HYPERedu online learning initiative: Concept, current status and cooperation opportunities

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HYPERedu in a nutshell

- Online learning resources on **principles, methods and applications of imaging spectroscopy**
  - **Materials**: Slide collections, tutorials, videos, interactive graphics
  - **MOOCs**: Massive open online courses
- **Target group**: Students and professionals in science, public authorities, companies, MSc level with basic knowledge in remote sensing
- **License**: CC BY 4.0
- **Language**: English
- **Platform**: EO-College
EO-College platform

- Central platform for EO education in Germany with contributions from several groups for different EO fields and target groups
- Repository for online learning materials and courses, discussion platform and information hub

Source: Robert Eckardt, EO-College, Sept 2022
Hyperspectral resources

https://eo-college.org/resource-spectrum/hyperspectral/
Hyperspectral basic MOOC

- **Contents**: Principles of imaging spectroscopy, sensor technology and data acquisition techniques, data and software
- **Language**: English language
- **Length**: ~ 5-8 hours (self paced)
- **Certificate**: Final assignment

**COMING SOON (Nov 2022): Revised Basic MOOC**
New: Offline course document, making of video, video subtitles in German, Spanish and Portuguese

https://eo-college.org/courses/beyond-the-visible/
Hyperspectral basic MOOC

Main course page with content

Course structure to navigate

Link to Discussion Forum
HYPERedu YouTube channel

- Instructional videos
- Screencasts on software use
- Animated lecture slides
- Expert interviews

HYPERedu on YouTube

https://tinyurl.com/hyperedu-youtube

14 Oct 2022
Basic MOOC: Participants

- from different countries and continents
- young (25-45 years) and male (70 %)
- 30 % previous MOOC experience
- 60 % no contact with hyperspectral data before

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- almost 1500 participants enrolled to course since Nov 2021
- > 300 completed course
Basic MOOC: Evaluation

„I had a lot of fun taking this course. I am experienced in the field, but I have learned a lot. Congrats!“

„I think one of the best remote sensing MOOC I’ve ever attended“

- More practical exercises
- More subsequent MOOCs on specific application fields (Agriculture 24%, Water 20%, Urban 17%, Soil 17%, Geology 14%)
COMING SOON (Nov 2022): Mini-MOOC Agriculture
Basic MOOC: Contributing people and partners

Project partners

Cooperation partners

Production
How you can get involved...

- **Use** HYPERedu materials (videos, tutorials, slide collections....)

- **Collaborate** in the development of further resources and courses

- **Promote** HYPERedu in your networks

- **Give us feedback**

**Contact**

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