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THE STATISTICAL ANALYSIS OF THE RELATIONSHIP BETWEEN EFL TEACHERS' USE OF MOTIVATIONAL TEACHING STRATEGIES AND OTHER FACTORS

Abstract: This paper presents the findings of the research which attempted to analyse the frequency of EFL teachers' motivational strategies use. The research also evaluated which factors may be related to the use of strategies. It was discovered that professional development of EFL teachers, especially its informal type, is connected to the use of motivational teaching strategies. Place of employment also showed connections to strategies. Lastly, teachers' age and level of education were not proven as significant factors in the use of motivational teaching strategies. With that in mind, this research could serve as motivation for teachers to develop themselves professionally, in order to better their teaching practice. Additional research is required in order to fully comprehend the relationship between motivational strategy use and student motivation and learning outcomes.

Keywords: motivational strategies, motivation, EFL teacher, teaching practice.

1. INTRODUCTION

Since motivation is a significant factor in any learning (Dörnyei, 2001), many teachers of English as a foreign language resort to various motivational teaching strategies to spur and maintain student motivation. The author of this paper conducted a research in order to discover what factors are connected to EFL teachers' use of motivational teaching strategies. This paper aims to present the findings of the research, as well as its potential implications in teaching practice.

In order to examine the factors connected to EFL teachers' use of motivational teaching strategies the author conducted a quantitative study which involved 133 EFL teachers. It attempted to provide a better understanding of factors connected to motivational teaching strategies, as they can be significant in applying the strategies in classroom practice. Further, understanding EFL teachers' use of motivational strategies can allow for better understanding of teaching practice alto-

gether, and it can serve as a basis for future research into the relationship between motivational strategies and student motivation.

In order to conduct the research and form the hypotheses, works of previous authors were consulted, thus allowing a better understanding of the research topic and all the relevant concepts. Primarily, Dörnyei's (2001) work on motivation and motivational strategies was of invaluable significance, as it provided the main theoretical framework for understanding the relationship between motivation and language teaching, as well as the functioning of motivational teaching strategies. Further, McEown and Takeuchi's (2012) research into motivational teaching strategies and teachers' impact on motivation also provided great insight into what different strategies are used in EFL classrooms and what factors are connected to them. Teaching strategies were also examined by Abbasi (2011), whose research into the differences in strategy use between the teachers who work in the public sector and those who work in the private sector were vital in the formation of one of the hypotheses in this research.

1.1. RESEARCH HYPOTHESES

As stated above, the research was conducted with the aim to discover what factors are connected to EFL teachers' use of motivational teaching strategies in an EFL classroom. Factors such as professional development, place of employment, age and level of education were considered.

Prior to the research the following directional hypotheses were made:

- There is a connection between EFL teachers' professional development experience, and their use of motivational teaching strategies. Based on some aspects of previous research by Porter and his colleagues (Porter et al., 2000), it was expected that teachers who participate in more professional development exhibit increased use of motivational teaching strategies.
- Teachers employed in the public sector use motivational teaching strategies with lower frequency than teachers in the private sector (Abbasi, 2011).

In relation to the remaining independent variables, a set of following null hypotheses was formulated:

- Age is not a relevant factor in EFL teacher's use of motivational teaching strategies.
- Level of education is not a relevant factor in EFL teacher's use of motivational teaching strategies.

2. LITERATURE REVIEW

In his work regarding motivational strategies in the language classroom, Dörnyei defines motivational strategies as "techniques that promote the individual's goal-related behaviour" (2001: 28). He further elaborates that motivational strategies serve to instigate and retain motivation in students. The reason why motivational strategies should be discussed as a crucial factor in language learning is that motivation, defined as willingness to begin with an action, the effort invested in it and the continuation of it (Dörnyei, 2001), is one of the key influences in any learning.

In any classroom a teacher is the paramount motivational influence on students and their learning outcomes (Dörnyei & Csizér, 1998; Chambers, 1999), and every aspect of the teacher's behaviour is important in a learning setting. That may include aspects such as humour, enthusiasm, commitment to learning, expectations of students' learning outcomes, relationship with students, etc. (Dörnyei, 2001), all of which relate to motivational teaching strategies in the form of concrete behaviour such as using humour and expressing enthusiasm in front of the students. Such strategies can create a positive and friendly atmosphere, in which students are encouraged and stimulated to learn (Dörnyei, 2001). In another research on motivational teaching strategies which may promote classroom participation and student motivation, Elashhab (2020) considered the following motivational teaching strategies: selecting topics relevant to students' lives, allowing students to select the topics or materials for discussion, allowing everyone opportunity to speak to ensure complete understanding, providing enough time to practice, allowing peer feedback, encouraging speaking games, etc. (Elashhab, 2020). In the research it was discovered that the students exhibit high preference for the teachers' use of motivational teaching strategies and that the use of such strategies enriches the students' learning process and improves their motivation and learning outcomes (Ibid.). According to Nunan (1998), it is essential for teachers to understand the significance of the role of motivation in their students' willingness to communicate. He also emphasises the significance of the meaningful and relevant materials and tasks for the language learning results. With that in mind, researching proper motivational strategies and techniques and discovering how to enhance their use is of utmost significance in EFL teaching practice.

In researching how a teacher's use of motivational teaching strategies impacts their students' motivation in an EFL classroom, McEown and Takeuchi (2012) identified and selected seventeen motivational teaching strategies (see Appendix) as being closely tied to students' motivated behaviour. Those strategies were used in the formation of the questionnaire in this research. Some of the strategies showed positive correlations with students' motivation and were evaluated as desirable teacher behaviour during the preliminary stages of McEown and Takeuchi's research (2012). Other authors also claimed that teachers' motivation

and behaviour leads to an increase in students' motivation (Solak & Bayar, 2014; Bomia et al., 1997). Additionally, Cheng and Dörnyei (2007) also found that various motivational strategies, a lot of which are similar to the ones from this research, exhibit connections to students' motivation. Further, Chen and Yang found that many strategies are highly influential in increasing students' motivation and classroom participation, especially culturally responsive strategies. Those strategies enhanced the frequency of students' active involvement in the classroom, as well as their communication skills and competences (Chen & Yang, 2017).

When it comes to the EFL context, it is also interesting to consider what factors may influence teachers' use of motivational teaching strategies. Firstly, factors such as gender, years of experience and type of school have exhibited no correlations with the use of motivational teaching strategies by non-native EFL teachers in the Turkish context (Solak & Bayar, 2014). On the other hand, according to the research done by Abbasi (2011), there are differences in the use of teaching strategies by teachers in public and private sectors. Teaching strategies in general are not commonly applied in the EFL classroom by the teachers in the public sector. They typically resort to more traditional approaches and do not tend to employ modern teaching strategies, unlike the teachers who work in the private sector (Abbasi, 2011).

Some previous research also showed that the positive effects of teachers' participation in professional development can be felt by their schools and students (Moor et al., 2005), as well as in their teaching practice (Porter et al., 2000). For that reason, professional development was another factor considered in the research prior to this paper, in attempt to discover a potential relation to motivational teaching strategies.

3. METHOD

In order to examine the relationship between teaching strategies and other factors which may be connected to it, a quantitative research design was applied. The author conducted a survey with a questionnaire in which 133 teachers from the Republic of Serbia were asked to signify the frequency of motivational strategies use.

3.1. PARTICIPANTS

The participants of this research were 133 EFL teachers from the Republic of Serbia, out of whom 8 were male and 125 female. The imbalance between genders can be explained with the statistics from the school year 2021/22, which shows the following: in primary and high schools 73.54% of teaching staff are fe-

males, whereas in higher educational institutions that number is 52.27% (Vučićević, 2023). Furthermore, the participants' gender will not be analysed as an independent variable due to the large disproportion in the subsamples, mitigating potential Type I and II errors. The participants ranged between the ages of 22 and 63 and they were employed in both private and public sectors. As can be seen from Table 1, 42.1% of participants in the study worked at primary school, while 19.5% of teachers were employed by a secondary school. Faculty professors amounted to 6%, while 29.3% of teachers worked at a private school or a language centre. Some participants worked at more than one place of employment, and they were grouped under the category *Other*, which includes 3.0% of the participants.

		Place of employment						
		Primary school	Secondary school	Faculty	Faculty Private school Other		Total	
N.4-1-	N	1	0	2	4	1	8	
Male	%	0.8%	0.0%	1.5%	3.0%	0.8%	6.0%	
F	N	55	26	6	35	3	125	
Female	%	41.4%	19.5%	4.5%	26.3%	2.3%	94.0%	
Total	N	56	26	8	39	4	133	
	%	42.1%	19.5%	6.0%	29.3%	3.0%	100.0%	

Table 1. Cross-tabulation of the sample according to gender and place of employment

3.2. INSTRUMENT

The instrument in this research was a teacher survey in the form of a questionnaire. The questionnaire was composed of two sources: *TALIS Teacher Questionnaire* (OECD, 2018) and *Motivational strategies in EFL Classroom* (McEown & Takeuchi, 2012). The first part of the survey involved questions regarding the participants' previous involvement and application of both formal and informal professional development: the participants were required to mark all the different means of professional development they had undergone during the previous eighteen months.² In the next section of the questionnaire, the participants were

¹ A type I error (false-positive) occurs if an investigator rejects a null hypothesis that is actually true in the population; a type II error (false-negative) occurs if the investigator fails to reject a null hypothesis that is actually false in the population (Banerjee et al., 2009).

² Courses/workshops (e.g. on subject matter or methods and/or other education-related topics); Education conferences or seminars (where teachers and/or researchers present their research results and discuss educational problems); Qualification programme (e.g. a degree programme); Observation visits to other schools; Participation in a network of teachers formed specifically for the professional development of teachers; Individual or collaborative research on a topic of interest to you professionally; Mentoring and/or peer observation and coaching, as part of a formal school arrangement; Reading professional literature (e.g. journals, evidence-based papers, thesis papers);

required to signify on a scale of 1 to 5 (1 being *never*, 5 being *always*) their use of each of the seventeen motivational teaching strategies in an EFL classroom.³ The instrument also asked the participants to provide basic personal information, such as gender, age, level of education and place of employment. As it did not require the participants to input their name or any other identifying information, it was completely anonymous, in an attempt to ensure the participants' absolute sincerity.

3.3. VARIABLES

The variables involved in this research were EFL teachers' experience with professional development, place of employment, age, level of education and strategy use. The aim was to discover whether there were any connections among strategy use and other variables.

3.4. PROCEDURE

As it was stated above, the primary means of data collection was a questionnaire, which was distributed online, through various social media and mailing lists. Afterwards, a quantitative research design was applied, in which the data were analysed in a SPSS statistics software. Pearson's correlations, one-way ANOVA and Bonferroni post-hoc tests were used to test the relationships between variables involved in the research and attempt to answer the research question. Prior to statistical tests, data obtained through the research were coded where such procedure was required and some pre-statistical calculations were made in Microsoft Office Excel, with the aim of preparing the data for further statistical observations.

Watching useful content (e.g. videos about teacher improvement); Engaging in informal dialogue with your colleagues on how to improve your teaching.

³ 1. Circulate around in the classroom to observe each student carefully; 2. Ask students to be quiet when needed to maintain a better learning environment in the classroom; 3. Start the class exactly on time; 4. Make a clear explanation for class assessments and exams; 5. Make clear answers and explanations for students' questions and also the content of the textbook; 6. Provide individual support for each student; 7. Bring a variety of learning materials; 8. Keep pace with the students and get them involved in the activities; 9. Speak in English with proper pronunciation; 10. Speak in a clear and loud voice; 11. Write clearly on blackboard/whiteboard; 12. Provide positive rewards and praise to the students; 13. Provide some background knowledge / supplement information; 14. Bring in humour in the classroom; 15. Perform in a positive manner in the classroom; 16. Perform in a friendly manner in the classroom; 17. Display enthusiasm of teaching English.

4. RESULTS

The following results were obtained through the research of EFL teachers' use of motivational teaching strategies.

Firstly, in order to test whether the data obtained through the research are normally distributed, descriptive tests were conducted (see Table 2). As can be seen from the table, the results for the following variables exhibit an extremely high deviation from the normal values (more than +2.0 and/or less than -2.0 in the statistics sub-columns of the skewness and kurtosis columns): *Strategy 4*, and *Strategy 10*. Even after attempted transformations through log10, these variables were unsuited for use in the research. Therefore, these variables were not included in further tests in order to ensure as relevant conclusions as possible (Larson-Hall, 2010). Further, the variable *Strategy 9* only slightly exceeds normal values. Given that the deviation is only minor, the author chose not to transform this variable. However, with this limitation in mind, the author will approach the analysis carefully, and all conclusions and potential generalisations will be made with the deviation in mind.

Table 2. Descriptive statistics

	Mean	Std. Deviation	Ske	wness	Kur	rtosis
	Statistic	Statistic	Statistic	Std. Error	Statistic	Std. Error
Formal Dev	2.83	1.65	0.043	0.210	-0.661	0.417
Informal Dev	2.55	0.63	-1.095	0.210	0.117	0.417
Strategy 1	4.11	0.93	-0.901	0.209	0.284	0.416
Strategy 2	4.16	0.97	-1.172	0.209	1.117	0.416
Strategy 3	4.38	0.83	-1.451	0.209	2.155	0.416
Strategy 4	4.84	0.40	-2.574	0.209	6.296	0.416
Strategy 5	4.76	0.46	-1.689	0.209	1.938	0.416
Strategy 6	4.21	0.81	-0.834	0.209	0.586	0.416
Strategy 7	3.95	0.94	-0.563	0.209	-0.304	0.416
Strategy 8	4.50	0.63	-0.890	0.209	-0.229	0.416
Strategy 9	4.62	0.61	-1.570	0.209	2.338	0.416
Strategy 10	4.82	0.44	-2.460	0.209	5.615	0.416
Strategy 11	4.56	0.70	-1.550	0.209	1.920	0.416
Strategy 12	4.65	0.58	-1.469	0.209	1.197	0.416
Strategy 13	4.47	0.68	-1.052	0.209	0.513	0.416
Strategy 14	4.53	0.66	-1.074	0.209	0.008	0.416
Strategy 15	4.65	0.55	-1.333	0.209	0.856	0.416
Strategy 16	4.70	0.53	-1.607	0.209	1.724	0.416
Strategy 17	4.62	0.60	-1.323	0.209	0.741	0.416
Strategy Avg	4.50	0.36	-0.959	0.209	0.524	0.416

In order to test whether age is related to the use of each individual strategy, a Pearson's correlations test was performed (see Table 3). As it can be seen from the table, the correlation between age and the use of *Strategy 3* is significant at the 0.05 level, while other strategies do not exhibit any correlations with age.

Table 3. Pearson's correlations between age and strategy use

		Age
Chunham 1	r	-0.053
Strategy 1	р	0.541
Chunham 2	r	-0.066
Strategy 2	р	0.450
Chunham 2	r	0.193*
Strategy 3	р	0.026
Stratogy F	r	0.143
Strategy 5	р	0.100
Chunham. C	r	-0.068
Strategy 6	р	0.440
Stratogy 7	r	0.135
Strategy 7	р	0.122
Ctratagy 9	r	-0.164
Strategy 8	р	0.060
Chuntom O	r	0.022
Strategy 9	р	0.800
Chunha au 11	r	0.039
Strategy 11	р	0.656
Ctratagy 12	r	0.070
Strategy 12	р	0.420
Ctratagy 12	r	0.157
Strategy 13	р	0.070
Chunham 1.1	r	-0.091
Strategy 14	р	0.295
Ctratagy 1E	r	0.032
Strategy 15	р	0.717
Strategy 16	r	0.027
Strategy 16	р	0.757
Strategy 17	r	0.144
Strategy 17	р	0.099
Stratogy Ava	r	0.074
Strategy Avg	р	0.399

^{*} Correlation is significant at the 0.05 level (2-tailed).

Finally, another Pearson's correlations test was performed to explore the nature of the relationship between formal and informal professional development and the teacher's use of each individual strategy (see Table 4 and Table 5). As it

^{**} Correlation is significant at the 0.01 level (2-tailed).

can be seen from the tables, this test showed some significant correlations. A large number of strategies also correlate with one another.

Table 4. Pearson's correlations between strategies and professional development

		Formal Dev Total	Informal Dev Total	Strategy 1	Strategy 2	Strategy 3	Strategy 5	Strategy 6	Strategy 7	Strategy 8
Formal	r	1	.266**	0.116	-0.011	0.159	0.114	0.044	.185*	0.134
Dev	р		0.002	0.184	0.898	0.068	0.191	0.613	0.033	0.125
Informal	r	.266**	1	.248**	-0.141	0.109	-0.011	.185*	.265**	0.165
Dev	р	0.002		0.004	0.105	0.213	0.898	0.033	0.002	0.057
Strategy	r	0.116	.248**	1	.173*	0.105	.288**	.299**	.370**	.346**
1 1	р	0.184	0.004		0.045	0.227	0.001	0.000	0.000	0.000
Strategy	r	-0.011	-0.141	.173*	1	-0.036	0.034	-0.052	-0.131	-0.042
2	р	0.898	0.105	0.045		0.676	0.693	0.554	0.131	0.631
Strategy	r	0.159	0.109	0.105	-0.036	1	.237**	0.117	.394**	0.146
3	р	0.068	0.213	0.227	0.676		0.006	0.179	0.000	0.092
Strategy	r	0.114	-0.011	.288**	0.034	.237**	1	.375**	.267**	.358**
5	р	0.191	0.898	0.001	0.693	0.006		0.000	0.002	0.000
Strategy	r	0.044	.185*	.299**	-0.052	0.117	.375**	1	.419**	.440**
6	р	0.613	0.033	0.000	0.554	0.179	0.000		0.000	0.000
Stra <u>t</u> egy	r	.185*	.265**	.370**	-0.131	.394**	.267**	.419**	1	.488**
7	р	0.033	0.002	0.000	0.131	0.000	0.002	0.000		0.000
Strategy	r	0.134	0.165	.346**	-0.042	0.146	.358**	.440**	.488**	1
8	р	0.125	0.057	0.000	0.631	0.092	0.000	0.000	0.000	
Strategy	r	-0.006	0.039	.377**	-0.050	0.092	.340**	.314**	.333**	.376**
9 0,	р	0.944	0.656	0.000	0.566	0.291	0.000	0.000	0.000	0.000
Strategy	r	0.038	0.126	.235**	0.026	0.093	.276**	.257**	.229**	.345**
11	р	0.663	0.148	0.006	0.769	0.283	0.001	0.003	0.008	0.000
Strategy	r	-0.016	0.088	.237**	0.030	0.162	.394**	.460**	.412**	.533**
12	р	0.859	0.314	0.006	0.727	0.061	0.000	0.000	0.000	0.000
Strategy	r	0.046	.175*	.221*	0.025	0.090	.383**	.395**	.370**	.425**
13	р	0.603	0.044	0.010	0.772	0.303	0.000	0.000	0.000	0.000
Strategy	r	0.113	0.083	0.107	0.047	-0.004	.195*	.370**	.278**	.385**
14	р	0.196	0.341	0.220	0.593	0.960	0.024	0.000	0.001	0.000
Strategy	r	0.076	0.092	.249**	-0.095	.286**	.354**	.365**	.301**	.278**
15	р	0.387	0.291	0.004	0.275	0.001	0.000	0.000	0.000	0.001
Strategy	r	0.095	0.155	0.140	0.005	.273**	.256**	.284**	.359**	.308**
16	р	0.276	0.075	0.107	0.958	0.001	0.003	0.001	0.000	0.000
Strategy	r	0.063	0.159	.344**	-0.090	.231**	.293**	.336**	.394**	.324**
17	р	0.472	0.067	0.000	0.301	0.007	0.001	0.000	0.000	0.000
Strategy	r	0.150	.206*	.571**	0.149	.380**	.604**	.634**	.658**	.660**
Avg	р	0.085	0.017	0.000	0.085	0.000	0.000	0.000	0.000	0.000

^{**} Correlation is significant at the 0.01 level (2-tailed).

^{*} Correlation is significant at the 0.05 level (2-tailed).

Table 5. Pearson's correlations between strategies and professional development

		Strategy 9	Strategy 11	Strategy 12	Strategy 13	Strategy 14	Strategy 15	Strategy 16	Strategy 17	Strategy Avg
	r	-0.006	0.038	-0.016	0.046	0.113	0.076	0.095	0.063	0.150
Formal Dev	р	0.944	0.663	0.859	0.603	0.196	0.387	0.276	0.472	0.085
	r	0.039	0.126	0.088	.175*	0.083	0.092	0.155	0.159	.206*
InformalDev	р	0.656	0.148	0.314	0.044	0.341	0.291	0.075	0.067	0.017
Church a min 4	r	.377**	.235**	.237**	.221*	0.107	.249**	0.140	.344**	.571**
Strategy 1	р	0.000	0.006	0.006	0.010	0.220	0.004	0.107	0.000	0.000
Chuntami 2	r	-0.050	0.026	0.030	0.025	0.047	-0.095	0.005	-0.090	0.149
Strategy 2	р	0.566	0.769	0.727	0.772	0.593	0.275	0.958	0.301	0.085
Church and 2	r	0.092	0.093	0.162	0.090	-0.004	.286**	.273**	.231**	.380**
Strategy 3	р	0.291	0.283	0.061	0.303	0.960	0.001	0.001	0.007	0.000
Church a mu . F	r	.340**	.276**	.394**	.383**	.195*	.354**	.256**	.293**	.604**
Strategy 5	р	0.000	0.001	0.000	0.000	0.024	0.000	0.003	0.001	0.000
Church a mu C	r	.314**	.257**	.460**	.395**	.370**	.365**	.284**	.336**	.634**
Strategy 6	р	0.000	0.003	0.000	0.000	0.000	0.000	0.001	0.000	0.000
Chunham . 7	r	.333**	.229**	.412**	.370**	.278**	.301**	.359**	.394**	.658**
Strategy 7	р	0.000	0.008	0.000	0.000	0.001	0.000	0.000	0.000	0.000
Character and O	r	.376**	.345**	.533**	.425**	.385**	.278**	.308**	.324**	.660**
Strategy 8	р	0.000	0.000	0.000	0.000	0.000	0.001	0.000	0.000	0.000
Character and O	r	1	.289**	.243**	0.141	.317**	.278**	0.154	.298**	.530**
Strategy 9	р		0.001	0.005	0.103	0.000	0.001	0.076	0.000	0.000
Ctratagy 11	r	.289**	1	.329**	.183*	0.165	.365**	.307**	0.169	.495**
Strategy 11	р	0.001		0.000	0.035	0.057	0.000	0.000	0.051	0.000
Ctratagy 12	r	.243**	.329**	1	.509**	.363**	.383**	.395**	.445**	.667**
Strategy 12	р	0.005	0.000		0.000	0.000	0.000	0.000	0.000	0.000
Ctratagy 12	r	0.141	.183*	.509**	1	.480**	.393**	.470**	.349**	.630**
Strategy 13	р	0.103	0.035	0.000		0.000	0.000	0.000	0.000	0.000
Chunka au 11	r	.317**	0.165	.363**	.480**	1	.401**	.430**	.285**	.543**
Strategy 14	р	0.000	0.057	0.000	0.000		0.000	0.000	0.001	0.000
Character and 15	r	.278**	.365**	.383**	.393**	.401**	1	.645**	.490**	.630**
Strategy 15	р	0.001	0.000	0.000	0.000	0.000		0.000	0.000	0.000
Chuntam 1C	r	0.154	.307**	.395**	.470**	.430**	.645**	1	.416**	.616**
Strategy 16	р	0.076	0.000	0.000	0.000	0.000	0.000		0.000	0.000
Chuntom 17	r	.298**	0.169	.445**	.349**	.285**	.490**	.416**	1	.620**
Strategy 17	р	0.000	0.051	0.000	0.000	0.001	0.000	0.000		0.000
Chunha A.	r	.530**	.495**	.667**	.630**	.543**	.630**	.616**	.620**	1
Strategy Avg	р	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	

^{**} Correlation is significant at the 0.01 level (2-tailed).

^{*} Correlation is significant at the 0.05 level (2-tailed).

Further, a one-way ANOVA was performed with the purpose of examining whether there are any statistically significant group differences in EFL teachers use of motivational teaching strategies based on the places of employment (see Table 6). Besides that, a Bonferroni post-hoc test was performed as well, in order to examine the nature of group differences.

		employment

	F	P
Strategy 1	4.875	0.002
Strategy 2	3.14	0.017
Strategy 3	0.788	0.535
Strategy 5	1.97	0.103
Strategy 6	4.862	0.001
Strategy 7	1.299	0.274
Strategy 8	1.618	0.174
Strategy 9	1.84	0.125
Strategy 11	2.704	0.033
Strategy 12	1.266	0.287
Strategy 13	0.544	0.704
Strategy 14	2.989	0.021
Strategy 15	0.825	0.512
Strategy 16	0.853	0.494
Strategy 17	1.564	0.188
Strategy Avg	2.775	0.030

As can be seen from the table, statistically significant differences (p < 0.05) in teachers' use of motivational teaching strategies are noticeable for the following strategies: Strategy 1 (p = 0.002), Strategy 2 (p = 0.017), Strategy 6 (p = 0.001), Strategy 11 (p = 0.033), Strategy 14 (p = 0.021) and the average use of strategies (p = 0.030). When it comes to the first strategy, following a Bonferroni post-hoc test, group differences were noticed between primary and faculty EFL teachers with the mean difference of 1.29 in favour of the teachers who work at faculty. Faculty teachers also use Strategy 1 more often than secondary school teachers, with the mean difference of 1.16. Further, faculty teachers apply Strategy 1 more often than teachers who work at a private school or a language centre, with the mean difference of 1.43. In terms of Strategy 2, although the one-way ANOVA test established a statistically significant difference, a Bonferroni post-hoc test lacked power to show the differences between subsamples. The data obtained for Strategy 6 show that teachers who work at a private school apply Strategy 6 less commonly than teachers who work at a primary school, with the mean difference of 0.66. When it comes to the use of Strategy 11, teachers who work at a primary school use it less commonly than those who work at the faculty, with the mean difference of 0.80. Strategy 14 is used more commonly by teachers who work at a

private school or a language centre, than by teachers whose place of employment is in the category *Other*, with the mean difference of 0.99.

Afterwards, a one-way ANOVA, with a Bonferroni post-hoc test was applied with motivational strategies and EFL teachers' level of education as relevant variables. The results of one-way ANOVA are presented in Table 7. As it can be seen from the table, no statistically significant differences among groups were discovered, as p-values do not satisfy the criterion p < 0.05.

	F	Р
Strategy 1	1.099	0.352
Strategy 2	1.030	0.382
Strategy 3	1.030	0.671
Strategy 5	1.030	0.829
Strategy 6	0.295	0.289
Strategy 7	0.949	0.419
Strategy 8	1.147	0.333
Strategy 9	2.186	0.093
Strategy 11	1.108	0.348
Strategy 12	1.204	0.311
Strategy 13	0.351	0.788
Strategy 14	0.662	0.577
Strategy 15	0.231	0.874
Strategy 16	0.230	0.876
Strategy 17	0.801	0.496

Table 7. Use of strategies and teachers' level of education

5. DISCUSSION

The objective of this research was to examine EFL teachers' use of motivational teaching strategies, as well as to discover what factors might be connected to it. The factors which were considered were teachers' experience with formal and informal means of professional development, their place of employment, age and level of education. This qualitative research aimed to provide a fresh understanding of motivational teaching strategies, as well as to serve as a basis for future research in the domain of teaching practice and motivation.

Firstly, a Pearson's correlational analysis was performed to establish whether age is connected to EFL teachers' strategy use. The results show that only Strategy 3 – Starting the lesson on time, is connected to age, with correlation significant at the 0.05 level (r = 0.193, p = 0.026). Other characteristics do not correlate with age, therefore, the null hypothesis can be confirmed to a larger extent, age of EFL teachers does not correlate with their use of motivational teaching strategies in the

classroom. Additional research is required to discover why Strategy 3 correlates with age.

In order to establish whether professional development and the use of motivational teaching strategies are connected, a series of correlational tests were performed. Firstly, formal professional development shows a correlation (r = 0.185, p = 0.033) significant at the 0.05 level with Strategy 7 - Bringing a variety of learning materials into the classroom. This confirms the findings of Moor and his colleagues (Moor et al., 2005), which state that one of the benefits of professional development is the access to a variety of teaching materials, which the teachers appear to apply in their own teaching practice later. When it comes to informal professional development, a correlation significant at the 0.01 level (r = 0.248, p = 0.004) was found with Strategy 1 – Circulating around the classroom to observe each student carefully. A potential explanation is that the teachers who read or watch useful materials, or engage in informal conversation with colleagues might see the significance in this strategy and apply it more often. The motivational effects on students should be considered here, and there is a need for further research in order to reach more general conclusions. Furthermore, informal professional development exhibited a correlation significant at the 0.05 level (r = 0.185, p =0.033) with Strategy 6 – Providing individual support to each student. Combined with circulating around the classroom, this strategy might be a valuable aspect of being an involved, supportive teacher in a learner-centred classroom. Another correlation significant at the 0.01 level (r = 0.256, p = 0.002) was discovered between informal professional development and Strategy 7 – Bringing a variety of learning materials. This can, again, be connected to teachers' increased access to materials, due to professional development. Finally, informal professional development correlates with the average use of motivational teaching strategies at the 0.01 level (r = 0.517, p = 0.000), which was expected and it confirms the initial hypothesis that teachers who develop themselves apply teaching strategies more frequently. It can also suggest that informal means of professional development are more related to EFL teachers' use of motivational teaching strategies. The implications of this are that teachers should be encouraged to develop themselves professionally, especially through informal means of professional development. Furthermore, the discovery that EFL teachers' involvement in professional development is related to their use of motivational teaching strategy emphasises the significance of professional growth and should serve as an incentive to teachers who wish to improve their teaching practice and motivate their students.

Further, it was discovered that motivational teaching strategies correlate with one another. Some of the most significant correlations, according to the author's impressions, will be presented below. Namely, Strategy 1 - Circulating around the classroom and Strategy 6 - Providing individual support to students show a correlation significant at the 0.01 level (r = 0.299). This correlation might be explained with the assumption that a teacher who circulates around the class-

room is more likely to notice that a student is in need of the teacher's assistance, and they are more likely to provide that assistance to the student than a teacher who sits behind the desk and is not able to notice a student in need of support. The joined effects of these two strategies are certainly worth examining, as they could be invaluable in motivating students and improving their language learning process. Strategies 12 – *Providing rewards and praise to students*, 14 – *Using humour in the classroom*, 15 – *Performing in a positive manner*, 16 – *Behaving in a friendly manner*, and 17 – *Displaying enthusiasm for teaching English* all correlate with one another (see Table 5). The reason why these strategies are particularly significant is that they can contribute to an overall positive classroom atmosphere and a relaxed learning environment, which allows the students to thrive (Dörnyei, 2001). Examining these particular strategies in greater detail could be of great benefit to the understanding of efficient classroom management.

The results of the one-way ANOVA (see Table 6) show that EFL teachers who work at a faculty use Strategy 1 more commonly than those who work at a primary school, secondary school or private school. The results also show that primary school teachers provide more individual support to their students than their private school colleagues, which is unexpected given the size of groups in public and private schools. This relationship should be further examined in order to make rational conclusions. Writing clearly on the blackboard or whiteboard is more commonly done by faculty teachers than primary school teachers. It was also discovered that the teachers who work at a private school bring humour in the classroom less commonly than those who work at multiple places of employment, however, the reasons for this are unclear from this research. That being said, the one-way ANOVA test which was conducted confirmed that there were differences in strategy use between teachers based on their place of employment. The reasons behind the differences should be further examined and the effects that these findings have on the classroom setting should be evaluated. In order to better understand and confirm the results of this research, a more comprehensive one is required, in which both EFL teachers and students should be involved.

The second one-way ANOVA was applied to test whether there are any group differences in motivational strategy use among teachers with different levels of education (see Table 7). The results confirmed the initial null hypothesis – a teacher's level of education is not related to their use of motivational teaching strategies.

6. CONCLUSION

The aim of this paper was to present the findings of the research conducted in order to analyse EFL teachers' use of motivational teaching strategies and the factors which may influence it. This was done through a quantitative study which involved a questionnaire and 133 EFL teachers. Through the data analysis, the following conclusions can be made.

The first hypothesis that professional development is connected to EFL teachers' use of motivational teaching strategies was confirmed, as the results of this research were in line with those of Porter and associates (2000). This can serve as an encouragement to EFL teachers, as their higher involvement with professional development might result in increased use of motivational teaching strategies, and, therefore, improved student motivation. Further research could be done to examine the effects of professional development and motivational strategies on students, and their attitudes towards their teachers' classroom behaviour.

In terms of the place of employment, the hypothesis can be partially confirmed. Although the results of this research show the connection between motivational strategies and place of employment, they are not in line with those of Abbasi (2011), so further examination is required in order to reach more definite conclusions.

Further, the hypothesis that age is not a relevant factor in the use of motivational strategies was largely confirmed, other than one strategy. Besides that, a teacher's level of education also showed no connection to his or her use of motivational teaching strategies.

It should be mentioned that this research had some limitations which might limit the ability to make certain generalisations, the primary being the imbalance between genders of participants. Secondly, given the nature of questionnaire distribution, it can be assumed that those who were motivated to fill the questionnaire are also motivated to develop themselves professionally and use motivational strategies, which could somewhat lead to the lack of a realistic view of the situation. Finally, the research only involved teachers, so students' perspective was not present. A potential resolution to the limitation lies in a more extensive research which involves both students and teachers, more equally distributed across gender and other categories. The research could also be distributed to a larger variety of participants, outside the online means of distribution. That being said, any future research of motivational teaching strategies and teaching practice is highly encouraged, as it could lead to greater insight into teaching practice, as well as its potential improvement.

REFERENCES

Abbasi, A. M. (2011). A Survey of Teaching Strategies in ESL Classroom. *Language in India. Strength for Today and Bright Hope for Tomorrow*, 11(11), 313–329.

Banerjee, A., Chitnis, U. B., Jadhav, S. L., Bhawalkar, J. S., & Chaudhury, S. (2009). Hypothesis testing, type I and type II errors. *Industrial psychiatry journal*, 18(2), 127.

Bomia, L. et al. (1997). *The Impact of Teaching Strategies on Intrinsic Motivation*. Retrieved in May 2023 from https://eric.ed.gov/?id=ED418925.

Chambers, G. N. (1998). *Motivating Language Learners*. Clevedon: Multilingual Matters.

Chen, D., & Yang, X. (2017). Improving active classroom participation of ESL students: applying culturally responsive teaching strategies. *Theory and Practice in Language Studies*, 7(1), 79–86. http://dx.doi.org/10.17507/tpls.0701.10

Cheng, H. F., & Dörnyei, Z. (2007). The use of motivational strategies in language instruction: The case of EFL teaching in Taiwan. *Innovation in Language Learning and Teaching*, *1*, 153–174.

Dörnyei, Z. (2001). *Motivational strategies in the language classroom*. Cambridge University Press.

Dörnyei, Z., & Csizer, K. (1998) Ten Commandments for Motivating Language Learners: Results of an Empirical Study. *Language Teaching Research*, 2, 203–229. http://dx.doi.org/10.1177/136216889800200303

Dörnyei, Z., & Ushioda, E. (2011). *Teaching and researching motivation* (2nd ed). Longman/Pearson.

Elashhab, S. (2020). Motivational Teaching Strategies within Saudi University EFL Classrooms: How to Improve Students' Achievement?. *International Journal of Language and Literary Studies*, 2(1), 124–141. https://doi.org/10.36892/ijlls.v2i1.173

Larson-Hall, J. (2010). A Guide to Doing Statistics in Second Language Research Using SPSS. https://doi.org/10.4324/9780203875964

McEown, M. S., & Takeuchi, O. (2014). Motivational strategies in EFL class-rooms: How do teachers impact students' motivation?. *Innovation in Language Learning and Teaching*, 8(1), 20–38. https://doi.org/10.1080/17501229.2012.741133

Moor, H., Halsey, K., Jones, M., Martin, K., Stott, A., Brown, C., & Harland, J. (2005). *Professional development for teachers early in their careers: An evaluation of the Early Professional Development pilot scheme*. DfES Publications.

Nunan, D. (1998). *Language teaching methodology: A Textbook for Teachers.* New York: Prentice Hall.

OECD (2018). Teaching and Learning International Survey (TALIS) [Data set] Organisation for Economic Co-operation and Development (OECD). Retrieved in May 2023 from https://www.oecd.org/education/school/47788250.pdf.

Porter, A., Garet, M. S., Desimone, L., Yoon K. S., & Birman, B. F. (2000). *Does Professional Development Change Teaching Practice? Results from a Three-Year Study.* American Institute for Research in the Behavioural Sciences.

Solak, E., & Bayar, A. (2014). The Factors Influencing the Motivational Strategy Use of Non-native English Teachers, *International Journal of Education and Research*, 2(2), 1–12.

Vučićević, A. (2023). *Statistički godišnjak Republike Srbije*. Republički zavod za statistiku. https://www.stat.gov.rs/sr-latn/publikacije/publication/?p=15431

Ленка И. Фаркаш Универзитет у Новом Саду Филозофски факултет Одсек за англистику

СТАТИСТИЧКА АНАЛИЗА ПОВЕЗАНОСТИ ИЗМЕЂУ УПОТРЕБЕ МОТИВАЦИОНИХ СТРАТЕГИЈА ПОДУЧАВАЊА И ДРУГИХ ФАКТОРА КОД НАСТАВНИКА ЕНГЛЕСКОГ ЈЕЗИКА КАО СТРАНОГ

Резиме: Значај мотивације у било којој врсти учења је неоспоран, па је то случај и са учењем енглеског језика као страног. Из тог разлога, многи наставници користе мотивационе стратегије попут кружења по учионици, употребе хумора, показивања ентузијазма на предавању и многих других, како би подстакли сво је ученике и одржали њихову мотивацију за учење енглеског језика. Овај рад настоји да представи резултате истраживања спроведеног како би се испитала употреба мотивационих стратегија код наставника енглеског језика, као и фактори који су са њом повезани. Истраживана су четири фактора: искуство са професионалним развојем наставника, њихово место запослења, старост и ниво образовања. Резултати истраживања су показали да је професионални развој, посебно неформалан, повезан са употребом мотивационих стратегија подучавања. Место запослења је такође показало повезаност са мотивационим стратегијама, док старост и ниво образовања наставника нису показали ту повезаност. У складу са резултатима, ауторка овог истраживања указује на потребу за даљим истраживањем у области мотивационих стратегија и наставе језика, како би се дошло до закључака који би могли допринети унапређењу наставе и њених исхода.

Кључне речи: мотивационе стратегије, мотивација, наставник енглеског језика, настава.