

INFLUENCE OF TEACHING EXPERIENCE, WORK MOTIVATION AND THEIR INTERACTION ON TEACHING EFFECTIVENESS OF SECONDARY SCHOOL TEACHERS

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Abstract

In this study, we investigated the impact of teaching experience, work motivation, and their potential interaction on the teaching effectiveness of secondary school teachers in the Shopian district of Kashmir valley. A sample of 195 secondary school teachers was selected through stratified random sampling from both government and private schools. The sample comprised 134 males and 61 females, with 124 teachers from government schools and 77 from private schools. Furthermore, 88 teachers were classified as highly experienced, while 113 were considered less experienced. Teaching effectiveness and work motivation were assessed using Varma and Gangrade's and Aggarwal's scales, respectively. Surprisingly, the study's findings indicate that neither work motivation nor teaching experience had a significant influence on the teaching effectiveness of these secondary school teachers in the Shopian district. Furthermore, the interaction between work motivation and teaching experience did not yield a significant impact on teaching effectiveness. These results provide valuable insights into the dynamics of teacher effectiveness and underscore the need for further exploration of factors contributing to effective teaching in this context.

Key Words: Secondary School Teachers, Teaching Effectiveness, Teaching Experience and Work Motivation.

Introduction

Teachers are widely recognized as a critical determinant of students' academic success and lifelong outcomes, as demonstrated by research from Chetty et al. (2014), Rivkin et al. (2005), and Rockoff (2004). This recognition has spurred a strong emphasis on enhancing teacher effectiveness, primarily defined by Goe (2007) in terms of fostering student learning growth, typically assessed through standardized tests. Chetty et al.'s (2014) findings further underscore the transformative potential of highly effective teachers, showing that students taught by such educators, as defined by student growth percentile (SGPs) and value-added

measures (VAMs), are more likely to attain higher education, higher incomes, residence in affluent neighborhoods, increased retirement savings, and a reduced likelihood of teenage parenthood. The imperative to understand the factors contributing to teacher effectiveness is evident in their ability to significantly shape the lives of their students. However, as discussed in detail later in this report, studies have yielded mixed results regarding the relationship between specific teacher characteristics and student achievement, as noted by Wayne and Youngs (2003). In short Teacher effectiveness refers to a teacher's ability to positively impact student learning and achievement. Effective teachers create engaging and inclusive learning environments, employ sound instructional strategies, and tailor their teaching to meet the diverse needs of their students. Research has shown that highly effective teachers have a profound and lasting influence on their students, leading to improved academic performance, higher educational attainment, and better life outcomes.

Teaching Experience

Teacher experience, defined as the number of years a teacher has spent in the classroom, has been a subject of extensive research with mixed findings. Several studies, including Clotfelter et al. (2006) and Rice (2003), have revealed a positive relationship between teacher experience and student achievement in subjects like reading and mathematics. Moreover, research by Wiswall (2013), Papay and Kraft (2015), Ladd and Sorenson (2017), and a Dutch twin study by Gerritsen et al. (2014) emphasized the cumulative effect of teacher experience on student outcomes. However, contrasting studies, such as those by Blomeke et al. (2016), Gustaffsson and Nilson (2016), Hanushek and Luque (2003), Luschei and Chudgar (2011), and Wilson and Floden (2003), have failed to consistently identify significant associations between teacher experience and student achievement. Additionally, Pil and Leana (2009) highlighted the importance of gaining experience within the same grade level over multiple years, indicating a positive relationship with student achievement. These findings collectively emphasize the nuanced nature of the relationship between teacher experience and student outcomes, with early years showing more significant impacts and specific grade-level continuity potentially enhancing effectiveness.

Work Motivation

Work motivation is one of the most important constructs in psychology, being largely studied by academics and practitioners (Gomes & Borba, 2011). According to Gomes and Borba (2011), this construct is present in all work contexts, for example in education. In this context, one concept – teacher motivation – is a decisive factor for school success (Jesus & Lens, 2005). Several studies (e.g., Cardelle-Elawar, Irwin, & Lizarraga, 2007; Santisi, Magnano, Hichy, & Ramaci, 2014) underlined that this concept is crucial for student motivation and school functioning. A review of Jesus (2003), on this subject, evidenced that the majority of studies did not present a solid theoretical approach and the main addressed topics were the salary incentives,

premises also corroborated by the work of Mueller and Hanfstingl (2010). In turn, Addison and Brundrett (2008) argued that teacher motivation is undervalued, in terms of research, comparatively to student motivation. Despite this situation, numerous aspects point to the importance of teacher motivation. Teachers have great influence on student motivation, especially because of the: (a) quality of teaching; (b) student performance; (c) class well-being; (d) improvement of students' self-efficacy beliefs; and (e) development of the teacher-student relationship (Santisi et al., 2014). In terms of school functioning, teachers are crucial in the implementation of educational policies (Jesus, 1996). In sum, teachers are fundamental in classroom and school management. Thus, it is important to address the constraints that affect these professionals and contribute to their demotivation.

Objectives of the Study

The objectives of this study are twofold:

- To investigate the impact of Work Motivation on the Teaching Effectiveness of secondary school teachers in the Shopian district of Jammu and Kashmir.
- To examine the influence of Teaching Experience on the Teaching Effectiveness of secondary school teachers in the same district.

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Hypothesis of the study

- There is no significant influence of Work Motivation on Teaching Effectiveness of secondary school teachers of district Shopian of J&K.
- There is no significant influence of Teaching Experience on Teaching Effectiveness of secondary school teachers of same district.

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Method

This quantitative study employs a descriptive research design to investigate the relationship between work motivation and teaching effectiveness among 195 secondary school teachers in the Shopian district of Kashmir, affiliated with the J&K Board of School Education. The sample was selected randomly, with schools stratified randomly within the district, encompassing both government and private schools. The sample includes teachers aged 24 to 50 years, all of whom possess a good socioeconomic status and educational qualifications. The teacher sample is further categorized into 134 males and 61 females, 124 from government schools and 77 from private schools, and 88 highly experienced teachers and 113 less experienced teachers. Data collection utilized two standardized tools: the Teaching Effectiveness Scale by Varma and Gangrade (2014) and the Work Motivation Scale by

Aggarwal (2005). To analyze the data and explore the influence of work motivation and teaching experience on teaching effectiveness, 2x2 ANOVA was employed, in line with the study's objectives and design.

Analysis and Interpretation

Influence of teaching experience, work motivation and their interaction on teaching effectiveness of secondary school teachers

The main objective of this study was to examine the combined influence of Teaching Experience, Work Motivation, and their potential interaction on the Teaching Effectiveness of secondary school teachers in the Shopian district of Jammu and Kashmir. The study categorized participants into two distinct groups based on their Work Motivation levels, namely the Low Work Motivation group and the High Work Motivation group. Similarly, participants were divided into two groups based on their Teaching Experience, creating the High Experience and Low Experience groups. Consequently, the research employed a two-way ANOVA approach with unequal cell sizes for data analysis.

Prior to delving into the statistical analysis, the study ensured that the underlying assumptions for ANOVA were met. Two crucial assumptions were evaluated: the Normality of distribution and the homogeneity of variance. The Kolmogorov-Smirnov (K-S) test was employed to assess the Normality of the distribution of Teaching Effectiveness scores among secondary school teachers with varying levels of Teaching Experience are given in the table 1.

Table 1: Summary of Kolmogorov - Smirnov^a Test of Normality for Teaching Effectiveness of Secondary School Teachers of different Teaching Experience

Variable	Teaching Experience	Kolmogorov-Smirnov ^a		
		Static	Df	Sig.
Teaching Effectiveness	High Experience	0.097	86	0.055
	Low Experience	0.100	109	0.059

From the above table, it is clear that the value of Kolmogorov-Smirnov^a statistics for Teaching Effectiveness of High Experience secondary school teachers is 0.097, for which the significance level is 0.055 with $df = 86$, which is greater than the 0.05 level of significance, therefore it is not significant at 0.05 level of significance. Hence the null hypothesis “The Teaching Effectiveness scores of High Experience secondary school teachers of district Shopian of J&K do not significantly deviate from normality” is **not rejected**. Therefore, it can be concluded that the Teaching Effectiveness scores of High Experience secondary school

teachers of district Shopian of J&K are normally distributed.

From table 1: it is clear that the value of Kolmogorov-Smirnov^a statistics for Teaching Effectiveness of Low Experience secondary school teachers is 0.100, for which the significance level is 0.059 with $df = 109$, which is greater than the 0.05 level of significance, therefore it is not significant at 0.05 level of significance. Hence the null hypothesis “The Teaching Effectiveness scores of Low Experience secondary school teachers of district Shopian of J&K do not significantly deviate from normality” is **not rejected**. Therefore, it can be concluded that the

Teaching Effectiveness scores of Low Experience secondary school teachers of district Shopian of J&K are normally distributed.

Vide table 1: it is clear that teaching Effectiveness scores of High and Low Work Motivation secondary school teachers of district Shopian of J&K are normally distributed

For testing assumption of homogeneity, the Leven’s Test of equality of variance was applied. The results are given in the table 2.

Table 2: Summary of Levens Test for Equality of Variance for Teaching Effectiveness of Secondary School Teachers of Different Teaching Experience

Levens Statistic	df1	df2	Sig.
0.031	1	193	0.681

From table 2: it is clear that the value of Leven’s statistics is 0.031, for which the significance level is 0.681 with $df (1,193)$ which is greater than the 0.05 level of significance, therefore it is not significant at 0.05 level of significance. Hence the null hypothesis “There is no significant difference in the variance of Teaching Effectiveness scores of secondary school teachers of district Shopian of J&K of different Teaching Experience” is **not rejected**. Thus, it can be concluded that variances of Teaching Effectiveness scores of secondary school teachers of district Shopian of J&K across the different Teaching Experience is homogenous.

Vide table 2: it is clear that Teaching Effectiveness scores of secondary school teachers of district Shopian of J&K of different Work Motivation group is homogenous

It is clear from above that the assumption of Normality and Homogeneity was found to be true for the present objective. Thus, the assumption of parametric tests holds true. So, to analyze the third objective 2x2 factorial design ANOVA was used. The results are given in the table 3:

Table 3: Summary of Two-Way Factorial Design ANOVA Influence of Work Motivation, Teaching Experience and Their Interaction on Teaching Effectiveness

Source of Variance	SS	Df	MSS	F-Value	Sig.
Work Motivation	13818.694	1	13818.69	6.929	0.059
Teaching experience	4930.162	1	4930.162	2.472	0.118
Work Motivation * Teaching experience	66.648	1	66.648	0.033	0.855
Error	380896.824	191	1994.224		
Total	1.360E7	195			
Corrected Total	403625.949	194			

Influence of Work Motivation on Teaching Effectiveness of Secondary School Teacher

From the table 3: it is evident that the calculated F-value for Work Motivation is 6.929 with $df = 1, 191$ whose two tailed probability of significance is 0.059 which is greater than the table value of 0.05. Hence this value is not significant at 0.05 level of significance. In view of this, the null hypothesis that “There is no significant influence of Work Motivation on Teaching Effectiveness of secondary school teachers of district Shopian of J&K” is **not rejected**. Thus, it can be concluded that the *Teaching Effectiveness of secondary school teachers of district Shopian of J&K was found to be independent of their Work Motivation*.

The findings of the study revealed that there is no significant influence of work motivation on teaching effectiveness of secondary school teachers. This has been already discussed under caption of the first objective of this study

Influence of Teaching Experience on Teaching Effectiveness of Secondary School Teachers

From the table 3. it is evident that the calculated F-value for Teaching Experience is 2.472 With $df = 1, 191$ whose two tailed probability of significance is 0.118 which is greater than the table value of 0.05. Hence this value is not significant at 0.05 level of significance. In view of this, the null hypothesis that “There is no significant influence of teaching Experience Teaching Effectiveness of secondary school teachers of district Shopian of J&K” is **not rejected**. Thus, it can be concluded that the *Teaching Effectiveness of secondary school teachers of district Shopian of J&K was found to be independent of their Teaching Experience*.

Secondly, the finding of this study revealed that no significant influence of teaching experience as low and high on teaching effectiveness of secondary school teachers was found.

This finding has consistency with the findings of Shah, Beens (1991). The findings in this way suggest that there is no significant difference in the teaching effectiveness of low and high experience teachers. The reason behind this may be that high experienced teachers have observed the facts very keenly and are well adjusted in the system. While as low experienced teachers are being well trained with modern techniques and methods. Thus, they are equally affected in the teaching effectiveness process.

Influence of Interaction of Work Motivation and Teaching Experience on Teaching Effectiveness of Secondary School Teachers

From the table it is evident that the calculated F-value for the interaction of Work Motivation and Teaching Experience is 0.033 with $df = 1,191$ whose two tailed probability of significance is 0.855 which is greater than the table value of 0.05. Hence this value is not significant at 0.05 level of significance. In view of this, the null hypothesis that “There is no significant influence of interaction of Work Motivation and Teaching Experience on Teaching Effectiveness of secondary school teachers of district Shopian of J&K” is **not rejected**. Thus, it can be concluded that the *Teaching Effectiveness of secondary school teachers of district Shopian of J&K was found to be independent of interaction of Work Motivation and Teaching Experience*.

Thirdly, the finding of this study revealed that was being found no significant influence of interaction of work motivation teaching experience on teaching effectiveness of secondary school teachers. This finding was supported by the finding of Gehlawat, Manju (2013). The findings of the study revealed that teaching effectiveness of high and low experience teachers of high and low work motivation groups are same. This may be due to the fact that teaching may be improved with better modern techniques and methods which does not relies on experience of the teachers. Nowadays, the teachers are well trained and educated, so that their teaching may be effective and everlasting in the minds of students.

Conclusion

In conclusion, our study delved into the intricate interplay between teaching experience, work motivation, and their interaction concerning the teaching effectiveness of secondary school teachers. The findings of this research shed light on the multifaceted nature of effective teaching in this specific educational context.

Firstly, we discovered that teaching experience alone did not exhibit a statistically significant influence on teaching effectiveness among secondary school teachers. This suggests that while experience is undoubtedly valuable, other factors may play a more pivotal role in determining teaching effectiveness within the Shopian district.

Secondly, our study revealed that work motivation, in isolation, did not significantly impact teaching effectiveness. This underscores the complexity of motivating teachers and the need to explore additional factors contributing to their effectiveness.

Lastly, the interaction between work motivation and teaching experience did not yield a statistically significant influence on teaching effectiveness. This suggests that the combined effect of these factors, at least in this particular context, did not have a substantial impact on teaching outcomes.

Overall, these findings highlight the intricate nature of effective teaching and emphasize the importance of considering a broader range of variables and contextual factors that may influence teaching effectiveness in the Shopian district. Future research endeavors should continue to explore the multifaceted dynamics of teaching to better inform educational policies and practices aimed at enhancing the quality of education and student achievement.

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