

Teachers' Attitudes Towards the Quality and Prospects of Architectural Education in the Republic of Serbia

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Abstract: This study explores teachers' attitudes toward the quality and future prospects of architectural education in the Republic of Serbia. Based on a survey conducted among 82 educators from nine higher education institutions, the research examines the influence of five key predictors: student motivation, frequency of communication with students, perceived student appreciation, typical student behaviour, and interfaculty collaboration. Descriptive statistics and multiple regression analyses were applied to determine the most significant predictors of teachers' perceptions. The results show that student motivation and teachers' sense of being valued significantly contribute to positive perceptions of teaching quality. In contrast, typical student behaviour and interfaculty collaboration did not have a statistically significant impact. Regarding future perspectives, student motivation again emerged as the strongest predictor, while more frequent communication with students and observed student insecurity negatively affected outlooks on educational development. The findings highlight the complexity of teaching architectural design and underline the importance of fostering student engagement, strengthening mentorship, and adapting instructional strategies. This research contributes to a deeper understanding of the dynamics shaping architectural education and offers recommendations for enhancing teaching practices both in local and global contexts.

Keywords: architectural education; design studio teaching; educational perspectives; teacher attitudes; teaching quality

1 INTRODUCTION

The quality of teaching and the perspectives of education are key elements in assessing the effectiveness of higher education institutions. In architectural education, where theoretical and practical learning aspects are intensively intertwined, understanding the factors influencing teachers' perception of teaching quality and the future of the educational process is particularly important. While numerous studies have analysed students' perceptions of teaching quality, less is known about how teachers perceive the quality and perspectives of teaching and the factors that shape these perceptions.

This research examines the role of student motivation, frequency of communication with students, teachers' self-assessment of their perceived value, students' typical behaviour, and collaboration with other faculties in shaping teachers' perceptions. The study was conducted on a sample of teachers from higher education institutions specializing in architecture and related disciplines in Serbia. The collected data were analysed using descriptive statistics, the Kolmogorov-Smirnov normality test, and multiple regression analysis to identify key predictors of teaching quality perception and educational perspectives.

The paper is structured as follows: the first section presents the theoretical framework with a review of relevant literature, followed by a description of the research methodology. The results of the analysis are presented in the fourth section, while the discussion and conclusions are provided in the final part of the paper.

2 THEORETICAL FRAMEWORK

Numerous studies explore various aspects of architectural education, analysing teaching methods, curricula, and the perceptions of both students and teachers regarding the effectiveness of the educational process. These studies often consider the local context, examining how social, economic, and cultural factors shape the educational system and influence its success [1-6].

In the broader discourse on architectural education, some of the most prominent educational theorists have called for a redefinition of pedagogical models. Salama [7], for example, critiques traditional, hierarchical studio formats and promotes a transformative pedagogy focused on student engagement, reflection, and contextual awareness. He positions the teacher as a facilitator and highlights the importance of "responsive learning environments" that adapt to interdisciplinary knowledge, digital innovation, and societal change [8]. These approaches aim to align educational strategies with shifting cultural and professional conditions.

Expanding this view, Till [9] challenges the idea of architectural knowledge as fixed and autonomous. In *Architecture Depends*, he presents architecture - and its education - as fundamentally relational, shaped by social, political, and material contexts. He argues for pedagogies that embrace uncertainty and complexity, fostering adaptability, critical thinking, and ethical awareness rather than merely technical competence.

Colomina et al. [10] add to this critical discourse by examining radical pedagogical practices that emerged in response to broader cultural and technological transformations. In a seminal book *Radical Pedagogies*, she explores how experimental teaching methods reimagined architectural education as a space of critical inquiry and media awareness. Her work underscores the need for education to reflect and respond to contemporary shifts, including digitalization, collective experience, and changing social values.

These international perspectives provide valuable insights into the evolving nature of architectural pedagogy and the need for adaptive, socially responsive teaching models. While such approaches have been widely explored in international discourse, the extent to which they have been acknowledged or applied in national contexts varies significantly. In Serbia, for instance, research on architectural education has thus far primarily addressed the integration of sustainability principles and the development of socially responsible teaching strategies.

The emphasis has often been on the role of architectural education in shaping students' awareness of social and environmental challenges, as well as on methods for improving teaching strategies in line with modern professional demands [11-15]. Given that, to the authors' knowledge, no study has directly examined the quality of architectural education in Serbia, this research has significant potential. Its primary goal is to identify the key factors shaping teachers' perceptions of teaching quality and future educational perspectives in architectural design and to propose strategies for their improvement.

According to Arcaro, "quality is the most crucial aspect of education, and its improvement depends precisely on the teachers who shape the educational system today" [16]. In other words, teaching quality and the educational process are not static concepts; rather, they continuously evolve through innovations and adaptations to meet the modern needs of society and the labour market.

On the other hand, Kurt defines educational quality as a combination of performance and experience gained in the educational process while taking into account acceptable costs and resource efficiency. This approach involves not only the transmission of theoretical and practical knowledge but also the optimization of the teaching process to achieve the best possible results through efficient use of resources [17]. The same author introduces the Total Quality Management (TQM) approach as a framework for analysing quality factors. This approach is increasingly applied in education, as it enables a systematic evaluation of teaching quality, continuous improvement of teaching methods, and better alignment of education with labour market demands. In the context of architectural education, where interdisciplinarity, creativity, and practical work are key elements, this model can enhance understanding and optimization of teaching methods.

The TQM approach includes the following principles: 1) Student-centred focus - adapting teaching methods to students' needs and engagement levels, 2) Involvement of all stakeholders - collaboration between teachers, students, industry, and the academic community, 3) Continuous measurement - evaluating progress and determining optimal solutions, 4) Commitment to quality and productivity, and 5) Ongoing improvement - modifying curricula and introducing innovative teaching methods [17]. Based on these factors, the key predictors in the regression analysis used in this study to assess the quality and perspectives of architectural design education in Serbia have been defined. A more detailed discussion of these predictors will follow later in the paper.

One of the key factors in educational quality within the TQM approach is the role of teachers, who not only transmit knowledge but also actively shape interactions with students, influencing their motivation and professional development. Research indicates that teachers' characteristics, including their professional experience, mentoring approach, and ability to adapt to different learning styles, significantly affect perceptions of teaching quality [18]. A positive teacher-student relationship contributes to student motivation and academic success, while teachers' recognized effort and dedication are often associated with higher levels of student engagement [12]. Furthermore, studies suggest that key turning points in teacher-student relationships occur

through interactions in studio environments, consultations, and feedback sessions.

In this context, mentorship and open communication can significantly enhance academic outcomes and students' professional preparedness [6, 14]. In architectural education, where practical work and the creative process are at the core of teaching methods, the quality of teacher-student relationships is especially important, as it shapes not only the educational but also the professional identity of future architects. Understanding these factors is crucial for improving the quality of architectural education in Serbia and elsewhere. The following research examines how these principles are reflected in teaching practices and how they can be applied to enhance perceptions of educational quality in architectural design.

The distinction between teaching quality and educational perspectives plays a crucial role in understanding the framework of this analysis. Teaching quality refers to the current state of the teaching process, encompassing perceptions of its methodological, organizational, and pedagogical aspects. Educational perspectives, on the other hand, relate to future trends and the potential for educational development. In other words, quality represents an evaluation of the existing education system based on current experiences and data, while perspectives reflect expectations and potential directions for future improvements.

3 RESEARCH METODOLOGY

This study aims to examine teachers' attitudes regarding the quality and perspectives of architectural education in the Republic of Serbia, using a survey as the primary data collection instrument. The survey focused on various aspects of learning and teaching architectural design, consisting of 48 questions divided into six thematic sections. This paper specifically analyses the segment of the survey related to teacher-student interactions, as well as the current status and future perspectives of architectural education in Serbia. The study seeks to answer the following research question: Can teachers' attitudes toward the quality and perspectives of architectural design in the Republic of Serbia be predicted based on the teacher-student relationship? To address this question, two hypotheses were formulated:

H1: Teachers' perception of teaching quality at their institution can be statistically predicted based on communication with students, perceived student motivation, student appreciation of teachers, typical student behaviour, and collaboration with other faculties.

H2: Teachers' perspectives on the future of architectural design education in higher education institutions in Serbia can be statistically predicted based on communication with students, perceived student motivation, student appreciation of teachers, typical student behaviour, and collaboration with other faculties.

The formulation of these hypotheses gains further relevance when considered within the broader framework of contemporary education. The relationship between teachers and students today is shaped not only by institutional norms, but also by wider transformations in society - ranging from the digitalization of everyday life to evolving expectations around autonomy, flexibility, and

the role of education in addressing global challenges. Online and hybrid forms of learning, new patterns of communication, and shifting values in the academic and professional spheres have significantly influenced how teaching and learning are experienced. These factors underscore the importance of understanding how teachers perceive their role, the quality of education they deliver, and the future direction of their professional practice - particularly in fields such as architectural design, where direct interaction and iterative feedback remain essential. Accordingly, the present study is grounded not only in local pedagogical conditions but also in these broader developments, which further justify the necessity and timeliness of the research.

The survey questionnaire was created using the Google Forms platform and distributed via email between October and December 2023. Before conducting the study, the questionnaire was pilot-tested with five representatives of the target population to ensure clarity of the questions and instrument reliability. The target population consisted of 138 teachers and teaching assistants from nine higher education institutions in Serbia that include architectural design courses in their curricula. Participants were informed about the purpose and objectives of the study, and their anonymity and data confidentiality were fully ensured following the ethical standards of scientific research. Following the initial distribution and two reminder emails, a total of 82 teachers and assistants completed the questionnaire, resulting in a response rate of 59,42%. Response rates across institutions ranged from 45,83% to 100%, with an average of 66,67%, indicating that the questionnaire fairly represented teachers and assistants from all nine institutions offering architectural design courses.

4 RESULTS

4.1 Descriptive Statistics and Normality Testing

Before conducting regression analyses, descriptive statistics were applied to summarize the data and examine the normality of variable distribution. For the regression analysis, the following criteria variables were defined: *C1* - Teaching quality, *C2* - Perspectives on learning and teaching architectural design within the institution where the respondent is employed.

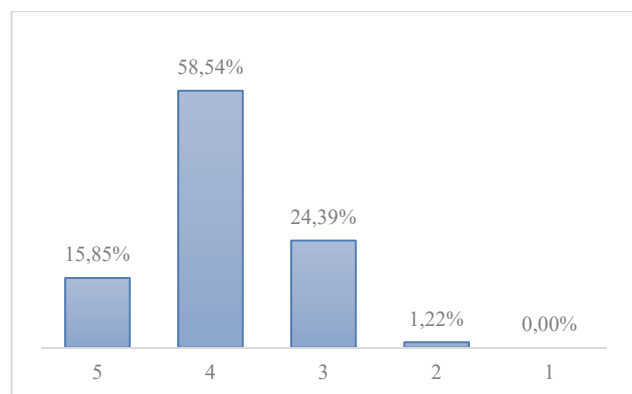


Figure 1 Perceived quality of architectural design teaching at the respondents' institution

Respondents rated teaching quality on a scale from 1 to 5, with an average score of 3,89 ($SD = 0,57$). As illustrated in Fig. 1, most respondents ($n = 48$; 58,54%) rated the teaching quality at their higher education institution with a score of 4. Nearly one-quarter of respondents ($n = 20$; 24,39%) gave a score of 3, while 13 respondents (15,85%) assigned the highest rating of 5. Only one respondent (1,22%) rated it 2, and no respondents gave a rating of 1.

Regarding perspectives on learning and teaching architectural design at higher education institutions in Serbia (Fig. 2), after scaling the responses, the average score was 2,57 ($SD = 0,67$). As shown in the graph: 62,2% of respondents ($n = 51$) rated the perspectives as positive, 34,15% ($n = 28$) had a neutral stance, and 3,66% ($n = 3$) perceived the perspectives as negative.

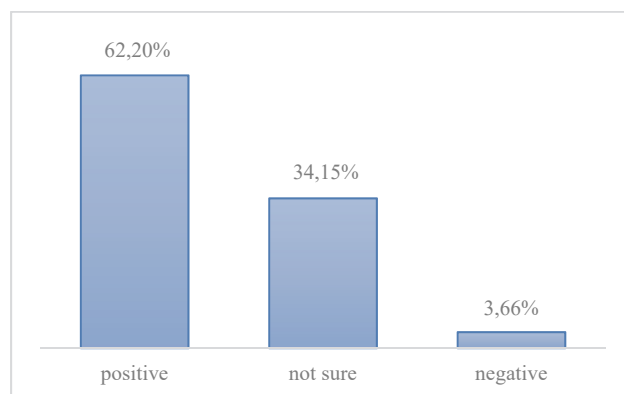


Figure 2 Perceived perspectives of architectural education at higher education institutions in the Republic of Serbia

The predictors were defined as follows: *P1* - Teachers' assessment of students' motivation for working on architectural design courses, *P2* - Frequency of communication with students outside of regular class hours, *P3* - Frequency of collaboration with other faculties, *P4* - Teachers' self-assessment of their perceived value during teaching, and *P5* - Typical student behaviour. Below are the mean values, standard deviations, and response distributions for each of the defined predictors.

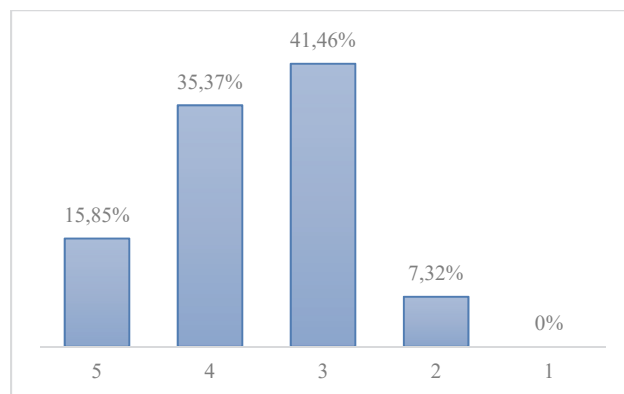


Figure 3 Perceived student motivation in architectural design courses (*P1*)

Respondents rated students' motivation (*P1*) with an average score of 3,59 ($SD = 0,84$). As shown in Fig. 3, nearly half of the respondents ($n = 34$; 41,46%) rated student motivation as 3, while 35,37% ($n = 29$) rated it as 4. The highest rating of 5 was given by 15,85% ($n = 13$) of

respondents, whereas 7,32% ($n = 6$) rated student motivation as 2.

Regarding communication with students ($P2$), responses were scaled from 0 to 3, with an average score of 2,48 ($SD = 0,85$). As illustrated in Fig. 4, most respondents ($n = 56$; 68,29%) stated that they communicate with students weekly outside of regular class hours. Additionally, 13,41% ($n = 11$) communicate once a month, while 15,85% ($n = 13$) communicate a few times per semester.

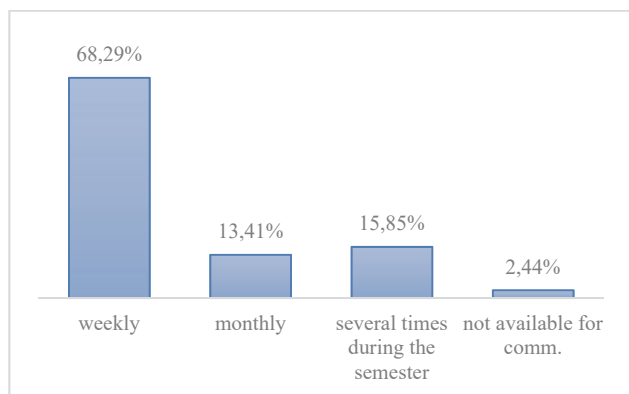


Figure 4 Perceived frequency of out-of-class communication with students ($P2$)

Collaboration with other faculties ($P3$) was formulated as a categorical question and later scaled from 0 to 3, yielding an average response of 1,49 ($SD = 0,88$). As shown in Fig. 5, the largest proportion of respondents ($n = 36$; 43,9%) communicate with colleagues from other higher education institutions once a year, while 30,49% ($n = 25$) do so 2-3 times per year.

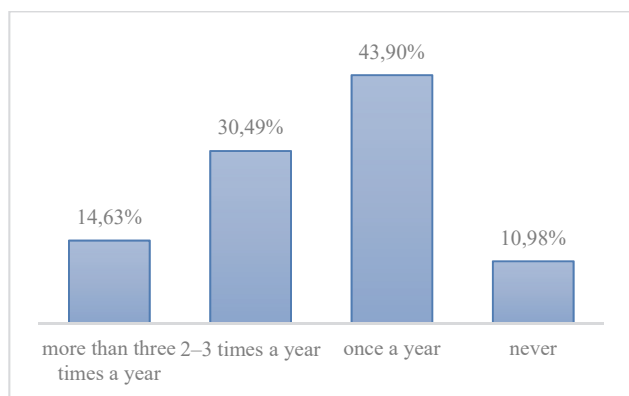


Figure 5 Perceived frequency of interfaculty collaboration ($P3$)

Regarding teachers' perception of students recognizing their effort and dedication ($P4$), responses were transformed into a scale ranging from 2 (occasionally) to 5

(always), with an average score of 3,85 ($SD = 0.72$). Most respondents ($n = 47$; 57,32%) stated that they often feel that students recognize and appreciate their effort during teaching, while 23,17% ($n = 19$) were uncertain. Furthermore, 15,85% ($n = 13$) of respondents always feel that students acknowledge their work and dedication (Fig. 6).

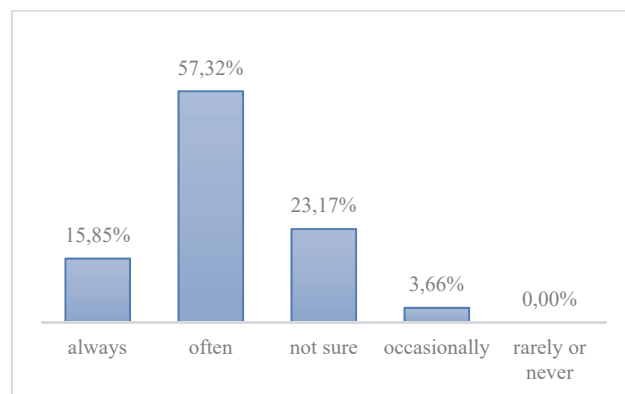


Figure 6 Self-assessed perception of student appreciation for teacher's work and effort ($P4$)

Regarding typical student behaviour ($P5$), this questionnaire item included a set of statements from the literature, where respondents rated their level of agreement on a scale from 1 to 5. Although the question contained fifteen statements, the results presented here focus only on those with an average score above 3,5, considering the scope of the study. The collected responses indicate that respondents believe: a) sketching stimulates the design process in students (4,49, $SD = 0,74$); b) the time students spend working on a project positively affects the quality of the outcome (3,96, $SD = 1,07$); c) students do not deeply reflect on their aesthetic decisions (3,87, $SD = 1,11$); d) students struggle with meeting deadlines and organizing their work (3,65, $SD = 1,06$); e) students lack an understanding of aesthetic theory, which could support their design decisions (3,59, $SD = 0,99$); f) students are unable to integrate previously acquired knowledge into their design solutions (3,52, $SD = 1,02$).

The Kolmogorov-Smirnov test indicated statistically significant deviations from a normal distribution for all examined variables ($p < 0.01$), highlighting the need for scale normalization before conducting regression analysis. Normalization was performed using the data ranking method, transforming the variables to follow a normal distribution. Before conducting regression analysis, an intercorrelation analysis was performed among the set of predictors (Tab. 1).

Table 1 Overview of predictor correlations

	$P1$	$P2$	$P4$	$P5-1$	$P5-2$	$P5-3$	$P5-4$	$P5-5$	$P5-6$	$P5-7$	$P5-8$	$P5-9$	$P5-10$	$P5-11$	$P5-12$	$P5-13$	$P5-14$	$P5-15$	$P3$
$P1$	1	.023	.304**	.383**	.028	.143	-.273*	-.135	-.142	-.228*	-.023	-.070	.110	.076	.070	.091	-.047	-.020	.181
$P2$.023	1	.071	.114	-.046	.082	.101	.153	-.022	.274*	-.016	.047	.031	-.101	-.118	-.240*	.055	.180	.056
$P4$.304**	.071	1	.105	-.229*	.041	-.115	-.139	-.203	-.275*	.005	-.198	.108	.067	.029	-.032	-.264*	-.028	.065
$P3$.181	.056	.065	.121	-.015	.072	-.086	.056	-.251*	-.056	-.087	.004	-.065	-.151	.092	-.045	.167	.054	1

Correlation is significant at the 0,01 level (2-tailed)**
Correlation is significant at the 0,05 level (2-tailed)*

The results show that: student motivation ($P1$), as perceived by teachers, positively correlates with teachers' self-assessment of their perceived value ($P4$) ($r = 0,304$; p

$< 0,01$). This significant finding will be discussed in more detail in the Discussion section. Additionally, student motivation ($P1$) also correlates with typical student

behaviour ($P5$), which was an expected result. The frequency of communication with students ($P2$) significantly correlates with both typical student behaviour ($P5$) and teachers' self-assessment of their perceived value ($P4$). As predicted, different aspects of typical student behaviour ($P5$) also show intercorrelations.

4.2 Regression Analyses and Models

After examining intercorrelations, a regression analysis was conducted for the criterion variable: teaching quality. The results are presented in Tab. 2. The first model, which included the predictors: student motivation ($P1$), frequency of communication with students ($P2$), and teachers' self-assessment of their perceived value ($P4$), was found to be statistically significant ($R = 0,503$; $p < 0,001$). These predictors explained 25.3% of the variance in the criterion variable ($R^2 = 0,253$).

However, when the predictor of typical student behaviour ($P5$) was added to the model, the model ceased to be statistically significant ($R = 0,550$; $p = 0,114$). A similar situation occurred when collaboration with other faculties ($P3$) was introduced, where the predictors together explained 30,2% of the variance ($R^2 = 0,302$), but the model remained statistically insignificant ($p = 0,114$).

Table 2 Predicted teacher attitudes regarding the quality of teaching at their educational institution, based on the defined predictors

$R_1 = 0,503$ $R_1^2 = 0,253$ $p < 0,001$	$R_2 = 0,550$ $R_2^2 = 0,302$ $p = 0,114$	$R_3 = 0,557$ $R_3^2 = 0,310$ $p = 0,130$	Standardized Coefficients (Beta)	p -value
Model 1		$P1$	0,378	0,000
		$P4$	0,235	0,026

R - correlation coefficient
 R^2 - coefficient of determination
 p -value - statistical significance
 Note: The regression analysis included all previously described predictors, while the table presents only those that made a statistically significant contribution to the model.

Analysing the individual contributions of the predictors, the first model showed that two predictors were statistically significant: student motivation ($P1$) as assessed by teachers (Beta = 0,378; $p < 0,01$), and teachers' self-assessment of their perceived value ($P4$) (Beta = 0,235; $p < 0,05$). Thus, the perceived quality of architectural design education primarily depends on two factors: teachers' perception of students' motivation, and teachers' perception that students recognize and appreciate their efforts. These results suggest that higher student motivation and a stronger sense of professional value among teachers correlate with higher perceived teaching quality at their institution.

In subsequent models, after adding additional predictors, none of the new predictors had a statistically significant impact ($p > 0,05$). This implies that typical student behaviour ($P5$) and the frequency of collaboration with other faculties ($P3$) do not significantly influence the perception of teaching quality when the previously mentioned factors are controlled. These findings may have important implications for improving the teaching process in architectural design education, which will be further discussed in the Discussion section.

The next regression analysis was conducted to examine the predictors of perspectives on learning and

teaching architectural design at higher education institutions in the Republic of Serbia. The results are presented in Tab. 3. In the first model, the predictors perceived student motivation ($P1$) and frequency of communication with students ($P2$) significantly predicted teachers' perceptions of teaching perspectives ($R = 0,371$, $p < 0,01$), explaining 13.8% of the variance in the criterion variable. Among these predictors, only perceived student motivation ($P1$) made a significant partial contribution (Beta = 0,294, $p < 0,01$). This finding indicates that a higher perception of student motivation is associated with a more positive outlook on the future of architectural education.

Table 3 Predicted teacher attitudes regarding the perspectives of architectural education in Serbia, based on the defined predictors

$R_1 = 0,371$ $R_1^2 = 0,138$ $p = 0,009$	$R_2 = 0,629$ $R_2^2 = 0,396$ $p = 0,008$	$R_3 = 0,630$ $R_3^2 = 0,397$ $p = 0,013$	Standardized Coefficients (Beta)	p -value
Model 1		$P1$	0,294	0,007
Model 2		$P1$	0,362	0,004
		$P2$	-0,233	0,045
		$P5.4$	0,279	0,031
		$P5.12$	0,349	0,014
Model 3		$P5.13$	-0,266	0,025
		$P1$	0,363	0,004
		$P2$	-0,232	0,049
		$P5.4$	0,278	0,033
		$P5.12$	0,356	0,017
		$P5.13$	-0,265	0,027

R - correlation coefficient
 R^2 - coefficient of determination
 p -value - statistical significance
 Note: The regression analysis included all previously described predictors, while the table presents only those that made a statistically significant contribution to the model.

In the second model, after adding predictors related to typical student behaviour ($P5$), the explained variance significantly increased to 39,6% ($R = 0,629$, $p < 0,01$). In addition to perceived student motivation ($P1$) (Beta = 0,362, $p < 0,01$), other significant contributors included: frequency of communication with students ($P2$) (Beta = -0,233, $p < 0,05$); three aspects of typical student behaviour ($P5$): a) students' inability to integrate previously acquired knowledge (Beta = 0,279, $p < 0,05$), b) the specificity of architectural language and terminology (Beta = 0,349, $p < 0,05$), and c) students' lack of self-confidence (Beta = -0,266, $p < 0,01$). Surprisingly, the direction of the beta coefficients indicates that more frequent communication with students negatively correlates with perceptions of educational perspectives. Recognizing students' lack of self-confidence also negatively correlates with perceived future teaching prospects.

The third model included collaboration with other faculties ($P3$); however, the contribution of this variable was minimal (R^2 change = 0,001), with a total explained variance of 39,7% ($R = 0,630$, $p < 0,05$). The structure of significant predictors remained nearly unchanged, confirming the key role of perceived student motivation ($P1$), the specificity of architectural language and terminology, and students' inability to integrate prior knowledge. The negative effects of frequent communication with students and recognizing their lack of self-confidence remain present and will be further analysed in the Discussion section.

These results suggest that, while student motivation and their ability to cope with the specific demands of architectural education are key factors in shaping teachers' perceptions of future teaching prospects, certain aspects of teacher-student interaction may have unexpected effects. Notably, more frequent communication with students and recognizing their lack of self-confidence do not serve as positive indicators in this context. This finding requires further examination and interpretation, which will be explored in the upcoming section.

5 DISCUSSION

This section summarizes the key findings of the conducted research and interprets them in the context of the available literature. Additionally, the results are discussed in relation to the formulated hypotheses. First, it is important to reiterate the primary objective of this study: examining teachers' attitudes toward the quality and perspectives of architectural education in the Republic of Serbia, using a survey as the methodological instrument. The quality and perspectives of architectural education, as criterion variables, were analysed through the following key predictors: 1) student motivation, as assessed by teachers, 2) frequency of communication between teachers and students, 3) collaboration between teachers and colleagues from other higher education institutions in related educational fields, 4) teachers' self-assessment of how much students appreciate their effort in architectural design courses, and 5) typical student behaviour, defined based on previous research. The survey included 82 respondents from nine higher education institutions that educate architecture and related engineering professionals, with curricula including architectural design courses. This study has yielded some interesting results that highlight the complexity of learning and teaching architectural design.

5.1 Assessment of Teaching Quality

Regarding the quality of architectural design education at higher education institutions in the Republic of Serbia, the research findings indicate that respondents highly value the existing teaching quality. The average rating given by respondents was 3,89 ($SD = 0,57$) on a scale from 1 to 5, with 5 being the highest possible rating and 1 the lowest. This result is further supported by the fact that no respondents assigned a rating of 1, and only one respondent gave a rating of 2. These findings suggest that teachers and teaching assistants involved in architectural design courses across the nine surveyed faculties in Serbia are largely satisfied with the quality of the teaching process and course content provided to students.

The first hypothesis examined whether the perception of teaching quality could be statistically predicted based on the previously defined predictors. Multiple regression analysis showed that statistically significant results were obtained only in the first model, which included three predictors: student motivation, frequency of communication with students, and teachers' self-assessment of their perceived value. This model explained 25,3% of the variance in the criterion variable, with student motivation and teachers' self-assessment

making a significant partial contribution, thus partially confirming the first hypothesis.

On the other hand, the second and third models, which additionally included typical student behaviour and collaboration with other faculties, explained a slightly higher percentage of the variance (30,2%) but without statistical significance. These results suggest that the perception of teaching quality in architectural design education is primarily shaped by student motivation and teachers' perception of the value of their work, while inter-institutional collaboration and typical student behaviour do not have a statistically significant impact. These findings can be analysed in the context of relevant literature, particularly in the works of Mottet et al., Xie and Derakhshan, and Attoe and Mugerauer [18-20], who emphasize the importance of teacher-student communication, student engagement, and a mentoring approach in education.

One of the strongest predictors in our model was student motivation, which can be linked to teaching communication strategies that encourage active learning and participation in the educational process. Xie and Derakhshan [20] emphasize that student motivation significantly increases when teachers implement strategies such as student affirmation, providing support, and ensuring clear communication. Similarly, Attoe and Mugerauer [18] argue that in architectural studies, student motivation is highly dependent on how the instructor facilitates the learning process. Our findings support this claim - when teachers focus on fostering curiosity and creative expression among students, their perception of teaching quality becomes more positive. This suggests that student motivation is not solely an individual trait but is also shaped by teaching methods that actively encourage student engagement.

Our research findings also indicate that teachers' perception of how much students appreciate their efforts significantly influences their perception of teaching quality. This result aligns with the study conducted by Mottet et al. [19], which demonstrates that students' verbal and nonverbal responsiveness can enhance teachers' self-confidence and professional satisfaction. Similarly, Xie and Derakhshan [20] emphasize that teachers' self-confidence and perception of professional effectiveness depend on student feedback, whether through verbal interactions (asking questions, engaging in class discussions) or nonverbal cues (eye contact, expressions of interest). Our findings suggest that when teachers receive positive feedback from students and feel that their work is valued, they are more likely to perceive teaching quality as high.

In this study, typical student behaviour did not have a statistically significant impact on the perception of teaching quality, suggesting that it may not be a decisive factor but rather shaped by the quality of teacher-student interaction. Attoe and Mugerauer [18] suggest that excellent teachers actively influence how students act and engage through their teaching approach, setting challenges and fostering involvement. This finding implies that such behaviour is not a fixed category but can be shaped by teaching methods and instructional strategies. In other words, instead of merely responding to established patterns, teachers can promote a more engaged learning

environment through effective communication and interaction.

5.2 Assessment of Perspectives on Learning and Teaching Architectural Design

The second hypothesis examined whether the perspectives on learning and teaching architectural design could be statistically predicted based on the previously described set of criteria. The results indicate that most respondents (62,2%) perceive the future of architectural education positively, while a significant portion (34,15%) expresses uncertainty. Only three respondents provided a negative assessment, suggesting that a highly unfavourable view of the future of architectural design education in Serbia is not widely shared. These findings indicate that, while most teachers view the future of architectural education optimistically, a notable level of uncertainty remains among a significant number of respondents. This uncertainty may stem from specific challenges faced by educators, such as adapting teaching methods to the evolving needs of students, integrating new technologies into the teaching process, or institutional factors that may influence the quality and future of architectural education.

The results of the regression analysis partially confirm the second hypothesis. It was found that the perspectives on learning and teaching architectural design can be significantly predicted by a few key factors, but not all of those initially considered. The first model indicated that perceived student motivation and frequency of communication with students had a significant predictive effect on teachers' perception of teaching perspectives, though the explained variance was relatively low (13,8%). The most significant individual contribution came from student motivation, suggesting that teachers who perceive students as motivated tend to have a more positive outlook on the future of teaching. This result aligns with previous research, which highlights that high student engagement and initiative can contribute to a more optimistic view of the future of education [18, 20]. Teachers who perceive students as enthusiastic and willing to work are more likely to believe in the long-term sustainability and development of the educational system. This underscores the importance of strategies aimed at further enhancing student motivation, such as implementing interactive teaching methods and strengthening the connection between academic learning and professional practice.

The second model significantly increased the explained variance to 39,6% by incorporating factors related to typical student behaviour. In addition to student motivation, the following factors emerged as significant predictors: frequency of communication with students, students' inability to integrate previously acquired knowledge, the specificity of architectural language and terminology, and students' lack of self-confidence. Unexpectedly, more frequent communication with students and recognition of their lack of self-confidence in making design decisions showed a negative correlation with the perception of teaching perspectives, highlighting potential challenges in the teaching process. The third model incorporated collaboration with other faculties, but this variable did not make a significant contribution to predicting teaching perspectives, as the increase in

explained variance was negligible (0,1%). These findings suggest that, while institutional collaboration may be important for educational reform, it is not a key factor in shaping teachers' perceptions of their teaching prospects.

One of the unexpected findings in this study was the negative correlation between teachers' frequency of communication with students and their perception of educational perspectives. This result can be interpreted in several ways. First, teachers who engage in frequent communication with students may be more aware of the challenges students face, such as lack of academic autonomy, lower preparedness, and difficulties in navigating the design process. This awareness may contribute to the perception that the education system is failing to meet students' evolving needs, suggesting the need for deeper reforms. Second, intensive communication with students may place an additional burden on teachers, especially in systems lacking structured mentoring programs or institutional support mechanisms for students. This finding aligns with the concept of "mentor burnout", where teachers invest significant effort in student support but do not see systemic changes that would ease their workload [21].

Similarly, the results indicate that teachers' recognition of students' low self-confidence correlates negatively with their perception of teaching prospects. This suggests that teachers who observe student uncertainty regarding their skills and competencies tend to have a less optimistic outlook on the future of architectural education, as also discussed by Kurt [17]. These findings highlight the need for additional student support mechanisms, such as programs to strengthen professional confidence, the development of mentoring networks, and the implementation of tailored teaching methods that help students build greater academic security. In this context, future research should explore ways to enhance teaching methods that promote greater individual engagement, critical thinking, and professional independence among students.

The results indicate that the frequency of collaboration with other faculties did not have a significant impact on the perception of teaching prospects in architectural design education. This may suggest that inter-institutional collaboration, in its current form, is not sufficiently developed to meaningfully contribute to the improvement of the educational system. Additionally, it is possible that teachers primarily focus on internal factors within their respective institutions, while the broader educational context does not play a key role in shaping their views on educational perspectives. This raises the question of whether existing models of faculty collaboration are sufficiently functional and whether there is a need to introduce new interdisciplinary and inter-institutional collaboration models that could provide teachers with a broader insight into the future of architectural education.

These reflections align with broader theoretical critiques of architectural education. As discussed previously, Salama [7] emphasizes the need to move beyond traditional studio models by adopting more participatory and responsive pedagogical approaches that account for changing social and cultural conditions. Similarly, Till [9] highlights the importance of engaging with uncertainty and promoting flexible, context-aware

teaching that empowers both students and educators. Colomina et al. [10], through their exploration of radical pedagogies, underscore how educational models can be reframed as spaces of cultural critique, innovation, and responsiveness to broader societal transformations. When viewed in light of these perspectives, the findings of this study - particularly those related to teacher fatigue, limited student autonomy, and systemic rigidity - reveal a pressing need to reconsider prevailing pedagogical structures in architectural education in Serbia.

To address these challenges, several measures could be considered: strengthening mentoring programs to provide structured student support, developing strategies to enhance student confidence, and improving teaching methods to maintain high-quality instruction, regardless of students' initial engagement levels.

6 CONCLUSIONS

This study provided insights into teachers' perceptions of the quality and prospects of architectural education in the Republic of Serbia, highlighting the key factors shaping their perception of the teaching process. The results indicate that student motivation and teachers' perception of how their work is valued are the most important predictors of perceived teaching quality. Teachers who view their students as motivated and engaged, and those who feel that their efforts are recognized, are more likely to positively assess the quality of education.

On the other hand, the analysis of educational perspectives revealed a more complex relationship between factors. Although most teachers perceive the future of architectural education positively, certain aspects, such as students' lack of confidence and more frequent communication with students, unexpectedly had a negative effect on the perception of educational prospects. These findings highlight challenges within the educational system, emphasizing the need for stronger mentoring programs, strategies to enhance student autonomy, and improvements in teaching methods to foster a more effective learning environment.

Based on the connection between our findings and previous research, the following recommendations can be formulated to enhance teaching practices in architectural education: developing interactive teaching methods to foster student engagement, improving communication quality between teachers and students by providing clear feedback and support throughout the design process, providing professional training for teachers on effective teaching and communication methods to ensure that their work is recognized and valued by students, and creating teaching strategies that encourage student engagement, thereby increasing motivation and enhancing classroom interactions.

This study contributes to a deeper understanding of the factors influencing the quality and prospects of architectural education in Serbia while also highlighting directions for future research. Future studies could focus on longitudinal analyses, comparisons with international educational practices, and developing systemic strategies to support both teachers and students in architectural education. Expanding the scope in this way could provide a more comprehensive understanding of the dynamics

shaping teaching quality and educational development in architecture.

As with any study, certain limitations should be acknowledged. The research was conducted on a specific national sample within a defined timeframe, and the findings reflect the particularities of the Serbian higher education context. Additionally, the study focuses exclusively on teachers' perspectives, while student experiences and institutional factors remain unexplored.

The research findings confirm that successful architectural education is the result of dynamic interactions between teachers and students, where teaching methods, communication approaches, and the perception of professional recognition play a crucial role. Enhancing these factors could significantly improve the quality of education, benefiting both teachers and students.

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