



Strategic Plan

2019 - 2021

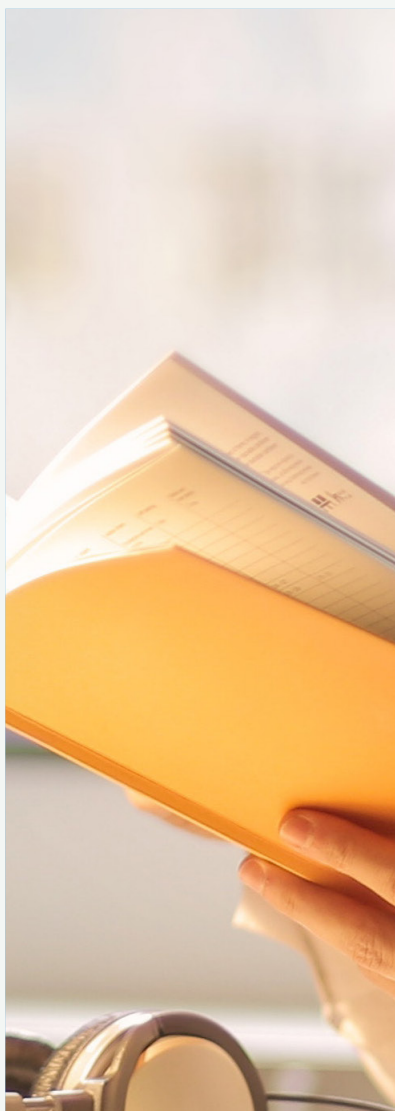
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1

Scope

This document outlines the strategic direction for the Commonwealth Centre for Connected Learning, an education foundation registered in Malta.



2

Approach

This high-level Strategic Plan was developed in an iterative manner through workshops and consultations with key stakeholders.



Figure 1: Methodology

3

Background

In September 2015, the Commonwealth of Learning (COL) and Malta's¹ Ministry for Education and Employment (MEDE) started discussions on more inclusive approaches to education. COL, as an intergovernmental organisation promoting the development and sharing of open learning and distance education knowledge, resources and technologies, has a legitimate interest in the area. MEDE was actively looking for solutions that empower young people in the EU's smallest nation state to follow academic, VET and applied learning paths.

Education policy-makers in Malta are increasingly aware that the attention to ICT infrastructure (including investment in classrooms with whiteboards and broadband and free tablets for younger students) has not been matched by changes in pedagogy, assessment or accreditation regimes.

In its discussions with COL, MEDE found further common ideological ground on lifelong learning² and its development of a lightweight accreditation framework for online education – irrespective of the jurisdiction where the teaching and learning originates³. COL has been developing the Transnational Qualifications Framework (TQF) for small states⁴.

Malta's work with the accreditation of digital education is of significant interest not just to the TQF, but in opening up opportunities for online learning to be accredited in more than one EU jurisdictions.

¹ Malta is an archipelago of three islands situated in the central Mediterranean some 93km south of Sicily and 288 km north-east of Libya, with a surface area of 316 sq. km. and an indigenous population of 417,617. It is the smallest and most densely-populated country in the EU. Malta has been a member of the Commonwealth since 1964.

³ The framework provides a process for the licensing of e-learning providers and e-learning programmes by the National Commission for Further and Higher Education and is open to any providers of formal education who wish to be licenced to: a) operate within the Republic of Malta, and/or; b) award ECTS credits within the European Higher Education Area. Malta is a full member of the Bologna Process and the Malta Qualification Framework is referenced to the European Qualifications Framework. An institution that has courses accredited in Malta can de facto seek recognition for its courses in other EU jurisdictions.

² See Malta National Lifelong Learning Strategy 2020.

⁴ The Transnational Qualification Framework (TQF) provides small states with procedures and guidelines to translate national accreditation for recognition through the international accreditation program of the Virtual University for Small States of the Commonwealth (VUSSC).

There are a set of characteristics in Malta which, although not unique, when taken as a 'composite' make the island a compelling proposition as an innovation lab. These include small size, topography, cultural and language diversity, strategic location and – perhaps most significantly – the proximity of policy-makers to emerging markets⁵. Malta is strategically placed between two global, political groups – the Commonwealth and the EU. Once the United Kingdom completes its exit from the European Union, Malta could become a linchpin between the two groups.

On 25 November 2015, during a Commonwealth Heads of Government Meeting in Malta⁶, MEDE signed a memorandum of understanding with the Commonwealth of Learning. One of the key proposals for collaboration was the establishment of a Commonwealth Centre for Connected Learning ('3CL') to lever on the potential of technology and make education more relevant and inclusive to citizens through connected learning praxis, contributing to the development of essential, inclusive 21st century skills⁷ in the process.

⁵ Malta aspires to become one of the top 10 global information societies. The ICT industry is a primary pillar of the economy and a driver for the service industry, with the Internet positioned as a social equaliser. Government's drive to invest in technology has been complemented by fiscal and regulatory incentives to attract inbound hi-tech investment and a reputation for best practice in e-government in Europe. For instance, a reputation for the testing of mobile telecoms and broadband technologies eventually led to the establishment of SmartCity Malta, the first European outpost of the SmartCity global network of business townships set up to attract knowledge-based companies serving the EU and North African markets. In 2004, Malta became the first EU Member State to enact comprehensive legislation on remote gaming, and industry stakeholders consider Malta as on.

⁶ See <https://www.col.org/news/items/malta-ministry-education-and-employment-and-col-announce-partnership-collaborate-digital>

⁷ See World Economic Forum (2015). New Vision for Education: Unlocking the Potential of Technology. The report identifies 16 skills including 'ICT Literacy' as a functional literacy and 'Critical thinking / problem solving' and 'communication'.

3.1. Structure

The Centre was established as an education foundation and registered as a legal entity LPF-246 by the Registrar for Legal Persons in Malta on the 15th February 2017. The Centre is managed by a Board of Management working closely with an International Advisory Board that is chaired by the President and Chief Executive of COL.

The Centre has been operational since 2016, leveraging on proprietary networks for quick wins. A MOOC platform developed by the Indian Institute of Technology, MOOKit, is being used by Malta's Institute for Tourism Studies to develop online courses which may, in turn, be used as case studies for other island states.

Pilot Teacher professional development programmes in ICT in Malta are exploring COL's Commonwealth Certificate for Teacher ICT Integration (CCTI). COL and the Centre helped the University of Malta fast-track its open access policy.

The Blockcerts nation-state project piloted in Malta is being monitored by COL as a live case study to feed into its databank of reviews of large-scale, government-supported educational tablet initiatives. Figure 2 includes early operational milestones.

Figure 2: Early Operational Milestones



3.2.

Connected Learning as a driver of change

Connected learning is a transversal policy for changes that need to be activated not just within the Maltese education system, but in developing countries where technology may be used as an enabler of much-needed change in education frameworks.

In a seminal report, Ito et al. (2013) define connected learning as an approach to education that is “socially embedded, interest-driven, and oriented toward educational, economic, or political opportunity”. Connected learning is typically realised when a young person is able to pursue a personal interest or passion with the support of friends and caring adults and is in turn able to link this learning and interest to academic achievement, career success or civic engagement.

This model is based on evidence that the most resilient, adaptive, and effective learning involves individual interest as well as social support to overcome adversity and provide recognition. Built on the three core values of social equity, full participation and social connection, connected learning advocates for broadened access to learning that is socially embedded, interest-driven, and oriented toward educational, economic or political opportunity.

In a November 2015 TEDx talk⁸, Will Richardson, a former secondary school teacher and writer, shared two slides which he said illustrated the disconnect between what teachers believe, and what they actually practice in the classroom.

Conditions for powerful learning (what teachers believe)	What people never say (and what is practiced in schools)
Safe environment	Sitting in rows
Personal investment	45/60/88 Minute Blocks
Real world application	One sized curriculum
Fun	One subject area focus
Relevance to their lives	Area-grouped co-learners
Social	No 'real-world' application
Interesting Questions	Teacher-controlled
Positive Environment	Someone else's questions
Real Audience	Standardized Assessments
Passion	Emphasis on Grades
Teachers / Mentors	Carrots and Sticks
Autonomy and Agency	No Choice / No Agency
Challenging	Lack of Relevance
Not Time Constrained	"Handing it in"

Table 1: Conditions for Powerful Learning vs Actual Practice

⁸ See <https://www.youtube.com/watch?v=sxyKNMrhEvY>

Faced with this stasis, policy-makers need to become pragmatic. It is within this context – an increasing awareness of how education systems fail young people whose real lives outside the class bear little resemblance to what is being served as ‘curriculum’ – that connected learning becomes a compelling proposition. Although its principles have been part of the education vernacular before the advent of the Internet, in 2019 connected learning is closely associated with the development and exchange of knowledge and ideas among students and educators through the use of information technology that enables learning that is not bound by geographical limitations. The emergence and mass uptake of online social networks revived interest in connected learning as a learner-centric framework (see Benkler [2006, 2011; Rheingold 2012]).

Social media, digital games and digital production tools are used by lone educators to push against the boundaries of one-size-fits-all curricula in the belief that the most resilient, adaptive, and effective learning involves individual interest combined with social support. This is inclusive yet very personalised learning by praxis, overcoming adversity and providing recognition for skills gained via alternative routes. For educators adopting connected learning principles, the various experiences, interests and contexts in which learners participate—in and out of school—are potential learning opportunities that may also lead to academic achievement, career success or civic engagement.



The use of online social networks also activates communities that are not necessarily geographic: people use social media to connect with others who share similar interests and co-learn; older learners can lever on online peer-learning networks to pursue niche interests in the information age where in principle, social connections are abundant; academics can actively start to pursue opportunities for curriculum re-design.

Connected learning draws on technology to activate people's interests, friendships, relationships and academic achievement through experiences grounded in hands-on production, shared purpose and open networks. It represents a framework for understanding and supporting learning, as well as a theory of intervention that grows out of our analysis of today's changing social, economic, technological and cultural context.

Connected learning experiences are also increasingly associated with 21st Century skills and 'deeper learning' demanded by the labour market. Framed against this ideal context is the embedded 20th century model of teaching and learning in classrooms that still have learners in classrooms and lecture halls that resemble assembly lines.



3.3.

Target Stakeholders

The Centre collaborates with stakeholder groups irrespective of geographical location.

Table 2 identifies key stakeholders:

The remainder of this document summarises the key components of the strategic plan and serve as a primer for both the foundation and its stakeholders to engage in projects of mutual interest. Where possible, a tabular approach has been employed to facilitate a quick read.

3CL Target Stakeholders	Target Stakeholder Characteristics
Institutional and OER leaders	People who embrace new learning processes online, in their classrooms and elsewhere on campus or in their communities. They develop new organisational structures that serve as diverse a population of students with a variety of professional researching and learning engineers as well as traditional faculty - recognising, encouraging and rewarding interdisciplinary collaborations seeking to advance both the science and practice of learning.
Legislators and policy-makers	People who can demonstrate their support for education innovation through forward-looking regulatory actions, funding for interdisciplinary research and novel program opportunities.
Legacy education companies	Institutions that contribute experience in areas such as curriculum design, delivery at scale, data analytics ⁹ and can accelerate the adoption of science-based learning practices.
Foundations and associations	Organisations collectively representing networks of stakeholders with limited resources for direct participation, and prepared to convene and support key projects, and disseminate lessons learnt.
Educational researchers	Experts prepared to collaborate beyond the usual research silos and ensure their scholarly gains are translated in tangible improvements for learners, based on the best science and the most promising opportunities. Digital learning tools offer opportunities for rapidly scaling best practices in many modes of education. Researchers must guide the selection and development of these best practices to help bridge the gap between research and practice.

Table 2: Characteristics of Target Stakeholders for the 3CL

⁹ The Canadian scholar George Siemens observes the lack of analytics built into the design of OER material as opposed to content from publishing companies who continue to dominate the educational content market through value layers. Siemens believes that education institutions today are more likely to use analytics to support existing systems that can be controlled as opposed to demonstrating the value of alternatives.



4

Vision & Mission

The Centre operates as a virtual knowledge hub for a global network of groups, agencies, institutions and activists interested in the rapid deployment of pilots for connected learning.

The Centre plans to operate in four intervention areas:

1

Learning content
and approaches

2

Teachers, educators
and school leaders

3

Democratic
learning culture

4

Cooperation,
partnerships & synergies

Based in Malta, the Centre takes a lead in connecting stakeholders in the Commonwealth with EU countries on projects and opportunities of mutual interest. The Centre is committed to social entrepreneurship values and equity in education.

5

Strategic Objectives

Four objectives support the Vision:

1

Increase quality and relevance
of digital learning

2

Increase impact of educators

3

Address inequalities and social integration
in society through accessible and
cost-effective education

4

Support and disseminate applied research
and best practices in tech-enabled
and connected learning



Table 3 summarises the key objectives articulated in the foundation document, and identifies a set of initial challenges to be addressed by the Centre:

Objectives in Foundation document	Challenges
<p>Objective 1: Increasing the Quality and Relevance of Digital Learning</p> <ul style="list-style-type: none"> • By making learning more interactive and connected through the strategic use of digital media – more responsive to learners' individual needs and goals through innovative pedagogies and use of the learner's progress analyses (for instance through data analytics). • By making learning more collaborative, connecting the learner to peer learning networks, wherever these may be, and blending formal education with informal and non-formal learning. • Through support and advocacy for the creation and use of open educational resources and new forms of teaching and learning practices, exploring new methods that may regenerate educational content, curricula and assessments 	<ul style="list-style-type: none"> • Ensuring the relevance of digital learning implies a number of issues that include: quality assurance; the complementarity between open educational resources, self-produced and "traditional" educational materials; the need for transparent, equitable, modular assessment regimes that validate and certify the skills and knowledge acquired, irrespective of the medium used for such acquisition. • Making sense of the abundant amount of resources available in today's connected world is problematic. • A wider perspective of 'quality' should also be considered to include the qualitative shift in forms of teaching and learning which digital education entails.
<p>Objective 2: Increasing the Impact of Educators</p> <ul style="list-style-type: none"> • Facilitating new pedagogies and research tools for a more personal and effective interaction with each student and enabling deep learning in individuals. • Training educators in 21st century skills to make teaching more effective, engaging and relevant for learners. 	<ul style="list-style-type: none"> • Paying attention to the social and human impact of digital education means focusing on the impact on teachers exposed to radical changes in their roles. Educators have to move out of a siloed mindset where they are accustomed to learning the same set of standards and think about how they can help learners translate their interests into different domains – social domain, civic or academic. • This requires continuous and specific teacher training and shifts in the structures of educational systems and institutions to allow educators the necessary freedom, autonomy and flexibility.
<p>Objective 3: Addressing Inequalities and Social Integration in Society through more relevant, accessible and cost-effective education</p> <ul style="list-style-type: none"> • Ensuring technology and support is provided to enable learners to digitally access the best content, resources and teachers. • Developing and providing access to OER collaboratively maintained by educators, enhancing the quality and relevance of teaching materials while reducing their cost. 	<ul style="list-style-type: none"> • Paying attention to factors that may limit access to knowledge and skills when learners, peers and educators can meet and exchange in virtual environments. Physical location and socio-economic backgrounds need to be factored into more inclusive approaches to education. At different stages of life, educational provision can be enhanced by reducing intergenerational inequalities.

Objectives in Foundation document	Challenges
<p>Objective 4: Supporting and disseminating applied research and best practices in tech-enabled and connected learning</p> <ul style="list-style-type: none"> Transforming research needs into pragmatic information and advisory services for target stakeholders on any aspect of technology-enabled and connected learning, including the selection of appropriate infrastructure. 	<ul style="list-style-type: none"> Learner-centric (as opposed to institutionally-sound) approaches are dependent on bringing together teachers in the field with social scientists, researchers and policy-makers with a combined sense of urgency and a common commitment to social enterprise in education.

Table 3: Objectives and Key Challenges¹⁰

The strategic objectives are indicative of the urgency to shift the discourse on technology in education, from policy and investment in ICT infrastructure to praxis. Education systems should contribute to the development of 21st century skills, including digital literacy, and increasingly data literacy. Yet algorithms in education tend to be designed by people with strong data and technical skills but a narrow perspective of equity and social inclusion. The bias that exists within such systems needs to become explicit, particularly if we want to address inequities and integrate social learning and eliminate bias towards learners who are disenfranchised, such as refugees or people in poverty.

There is a need to address the issue of universal accreditation of learning, irrespective of the medium used for teaching and learning. Technology can be used for individual learning profiling, paving the way for radical changes to curricula. It is more than timely to investigate those attributes of education systems that are no longer aligned with the affordances of technology and analytics.

¹⁰ Adapted from Grech (2016)

6

Strategies

The Objectives are underpinned by three inter-related strategies:

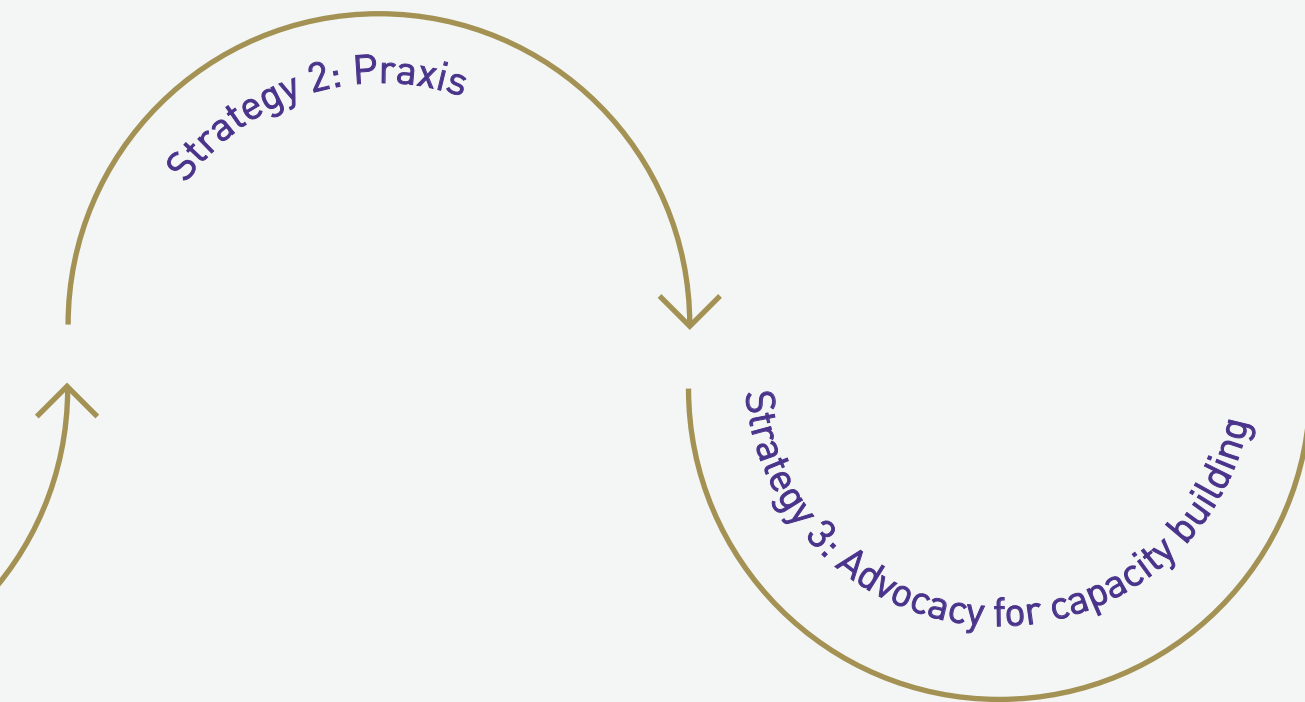
Strategy 1: Action Research

Strategy 1: Action research

- The Centre engages with academic and professional researchers worldwide and brokers participation in research areas that are in concert with this strategic plan. Strategic alliances are being developed with universities, higher education institutions, consulting firms and the labour market, primarily in the Commonwealth and EU member states.
- The Centre will commission action research in strategic and ideally high-profile areas of interest that resonate with target stakeholders. Research findings will be published through peer-reviewed, third-party publications as well as 3CL-branded research reports to be published online under the most current version of the Creative Commons Attribution International (CC BY) licence.
- The Centre will collaborate with third party institution bids for research funding and monitor and potentially fund research that may lead to the development of patents in areas of interest or expertise.

Strategy 2: Praxis

- The Centre facilitates, develops and shares high-profile pilots that can be replicated as use case studies. This process involves the activation and management of three inter-connected pathways: peer-learning networks; connected learning principles and open education resources.
- Putting connected learning into practice requires the personal commitment of the Centre's leadership to activate peer-learning networks for the benefit of individual learners. The mobilisation of stakeholders is necessarily dependent on the ability to connect and empower participants through lightweight support systems of institutions and experts, aligned in placing the learner at the centre of more inclusive education propositions.
- The Centre operates as a change agent on relevant projects with identifiable deliverables. The emphasis on replicable pilots means that individual visionaries, wherever they may be located, must have the propensity to collaborate and act in concert.



Strategy 3: Advocacy for capacity building

Role models are successful individuals, groups and institutions that are willing to pilot new, thoughtfully designed approaches. Pragmatic, quick wins will secure support if they are replicable; cultural differences easily identifiable; and 'red-tape' eliminated at the outset.

- Energised forms of digital scaffolding can shift the emphasis from policy discourse to praxis, helping learning institutions, teachers and learners acquire digital skills and learning methods. Providing learning support through the creation of relevant case studies can encourage education institutions to re-evaluate and implement much-needed change in curricula and modes of assessment.
- To ensure that technological, institutional and pedagogical advances benefit the many, the Centre is as engaged with brokering non-formal, informal, professional, applied and modular learning as it is interested in supporting change in formal academic pathways.

- The Centre is an advocate for connected learning and more inclusive approaches to education. In the process it builds capacity as a virtual incubator, integrating skills from different institutions and collaborating on strategic projects with clear 'needs' and 'wants'.
- Advocacy needs to be underpinned by a commitment to pragmatic programmes that add value to stakeholders.
- The Centre's location in the EU's smallest member state and proximity to Africa makes it ideal for projects that can lever on Commonwealth-EU collaboration.

7

Programmes

The strategies are underpinned by six strategic programmes.

Programme 1: Blockchain in education

Supports: Strategy 1 – Action Research and Strategy 2 – Praxis

- Malta has positioned itself as a Blockchain island, introducing three sets of legislation to facilitate the emerging fintech industry and business models based on distributed ledger technologies.
- There are a combination of factors that are contributing to the Centre being associated with an emerging area which is monitored by many countries. MEDE has piloted the first nation state implementation of blockchain credentials using the Blockcerts open standard¹¹, and in the process established an important use case study. The organisation of a conference on Blockchain in Education in 2018, the publication of a report for the European Commission the subject¹², and the research and consulting activities of the 3CL Director have established the Centre as an authority on the impact of blockchain technologies on the education sector.
- The University of Malta has set up a Centre for Distributed Ledger Technologies. The Centre's director has been appointed on the board, which will facilitate future research collaboration with the University.
- As a decentralised, trustless system, the potential of the blockchain for connected learning is relatively in its infancy. The notarisation of learning credentials on the blockchain is tantamount to digital self-sovereignty. From a technical perspective, through the affordances of cryptography and distributed ledger technology, the verification and validation of identity occurs without the prerequisite of a central database. The Centre will continue to explore opportunities for practical applications and blockchain use case studies, leveraging on success stories in Malta and the Bahamas.

¹¹ See <https://spectrum.ieee.org/tech-talk/computing/networks/malta-pilots-blockchainbased-credentials-program>

¹² See http://publications.jrc.ec.europa.eu/repository/bitstream/JRC108255/jrc108255_blockchain_in_education%281%29.pdf

Programme 2: Small states & technology

Supports: Strategy 1 – Action Research and Strategy 2 - Praxis

- The Centre participates in, coordinates and leads regional and global initiatives that focus on use case studies and emerging models of best practice in small states in the Commonwealth and the EU. The Commonwealth defines small states as sovereign countries with a population of 1.5 million people or fewer. Thirty-one of the fifty-three Commonwealth member countries are small states.
- A strategic partnership is in place with the Commonwealth Small States Centre of Excellence. The Centre will lever on its excellent relationship with organisations such as COL's Virtual University for Small States of the Commonwealth (VUSSC), UNESCO and the EU ET2020 Working Group on Digital Education to focus on socio-economic and cultural issues that are specific to small states.
- The Centre will actively seek alliances and cooperate with academic and professional organisations interested in exploring the affordances of emerging technologies and connecting learning and their practical application within a small states context. Such organisations include the Islands and Small States Institute at the University of Malta and the Connected Learning Alliance¹³.

Programme 3: Conferences & training

Supports: All Strategies

- The Centre organises international conferences and workshops, primarily in the EdTech sector. It is expanding its geographic reach, from organising conferences in Malta to other countries in Europe in collaboration with trusted partners.
- The 3CL is exploring opportunities to broker short, specialist training courses. Levering on the expertise of its networks, the Centre is taking an incubator approach to training as a low-cost, blended connected learning demand centre.
- The Centre's focus on praxis and use case studies and expertise in emerging areas such as blockchain, lifelong learning and EdTech and commitment to open education could result in education brokerage services. This commitment needs to be supported by forging alliances with third parties outside orthodox public sector institutions and through new sources of funding, procedures and documentation.

¹³ See <https://www.um.edu.mt/islands> and <https://clalliance.org/>

Programme 4: Open education

Supports: Strategy 2 – Praxis

- The Centre is committed to promoting, supporting and engaging with more open and inclusive approaches to education. It participates in international conferences on open education policies and leadership; Creative Commons are represented on the international advisory board. The Centre is a member of the Groningen Declaration Network (GDN) and an advocate for Copyright reform in the EU.
- The future of online education continues to polarise views: from those who believe that we are at the cusp of a major revolution in our education systems to those who associate the challenges of OER to mainstream with a sustained period of stasis. There is a palpable disconnect between the solutions proposed by education strategists, the willingness of policy-makers and lone educators to implement change in the curriculum, and the praxis in the classroom, where the 'one-size-fits-all' education system resists disruption since 'change' in education is measured in years. There is also geographical disconnect, say between the learner-centric proposals for higher education in the US, and the cautious experiments with MOOCs by European institutions.
- In Europe in the past ten years, research hubs such as the EU's Joint Research Center, have been more interested in institutional engagement with digital education, with waves of research that support development of policy and procedures in digital learning. There is a consensus among EU policy-makers on the various merits of openness in education, particularly in higher education, in that it: a) reduces or removes barriers to education (cost, geography, time, entry requirements); b) supports modernisation of higher education in Europe - largely carried out via digital technologies; and c) bridges non-formal and formal education – assuming that higher education and other accredited institutions recognise the credentials they each issue to learners. The EU advocates the need for strategic planning and frameworks for digital competences and open education¹⁴ but the aspirations of the OER movement in Europe remains tangled with the interests of education publishing and fears of infringing copyright law: finding quality resources, concerns about unknown permissions and difficulty integrating OER in the curriculum continue to be major obstacles to the adoption of OER in mainstream education in Europe.

¹¹ The JRC has published a series of studies on digital competence frameworks for citizens, teachers and institutions. These reports build on earlier reports on open education (for instance a 2016 report identifies 10 dimensions of open education, giving a rationale and descriptors for each).

Although these studies promote transparency for collaboration and exchange of good practice, and are meant to guide member states' investments, they have also been criticised as being overly-prescriptive, and of reference primarily to researchers as opposed to driving change in education.

Programme 5: Digital and media literacies

Supports: All Strategies

- The Centre will explore opportunities to assist small states in establishing curated OER portals for deployment by teachers and use by students, focusing on areas which are in line with local country cultural requirements. It will work with partners to explore local language OER variants as a practical way of moving beyond English as the lingua franca of open education. Other potential applications could be to identify good courses developed in one language and have these translated into other languages (say French). There may be funds available for translation of coursework and in turn deployment under a CC licence. The language element in the OER community is currently a weak link. The same could apply with translation of textbooks - as well as operating as a repository of online courses and online textbooks.
- The Centre believes there is an interesting niche if it positioned itself as a bridge between the Commonwealth and the EU on the practical issues of OER, open textbooks and translations into local languages.
- The Annex includes an Open Education Checklist.
- The Centre will support the development of media and digital literacies within stakeholder groups. Media Literacy is critical engagement with various online and offline media. Digital literacy is tantamount to personal, technological and intellectual skills for living in a digital society. Having the knowledge and ability to effectively and critically navigate, evaluate and create information using a range of digital technologies are vital skills for 21st century citizens. Digitally literate people use technology strategically to find and evaluate information, connect and collaborate with others, produce and share original content, and use the Internet and technology tools to achieve academic, professional and personal goals.
- There is a palpable gap between the skills needed by citizens to thrive in the workplace and the skills actually acquired during formal education. Digital and media literacies in particular are essential skills sets within the set of skills collectively known as 21st century skills. Teachers need to absorb these new skills themselves if they are in turn to transfer these to future generations.

- Connecting classrooms and deploying digital devices is of secondary importance to revitalising the curriculum content and changing the role of digital technologies at education institutions. Improving the design and implementation of effective connected learning experiences inevitably requires a shift in designing learning paths for people who might not necessarily know what these pathways can look like. The role of teachers remains pivotal if in-person education is to be enhanced by blending online experiences. Teachers provide context and mentoring and fostering reflection and discussion. New technologies should be used to support teachers and allow them to free up time from conveying content to focus on high-value in-person interactions with students. Equally important is the role of the learning engineer, typically a creative who builds bridges between the various fields of education and develops additional infrastructure to help teachers teach and students learn. The 3CL will lever on proprietary networks to identify these professionals - and use emerging media to make their work as effective and widespread as possible, and relevant to different contexts.

- The Centre will lever on the Commonwealth Digital Education Leadership Training in Action (C-DELTA). C-DELTA is a long-term programme of the Commonwealth of Learning (COL) to promote digital education environments in Commonwealth nations. It works with governments, educational institutions, teachers, and civil society organisations to assess digital education competencies, develop learning materials around digital education skills, provide training opportunities for teachers, and monitor student achievement and its relationship to livelihood. The C-DELTA programme provides a framework for fostering digital learning and developing skilled citizens for lifelong learning.

It will foster leaders who can demonstrate how to use information and communication technologies (ICT) effectively and who will influence others around them to use digital technology appropriately and effectively for learning (and earning) and for supporting sustainable development. Individuals will improve their employability in the job market by better understanding their own level of digital education leadership skills, and by providing the online badge as a credential in their resumes. Individual learners can develop their skills using online resources and be certified online.

- The Centre will seek to forge alliances with international organisations such as UNHCR that have a stated interest in connected learning, and various aspects of the Centre's operations.

Programme 6: COL regional centre responsibility

Supports: All Strategies

- The Centre will explore opportunities where it can lever on its strategic Euro-Med location to contribute to a better understanding of opportunities and challenges for connected learning in a regional context. There are a set of regional nation states with a relationship with COL that are not necessarily looking for funding, but for tangible action that can add value to local stakeholders.

- The Centre can lever on the know-how acquired from use cases and its network to support countries on a needs basis.



8

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9

Annex 1: Open educational resource checklist

The following extract has been adapted from the Foundations of OER Strategy Development¹⁵. It is included in this document as a primer for further discussion within the 3CL on its future positioning within the OER international community.

Top strategic priorities for OER

- Build OER content to fill gaps in key disciplines or contexts and enable productive reuse, including openly licensed ancillary materials (slides, assessment items, etc.) and openly licensed competency maps and lists of learning outcomes.
- Develop and implement open licensing policies and procurement practices that require public and foundation funded educational resources are openly licensed by default.
- Create and communicate effective research studies in conjunction with OER development and use.
- Grow and foster communities that support, in a grassroots manner, the development and mainstreaming of OER.
- Develop models or strategies for OER adoption, development and/or evaluation that can be replicated in other contexts.
- Build key tools that enable more effective development, management, discovery and reuse of OER.
- Broaden our focus to include the practices of educators and learners that can be achieved with a shift to open resources, for example, open pedagogy, open educational practices, open assessment, open credentials, etc.
- Better communicate the value of OER to educators, policy makers and other key constituencies.
- Scale OER in a specific sector, i.e. primary and secondary (K-12), tertiary (higher) education, workforce development, lifelong learning, etc.

¹⁵ See www.oerstrategy.org

Opportunities for advancing OER

- There are three components necessary for OER adoption: 1) Users (awareness of and motivation to use OER), 2) Content (OER and tools to use them, and 3) Context (community and systemic support for sustainability).

Users

- Increase Awareness: It is essential to raise awareness of OER as an option, both as an alternative to proprietary materials (and publishers' new lease-not-own models) and also in new markets underserved by traditional publishers. Also, there is a significant awareness opportunity within populations already using openly licensed materials without fully realising that they are using OER or that they can exercise 5R rights.
- Build Evidence Base: Improve the body of evidence showing the positive impacts of OER, focusing on contexts where OER presents an especially critical solution to a problem. This includes efficacy research that looks at key areas such as improved learning outcomes, business models, innovative reuse, improving equity, and cost savings. It also includes compelling case studies and stories that illustrate positive impacts.
- Improve Communications: Build a stronger case for OER to strengthen its branding and value proposition. Be more active in communicating by developing resources, coordinating messages, and working with other segments of the open movement. Consider the key target audiences of OER, and tailor resources to reach those audiences. Assets such as compelling human stories, infographics, and plain language resources will be key.
- Embed OER in the Teaching Profession: Take advantage of ready-made pathways for professors and teachers to become aware of and learn to effectively use OER. In the short term, this could be linking OER with professional development activities that educational systems already conduct. In the long term, this would be integrating OER into teacher training and preparatory programs.
- Engage Key Constituencies: OER adoption is not just about engaging the teachers, education institutions and policymakers who make resource decisions. Other constituencies, particularly librarians and students, can play a key role in helping to catalyse and support these decision makers in learning about and shifting to OER. Librarians are experts at finding, curating and sharing resources. This community wasn't originally deeply engaged in OER but has increasingly become involved. Students are also key as the beneficiaries of education, and also the largest constituency in terms of numbers. Students can also be mobilized to raise awareness and as a catalyst for action. Other key constituencies include copyright officers, accessibility services, bookstores, financial aid, instructional technology, and instructional designers.
- Empower the grassroots: Without grassroots support from educators, OER policies will never fulfil their potential. In particular, the promise of reuse cannot be met without the engagement of users with open resources.
- Coordinate Demand with Supply: Focus on building demand in areas where supply exists.

Content

- **Build OER That Educators Want to Adopt:** To reach the mainstream, it is important to build OER that meet the needs and expectations of educators. For educators accustomed to traditional materials, this often means "turnkey" resources that are ready to use and convenient to adopt. For educators looking to expand the way they teach, this may be easily remixable, adaptable, interoperable resources that can be easily tailored and shared with students. The specifics may vary by context, but a greater focus what educators want can help OER adoption spread on a faster and wider scale. Once practitioners are using OER in a familiar form, more work can be done to support their exploration of innovative remixing and use.
- **Develop Strategic Tools:** While building tools alone is not enough to solve problems, there are some central challenges that can be removed through strategic, interoperable tools to support the OER lifecycle: development, curation, discoverability and 5Rs activities. The most immediate need to support adoption is tools for the effective discoverability of OER, but we also need tools that enable users to fulfil the promise of OER in terms of creation, open licensing, reusing, remixing and sharing their work with other teachers and students.
- **Build Supply to Meet Demand:** The OER movement has learned that the "build it and they will come" philosophy is not often successful. It is more effective to prioritize building OER in areas where educators need and are asking for well developed, curated OER. "Building supply to meet demand" could mean something like finding 25 colleges and universities that want to adopt Nursing OER in place of expensive, proprietary textbooks and curriculum, and then building those OER with them. Given government and civil society goals for education to lead to living-wage jobs, the OER community ought to also partner with universities, colleges and schools to build OER-based academic programmes that make more people employable.
- **Accessibility:** The flexibility offered by the 5Rs offers significant advantages over traditional materials in making content accessible for students with disabilities. OER can be built more easily to conform to universal design for learning (UDL) principles, and existing OER can be adapted and altered to meet accessibility needs without the legal and technical limitations typically placed on traditionally published materials. This is an area where OER can naturally lead the way.
- **Develop OER for Tomorrow:** As OER gains momentum, there are increasing signs that traditional textbook publishers will cede areas of educational content to OER and shift to selling new types of products, such as access to learning analytics or customized learning pathway platforms. While this is a sign of progress, it is also a potential pathway to the same problems we face with traditional content today. To ensure a more open future for education, the OER community needs to build both OER and open learning pathways and analytics platforms to support the future learning needs of students and data needs of educators.
- **Open Up Existing Platforms and Resources:** Evangelising open can help turn existing services and resources into OER. This is a key, alternative tactic to creating new, open resources. This allows our movement to benefit from already existing resources, networks and communities, once they are openly licensed.
- **Learners as Creators:** Inherent in open pedagogies and open educational practices is the idea of students as creators. If harnessed effectively, engaging students in the development, improvement and assessment of content could help drive the adoption and revision of existing and the production of new OER.

Context

- **International Growth:** Successful OER projects tend to have a relatively small scale and have not widely spread to other institutions, regions, or countries. Using key projects as models for scaling is a major opportunity for our movement. At the international level, it is important to build foundations of the OER movement by examining local needs and priorities, and then using and adapting best practices, advice and tools from existing projects and experiences.
- **National Mainstreaming:** Multiple projects prove sustainability and benefits of OER, but OER has still not entered the mainstream at a global scale. In countries with relatively developed OER activities, a key opportunity is to shift from a narrow OER community to the broad education community, by addressing broader values and needs of educators. It is crucial to develop, at national level, an integrated set of activities that combines policy work, content production and curation, and community building into a holistic model for OER growth.
- **Institutionalisation:** The long-term sustainability of OER depends on education institutions becoming not only the creators and users of OER, but also the support systems behind it. Efforts to embed OER in teacher training, professional development, student orientation, information literacy, tenure and promotion, and other relevant institutional processes will help build this capacity.
- **Open as an Aspect of Digital in Education:** The Paris Declaration describes OER as an aspect and key element of digital education. OER can be successfully introduced if merged with IT in education initiatives - and vice-versa: digital education strategies are more sound, effective and sustainable if they include OER. For example, adopting OER can free up funds for the purchase of digital devices for students.
- **Government Funding:** Governments are the largest potential source for funding that can bring OER to scale. In many cases, they are already spending money directly on course materials, textbooks, or on programs that create educational materials. We need strategies such as open license (e.g., Creative Commons licenses) funding requirements that will redirect some or all of that money to OER. Publicly funded educational resources should be openly licensed by default. It is also important to educate both government staff and recipients of government funds about open license requirements, how to properly mark works to receive appropriate attribution, to create and share editable files (e.g., not PDF) so the public can revise and remix, and where to submit finished OER.
- **Improve Movement-Wide Coordination:** Members of the movement are doing effective, impactful work, but there is a lack of coordination between segments of the movement that may have similar or complementary aims. Increasing communication and coordination among groups within the movement can help accelerate progress through shared best practices, improve efficiency by avoiding duplication of efforts, and amplify impact by identifying areas of synergy and common messages. This could take the shape of a lateral network that connects various nodes; not a top-down or time-intensive requirement. The goal is not to stop people from doing good work, but rather to ensure that the work being done is amplified and built upon for better service to the movement as a whole.
- **Connect with Other Open Movements:** Movements for openness in research publishing, science, data, software, and other areas are pursuing similar goals and are facing similar challenges. While some areas of OER are beginning to forge ties, a more deliberate effort to coordinate messages and actions will help build a stronger and broader open movement that benefits us all.

Extent of oer adoption necessary
to consider initiatives a “success”

- Disrupting the educational materials and services market so that it flips to OER as the default model for resource production.
- Shifting public funding models to pay for publishing, distribution and adoption services, rather than paying for individual copies of textbooks.
- Sufficient quantity of high quality, curated OER necessary to provide users choice.
- Mainstreaming OER among educators so it competes with the traditional publishing model in terms of reach and use.
- Entire degree programs replace commercial textbooks with OER.
- Significant number of education and training systems built with curriculum based on OER.
- New pedagogical approaches enabled by the 5R permissions of OER demonstrate superior learning outcomes and become popular among faculty.
- Measurable increase in learning achievement that leads to employability.

