INTE 2014

From vision to action – a strategic planning process model for open educational resources

Chen, Shu-Hsiang[a], Nasongkhla, Jaitip*[b], Donaldson, J. Ana[c].

[a][b] *Faculty of Education, Chulalongkorn University, 254 Payathai, Wangmai, Patumwan, Bangkok, 10330 Thailand*
[c] *Walden University, 100 Washington Avenue South, Suite 900, Minneapolis, MN 55401 USA*

Abstract

Strategic visionary and planning processes are a way to systematically plan the development of open education resources and practices for the future. Strategic planning processes are considered to be a powerful tool and guideline for helping all levels of higher educational institutions (HEIs) develops their strategic plan, and to find their competitive advantage and place within their environment. From vision to action, the research objective of this study is to develop a strategic planning process (SPP) model based on the concept of open educational resources (OER), university social responsibility (USR), social entrepreneurship (SE), and strategic planning (SP). The proposed SPP model will serve as a guide for mapping out a strategic plan and activities for aligning and implementing OER, which can tie strategic planning to a university's effectiveness and success in sustainability for the long term. The SPP model can also help HEIs to guide their vision, mission, values, goals, and strategies to foster OER development and practices.

*Corresponding author Tel: +662218-2650,
email: jaitip.n@chula.ac.th

1. Introduction

The Internet revolution has facilitated the concept of openness now more than ever. A number of current technologies support the paradigm of modern education in terms of creation, communication, and collaboration. In addition, technology has created many opportunities and opened people's minds in terms of sharing their knowledge (Zhao, 2012). The concept of openness plays an important role in driving educational innovation and transformation in a number of articles. The results of openness that are relevant to the current education movements were summarized by Weller (2012) as consisting of (1) open sources, (2) open educational resources, (3) open courses, (4) open research, (5) open data, and (6) open application program interfaces (APIs). Openness has been perceived as a catalyst for educational reformation and transformation (Wiley, 2006a; 2006b), and has allowed HEIs to implement the fundamental values of university-based education, and shift the focus from traditional lecturing to a more learner-centered approach (Wiley, 2006a; 2006b; Wiley, 2010; Wiley & Hilton III, 2009). Wiley and Hilton III (2009) proposed six ways that are critical for higher education institutions (HEIs) to recognize and understand the significance of openness. The six ways are (1) from analog to digital, (2) from tethered to mobile, (3) from isolated to connected, (4) from generic to personal, (5) from consumers to creators, (6) from closed to open. The authors further argue that HEIs should focus on their supersystem in four areas: (1) connectedness, (2) personalization, (3) participation, and (4) openness. Among these four areas, openness is the most pressing priority for HEIs because the culture of openness is a prerequisite to affordable, large-scale progress in the other three areas. Openness will manifest itself differently in different HEIs until it becomes part of the core organizational culture.

Previous studies have interpreted the meaning of openness in the relation to OER. The meanings of open and openness consists of rich and multidimensional approaches, and have been implemented in many ways that have affected every aspect of the creation of OER. For example, Foote (2005) defines four freedoms: (1) freedom to copy, (2) freedom to modify, (3) freedom to distribute, and (4) freedom to redistribute modified versions, whereas, Walker (2005) describes openness as being convenient, effective, affordable, sustainable, and available to every learner and educators worldwide. Daniel (2006) further states 4As: accessible, appropriate, accredited, and affordable as the meaning of open, while Wiley (2007; 2009; 2010a; 2010b) and Hilton III, Wiley, Stein, and Johnson (2010) propose a 4Rs openness framework: reuse, redistribute, revise, and remix as a new to promote learning and sharing. Moreover, Yuan and Powell (2013) describe the concept of openness as offering opportunities for sharing ideas, connecting and collaborating among institutions, educators, and learners locally and internationally, and facilitating more meaningful engagement in teaching and learning. Accordingly, the impact of openness will require a new educational paradigm and new learning skills in the future.

OER is one example of an innovative approach to education because it opens up opportunities to create and share a wider array of educational resources among a greater diversity of global learners. Its trends and movements have become more prominent as not only a phenomenon but as a way of improving the quality of education. OERs have made global education into a potential reality for the first time in the 60 years since the Universal Declaration of Human Rights declared "everyone has the rights to education … education shall be directed to the full development of the human personality and to the lengthening of respect for human rights and fundamental freedoms" (United Nations, 1948, Article 26 as cited in). Furthermore, if "free and open access to opportunity is a basic human right… if educational materials can bring people out of poverty" (Caswell, Henson, Jensen, & Wiley, 2008, p. 10), then it is the right thing and a responsibility or obligation for individuals and institutions to open their minds and policies to share educational materials and information around the world.

OERs alone will not be sustainable on their own dimension. It has to combine concepts from different inter-disciplinary areas such as education for sustainable development and business perspectives. Currently, many of OERs initiatives have made the effort to push for adoption as a next step. Policy and strategy regarding the promotion and sustainability of OERs have been discussed in many of reports. For example, UNESCO (2012) declared a Paris OER Declaration to move OERs development into a global scale. However, the support from global institutions regarding OERs policy and strategy development is still limited. Many of the questions and concerns regarding OERs development for the next decade still remain to be solved. These issues require serious consideration not only for individuals, but also for HEIs with respect to all human beings, their rights, and the roles they play within their personal and professional practices. Ideally, OERs will become another public service and practice that every HEI will provide to society. The implications and recommendations can be looked at from different angles of the growing OER movement for individual, institutional, and country contributions. It is

important to also look at the policy and strategic plan for promoting further growth in the use, reuse, and production of OERs in order to meet the needs of the global market and challenges of social-cultural and economic changes in the longer scope of sustainability (OECD, 2007).

To date, very little research has been conducted on the policy development and strategic planning to support and foster OER development. As such, a good starting point for HEIs is to consider developing a clear policy and strategic plan that is aligned with their current university practices in addition to creating services that can truly extend the use and development of OERs in HEIs.

1.1. Conceptual Framework

Open educational resources (OERs), are a driver and motivator to fostering the social practices and educational processes that view OERs as reinforcing the idea that "world's knowledge is a public [social] good and that technology provides an extraordinary opportunity for everyone to share, use, and re-use knowledge" (Atkins, Brown & Hammond, 2007, p.5). OERs provide a strategic opportunity for HEIs to improve the quality of education, and to connect knowledge sharing and capability building in both human capital and social capital for the global community (Arnold, 2012; Geser, 2007; OECD, 2007, UNSECO, 2012). Accordingly, this study defines OERs as any type of educational resources in either print or digital format (including course materials, websites, textbooks, audio materials, podcast, video, multimedia applications, visual materials, archived discussions, simulations or animations, maps, ancient or historical manuscripts, software, and any other tool or technique used to allow access to knowledge) that reside in the public domain and have released under an intellectual property license or open license such as Creative Commons that permits users with 4Rs Openness framework: reuse, revise, remix, and/or redistribute to support knowledge building, sharing, and learning to the worldwide community.

University social responsibility (USR), is a philosophy or principle for social movement, which can be perceived as a philosophy of a university to use an ethical approach to develop and engage with the local and global community in order to sustain the social, ecological, environmental, technical, and economic development. USR acts as a key player for social changes, as USR implies having a policy of ethical quality, governing the performance of the university community. This is done via the responsible management of the educational cognitive, labor, and environmental impact from the university, in an interactive dialogue with society and its communities, in order to promote sustainable human development through education (transforming knowledge), provision of service, research, teaching, and scholarship. All of these underline an ethical collaboration not only with the university community but also with business community in terms of stakeholder involvement (Esfijani & Chang 2012a, 2012b; Esfijani, Hussain, Chang, 2012; Nasongkhla, 2014; Reiser, 2007; Vallaeys, 2007).

Social entrepreneurship (SE), as an action and as an actor, focuses on the social dimension for HEIs to take with respect to social change purpose that intend to make a great difference and contributions to human and societal development. SE is a hybrid formed from the private, non-profit, and public sectors, and is a process through which entrepreneurs can make both a great difference and significant contributions to the next century of human and societal development (Alvord, Brown, & Letts, 2004; Roper & Cheney, 2005). SE aims to provide innovation solutions to manage complex social problems toward a further social change (Chand & Misra, 2009), and SE is based on the concept of business and intends to increase the social impact and social movement of human society.

Strategic planning (SP) is a process and a tool for HEIs to plan and follow for social practices. SP is a comprehensive process for determining what HEIs should become, what are the current gaps of HEIs, and how it can be best achieved throughout the strategic planning process. SP offers a systematic process to ask and answer the most critical questions confronting a management team and explicitly links the objectives to the actions, and to the resources required to achieve them. SP is future facing and is based on the analysis of foreseen or predicted trends and scenarios, and is flexible and oriented towards making vision a reality (Hinton, 2012; Kotler, Murphy, 1981; Lerner, 1999; Oztermel et al, 2009; Paris, 2003; Pisel, 2001, 2008).

By examining existing literature and from a social dimension perspective, this study views OERs as being a social practice driving the development of education, USR as being a philosophy for social movement, SE as being an action for a university to take as an agent of social change, and SP as being a process and tool to follow for effective social practice in HEIs. When embedding OERs within other disciplinary areas, this will foster OER's transparency to the educational process, fulfill the university's social responsibility mission, and help establish a

new sustainable development model for education.

Accordingly, the purpose of this study is to propose a strategic planning process (SPP) model for Asian HEIs for incorporate OER, USR, and SE into its current strategic plan and making it sustainable. The proposed SPP Model will serve as a guide for mapping out a strategic plan along with activities for aligning and implementing OER, which together can connect strategic planning to universities' sustainable effectiveness and success in the long term. The research objective in this study is to develop a strategic planning process model based on the concept of open educational resources, university social responsibility, and social entrepreneurship

2. Research Methodology

A systematic literature review (SLR) has been discussed in a number of articles (Bandara, Miskon, & Fielt, 2011; Khan, Kunz, Kleijnen, & Antes, 2003; Liyanagunawardena, Adams, & Williams, 2013). The review begins from the disciplinary stance by exploring journals listed within educational technology, business and management, and social entrepreneurship journals. Various online databases including ProQuest, JSTOR, IEEEXplorer, Scopus, Google Scholar, and Springer, were used to find related scholarly articles. A variety of keyword descriptors were used in searching within these online databases. The keyword descriptions searched include "open educational resources", "university social responsibility", "social entrepreneurship", "strategic planning for higher education", and "strategic planning process model for higher education" in the title, article keywords, and abstracts summaries. In searching for applicable articles, the search engines were limited to search peer-reviewed journals, peer-reviewed conference proceedings, and books during the time period from 1987 to 2014. In addition, the basic Boolean search operator "And" was used with a subset of keywords to narrow down some of the search results. The initial resource count from OER was 255, USR was 37, SE was 24, and SP was 50. After examining the quality of the content and the relevance to the topic, the final resources included in this study numbered 95. This systematic literature review helped linking together the areas of OER, USR, SE, and SP in order to create the SPP model proposed in this study.

3. Strategic Planning Process Model

A strategic planning process (SPP) model is a comprehensive strategic planning process model that fits between HEIs and their changing marketing opportunities. Based on the literature review of the previous strategic planning process models, a SPP model will be proposed in the following section. A SPP model is a useful tool for institutions that are truly serious about implementing OER and USR for teaching and learning on campus. The vision statement resulting from the SPP needs to be put on paper, disseminated to the entire institution, and readily available. Complementing this vision statement is a planning process that is strategic in nature. It acknowledges the opportunities and challenges inherent in technological change. The most effective institutions will not only have a strategic plan worthy of the name, but the actual planning process will be fully operational down to the details of how that institutions functions. This proposed SPP model not only give HEIs clarity but also conserves workload by focusing attention on the most important planning activities and processes.

In alignment with the suggested steps of social entrepreneurship from previous studies, elements include: (1) envisioning, (2) formulating, (3) taking action, (4) evaluating, and (5) sustaining (London & Morfopolos, 2010). These suggested steps are incorporated into the proposed SPP model. The proposed SPP Model (Appendix A.) consists of six stages including (1) envisioning, (2) social situational analysis, (3) strategic formulation, (4) taking action, (5) evaluating, and (6) sustaining, each of which will be explained in the following paragraphs.

1. Envisioning – A case study was conducted in the HEIs in the Netherlands that states there existed a lack of institution's own vision for OER development. The lack of this alignment may result in the educational strategy being at risk of being too out-dated to meet the needs of the surrounding environment (Janssen, Jelgerhuis, & Schuwer, 2014). Thus, envisioning and developing the vision, mission and values for OER and USR must take both a bottom-up and a top-down approach. (Janssen, Jelgerhuis, & Schuwer, 2014). During the envisioning stage, the importance of OER and USR should be described and aligned with the core vision, mission, and values of the institution. This stage is perhaps the most challenging phase, because institutional planners or administrators may spend lots of time to considering where should go rather than the required to actually get there. Thus, in the envisioning stage, identification of the desired vision, mission, and values in relation to OER and USR is an important step to consider.

2. Social Situational Analysis – The main guiding question to consider in this stage is where an HEI is now by examining their needs and gaps, and recognizing the sustainable conditions required for the desired OER and USR vision, mission, and values that were defined in the first stage. The internal and external analysis, gaps analysis, and OER and USR readiness assessment will need to be conducted at this stage. A variety of strategic planning process tools were reviewed in Trainer (2004) including (1) SWOT (strengths, weaknesses, opportunities, and threats) analysis, (2) TOWS (Turning Opportunities and Weakness into Strengths) analysis, (3) Nominal group technique, (4) Affinity diagrams, (5) SMART (specific, measurable, achievable or attainable, results-oriented, and time-bound) language, (6) Responsibility matrix, (7) Flowcharting, (8) Cause-and-Effect diagrams, (9) Presentation of quantitative data, and (10) Goal attainment teams. These tools are useful in assisting institutional planners or administrators with the strategic planning process to identify, examine, collect, analyse, and deliver the information about the current condition, issues, gaps, strengths, weakness, opportunities, challenges, and competitiveness. By utilizing a number of tools, the planners and administrator will be able to identify what the needs are and what should be addressed to meet the desired vision and mission from the sustainable situational analysis.

3. Strategic Formulation – In order to answer the main question of how do achieve the goals from the strategy formulation stage, institutional planners or administrators have to develop measurable goals, objectives, and implementation strategies and initiatives based on the results of the sustainable situational analysis. The goals and objectives have to follow the SMART (specific, measurable, achievable or attainable, results-oriented, and time-bound) language approach.

4. Taking Action – At this stage, institutional planners or administrators have to focus on decisions and tasks. This stage will create opportunities and actual action plans to address the social gaps and needs that have been identified in stage two – social situational analysis. They act as social entrepreneurs and require actions to promote the social awareness and foster OER and USR development and practice in Asian HEIs. Thus, tasks, timelines, resources, accountability, and communication should be addressed in this stage.

5. Evaluating – This stage includes learning from and evaluating the outcomes. A numbers of questions to help institutional planners and administrators to self-evaluate the SPP model is provided in the Paris (2003). By evaluating the results of previous steps to see if the vision and mission have been stated concisely, and receiving feedback from evaluating the outcomes of the SPP model, the institutional planners and administrators can learn much more from the results and outcomes in order to create required improvements.
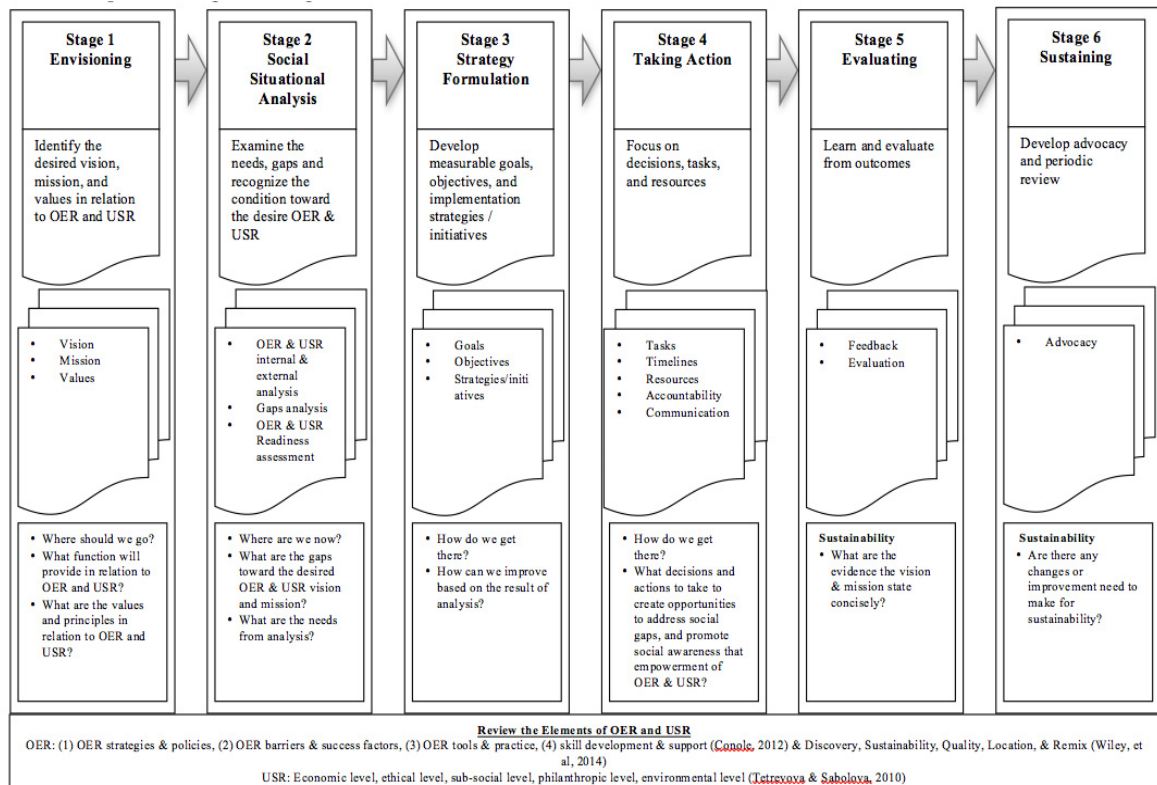
6. Sustaining – To truly sustain the SPP model, developing advocacy and a periodic review will enable the institution to adapt to short-term volatility while maintaining their long-term strategic vision. Thus, periodic review and advocacy are important elements for sustaining the SPP model.

4. Conclusion & Implications

In alignment with the current status of OER and the changing landscape of higher education institutions, it should be noted that higher education institutions have an important responsibility to provide quality teaching and learning as a core mission in order to contribute to social and economic development. OECD (2007) has proposed four major common missions that higher education institutions should consider as follows: (1) developing human capital (primarily through teaching), (2) building / creating knowledge (primarily through research and knowledge development), and (3) maintaining knowledge (inter-generational storage and transmission of knowledge (Glennie, Harley, & Butcher, 2012, p. 15). Thus, to achieve these common missions, higher education institutions have to expand their vision, mission, goals, objectives, and strategies beyond the current practices in order to fulfill new functions to assure sustainable development in education. A major requirement drawn from the previous studies is to take into account and move forward in determining the most relevant paths for worldwide higher education institutions to engage and initiate their USR practices through OER because USR will soon become a global philosophy, which can be perceived as a key player for sustainability in education. In order for higher education institutions to work together toward a sustainable future and solve current challenges, HEIs should take actions as social entrepreneurs on a large scale; envision the future of HEIs through embracing social entrepreneurship as the appropriate process with ethical behaviour and a mind-set toward the philosophy of university social responsibility by creating and sharing of OER. This vision includes the idea of sustainability for future education through consideration of economic, environmental, and social-cultural dimensions. This will foster the transformative

movement toward an open knowledge-based society and provide tomorrow's leaders with motivation to build a better future together. The proposed SPP model will serve as a guide for mapping out a strategic plan and activities for aligning and implementing OER, which can bind strategic planning to a university's effectiveness and success in sustainability for the long term. The SPP model can also help HEIs to guide their vision, mission, value, goals, and strategies to foster OER development and practices.

Appendix A. Strategic Planning Process Model

Stage 1 Envisioning	Stage 2 Social Situational Analysis	Stage 3 Strategy Formulation	Stage 4 Taking Action	Stage 5 Evaluating	Stage 6 Sustaining
Identify the desired vision, mission, and values in relation to OER and USR	Examine the needs, gaps and recognize the condition toward the desire OER & USR	Develop measurable goals, objectives, and implementation strategies / initiatives	Focus on decisions, tasks, and resources	Learn and evaluate from outcomes	Develop advocacy and periodic review
• Vision • Mission • Values	• OER & USR internal & external analysis • Gaps analysis • OER & USR Readiness assessment	• Goals • Objectives • Strategies/initiatives	• Tasks • Timelines • Resources • Accountability • Communication	• Feedback • Evaluation	• Advocacy
• Where should we go? • What function will provide in relation to OER and USR? • What are the values and principles in relation to OER and USR?	• Where are we now? • What are the gaps toward the desired OER & USR vision and mission? • What are the needs from analysis?	• How do we get there? • How can we improve based on the result of analysis?	• How do we get there? • What decisions and actions to take to create opportunities to address social gaps, and promote social awareness that empowerment of OER & USR?	**Sustainability** • What are the evidence the vision & mission state concisely?	**Sustainability** • Are there any changes or improvement need to make for sustainability?

Review the Elements of OER and USR
OER: (1) OER strategies & policies, (2) OER barriers & success factors, (3) OER tools & practice, (4) skill development & support (Conole, 2012) & Discovery, Sustainability, Quality, Location, & Remix (Wiley, et al, 2014)
USR: Economic level, ethical level, sub-social level, philanthropic level, environmental level (Tetreyova & Sabolova, 2010)

References

Alvord, S. H., Brown, L. D., & Letts, C. W. (2004). Social entrepreneurship and societal transformation: An exploratory study. *Journal of Applied Behavioral Science , 40*, 260-282.

Arnold, P. (2012). Open educational resources: The way to go, or mission impossible in (German) higher education? In L. Stillman, D. T, A. Sabiescu, & N. Memarovic (Ed.), *CIRN 2012 Community Informatics Conference: 'Ideals meet Reality.* Monash.

Atkins, D. E., Brown, J. S., & Hammond, A. L. (2007). *A review of the open educational resources (OER) movement: Achievements, challenges, and new opportunities.* Report to the William and Flora Hewlett Foundation.

Bandara, W., Miskon, S., & Fielt, E. (2011) A systematic, tool-supported method for conducting literature reviews in information systems. In Tuunainen, V., Nandhakumar, J., Rossi, M., & Soliman, W. (Eds.) Proceedings of the19th European Conference on Information Systems (ECIS 2011), Helsinki, Finland. http://eprints.qut.edu.au/42184/42184c.pdf

Chand, V. S., & Misra, S. (2009). Teachers as educational-social entrepreneurs: The innovation-social entrepreneurship spiral. *Journal of Entrepreneurship , 18*, 219-228.

Daniel, S. J. (2006). eLearning and free open source software: THe key to global mass higher education? *Commonwealth of Learning.* Malaysia. Retrieved from http://www.col.org/resources/speeches/2006presentations/Pages/2006-01-05.aspx

Esfijani, A., & Chang, E. (2012a). A fuzzy logic based approach for measuring virtual university social responsibility. *In proceeding of: The 2nd*

World Conference on Soft Computing, (pp. 149-154).

Esfijani, A., & Chang, E. (2012b). Metrics development for measuring virtual university social responsibility. *2012 IEEE 12th International Conference on Advanced Learning Technologies* (pp. 724-725). IEEE.

Esfijani, A., Hussain, F. K., & Chang, E. (2012). An approach to university social responsibility ontology development through text analyses. *Human System Interactions (HSI), 2012 5th International Conference* (pp. 1-7). Perth, WA: IEEE.

Foote, T. (2005). Wikipedia. *Utah: Open Education Conference* .

Geser, G. (Ed.). (2007). Open educational practices and resources: OLCOS roadmap 2012. Salzburg , Austria: Salzburg Research Edmedia Research Group. From http://www.olcos.org/cms/upload/docs/olcos_roadmap.pdf

Glennie, J., Harley, K., & Butcher, N. (2012). Introduction: Discourses in the development of OER practice and policy. In J. Glennie, K. Harley, N. Butcher, & T. van Wyk (Eds.), *Open educational resources and change in higher education: Reflections from practice.* Vancouver: Commonwealth of Learning.

Hilton III, J. L., Wiley, D., Stein, J., & Johnson, A. (2010). The four R's of openness and ALMS analysis: Framework for open educational resources.

Hinton, K. E. (2012). *A practical guide to strategic planning in higher education.* Society for College and University Planning.

Janssen, B., Jelgerhuis, H., & Schuwer, R. (2014). Supporting open education policymaking by higher education institutions in the Netherlands: Lessons learned. OCWC Global Conference 2014. From http://conference.ocwconsortium.org/2014/ai1ec_event/supporting-open-education-policy-making-by-higher-education-institutions-in-the-netherlands-lessons-learned-ben-janssen-robert-schuwer-and-hester-jelgerhuis/?instance_id=

Khan, K. S., Kunz, R., Kleijnen, J., & Antes, G. (2003). Five steps to conducting a systematic review. *Journal of the Royal Society of Medicine, 96* (3): 118-121. From http://www.ncbi.nlm.nih.gov/pmc/articles/PMC539417/

Kotler, P., & Murphy, P. E. (1981). Strategic planning for higher education. *The Journal of Higher Education, 52* (5), 470-489.

Liyanagunawardena, T. R., Adams, A. A., Williams, S. A. (2013). MOOCs: A systematic study of the published literature 2008 - 2012. The International Review of Research in Open and Distance Learning, *14* (3). From http://www.irrodl.org/index.php/irrodl/article/view/1455/2531

Lerner, A. L. (1999). *A strategic planning primer for higher education.* From http://grapevine.laspositascollege.edu/academicservices/documents/InstitutionalEffectiveness/CSUStrategicPlanningReport.pdf

London, M., & Morfopoulos, R. G. (2010). *Social entrepreneurship: How to start successful corporate social responsibility and community-based initiatives for advocacy and change.* New York, NY: Routledge.

Nasongkhla, J. MOOC (Massive Open Online Courseware) Connectivist in 21st Century: Role of university social entrepreneur (USE) and social responsibility (USR). *Journal of Education Studies, 42* (1).

OECD. (2007). *Giving knowledge for free: The emergence of open educational resources.* OECD Publishing.

Oztemel, E., Kubat, C., & Taskin, H. (2009). A road map for strategic planning in higher education institutions. *6th Research/Expert Conference with International Participations "QUALITY 2009"*, (pp. 601-610). Neum.

Paris, K. A. (2003). *Strategic planning in the university.* University of Wisconsin System Board of Regents.

Pisel, K. P. (2001). *The validation of a detailed strategic planning process model for the implementation of distance education in higher education.* Norfolk, VA: Old Dominion University.

Pisel, K. P. (2008). A strategic planning process model for distance education. *Online Journal of Distance Learning Administration, 9*(2). Retrieved from http://www.westga.edu/~distance/ojdla/summer112/pisel112.html

Reiser, J. (2007). Managing university social responsibility. International Sustainable Campus Network: Best Practices - Future Challenges, Zurich, Switzerland. From http://www.international-sustainable-campus-network.org/view-document/108-panel-b1-juan-reiser-pontificia-universidad-catolica-del-peru.html

Roper, J., & Cheney, G. (2005). Leadership, learning and human resource management: The meaning of social entrepreneurship today. *Corporate Governance, 5* (3), 95-104.

Trainer, J. F. (2004). *Models and tools for strategic planning. New Directions for Institutional Research.* John Wiley & Sons, Inc.

UNESCO. (2012). 2012 PARIS OER DECLARATION. Paris. From http://www.unesco.org/new/fileadmin/MULTIMEDIA/HQ/CI/CI/pdf/Events/Paris%20OER%20Declaration_01.pdf

United Nations. (1987). *Report of the World Commission on Environment and Development.*

Vallaeys, F. (2013). *Defining social responsibility: A matter of philosophical urgency for university.* Retrieved from Global university network for innovation: http://www.guninetwork.org/resources/he-articles/defining-social-responsibility-a-matter-of-urgency-for-philosophy-and-universities

Weller, M. (2012). The openness-creativity cycle in education - A perspective. *Journal of Interactive Media in Education*, 1-10.

Wiley, D. (2009). Impediments to learning object reuse and openness as a potential solution. *Revista Brasileira de Informática na Educação, 17* (3).

Wiley, D. (2007). On the sustainability of open educational resource initiatives in higher education.

Wiley, D. (2010a). Openness as catalyst for an educational reformation. *EDUCUASE Review, 45* (4), 14-20.

Wiley, D. (2010b). The open future: Openness as catalyst for an educational reformation. *Educase Review*, 15-20.

Wiley, D., & Hilton III, J. L. (2009). Openness, dynamic specialization, and the disaggregated future of higher education. *The International Review of Research in Open and Distance Learning, 10* (5).

Yuan, L., & Powell, S. (2013). *MOOCs and open education: Implications for higher education - A while paper.* JISC Cetis Center for Educational Technology and Interoperability Standards.

Zhao, Y. (2012). *World class learners: Educating creative and entrepreneurial students.* Thousand Oaks, CA: Corwin.