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ACADEMIC EDUCATION DURING THE COVID-19 PANDEMIC – POLISH AND ITALIAN EXPERIENCE

ABSTRACT: The diagnoses and empirical analyses described in the article were linked by a common research problem expressed in the question about the experiences of academic entities in the field of remote education in the situation of the SARS-CoV-2 epidemic. The international research reported in the text, however, was conducted in an extra-coordinated situation (to a large extent during the lockdown period), applying two methodological approaches in complementary quantitative and qualitative procedures. Elements of a diagnostic survey (in Polish studies) and an analysis of the content of documents (in Italian studies) were used. The application of the indicated procedures allowed to obtain a complementary image of the experiences of higher education entities in the research situation outlined. The empirical analyses presented in the text allow for the formulation of certain common conclusions resulting from the reported international research. The international and global experience is a novelty of the epidemic situation in which remote education was implemented. The necessity arose to focus on the new conditions of relations between entities in academic education, which differ from traditional direct contact, as already indicated to us by Socrates and Plato. The lockdown changed these relationships. The everyday life of universities has been disrupted, which requires new solutions for the organisation of the educational process.

KEYWORDS: academic education, learning process, COVID-19 pandemic.

Introduction

Rapid changes in the contemporary world have brought about a number of new phenomena. Our everyday rhythm is increasingly often disrupted, forcing individuals and groups to introduce changes in virtually all spheres of their lives. Our everyday life is to a large extent determined by society and culture. Moreover, globalisation brings new risks, internal contradictions and ethical dilemmas, as well as hopes and doubts. The same applies to such threats as epidemics that create completely new conditions for individuals and societies. In 2020, the SARS-Cov-2 pandemic established new conditions for living in Europe and in the world. This translated into new conditions in academic education. Following Socrates and Plato, the latter has been based on the dialogue between the master and the student, which required face-to-face contact. The

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lockdown has changed relations between subjects of academic education and shifted these relations to digital media. Everyday education in European tertiary institutions was disrupted, which led to an organisational crisis. This became a challenge that mobilised various parties to look for a new approach and the use of modern information technologies in education.

Because of the SARS-CoV-2 pandemic, the situation of academic education can be described as difficult due to a number of obstacles for the implementation of its goals. This also translates into the disruption of its regular operational structure. Usually, a difficult situation leads to a conflict between the task to be implemented and the capacity to implement it (see Łukaszewski 2015, p. 33). A specific feature of the situation is its novelty since we have never encountered anything like it in our educational work. It is natural that a new situation raises concerns about the feasibility of educational objectives and goals. At the same time, it opens space for hopes and opportunities to look for new solutions, solutions which have not been previously used in academic education. Although little known, strange in a sense, or perhaps seen as unwanted and imposed, these new solutions may be interpreted and assessed by educational establishments as supportive or unsupportive regarding the implementation of certain tasks. This may generate emotions, opinions and concerns that raise a number of questions: Who is responsible for the organisation and new educational conditions? What are new responsibilities are vested in academic units? What is the assessment of our competences to meet new education challenges? How do we assess the competences of our partners? How do we find our place in the new academic education setup?

While looking for answers to these questions in the context of online education during the SARS-CoV-2 epidemic, the article attempts to examine the relevant experience of academic units. Considering the global dimension of the epidemic, the article also presents the Polish and Italian experience. This exercise creates new areas for international reflection on online teaching practice in higher education institutions that face the epidemic.

The epidemic and education (not only academic one) – difficult relations and new areas to reflect upon

In the new reality, certain notions have become contagious. These notions form a vernacular used in everyday communication, as well as in the press and science. It is the magic of the epidemic. We usually associate such notions with images of contagious diseases or viruses infecting our computers. Thus, the epidemic has become very popular and often reflected upon. The epidemic outbreaks and spreads. Shortly, we discover that the epidemic may have ‘many faces’ (Kucharski 2020, p. 10). In inter- and

trans-disciplinary studies on epidemics, people from various scientific disciplines passionately examining this class of phenomena (Kucharski 2020, p. 10) help us to identify those different faces. The SARS-CoV-2 epidemic makes us prone to reflect on many things. In fact, it is hard to find an area of our life, or an area of human reflection, that has not been changed under the influence of the epidemic. Education on all levels has not remained free from the influence.

Every epidemic is different in terms of its development. However, we may distinguish certain common elements: outbreak, spread, peak and decline. In 2020, in Europe (in March 2020 in Poland specifically), we all witnessed the outbreak of the SARS-CoV-2 epidemic, followed by its spread, peak and decline. It is, however, hard to define which of the stages we are at the moment. The outbreak of the epidemic has caused an unusual, multi-dimensional crisis that disrupted the reality we knew and day after day forced us to adapt to new unknown conditions. The way we function in different areas of our lives has changed. *Lockdown* kept us at home and forced us to organise our lives in the confined space of our homes. It had a serious impact on education too. University education based on personal contact has been replaced by online teaching. Of course, this form of education did not emerge suddenly, since it had already been present in the academic context. What we witnessed was the outbreak of online contacts during the epidemic, which progressed and expanded on a massive scale. Online education has become a mandatory solution that replaced the previous traditional ‘grammar of education’ (Czerepaniak-Walczak 2020). By using the term ‘grammar’, M. Czerepaniak-Walczak emphasises resistance of education to changes (Czerepaniak-Walczak, 2020). Grammar suggests a regular structure based on ‘fixed schoolwork organisation, including standard organisational practice pertaining to time and space management, division of knowledge into subjects, assessment and classification, and grouping of students according to their age’ (Czerepaniak-Walczak 2020, p. 4). The SARS-CoV-2 epidemic disrupted the previous arrangement and irreversibly transformed the traditional grammar of education.

Just like the epidemic, education is generally discussed when something unusual happens. In our everyday life, it is like a prose, it is the ‘obvious’ filled with routines and habits (Czerepaniak-Walczak 2020, p. 1). Our experience with consecutive reforms indicates that processes at every level of education face resistance produced by different factors, especially familiarity and comfort encountered by subjects of education when they use traditional educational patterns imprinted in the approach of organisations and regular practices. During the pandemic, the ‘familiarity of education’, or the ‘familiarity of academic education’ to be more specific, has gained a non-metaphoric meaning. Lockdown kept all people at home. The academic life that we know from halls and lecture rooms has moved to living rooms, and people that happen to live together

with students have become new subjects of education. The direct contact between a student and a teacher has been replaced by online contact through digital media. This causes further concerns about meeting new requirements set for all participants of online academic education. This also gives rise to new challenges and generates new solutions facilitating the organisation of education. This kind of organisational crisis has become a reason to introduce changes and promote development. Many subjects of academic education have appreciated the unique potential of the new, little known, and undesired educational situation. Not only does it restore certain reflections on education (e.g., its role in creating true agora, a venue for direct discussion), but it also contributes to new, equally important reflections (e.g., questions about conditions for the social development of students educated through digital media).

Academic education during the COVID-19 pandemic – the Polish experience

In Poland, the situation of academic education changed due to the SARS-CoV-2 epidemic in the middle of March 2020. To a large extent, the new situation forced academic teachers to use new technologies as a primary, and sometimes only, tool to proceed with the implementation of educational goals at all levels of education. Three weeks after the pandemic had started in the country, the speedy reaction of the government and the decision to close schools, universities and other education organizations, introduce restrictions, and shift traditional education to the Internet (online teaching) enabled to mitigate the spread of the SARS-CoV-2 virus and reduce the number of people infected. The rapid and unexpected descolarisation in Poland affected 1.2 mn students (Szkoly wyższe i ich finanse, GUS 2018). In total, over 21% of Poland's citizens had to change their traditional education. The same applied to adult education centres in rural areas and cities. 'Academic life' moved away from university corridors and into living rooms and small student rooms. Certain educational access factors changed as well, together with the organisation of student life and the educational process. This could tempt the relaxation of the discipline of body and mind. The new organisational conditions in academic education acted as inspiration to examine them empirically.

Studies referred to in the article involved several universities in Poland. The mix consisted of 76.84% universities, 13.27% academies, 5.46% other post-secondary institutions and 4.42% universities of technology, of which 96.17% were public and 3.83% non-public university type institutions. The study covered the period of 4-31 May 2020¹.

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The research conducted in academic centres in Poland was based on the method of diagnostic survey, the tool of which was a questionnaire survey addressed to all academic teachers and students in the home centres of the research group, consisting of 36 questions including a metric consisting of 7 questions. The aim of the research was to identify and diagnose the situation of providers of educational services, including teachers and students, which resulted from online learning. The aim of the research was to find out whether the current situation – distance learning – has a permanent impact on the didactics of higher education. 118 academic teachers (63 female and 55 male) and 688 students (592 female and 96 male) responded to the survey.

The analysis of the findings enables us to conclude that every third student (34%) declared that they use online education eagerly. Slightly less than half of the students (43%) were not able to decide whether they considered this form of education suitable for them, and every fourth student (23%) said that online education was not really suitable to acquire knowledge at the academic level. Opinions expressed by respondents might have depended on several more or less important factors. The first factor was the abrupt change in the organization of education, which none of the parties were prepared for and which they had not expected at the beginning of the academic year. For students, online education was a problem, since teachers used different tools, whereas students were required to install different software and switch between them from one class to another. Students highlighted that not everyone had sufficiently ‘powerful’ computers to use all the required software. Another factor was the student domicile. Some students moved back home to towns with limited access to the Internet. Sometimes, the transmission capacity was a problem rather than the access itself. Considering that other members of a household used the Internet simultaneously, data transfer capacity had to be split, which hampered efficient communication between the teacher and the student.

A clear majority of the surveyed students concluded that the attitude of teachers towards online teaching has changed due to the pandemic. Only 44 people stated that the situation will not change. Perhaps, students do not fully understand this form of sharing knowledge, or they do not have the possibility of using online tools that support the educational process. The majority of students declared that the form of teaching will change (330 people). This group of respondents may consist of people who had already used new technologies to access information and knowledge, prepare for classes and implement their assignments.

It is also worth emphasising that for the majority of them (67.11%), the preparation for online classes was not a problem and they did not have to make any special arrangements. One fifth of the surveyed (20.94%) had to prepare for several hours,

some students (11.36%) needed several days, and only a few (0.59%) were not able to participate in classes online.

As regards online teaching during the pandemic, challenges that students mentioned most frequently included:

- lack of direct contact with their teacher,
- no possibility to discuss topics in detail due to the shortage of time and direct face-to-face contact,
- no contact with peers, members of the same group or students at other levels to be able ask questions,
- technical issues, including limited transmission capacity, poor computer equipment, variety of software used by teachers, and different platforms to be installed on private computers, and
- a limited possibility to consult teachers to discuss issues and deepen ones knowledge.

The study also covered academic teachers. The findings show that for half of them (51.69%) online classes were suitable, whereas the minority (15.25 %) declared that they did not like this form of teaching, and every fourth teacher (23.88%) was not able to determine their attitude towards online teaching. Only some of the teachers (10.17%) refrained from responding to the question. Considering the above, we may conclude that nearly half of the teachers surveyed were not prepared for online teaching. This has been confirmed by answers to the question about self-education and knowledge of platforms used for online teaching. The majority of teachers (67.80%) declared that they did not know digital educational platforms at all, every fourth (22.03%) somewhat knew one platform, and only a few teachers (10.17%) were well familiar with at least one digital educational platform. As regards online teaching during the pandemic, challenges that academic teachers mentioned most frequently included:

- lack of direct contact with students and an inability to verify their knowledge,
- more time needed to prepare teaching materials, as well as to analyse and verify work assigned to students,
- general fatigue, headache and red eyes caused by too much time spent in front of a laptop,
- a shortage of possibilities to provide clarification, deeper insight and a thorough analysis of teaching content,
- no possibility for practical exercises with students and for solving tasks within a given subject, in particular tasks that require teamwork, and
- problems with the Internet connection or the operation of online platforms.

COVID-19 and university teaching in Italy: evaluations, reflections and actions in progress

In general, the resistance of the Italian university system to the COVID-19 impact was excellent: in two weeks, the universities completely reorganised their educational offer, making it available remotely. The Italian system has therefore shown its ability to face the dramatic situation that arose in the pandemic period, continuing to guarantee all of its services virtually.

The research conducted in Italian academic centres was based on the method of document analysis, including academic reports prepared within the framework of the Conference of Rectors of Italian Universities (CRUI 2020). The research involved 37,735 students from Universities in Italy. Additionally, research conducted by Federica Web Learning together with Ipsos was used in the paper – the research sample was 1200 students. A detailed analysis of the results is presented below.

According to the video *Vicini da lontano (Neighbours from afar)* made by the Rectors Conference of Italian Universities (CRUI 2020) based on its own data, the universities confirmed 94% of the lessons, ensuring 76,000 teaching sessions in a month, 70,000 exams, 27,000 degree sessions, involving 1.4 million students. Faced with the fear of the loss of direct contact with students, the teachers were surprised to find that distance learning ‘works all in all’ (Napoli 2020). Some universities carried out in-depth analyses of the level of satisfaction of teachers and students.

The University of Bologna (Redazione Unibo magazine 2020) carried out a survey a few weeks after the start of online teaching which 9,943 students responded to. «From the analysis of the data, decidedly high levels of satisfaction emerged with regard to learning (8.1 out of 10), interaction with teachers (7.8 out of 10), attention during teaching activities (7.1 out of 10) and the whole experience in online lessons (7.9 out of 10). Overall, 75% of the answers are placed in the score bands higher than or equal to 7 and 50% higher than or equal to 8» (Ivi). The same university carried out two further investigations which confirmed the good results of the first one. The problems reported by the students concern «the greater difficulties in interacting with classmates, the lack of an adequate internet connection [...] and – an often underestimated aspect – unsuitable domestic spaces to follow the lessons without being disturbed». In addition, the students of science courses suffered most from the inability to access laboratories. «If one out of two students is convinced that the university experience should be in person, the share of those who consider only remote teaching as preferable is not negligible and, above all, of those who consider the combination of face-to-face and online teaching as the best solution» (Ivi).

The University of Modena and Reggio Emilia (Unimore) – between 8 April and 2 May 2020 – also conducted a survey of 27,792 students, to which about 20 percent replied (Russo et al. 2020). Colombini, Piscitelli and Russo (2020), who participated in the research, write: «the great majority of students followed the online lessons with sufficient satisfaction, without major differences in terms of course year. Alongside satisfaction, however, there is a clearer feeling of load and fatigue. Spending many hours in front of a monitor makes taking notes and following the lessons more difficult and tiring, also due to the difficulty in staying focused. If a third of students have enthusiastically embraced remote teaching, two thirds complain of confusion, impatience, bewilderment and dissatisfaction. About four out of ten students are ‘lost’, dissatisfied with learning and confused about how to get out of this situation. Therefore, emergency teaching carried out remotely seems to require a clear framework that teachers should be asked to follow.

The survey conducted on a sample of 1,200 university students from all over Italy by Federica Web Learning (2020), of the University of Naples Federico II, together with Ipsos, a well-known company specializing in market analysis and research, showed that «2 out of 3 students promote (with reserve) the online teaching experience and, looking at the reopening in September, they ask to combine classroom lessons with online ones» (Ivi). Some results of the research are as follows:

- Asynchronous teaching – alone or in combination with synchronous teaching – has been met with particular consensus;
- Distance teaching will never be able to equate the value of the classroom for the 4/5 of students who answered the survey;
- The digital transformation of teaching is irreversible for 3/4 of the surveyed students;
- A hope of a return to the pre-emergency situation for 30% of university students; for the other 2/3 a mixed programme between in-person and digital lessons is desirable;
- A dysfunction in online lessons (for 9 out of 10 students) with regard to streaming due to connection difficulties. There are also problems related to the availability of space, the need to share a PC with others in the family, the purchase of new IT tools;
- Half of the students surveyed found difficulties due to the inexperience of teachers in the management of smart education;
- A self-awareness of an attention deficit during videoconferencing is valid for 35% of the students interviewed.

On the teacher’s side, the University of Turin and UNIRES (Italian Center for Research on Universities and Higher Education Systems) carried out a national survey (Ramella et al. 2020) involving a sample of 3,398 professors and researchers from state

universities. The survey asked its participants to evaluate the teaching experience during the emergency semester (March-May 2020). The research highlighted:

- Punctuality in starting lessons (72% of teachers managed to activate distance learning by 13 March);
- Observance of the total number of hours of lessons (86% of teachers spent the same number of hours, even recording an increase of 7%);
- Fulfillment of the teaching programme;
- An adaptability of the teaching strategies of teachers in distance teaching (67% changed both the contents and the structure of their teaching to a degree; 24%, on the other hand, kept them unchanged; 9% took the opportunity to considerably rethink their teaching);
- A prevalence of live streaming lessons (66% of teachers did live streaming lessons; 15% held both live and pre-recorded lessons; 12% recorded the lessons and then made them available; 52% made teaching materials available online with or without audio commentary; only 7%, however, provided only teaching materials or did other activities without streaming or recorded lessons);
- Constant attendance of students (for 53% of teachers, the students who attended the lessons remained unchanged; for 22% they even increased; in 20% of cases they decreased, while 5% of teachers did not know how to evaluate);
- Regularity in carrying out exams (61% of the teachers believe they have adequately assessed the students' preparation).

The sudden transition to distance learning only partially took the universities by surprise, many of which already had teaching centres capable of planning and delivering distance learning activities. The possibility of increasingly resorting to blended teaching which seems to be prefigured not only in the decisions of some Academic Senates, but also by the Decree of the President of the Council of Ministers of 7 August 2020, n° 198 (which invites universities to make blended teaching available for the new academic year in order to better modulate the overcrowding of university spaces) has urged and continues to urge numerous reflections. The position of Ferruccio Resta, the President of the Rectors' Conference of Italian Universities (CRUI), is to start classroom teaching again, since the university involves not only professional but also personal development, where the interaction is not only with the teacher but also among the students. It is therefore essential «to reason» on an «intelligent» and educationally valid *blended* teaching, in which, maybe, the purely content-related parts of the teaching, those that are repeatable, could be made available remotely, even in an asynchronous mode, provided that the time «spared» may be dedicated to the enhancement of the interactive dimension of teaching, which would take place mainly in person.

The position of openness to *blended* teaching is not shared by those who fear that this is a stage towards «the university of platforms» (Pinto 2020): in other words, of a university that is increasingly becoming «an agency for purchasing services and contents and which is therefore regulated and defined not by educational, cultural and scientific needs, but by those of success in the global knowledge market» (Basso et al. 2020). Such a transition would open real dystopian scenarios (De Nicolao 2020): the university, becoming a de facto «global education industry», would function in an increasingly automated, standardised and depersonalised way. By making use of Learning Management Systems, able to guarantee a considerable amount of *learning analytics* (access to software, library loans, attendance, assignment, etc.), higher education systems would be able not only to monitor students, but even to analyse their «learning outcomes», to «identify students at risk of failure» and even to «predict the academic success of the students themselves» (Pinto 2020). The University Minister Gaetano Manfredi – former president of the CRUI – however, invites us to be wary of those ideological positions that fear the risk of a totally remote university as the community dimension of the university remains central. In his opinion, it is necessary to recognise, however, that the «after» will not be the same as the «before»; but – he continues – the crisis due to the lockdown has helped to take note in a more conscious way of a whole series of issues that were already present in the university’s reflection before.

Summary

Polish and Italian educational experiences presented in the text have a lot in common in terms of reflections and tensions. Moreover, there are similar dimensions of recapitulation in resuming on-line academic education:

- Inclusion: the need for the university to address itself not only to students, but to broader segments of the population, making use of its educational presence in society through its own renewed presence in the network, but also by occupying more decisively the field of *lifelong learning*;
- The innovative action of teaching in the direction of greater interactivity – the teacher’s competences allow for the introduction of new solutions to the educational process, allowing to interact with available technologies that exist in the social environment;
- The awareness that the community dimension of the university must remain central.

Beyond the different sensitivities and positions, briefly mentioned here, one of the «merits» of the lockdown was to produce powerful feedback on the ways in which teachers conceive their teaching activity. Distance teaching has highlighted the weaknesses of face-to-face teaching, with respect to which we often have false representations (Selleri

2020). In particular, the remote experience has allowed us to question the actual role of the interaction between teachers and students on these key points:

- Does the social dimension have a simply motivating function or is facilitating learning structurally linked to interaction?
- What role can Socratic dialogue play in a society of advanced technological skills? More generally, how does the learning mind work?
- What relationship exists between cognition and emotion?

These points call for further reflection. In fact, the discoveries that come from the world of neuroscience - such as those of mirror neurons (Gallese 2018), GPS neurons (Moser and Moser 2014), the existence of brain wave «synchronization» phenomena in interactive contexts (Dikker et al. 2017), the existence of an interconnection between emotions and cognitions (Lucangeli 2019) – suggest a whole series of research paths on the search for the role of sociality and relationship in processes learning. Research in the field of broadly defined neurodidactics should form the basis of the educational process.

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