SWOT analysis of MOOCs in library and information science domain

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Introduction

This paper aims to conduct a SWOT (strengths, weaknesses, opportunities, threats) analysis of massive open online courses (MOOCs) in library and information science in order to identify and understand different insights and best practices.

In the current scenario of open online learning, MOOCs pedagogy emerged as a very hot topic all around the world. Although the origin of MOOCs can be traced back to 2008, adequate popularity in the online learning sphere began a few years later, in 2012. A MOOC is an online course built on a topic through a variety of resources available in the public domain with the aim to engage a large number of the participants, often with assessment and accreditation provisions.

Currently, MOOCs have impact in all disciplines, including library and information science. A major focus is how MOOCs can be implemented, utilized and supported. To make optimum use of MOOCs, library and information science professionals need to know about their potential. SWOT (strengths, weaknesses, opportunities and threats) analysis can be an effective and appropriate instrument. SWOT analysis was first developed at Stanford Research Institute in the USA and used for analysing business data of Fortune 500 companies (Humphrey, 2005). SWOT analysis can be defined as a framework which can be used as a tool for strategic planning and decision-making in implementing a product, concept, project, etc. successfully. This paper looks at SWOT analysis of MOOCs for education of library and information science students and professionals.

Kaushik (2018) discusses the evolution of MOOCs through an online survey to determine the perceptions of library and information science professionals. Those who participated in this survey were working in academic libraries and were aware of the use of MOOCs for many disciplines, but they noted the lack these tools to develop competencies and skills in library and information science. Some prominent studies (Kennedy, 2014; Kaushik and Kumar, 2016; Berliyanto and Santoso, 2018) were carried out in library and information science as well as in other disciplines on the issues connected to the characteristics, opportunities and challenges of MOOCs.

Very few studies were discovered on the theme of SWOT analysis of MOOC. In another discipline, Schütte et al. (2018) conducted SWOT analysis of MOOCs in connection to observe whether MOOCs would be helpful to improve medical education or not. Jinhui (2015) conducted SWOT analysis of MOOCs in business and measured MOOCs in economic courses and found that MOOCs can actually generate revenue in different ways. Demmen and Chauhan (2013), through SWOT analysis, found that reputation was the one of the main factors to engage in MOOC activities. Odom (2013) examined the impact for implementing MOOCs in the University of Maryland University College (UMUC) by conducting SWOT analysis. Lim and Kim (2014) suggested several components such as the type of organization, age of learners, lecture areas, authority, contract unit, teaching qualifications and system connection for designing Korean MOOCs by conducted a SWOT analysis. As such no study was found on SWOT analysis of MOOCs in library and information science domain.

SWOT analysis of MOOCs

A SWOT analysis of MOOCs was conducted and is presented in Table I.

Strengths

Buhl and Andreasen (2018) reviewed the strengths of MOOCs which can be defined through nine A’s, namely, any number of participants, any course, anywhere, anytime, anyone, any platform, any age, any qualification, any [...] The important characteristics of MOOCs provide great flexibility to the library and information science professionals and other learners to take part in MOOCs and provide a reliable platform to upgrade their knowledge on their interested area.

LeCouste and Johnson (2017) highlighted the characteristics and benefits of MOOCs in the higher education setting. From all of these references, there is clearly a need to develop the quality of MOOCs in library and information science domain. For our professional growth, MOOCs should focus on demanding topics of users or on user-centric themes, and the contents of a MOOC should be well accurate, updated and leveraged with full and concrete information. For some, a MOOC is considered as the substitute or alternative of formal education. (Huang et al., 2016). Through their study, they found that MOOCs were helpful in promoting information literacy. MOOCs support both mobile and online learning due to increasing use of mobile and online devices as well as continuous increasing of internet users worldwide.

Weaknesses

Drop rates of learners is one of the main reasons which can fall into the category of weakness in the MOOCs setting, as large number of learners may participate, but it is unsure whether all will complete the course. Eriksson et al. (2017) discovered the factors regarding drop rates. Many times, authorities are not ready to support MOOCs activities through their institutions. Lack of a
policy, especially for developing MOOCs and providing for governing-related activities, can be considered a weakness. Without having a policy for MOOCs, library and information science professionals may not be able to build MOOCs under the banner of their institutions and will also not be able to support MOOC activities at the local or the global level. Involvement of high costs for using popular and established MOOC platforms on a selected topic is also considered one of the weaknesses of MOOCs. Lack of adequate skills, competencies, expertise and infrastructure and the attitude of information science professionals towards developing successful MOOCs to learners at the worldwide level are another prominent weakness of MOOCs. Copyright clearance issues of the resources and other materials to be used for designing and developing these courses is a big task for library and information science professionals as many resources cannot be included.

Diverse languages and culture are also considered as a major weakness of courses, as many times, big differences, contexts and needs are important. Lack of equality of MOOCs with a formal online degree and other online courses is a big weakness. It is unrealistic for one MOOC to meet the needs of diverse groups of learners. García-Peñalvo et al. (2018) consider MOOCs as a disruptive technology. Being disruptive can also be seen as an opportunity.

Opportunities

In the MOOC environment, library and information science professionals can participate as per their interest or choices. They can gain in-depth knowledge and other insights of MOOCs which is helpful if they are motivated to develop MOOCs themselves as well as influence those in academic departments they serve. MOOCs can include special lectures, face-to-face debates, conferences, workshops, seminars, etc. Library and information science professionals can help in making agreements and aid clearance of copyright constraints for including particular resources in a MOOC. Library and information science professionals can validate the contents of a MOOC and also suggest the most appropriate contents, resources and pedagogy. Pujar and Bansode (2014) identified possible areas of library and information science education in which MOOCs are needed.

Threats

In the MOOC environment, quality and authority are big threats, as some MOOCs could be developed by library and information science professionals who are lagging behind in terms of the quality and best practices of more relevant and up-to-date MOOCs. Margaryan et al. (2015) measured the quality of 76 randomly selected MOOCs and discovered that most scored poorly in terms of instructional design and quality. Getting predetermined returns on investment (ROI) for creating and offering a MOOC to users is important, as the developers are struggling to achieve unrealistic targets. Creating a MOOC and using a MOOC platform can be difficult, as it requires a team of technical experts.

Establishing MOOCs as equivalent to formal online courses for credit and providing tuition fees for universities is a threat. Many universities are looking at free-textbooks as replacements for paid content. The same threat may exist if MOOCs are viewed as an equivalent to traditional degree requirement. There is also a movement towards the importance of developing and demonstrating skill development and credentials by MOOCs in lieu of traditional degrees which is another threat to universities. But hybrid environments are possible with the attainment of credentials through MOOCs that make a degree more impressive to potential employers. MOOCs can either be a disruptive technology or one that enhances the traditional education experience.

Making collaboration among MOOCs leading institutions and organisations for creating a MOOC can be considered as a threat for library and information science professionals because sometimes their

<table>
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<tr>
<th>SWOT indicator</th>
<th>Description</th>
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<tbody>
<tr>
<td><strong>Strengths</strong></td>
<td>Unlimited users, anywhere, anytime learning, any participant, any course, any platform, any qualification, any age</td>
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<td>New form of online pedagogy that also creates opportunities for mobile learning</td>
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<td></td>
<td>Flexible platform for creating courses in important areas</td>
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<td></td>
<td>Alternative to formal education</td>
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<td>Promotes information literacy among users’ worldwide level</td>
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<td><strong>Weaknesses</strong></td>
<td>Drop rates of users</td>
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<td></td>
<td>Possible lack of authority and quality</td>
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<td></td>
<td>High development time and cost in use of MOOC platforms</td>
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<tr>
<td></td>
<td>Lack of adequate technical and pedagogical skills and motivation</td>
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<td></td>
<td>Copyright issues</td>
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<td></td>
<td>Language and cultural differences</td>
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<td><strong>Opportunities</strong></td>
<td>Building reputation through networking and global collaborations</td>
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<td></td>
<td>Implementing MOOCs and help other academic departments</td>
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<td></td>
<td>Provide access to free content and help with copyright constraints</td>
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<td></td>
<td>Building professional development and other skills</td>
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<td><strong>Threats</strong></td>
<td>Quality issues of MOOCs</td>
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<td>Fair use of various resources and other reading materials</td>
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<td></td>
<td>Return on investment (ROI) issues</td>
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<td></td>
<td>Disruption in online and traditional courses (also opportunity)</td>
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<td>Sustainability of MOOCs in open online learning</td>
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Pujar and Tadasad (2016), through a survey of library and information science professionals in India, noted that MOOCs can be developed with international collaborations. MOOCs can be used for professional development with international standards. Mune (2015) emphasized that library and information professionals should collect and use best practices and develop their skills to build new MOOCs. Various MOOCs can be developed and used at both a local and global levels. Even copyright-free sections with attribution can be incorporated into other MOOCs.

Table I. Swot analysis
MOOCs are providing new challenges (and opportunities) to library and information science professionals in which they can not only participate in a course but also create one themselves or work with another institution or even on a worldwide level. Using SWOT analysis, one can more clearly consider major weaknesses and threats. Library and information science professionals should work diligently to provide quality and in both recommending existing MOOCs and developing ones themselves. Information professionals can also be leaders at their institution in helping the development of MOOCs in other academic disciplines.

This study demonstrates that SWOT analysis is helpful in creating model courses that incorporate best practices. This study also emphasized that established MOOCs can serve as a reliable resource to their users in the open online learning environment for upgrading their education and knowledge to meet both their institutional and professional needs.

**REFERENCES**


**FURTHER READING**


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