Policy Brief - Open Educational Resources in your Own Language, in your Way

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1.0 Executive summary

Opening up education and Open Educational Resources (OER) are moving higher on the educational agenda for many countries across Europe and becoming a priority. No longer at the periphery of mainstream education, OER are entering the global mainstream in education.[1] However, the uptake of OER in languages which are less used than the world languages, in particular English, is lagging.

Recognizing the importance for nations to adopt Open Educational Resources in their own language, it is recommended for **governments to:**

- **Adopt national policies in support of Open Educational Resources in less used languages.**
- **Facilitate in partnership with private, public and the educational sector, market places and collaborative arenas for quality OER.**
- **Take the leadership in facilitating the development of open frameworks and standards to ease the ability of OER repositories and systems to work together (provide and accept educational content, compatible applications and contextualised services).**

Open Educational Resources offer an exclusive advantage when compared to other educational resources. The characteristics of OER to retain, reuse, revise, remix and redistribute are numerous because they:

- Allow legal extensive use of the resources free of charge.
- Enable increased and low cost access to education.
- Enable increased quality assurance for the learning materials used by learners.
- Enable innovation, creativity and sustainable use.
- Enable the rapid development of courses and programmes.
- Lower the cost of delivering online and blended learning.
- Make available high quality materials at any time when delivered online.

2. Introduction

2.1. Definitions

Open Educational Resources, as defined in the 2012 Paris OER Declaration (UNESCO), are "teaching, learning and research materials in any medium, digital or otherwise, that reside in the public domain or have been released under an open license that permits no-cost access, use, adaptation and redistribution by others with no or limited restrictions. Open licensing is built within the existing framework of intellectual

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[1] Weller M. (2014). The battle for Open. http://www.ubiquitypress.com/site/books/detail/11/battle-for-open

property rights as defined by relevant international conventions and respects the authorship of the work".

OER and Massive Open Online Courses (MOOCs) are two major elements of Open Education. However, in this brief, we will concentrate on OER.

The need to foster the development of OERs in Less Used Languages (LUL) is relevant across Europe. Most European countries' populations are either speakers of LUL as their national language such as Estonian, Norwegian and Romanian, compared with the world languages (and most used languages) in particular English or they encompass one or more Less Used Language communities such as Frisian or Sami.

2.2. The present situation

In recent years, governments in Europe have proposed strategies/policies or passed declarations in support of "Open" education but few refer directly to OER.

At the global level, the United Nations Educational, Scientific and Cultural Organization (UNESCO) and the Commonwealth of Learning (CoL) organized the World OER congress in 2012 during which the Paris OER Declaration was adopted urging governments around the world to openly license publicly funded educational materials. One recommendation was to "reinforce the development of strategies and policies on OER, promote the development of specific policies for the production and use of OER within wider strategies for advancing education". More recently, presidents, rectors and vice chancellors representing a variety of Higher Education Institutions from all over the world called on ICDE and UNESCO to continue their efforts to support and encourage governments to "stimulate the use of Open Educational Resources".[2]

In Europe, Open Educational Resources are supported by the European Commission through its "Opening Up Education" initiative to stimulate ways of learning and teaching through ICT and digital content, mainly through the development and availability of OER. The report of the European Union's High-Level Group on the Modernisation of Higher Education (Oct. 2014) stresses the importance of "full open access of educational resources; in public tenders open licenses should be a mandatory condition so that content can be altered, reproduced and used elsewhere" (recommendation 13).

While a myriad of educational resources have been released today as OER, their availability in languages other than English is much less common and even less so in LUL.

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[2] ICDE Media press, December 5, 2014. www.icde.org/Bali_message

Number of Creative Commons-licensed works
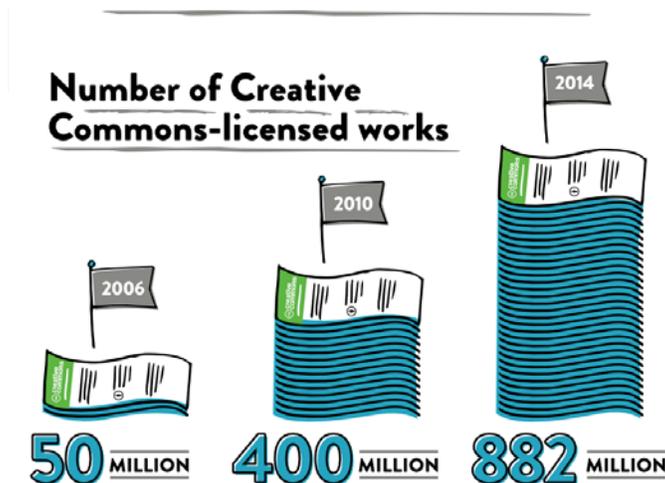
2006 — 50 MILLION
2010 — 400 MILLION
2014 — 882 MILLION

Figure 1: The number of Creative Common-licensed works has grown from 50 million in 2006 to pass 1 billion in these days. The numbers includes all types of works.[3]

At the national level, the landscape for most countries surveyed by the LangOER EU funded project[4] for quality OER in LUL is bleak if the strict OER definition of UNESCO is applied. However, there are some good examples of OER initiatives in Europe like Federica[5] in Italy, Periodica in Latvia (Latvian National Digital Library)[6], NDLA in Norway[7], Scholaris in Poland (most prominent example of state-funded OER platform)[8], RURA in France[9] and Wikiwijs in the Netherlands[10].

3. What are the potential benefits for governments in adopting, promoting and incentivizing Open Education Resources in Less Used Languages?

3.1. Increased efficiency

The Organisation for Economic Co-operation and Development (OECD)[11] expects "open sharing to speed up the development of new learning resources, stimulate internal improvement, innovation and reuse and help the institution to keep good records of materials and their internal and external use".

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[3] https://stateof.creativecommons.org/report/
[4] LangOER publications & reports. Open Educational Resources (OER) in less used languages: a state of the art report - July 2014 http://langoer.eun.org/resources
[5] http://www.federica.unina.it
[6] http://www.periodika.lv
[7] http://www.ndla.no
[8] http://scholaris.pl
[9] http://www.eul.education.fr/consultation/presentation/present/index.html
[10] http://wikiwijsleermiddelenplein.nl
[11] OECD's report: Giving knowledge for free: the Emergence of Open Educational Resources".
http://www.oecd.org/edu/ceri/givingknowledgeforfreetheemergenceofopeneducationalresources.htm

Existence of OER repositories in local languages will attract informal learners and will serve to cross the boundaries between informal learning and formal educational programmes. Such OER repositories will also create opportunities for lifelong learning and support continuous professional development.

An EU's multilingualism policy initiative known as the Barcelona Initiative (every citizen should be able to speak two other languages in addition to their mother tongue) is a solid argument for supporting the development of OER in LUL. EU policy on multilingualism is mainstreamed in all its policies such as culture, youth, social inclusion, lifelong learning and employment.

In addition, when OER by evidence show their efficiency, it is expected that they will spread throughout all education systems and beyond. The History of Open Educational Resources Infographic shows how OER already has expanded from its start in the university system in 1999/2002, mushrooming to different parts of education.[12]

3.2. Improved quality of learning and teaching

According to UNESCO[13], "Using a child's mother tongue in formal education is one of the critical prerequisites for successful learning and intellectual development".

This fact should encourage governments to promote mother tongue on the Internet. However, according to Kornai's study[14] while the Internet offers huge opportunities for learning in different languages, less than five per cent of current languages in the world are in-use online."

The use of OER in LUL may encourage educators and learners to engage in critical reflection and in pedagogical debates that will improve the quality of learning and teaching. Resources that can be reused and remixed can underpin the importance of teachers as critical human capital for development and curation of learning resources.

3.3. Potential cost savings

Public funded educational materials, licensed as OER will in addition to direct cost savings by not paying twice, offer substantial benefits and maximize their return on investment.

In light of the recently adopted OER Paris Declaration, Sir John Daniel, former CEO of the Commonwealth of Learning and David Killion, US Ambassador to UNESCO, wrote in the Guardian newspaper, July 2012: "by being adaptable and accessible, OERs have

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[12] http://elearninginfographics.com/history-open-educational-resources-infographic/
[13] 2008 UNESCO report- Mother tongue matters: local language as a key to effective learning. http://www-01.sil.org/literacy/mother_tongue_matters.htm
[14] http://www.washingtonpost.com/blogs/worldviews/wp/2013/12/04/how-the-internet-is-killing-the-worlds-languages/

the potential to solve the global education crisis and contribute to sustainable economic growth- if governments are prepared to act".

For students, OER will reduce the costs on textbooks. "Open textbooks have saved students 100 million dollars" according to Creative Commons"[15]. Other studies estimating the potential cost saving to students through availability of openly licensed textbooks have also been released[16]. The OER Evidence Report published by the OER Research Hub states in its recent summary "88.4% of learners say that the opportunity to study at no cost influenced their decision to use OER".[17]
For institutions: Broward College Online[18], for example saves USD 250.000/year with OER textbooks.

3.4 Innovative potential
 "79.4% of educators use OER to get new ideas and inspirations" according to the OER Evidence Report (OER Research Hub).

OER offer opportunities for new forms of assessment. "Within organisations offering OEP, OER are more and more used. Methods of quality review like peer-validation, peer-reflection and strategies of peer-review are used to validate content "according to G. Conole and U. Ehlers[19].

OER also offer opportunities for greater intra-Europe mobility. The UNESCO OER community acknowledges that huge potential (language preservation and revitalization, education and development for poverty alleviation) lies in local language OER.[20]

Sharing content and knowledge differently is a driver of innovation in education according to Dirk Van Damme – OECD/CERI[21].Open Educational Resources (OER) can be seen as a social innovation (not a technological one) with the potential of reforming (not revolutionizing) education if they are linked to what we know about learning and to what teachers need. In his opinion OER opens a window on how future societies, knowledge workers and educators will process knowledge: through sharing, collaborating, communities of practice and more.

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[15] https://stateof.creativecommons.org/
[16] http: www.siyavula.com and http://education.gov.za/SiyavulaTextbooks/tabid/886/default.aspx
[17] https://oerresearchhub.files.wordpress.com/2014/11/oerrh-evidence-report-2014.pdf
[18] Broward College Online Case Study: http://www.oeconsortium.org/projects/showcases/oer-at-broward-college-online/
[19] http://www.icde.org/filestore/Resources/OPAL/OPALEhlersConoleNamibia.pdf
[20] Oates,L. (2009). Coming up short in the OER movement: African Language OERs http://ojs.stanford.edu/ojs/index.php/a2k/article/view/449/275l
[21] http://www.slideshare.net/OECDEDU/open-educational-resources-sharing-content-and-knowledge-differently-is-a-driver-of-innovation-in-education

4. What are the main challenges for governments in adopting, promoting and incentivizing Open Education Resources in Less Used Languages?

4.1. The lack of policies and frameworks, and the need to translate policies into action

According to the POERUP overviews of European and international policies relevant for the uptake of OER, "there are very few active national policies and where national policies on open education exist, they do not specifically mention OER". Research shows that "faculty appreciate the concept of OER and are willing to give it a try"[22] but need some support at the national/institutional level.

Translating policies into action requires commitment; not just from governments, but also from institutions and individuals. Grassroot level initiatives need to be supported by relevant national policy initiatives and vice versa: no policies will give results if they are left only as declarations of intent. A relevant example of this is Wikiwijs, an "OER platform for teachers launched by the Dutch Ministry of Education to stimulate development and use of OER and to improve access to digital learning resources"[23].

Effective reform and change often happen at the intersection between top-down initiatives and bottom-up actions. National policies are badly needed as boosters to grassroot initiatives. "While there are numerous top-down initiatives to drive OER adoption (especially with regard to open textbooks), examples of bottom-up policy are rarer."[24]

The progress towards openness and the promotion of OER is significant, but achievements are hindered partly because of resistance towards openness. Policy intervention can help change the climate of resistance and offer directions for more dialogue and partnership at the national and international level.

4.2. Knowledge of quality OER existence, use and impact are low or lacking

"French pedagogic heritage is brim-full of open resources but neither teachers nor students know of their existence and do not know how to reuse them"[25]

Knowing where to find resources is one of the biggest challenges to using OER, and general knowledge of well-established OER repositories is low[26].

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[22]http://www.onlinelearningsurvey.com/reports/openingthecurriculum2014.pdf
[23]http://www.slideshare.net/GrainneConole/promoting-policy-uptake-for-oer-and-moocs
[24] OER Research Hub, OER Evidence Report 2013-2014
[25] http://unesdoc.unesco.org/images/0022/002286/228649e.pdf
[26] OER Research Hub http://oerresearchhub.org

There are very few OER mapping systems like POERUP, OER Research Hub[27] and LangOER projects. Efforts are being made to measure their impact like the ROER4D research project. Obtaining feedback from OER users is difficult because most OER are available openly without the need to register first. Hence, most mapping initiatives depend on voluntary feedback.

"US Faculty judge the quality of OER to be roughly equivalent to that of traditional educational resources" according to E. Allen and J. Seaman. "The most significant barrier to wider adoption of OER remains a faculty perception of the time and effort required to find and evaluate it."[28]

One would assume that small OER markets (such as OER in LUL) do not have the same capacity to exist as bigger ones dominated by the English language. However, the Catalan and Welsh OER markets have proven the opposite: OER can thrive and grow well despite their small markets.

4.3. Linguistic and cultural hindrances to the use and reuse of OER

Languages are often considered as barriers rather than assets as practitioners may not know how to deal with multiple languages in the classroom for example. There is also a lack of awareness that multilingualism can enrich education.

In order to reach multilingual and LUL communities across Europe, resources must "travel well" - that is to say, be transferable and contextualized. They must be operative and able to readapt for use in a cultural and linguistic context different from their origin. Translation of OER is an option but relying on translation of learning material mainly undermines building the knowledge capacity within your own cultural context. If OER are not offered in LUL, learners and educators will turn to dominant languages, which in turn will weaken educational resources in LUL.

4.4. Lack of good models

Fragmentation, fear of low quality, lack of incentives, weak market etc. can be tackled and overcome if an ecological approach in creating and using quality OER is adopted. Norway has developed such a model (ref: box 3) for upper secondary education. The model builds on the belief that education is a public good and public funds should be used to develop learning resources. This allows for releasing the material under a Creative Commons license and therefore to be open for use, reuse, remix, readaptation and redistribution. The defined OER ecosystem will help the smooth progress of OER toward mainstream adoption. The National Digital Learning Arena (NDLA) is presented

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[27] OER Research Hub http://oerresearchhub.org
[28] http://www.onlinelearningsurvey.com/reports/openingthecurriculum2014.pdf

in the recommendations, section 5.2

4.5. The culture of open sharing is not yet understood, accepted and anchored in the education system

The culture and habits from the printed world and traditional publishing sector are transferred to the digital world while it requires a redirection. OER are still perceived as (and are) a threat by the publishing industry. The culture of open sharing is not yet understood, accepted and anchored in the education system.

5. Policy recommendations

Several players have delivered policy oriented papers that can be used for inspiration in building national policies for OER: the EU High Level Group[29], Open Policy registry[30] (examples of approved policies at national institutions, state levels), Open Policy Network[31] (provides assistance for policy makers and Policy Development and review toolkit developed by OER Africa). The joint ICDE – UNESCO Policy Forum[32] suggests several policies for a holistic approach to open education, OER and open access.

The UNESCO IITE[33] country reports provide an overview, perspectives and recommendations such as the report for France published in October 2014.

Our conclusion is that to create a favourable environment for the uptake of OER in LUL, governments should:

- Adopt national policies in support of Open Educational Resources in Less Used Languages.
- Facilitate in partnership with private, public and the educational sector, market places and collaborative arenas for quality Open Educational Resources.
- Take the leadership in facilitating the development of open frameworks and standards to ease the ability of Open Educational Resource repositories and systems to work together (provide and accept educational content, compatible applications and contextualised services).

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[29] *EU High Level Group calls for targeted funding to boost use of new technologies in higher education.* http://europa.eu/rapid/press-release_IP-14-1188_en.htm
[30] Open policy registry: https://wiki.creativecommons.org/OER_Policy_Registry
[31] Open policy Network: https://openpolicynetwork.org
[32] http://icde.org/en/.b7C_wRrOXp.ips
[33] Touzé S. (2014). Open educational Resources in France: Overview, perspectives and Recommendations.UNESCO IIETE: Moscow. http://unesdoc.unesco.org/images/0022/002286/228649e.pdf

5.1. Governments should adopt national policies in support of Open Educational Resources in Less Used Languages

To grasp the full benefits from OER and learning in the context of the country's own language(s), governments should develop a holistic and coherent policy for development and use of OER in their own languages. Policies should address critical issues such as funding, capacity building and sharing, as well as possible regulatory issues. Incentives, monitoring and assessment mechanisms should be included in national and institutional policies.

While national policy decisions are the focus of our recommendation, regional, community and institutional policy decisions are also of crucial value for the uptake and use of OER.

Policy decisions in favor for open licensed OER in LUL are the number one critical success factor for ensuring their uptake and maximizing their benefits.

Box 1. Example Open Textbooks: Western Canada OER initiatives

"In April 2014, the three Western Canadian provinces signed a Memorandum of Understanding agreeing to cooperate and share in using and adapting OER. This builds on the October 2012 British Columbia Ministry of Advanced Education support for the creation of open textbooks for the 40 highest/enrolled first and second year subject areas in the province public post-secondary system. In May 2014 the initiative received funds for a further 20 open textbooks for skills training and technical programs. The Alberta Ministry of Education has also committed to 2 million USD to the support of OER in collaboration with the other provinces." Rory McGreal, ICDE Chair in OER

Box 2. The Netherlands: The Wikiwijs initiative

"Wikiwijs was a top-down program, launched in 2008 by the Ministry of Education. All content in its repository is made available under a Creative Commons Attribution or Attribution-Share Alike license. Wikiwijs has a peer review mechanism for ensuring quality, as well as quality marks certified by partner organizations. The goal of Wikiwijs is not just to increase the development and use of OER, but to support teachers in professionalization and the creation of their own teaching materials or courses. The system makes available to Dutch teachers 650 000 content building blocks and 35 000 full lessons. Robert Schuwer from the Open University, the Netherlands reported at the Creative Commons policy discussion on "Really Open education" in the European Parliament in Feb.2014 that the Dutch government has recently announced a program that will provide EUR 1 million a year for development of open and online education at the higher education level."[34]

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[34] http://oerpolicy.eu/really-open-education-policy-discussion-in-the-european-parliament-18th-february-2014

5.2 Governments should facilitate in partnership with private, public and the educational sector, market places and collaborative arenas for quality OER.

The OER community and stakeholders with a potential interest in OER is fragmented and have few arenas for collaboration, funding and development. At national level, governments and national agencies could consider incentives for networking that can act as catalysts for increased collaboration and innovation in OER. Collaboration should include the possibility of private-public partnerships.

When considering models and concepts for arenas and marketplaces, one should consider building on and adapting existing successful structures, like in the Norwegian example NDLA model. Models to stimulate and incentivize the uptake of OER in Less Used Languages should focus on the following:

- Inclusion of faculty, teachers and the education sector in the lifecycle.
- Creation and production of OER.
- Use of public and or institutional procurement when relevant.
- Quality assurance.
- Storing.
- User-friendly access.
- Identifying new needs for OER.

Box 3: Example of a national working eco-model for OER: the National Digital Learning Arena (NDLA) Norway

In 2006, the Norwegian Ministry of Education and Research put forward a suggested resource allocation of NOK 50 million for digital learning resources in upper secondary education. The county councils were given, by a change in legislation, the responsibility for printed and digital learning resources. The county councils initiated a cooperation to deliver open digital learning resources. This cooperation is today NDLA. It involves the market, the teachers and students in the processes. The current operating annual budget is approximately 8 million EUR. NDLA is set up as a virtual organization. The administrative resources are pooled from the counties in order to keep the cost at a minimum.
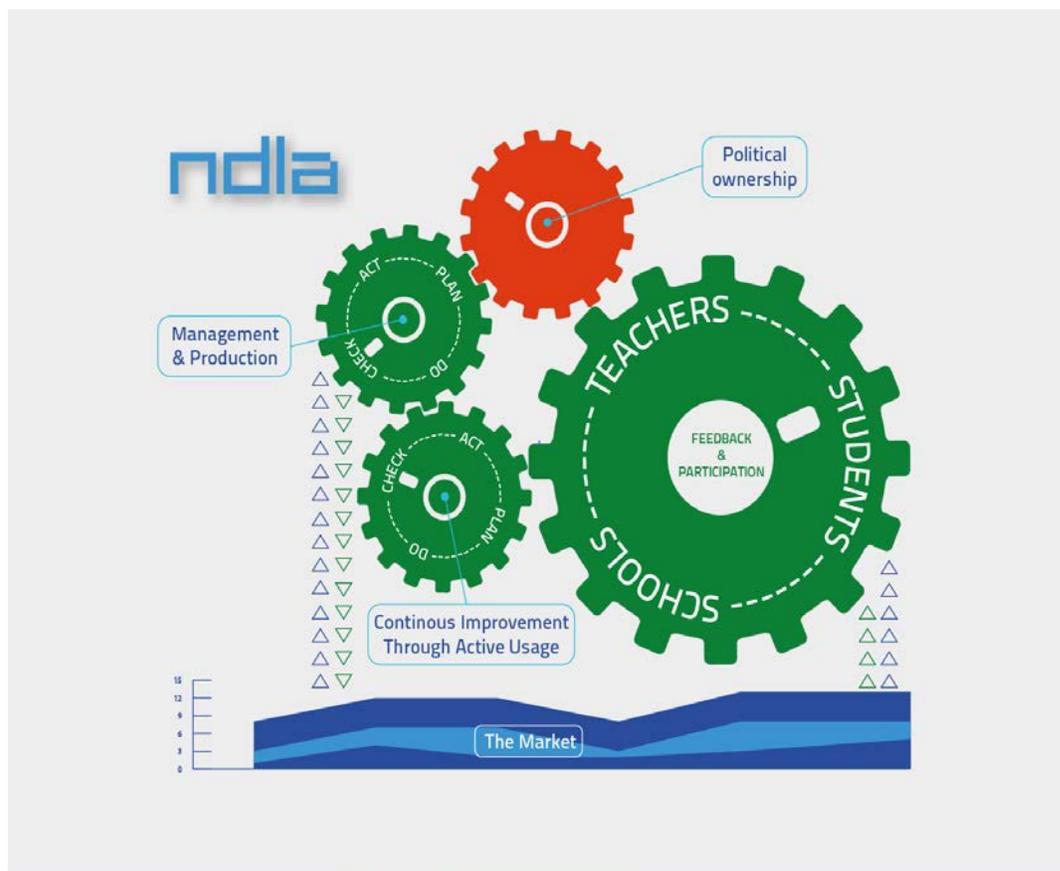
NDLA is a public partnership, co-owned by 18 (out of 19) county councils in Norway. The goal is to cover all subjects at upper secondary level with open digital learning resources (OER) of high quality.

Figure 2: The NDLA example shows how the public ownership of both the national school system, and a national OER body, now supports a sustainable market for both traditional and open learning resources.

5.3. Governments should take the leadership in facilitating the development of open frameworks and standards to ease the ability of OER-repositories and systems to work together (provide and accept educational content, compatible applications and contextualised services)

To benefit from the full potential that OER offer, OER repositories and systems should be open for use across languages, cultures and countries.

Seamless access to quality OER across institutions, languages, and countries would be a significant achievement for learners, faculty and the educational system as a whole and would also ease cultural adaptation of OER.

Seamless access requires several issues to be solved and play together: translation, semantics and metadata, platform interoperability and content accessibility.

The availability and richness of OER in dominant languages such as English should not be considered as a threat but rather as an opportunity for the development of OER adapted to local languages and cultures.

Repositories that offer access to OER need national and international standards and frameworks of classification to follow so that they can be easily recognized and accessed across institutions, countries and languages. Standardized import/export facilities for OER should also be used to unlock the resources.

As shown in 4.1, hindrances to find, evaluate and use OER is a major challenge for wider adoption of OER. In our view, offering user-friendly, seamless access to quality OER has the potential to be a game changer for education.

This is a more long-term policy recommendation, which needs to be addressed early by intergovernmental organizations and actors as UNESCO, the EU and others.

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Some other relevant links
- UNESCO has a policymakers' toolkit for ICT in education: http://www.infodev.org/en/Project.11.html
- Language Policy in Estonia: http://www6.gencat.net/llengcat/noves/hm04primavera-estiu/docs/rannut.pdf
- British Columbia Campus OpenED: http://open.bccampus.ca/about-2/
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