

## Course: Big Data AG

General information	
<b>Course Name</b>	Big Data AG Big Data Working Group
<b>Course code</b>	BDWG
<b>Lecturer(s)</b>	B.Sc. Gerth, Jonas (jonas.gerth@haw-kiel.de) Prof. Dr. Lüssem, Jens (jens.luessem@haw-kiel.de)
<b>Occurrence frequency</b>	Regular
<b>Module occurrence</b>	In der Regel jedes Semester
<b>Language</b>	Englisch

Qualification outcome
<i>Areas of Competence: Knowledge and Understanding; Use, application and generation of knowledge; Communication and cooperation; Scientific self-understanding / professionalism.</i>
Students know the advantages and limits of Big Data Applications. Students know the steps to set up a Big Data Application.
Students are able to build Big Data Architectures and are able to work with real world scenarios: <ul style="list-style-type: none"> <li>- Architecture</li> <li>- Data Storage</li> <li>- Data Analysis</li> <li>- Visualization</li> </ul>
Students are able to work in groups. Students are able to discuss with domain experts.

Content information	
<b>Content</b>	Contents: <ul style="list-style-type: none"> <li>- Big Data Ecosystems</li> <li>- Big Data Programming Languages: Python, R</li> <li>- Methods for Data Analysis</li> <li>- Data Visualization Techniques</li> </ul>
<b>Literature</b>	<ul style="list-style-type: none"> <li>- Kleppmann, M.: Designing Data-Intensive Applications: The Big Ideas Behind Reliable, Scalable, and Maintainable Systems (2017)</li> <li>- Hadoop References (Online Material)</li> <li>- Udacity (Nano Degree Course). Big Data Foundation (2018)</li> </ul>

Teaching format of this course	
<b>Teaching format</b>	<b>SWS</b>
Projekt	2

Examinations	
<b>BDWG - Projektbezogene Arbeiten</b>	Method of Examination: Projektbezogene Arbeiten Weighting: 100% wird angerechnet gem. § 11 Absatz 2 PVO: Yes Graded: Yes
<b>Ungraded Course Assessment</b>	No