Roadmap of shifting to online education during COVID-19: Case of Albania

Ozcan Asilkan*, Department of Computer Engineering, Metropolitan University of Tirana, Rruga Pjeter Budi, 1000 Tirane, Albania  https://orcid.org/0000-0001-8220-2332
Elton Domnori, Department of Computer Engineering, Metropolitan University of Tirana, Rruga Pjeter Budi, 1000 Tirane, Albania  https://orcid.org/0000-0003-2194-8848

Suggested Citation:

Received from July 12, 2020; revised from August 12, 2020; accepted from November 12, 2020. Selection and peer review under responsibility of Prof. Dr. Huseyin Uzunboylu, Higher Education Planning, Supervision, Accreditation and Coordination Board, Cyprus. ©2020 Birlesik Dunya Yenilik Arastirma ve Yayincilik Merkezi. All rights reserved.

Abstract

After the widespread of the corona virus disease 2019 corona virus pandemic, most educational institutions stopped conventional in-class teaching all over the world. The Metropolitan University of Tirana (UMT) in Albania took a rapid decision for shifting to online education by estimating that the pandemic might continue longer than expected, which could create difficulties to gain the time lost. Considering these circumstances, UMT immediately formed a specialised team to prepare the roadmap for starting online education. This team evaluated the existing online platforms and prepared a guideline to be followed for a smooth shift. As a consequence, the university shifted to online education with more than 80% of the students’ attendance from the earliest days. This study presents the road map that was developed rapidly and applied effectively for a quick but smooth shift to online education.

Keywords: Education, shift to online education, coronavirus, COVID-19, pandemic, Albania.
1. Introduction

During the first months of 2020, several European countries were affected by the coronavirus disease 2019 (COVID-19). Since the spread of the virus was incredibly fast, countries started to close their major economical and service activities, followed by overall lockdowns. The number of country-wide school closures over the world increased from 6 to 193 in just 30 days (between 1 and 31 March, 2020) and as of March 31, more than 1.5 billion learners were affected by the outbreak (UNESCO, 2020). As of July 10, 2020, COVID-19 had spread to almost every corner of the world, with over 12 million confirmed cases and more than 500,000 deaths thus far (Liguori & Winkler, 2020). Large event organisers (e.g., Coachella), sports events (e.g., NBA and Formula 1) and corporations (e.g., Facebook and Google) had also taken a range of precautions, including travel restrictions, event cancelation etc. (Zraick & Garcia, 2020).

With the rapid advances in technology and internet in the last few decades, online teaching became popular in education, especially in the universities around the world. Some of them offered the possibility to attend full study programmes online by attending classes and taking the exams completely online. Moreover, several platforms (e.g., Coursera, EdX, Udemy etc.) have offered online teaching for specific courses (along with a certificate that demonstrates participation and, in case, the successful passing of an examination).

Many researchers published strategies and recommendations for shifting to online education. Indeed, the issue of switching to the online education is not new. In 2009, hundreds of schools in the United States closed due to the swine flu. Several studies were published regarding the steps required for successful online teaching, like Ash and Davis (2009) who introduced the strategies for a home study and the benefits of technological support. Archambault and Crippen (2009) have analysed the level of implementation of the online teaching in the K12 system.

A recent work by Zayapragassarazan (2020) introduced the generic strategies for ensuring higher levels of student engagement in online teaching, by focusing on online tools and platforms. Bao (2020) classified six instructional strategies to improve students’ learning concentration and engagement in order to achieve a smooth transition to online learning, based on the observation at Peking University.

Basiliaia, Dgebuadze, Kantaria and Chokhonelidze (2020) analysed the situation in Georgia and Muirhead (2000) exploited the opportunities of the situation by using online education as a new school that can enhance the traditional one.

In spite of the popularity of online teaching, a rapid shift of all the existing courses to the online version is very massive and disruptive. A complete online course requires a careful redesign of lesson plans, teaching materials, such as audio and video contents, as well as technology support teams. In addition to the challenges for the faculty, students also have many problems, such as lack of self-discipline, good learning attitudes and adoption of online materials, when they are self-isolated at home (Bao, 2020).

Other studies, such as Brazendale et al. (2017) and Brooks et al. (2020), presented the negative effects that prolonged school closures might have on children’s physical and mental health.

This case study aims to present an applied roadmap for shifting to online education rapidly, considering the possible problems from both faculty and student perspectives.

2. An overview of COVID-19 in Albania

Albania officially joined the affected countries on March 9, 2020. Most of the companies and institutions were forced to interrupt their services because of the population quarantine demanded by the government. The education institutions were among the first ones that were forced closed due to the high number of persons who need to be present in their premises. Their services were interrupted...
to an undefined time upon the order of the Ministry of Health and the Ministry of Education and Sport of Albania.

The interruption of the education process was not the first experience for Albania. Two earthquakes (in September 2019 at a magnitude of 5.6 and in November 2019 at a magnitude 6.4) had also caused the education system to be interrupted for several weeks in some Albanian cities, including the capital, Tirana. Nevertheless, since the interruption lasted only for a short time (a few weeks), the missed classes were compensated on the following weekends. Considering that the closure due to the pandemic situation would have lasted much longer, this could have caused the cancellation of the academic year in all study levels. For obvious reasons, this alternative was not embraced by most of the parties, such as students and parents, because of the economical side effects.

Several weeks after the official COVID-19 lockdown, the Ministry of Education and Sport of Albania took the decision of shifting to online all the teaching activities in all levels of study, from the elementary school to the university. This decision was taken to enable students not to lose the whole academic semester which would have caused many side effects. With all the difficulties that this decision included, all academic institutions started online teaching activities. However, several issues rose during the implementation and the application of this new approach since no institution had experience before, thus it has been a real challenge for all.

In Albania, due to the law in force, online education is banned at all levels. This brings several drawbacks compared to academic institutions in other countries, which were as follows: a) no academic institution experienced such an approach before (even partially); b) there was no infrastructural investment in such a direction by the academic institutions; c) most of the teaching material were not adopted to serve online teaching; and d) most of the academic staff and students lacked experience in this direction.

The education process was implemented only through the face-to-face approach in the premises of the institution. The use of the white board and markers was common practice, especially even at university level (in particular, traditional basic courses in natural sciences, such as maths, physics and chemistry). The lessons were designed around the approach of communication between lecturer and students. The eye contact was important for a lecturer because the information perceived from the student is crucial.

Furthermore, technology plays an important role in the teaching process by providing tools to facilitate communication and understanding. The use of presentations (slides) has become common practice in daily activities. In several study programmes, the use of specific equipment and environment is crucial for understanding the subjects the student is studying. Mainly, in scientific subjects, the use of laboratories in dedicated fields not only played an important role in student preparation but also a large benefit to the market.

Many universities have adopted web platforms (such as Moodle, Google Classroom and other commercial ones) to share the course materials with students, perform quiz/test and maintain the communication channel between the lecturer and students.

All these have encouraged many lecturers to make large use of technology during the teaching process, which has enabled the process for a smooth transition from the traditional to online teaching.

3. Roadmap for a rapid shift

On March 9, the first case was evidenced in Albania and the same day, the Ministry of Health decided to close most of the activities in the country. This decision was followed by an ordinance of the Ministry of Education and Sport (which entered into force the day after) to close all academic institutions to an undefined period. There was no decision yet on how to proceed in such case.
The next day, with lessons interrupted, the academic senate of the Metropolitan University of Tirana (UMT) organised a meeting to discuss possible alternatives. A task-force team comprising academic and IT staff was formed to evaluate the possible opportunities and the available technologies. The aim was to continue the lessons online in the next week without a longer interruption.

3.1. Online meeting platform evaluation

The team immediately started testing the possible online platforms [e.g., Microsoft Teams, Google Meeting, Zoom, Go To Meeting (GTM), WebEx etc.] which seemed to provide live meetings for substituting regular in-classroom lessons. Many popular platforms were evaluated with many criteria like the scalability, performance, user-friendliness, easy access to students, interactivity, multi-device support, cost etc. Webinar platforms were eliminated since they would provide students writing messages in a chat box rather than actively interacting with the lecturer and other students by talking, sharing screen etc.

In the second step, the team focused on two criteria: scalability and usability. Online meeting tools are mostly designed for a limited number of persons who can participate and interact during the meeting. Large-scale participation is usually managed through webinars. Some courses may have many students attending, so it should be able to provide a good quality of streaming with many attendees sharing their audio and video. For the second criterion, ‘usability’, the team looked for a platform that was easy to use by anyone, even if they were not familiar with technology. The team did not focus on learning management system (LMS) since the university had already been using one commercial application for this aim for a long time.

Platforms that were tested had many differences. Some of them had some requirements that were not very feasible for the university. For example, the topmost popular, free platforms, like Microsoft Teams and Google Meeting, required an institutional account in the respective platform. All users should be under the same domain. They were suitable for institutions which already adapted them to manage their email accounts and cloud documents. Zoom had good performance but one needs to install the appropriate application on the device. GTM and WebEx enabled the usage via web browser. They provided dedicated applications as well as better performance. GTM had an easy and automatic setup, while WebEx account was activated upon request. Moreover, GTM enabled a free trial period fully featured for 14 days. After many intensive trials in a short time, the team decided to use GTM.

3.2. Online teaching tools

Most of the lecturers make regular use of presentation slides, which has become the main way of visual communication. For this reason, it was not very difficult for most of the lecturers to switch to online teaching.

But still, many lecturers make use of the white board, especially for fundamental courses (e.g., maths, physics, chemistry etc.) offered during the academic year. Several online meeting platforms provide drawing tools but, in general, the use of the computer mouse device is not very comfortable. To remedy to this problem, the university used two options: a) penpads and b) tablets along with a pen. Both approaches were suitable along with the drawing tools offered by the platform or specific desktop/mobile application.

The use of software applications has become more connected to the teaching activity than ever. Not only in study programmes that are oriented in the information technology field, but as well as in other fields, such as economy, architecture and civil engineering (by use of specialised drawing tools), medicine (by use of 3D simulators) and many others. Therefore, in most of the study programmes, the university offered to implement the laboratory hours through the online approach. Obviously, it would not fit all cases. Engineering programmes, like electrical, electronics, telecommunication, civil
engineering (onsite measurement and evaluation) and several others suffered from the lockdown. The lack of practice on specific devices influenced the quality of teaching and the level of understanding.

What mostly helped the institution to switch to online teaching are (a) the policy of the university to provide all students with a notebook upon enrolment by ensuring that most of the students had the appropriate equipment to access online material; (b) ongoing use of the LMS to publish all the teaching material, recorded video, perform quiz, etc; (c) well-prepared and easy-to-understand guidelines for students and lecturers of UMT to adapt new online education platform; and (d) continuous intensive support.

3.3. Online teaching approach

Needless to say, the interaction between lecturer and student has diminished during online teaching. Most of the students keep the video and audio off to optimise the connection speed and not to interfere with the audio of the lecture. The lecturer had to interrupt every now and then and attract the attention of the students. During the face-to-face teaching, it was easy to evaluate the level of interest or understanding by just looking at the students but it was not possible online. To ask questions, students had to interrupt the lecturer during the lesson (in same platform there is a ‘raise hand’ option). Question could be asked by using the chat box, but in this case, the lecturer every now and then should stop, read the question and then continue with the explanation, which in most of the cases turns out to be frustrating. An alternative is to have an assistant who can answer questions to students (in a public or private chat).

3.4. Students’ perception

When the institution decided to switch to online teaching, students were quite collaborative and reactive to embrace the new approach. This is because Albanian students suffered a former experience during the earthquake (which they wished to avoid), but there was an imminent risk to lose the academic year.

Nevertheless, sometimes we observed a lack of motivation among the students to attend online lessons. The results were a bit discouraging. From a more accurate analysis, we observed that this effect was due to the perception that students had on the new approach. Most of them did not consider it as an alternative to dive in a new approach of study. Some had infrastructural issues such as lack of internet connection or low connectivity. But most importantly, the long lesson hours (the duration was the same as the face-to-face teaching) were not suitable as students hardly could keep a good level of concentration.

3.5. Examinations

The examination modality was part of a long and complex discussion among the academic staff. The two modalities of remote examination we experienced were quizzes (using our LMS) and midterms (by giving a wide variety of question and creating many groups – wherein individual questions were not possible). In both cases, it was very difficult to verify the genuineness of the answers. The two successful modalities applied online are (a) projects, where students and the lecturer meet together and discuss about the content, and (b) oral exams.

Considering the circumstances, we decided to carry out the final exams in the university premises under the vigilance of the academic staff.

4. Conclusion and future work

The COVID-19 pandemic has disrupted the regular education plans all over the world. Schools need to overcome this matter quickly as the education is one of the vital elements of all communities.
This study aimed to present an applied roadmap for a rapid but smooth shift to online education, which could be employed during emergency cases, through the case study of UMT, a private university in Albania. This roadmap might help teachers and learners involve themselves continuously in the learning process. Needless to say, steps in the roadmap require selection of suitable online learning platforms, digital course materials, faculty involvement and student adoption. This roadmap is supposed to help any higher education institution overcome the educational crisis that emerges during times like the lockdown.

Throughout the entire semester, UMT carefully monitored the progress of online education. Periodically, feedback of the students and lecturers are collected through surveys and online meetings, followed by formal reports and improvements. Our future work aims at presenting the statistics, periodical reports and analysis of the survey results that could help educational institutions switch to online education efficiently.

Acknowledgements

We acknowledge the academic, technical and administrative staff of UMT for their contributions.

References