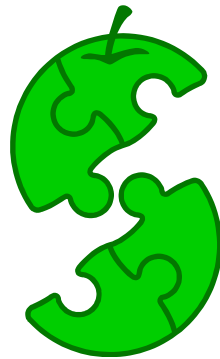


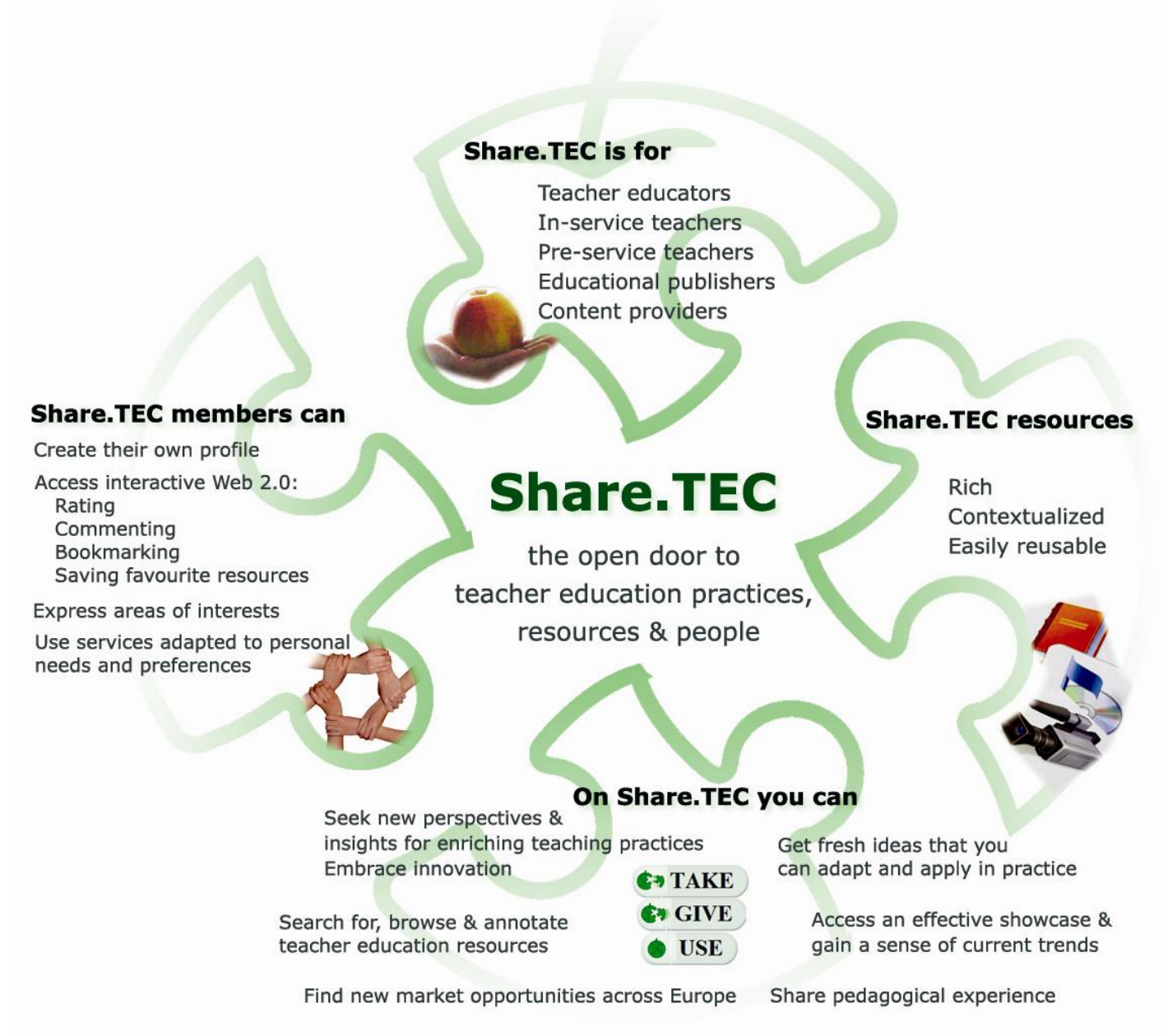
# Using digital libraries in the teacher education

Krassen Stefanov



**Share.TEC**  
teacher education resources

UNESCO International Workshop, 14-16 June, 2011, Sofia, Bulgaria



# Issues addressed

- Share.TEC vision
- Share.TEC features
- Share.TEC – a project and a platform
- More information & contact

# Digital Library (Repository)

- Library in which collections are stored in digital formats and accessible by computers
- The digital content may be stored locally, or accessed remotely via computer networks
- A digital library is a type of information retrieval system
- Data is indexed using metadata
- Based on OAI/PMH protocols for sharing

# Main functions

- offer the outputs to the world
- maximise the visibility and enhance impact
- showcase and sell results / products
- to collect and curate digital collections
- to manage research and teaching activities
- workspace for collaborative projects
- development and sharing of digital teaching materials and aids
- access to student achievements

# Some issues

- How to collect content
- How to look after the content
- How to add value to the content
- How to share information with other digital libraries
- How to offer services to end users
- How to ensure legally sound operations
- How to ensure interoperability
- How to make it sustainable

# Metadata

- Data about data
- Describe various characteristics of the digital objects stored in the library
- Used for cataloguing purposes
- Many standards available (metadata schemes)
- There is no official only one standard set
- Dublin Core (DC) is de-facto standard

# Open Access Initiative (OAI)

- Main goal: open access as the worldwide electronic distribution of peer-reviewed literature and completely free and unrestricted access to it by all scientists, scholars, teachers, students and other curious minds
- First declared in Budapest, best known as Berlin Declaration (<http://www.openarchives.org/>)
- Includes (a) authors grant free access to users; (b) full version available in at least one digital library



# Teachers expectations and requirements analysis

- Detailed surveys performed in 7 countries
- Three international workshops
- Internet surveys
- Scenarios and use cases developed

# Share.TEC vision

- unlocking teacher education resources & expertise
- building a teacher education hub
- connecting teacher education networks
- bridging cultural differences
- combining market and open potential

# The Share.TEC vision for teacher education

- To offer services for locating and sharing teacher education specific digital content
- To strengthen the European dimension in sharing teacher education digital resources
- To encourage the exchange and reuse of quality contents for teacher education at a European level

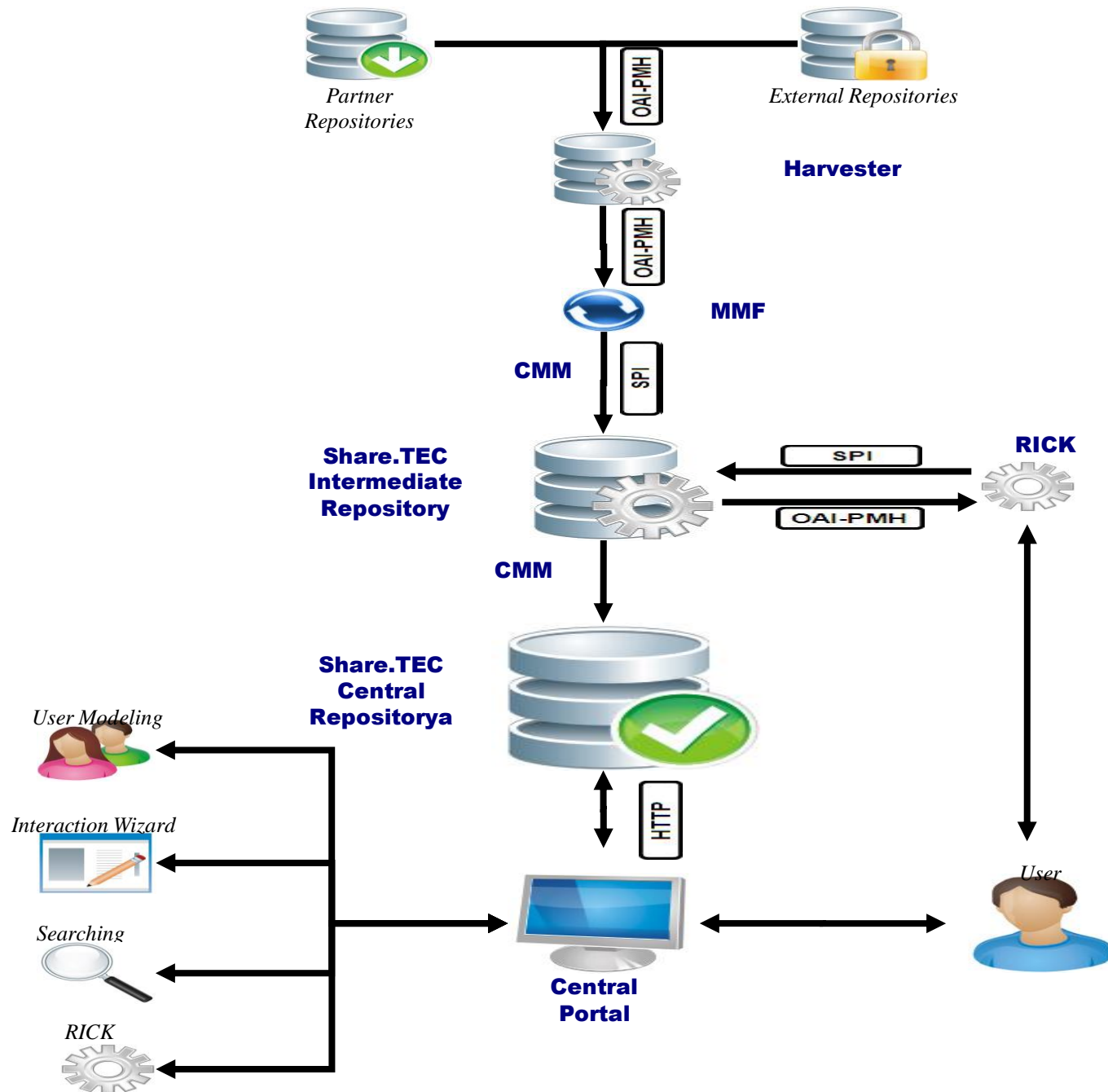


The Share.TEC  
solution

# Share.TEC – the project

- EU project within the eContent*plus* programme during 2008-2011 which has produced a new product for teacher education
- The project consortium:

Istituto per le Tecnologie Didattiche, CNR (IT) (Coordinator) Trinity College Dublin (IE) Università Ca' Foscari, Venezia (IT) Stockholm University (SE) Open University of the Netherlands (NL)	universities, research inst., schools of education
Universidad de Valladolid (ES) Sofia University (BG)	educational technology developers
CLUEB Editore (IT)	educational publisher



# Share.TEC – the platform

- A platform granting unified access to digital resources across Europe that specifically target the domain of Teacher Education
- Share.TEC will help practitioners across Europe search for, learn about and exchange resources of various kinds, and will support the sharing of experiences.



# Share.TEC – the platform

- May 2011: 27 376 objects and 786 registred members
- Create your own profile and enjoy customized solutions for the full Share.TEC experience
- A core of tested teacher education content
- Several different repositories are connected to Share.TEC, broadening reusability perspectives across Europe.

The screenshot displays the 'Create Learning resource' interface of the Share.TEC platform. The page has a light green header with a 'Sign out' button in the top right corner. Below the header, there are three tabs: 'TAKE', 'USE', and 'GIVE'. The main content area is titled 'Create Learning resource' and contains several input fields and sections:

- Title:** A text input field with a red asterisk indicating it is required.
- Language:** A dropdown menu currently set to 'Bulgarian'.
- General:** A section header with a green arrow icon, followed by the text 'This category groups general information about your resource.'
- Description:** A large text area with a red asterisk, intended for a brief description of the resource.
- Resource Language:** A dropdown menu set to 'None', with a note below it stating 'The main language your resource adopts to communicate with the intended user.'
- Keywords:** A section with a red asterisk containing three checkboxes: 'Agriculture and veterinary', 'Education', and 'Engineering manufacturing and construction'.

At the bottom right of the form, there are links for 'out | Contact | My profile' and a small red icon.



# Share.TEC – the platform

- Sophisticated system achieved via a model that helps overcome language barriers and captures pedagogical descriptions
- A gateway to specific teacher education resources
- User focused services
- A boost for the teacher education content market in Europe
- Share your material with others and create new discussion groups



# ... finding your way through the platform

familiar terms to search for resources

personalised options for performing queries

personalised ranking of results

social networking functionalities



**MyShare.TEC**  
teacher education resources

TAKE

USE

GIVE

[Sign out](#)

[Help](#) | [Translation Jobs](#) | [About](#) | [Contact](#) | [My profile](#) | 

# Why is Share.TEC beneficial to teacher education?

## Teacher education

- requires change from traditional culture to shared academic practice
- has limited resources
- needs a unique common teacher education ontology
- needs renewable learning and teaching material

Teacher educator



Professional practice

Student teacher



Student learning  
practices

Practising teacher



Professional development

All three need digital resources that are...

- easy to find and applicable to teacher education
- trustworthy and “road tested”
- (potentially) reusable
- (potentially) multimedia and innovative

# Share.TEC resources



- addressing actors in the teacher education world  
(*not* K-12 students directly)
- encompassing lessons plans, teaching modules, best practices, reference material, etc.
- coming from sources across Europe
- combining “open” and commercial approaches

# Special features the semantic layer of the Share.TEC system

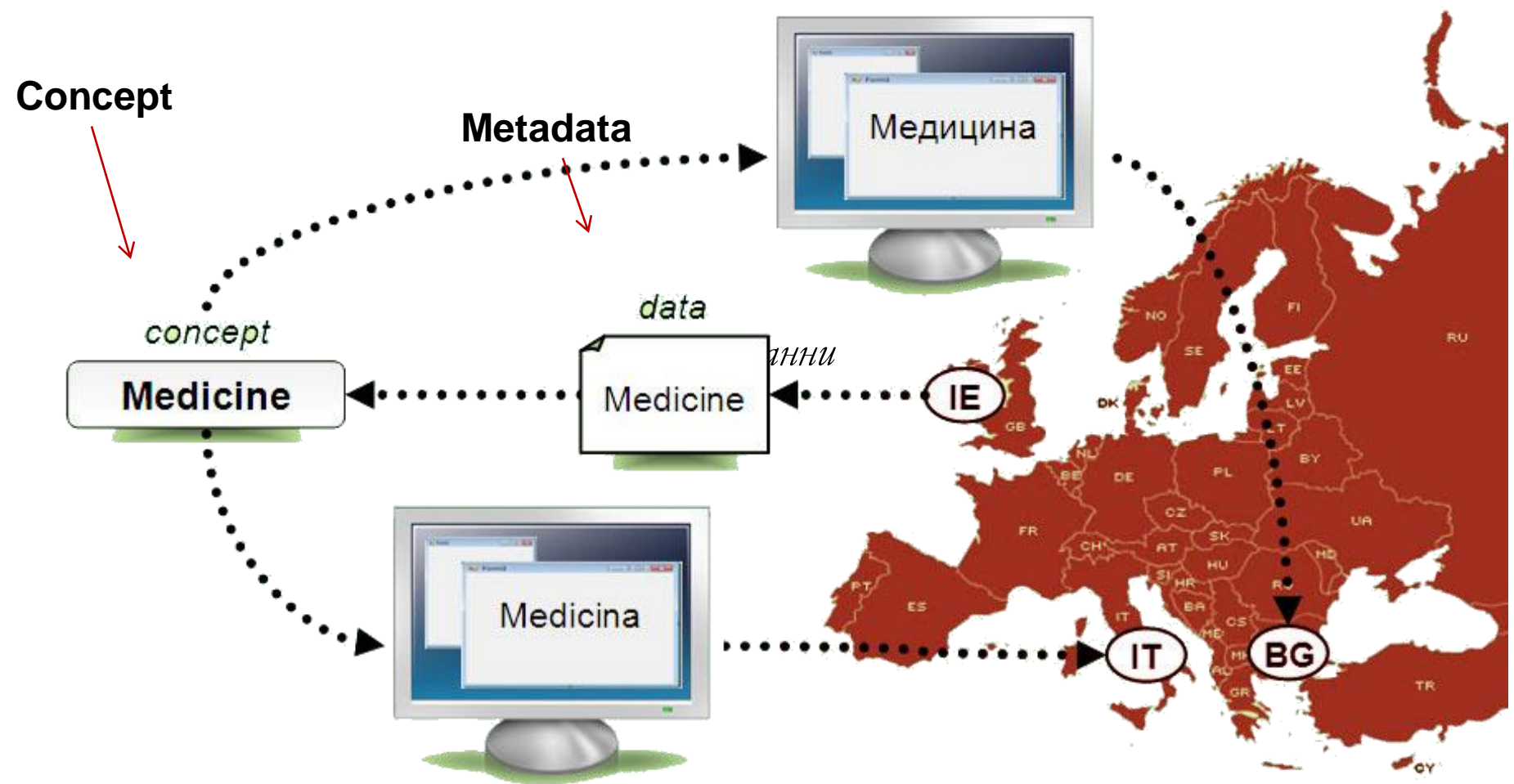
TEO (Teacher education ontology) is

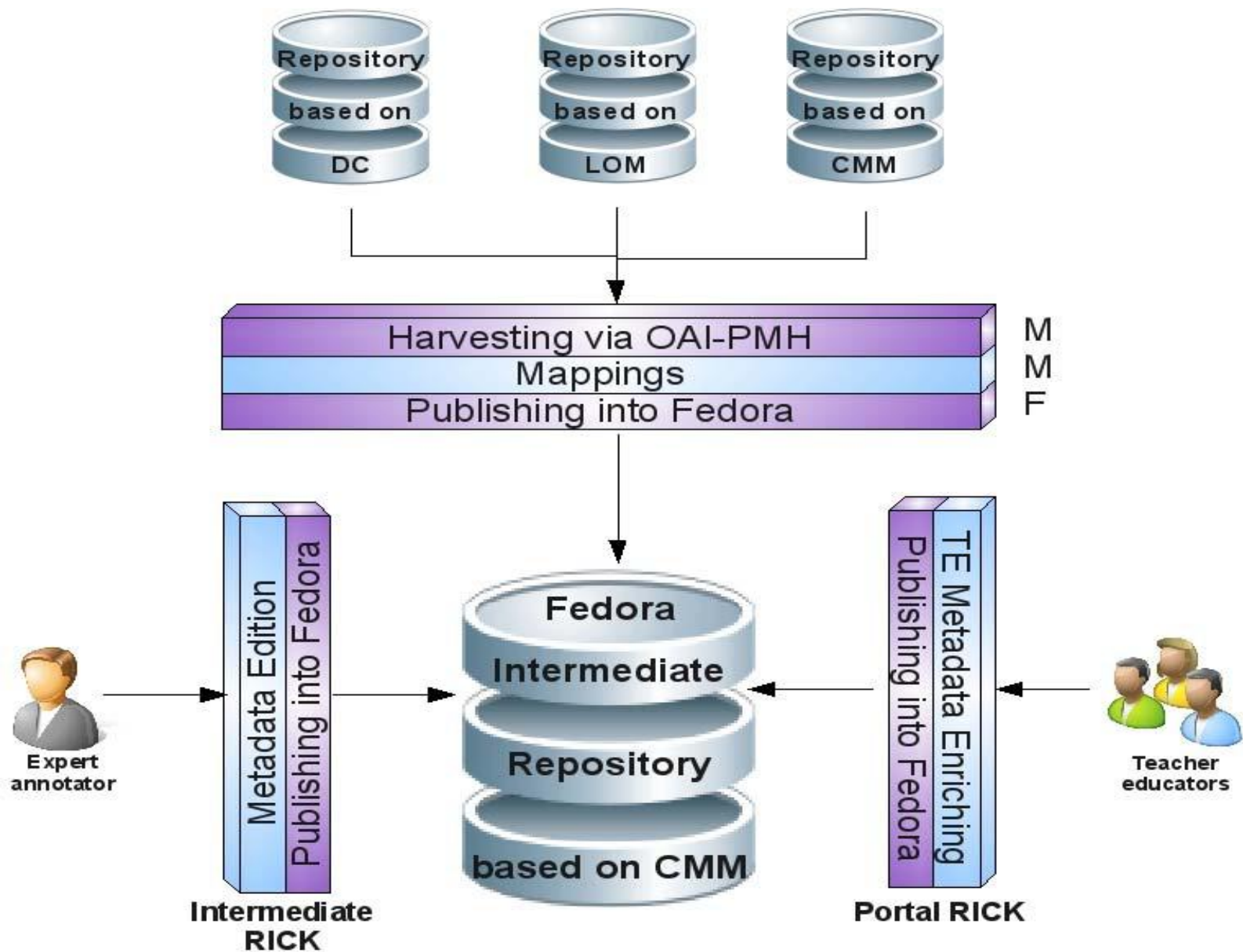
- a representation of teacher education-related concepts,
- a framework for mapping culturally and linguistically diverse versions of that representation.

CMM (Common metadata model) is a prerequisite in the process of harvesting metadata from repositories inside and outside the consortium.

MMM (Multicultural metadata model) is a set of language/context specific derivations.

# Special features - multilanguage layer







# Networking



**БЛАГОДАРЯ ЗА  
ВНИМАНИЕТО !**

**THANK YOU FOR  
YOUR ATTENTION!**