

Kraken

a scientific and commercial data meta-platform for energy resources



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Conclusion

The main goal is a community-based website (kraken.4-cast.de) for wind-related data to create an overview of all data sets we can get a hold on. I. e. on one hand publicly available data and on the other hand private data, where we suggest to use corresponding licenses. We provide links to choose, e. g., open data licenses for research purposes, and commercial ones for private data which might be used commercially when a fee is paid. Data like meteorological mast data or those from wind power plants might originate from research campaigns or from the commercial operation of wind power plants.

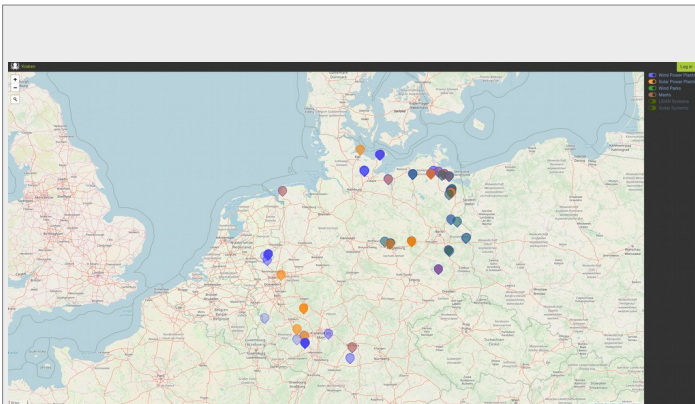


Fig. 1 Overview of power plants and mast on kraken.4-cast.de

Introduction

We have developed a database (DB) together with a clear user interface for a easy handling. The overview of potential data sets is shown on a map. For the user it is possible to obtain an overview for several purposes, e. g. over wind mast, wind parks or rather solar parks. For the science, available wind measurements could be interesting. Another purpose is the application of the data by operators of potential wind or solar parks. It could be helpful for the planning due to better location. The more data we have, the more easily wind-weak or wind-strong areas can be identified.

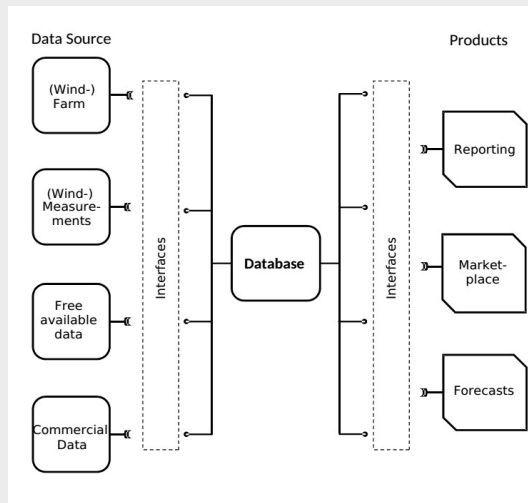


Fig. 2 schematic representation of the Kraken-Data base.

Data

98 Wind Power plants with 241,76 MW
40 Solar Power plants with 101,66 MW
9 Masts

Due to licenses it is also possible to obtain only the location and a provided link to the data.

Outlook

In the near future we will share additional information regarding the production of a wind plant or wind park, which is interesting for operators of commercial power plants or parks.

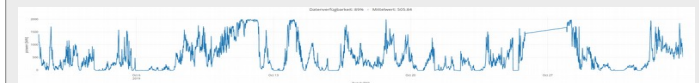


Fig. 3 Production of wind plant.

Additional information about the wind direction (wind rose) and about the wind speed frequency distribution are also powerful and useful presentations.

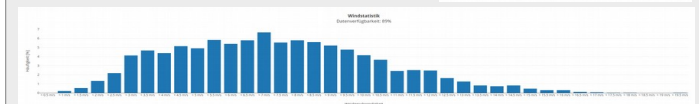
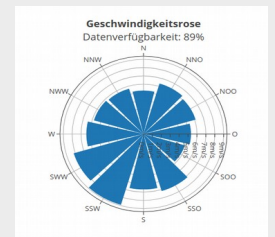


Fig. 4 Wind rose (above) and wind speed frequency distribution (below).