STUDENTS' SELF-REGULATION LEARNING IN ONLINE-LEARNING PROCESSES

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Abstract: Covid-19 pandemic reality forced a high educational system in Albania to develop the teaching in distance through the support of the Internet-based technologies. The contemporary ways of learning that technology offers found a wide use in online-learning environments. The purpose of this study is to examine students' self-regulation learning in online-learning processes. This learning form will be treated specifically in relation to metacognitive skills, time management, environmental structuring, persistence and help seeking, which play a very important role in involving students productively in online learning. The quantitative method has been employed in this study. The sample included in the study consists of 310 students belonging to both bachelor and master programs obtained from two universities in two Albanian cities. Questionnaire administration is held online. The findings of the study showed that students, although they have good skills related to the self-regulation in online-learning, they still need further development this way of academic interaction and behaviour. The findings of this study can help students, teachers, researchers, policymakers and other stakeholders. Further studies will be conducted to develop a contemporary form of learning.

Keywords: students, self-regulation learning, online learning, metacognitive skills, universities, Albania

INTRODUCTION

The rapid development of information and communication technology (ICT) has affected the quality of the educational process. Applying ICT properly improves and develops both the teaching and learning process. The implementation of e-learning as one way of applying

modern information technology has created a stimulating and positive climate for many changes in educational system in common. Thus, e-learning can reasonably be called a catalyst for change in higher education (Dragan at el, 2019). Students use e-learning in a variety of forms and ways (organization and presentation, web browsing, email, social networking sites, and so on).

Online-learning is one of the modern ways helping in the realization of the learning process. The purpose of this study is to examine student's self-regulation learning in online-learning. Various studies have shown that this form of learning is just as effective as traditional learning. Alsaaty, Carter, Abrahams, and Alshameri (2016) compared traditional education with online-learning in their research. Their study showed that a high percentage of the students have assimilated more information during face-to-face classes (not online), but they positively perceived their overall online experience, even though they have encountered difficulties while using e-learning platforms (ibid).

Online education can undoubtedly offer new learning environments that make learning accessible and support students in developing competencies, skills, and attitudes (Vlachopoulos, Sangrà, and Cabrera, 2012). In e-learning environment, students are responsible for their own activities and have to take part actively in the self-management of learning process. The self-regulated learning is an ability to understand and control learning environment and thoughts in pursuit of attaining a long-term goal.

LITERATURE REVIEW

Nowadays e-learning provides a dynamic, interactive and nonlinear learning environment for learners. According to Marinescu (2007), e-learning approach has the following advantages: e-learning is not only a long-distance learning process, but also an actual meeting, individual or collective tutoring, a regrouping and a concrete physical presence sequential and temporary, of course; it circulates a huge amount of knowledge with a high updating degree; it makes the educated person in the position to work intensely, by himself/herself, through unilateral concentration to solve specific problems; it respects the personal working rhythms, each learner managing his/her own obligations and

the time necessary to accomplish them. To these advantages Ilie, and Frăsineanu (2019) have added the following advantages. E-learning has simple and flexible logics, it saves time; it is accessible and mobile, it uses different forms of content (video clips, dynamic presentations, forums and discussion charts), it is presented in modules, it can be both synchronous and asynchronous, it uses modern methods and learning means, it facilitates learning management and self-management, it has a large capacity storage and it capitalizes on the external links, power-point slides, audio and video documents, etc. On the other side, also students had to face challenges. Focusing on students' perspective on e-learning, this study identified that among the main challenges that students encountered were accessibility, connectivity, lack of appropriate devices, and social issues represented by the lack of communication and interaction with teachers and peers (Aboagye et al, 2020). Effective online education consists of online teaching and learning, boosting of several research works, principles, prototypes, theories, ethics, and appraisal of benchmark concentrations on quality online course design, teaching and learning (Hodges et al, 2020). This process also consists of adequate strategic preparation, trust establishment, thinking in processes, amalgamation and reinforcement of all parties involved, separate, collaborative and organizational knowledge (Cameron, and Green, 2019).

Self-regulation is the ability to organize one's behaviour, emotions and thoughts in pursuit of attaining a long-term goal. Specifically, according to Shuy & TEAL staff (2010), self-regulated learning consists of three components: cognition, metacognition, and motivation. The motivation component has also been supported by Liaw, and Huang (2007), who proved that learning motivation can be stimulated by establishing an effective interactive online-learning environment, promoting students' self-regulated learning. Meanwhile, according to Zhao, and Chen (2016) the satisfaction played a key role for e-learning success and self-regulation. SRL appears to be important for learners in online-learning environments that afford high learner's autonomy level and low levels of teacher presence (Lehmann, Hähnlein, and Ifenthaler, 2014). In the forethought phase, learners are involved in task analysis processes and self-motivation beliefs. Next, the phase of

performance takes place. In this phase, learners are involved in self-control processes and self-observation. The third phase is self-reflection. In this phase, both self-judgment and self-reaction occur. These phases repeat in a cyclical manner throughout the learning process.

METHODOLOGY

The method used to accomplish the goal of this study is quantitative methods of collecting and data analysis. The population selected in this study are university students. The sample selection are 310 students studying in Tirana University and University Aleksander Moisiu in Durres. 60.3% of students in this study belong to bachelor programs and 39.7% of them belong to master programs. The questionnaire used for this study is a self-regulated online-learning questionnaire adapted from Jansen, et al (2017). This questionnaire contains a combination and adaptation of all questionnaires that measure all aspects of self-regulated learning. The survey questions are structured and measured with the help of Likert scale (Always, Very often, Sometimes, Rarely, Never). It also collects demographic data to give a more complete picture of the sample included in the study. The data collection from administration was conducted online through the questionnaire. The selection of students involved in the study is random. Data processing was carried out with the help of IBM SPSS. Data analysis is statistically descriptive.

RESULTS

Students' metacognitive skills in online learning

This students' skills were measured through the eight statements which are reflected in *Figure 1*. During the analysis we referred mainly to the higher density for each of the measured statements. Regarding the statement *"I think about what I need to learn before starting an assignment in an online course"*, it was noted that the highest density is in the graph that shows that the majority of students (41.9%) always think about what they need to learn before starting online-course. Regarding the statement *"I make myself questions about what should be studied before embarking on a study to develop online course"*, it was highlighted that the majority of students 33.5% often ask themselves this question.
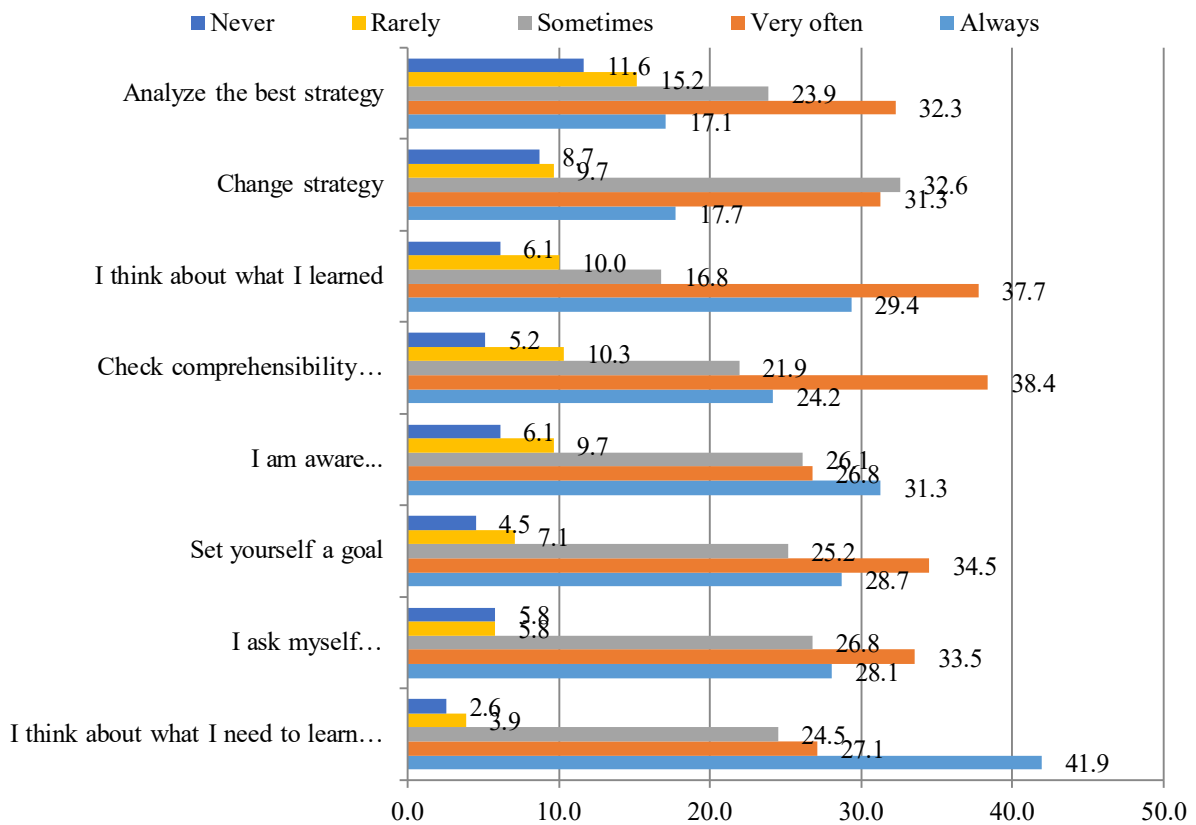
Figure 1: Metacognitive skills in online-learning
Source: presented by author results of own researches

While another part of the substantial (28.1%) said they always ask themselves. Students were also asked about setting a goal to manage study time for online-courses. The highest density is found in the answers 34.5% (very often) and 28.7% stated that they always set a goal to manage the study time for online-courses. Regarding the statement *"I am aware of the strategies I use when studying for online courses"*, it was noted that the highest percentage (31.3%) appeared in the answer *"I am always aware of the strategies I use"*. Students were asked whether they ask themselves regarding the comprehensibility check of the courses they attend online. Most of them (38.4%) stated they do very often and 24.2% stated they check comprehensibility always. At the same time, the study participants were asked if they think about what "I have learned after completing the tasks given in the online course". The highest density of answers (37.7%) consider it very often and 29.4% stated that they always think about what they have learned after completing the online-course. Respondents were also asked about changing strategies, when they do not make progress in online-learning and 32.6% declared that they sometimes change strategies while 31.3%

declared that they change strategies very often. Students were asked if they found themselves analysing the most useful strategies while studying online-courses. Higher densities of 32.3% participants have to answer more often and 23.9% answered sometimes. According to the analysis presented above, it is possible to conclude that most of students possess cognitive skills to manage themselves in the online-learning environment.

Time management and environmental structuring

Another important element of self-regulation learning in online-learning is time management. The data analysis has highlighted the difficulty encountered by students in maintaining a regular study program for the courses they take online. 31% of respondents showed that they sometimes encounter difficulties while 26.8% showed very often, 21% always encounter difficulties while 16.1% sometimes and only 5.2% never encounter difficulties for the courses they take online. Data analysis also showed that a significant proportion of students do not spend much time on online-learning. 31% of students affirmed they do sometimes, 25.5% answered "never", 22.6% answered "rarely", 14.8% of them very often and only 6.1% of students affirmed always. Referring to this analysis, it is possible to conclude that students feel difficulties with their time management and this consequently hinders the quality of their online-learning.

A huge significance has the choosing affordable online access and facilitating environment which supports effective self-regulation in online-learning. Most of the students declared that they choose a suitable place when they involved in online learning to avoid losing concentration. Thus, 44.5% of respondents said "always", 21% replied "more often", 24.2% do it "sometimes" and 4.2% declared "rarely". While they also claimed that they choose a suitable place to study the materials obtained online and most of them know what the teacher expects from them to learn in the online-course.
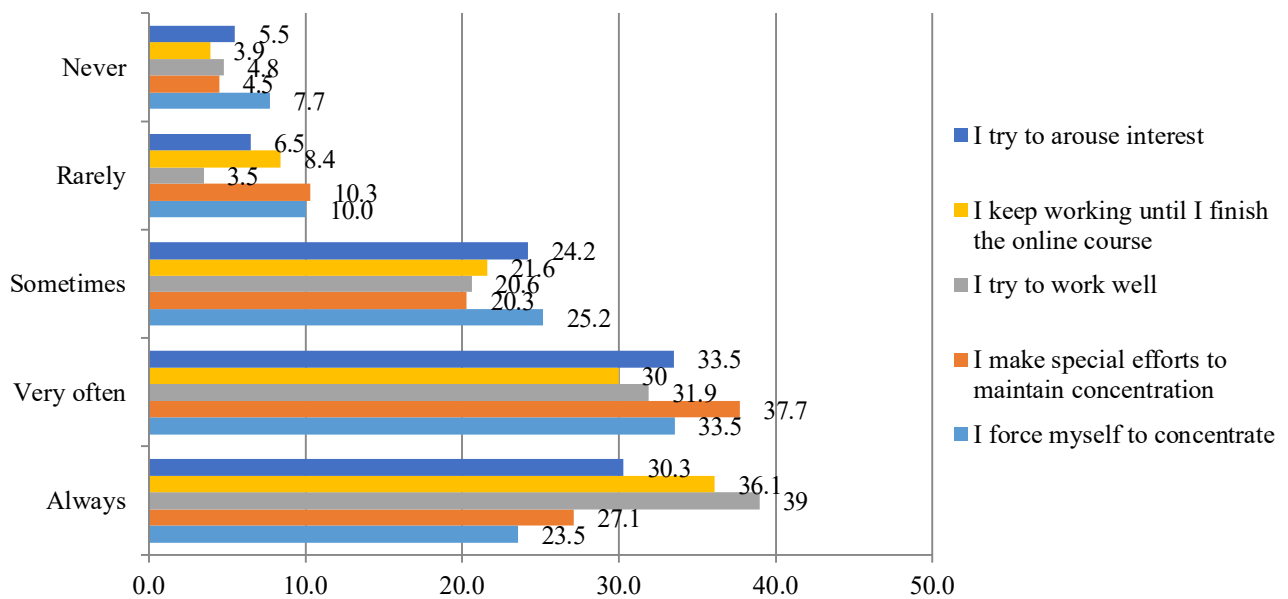
Persistence

Persistence also affects the self-regulation in the learning process. Several statements were made to measure this behaviour. In the analysis below, we will also focus mainly on the higher density of

responses given to each statement. Students were asked if they force themselves to focus on the case, when they get bored while staying in online-learning. Most of them (37.7%) stated "very often" and 25.2% declared "sometimes" force themselves to concentrate. Meanwhile, the study showed a significant percentage 7.7% (N = 24) who never forces themselves to concentrate. When students reach the point or the moment, when they start to lose concentration during online-learning, 37.7% of respondents stated "very often" and 27% stated that they always make a special effort to maintain concentration. The sample taken in the study was also asked if they try to work well even if they do not like online learning. 39% of them stated, they always try to work well and 31.9% stated, they often try to work well even when they do not like online-learning. If it happens that learning materials are tedious, difficult and uninteresting, students answered they manage to continue working until they finish this online-course. 36.1% of them stated that they always continue to work and 30% of students said that they continue to work very often until the online-course is over. In connection with the missing interest for online-learning, 33.5% of respondents stated "more often" and 30.3% of them said they always try to push themselves to rise the interest, in case they lose it. *Figure 2* shows that the highest density is mainly relate to the answer "very often" which is accompanied by "always" and "sometimes". It means that students have developed the behaviour of persistence to organize themselves in online-learning.

Help seeking

Both collaboration and coordination between students effectively support the learning process in order to understand online materials better. At the same time, help seeking is another important element that helps to better understand students' self-regulation in online-learning. 28.7% of students who were part of the study stated that they sometimes ask other students who are part of the study about things they do not understand during the online-learning. However, 10.6% of respondents indicated that they never ask other classmates or other students about things they did not understand. Referring to this result, it is understandable that a high number of students (39.3%) do not cooperate with each other in case they struggle with online-materials.

Figure 2: Persistence in online-learning
Source: presented by author results of own researches

Students were also asked about sharing problems related to online-learning among peers. Data analysis revealed, 28% of them answered "always", 27.7% answered "sometimes", 21.9% replied "very often", 11.9% do it "rarely" and 10.3% of students stated that they never share and solve the problem of online-learning with their classmates. It is seen, mostly students share online-learning problems with each other.

Regarding the insistence to ask for the help to understand online-course lecturers better, 35% of respondents declared that sometimes they ask for the help, while 17% stated that they always ask for the help; 17% stated that they ask for help very often and 10.3% stated that they are never persistent for it. Thus, the highest density is in the answer "sometimes" they ask for help from lecturers. At the same time, the highest students' density (29.7%) takes place in the answer "sometimes" regarding the control of the materials they receive online with each other. To understand better collaboration level, the question was put, whether the students ask their peers about their performance in online-learning. Students' response revealed that 28.1% of them stated "sometimes", 27.7% are "very often", 21.3% are "always" and 10.3% stated that they never communicate with classmates to learn more about their performance. Figure 3 shows that the density of answers on the help seeking is concentrated around the answer "sometimes" which is accompanied by "very often" and "always".
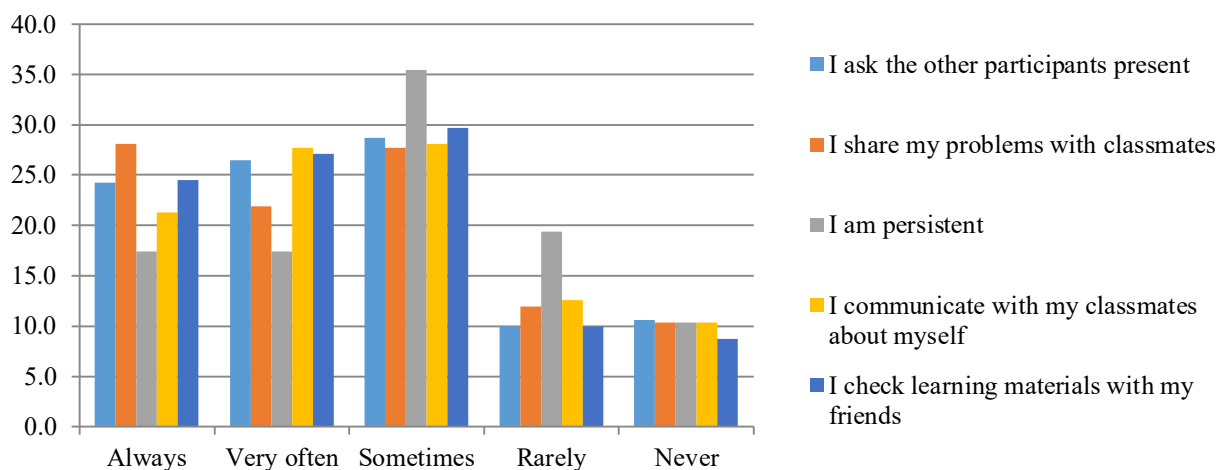
Figure 3: Help seeking for online-learning
Source: presented by author results of own researches

CONCLUSIONS

Self-regulation learning is an important element that supports online-learning. Students are responsible for their own activities and have to take part in the management of learning process more actively. This study found that students possess cognitive skills to manage themselves in online-learning environment. They have also developed the behaviour of persistence to be organized in this environment. To support their learning and to avoid losing concentration, they choose a suitable place to engage in online-learning.

Difficulties were mainly identified with the component of time management. Students had significant difficulty to manage their time well in order to be part of online-learning. This factor is important, because it affects their effective participation in the learning process and their success in online-learning in common. Therefore, it is necessary to find a motivator to manage their time well to meet online-learning deadlines.

Both collaboration and interaction between students in their online-study support and develop the learning process. Our study found that seeking help element does not extend widely among students. Somehow, it shows indifference to the material learnt. It means, educators (professors, lecturers, and assistants, as well as educational software developers and coordinators in higher educational institutions) have to look for a way to rise collaborative behaviour between students to support their learner as much as possible in online-learning.

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