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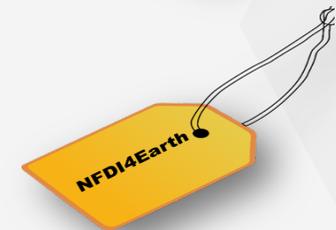
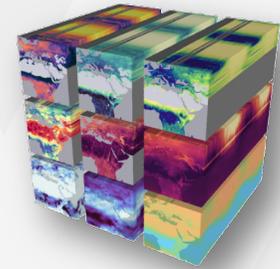
Data Literacy & Community Engagement

Hilde Götde  
Geo.X Research Network for Geosciences  
in Berlin and Potsdam



# Key Goals

- *One Community* approach to sustainable, Open and FAIR Research Data Management in Earth System Sciences (ESS)
- Community driven agile development of innovative platforms for data integration and collaborative data analysis
- Qualification for people, data, tools and services as a basis for FAIR RDM and viability
- *OneStop4All* and *User Support Network* for ESS RDM as integral part of NFDI and International Infrastructures
- Key-driver of the build-up and operation of the NFDI

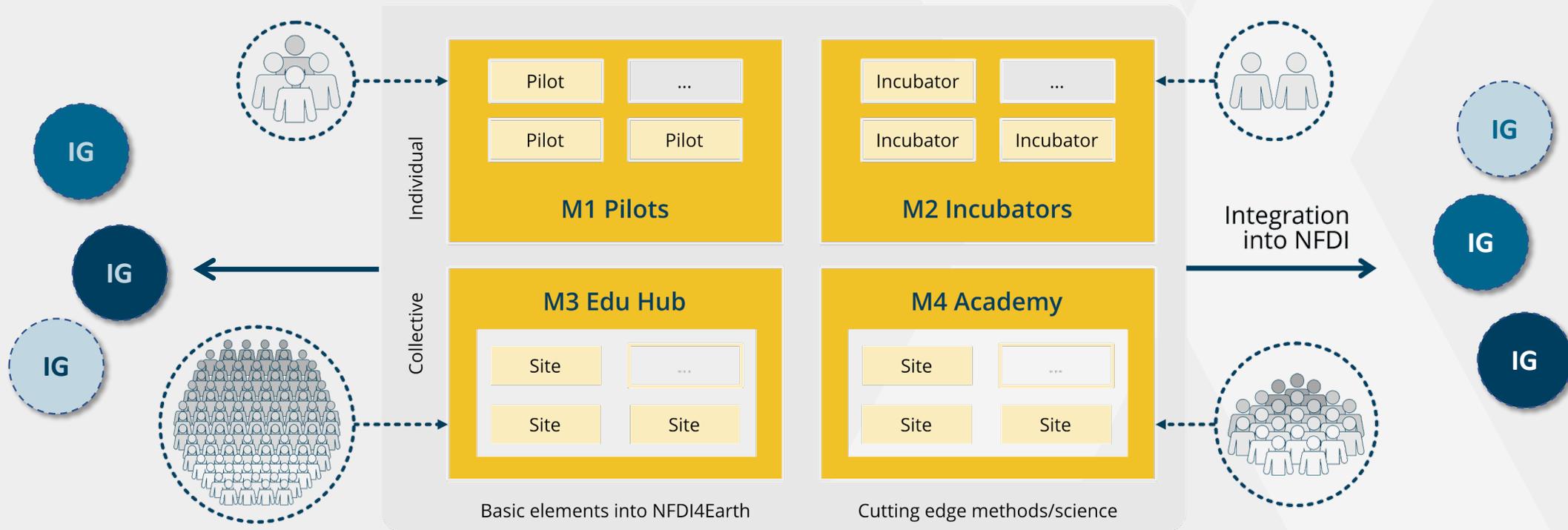


# NFDI4Earth – Strategy 2021-26



- Community Engagement
- Piloting Innovations
- User Perspective
- Infrastructure Perspective
- NFDI & International Integration
- Community Support

# TA1 – Engage with the community, foster innovation



## Development of a wide range of ready to use open educational resources:

- Comprising bachelor and master students, scientists, lecturers, data and infrastructure providers
- Developing specific curricula for i.a. **ES Data Scientists** and **ES Data stewards**
- Addressing needs of specific target groups
- Developing EDU-packages like course material, MOOCs, teachlets, videos, ...
- Modules can be **integrated into existing university or professional training curricula**

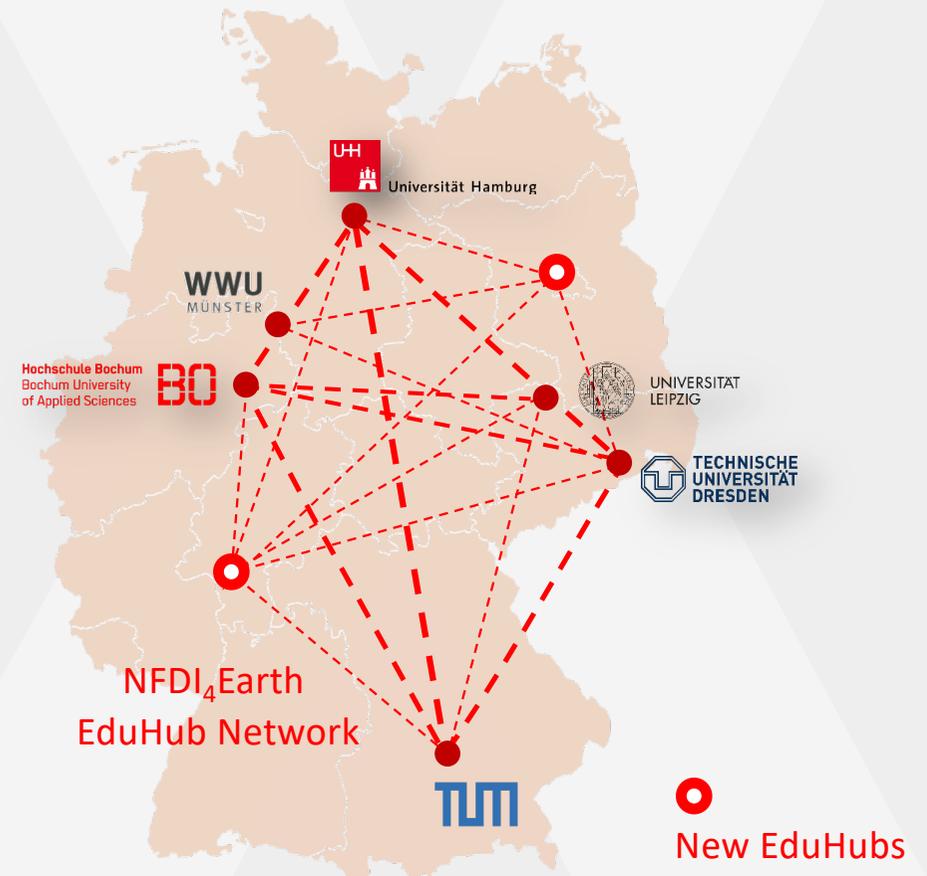
## How will education and training programs be scaled?

- Providing **onsite and online courses / workshops** etc.
- Providing **Open Online Education Resources** allowing self-instruction (in a common learning platform)
- **Activating multipliers** by train the trainer events, integration into (under-) graduate courses and permanent education and training offers provided by **EduHubs**

# NFDI<sub>4</sub>Earth EduHubs



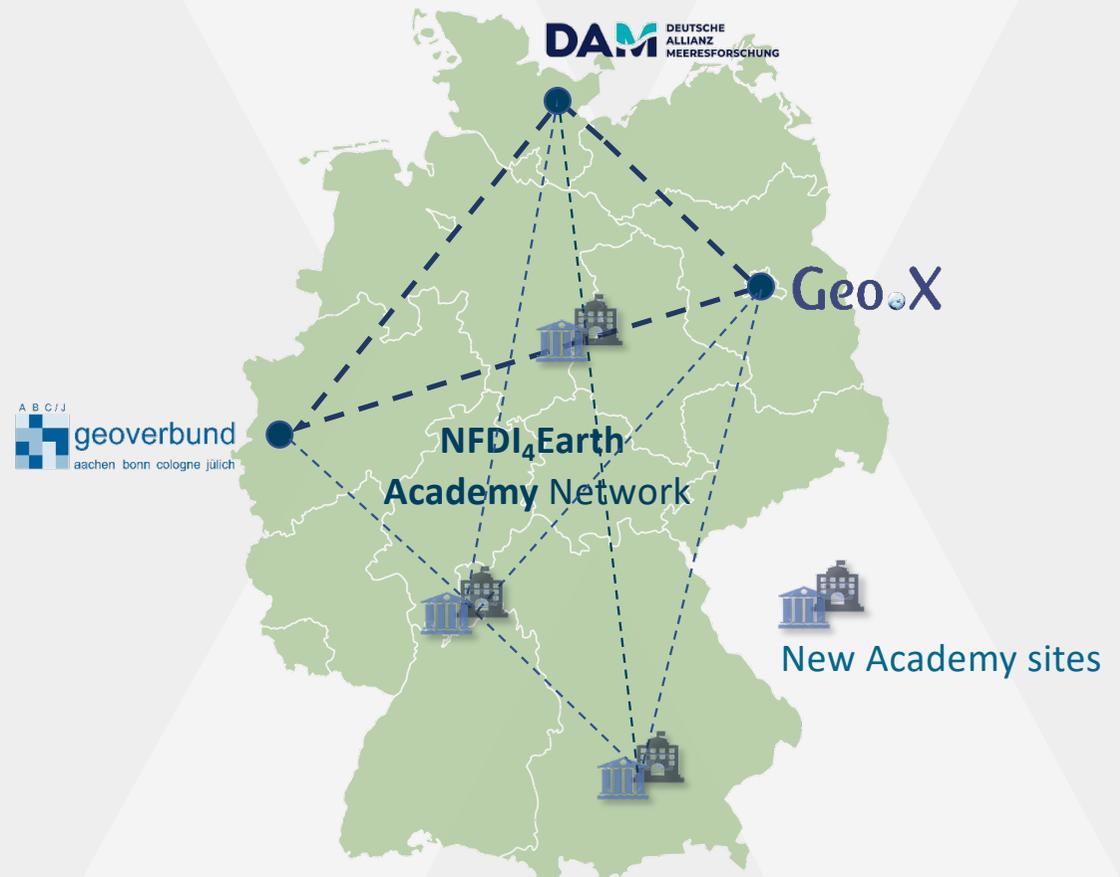
- NFDI<sub>4</sub>Earth organisations providing **permanent education and training** offers
  - Well-defined scope reflecting the organisation's expertise and interests
  - Typically re-using and advancing NFDI<sub>4</sub>Earth education and training material and curricula
- **Initial NFDI<sub>4</sub>Earth EduHubs in Bochum, Münster, Hamburg, Leipzig, Dresden, München**
- In perspective: New Education & Training Sites  
>> **NFDI<sub>4</sub>Earth EduHub Network**



# NFDI<sub>4</sub>Earth Academy



- **NFDI4Earth Academy's backbone:**  
Research networks ABC/J, DAM, and Geo.X
- **Think tank** to connect young researchers from all ESS sub-disciplines and their data-driven research
- Diversity-sensitive and criteria-based recruitment process of Academy fellows **at each site**
- Open and complementary Academy program on **Data Science**
- Initial proof of concepts for further implementation
- Connectivity to the **HiDA** HELMHOLTZ Information & Data Science Academy
- **Open call** to initiate **additional** NFDI4Earth Academy sites (also virtual)  
>> **NFDI<sub>4</sub>Earth Academy Network**



# NFDI<sub>4</sub>Earth Academy program



- Reflects the spectrum of the geoscientific key research fields of each Academy site
- Modules will be defined and co-organized by the fellows
- Program elements are
  - hands-on and peer-exchange formats such as (virtual) talk series, workshops on self-chosen topics, autumn school, and Hackathons
- Elaborated Curriculum includes:
  - focus points on advanced data analysis e.g. Data Science and Machine Learning applications
  - basic principles of RDM and data workflows aligned with NFDI<sub>4</sub>Earth standards (link to the EduHubs)
- Expected outcome:
  - publications, new projects, use case documentation, data sets, software, tools etc.
  - Advanced scientific profile of fellows



# Engage with the community & foster innovation

## Pilots

### Applying Open and FAIR ESS RDM:

- One-year termed projects reflecting the variety of use cases, complexities, and different FDM maturity levels in the ESS community

## Incubator Lab

### Exploring new ES data science methods

- Small, short termed innovation projects

## Education & Training

### Developing competences in RDM and spatiotemporal data literacy

- Providing ready to use open educational resources

## Academy

### Linking-in next generation researchers

- Think tank to connect young researchers from all ESS sub-disciplines and their data-driven research

## Interest Groups

### Interest Groups (IGs) – *developing common topics*

- group around technical or community topics

# How to get in touch?

