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THE IMPACT OF THE COVID-19 PANDEMIC ON INTERNATIONAL STUDENTS' PERCEPTION OF SERVICE QUALITY (CASE STUDY OF THE UNIVERSITY OF SPLIT)

ABSTRACT

Purpose: Development opportunities of higher education institutions (HEI) arising from international activities are constantly evolving, increasing at the same time their complexity. Consequently, numerous activities have been created to connect different higher education institutions across Europe, where the biggest challenge of internationalisation today is the European Universities Initiative. In that context, it is important to measure whether the European Union initiative created better resilience to the COVID-19 pandemic.

Methodology: Empirical analysis was conducted that included international students who studied at UNIST for one semester during the pandemic. The following descriptive statistics methods were used for data analysis: percentages, mean, frequency distribution, the standard deviation correlation method, as well as the independent-samples t-test and the correlation method.

Results: The results show that from the perspective of international students, there is a positive relationship between perceived service quality and internationalisation during the COVID-19 pandemic period. A case study was presented on the internationalisation of the University of Split as one of the first universities that joined the European Universities Initiative.

Conclusion: Internationalisation is one of the keys to success if the perceived quality of higher education can be considered as a key to student satisfaction.

Keywords: European University, COVID-19 pandemic, perceived service quality, internationalisation, satisfaction of international students

1. Introduction

One of the biggest challenges facing educational institutions around the world is the internationalisation process, which is essential for every modern

higher education institution (HEI). In Europe, HEIs are strongly motivated to participate in various international projects and improve the quality of study conditions in order to be able to host foreign students and teachers and cooperate with other in-

international HEIs and organisations. A significant number of students, teaching and non-teaching staff participate in mobility programmes and their number is constantly increasing. According to the Erasmus+ Annual Report (2018), Erasmus+ funded nearly 470,000 higher education student and staff mobilities in Europe and beyond in the 2017/2018 academic year. Di Pietro (2020) noted that the new Erasmus programme (European Region Action Scheme for the Mobility of University Students), Erasmus+, had a budget of €14.7 billion for the 2014-2020 Erasmus implementation period, i.e. a 40% increase compared to the previous planning period. These initiatives have had an impact on HEIs and have accelerated the process of opening up towards the international education market. De Wit (1998) argues that the driving force of European activities for cooperation and exchange in the fields of research, technology and education were programmes for research and development, such as COMETT and ERASMUS.

According to Qiang (2003), there are numerous reasons why internationalisation is becoming an integral part of the development of the higher education sector. The academic and professional background must meet the needs of the globalised world, which employs graduates. In order to better resolve the challenges and all the consequences of increasing internationalisation, HEIs are striving for a thorough understanding of the concept of internationalisation. The goal is to ascertain the benefits arising from this process, without compromising the quality level of HEIs. Internationalisation should be a tool that enhances the quality of higher education. Thus, a tendency to the quality of HEIs and the challenges of internationalisation are two constructs of the 21st century. Following the aforementioned and the strong intention to support international networking of HEIs, the mission developed a new programme called the European Universities Initiative, which started in 2019. This project, presented as the highest level of internationalisation efforts in higher education, had a budget of nearly €85 million.

The University of Split has declared internationalisation as one of the fundamental principles of its development strategy and decided to join the European Universities project. Together with five other universities – the University of Cádiz (Spain), the University of Western Brittany (France), the University of Kiel (Germany), the University of Gdańsk

(Poland) and the University of Malta (Malta) – it formed one of the first 17 alliances selected for funding from 54 project applications. In the current research, the University of Split is described as part of the European University of the Seas, where the first year of the implementation of project activities was marked by the COVID-19 pandemic and the lockdown phenomenon. Therefore, although this is the case study of the University of Split, the findings of this study could serve as an indirect indicator of the negative impact of COVID-19 on the mobility within the European Universities Alliance. Given that the main actor of the internationalisation process are students themselves, it is crucial to identify the main understanding they have when it comes to mobility, especially in the COVID-19 pandemic period. The research was conducted at the very beginning of the pandemic, so it is important to keep in mind the implementation period. It is equally important to understand that a small body of literature was available then, as it is today, on the impact of the pandemic on student mobility.

1.1 Theoretical and conceptual background

To conduct an in-depth analysis of the construct of internationalisation in higher education, it is important to understand numerous rationales for fostering internationalisation of higher education. Although the concept evolved in the 1980s, internationalisation of higher education is a new theory of the 21st century (De Wit, 2002). According to De Wit (1998), internationalisation represents the re-birth of the medieval university, in a context where economy, knowledge and society are interwoven. Taking into account different stakeholders in higher education (government, private sector, and education sector), De Wit (1998) recognises four kinds of rationales for internationalisation: academic, social/cultural, political, and economic. The two most common concepts that characterise the 21st century higher education system are internationalisation and globalisation. Internationalisation refers to all actions, policies, and practices taken by various academic staff (individuals) and systems, i.e. institutions, to deal with the global academic environment. The motivations for internationalisation include commercial advantage, knowledge and language acquisition, enhancing the curriculum with international content, and many others (Altbach & Knight, 2007). Globalisation is the context of economic, societal and political forces pushing 21st

century higher education toward greater international involvement (Altbach & Knight, 2007). Thus, internationalisation is changing the world of higher education, and globalisation is changing the world of internationalisation (Knight, 2004). According to Uralov (2020), one of the most important strategies for the development of higher education is internationalisation. In addition, it has become a main factor in the development of the national economy and mechanisms, and a tool for promoting cultural diversity and the national education system. Maringe and Sing (2014) assert that globalisation led to enhanced internationalisation of higher education.

A different point of view is offered by Knight (2004), who analyses internationalisation as a process that takes place at different levels: national, sectoral and institutional, all of which aiming to integrate an international, intercultural, or global dimension into the purpose, functions, or the delivery of post-secondary education. However, De Wit (1998) points out that the internationalisation of higher education is in most cases reduced to just a few activities, such as academic mobility, global or multicultural education, and study abroad, but it is much more than that. The range of services in the internationalisation of higher education has recently expanded. These include a growing international market for academic and scientific personnel, curriculum internationalisation, and also the commercialisation of international higher education, particularly, as Altbach and Knight (2007) note, the growing influence of the for-profit higher education sector.

In reviewing a wide range of publications of research and studies on the issues of internationalisation in higher education, Kehm and Teichler (2007) identified seven broad themes of higher education that support internationalisation. These include the perspective of the internationalisation of teaching, then learning, and research, institutional strategies of internationalisation, knowledge transfer, cooperation and competition, national policies, and last but not least, supranational policies with regard to the international dimension of higher education.

Ho and Foon (2012) reported that quality management is a measure of the performance standard referring to both products and services. It is extremely important to measure the perceived service quality of all stakeholders in higher education, as each has their own view of quality depending on their particular needs. Nevertheless, emphasis should be placed on measuring the service quality of higher education

perceived by students, as they are the primary customers and active stakeholders in the development of their education service quality. Yeo (2009) emphasises that the higher education sector must be based on quality management to remain competitive. It has been observed that due to the development of internationalisation and globalisation principles, there is stronger international competitiveness among HEIs (Yeo, 2009). The most commonly used instruments for measuring service quality are SERVQUAL, SERVPERF and HEDPERF scales.

Parasuraman et al. (1998) developed the SERVQUAL scale. The scale determines service quality by measuring the difference between perceived service quality and consumer expectations of service. In 1992, Cronin and Taylor developed the SERVPERF scale, based on the SERVQUAL scale, from which they eliminated the element of expectations and decided to measure service quality. Both scales measure quality through five dimensions, organised through 22 questions. The dimensions are tangibility, reliability, responsiveness, assurance, and empathy.

Abdullah (2006) developed a new scale called the HEDPERF scale, which is specialised to measure the perception of service quality from the perspective of students at HEIs at the international level. The HEDPERF questionnaire contains 41 statements about service quality in higher education, which are divided into dimensions explained by Dužević et al. (2015) as follows:

- 1) Non-academic aspects (this factor refers to the obligations of non-academic staff);
- 2) Academic aspects (this factor refers to the responsibilities of academics);
- 3) Reputation (this factor refers to the conveyance a professional image);
- 4) Access (this factor refers to approachability, ease of contact, availability and convenience);
- 5) Programme issues (this factor refers to the wide ranging and reputable academic programmes/specialisations with a flexible structure and syllabus);
- 6) Understanding (it includes items related to understanding the specific needs of students in terms of counselling and health services).

It is important to emphasise that the last dimension has been excluded over time as a separate quality dimension and its statements have been added to the existing dimension of access. According to

Oliver (2010), it is important to analyse perceived service quality because it is significantly related to student satisfaction, as the dimension of perceived service quality is used for measuring satisfaction as feedback information to the service provider.

Student satisfaction can be defined as a short-term attitude resulting from an evaluation of students' educational experience, services and facilities (Weerasinghe et al., 2017). Every HEI strives to create satisfied students. In this way, the HEI itself benefits from the satisfaction of its students. It becomes more attractive and builds a long-term positive image. This is especially important because it leads to long-term loyalty (Navarro et al., 2005). Creating satisfied students is not a simple process, as it is influenced by many internal and external factors, which may be beyond the control of the HEI. According to Mihanović et al. (2016), many authors have tried to analyse whether personal satisfaction is related to student satisfaction with the higher education institution, but no reliable relationships have been confirmed. Perceived service quality is closely related to student satisfaction. Some authors equate one with the other, and others state that positive perceptions of service quality lead to student satisfaction. According to Ammigan and Jones (2018), international student satisfaction data have been used as a channel to influence change on campus. They can also be seen as strengthening support services for this community, while Astin (1993) argues that student satisfaction is presented as the subjective experience of studying and perceived quality of educational services acquired while studying, where the dimensions of satisfaction and perceived service quality are intertwined.

Since, according to some authors, internationalisation, with its policies and procedures, has developed spontaneously without really taking care of ensuring quality processes (Van Damme, 2001), it is time to fill this gap. It is therefore necessary to change the intertwining of these two concepts based on scientific research. Moreover, it should be kept in mind that internationalisation in higher education was one of the most affected concepts during the COVID-19 virus pandemic. It is likely that it will recover this time, so this may be an opportunity for the future to create a new, international, humane higher education (Fukuyama, 2011). To understand how to move forward and what concepts to develop for the future, policymakers need to analyse how students felt during the pandemic.

2. Method and research questions

2.1 Method

Based on the presented theoretical foundations provided by previous research studies, hypotheses were made to be tested in this paper. Komotar (2018) states that the most important trends shaping the higher education area are internationalisation and quality assurance of higher education. Nonetheless, both concepts are still often treated as two separate fields of research in current policy discourses, although in the context of European higher education it is logical to consider them as a whole. In this context, the collected data shall serve as a basis for finding a correlation between these two constructs. In order to collect data, an online survey was conducted.

The collected data were analysed using the data management SPSS (Version 23) programme. The following descriptive statistics methods were used for data analysis: percentages, mean, frequency distribution, the standard deviation correlation method, as well as the independent-samples t-test and the correlation method. Due to the small sample, the Spearman coefficient was used in correlation analysis.

2.2 Research questions

The effort made by the European Union in relation to higher education institutions operating in the European Education Area is to achieve the highest possible degree of internationalisation. Bearing this in mind, the question arises as to whether higher education institutions that have a higher degree of internationalisation have a higher perceived level of quality. According to De Jager and Soontiens (2015), there is a relationship between the degree of internationalisation and the perceived level of quality. Therefore, the first H1 hypothesis is established to test a positive correlation between perceived service quality of international exchange students who spent a semester at the University of Split and internationalisation.

Hypothesis 1 (H1): *There is a positive correlation between service quality perceived by international exchange students and the degree of internationalisation (under pandemic conditions).*

Long et al. (2014) showed a correlation between perceived service quality and student satisfaction which is now being tested in the context of international students during the pandemic. There are numerous other studies (Athiyaman, 1997; Abu Hasan et al., 2008; Raghavan & Ganesh, 2015) that found a correlation between the perceived level of

quality and satisfaction, so the question arises as to whether this correlation can be confirmed with international students.

Hypothesis 2 (H2): *There is a positive correlation between service quality perceived by international exchange students and their satisfaction (under pandemic conditions).*

Just like the rest of Croatia and Europe, the University of Split was affected by the pandemic in mid-March 2020. Regular face-to-face classes were interrupted and switched to online for both domestic and international students. Some students stayed in Split and took courses delivered online by the University of Split, while some returned to their home countries.

Since we are talking about a specific point in time, the question arises as to how much the perceived level of quality of international students is related to their satisfaction with online study, since they were mostly studying online at that time. Based on the above, the following hypothesis is established to test the correlation between students' perceived service quality and satisfaction with online learning.

Hypothesis 3 (H3): *There is a positive correlation between international exchange students' perceived service quality and their satisfaction with online study (under pandemic conditions).*

Internationalisation is an important phenomenon that higher education institutions faced in the second half of the 20th century. In addition, the significance of increasing the degree of internationalisation lies in the numerous benefits that students derive from increasing the degree of internationalisation of higher education (Qiang, 2003). Therefore, based on the above, the question arises as to whether international student satisfaction with their study increases with the increase of internationalisation, which is especially true for the conditions of the pandemic. Since previous research showed that one of the main benefits of internationalisation is the interaction between domestic and international students (Jones, 2010) and that internationalisation increases student motivation (Kuznetsov & Kuznetsova, 2011), the question arose whether there is a correlation between internationalisation and international student satisfaction. Internationalisation means a greater presence of various international elements in higher education institutions (HEI), the assumption is: the higher the degree of internationalisation at a HEI, the better students feel and the more satisfied they are with their studies. H4 hypothesis is established based on the aforementioned.

Hypothesis 4 (H4): *There is a positive correlation between the perceived degree of internationalisation and the satisfaction of international students under pandemic conditions.*

3. Empirical data

3.1 Research instrument

In this research, a questionnaire was created consisting of three main parts. An introductory part (basic demographic questions and questions about constituent units of the University of Split where students studied) and the main part which assessed a degree of internationalisation of the University of Split. The final part, which measured the impact of the COVID-19 pandemic on studying, i.e. the time spent physically at the University of Split, the time spent in online classes, the level of satisfaction with studying at the University of Split and the level of satisfaction with online classes.

Perceived service quality was measured using the HEdPERF scale (Abdullah, 2006), which consists of 6 variables with 41 items. A degree of internationalisation was measured using the Lasagabaster et al. (2013) scale. The segment used to measure the degree of internationalisation consisted of 10 questions adapted to the context of the University of Split. The scale included questions on various elements of internationalisation in higher education: the level of English proficiency of various stakeholders, the number of international students, different nationalities studying at the University of Split, international university rankings, promotional activities organised by the University aimed at attracting international students, etc.

An online questionnaire was created and was available through the *Limesurvey* platform from 23 June 2020 to 24 July 2020. The opinion of the international students was evaluated by using the Likert scale with values from 1 to 5, where 1 - strongly disagree, 2 - disagree, 3 - undecided, 4 - agree, 5 - strongly agree.

When measuring the level of satisfaction, students were offered a scale with five levels (from very satisfied to very dissatisfied).

For the purpose of measuring the time spent at the University of Split, students were offered a scale with several dimensions that measured the time spent (less than one month, one to two months, two to three months, three to four months, more than four months).

3.2 Sample

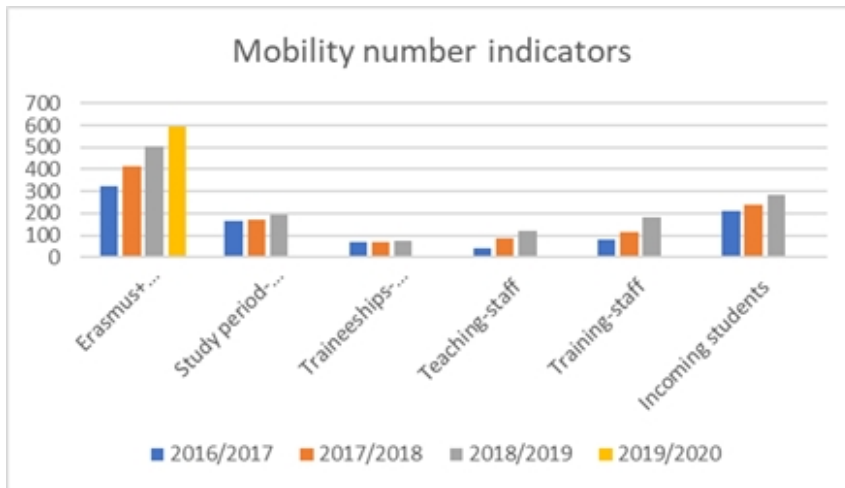
The sample consisted of international exchange students studying at the University of Split in the summer semester of 2020. This is the semester that coincided with the COVID-19 pandemic. During that period, a total of 136 international exchange students at the University of Split were invited to take part in the online survey via email. The questionnaire was accessed by 133 students and 60 students completed the survey. Only complete responses are analysed. The sample is considered sufficient as it represents almost 50% of the target population, of whom 21 were male and 39 were female students. The respondents were international exchange students spending the summer semester of the 2019/2020 academic year at the University of Split.

Although the limitation in this study is a small sample, as Bojanić (1991) states, it is more important for a sample to be representative than to be large. Since 97% of students who studied at the University of Split during the quarantine period caused by the spread of the COVID-19 virus participated in this study, the sample is considered representative. However, only fully completed responses (44% of them) were analysed in more detail in the research study.

3.3 The degree of internationalisation at the University of Split

In order to assess the degree of internationalisation of the University of Split, it is necessary to present data on the degree of internationalisation in the form of a case study. The University of Split officially started its internationalisation process shortly after 2000, when the institution began to participate in international projects such as Tempus. The possibility of sending students abroad was opened in 2009, when the University of Split joined the Erasmus mobility scheme. The possibility to host first international exchange students was opened in 2011. Since then, the University of Split has been actively participating in Erasmus+, Ceepus, Erasmus Mundus, bilateral cooperation and other smaller exchange programmes. The first study programme in English was verified in 2011. The University of Split supports a continued increase in mobility and signed inter-institutional agreements, as can be seen in Figure 1, which shows the growth of the most important mobility indicators in recent years.

Figure 1 Mobility indicators per year



Source: Authors' analysis

This is in line with the objectives of the European University of the Seas project, which aims for a 5% increase in student and staff mobility. A great step forward towards internationalisation processes was made in late 2019 and early 2020, when the University of Split became a member of the European University of the Seas. The impact of the COVID-19 pandemic on the mobility of the Uni-

versity of Split is still difficult to measure, but it is possible to observe the ratio between planned (approved) mobilities and realised mobilities during the last academic years (one that was not affected and one that was affected by COVID 19). Most of the remaining 1/3 were postponed to the summer semester and a small part of them were cancelled.

4. Research results and discussion

The research initially focused on the constituent units of the University of Split where the students were enrolled. Of the total number of respondents (N=60), the largest number of students was in the third year of study (48.33%), then the fourth (26.67%), fifth (11.67%) and second (11.67%). Only one student reported being in the first year of study.

When analysing the responses related to perceived service quality, it is noticeable that the highest average values were assigned to the academic di-

mension, followed by the dimension related to the programme, reputation and finally non-academic dimension. The lowest value was given to the dimension of approach. The skewness and kurtosis test were applied in the research to measure the degree of distortion and the sharpness of the curve. According to Hair et al. (2017), the distribution of results is normal if it is between +1 and -1. When analysing the values of skewness and kurtosis, it is noticeable that the distribution is normal as all values are between +1 and -1.

Table 1 Descriptive analysis of the dimensions of perceived service quality

	Min	Max	Mean	Std. Deviation	Skewness	Kurtosis
Access	2.36	5.00	3.92	0.54	-0.20	-0.01
Non-academic	2.73	5.00	4.02	0.53	0.12	-0.28
Academic	2.22	5.00	4.08	0.63	-0.29	0.04
Programme	2.00	5.00	4.04	0.61	-0.66	0.92
Reputation	2.00	5.00	4.02	0.62	-0.53	0.84

Source: Authors' analysis

An analysis of the dimension of the degree of internationalisation, observed through various statements, shows that the highest average values in responses were assigned to the statement about the use of the English language as the main

means of communication tool in the research. The other statement related to internationalisation, which has a high mean value is "There are many different nationalities studying at the University".

Table 2 Descriptive analysis of internationalisation

	Mean	Std. Deviation	Kurtosis	Skewness
There are many English language classes.	4.13	0.99	0.010	-1.01
A lot of English language is used in the research.	4.38	0.66	-0.614	-0.62
The University promotes several foreign languages.	3.63	0.90	-0.74	-0.05
The University has many international students who complete all or part of their studies at our University.	4.12	0.76	-0.40	-0.44
There are many different nationalities studying at the University.	4.32	0.79	-0.17	-0.85
The University has a high international ranking among universities.	3.60	0.90	-0.78	0.04
All University bodies are willing to use English.	4.20	0.75	-0.18	-0.59
All administrative and technical support staff speak Croatian and at least one foreign language.	3.95	0.74	-1.17	0.08
The University promotes itself in many ways to attract international students (e.g. a website, student recruitment events, printed advertisements, etc.).	3.75	0.95	-0.89	-0.20
Students must be proficient in English by the end of their studies.	4.15	0.75	-0.03	-0.50

Source: Authors' analysis

An analysis of the degree of satisfaction with studying at the University of Split shows that most international exchange students are very satisfied or just satisfied with their studies at the University of Split (80%). An analysis of the time spent physically at the University of Split during the pandemic shows

that the highest percentage of respondents (70%) spent less than one month in in-person classes. In terms of time spent attending online classes and the level of satisfaction with online study, it is observed that the highest percentage of respondents (almost half, i.e. 48.33%) studied online.

Table 3 Analysis of the time spent studying online at UNIST during the pandemic

Time spent studying online at UNIST during the pandemic	Percentage of respondents
Less than a month	8.3%
Between one and two months	8.3%
Between two and three months	28.33%
Between three and four months	48.33%
More than four months	6.67%

Source: Authors' analysis

Regarding satisfaction with online classes, the highest percentage of respondents were satisfied with their online learning at the University of Split (46.67%), 31.67% were more or less satisfied, and only 6.67% were either not satisfied or not satisfied at all.

One of the objectives of this research was to assess the impact of the COVID-19 pandemic on the level of satisfaction during the pandemic with respect to the time spent at the University of Split. In order to measure the impact of the COVID-19 pandemic, two groups of respondents were formed to test whether there was a difference in their responses depending on the amount of time spent at

the University of Split during the pandemic, using the independent-samples t-test.

The first group of respondents consisted of students who spent up to one month at the University of Split (the lockdown started in mid-March 2020 and the semester started in early March 2020), and the other group were students who stayed at the University of Split during the lockdown (for a month or an entire semester). The results showed no statistically significant difference between the responses of students who physically spent up to one month at the University of Split and students who physically spent their entire study period in Split (more than one month as from March 2020).

Table 4 Analysis of the time spent at UNIST and student satisfaction

	Time spent in Split	N	Mean	Std. Deviation	Std. Error Mean
Overall satisfaction	Up to one month	42	4.14	0.68	0.11
	More than one month	18	3.83	0.99	0.23
Satisfaction with online teaching	Up to one month	41	3.73	0.81	0.13
	More than one month	18	3.50	0.92	0.217

Source: Authors' analysis

4.1 Hypothesis testing

In order to test H1 hypothesis, a correlation was made between perceived service quality and the de-

gree of internationalisation. By using the Spearman coefficient, the research showed a statistically significant positive correlation, indicating the value 0.533.

Table 5 Correlation test (quality and internationalisation)

Construct	Quality	Internationalisation
Quality	1	0.53**
Internationalisation	0.53**	1

** Correlation is significant at the 0.01 level (2-tailed)

Source: Authors' analysis

In order to test H2 hypothesis, a correlation test was made between service quality perceived by international exchange students and their satisfaction. In order to test H2 hypothesis, an analysis was con-

ducted, which indicated that H2 hypothesis could be accepted, as it showed a statistically significant positive correlation between these two constructs (0.56**).

Table 6 Correlation test (quality and satisfaction)

Construct	Quality	Overall satisfaction
Quality	1	0.56**
Overall satisfaction	0.56**	1

** Correlation is significant at the 0.01 level (2-tailed)

Source: Authors' analysis

A correlation method was used to test hypothesis 3. Based on the research results, we can conclude that there is a positive correlation between the level

of perceived service quality and satisfaction with online studying that replaced traditional in-person classes during the pandemic period.

Table 7 Correlation test (quality and satisfaction with online studying)

Construct	Quality	Satisfaction with online studying
Quality	1	0.42**
Satisfaction with online studying	0.42**	1

** Correlation is significant at the 0.01 level (2-tailed)

Source: Authors' analysis

Hypothesis 4 was tested by means of a correlation test using the Spearman coefficient. According to the test results, it can be seen that there is a positive

correlation between internationalisation and satisfaction of international exchange students in the pandemic period (0.43).

Table 8 Correlation test (internationalisation and satisfaction)

Construct	Internationalisation	Overall satisfaction
Internationalisation	1	0.43**
Overall satisfaction	0.43**	1

** Correlation is significant at the 0.01 level (2-tailed)

Source: Authors' analysis

5. Discussion

Based on previous research, four hypotheses were established to analyse the relationship between quality and internationalisation, as well as their connection with satisfaction. To collect data, an online survey was conducted among international exchange students. The survey revealed that the quality perceived by the international students was positively correlated with the internationalisation processes. In addition, the dimension of quality related to academic issues, followed by programme issues, was rated the highest average scores by the students. It is important to mention that the students assigned low average scores to the dimension related to access. These results differ from those obtained by Dužević et al. (2015) in their research, which showed that the dimension of access was the most important for domestic students, and the dimension of programme had the weakest evaluation results, which is in line with Lazibat et al. (2013). They also confirmed that the academic dimension and the programme related dimension had the best and the worst evaluation results, respectively. The reason for these differences from previous research could be the impact of the COVID-19 pandemic during the study. The difference could be that different dimensions of quality are important for domestic or international students.

Regarding the internationalisation processes at the University of Split, students gave the highest average scores for the statements related to the level of English language use in research and the percentage of international students in each unit of the University of Split. It is interesting to note that the lowest degree of internationalisation assessed by international exchange students is a particle that implies that the University of Split has a high rank among international universities.

The relationship between internationalisation and quality is clear and irrefutable, since internationalisation is one of the elements evaluated in the accreditation of higher education institutions (Wit & Knight, 1999). In this study, it was interesting to test whether this link exists in the eyes of international exchange students, especially in the context of the period that was affected by the pandemic. The second hypothesis was established to examine whether there is a positive correlation between the perceived level of service quality and the perception of the degree of internationalisation by the

international exchange students. The results of the research showed that these two constructs are positively related, i.e., the higher the degree of internationalisation of a higher education, the higher the perceived quality level, which is certainly an important contribution to the theory that studies all factors related to the perceived quality level. As the degree of internationalisation of the higher education institution increases, the perceived quality level of the students also increases. It is important to mention that in this case, the perspective of international students was studied, i.e. those who offer a truly realistic perspective of the degree of internationalisation of a HEI because they have experienced most elements of internationalisation.

Numerous other authors have written about the relationship between quality and satisfaction (Razinkina et al., 2018; Teeroovengadum et al., 2019). Their positive relationship was confirmed in this case. For this reason, a high perceived level of quality is often equated with satisfaction (Mavondo et al., 2004). The contribution in this paper is that here this relationship was retested from the perspective of international exchange students.

Since a large number of students were forced to switch to the system of online education during the pandemic period, the third hypothesis was established that specifically observed the relationship between perceived quality levels and satisfaction with online classes (not the level of overall satisfaction, but only with the online segment). The results showed that there was no significant discrepancy between a specific segment of satisfaction with online classes compared to overall satisfaction.

The final hypothesis tested the relationship between internationalisation and satisfaction of international exchange students. The research showed that there is a positive relationship between these two constructs, which indicates that it is in the interest of every higher education institution to expand the degree of internationalisation to increase satisfaction of international students. The findings are in line with previous research, since internationalisation is shown to be one of the most important factors influencing international students when choosing a HEI (Roga et al., 2015). This relationship was observed during the pandemic period, so it is expected that it should be even greater in "normal" times.

6. Conclusion

This paper is a scientific contribution to a better understanding of the constructs of quality and internationalisation from the perspective of international students within the framework of the European Universities Alliance. The purpose of this paper was to investigate service quality perceived by international students during their studies at the University of Split during the COVID-19 pandemic, as well as the construct of internationalisation from the perspective of international exchange students.

In terms of application, it represents a contribution to a better understanding of the views and perspectives of international students. Internationalisation is a must for any HEI operating in the modern education market. Therefore, it is undoubtedly important for HEI management structures to better understand the perspectives of international students. It is important to understand the level of service quality perceived by them in order to improve the quality dimensions they consider important, as they are one of the main target groups of internationalisation.

This research was conducted on the case study of the University of Split, which is one of the first universities in Croatia that joined the European Universities Initiative. Since this initiative represents the highest degree of internationalisation, it was interesting to investigate the perceived level of quality and its relationship with the degree of internationalisation during the COVID-19 pandemic. Although the COVID-19 pandemic is a situation that could not have been predicted in any way, its long-term impact on internationalisation is inevitable. Some of the aspects are related to residence permits,

the personal economy of students who decided to spend part of their study at another higher education institution abroad (Slotte & Wikström-Grotell, 2020), and some others to anxiety and stress (UN News, 2020). But surely the implications are even greater and more significant, and we will feel them in the time ahead. Therefore, it is undoubtedly important to work on the continuous development of resilience of higher education institutions to better prepare them for unforeseen situations that may face higher education institutions in the future. This paper presents the impact of the pandemic on the University of Split as one of the universities that has a strong desire to increase internationalisation (as is evidenced by its participation in the Alliance of European Universities). Based on the research results, it can be noticed that internationalisation is related to the perceived level of quality, overall satisfaction and satisfaction with online study, but for fully objective results, the research needs to be repeated in the post-pandemic period.

One of the limitations of this research study is that not all international students responded, which resulted in a small sample. In addition, it is important to mention that service quality and internationalisation perceived by international students are related to the period of study during the COVID-19 pandemic (which was an exceptional situation), so for a long-term perception of students it would be necessary to repeat the research and compare the results. Finally, it would be recommended to include all partner universities of the European University of the Seas alliance, in order to be able to measure the overall impact of the pandemic on mobility, which is one of the main objectives of the whole alliance.

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