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1872

AN EXCEPTIONAL STORM SURGE IN THE BALTIC

150th Memorial Conference
Baltic Storm Surge 1872

from 12th – 14th November 2022



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BACKGROUND TO THE CONFERENCE

In November 2022 it will have been 150 years since the catastrophic storm surge from the 12th to 14th November in 1872 struck the Baltic Sea coasts of Denmark, Germany, and south of Sweden.

An extreme storm surge in combination with high waves resulted in the death of about 300 people and even in Schleswig-Holstein more than 15,000 people lost their homes. Locally, the water level rose to about 3.4 m above Mean Sea Level (MSL), which is extraordinary for this region with no astronomical tide.

Since 1872 there has been no storm event of the same magnitude. In fact, the water level record from Travemünde dating back to the 1820s, states that the maximum water level during the 1872 storm was approximately one meter higher than all observations thereafter: What made this storm so extreme? What is the probability of recurrence?

It is an ongoing discussion in the affected countries whether the 1872 storm should be considered as a design storm event, or whether it was a unique event. Historical records from Germany and Denmark suggest that there have been extreme storm surges during the 14th and 17th centuries. Although the storm surge heavily struck all three coastlines, the memories about the catastrophe as well as modern coastal flood risk management approaches vary substantially among the countries and regions. Possible reasons for this and their implications will be presented and discussed during the conference.

Finally, a podium discussion will address the question what lessons are or perhaps should be learned from the catastrophe. And what can we learn about societies resilience today through studies of historical storm events?

When the need for climate change adaptation is increasing, there is also an increased need to determine relevant design events applicable for the timescale of interest.

In Germany and Denmark, the 1872 storm sometimes has been used as design criteria or at least considered in risk assessments. In Sweden, however, the 1872 storm has been almost forgotten until recent years. Since then thousands of houses have been built in flood prone areas without protection. The collective memory of storm events commonly ensures proper flood risk management. Why was the storm remembered in Germany and Denmark, but forgotten in Sweden and other countries? Absence of memory may instead lead to unsustainable development of flood-prone areas and thereby increased risks.

There is a lot to be learned from the storm surges of the past (e.g. 1044, 1304, 1320, 1625, 1694, 1784, 1872) and the 150th memorial conference is a great opportunity for engineers, social scientists, geologists, meteorologists, historians and many more to come together and share knowledge about the 1872 storm surge, and how our coasts can be managed in a sustainable way to meet future challenges.

A special volume of „Die Küste“ with publications concerning the Baltic storm surge 1872 will be published for the conference.

CONFERENCE

The conference will be held at University of Rostock on November 14th, 2022 from 10 AM to 5 PM.



PRE-TOUR

12th to 13th November from Copenhagen to Rostock by bus

(The number of participants is limited to approx. 50, 30.09.22 deadline for pre-tour registration.)

Prior to the conference there will be a field trip starting in Copenhagen on November 12th, during these two days we will travel by bus along the coast and visit flood sites in Denmark and Germany. On the evening of November 13th there will be an anniversary dinner in Rostock.

REGISTRATION

Participants are responsible for organizing their own travel to Copenhagen and from Rostock. The pre-tour is free of charge except for overnight stays and possibly meals.

The conference is free of charge.

Please register here

https://conference-service.com/KFKI_1122/

The event will be held under the current hygiene guidelines. Depending on Covid 19 legal requirements cancellations are possible.