

# Professional Development of Teachers in the Context of Modern Education

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# **Keywords:**

Professional development; Professional training; Teachers; Pedagogues; Education

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**Abstract:** Professional development of teachers is a current issue today. Professional development and professional training of teachers are defined as changing and upgrading themselves and their work, in accordance with their own needs, the needs of science and profession, all in the direction of achieving a certain goal and achieving the most efficient results in work. The paper discusses the role of pedagogues in the professional development of teachers. The cognitive goal of the research is aimed at examining: teachers' attitudes about the role of pedagogues in their professional development, the most common forms of professional development of teachers in the field of education, professional development, cooperation between pedagogues and teachers, as well as potential obstacles in this important area of professional development. In the theoretical study of this problem, we used the method of theoretical analysis and descriptive method, while for data collection we used the scaling technique with the Likert-type rating scale (SPUSN), whose reliability was examined with stress parameters as metric characteristics. 123 teachers in the territory of the Republic of Serbia participated in the research. The findings were considered in relation to the work experience of teachers and the education cycle, p < > 0.05.

## 1. INTRODUCTION

The professional development of teachers is defined as a permanent, continuous process of acquisition and application of contemporary scientific achievements in practice with the purpose of accomplishment of educational tasks and improvement of educational practice (Ivanek, 2016). Teachers' professional training is essential concerning teaching innovations, communication with students, professional assistants, parents and educational institutions, as well as with other support staff related to the teaching profession. This wide range of topics closely connected to professional improvement proves the significance of this segment of social reality, i.e. pedagogical reality, in this case (Conradty & Bogner, 2020; Rosa – Campos et al., 2021).

The organisation of teachers' professional training is not a simple task. This formal professional training is accomplished by means of attending required courses in institutions after whose completion attendees are granted certificates or diplomas. The commonly accepted term for the formal teachers' education and improvement is the PRESENT programme, which refers to the teachers' initial education (Beara & Okanović, 2010). This is related to teachers' university studies, i.e. their bachelor, master and doctoral studies. These studies are usually provided by teachers' training faculties, faculties of pedagogy, or faculties closely related to school subjects that teachers will teach in their future career (e.g. the Faculty of Philology is the right choice for the teachers of the French language). University studies are certainly the most appropriate manner of educational improvement since it is necessary for obtaining an academic title or



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degree that ensures employment. This kind of formal education is widely applied in the whole world and has been part of Serbian higher education for a long time (Ivanek, 2016; Kundačina & Stamatović, 2012). However, informal professional teachers' training appears to be a highly familiar and overwhelmingly popular way of this kind of education. It is mainly organised at the beginning of a teacher's teaching career when they need certain additional training pertaining to novel social issues (Bautista & Oretga-Ruiz, 2015; Beara & Okanović, 2010).

Professional training is regulated by precise and strict norms in Serbia. Firstly, teachers' rights and responsibilities are defined by the Law on the Fundamentals of the Education System, which is being amended every year. This Law is based on the Bylaw on Continuing Professional Development of Teachers and Education Staff, which thoroughly defines all rights and responsibilities of teachers, as well as the possibilities for their advancement. The most important aspect of the Serbian professional training system is that it is realised annually by means of accredited programmes, which are supported by appropriate legislation. This organisation of professional training has been in effect for the last ten years in Serbia and represents a framework for the improvement of teachers' knowledge (Kundačina & Stamatović, 2012; Bylaw on Continuing Professional Development of Teachers and Education Staff, 2018; Stamatović & Rogić, 2008; Teodorović et al., 2016; Postholm, 2018).

The presented research analyses the basic division of the professional training forms into individual and group types of teachers' professional education (Ivanek, 2016; Milović, 2010; Teachers' Manual for planning of professional development, 2009; Suzić, 2005).

The role of a pedagogue in teachers' professional development is defined by legal norms that assign pedagogues great power and influence. Pedagogues are required to be involved in teachers' professional improvement, to monitor the advancement of each individual teacher and to assess all of the activities realised within this framework. Their role is invaluable since they are allowed to organise and devise both the topics and the forms of teachers' professional training independently. This is most visible in the types of professional development organised in schools (the so-called internal teachers' professional improvement), where a pedagogue may be not only an organiser, but also a leader or trainer of teachers (Đerić et al, 2014; Ivanek, 2016; Milović, 2010).

The involvement of a pedagogue in the teachers' professional training demands that they improve their own work and profession constantly. First of all, it assumes the development of certain competencies on the part of pedagogues that are crucial for both their own profession and their engagement in teachers' professional education. These competencies include personal, professional, developmental, social and action competencies. Also, pedagogues may require equal communication with teachers, they are well prepared and trained for team work, they cooperate with staff, support and maintain good interpersonal relationships (Jurić, 2004; Trnavac, 1993).

This part of the paper describes the pedagogue as a main and active participant in teachers' professional education. They are considered to be essential for teachers' professional advancement, so the paper redefines the description of their job and their continuous learning. The paper also defines the characteristics that each pedagogue has to possess in order to maintain their position in the field of teachers' professional development. Moreover, the paper clarifies why pedagogues should have certain competencies necessary for them being counsellors, leaders and trainers in the process of teachers' professional development. Their engagement in teachers' professional training represents an important part of educational activities organised with teachers. It is

concluded that pedagogues' participation in teachers' professional education and development is the essence of their work and contributes to their schools' academic and innovative improvement and the advancement of society as a whole.

# 2. RESEARCH METHODOLOGY

The role that a pedagogue plays in teachers' professional education is an important and contemporary issue. Pedagogues are involved in all stages of teachers' professional education in various ways. The versatile forms of teachers' professional development and a complex influence of pedagogues determined the research problem presented in this paper: Which forms of teachers' professional development are mostly organised by pedagogues and in which fields of their professional training are teachers mostly instructed by pedagogues? The established research problem involved the examination of teachers' opinion and attitudes regarding the role played by pedagogues in their professional training, the field which is important both in the pedagogues' job description and in the teachers' job description. Therefore, the subject matter of this study was to explore the following: Teachers' attitudes towards the role played by pedagogues in their professional training and improvement. The goal of this research was to learn about the main forms of teachers' professional training that are organised by pedagogues, the fields in which pedagogues offer instruction and the obstacles encountered by pedagogues when organising teachers' professional training. The methods used corresponded to the problem, subject matter and goal of the research. In the theoretical part, the method of theoretical analysis and the technique of the content analysis was used, whereas the analysis and interpretation of data were performed by means of the descriptive method, as well as the scaling technique. The data were collected by the assessment scale. The assessment scale was Likert scale constructed for the purposes of this research and named ASTPD. This assessment scale contained 26 items. The assessment scale used, The Assessment Scale of Teachers' Professional Development (ASTPD), offered a selection of answers from 1 to 5, depending on the respondents' agreement with a particular statement. The respondents could select the following options: 1 – Strongly disagree, 2 – Disagree, 3 – Neither agree nor disagree, 4 – Agree, 5 – Strongly agree. This research was conducted during the 2018/2019 academic year and involved elementary school teachers. The sample was comprised of 123 elementary school teachers from the Republic of Serbia. The research results were presented with reference to teaching work experience and education cycle.

# 3. ANALYSIS AND INTERPRETATION OF RESEARCH RESULTS

The research results were analysed and interpreted in accordance with the research methodology.

**Table 1.** Respondents' attitudes towards the importance of the pedagogue's role in teachers' professional development regarding education cycle

	N	Min	Max	M	SD
The school pedagogue monitors professional development programmes	123	1.00	4.00	3.2033	1.24768
The school pedagogue keeps records of teachers' professional development	123	1.00	5.00	3.2683	1.23523
The school pedagogue devises measures for the improvement of teachers' competencies by means of professional training	123	1.00	5.00	3.2846	1.22488
The school pedagogue evaluates the impact of professional training on teachers' further improvement	123	1.00	5.00	3.5285	1.16172

The school pedagogue analyses the results of self-evaluation conducted in school as regards the benefits of teachers' professional development	123	1.00	5.00	3.4309	1.28089
The school pedagogue devises the teachers' professional training programme	123	1.00	5.00	3.4715	1.43906
The school pedagogue selects and appoints teachers to attend professional development training	123	1.00	6.00	3.5935	1.42482
Valid N (listwise)	123				

Source: Own research

The focus of the research was to examine the perceptions about the role of a pedagogue in teachers' professional development. This role is definitely very important, which is proven by the results obtained regarding this statement. Namely, they ranged from "neither agree nor disagree" to "agree", M< 4.00 (the items shown in Table 1). This problem can be further explored to obtain more positive responses from teachers who assess the importance of the pedagogue's role in teachers' professional development.

**Table 2.** Differences in respondents' attitudes towards the importance of the pedagogue's role in teachers' professional development regarding education cycle

	Education cycle	N	M	sd
The importance of the pedagogue's role	I-IV	44	23.0682	6.87901
in teachers' professional development	V-VIII	79	24.1772	6.89065

t=0.85; df=121; p=0.34

Source: Own research

The respondents' attitudes towards the pedagogue's role in teachers' professional development were compared based on the items presented in Table 1. This comparison proved that the responses provided by the first-to-fourth grade teachers and by the fifth-to-eighth grade teachers were homogeneous. Therefore, it can be concluded that the perceptions related to the pedagogue's role in teachers' professional development are not dependent on the education cycle which teachers teach.

**Table 3.** Differences in respondents' attitudes towards the importance of the pedagogue's role in teachers' professional development regarding teaching experience

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	45.997	2	22.999	.482	.619

Source: Own research

The results presented in Table 3 are similar to the previous ones. They show that there was no statistically significant difference in the respondents' answers about the importance of the pedagogue's role in teachers' professional development regarding teaching experience, p>0.05. All of the respondents, either those with 10, 11 to 20, or over 20 years of teaching experience, provided predominantly similar answers.

The majority of the respondents agreed with the statements presented in the previous table regarding the Likert scale, M<4.00. This result could be also interpreted as follows: forms of teachers' professional development should be more promoted by the pedagogues so that teachers could evaluate this aspect more highly. On the other hand, the responses stating that peda-

gogues organised various forms of professional development were rather homogeneous in evaluating all of the forms of teachers' professional development (Table 4).

**Table 4.** Forms of teachers' professional development

	N	Min	Max	M	sd
The most common form organised by the pedagogue is the congress or symposium	123	1.00	5.00	3.6829	1.35088
The most common form organised by the pedagogue is the seminar	123	1.00	5.00	3.7886	1.20281
The most common form organised by the pedagogue is the forum	123	1.00	5.00	3.9431	1.09620
The most common form organised by the pedagogue is the meeting	123	2.00	5.00	3.7886	1.05777
The most common form organised by the pedagogue is the conference	123	1.00	5.00	3.8618	1.06606
Valid N (listwise)	123				

Source: Own research

The obtained results show that there was no statistically significant difference in the responses regarding education cycle and teaching experience, p>0.05. The elementary school teachers who participated in the research expressed homogeneous attitudes towards the presented statements, regardless of the grades they taught and their teaching experience.

Another point of the research was to examine the major fields of professional development in which the teachers who participated in the research wanted to improve their skills and knowledge.

Similarly to the aforementioned results, it is evident that the respondents' attitudes to the statements listed in the previous table ranged from "neither agree nor disagree" to "agree" regarding the Likert scale, M<4.00. None of the fields of teachers' professional development from Table 5 was particularly prominent, which led to the conclusion that the school pedagogue organised activities in various fields of teachers' professional development closely related to the improvement of teaching.

**Table 5.** Fields of teachers' professional development

	N	Min	Max	M	sd
The pedagogue favours professional training in the field of peer violence and its prevention	123	1.00	5.00	3.6911	1.11715
The pedagogue favours professional training in the field of inclusion	123	1.00	5.00	3.6911	1.25535
The pedagogue favours professional training in the field of the development of communication skills	123	1.00	5.00	3.4634	1.26292
The pedagogue favours professional training in the field of cooperation with parents	123	1.00	5.00	3.6016	1.25932
The pedagogue favours professional training in the field of cooperation with students	123	1.00	5.00	3.5935	1.20679
The pedagogue favours professional training in the field of action researches and reflexive practice	123	1.00	5.00	3.8780	1.12049

The pedagogue favours professional					
training in the field of the improvement	123	1.00	5.00	3.8049	1.19190
of professional competences					
The pedagogue favours professional					
training in the field of the prevention of	123	2.00	5.00	3.8699	1.10853
discrimination					
Valid N (listwise)	123				

Source: Own research

Based on the items shown in Table 5, the respondents' attitudes were compared regarding education cycle and teaching experience. This comparison proves that the responses provided by all of the participants, either the first-to-fourth grade teachers or the fifth-to-eighth grade teachers or the teachers with more or less teaching experience, were homogeneous. This further proves that the field of teachers' professional training does not depend on the social and demographic variables presented in this research.

These results render a rather good picture of teachers' professional training on one hand, but not an excellent one, on the other. Therefore, the research also examined the obstacles that pedagogues might encounter when organising teachers' professional training.

Table 6 exhibits interesting results. The arithmetic mean of the responses shows strong agreement on the Likert scale, M>4.00.

**Table 6.** Obstacles in organising teachers' professional training

	N	Min	Max	M	sd
Teachers are not willing enough to devote more time to their professional training and development	123	2.00	5.00	3.8455	1.14543
School principals are not appreciative enough of teachers' professional training	123	1.00	5.00	3.9024	1.05903
Teachers are often unwilling and unprepared for education in information technology	123	2.00	5.00	4.0407	.93562
Teachers are often unwilling to accept a critical friend	123	2.00	5.00	4.0650	.76544
Pedagogues encounter obstacles related to insufficient financial support	123	2.00	5.00	3.9756	.99559
Teachers are not motivated enough for professional advancement	123	1.00	5.00	4.0081	1.09766
Valid N (listwise)	123				

Source: Own research

The respondents stated that the obstacles could be found in their unwillingness to attend training in information technology and in their refusal to accept a critical friend. Also, an important obstacle was recognised in teachers' lack of motivation, which is an interesting fact since the research was conducted about this particular problem. Naturally, other obstacles should be considered, such as insufficient financial support, lack of free time for professional training, etc.

The t-test and the ANOVA F-test determined that there was no statistically significant difference in the teachers' responses about the obstacles in realising professional training regarding education cycle and teaching experience, p>0.05.

# 4. FUTURE RESEARCH DIRECTIONS

Teachers' professional development is a contemporary issue. It is understood as teachers' continuous improvement, development of competencies, advancement of teaching, and thus improvement of students' academic achievement. Teachers' professional development has become one of the crucial factors of teaching in all schools, which is the reason why it is realised in various ways and by various institutions. The most important aspect of professional development is continuous professional development. It is defined as one's own improvement and change in accordance with one's own needs, the requirements of the science and teaching profession and the demands posed by society to accomplish established goals and obtain efficient teaching results. Therefore, professional development starts with the enrolment in bachelor studies and continues throughout teaching career and improvement in extracurricular activities. It is the foundation of the development of every school and every teacher. Teachers' professional development in other countries. The comparative analysis could highlight certain advantages and drawbacks of teachers' professional development in Serbia and possibly emphasise the "points" in the professional development concept that might be improved on both personal and global level.

One of the ideas born in the course of writing this paper was that the concepts examined in the empirical research could be compared to the ways of realising teachers' professional development during the Covid-19 pandemic.

## 5. CONCLUSION

The first hypothesis postulated in the research, It is assumed that teachers acknowledge the importance of the pedagogue's role in organising their professional development, was confirmed. This means that teachers are aware of the importance of the pedagogue in their professional development. The second hypothesis, It is assumed that teachers believe that the most common form of their professional training organised by the pedagogue is the seminar, was only partially confirmed. The results of the empirical research yielded other forms of professional development. Contemporary technology and innovative methods of teaching may largely help teachers develop various activities in classes and thus obtain better results from their students by combining individual and group work in professional training. The hypothesis, It is assumed that teachers think that pedagogues favour professional training in the field of inclusion, was partially confirmed. Inclusion did not prove to be the major topic of professional training. The research results prove that besides inclusion, which is definitely dominant in our present reality, teachers acquire professional skills and knowledge in other fields, such as school violence, discrimination, cooperation with students and parents. The fourth hypothesis, It is assumed that teachers think that the greatest obstacle in the pedagogue's organisation of their professional training is their lack of motivation for further improvement, was partially confirmed. Besides the lack of motivation, there were prominent other obstacles presented in the part of the paper dealing with the analysis and interpretation of the research results. The most demotivating factors proved to be insufficient financial support, distance, working environment and regular overwork. The pedagogue is expected to initiate the development of teachers' inner motivation in order to decrease negative influences and stimulate motivation as a crucial aspect of professional development.

Teachers' education and professional development are of crucial importance in every country, since high-quality teachers represent the key factor that influences students' academic accom-

plishment. The improvement of teachers' education does not merely involve their university education but also their further formal and informal forms of the acquisition of knowledge and skills. Teachers thus become part of the continuous professional development. This contributes to continuity, quality teaching and, naturally, to the development of an appropriate role of the pedagogue in teachers' professional development.

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# **REFERENCES**

- Bautista, A. & Oretga-Ruiz, R. (2015). Teacher professional development: International perspectives and approaches. *Psychology, Society & Education*, 7, 3, 240-251 DOI: http://dx.doi.org/10.25115/psye.v7i3.1020
- Beara, M. i Okanović, P. (2010). Spremnost na profesionalni razvoj nastavnika: Kako je izmeriti? *Andragoške studije*, 1, 47-60.
- Conradty, C. & Bogner, F. (2020). STEAM teaching professional development works: effects on students' creativity and motivation. *Smart Learning Environments* (2020) 7:26, 1-20. https://slejournal.springeropen.com/track/pdf/10.1186/s40561-020-00132-9.pdf
- Ivanek, P. (2016). Stručno usavršavanje nastavnika i obrazovno-vaspitna postignuća učenika srednje škole. Banja Luka: Filozofski fakultet.
- Jurić, V. (2004). Metodika rada školskog pedagoga. Zagreb: Školska knjiga.
- Kundačina, M. i Stamatović, J. (2012). Akreditovani programa usavršavanja nastavnika- stanje i potrebe. *Inovacije u nastavi*, 1, 68-78.
- Milović, S. (2010). *Stručno usavršavanje i profesionalni razvoj*. Agencija za odgoj i vaspitanje: Zagreb.
- Postholm, M.B. (2018). Teachers' professional development in school: A review study. *Cogent education*, 5 (1). https://www.tandfonline.com/doi/full/10.1080/2331186X.2018.1522781
- Pravilnik o stalnom stručnom usavršavanju i napredovanju u zvanja nastavnika, vaspitača i stručnih saradnika (2018). Službeni glasnik RS: Beograd
- Priručnik za planiranje stručnog usavršavanja i napredovanja (2009). Zavod za unapređivanje obrazovanja i vaspitanja: Beograd.
- Rosa-Campos., E., Renta-Davids, A., Marhuenda-Fluixá, F. & Flecha, R. (2021). Educational Impact Evaluation of Professional Development of In-Service Teachers: The Case of the Dialogic Pedagogical Gatherings at Valencia "On Giants' Shoulders". *Sustainability*, 13, 4275, 1-17. https://doi.org/10.3390/su13084275
- Stamatović, J. i Rogić, A. (2008). Praćenje i evaluacija stručnog usavršavanja nastavnika. *Inovacije u nastavi*, 1, 98- 110.
- Suzić, N. (2005). Pedagogija za XXI vijek. TT- Centar: Banja Luka.
- Trnavac, N. (1993). *Pedagog u školi: prilog metodici rada školskog pedagoga, sa programima rada školskih pedagoga u osnovnoj i srednjoj školi.* Beograd: Učiteljski fakultet.