Welcome to the TriWadWalk Lecture Series! Our programme of lectures highlights a selection of key issues pertaining to nature conservation and socio-ecological transformation at the Wadden Sea. The lectures provide insights into current social science based on Wadden Sea research and will hopefully serve as inspiration for critical and creative thinking about society-environment relations at the Wadden Sea.

Programme of Lectures

1. Danish Wadden Sea National Park (Nationalpark Vadehavet): Why is the Wadden Sea UNESCO World Heritage?

2. Prof. Marie Fujitani, University of Bremen: Tourism and National Parks: Dynamic Linkages and Contradictions

3. Dr. Christian Wittlich, University of Bremen: National Parks in the Context of Sustainability (slides only)

4. Prof. Janne Liburd, University of Southern Denmark: Towards Sustainable Development of Cultured World Heritage Nature

5. Assoc. Prof. Frans J. Sijtsma, University of Groningen: Sustainable nature-based tourism: Reflections from the Wadden area (four parts)

6. Dr. Cormac Walsh, Leuphana University Lüneburg: Relational Values in Wadden Sea Nature Conservation

7. Prof. Ingo Mose, Carl von Ossietzky University of Oldenburg: A New Biosphere Region at the Wadden Sea (slides only)

8. Dr. Tanja Behrendt, Carl von Ossietzky University of Oldenburg: Water and Climate in Coastal Regions

9. Jan Spiekermann, Carl von Ossietzky University of Oldenburg, Climate Adaptive Water Management in Coastal Lowlands (slides only)

10. Dr. Annet Kempenaar, University of Groningen: Future Perspectives on the Dutch Wadden Coast

11. Dr. Cormac Walsh, Leuphana University Lüneburg: Climate Change and Nature Protection in Schleswig-Holstein

12. Dr. Michael Fink, University of Hamburg: Societal Perceptions of Blue Carbon
We begin with a short animated film produced by the Danish Wadden Sea National Park addressing the question of why the Wadden Sea is UNESCO World Heritage. The film points to the responsibility that comes with the UNESCO World Heritage designation and identifies both natural and cultural heritage as fundamental sources of life and inspiration. The designation of the Wadden Sea as a World Heritage site recognises the global value of this ecosystem and coastal landscape but also has the potential to increase the attraction of the area for tourists.

The first four lectures in our series discuss the role of national parks in the context of both sustainability and tourism. Marie Fujitani of Bremen University takes a global perspective, reflecting on practices of protected area management in both the Global North and Global South. She discusses how national parks can lead to better protection for natural resources and ecosystem services and improve the well-being of local communities. Christian Wittlich, also from Bremen University, discusses how the concept of sustainability has informed the current IUCN system of categorisation for protected area management internationally and how this framework relates to the Wadden Sea. Janne Liburd, together with colleagues Bodil Blichfeldt and Eva Duedahl (University of Southern Denmark) continue this theme, but encourage us to think more critically about the relationship between nature and culture at the Wadden Sea, drawing on a holistic understanding of sustainable development. They highlight the rich cultural heritage of the Wadden Sea and argue against an interpretation of Wadden Sea nature as wild, untouched or outside the realm of human influence. They discuss how pro-active stewardship based on an ethics of care and collaboration among multiple, diverse stakeholders can help protect and safeguard Wadden Sea World Heritage. Frans Sijtsma (University of Groningen) in his four-part contribution focuses on possibilities and strategies for nature-based tourism at the Wadden Sea. Part 1 introduces a conceptual framework for analysing sustainable tourism, building on a Tourism Area Life Cycle Framework. In Part 2, he focuses specifically on a study examining the relationship between tourism employment and the perceived attractiveness of nature at the Dutch Wadden Sea. His research documents the ‘deep feelings’ that many visitors to the Wadden Sea have. In Part 3 he discusses a survey tool for the measurement and mapping of cultural ecosystem services at the Wadden Sea. The survey tool helps to connect fans of Wadden Sea nature to particular nature-based areas they view as important. Part 4 explores key mechanisms to overcome barriers to sustainable tourism. He stresses that the islands, mainland and sea area face distinct challenges in responding to opportunities and risks associated with Wadden Sea World Heritage.
Cormac Walsh (University of Lüneburg) continues the theme of non-monetary values in his critical analysis of the values underlying Wadden Sea nature conservation. He argues for a relational approach, focusing not only on relational values (how people relate to nature) but also relational nature (nature and culture as interrelated) and relational space (socio-spatial relations) as the basis for a more nuanced understanding of contemporary practices of protected area management. At the Wadden Sea, we find a broad spectrum of distinct nature conservation philosophies and understandings of the relationship between the Wadden Sea itself and its local and regional hinterlands. This relationship between Wadden Sea protected area management and its regional context is the focus of Ingo Mose's (University of Oldenburg) lecture on the expansion of the development zone of the UNESCO Biosphere Reserve in Lower Saxony to include municipalities within the surrounding region. The developments in Lower Saxony can be seen to mirror international shifts from a segregation of protection and use, to more integrative approaches where protection and sustainable use are understood to complement each other.

The next set of three lectures address questions of coastal defence, adaptation and water management in the context of anthropogenic climate change and sea-level rise. Tanja Behrendt (University of Oldenburg) introduces the topic, highlighting the importance of water management for coastal regions. She discusses historical practices of dike-building, land drainage and reclamation and their influence on current and future options for adaptation at the coast. The presentation of Jan Spiekermann (University of Oldenburg) details more specifically, a particular case of adaptive drainage management in Eastern Friesland which was the focus of the KLEVER project. This project sought to identify strategies for adaptation and integrated flood risk management specific to this area.

Annet Kempenaar (University of Groningen) takes a broader perspective in her study of regional design strategies for coastal adaptation at the Dutch Wadden / North Sea. Regional design approaches seek to identify ‘possible and desirable futures’ by creatively imagining possible options for coastal adaptation and transformation looking multiple decades into the future. The influence of such regional designs on policy-making is difficult to measure, but they nevertheless form an important part of a wider conversation. Cormac Walsh’s (Lüneburg) analysis of climate change adaptation and nature conservation at the Wadden Sea coast of Schleswig-Holstein examines on particular climate adaptation strategy for the Wadden Sea in 2100. This strategy was significant for bringing together both coastal defence and nature conservation perspectives within one overarching strategy against the background of a recognition that anthropogenic climate change exposes the limitations of a nature conservation philosophy focused on letting nature be nature. In the final presentation,
Michael Fink (University of Hamburg) shifts the focus from climate adaptation to climate mitigation with his study on social perceptions of blue carbon. He concludes that broad-based participation and knowledge exchange are key to enhancing community engagement with blue carbon strategies focussed on coastal ecosystems.

Annexes: Accompanying Resources and Background Information
Below you will find information about the TriWadWalk partnership and the two international excursions (‘Walks’) which took place in May and September 2022 (Annex 1), a bibliography of Wadden Sea-related scientific literature (Annex 2) and an inventory Wadden Sea related teaching (Annex 3).

Annex 1: About TriWadWalk
The Wadden Sea World Heritage Site (WHS) is a unique intertidal ecosystem, recognised for its outstanding universal value. It is a best practice example of transboundary cooperation in nature conservation and protected area management. The Wadden Sea Region (WSR) comprising both the coastal hinterland and inhabited islands, furthermore, has a rich cultural heritage, founded on thousands of years of interaction between society and nature in this dynamic coastal landscape. It is widely recognised that large-scale protected areas have the potential to act as model regions for transformation to a more sustainable society. Indeed, WSR stakeholders in Denmark, Germany and the Netherlands are actively engaged in harnessing this potential through a wide range of initiatives at multiple scales, whether it be the leading role of the islands of Juist, Ameland and Borkum in progressing towards carbon neutrality, the development of innovative approaches to saline agriculture at the Ems Delta and Texel or the explicit incorporation of sustainable development goals within the management framework of the Danish Wadden Sea National Park.

The WSR has thus become a living laboratory for experimentation and testing in green innovation across a range of sectors including agriculture, coastal protection, transport and tourism. Yet the WSR also remains a region of contradictions and conflicting trends. Large-scale industrial agriculture is a prominent feature of the lowland landscapes of Groningen, Eastern Friesland and southern Denmark and the ports of Hamburg, Esbjerg, and Eemshaven continue to raise concerns in relation to water, noise and air pollution. The economy of the WSR is dependent on its capacity to host large numbers of tourists across the summer season yet these large numbers of visitors also present a risk to the fragile Wadden Sea ecosystem. Along the coastline itself, a fine balance must be sought between coastal defence, necessary to ensure the safety of those living in the region and the nature conservation required to protect the ecology of the Wadden Sea itself. The Wadden Sea is an ecosystem of global importance, yet the WSR is found in local places, given meaning by a multitude of everyday practices, and diverse ways of knowing and working with the coastal landscape.
As social science researchers and educators, these contradictions are both of great interest and highly relevant. Through our ‘Wadden Walks’ in May and September 2022 we engage with the many faces of the WSR, exploring and making sense of these contradictions, listening to and learning from diverse, stakeholders and actors. The WSR represents for us a living laboratory, one where many of the tensions and contradictions of contemporary society are placed in sharp relief by the presence of the Wadden Sea World Heritage and the potential it represents. We are motivated to arrive at a fuller, cross-disciplinary, understanding of the potentials and challenges of the WSR and its relationship with the Wadden Sea WHS. We seek to develop new perspectives to inform our research work. We aim to learn from each other and the diversity of experiences found across the WSR. We aim to develop place-based educational materials to support and complement future university courses and field excursions ensuring students from multiple disciplines have access to insights, perspectives and reflection, representing the many faces and facets of the WSR.

Our Wadden Sea field trips are now completed but, in many respects, this represents a milestone on a longer journey. The experiences and new insights gained over the two weeks will inform our university teaching and research perspectives. The students who had the privilege of participating showed their gratitude in their active engagement, openness to new perspectives concern for the future of Wadden Sea nature and culture and intellectual curiosity. They will act as ambassadors, inspiring others to get to know and care for the Wadden Sea and its rich natural and cultural heritage.

The TriWad CREW Partnership
University of Bremen (Institute for Geography): Prof. Dr. Marie Fujitani, Michael Thiele, Dr. Christian Wittlich
University of Groningen (Faculty of Spatial Sciences): Assoc Prof. Dr. Frans J. Sijtsma, Dr. Elen-Maarja Trell, Dr. Ir. Annet Kempenaar
University of Hamburg (Institute for Geography): Prof. Dr. Beate M. W. Ratter, Dr. Michael Fink
University of Lüneburg (Institute for Ecology): Dr. Cormac Walsh
University of Oldenburg (Institute for Biology and Environmental Sciences) Prof. Dr. Ingo Mose, Dr. Peter Schaal, Dr. Tanja Behrendt.
University of Southern Denmark (Department for Design and Communication, Centre for Tourism, Innovation and Culture): Prof. Dr. Dr. Janne Liburd, Assoc. Prof. Dr. Bodil Blichfeldt.

The inter-university cooperation at the core of TriWad Crew dates back to 2007 when the first teaching and research workshop was held at the University of Groningen, Faculty of Spatial
Sciences. Since then, the partnership has grown to include six partners in all three Wadden Sea countries. Workshops have taken place on an annual basis, rotating among partner institutions. At the basis of the cooperation is the perceived need among social science researchers for a better understanding and appreciation of the broader Wadden Sea region from a diversity of perspectives. The explicit focus on the Wadden Sea Region is a core focus of the workshops, and the interest in and attachment to the area is something that connects the partner universities.

Annex 2: Wadden Sea Scientific Literature (social science and humanities)

Key texts:


Leeuwe, M.A. & Haartsen, T. (eds) (2012) Special Issue on the Wadden Region, Ocean and Coastal Management, 68, 1-200 (special issue, 17 papers, including editorials

Literature from TriWadWalk Partners (sorted by topic):

1) tourism, sustainable regional development


Duedahl, E., Blichfeldt B., & Liburd, J. (2020) How engaging with nature can facilitate active healthy ageing, Tourism Geographies, DOI: 10.1080/14616688.2020.1819398


2) nature-culture relations, coastal landscapes, protected area management


3) sense of place, coastal management and climate adaptation


4) governance, collaboration, participation


Further literature (selected)

**Nature-culture relations and protected area management**


**Climate Change Adaptation, coastal protection and change**


**Historical and literary perspectives**


https://waddensealiterature.com/ - teaching resources focussed on environmental humanities perspectives on the Wadden Sea
Annex 3: Inventory of Current Wadden Sea Related Social Science Teaching

The table below provides an overview of current and recent Wadden Sea related social science teaching at the TriWadWalk partner universities. Please note that it is not comprehensive and some relevant teaching may not be included here. In some cases, the capacity to offer Wadden Sea related teaching is highly dependent on the availability of contract and/or occasional staff.

**Relevant Masters Programmes**

- *Water and Coastal Management*: Groningen and Oldenburg (Double Degree Masters Programme)
- *Islands and Sustainability*: Groningen (Erasmus Mundus Research Masters)

<table>
<thead>
<tr>
<th>University</th>
<th>Title</th>
<th>Format</th>
<th>Years taught</th>
<th>Bachelor / Master</th>
<th>Language</th>
</tr>
</thead>
<tbody>
<tr>
<td>University of Bremen</td>
<td>Tourism, Development and Sustainability</td>
<td>Seminar</td>
<td>2019-2022</td>
<td>B</td>
<td>English</td>
</tr>
<tr>
<td>University of Bremen</td>
<td>Borders and border regions in Europe</td>
<td>Seminar</td>
<td>2022</td>
<td>B</td>
<td>English</td>
</tr>
<tr>
<td>University of Bremen</td>
<td>Northern Germany (Geography for Elementary school teachers)</td>
<td>Lecture</td>
<td>2020-2022</td>
<td>M</td>
<td>German</td>
</tr>
<tr>
<td>University of Bremen</td>
<td>Introduction to field archaeology and excavation techniques (in Wadden region)</td>
<td>Excavation, practical project</td>
<td>2020-2022</td>
<td>M</td>
<td>English</td>
</tr>
<tr>
<td>University of Lüneburg</td>
<td>Environmental Geography: Society-Environment Interactions at the Coast</td>
<td>Lecture Course</td>
<td>2021-2022</td>
<td>B</td>
<td>English</td>
</tr>
<tr>
<td>University of Lüneburg</td>
<td>Landscape, Nature and Tourism at the North Sea Coast</td>
<td>Fieldtrip to Cuxhaven</td>
<td>2021</td>
<td>B</td>
<td>German</td>
</tr>
<tr>
<td>University of Lüneburg</td>
<td>Analysis and interpretation of Qualitative Data (transcripts from Wadden Sea research)</td>
<td>Methods Seminar</td>
<td>2022</td>
<td>B</td>
<td>English</td>
</tr>
<tr>
<td>University of Lüneburg</td>
<td>Critical Geographies of Nature Conservation</td>
<td>Seminar</td>
<td>2022-2023</td>
<td>B</td>
<td>English</td>
</tr>
<tr>
<td>University of Lüneburg</td>
<td>Ecosystem-based Marine Spatial Planning: Theory and Practice</td>
<td>Seminar</td>
<td>2022-2023</td>
<td>B</td>
<td>English</td>
</tr>
<tr>
<td>University of Southern Denmark</td>
<td>Sustainable Tourism Design (prev. Sustainable Tourism Development)</td>
<td>Course, Fieldtrip to the DK WS NP (since 2006)</td>
<td>2022</td>
<td>M</td>
<td>English</td>
</tr>
<tr>
<td>University of Oldenburg</td>
<td>Planning and Management of Coastal Zones and Sea Basins</td>
<td>Seminar</td>
<td>2022-2023</td>
<td>M</td>
<td>English</td>
</tr>
<tr>
<td>University of Oldenburg</td>
<td>Practice of Nature Conservation</td>
<td>Lectures, fieldtrip, exercises</td>
<td>2022-2023</td>
<td>M</td>
<td>German</td>
</tr>
<tr>
<td>University of Oldenburg</td>
<td>Environmental Planning</td>
<td>Seminar</td>
<td>2022-2023</td>
<td>M</td>
<td>German</td>
</tr>
<tr>
<td>University of Hamburg</td>
<td>East Frisian Islands and Climate Adaptation</td>
<td>Seminar / Exercise</td>
<td>2022</td>
<td>B</td>
<td>German</td>
</tr>
<tr>
<td>University of Hamburg</td>
<td>Geography of Wind: Human Interactions with everyday wind and storms</td>
<td>Seminar</td>
<td>2021-2022</td>
<td>B</td>
<td>English</td>
</tr>
</tbody>
</table>
This document has been prepared by Dr. Cormac Walsh, November 2022

Contact:
drcormacwalsh@gmail.com
https://cormacwalsh-consult.eu/

Note The content of the lecture series does not necessarily reflect the views of the Trilateral Wadden Sea Cooperation or the Common Wadden Sea Secretariat.

TriWadWalk has received generous financial support from the Common Wadden Sea Secretariat, from the Faculty of Spatial Sciences, from the Wadden Academy, and from the University of Southern Denmark, while it also supported by the European Union Erasmus Program.