create new knowledge. "When you discuss, it's easier to relate to things and do something about it when it's based on knowledge. Here your research unit plays an important part", Søren concludes.

News about ongoing collaboration projects

COVID-19 Preparedness and action for cruise ships

Senior researcher Despena Andrioti Bygvraa participates in the [EU HEALTHY GATEWAYS](#) network. The aim of this Joint Action is to support Member States in improving their preparedness and response capacities to prevent and combat cross-border health threats from the transport sector.



Foto: Martin Sanchez, Unsplash

Recently, the partners presented revised versions of two policy advice documents for cruise ships preparedness and response to COVID-19 pandemic:

1. Advice for restarting cruise ship operations after lifting restrictive measures in response to the COVID-19 pandemic (Version 2 – April 2021)
2. Advice for cruise ship operators for preparedness and response to an outbreak of COVID-19 (Version 4 – April 2021)

This advice was prepared after a request from the European Commission's Directorate-General for Health and Food Safety (DG SANTE). The purpose is to provide general guidance to EU/EEA Member States and to cruise lines about options for measures on cruise ships (of any capacity or

flag state that sail on an international voyage) that could be applied after lifting the restrictive measures implemented in response to the COVID-19 pandemic in 2021.



Foto: Adam Gonzales, Unsplash

Cruise ships are semi-closed environments providing shared facilities for many people on board. Since the beginning of the COVID-19 epidemic, outbreaks have been reported on board cruise ships affecting both passengers and crew. Unprecedented challenges were faced by both the cruise ship industry, the public health authorities, and all related sectors in dealing with cruise ship evacuations and management of outbreaks of COVID-19.

The current guidance provides a list of prevention measures to reduce the risk for introduction of COVID-19 onto the ship, transmission during cruise ship voyage, embarkation and disembarkation, and further provides options for preparedness to respond to potential COVID-19 cases among travellers (passengers and crew).

A total of 38 authorities from 28 European countries and Taiwan CDC participate in the consortium. The network is co-financed by the European Union under the Third Health Programme.

For more information about the network – please contact Senior researcher [Despena Andrioti Bygvraa](#).

First webinar in International Network about the Polar Code and Maritime Safety

On June 2nd the first webinar of the network ‘The Polar Code and Maritime Safety: International Network on Emergency Preparedness and Occupational Health and Safety in Arctic Shipping’ was held. The webinar was entitled ‘What are the challenges in successful implementation of the Polar Code in the Arctic?’ The aim of the webinar was to broaden and deepen our understanding of key features of the Polar Code.

The speakers of the seminar addressed the role of the Polar Code in managing maritime safety risks and potential challenges to implement the Polar Code in Arctic waters from public and private sectors’ point of views. The speakers were Turid B. Stemre - the Director of IMO affairs at

the Norwegian Maritime Authority (NMA) and Mark van der Hulst - COO of Oceanwide Expeditions since 2014. A total of 55 persons participated in the webinar which was well-organised and successful. The plan is to organise one more webinar later this year.

The network is funded by the Danish Agency for Higher Education and Science, and it is coordinated by the Department of Sociology, Environmental and Business Economics (SEBE) and Centre of Maritime Health and Society (CMSS), both from the University of Southern Denmark. The other partners are from Aalborg University (CIRCLA), the Finnish Institute of Occupational Health, University of Greenland, the Norwegian University of Science and Technology (NTNU) and Tyumen State University, Russia.

Please contact Senior Researcher [Hanna B. Rasmussen](#) for more information.

New research on seafarers' health

Senior Researcher Kimmo Herttua, CMSS recently published some of his research together with two other co-authors. The title of his research article is: "Does seafarers' limited access to health care increase risk for community-acquired pneumonia requiring hospital care?". The article was published in an esteemed international research journal entitled the American Journal of Industrial Medicine.

So, what is this research about in more lay terms and what does it mean for a seafarer?

Kimmo Herttua was interested in investigating what the consequences of seafarers' limited access to medical assistance are, in that they are out onboard their ships for longer periods of time and do not have the traditional access to healthcare clinics or their family doctor compared to professionals who work onshore.

There are many ways to investigate this, and Kimmo and his colleagues decided to look more specifically to see whether seafarers are actually more at risk of being hospitalized in connection with pneumonia when compared to other populations, because they do not have this access.

The data sample consisted of a seafarer population and a random sample of other economically active individuals aged 18-65 years who were residing in Denmark in 1997-2016. The findings indicate that seafaring is associated with a 40% increased risk for pneumonia that requires hospital care, and limited access to health care may be an important contributing factor. Furthermore, seafarers with lower educations are hospitalized longer than seafarers with higher educations.

This means that a lack of access to healthcare for seafarers does have a consequence for them, especially when it comes to pneumonia in comparison to workers in other industries. This also means that seafarers need to take more care of their health than other working populations.

If you would like to read the article in full - please find the link [here](#). You are also welcome to contact Senior Researcher [Kimmo Herttua](#) for more information about his research.

Publications

A selection of recently published scientific articles from CMSS (names of CMSS employees marked in bold)

- Van de Sijpe P, Lucas D, Canals ML, **Jensen O**. Acute occupational phosphine intoxications in the maritime shipping sector: Belgian and French reported cases. *International Maritime Health* 2020;71(3):151-159. <https://doi.org/10.5603/IMH.2020.0028>
- Feldtmann B, Østergaard K, **Rasmussen HB**. Cruise ships in Greenlandic waters: Legal prophylaxis and preparedness at the intersection of the law of the sea and real life. *Marlus* 2020; 535:81-109
- **Herttua K**, Vork J, Paljarvi T. Does seafarers' limited access to health care increase risk for community-acquired pneumonia requiring hospital care? A longitudinal register-based analysis. *American Journal of Industrial Medicine* 2021. <https://doi.org/10.1002/ajim.23248>



- Wang X, Liu Z, Wang J, Loughney S, **Zhao Z**, Cao L. Passengers' safety awareness and perception of wayfinding tools in a Ro-Ro passenger ship during an emergency evacuation. *Safety Science* 2021, 137. <https://doi.org/10.1016/j.ssci.2021.105189>
- Lucas D, Jago C, **Jensen OC**, Loddé B, Pougnet R, Dewitte J-D et al. Seafarers' mental health in the COVID-19 era: lost at sea? *International Maritime Health* 2021; 72(2). <https://doi.org/10.5603/IMH.2021.0023>
- **Baygi F**, Khonsari NM, Agoushi A, Gelsefid SH, Mahdavi-Gorabi A, Qorbani M. Prevalence and associated factors of psychosocial distress among seafarers during COVID-19 pandemic. *B M C Psychiatry* 2021; 21(1). <https://doi.org/10.1186/s12888-021-03197-z>

You can find more CMSS publications and bibliographic details by clicking [here](#).