Educational Data Package.

A Pilot Project at the German Research Data Centre for Higher Education Research and Science Studies

fdz.dzhk.

Research Data Centre for Higher Education Research and Science Studies

Overview

An Educational Data Package (EDP) is a compilation consisting of an already published scientific article, the underlying data as a Campus Use File and scripts which are needed to replicate the statistical models in the article. The EDP is well documented and enriched with didactic material about the methods used in the article. By applying EDPs in academic teaching, students are familiarized with the demands and quality criteria of scientific work at an early stage of their career. Educational Data Packages will be made available free of charge as downloadable files for teaching purposes by the German Research Data Centre for Higher Education Research and Science Studies.

Research Data and Educational Data Package

The German Research Data Centre for Higher Education Research and Science Studies (RDC) archives data from the research field.

The data will be provided as Scientific Use Files for academic research and as Campus Use Files for university instruction. A Campus Use File is the completely anonymized version of the corresponding Scientific Use File accounting for data protection issues. An Educational Data Package is a Campus Use File enriched with further material.

Motivation

- Disseminating the data of the RDC
- Raising the awareness level regarding the RDC and its offers
- Providing high quality teaching material for statistic classes and self-learners
- Feasibility Study concerning the archiving of publications' analysis scripts

Educational Data Package

Content

- Research data and documentation as Campus Use File
- Scientific article based on the research data
- Documented data preparation and analysis scripts used to create the published models
- Mapping between the variable names used in the Campus

Advantages for Students and Lecturers

- Motivation to familiarize themselves with the methods of their subject
- Opportunity to gain insight into current research questions
- Enhancement of academic teaching by proximity to research

Advantages for Authors

- Use File and in the publication
- Documentation of possible deviations between the results based on the Campus Use File and the Scientific Use File
- Additional didactic material about the publication's contents and methods
- Educational Data Packages receive a DOI, analysis scripts will therefore be fully citeable
- Using the publication for Educational Data Packages increases its awareness level and its potential for citation

Pilot Project

Select suitable articles

Selection Criteria

- High relevance in the research field
- Scripts are provided by authors
- Used methodology is suitable for teaching
- Findings of the article are replicable by using the Campus Use File

Pilot Project's First Results

Interest in Educational Data Packages is confirmed, thus the RDC will deliver Educational Data Packages in future

Prospects

Apart from higher education research, Educational Data Packages can be used in all areas which generate publications based on research data. Open access to research data, data preparation and analysis programs and the resulting scientific publications are beneficial for university instruction as well as for science in general: research processes become more transparent, review processes are simplified, intersubjective traceability is increased and the integration of existing research into new research is facilitated. Joint archiving and long-term preservation of data, scripts and the corresponding software can be provided by research data

Add additional didactic material

Provide Educational Data Package

- There are authors providing their scripts
- Prospectively, when concluding a data usage agreement, the RDC will ask data users to provide their scripts for Educational Data Packages and other purposes
- Due to copyright and licensing issues, Open Access publications are preferred

centres.

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