Massive Open Online Courses: En Route to Communication Skills Acquisition

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Abstract
Technology has its own forte and has been making its waves through the educations’ heart among educators and especially young learners. In conjunction to the waves of technology and the era of globalization, there is also a demand for excellent communication skills among today’s younger generations especially university students. University students are expected to be well equipped with proficient English language and outstanding communication skills which is what they are currently lacking at. Therefore, a specific Massive Open Online Courses (MOOCs) for English for Communication is designed and developed to provide learners with the ladder towards good communication skills. This study is a design and develop research of study which consists of twenty-two undergraduate students in a public university and the whole duration of this study is fourteen weeks altogether. The particular well developed MOOCs then later implemented to the learners and learners evaluation on the course are taken into consideration. This study intended to accommodate students with Massive Open Online Courses (MOOCs) and to investigate the learners’ perceptions on the use of MOOCs in helping them to develop good communication skills. This study also evaluated the developed MOOCs’ usability and the students’ interaction level during learning along with the impacts of particular developed MOOCs towards their development of communication skills. The findings gathered have proven that this particular developed MOOCs of English for Communication has helped learners to further improve on their communication skill acquisition that would help them to be a better critical thinker and an autonomous learner.

Keywords: Communication Skills, Digital learning, ESL Learning, Massive Open Online Courses (MOOCs),

Introduction

In today’s era of fourth industrial revolution, it is very important for younger generations to acquire good communication skills especially using English language (Jain et al., 2019). It is needless to doubt how globalization has made it very important for today’s younger generations, university students specifically to prepare and equip themselves with these soft skills. Students are expected to be able to make use of English language to discuss, argue and defend their thoughts along with incorporation of aspects of confidence building, visual aids presentation and audience handling. However, mostly university students in Malaysia encounter troubles in communicating well, especially using English language. They also struggle in presentations, speeches and sometimes lack of critical thinking and problem-solving skills.

A potential solution for this problem is the implementation of massive open online courses (MOOCs) for Communication Skills to accommodate students’ need in fulfilling their communication skills competencies. The competency is related to a set of skills such as critical thinking, the art of speaking, and building up confidence level. In today’s world, technology has been part of the teaching and learning process, especially in higher education. Massive open online courses (MOOCs) have been stated as one of the most important and well-known trends in higher education in today’s era (Baturay, 2015). There have been a lot of past researches involving the use of MOOCs and E-Learning for English Language lessons and courses. Daud et al. (2018) have done a study on the use of MOOCs for Literature Integrated Language Classroom for Development of Higher Order Thinking Skills (HOTS). However, research and development on MOOCs tailored specifically for English for Communication is lacking in Malaysia. As such, to solve these problems and fill these gaps, this study is intended to investigate the needs of undergraduate students from a public university and develop a MOOC on English for Communication Skills which is geared towards complying English language communication skills competencies for these students. This study also evaluated the developed MOOCs’ usability and the students’ interaction level during learning along with the impacts of particular developed MOOCs towards their development of communication skills.

Literature Review

Massive Open Online Courses (MOOCs) in the Digital Era

The existence of technology and e-learning has caused the routine of digital learning to be making its waves in education. Digital learning is basically the use of Internet to help students to gain more knowledge freely and students are not constrained or limited to only the knowledge given by the lecturers in the classroom during the lecture sessions. With the help of digital learning as the platform, students will be able to develop self-paced learning with the help of the specific course modules and tasks given by the lecturers to help probing them with their learning process and enhance student-centred learning. Technology and students are inseparable in today’s world. Students are taking advantage by accessing their lessons online (Mc Greal, 2018). Cabrera and Ferrer (2017) believed that students nowadays would prefer technology as part of their learning as it is more handy for them to access the information using technology wherever and whenever they want. Technologies have played an important role for over two decades now in facilitating access to both education and access training. Even both formal and informal learners are also now assessing learning materials through Internet and websites (Mc Greal, 2018). In Malaysian context, Malaysian Communications and Multimedia Commission has revealed that youths between the
ages of 20-24 are the most active users of Internet (Zulkepli, et al, 2018). Advantages of using Information and Communication Technology (ICT) and technology in learning and teaching session were reported to be beneficial in attracting students’ attention, facilitating students’ learning process, helping to improve students’ vocabulary and also promoting meaningful learning to students. (Yunus & Suliman, 2014). Digital learning has also become part of the common intervention in teaching and learning process. It is believed that “one of the main bridges between the physical and digital applications enabled by the fourth industrial revolution is the internet of things (IoT) or is also known as “internet of all things” (Schwab, p.18, 2016). Internet of all things can be described in simpler words as a relationship between things and people that made it possible by connected technologies and also various platforms. The digital revolution is inventing new approaches in which individuals and institutions engage and collaborate.

With the existence of technology and ICT and the rapid use of it in teaching and learning process, MOOC that stands for massive open online course is a web-based course available for free to any participant from all around the world (Cormier, & Siemens, 2010; Kop & Caroll, 2011; Abeer & Miri, 2014) started to arise. MOOC provides free access to high-quality learning materials, offered by elite universities and they are conceptualised as online learning environments in which participants worldwide can create, research and share open educational resources (Kop & Caroll, 2011; Abeer & Miri, 2014). The brief history of MOOC Courses shows that MOOCs have been developing successfully since 2008, with the clear purpose of not only to provide and enhance more learning opportunities but also to improve students’ learning experience (Ulrich & Nedelcu, 2014). MOOC is one of the most recent innovations in education and has represent a current trend in online education (Almahdi & Sulfeeza, 2017). Since 2014, more than 400 universities around the world has started to be using MOOC and more than 73 universities have combined two styles of education: traditional class with advanced MOOC in addition to the teaching and learning session.

In line with the revolution of 4th Industrial Revolution and 21st Century Learning, the Ministry of Higher Education Malaysia, in collaboration with 20 public universities, have launched the Malaysia MOOC initiative. The initiative was launched in September 2014 in line and accordance to the Malaysia e-Learning policy. This initiative is also part of the aspirations (shifts) of the Malaysia Education Blueprint 2015-20125 aspires “globalized online learning” in its ninth shift. There has been many researchers all over the world investigated the usefulness of MOOCs towards the education. Zarei and Supyan (2016) discuss on a case study of blog-based language learning and they figured that technological medium do provide learners a space where they can interact with each other even outside the classroom. Research has shown that online learning can be as effective as face-to-face courses provided that they are equipped with well-designed interaction activities (Song, Rice & Oh, 2019). They also furthered stated in their study that tutors plan an important role to provide learners with meaningful interactions using online learning. Learners indeed need immediate feedback from the tutor. This issue is also proven agreed by Nordin et al, (2016) in their study on the factors for development or learning content and task for MOOCs. They believed that adaptive feedback during learning is useful in assisting learners that need assistance in their learning. However, there are also challenges to the use of MOOCs in today’s education waves. Cabrera and Fernandez-Ferrer (2017) did a study investigating on the perceptions and opinions of the teachers of educational technology from a traditional universities
and from a distance universities. Their findings have found out that traditional universities are concerned about issues that are not worried or even raised by the virtual university teachers, and vice versa. Traditional teachers believed that MOOCs do not provide support learning instructions needed for the learners and learners still need tutors’ guidance for the learning process to fully complete. Nonetheless, on a positive note, Verstegen et al., (2018) discussed on whether is it possible for virtual communications and collaborations to happen with MOOCs and they have discovered that it is possible for virtual, online teams to collaborate on learning tasks without extensive guidance but it required additional communication and technology skills support.

**MOOCs as the booster of English Language Learning and Communication Skills**

Recently, the critical issue we encounter among today’s younger generation of students is that they lack of communication skills. There have been so many research on the a matter of critically lacking in speaking skills among ESL learners. Both Sabri and Qin (2014) and Ansari (2015) had a study on speaking anxiety among learners and they figured out that most learners are not comfortable in communicating using English language due to a few reasons including speaking anxiety, lack of confidence and lack in knowledge of the language. However, the emergence and the use of technology and ICT in education has brought quite of an impact and waves especially in English language teaching and learning. Gunuc and Babacan (2018) figured that technology integration in English language teaching and learning is helpful and crucial in the development of basic English language skills such as listening, reading, writing and the most important skill, which is speaking. They also further highlighted that technology integration do bring benefits in the process of teaching and learning English language. Technology integration is to be said is beneficial in encouraging students to learn actively, cooperatively based on critical thinking skills and helps improves communication skills. Rodrigues and Vethamani (2015) has also proven their stand on the impact of online learning in the development of speaking skills. They believed that online learning approach do encourage the students to practice their oral conversations in their own convenient and pace. They also stated that online learning approach also helps students to be autonomous learners in language learning. Banditvillai (2016) then later pointed out the same matter in his study on enhancing students’ language skills through blended learning. His findings have found out that online practice is beneficial to help learners enhancing their four language learning skills especially speaking skills as well as motivation level and autonomous learning.

Technology offers chances for communicative language learning (Laborda, et.al, 2016). Muruganantham (2015) in his study stated how the learning materials designed based on technology will facilitate the learners to achieve better performance. McClanahan (2014) in her study of training using technology in the adult ESL classroom has proven how learners truly benefit from an integration of technology as the use of technology indeed develops both job-related and communication-related skills at the same time. She also has her own perspective of how she believes that the technology, by nature provide more opportunities for authentic input and interaction which eventually can contribute to ESL learners’ communicative ability. This is further agreed by Banditvillai (2016) in the findings of his study where he has figured that online practice is directly beneficial to enhance learners’ language learning skills and learners’ motivation. Other than that, Yunus (2018) in her paper of innovation in education and language learning in 21st century also believed that there is a need for the use of the technology as part of the teaching and learning pedagogies. She did also provide her own hope of how we should look at helping our
learners to communicate effectively in international settings, not only on their accuracy use of the language. The focus on teaching and develop learners’ soft skills and critical thinking skills is also as equally important. Hashim et al. (2018) in her findings have found out that MOOC has been proven to be able to provide positive support for students to take charge of their own learning especially in ESL learning. The opportunity for learners to work collaboratively in MOOC makes them to be able to improve on their language skills and even built their self-confidence. Nordin et al. (2015) have conducted a study on technology acceptance of MOOCs in Malaysia and the study has presented the findings of MOOCs were very well accepted as the technology for learning. Hence, it is believed that designing and developing a MOOC course for English Communication Skills is possibly one of the best ways to help learners to develop good communication skills along with the critical thinking and problem solving skills.

**Distance Learning vs Constructivism as the Underpinning Theory in MOOCs for English for Communication**

A fundamental constructivist belief is that learners construct knowledge through their own prior knowledge and experiences. Nordin et al (2016) had their own perspective of related learning theories in developing and designing a MOOC course. They believed that designing a good MOOC course is based on the distance learning theory founded by Moore (1972) which best describes the concept of distance education where the MOOC acts as the platform for learners to learn with the existence of a tutor or a teacher virtually. However, Wang and Hsu (2009) believed that designing and developing MOOC with the use of ADDIE model as the framework is related to the theory of constructivism (Vygotsky, 1896) as learners curiosity is aroused through their interactions with the stimulators which in this situation is the learning materials provided and designed in the MOOC course. As communication skills is enhanced through self-learning and experience, also there is not much of a very rigid modules needed to help learners to improve on their English communication skills, thus the theory of constructivism is considered to be the best theory to be applied in this study. Learners will make use of their own prior knowledge and experience to accomplish the tasks prepared for them in the MOOC developed and eventually helps them to construct a better English communication skills along with good critical thinking and problem solving skills.

**Methodology**

A design and developmental research approach originated from Richey and Klein (2014) is applied in this study via five phases in accordance to the ADDIE model namely analysis phase, design phase, development phase, implementation phase, and evaluation phase. The goal of the use of a design and developmental research is to help researcher to design learning activities that are consistent to the learning objectives and then evaluate the learning outcomes (Wang & Hsu, 2009). ADDIE model was adopted to ensure that implementation of this module would help learners to improve on their knowledge and also their communication skills effectively. The use of instructional research design is also to ensure the learners to have effective and meaningful learning sessions. Hence, it is believed that through a design and developmental research, the usefulness of the module developed in Massive Open Online Courses (MOOCs) on the respondents can be further explored and investigated by the researcher as the module itself can be implemented on the students and the results can be measured.
The study involved a population of undergraduate students in a public university in Malaysia. The research sample chosen for this study are specifically the twenty-two second year undergraduate students of computer science course. There were a few instruments used in this study in order to gain the objectives of this study. An interview with the students, specifically a semi-structured questions interview were done to identify the students’ needs analysis. It is believed that personal interview would be the best instrument in order to attain this study’s objectives and purposes. Interviews come with different types and it is believed that the semi-structured interview is the best and the most useful format in collecting data. A semi-structured interview is not highly constructed, and respondents were simply able to answer all the questions freely about whatever crossed their minds. This particular interview was focusing more on students’ problems and struggles that they encounter when they are needed to communicate and have their presentations in English language. They were also asked on what they think of their own weaknesses that drives them to the barriers towards good communication skills.

Other than that, a specific module is also part of the instruments involved in this study. A specific module designed in Massive Open Online Courses (MOOCs) related to communication skills was created and implemented to the students, then later the progress of their level of development of English communication skills were observed through the tasks given by the researcher throughout the entire implementation process. The evaluation process also involved students to provide their own reflection of the whole MOOC developed and how the tasks in the MOOCs have helped them with their communication skills development. Once the reflections have been collected, the analysis of the results were carried out based on themes and categorization process.

Findings and discussion
Abstraction on the Facet Towards Lack of Communication Skills
From the entire sample, a total of 16 male and 6 female undergraduate students were involved. The respondents are to be considered as an intermediate level of proficiency learners. During face-to-face learning in the classroom sessions, they are to be seen and observed as lacking in communication skills. They had troubles in conveying their messages across during two-way communication activities in classroom. Other than that, the students were also seemed shy and rarely willing to participate during the session. Hence, it is believed that there is a need for an antidote in helping them to acquire good communication skills for future benefits. In conjunction to that, their needs analysis on the factors contributing towards their lack of communication problem and also their thoughts on the barriers towards communication skills were investigated.

Based from the semi-structured interview with the respondents, it has been gathered that there were a few factors they believed that they encounter which lead them to lack of communication skills and the barrier towards good communication skills. One of the main spoken issues is lack of confidence level. Majority of them mentioned that they are shy and have speaking anxiety. They tend to be very cautious and sometimes not willing to participate in any of the discussions or during presentation because they are aware of their level of proficiency and making them to encounter anxiety. This issue is obviously caused by their lack of information or knowledge on something or even with the language itself which is English language. They believed that one of the problems they encounter that leads them to the lack of communication skills is that
they lack vocabulary and also afraid of making grammatical mistakes while speaking or communicating in English language. This matter is agreeable by both Ansari (2015) and Sabri and Qin (2014) in their study on speaking anxiety as one of the reasons for lacking communication skills among ESL learners. In relation to speaking anxiety, the respondents also mentioned that they do not get enough chance for ample of practices due to more or less what they called it as an ‘unhealthy environment’. The unhealthy environment that they meant is that the lack of support from people surrounding and also lack of opportunity given to them in practicing their communication skills.

The findings from the needs analysis has proven that having only face to face classroom session to help students to build and acquire good communication skills in English language is not sufficient. The belief to have the help of technology as part of the learning and teaching session has been proven to be helpful in language learning. A few researchers have agreed to this matter namely Mclanahan (2014), Gunuc and Babacan (2017), Yunus (2018) and many other researchers. They all believed that technology as in open learning, especially MOOCs has its own contributions in helping learners to acquire good communication skills. Hashim et al. (2018) supported this by stating that MOOC has been proven to be able to provide positive support for students to take charge of their own learning especially in ESL learning. MOOCs has also proven to be able to help learners to work collaboratively with their peers and eventually help them in their confidence level. Not to mention by the fact that MOOCs is a very convenient platform and very well accepted by ESL learners according to Nordin et al (2015) in their study on the level of MOOCs acceptance for language learning.

Massive Open Online Course (MOOCs) : English for Communication

In conjunction to this, a platform using MOOCs for English for Communication course is designed then later built. A module consists of nine units of topics and discussion is built. The units in the module include:
1. The art of presentation skills - learners are required to identify their own strengths and weaknesses when it comes to presentation.
2. Effective communication skills - learners are required to brainstorm and identify the strategies they can come up with to help themselves with their own weaknesses when it comes to presentation along with some strategies to help them build self-confidence.
3. Miscommunication - this topic requires learners to give an example of miscommunication and identify the reasons why miscommunication happen.
4. Critical thinking - learners are exposed to the stages of moral development in this topic and learners are asked to give their own thoughts and opinions on a dilemma.
5. Analytical tools - this topic helps learners to be exposed with swot analysis and fishbone diagram.
6. Case study with the use of F3EAD - this topic requires learners to analyze a case study and give their own judgments based on the case study.
7. Caselet - this topic encourages learners to make use of some online tools available in the Internet to create a poster themed ‘Humanity’.
8. Language and Art - this section is where learners are able to be creative and express themselves by creating a poem that best describes their emotions and feelings.
9. Communication for society - this topic is the last topic that concludes the module which also aims to produce an end product. This topic needs the learners to create a video of an advertisement promotion ‘An Act of Kindness’.

**The Implementation of MOOCs for English for Communication**

Once the platform of MOOCs for English for Communication is designed and built, the course is implemented to the learners in a duration of 14 weeks time. The implementation is held in accordance to their weeks per semester. The implementation of MOOCs is also held as a supplementary of blended learning of virtual learning with face to face classroom. For the whole 14 weeks, learners are asked to do the tasks given in a topic each every week from the MOOCs blended with the face to face teaching and learning session. Learners cooperated very well and the tasks provided were all accomplished by them efficiently. The implementation of MOOCs to the learners can be seen as a platform for them to further enhance their creativity skills and also critical thinking skills. Based on the implementation done, it can be seen that learners have expanded their level of critical thinking by making their own thoughts and opinions on a few case studies and also on a few dilemmas provided.

This particular MOOCs courses is designed and built to further help learners to be more open with their thoughts and judgements along with helping them to be more critical in their thinking. At the same time, this particular MOOCs has also provided the learners with more chances to work collaboratively with their peers and also not to mention, the chance for them to be an autonomous learner themselves. The materials provided in the MOOCs course are not rigid, hence learners are able to play around with the materials given as to arouse them with their thinking skills but at the same time able to relate the issue back to themselves which is also agreed by Wang and Hsu (2019) on their thoughts on how the concept of MOOCs should be done to help learners with their communication skills. This is where fundamental constructivist have their stand on. Constructivist believes that learners learn through their prior knowledge and experience. Hence, it is observed that through the implementation of this course, the theory of constructivism is relatable to this study as learners tend to make use of what they have in themselves based on their prior knowledge and experience to accomplish the tasks provided to them in the MOOCs. The materials provided to them are just merely to help them to probe back their prior knowledge.

**Learners’ Evaluation on the Use of MOOCs for English for Communication**

Once the implementation of the MOOCs for English for Communication Course has been conducted, learners evaluation and thoughts on the course are taken into consideration for further improvements. The learners’ reflection on their thoughts and perceptions of the particular course along with the materials prepared are analysed then categorised into a few categories on how a MOOCs for English for Communication is able to help them in acquiring good communication skills. The findings on learners’ evaluation towards the impacts of MOOCs of English for Communication are gathered and categorised into four main themes namely a) the booster for critical thinking skills and self esteem, b) interactive and meaningful materials, c) the dose towards good communication skills, and d) the features of MOOCs.
A. The booster for critical thinking skills and self esteem
Learners believed that the particular designed and built MOOCs for English for Communication helps them in improving their critical thinking skills by making to need to think out of the box to solve or accomplish the tasks provided in the MOOCs. They also confessed that the tasks given to them in the MOOCs needed them to do quite a bit of research and reading, hence making them to be more critical in giving their thoughts beforehand. This is in a way parallel to the theory of constructivism by Lev Vygotsky (1896) which is also agreed by Wang and Hsu (2009) on how MOOCs are able to provide learners with autonomous learning and they only need their prior knowledge, also experiences to accomplish the tasks given to them.

On the other hand, MOOCs is also believed to have helped learners with their self-esteem. A few of the learners mentioned that the particular MOOCs has helped them to be more confident especially with their English language learning. They are now more confident in communicating with their peers using English language. Quoting a few of the learners responded on the issue of self-esteem and confidence level. ‘It is very helpful because i got no skill in communication. But since you taught me, somehow it give confidence to communicate with my friends in english. I always try speaking with them so i can learn from my mistakes’, ‘i found that i am now more confident to stand and speak in front of the crowd and comunicate with others using English’.

B. Interactive and meaningful materials
The effectiveness of materials for the learners are also taken into considerations. Learners put their own opinions on the materials provided in the particular MOOCs for English for Communication and learners do think that the materials are very helpful and interactive. ‘yes very helpful. I like all the task that you give in mooc. its very simple task but very easy to do. All students can do the task immediately’. Mostly materials provided in the MOOCs are some videos and pictures to probe the learners’ prior knowledge in each topics. Learners thought that the materials and tasks given to them are very meaningful as they are able to relate back to themselves and accomplish all the tasks. Quoting one of the learners’ response towards the materials ‘I hope this materials will be use in all learning process as it leads the students into being a new person and get them out from their comfort zone.’. The particular learner hopes for all the materials to be used continuously for its effectiveness. The learners also mentioned how interesting the materials provided in the sense of how only videos and photos were given instead of long texts that will demotivate them to accomplish the task. ‘I do like the materials provided because a lot of videos, images contain in the subject and not that old school boring text that no one will be attract to read. Hence the videos and images help me better in understanding the new information and education also makes me understand it quicker than before. The mooc also attract me to finish the task’. This is parallel to what has been proven by Muruganantham (2015) in his study on how learning materials designed based on technology are proven to be able to facilitate the learners to achieve better performance along with helping them to improve general knowledge.

C. The dose towards good communication skills
Learners do agree on the particular built and designed MOOCs for English for Communication helped them in improving on their communication skills. The MOOCs platform helps them to swap opinions with other people especially with their peers which eventually helps them to acquire better communication skills. At the same time, collaborative learning happens when they get the
chance to read other people’s opinions and provide their own thoughts as well. Other than that, learners also believed that this particular MOOCs helps them in encouraging them to be more active and participative virtually also during face to face classroom session. ‘The mooc also encourages students to be active and participate more in using english...’. Based on a few responses from the learners, it is also believed that this MOOCs has helped them to practice more on their language learning and has provided them with the platform, also medium for them to practice on their English language. This particular findings have been on the same track with other findings from other researchers on the benefits of technology, especially MOOCs in helping learners to further improve on their communication skills. Banditvillai (2016), Yunus (2018), Hashim et al (2018) and Gunuc and Babacan (2017) have proven their stands based on their findings that MOOCs do help in English language learning especially in improving learners’ speaking abilities and acquisition.

D. The features of MOOCs

On another note, learners also provided their thoughts on the features of MOOCs that they believed have brought benefits to them as ESL learners. The learners mentioned that the idea of having MOOCs in general as part of a blended learning with their face to face classroom is very convenient as they can do the tasks assigned to them according to their free time and they did not encounter any time constraints issue. ‘..Besides, we can do the assignment on the mooc wherever while lepaking with friends because we can do it by using phone..’. Massive Open Online Courses or is widely known as MOOCs is indeed famous for its flexibility and convenience for the learners (Abeer & Miri, 2014). This has been proven by Cabrera and Fernandez Ferrer (2017) in their study which they have discovered and believed that students nowadays prefer technology as part of their learning as it is more handy for them to access the information using technology wherever and whenever they want during their leisure time. Besides from its flexibility and convenience, MOOCs has also been proven to help learners to act as a medium and platform of info sharing among the learners. The learners stated that MOOCs is a good platform for them to share infos and ideas among them and they also get to learn from each other.

Conclusion and Implications

The waves of open learning MOOCs all around the world has given learners from all over the globe to have their autonomy learning practiced and applied especially in language learning. It is very important for learners to be more autonomous in their learning and take charge of their own learning. As in the era 21st century learning, educators act only as guiders and facilitators that guide learners towards better learning. Educators, on the other hand should be fully equipped with the use of technology in today’s world as online learning and technology as a whole is the ‘It’ thing among younger generations. In today’s globalisation world, it is undeniably needed for a touch of technology in the process of teaching and learning and MOOCs have been undoubtedly proven to be one of the best touches for communication skills acquisition among younger generations.

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