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Perception of the Part-Time Teachers' Professional Development Needs, Barriers, Feedback, and Job Satisfaction: Case of Serbia from Talis 2013 Sample

Abstract

The research aimed to determine significant relationships between selected dimensions of professional life and the work of part-time teachers in a sample of respondents in the Republic of Serbia. In testing the model on a sample from the TALIS 2013 (Teaching and Learning International Survey), which consisted of dimensions of professional development (general and specific), barriers to professional development, evaluation and job satisfaction, showed statistically significant relationships between feedback, specific needs of professional development, and less significant links between the general needs of professional development and the barriers to this development with job satisfaction. Quantitative methods were followed to report the results of the cross-sectional study. Partial least square structural equation modelling (PLS-SEM) was utilised to assess the quantitative data. Research with this sample of surveyed teachers has not been done so far.

Keywords: *part-time teachers, professional development needs, feedback, job satisfaction, Serbia*

Introduction

A limited and relatively small number of recent research reports on the professional development of part-time teachers highlight its importance for this marginalised group of actors in school life (Mizell, 2010; Williams, 2010; Reevs,

2010; Thessin & Starr, 2011; Norton, 2013). The education and school systems, it is stated in these reports, have failed to provide regular professional development and in-service teacher training programmes that could create a dynamic resource for increasing quality (Mizell, 2010; Williams, 2010; Darling-Hammond et al., 2017; Morgan & Bates, 2018). Training, workshops, teaching and educational strategies, tools for assessing and motivating students, and information on where to look for the necessary resources – all need to be developed to increase the efficiency and quality of teachers' work for a certain time (Badri et al., 2016; Fang et al., 2021).

The daily challenges of these teachers are how to deal with insufficiently operationalised lesson plans and how to compensate for losses resulting from delays in professional development and training (Norton, 2013; Karlberg & Bezzina, 2020). For them, deficiencies in evaluation mean that they have not been able to take the opportunity to change their practice, nor have they been able to suggest necessary improvements (Thessin & Starr, 2011). Consequently, there are appeals from several levels and horizons to provide these teachers with conditions for more meaningful professional development (at least as well as that for teachers with permanent contracts) (Reeves, 2010; Williams, 2010).

These appeals are not entirely new. They had appeared in the literature since the 1980s, when the professional status of temporary teachers and the specifics of their position in education and school systems were discussed more intensively than before.

Reports on the results of part-time teachers' self-assessment at the end of the last century often emphasise that they are fully trained to organise quality teaching and perform assigned tasks but that they did not receive deserved professional respect (Clifton & Rambaran, 1987). The dominant orientation in self-reporting was a concern for one's own professional status. Among the special elements of this status, it was concerned about professional isolation (marginalisation), lower salaries and opportunities for paid professional training. Part-time teachers, in these reports, claim to be frustrated by the gap that exists between their professional aspirations and what happens in schools and classrooms (Koelling, 1983; Rawson, 1981). Out of the desire to overcome the resentment and frustration of part-time teachers, attempts were made to overcome this situation with numerous suggestions and recommendations. Part-time teachers have weak bargaining power. Therefore, they sometimes are exposed to more stress than is necessary in the workplace – caused by, e.g., additional supervision. They are rarely offered professional development in classroom management and curriculum.

In the literature of that period, researchers focused on the problem of professional status: part-time teachers know that they have the professional qualification

of a teacher and feel that they are professionals, but they also feel that they are not treated as real professionals. These teachers are committed to understanding their professional needs and want to be involved in their professional development. However, their role is unclear, and studies show that they must become aware of their professional responsibilities.

In general, part-time teachers need additional skills and knowledge. They must possess, „conquer and adopt" flexibility to make even little progress in the context of the „unknown and non-close" classroom (Jennings, 2001). From this perspective, it is evident that the experience of teaching of part-time teachers is different from the experience of permanent teachers (contract class teachers), so it is necessary to develop a sophisticated teaching repertoire. As they do not have complete satisfaction, they are convinced that the only way to achieve their goals is to impress permanent employees and everyone else. They find it difficult to move through the horizontal and vertical channels of promotion, which results in resentment and a sense of professional and social displays.

Following growing expectations and high standards, the professional development of teachers is perceived by the broader and narrower professional public as a solution to achieve the goal of ensuring the high quality of teachers (Vu Cao et al., 2014). In a large sample of reviewed research articles and reports on research results (more than 400), in a seminal meta-analysis, Dede et al. (2008) synthesised five topics that are most often discussed in focus groups and seminars for professional development of teachers: goals for improvement (such as classroom management strategies and improved learning outcomes), methods for improvement (interventions to improve teacher pedagogy), suggestions related to content and skills, instructions on how best to teach, and surveys to evaluate the programme.

Professional (in-service) training of part-time teachers, especially areas and topics on classroom management and student disciplines, are the most pronounced needs for professional development of these teachers. The authors emphasise these topics: how to teach students with special needs, use advanced classroom management techniques, and lesson planning when there is a lack of preparation material (Ostapczuk, 1994; Jones, 1999; Tracy, 1998). Content analysis of surveys in researches of perception and self-reports on situations for which part-time teachers are least prepared (Bontempo & Deay, 2003), showed that it is possible to identify seven categories of professional development in which in-service part-time teachers need support: classroom procedures and plans, knowledge of the curriculum, learner differences, school rules and regulations, organising learning experiences, and presenting themselves in a professional role. In line with the specific context in which part-time teachers work, Henderson et al. (2002) identified

areas in which administrators should evaluate part-time teachers: classroom management, communication between the substitute teacher and the full-time teacher, interactions with students, lesson plan implementation, enthusiasm, language use, cooperation with staff and faculty, and the care shown toward the classroom and instructional materials.

Research Problem

With all this in mind, the research problem was to examine whether there are and how pronounced are the links between different dimensions of professional development, evaluation and job satisfaction of part-time teachers in a sample of these teachers from Serbia extracted from the TALIS 2013 survey. We were also interested in whether the professional development of teachers in our sample of respondents is dimensioned in a specific way, having in mind all the listed special characteristics of this group of teachers and their professional practice.

Research Focus

The research focused on the characteristics and significant relationships between needs and barriers in the professional development of part-time teachers, the importance of evaluation changes in teaching and job satisfaction as dimensions that we consider to be salient characteristics and whose nexus has not been specifically and frequently examined.

Research Methodology

General Background of Research

The presented study aims to determine whether there is a significant relationship between different dimensions of the professional characteristics of part-time teachers in Serbia. We used data from a TALIS 2013 study on the responses of these teachers on professional development (needs and barriers), evaluation and feedback, and job satisfaction. It was not our research intention to compare the attitudes of these teachers with the attitudes of full-time teachers, as *ad nauseam* is usually the case in empirical research and analysis of literature. We reckon that these part-time teachers did not deserve the status of „dummy variable".

Sample

TALIS is an international teacher survey that collects information on teachers' beliefs, practices and working conditions. The teacher questionnaire for the 2013

survey contains 50 question groups covering teacher and school characteristics, professional development, feedback, pedagogy, attitudes to teaching, school climate and job satisfaction. A major part of TALIS is related to the professional development of teachers. The survey reflects teachers' experiences concerning professional development. The total number of N=763 teachers with a non-permanent contract was examined on their teaching and professional practice attitudes.

Instrument and Procedures

To examine the attitudes of part-time teachers on professional development (needs and barriers), feedback and job satisfaction, we used the corresponding scales and items from the database for the TALIS 2013 study with a sample of respondents from Serbia (OECD, 2014). These are Likert-type scales, five/seven-point estimation type, linear and centroid shape and form. Quantitative methods were followed to report the cross-sectional study results using SPSS 17, JASP 0.16.1 and Smart PLS 3.2.7 software; partial least squares structural equation modelling (PLS-SEM) was utilised to assess the quantitative data. Assessment of the measurement model ensures the constructs have a good indicator loading, convergent validity, composite reliability (CR), and discriminant validity for the second phase, i.e., structural model assessment. The structural model assessment identifies the path coefficients and analyses their respective significance.

Before conducting partial least squares structural equation modelling for selected dimensions that we tested on our sample of part-time teachers, we tested the factor structure of professional development (PD) needs dimensions since the largest number of items and issues related to this dimension. For them, in exploratory factor analysis (EFA) and parallel analysis (PA), we obtained and confirmed a two-factor solution for professional development needs (we named and interpreted these two factors as PD General Needs (10 items; McDonald's ω = 0.890) and PD Specific Needs (4 items; McDonald's ω = 0.697)), and confirmed a one-factor solution for the professional development barriers dimension PD Barriers (7 items; McDonald's ω = 0.750). The results of confirmatory factor analysis (CFA) show for this model of professional development dimensions (PD General, PD Specific, PD Barriers) satisfactory indicators of model fit indices that are within the prescribed limits: χ^2 = 11.858 / p = 0.053; RMSEA: 0.048; SRMR: 0.042; CFI: 0.929; NFI: 0.918; AFS: 0.989; MFI: 0.990.

Results

The first parts of the results are data related to measuring the reflective constructs in the model. Hair et al. (2019) suggest analysing reflective indicator loadings, internal consistency reliability, convergent validity, and discriminant validity for this type of measurement. The first table presents the results for reflective factor loadings. In the first step, some variables did not pass this test since their loadings were below 0.708 and were extracted from the later analysis. In the second step, it is clear from Table 1 that all factors had loadings higher than the thresholds of 0.708, which is the minimum according to Hair et al. (2019).

Table 1. Construct Reliability and Validity

	Cronbach's Alpha	rho_A	Composite Reliability	AVE*
Feedback – Change	0.981	0.982	0.983	0.802
Job Satisfaction	0.881	0.894	0.905	0.544
PD Barriers	0.888	0.892	0.912	0.597
PD Needs – General	0.923	0.925	0.935	0.590
PD Needs – Specific	0.809	0.814	0.874	0.636

AVE: Average Variance Extracted

Table 1 also presents internal consistency reliability and convergent validity, measured by Cronbach's Alpha, Composite Reliability, and average variance extracted (AVE). According to the data, internal consistency and convergent validity are satisfied for all three reflective constructs (Cronbach's Alpha between 0.70-0.90, max 0.95; Composite reliability between 0.70 and 0.95; AVE ≥ 0.50). In the case of discriminant validity, the Fornell-Larcker criterion and Heterotrait-Monotrait Ratio (HTMT) were performed. Discriminant validity means that each construct captures a unique phenomenon not represented by any other construct in the model (Hair et al., 2019). In both tests, all constructs reached the suggested thresholds (HTMT<0.90) from Table 2.

The multicollinearity analysis showed that all variance inflator factors did not surpass the value of 5, which points to the Colinearity issues (Hair et al., 2019). The final part of the analysis was to explore the relations between dimensions related to professional development needs, feedback and job satisfaction.

Table 2. Discriminant Validity – Fornell-Larcker Criterion
and Heterotrait-Monotrait Ratio (HTMT)

Fornell-Larcker Criterion					
	Feedback – Change	Job Satisfaction	PD Barriers	PD Needs – General	PD Needs – Specific
Feedback – Change	0.896				
Job Satisfaction	0.264	0.738			
PD Barriers	0.243	0.198	0.773		
PD Needs – General	0.274	0.157	0.496	0.768	
PD Needs – Specific	0.283	0.227	0.466	0.759	0.787
Heterotrait-Monotrait Ratio (HTMT)					
	Feedback – Change	Job Satisfaction	PD Barriers	PD Needs – General	PD Needs – Specific
Feedback – Change					
Job Satisfaction	0.270				
PD Barriers	0.251	0.206			
PD Needs – General	0.284	0.167	0.536		
PD Needs – Specific	0.314	0.254	0.539	0.872	

Table 3. Path Coefficients (Mean, STDEV, T-Values, P-Values)

	Original Sample	Sample Mean	STD	T Statistics	P Value
Feedback -≥ Job Satisfaction	0.211	0.211	0.054	3.865	0.000
Feedback -≥ PD Needs – General	0.163	0.162	0.051	3.213	0.001
Feedback -≥ PD Needs – Specific	0.181	0.180	0.049	3.699	0.000
PD Barriers -≥ Feedback	0.243	0.243	0.056	4.314	0.000
PD Barriers -≥ Job Satisfaction	0.106	0.099	0.086	1.229	0.219
PD Barriers -≥ PD Needs – General	0.456	0.455	0.068	6.698	0.000
PD Barriers -≥ PD Needs – Specific	0.422	0.422	0.066	6.355	0.000
PD Needs – General -≥ Job Satisf.	0.099	0.096	0.095	1.044	0.293
PD Needs – Specific -≥ Job Satisf.	0.193	0.196	0.085	2.274	0.023

All coefficients representing the relationships between the reflective constructs, independent and dependents are positive and statistically significant with $p < 0.01$ (Table 3), except the coefficients for the relationship between barriers and job satisfaction and general professional development needs and job satisfaction ($p = 0.219$ and $p = 0.293$, respectively).
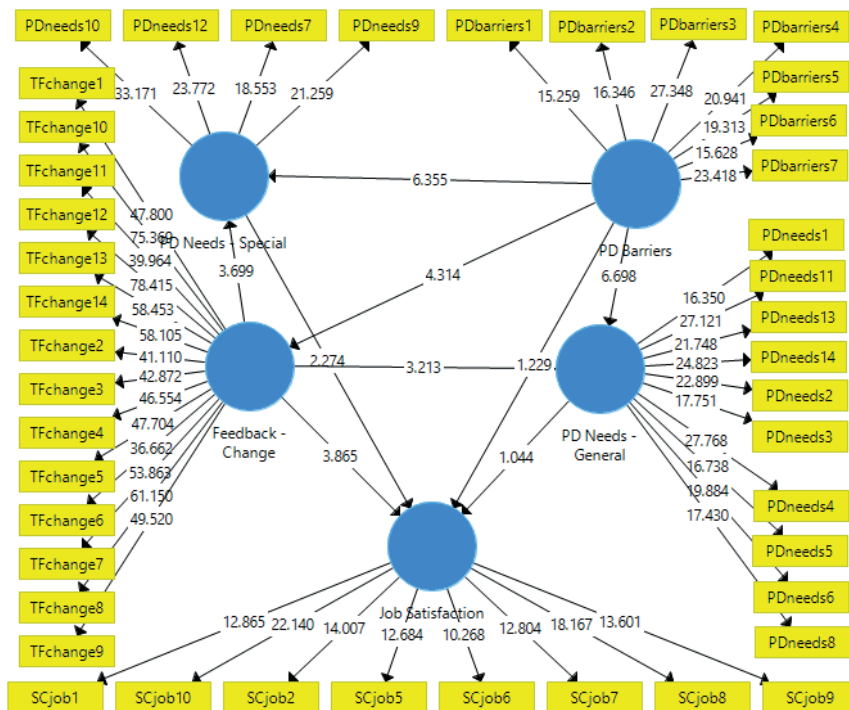
Figure 1. Bootstrapping results for the significance of the relationships

Discussion

The results show that in our sample of part-time teachers, we can identify a significant relationship between the specific needs in professional development (1), of which the need for better results with new technologies in teaching and working with students with special needs, the need to through feedback changes the quality of instruction (2) and job satisfaction (3). On the other hand, it is possible (based on the results) to determine a significant relationship between barriers to professional development and general and specific needs of professional development (which was quite expected) and feedback for the change dimension.

The specific needs for professional development of part-time teachers, whose backbone is the need for better work with new technologies in teaching and working with students with special needs, are statistically significantly more related to job satisfaction of these teachers than general professional development needs and

barriers that appear. The latter was less expected because we assumed that in light of the many obstacles that part-time teachers are forced to overcome, a prominent link between them and job satisfaction would emerge (Beak-Kyoo & Insuk, 2016; Toropova et al., 2021).

Regarding the assessment of the need for teachers to improve in working with new technologies, as stated, they provide opportunities, but it is challenging for part-time teachers (Sheehy, 2012; Morgan & Bates, 2018). We assume that part-time teachers, in the absence of opportunities and offers for professional development, favour this solution as *a panacea*.

Evaluation estimates and feedback for change obtained in this study are consistent with theoretical and empirical analyses in the literature. There is often a lack of respect, cooperation, and support regarding part-time teacher evaluation (Lofthouse & Hall, 2014; Finley & McNair, 2013) and failure of evaluation and informative feedback for part-time teachers (O'Connor, 2009).

Part-time teachers, it can be stated based on the results, when assessing job satisfaction, are more focused on specific conditions for professional development and improvement of professional practice than general and principled potentials that could be developed in a broader and narrower environment. Obstacles that arise are not crucial for assessing satisfaction, as are specific and concrete activities such as user feedback and the ability to deal with problems of specific groups of students and improve their practice with new available teaching technologies.

Conclusions

Although they are responsible for many daily instructions in the classroom, part-time teachers remain on the periphery, never achieving full access to school culture. Part-time teaching is an experience of isolation and separation because full-time teachers support each other and block others from becoming part of the group. The insights and review of the analysis and research results made here should be a prolegomenon for more meticulous work, with empirical research on an appropriate sample of the part-time teachers, rather than a comprehensive answer to the question of the phenomenology of work and professional life of these teachers. Although part-time teachers often demonstrate a commitment to professional practice, they are almost accustomed to functioning on the periphery of the school community. However, that is not a reason for them to survive on the periphery of the interests of the academic community and the scientific research public.

References

Badri, M., Al Qubaisi, A., Mohaidat, J., Al Dhaheri, H., Yang, G., Al Rashedi, A., & Greer, K. (2016). An Analytic Hierarchy Process for School Quality and Inspection: Model Development and Application. *International Journal of Educational Management, 30*(3), 437–459. http://dx.doi.org/10.1108/IJEM-09-2014-0123

Beak-Kyoo, J., & Insuk, L. (2016). Workplace happiness: Work engagement, career satisfaction, and subjective well-being. *Evidence-based HRM a Global Forum for Empirical Scholarship, 5*(2), 206–221.

Bontempo, B. T., & Deay, A. M. (1986). Substitute teachers: An analysis of problem situations. *Contemporary Education, 57*, 85–89.

Carey, R. (1960). The other side of the substitute-teacher coin. *Peabody Journal of Education, 37*(4), 211–215.

Clifton, R., & Rambaran, R. (1987). Substitute teaching: Survival in a marginal situation. *Urban Education, 22*(3), 310–327.

Darling-Hammond, L., Hyler, M. E., & Gardner, M. (2017). *Effective Teacher Professional Development*. Learning Policy Institute.

Dede, C., Ketelhut, D. J., Whitehouse, P., & McCloskey, E. M. (2008). A Research Agenda for Online Teacher Professional Development. *Journal of Teacher Education. 60*(1), 8–19. DOI: 10.1177/0022487108327554

Duggleby, P., & Badali, S. (2007). Expectations and Experiences of Substitute Teachers. *The Alberta Journal of Educational Research*, 53(1), 22–33.

Fang, G., Chan, P. W. K., & Kalogeropoulos, P. (2021, July–September). Secondary School Teachers' Professiona Development in Australia and Shanghai: Needs, Support, and Barriers. *SAGE Open*, 1–11. https://doi.org/10.1177/21582440211026951

Finley A., & McNair, T. B. (2013). *Assessing underserved students' engagement in high-impact practices*. Association of American Colleges and Universities.

Galloway, S. (1993). "Out of Sight, out of Mind": A Response to the Literature on Supply Teaching. *Educational Research, 35*(2), 159–169.

Hair, J. F., Risher, J. J., Sarstedt, M., & Ringle, C. M. (2019). When to use and how to report the results of PLS-SEM. *European Business Review, 31*(1), 2–24. https://doi.org/10.1108/EBR-11-2018-0203

Henderson, K. A., Hodges, S., & Kivel, B. (2002). Context and dialogue in research on women and leisure. *Journal of Leisure Research, 34*, 253–262.

Jennings, B. (2001). Supply is demanding. *Times Educational Supplement*. http://www.tes.co.uk/search/search_display.asp?section=Archive&sub_section=Scotland&id=343792&Type=0

Jenkins, S., Smith, H., & Maxwell, T. (2009). Challenging experiences faced by beginning casual teachers: here one day and gone the next! *Asia-Pacific Journal of Teacher Education, 37*(1), 63–78.

Jones, K. (1999). Managing substitute teaching: Here's How. *Principal, 18*(2), 1–4.

Karlberg, M., & Bezzina, C. (2020). The professional development needs of beginning and

experienced teachers in four municipalities in Sweden. *Professional Development in Education*. DOI: 10.1080/19415257.2020.1712451

Koelling, C. H. (1983). Substitute teachers – school policies and procedures in the North Central Region. *Education, 104*, 155–171.

Lofthouse, R. M., & Hall, E. (2014). Developing practices in teachers' professional dialogue in England: using Coaching Dimensions as an epistemic tool. *Professional Development in Education, 40*(5), 758–778. https://doi.org/10.1080/19415257.2014.886283

Mizell, H. (2010). *Why Professional Development Matters*. Learning Forward.

Morgan, D., & Bates, C. (2018). Seven Elements of Effective Professional Development. *The Reading Teacher, 71*(5), 623–626. DOI: 10.1002/trtr.1674

Norton, B. (2013). *Identity and Language Learning*. Multilingual Matters.

O'Connor, K. (2009, September/October). No substitute left behind. *Principal*, 32–36.

Ostapczuk, E. D. (1994). What makes effective secondary education substitute teachers? Literature review. *ERIC ED,* 374 075.

Pietsch, M., & Williamson, J. (2009). "*I'm tentatively teaching": Crossing the border from student of teaching to teacher of students.* Teacher education crossing borders: Cultures, contexts, communities and curriculum, conference of the Australian Teacher Education Association (ATEA), Albury, 28 June–1 July.

Rawson, D. V. (1981). Evaluation, feedback necessary – increasing the effectiveness of substitute teachers. *NASSP Bulletin, 45*, 81–84.

Reeves, S., Lewin, S., Espin, S., & Zwarenstein, M. (2010). *Interprofessional teamwork for health and social care.* Blackwell-Wiley.

Ringle, C. M., Wende, S., & Becker, J. M. (2015). *SmartPLS 3*. SmartPLS GmbH. http://www.smartpls.com

Sheehy, K. (2012). *States, districts require online ed for high school graduation.* https://www.usnews.com/education/blogs/high-school-notes/2021/10/22/states-districts-require-online-ed-for-high-school-graduation

Shreeve, W., Nicely-Leach, J., Radebaugh, M., Morrill, C., & Slatton, S. (1987). Substitute teachers: The professional contradiction. *Early Child Developmental Care, 29*, 313–319.

Sprague, D. (2006). Research agenda for online teacher professional development. *Journal of Technology and Teacher Education, 14*(4), 657–661.

Thessin, R. A., & Starr, J. P. (2011). Supporting the Growth of Effective Professional Learning Communities Districtwide. *Phi Delta Kappan, 92*(6), 48–54. https://doi.org/10.1177%2F003172171109200611

Tracy, S. B. (1988). Improve substitute teaching with staff development. *NASSP Bulletin, 72*(508), 85–88.

Toropova, A., Myrberg, E., & Johansson, S. (2021). Teacher job satisfaction: the importance of school working conditions and teacher characteristics. *Educational Review, 73*(1), 71–97. DOI: 10.1080/00131911.2019.1705247

Vu, Cao, & Vu, Cepero. (2014). Factors Driving Learner Success in Online Professional Development. *The International Review of Research in Open and Distance Learning, 15*(3). 120–139.

Weems, L. (2003). Representations of Substitute Teachers and the Paradoxes of Profession-
alism. *Journal of Teacher Education, 54*(3), 254–265. DOI: 10.1177/0022487103252007

Williams, G. (2010). Research into Part-time Higher Education Supply and Demand. *Social Research Report No. 08/2010*. Welsh Assembly Government.

Zubrzyck, J. (2012). Substitute teaching undergoes new scrutiny. *Education Week*. http://www.joycefdn.org/assets/1/7/EdWeek36substitutes.pdf