Universität Leipzig Institute for Meteorology Summer term 2021

Announcement of Lectures and Practical Work

## **Data** assimilation

(Master Elective Module T6)

Lecturer: J. Quaas

Location: On-line at https://lecture.uni-leipzig.de/b/qua-7sn-6gc-6hr

Seminar room Vor dem Hospitaltore and CIP-Pool, Talstraße 35

Time: Wednesday 9.15 – 11.30

(8 Lectures, 21 April – 9 June; 4 courses Practical work 16 June – 7 July;

2 Presentations, 14 – 21 July 2021)

Start: Wednesday, 21 April 2021

Topics: Combination of modelling and observations, Statistical basics,

Objective analysis, cost function, Kalman filter, Variational assimilation

Remark: Some or all of the lectures will be taught in English, depending on the

attendants

Exams: The exam for this class is an oral presentation about the practical work and a

short written report.

Literature: Evensen, Data Assimilation, Springer, 2009, 307pp.

Kalnay, Atmospheric Modeling, Data Assmilation and Predictability,

Cambridge University Press, 2003, 341 pp.

Talagrand, O., Assimilation of Observations, an Introduction, J. Meteorol. Soc.

Japan, 75, 191-209, 1997.

Data Assimilation Research Testbed (DART),

http://www.image.ucar.edu/DAReS/DART/