

Assessing the Impacts of Occupational Stress on Primary School Teachers: A Study of the Walapane Zone, Sri Lanka

Abstract

Occupational stress is one of the critical elements that influences the health and efficiency of the organizations, especially the teachers and, more so, the primary school teachers. This research looks into the consequence of work-related stress for primary school teachers in one of the educational zones in Walapane, Sri Lanka. To carry out this study, data from 107 teachers through a self-administered questionnaire was collected. The research found that work-family conflicts and health impacts are the reason for 34.2% of the variance in occupational stress levels. Nevertheless, 65.8% of occupational stress data remain unexplained, suggesting other influencing factors such as level of workplace engagements, absenteeism, chronic stress, and stress at the workplace. The conclusion calls for stress exercising measures, innovative yoga, meditation, sports, and 'working-oriented' systems to enhance work-life balance. It suggests certain organisational implementation measures aimed at enhancing working conditions.

Keywords: Occupational stress, Primary school teachers, Walapane-Sri Lanka,

1. INTRODUCTION

According to the World Economic Forum, 3 out of 4 children do not get access to preschool education, while the majority of them require early childhood education. Early childhood education is an important building block not just for children's development but for society as a whole. Therefore, it needs to be prioritized. However, it is unfortunate how the educators who hold such an important role in children's overall personality development are always under intense pressure. These stress levels can lead to improper work ethic, and managers are unable to track the wellness of the workers. The following study seeks to examine the vast effects of stress on one's professional and personal life. In addition, the study also emphasizes adopting stress relievers and providing proper support in order to promote healthy and safe learning environments.

This particular study looks at the issue of occupational stress amongst primary teachers in Sri Lanka, which is a growing problem around the globe. Moreover, the study aims to delve deeper into the impacts of mental stress and how it affects the teaching quality, productivity and overall classroom environment. The research aims to address the teacher's problems and provide recommendations for development activities that enhance the teaching environment.

Work-related stress is a growing concern within the workplace as it causes a shift in both employees' and organizations' perspectives. Issues such as personal attributes, other family-related issues, and/or economic problems can be sources of work-related stress. In the United States, approximately 5.3% of teachers tend to leave their job roles as stress becomes overwhelming (Lambert, Lauren, Paul, & Christopher, 2018).

2. LITERATURE REVIEW

In regards to occupational stress, it has been noted that there exists a consistent trend of teacher turnover in the US Supervision systems. This has been coupled with a worrying increase in levels of teacher stress despite investment in professional development programs. Anxiety levels among 97.3% of teachers increased further stress levels among teachers (Alan, Chan, & Elaine, 2010). Teacher stress stems from negative emotional states, which can either be anger or depression as long as the perception exists that a situation is threatening to their self-esteem or their well-being. It has, on the other hand, Teachers of primary school teaching had bothersome symptoms, they experienced a lot of stress than those teachers in secondary or high school. Other factors such as job insecurity, low worker motivation, distress, and lack of requisite amount of touch suffered during off sick days all serve to increase occupational stress.

The cybernetics theory on - occupational stress emphasizes the variables of the surroundings in a work set up that alters the reaction of a system in order to adapt and achieve organizational and individual goals (Cooper, Cummings, & Cary, A Cybernetic Framework for Studying Occupational Stress, 1979).

Table 1: Variables identifies from Literature

Variables	Author
Work-family Conflicts	(Natasha, David, Maureen, & Carol, 2004), (Nart & Batur, 2014)
Job Performance	(Sandra, Agustinus, & Basillus, 2020), (James & House, 1974)
Behavioural changes	(James & House, 1974), (Natasha, David, Maureen, & Carol, 2004), (Wadesango, Gudyanga, & Mberewere, 2015)
Health Impacts	(Natasha, David, Maureen, & Carol, 2004), (Spector, 2002), (Sharon & Cary, 2010)
Environment	(Lambert, Lauren, Paul, & Christopher, 2018), (Antoniou, Vasiliki, Fotini, & Olga, 2023)

3. METHODOLOGY

The study was quantitative in nature and causal comparative relationships were determined. A well-defined research design, including the type of study, research approach and time horizon, is important in gathering adequate and relevant information during the survey. The explanatory type of study is applied together with cause-effect analysis in investigating occupational stress towards primary teachers in the Walapane educational zonal of Nuwara Eliya District. Teachers are selected, and the study draws examples of the focus on the work-family interface, working performance, changes in behaviour, usual health problems, the right learning settings, and occupational strain. The analysis uses statistical methods to establish the statistical relationship among the variables that have been identified and to test the hypotheses made in the study. This research seeks to determine the effects brought about by occupational stress to primary teachers in a cross-sectional time horizon where the researched variables occupations were at a particular time. The hypothesis which was formulated in this study is that there is a significant relationship between independent variables, which were the independent variables which were identified in this study, and the dependent variable, which is occupational stress.

The sample size was 107 respondents, who provided a data set from filling in the quasi-structured questionnaire. Before giving the revised questionnaire, the questionnaire was revised accordingly.

4. Results

The sample includes 59.81% male primary teachers and 40.19% female primary teachers. The concentration of femininity is noticeably over 28.97% of those who are 26-35 years old. 25.23% are between 36-45, who are followed by 16.82%, who are between 46-55. The fewest respondents aged between 56 years and above were 15.89% and 18-25 were the final with 13.98%. The sample consists of married primary teachers constituting 65.42%, 30.84% unmarried and 3.74% divorced. There were 30.84% unmarried and 3.74% divorced. The majority of the sample, comprising 34.58%, had 11 to 20 years of working experience as a teacher. Following this was 28.04% with 21 to 30 Years of Experience (Yrs). 15.89% had 31 years or more of teaching. The sample included 23.36% of teachers who taught grade 5, 20.56% of teachers who taught grade 4, 22.43% who taught grade 3, 22.43% of the teachers having A1 classes and 11.21% who taught grade 1.

According to the study, work-family conflict, job performance, behavioural change, health impact, and proper learning environment differ by 0.45, 0.35, 0.37, 0.39, 0.40, and 0.36, respectively about the mean. Only one variable of occupational stress has been analyzed in relation to all others cumulatively together in the present study.

Cronbach's Alpha is a coefficient of reliability that indicates the extent to which the items on a scale or a questionnaire are related consistently (Cronbach's Alpha : Level of Reliability, n.d.). The high score of 0.907 suggests high internal consistency and reliability of the items used in this study. The Measured Cronbach's Alpha depends on the standard items with the average and range of variables.

Multiple regression analysis and correlation analysis is conducted using SPSS ver.29.0 to analyse the inferential data.

In this study, the variance of independent variables only explained 34.2% of the variance of the dependent variable (occupational stress among primary-level teachers).

Other 65.8% can be explained by other variables which were not identified in the literature review. Therefore, occupational stress among primary level teachers is affected only 34.2% by work family conflict, job performance, behavioural changes, health impact and proper learning environment which were identified in this research.

The F-statistic is obtained by dividing the "Regression" term's mean square by the "Residual" term's mean square. It calculates the proportion of explained to unexplained variation. The F-statistic is 10.520 in this instance.

The p-value for the F-statistic is shown in the Significance field. The F-statistic's statistical, is evaluated using the p-value. Given that the p-value in this instance is ".001b," it is very close to zero (significantly less than 0.001) and is hence low. This shows that the regression model's overall results are statistically significant.

In this study according to the Beta values the independent variables such as work family conflicts and health impacts have a positive relationship between the dependent variable occupational stress while the remaining independent variables such as job performance, behavioural changes and proper learning environment have a negative relationship with the dependent variable.

- **Correlation Analysis**

Occupational stress and work-family conflict have a 0.084 Pearson correlation coefficient. Since this number is close to zero, there is only a very weak positive correlation between the two variables.

The Pearson correlation coefficient between occupational stress and job performance is -0.122. The negative value of this ratio shows a weak negative correlation between the two variables.

The Pearson correlation coefficient between occupational stress and behavioural changes is -0.115. The negative value of this ratio shows a weak negative correlation between the two variables.

Occupational stress and health impact have a Pearson correlation coefficient of 0.543. The negative value of this ratio shows a moderate positive correlation between the two variables.

Occupational stress and a proper learning environment have a correlation coefficient of -0.095. The correlation between these two variables is extremely weakly negative, as indicated by this number.

Table 2: Summary of the Hypothesis

No	Hypothesis	Results
H1	Work-Family Conflicts and Occupational Stress among primary school teachers have a Significant relationship.	Do not Reject
H2	Job Performance and Occupational Stress among primary school teachers have a Significant relationship.	Do not Reject
H3	Behavioural Changes and Occupational Stress Among primary school teachers have a significant relationship.	Reject
H4	Health impacts and Occupational Stress among primary school teachers have a significant relationship.	Do not Reject
H5	Proper learning environment and Occupational Stress among primary school teachers have a significant relationship.	Reject

5. DISCUSSION

The study found that only 34.2% of occupational stress among primary level teachers is explained by independent variables, while 65.8% is due to other variables. Work family conflict, job performance, behavioural changes, health impact, and proper learning environment were identified as significant factors. Beta values showed a positive relationship between work family conflicts and health impacts, while job performance, behavioural changes, and proper learning environment had a negative relationship.

Because the independent variables such as work family conflicts and health impacts tend to increase due to the increase in occupational stress and hence the study has identified that these two variables have positive relationship with occupational stress. On the other hand, the independent variables such as job performance, behavioural changes, and proper learning environment have negative relationship with occupational stress because they tend to reduce when the occupational stress increases. Finally, three hypotheses were not rejected, while two were rejected.

The other variables which can explain the rest of the 65.8% of the impacts of occupational stress which were not identified in the literature of this study could be absenteeism, conflicts with co workers, domestic and workplace violence, over reactions to little provocation, low tolerance of

frustration, development of negative unhealthy and unproductive escapist individual and organizational behaviours and mental illnesses linked to stress such as schizophrenia, claustrophobia, agoraphobia and depression. Additionally prolonged chronic stress results in burnout.

6.CONCLUSION AND RECOMMENDATION

This study had the objectives to investigate the consequences of job stress related to working environments with primary level teachers, with specific emphasis on work family conflicts. The analysis showed that there was a positive association between occupational stress and work family conflicts, a negative association between occupational stress and job performance and a positive correlation between occupational stress and health impacts. The research aimed to also present other recommendations in order to manage occupational stress of most of the teachers such as doing yoga, meditation, sporting activities, engaging in hobbies, reading, sleeping, browsing social media, undergoing therapy, travelling or exercising. These recommendations focus on the primary research question and seek to assist primary level teachers in managing occupational stress.

The study is interesting because it shows the focus of the primary teachers on their occupational stress issues. Examples of these inclusive work stressors are work family conflicts, effects on job performance and effects on health. It recommends that teachers should not ignore these matters and find ways to try to manage work and family life properly so as to help in reducing work stress. Others are the coping strategies of the affected teachers that are gathered in order to manage these issues. Work performance may in fact be affected as well since teachers are expected to focus on their work and be self-evaluative to gauge how well they have performed at work.

Health impacts are inevitable due to their role in engaging with students and maintaining a healthy lifestyle. The provided suggestions can help teachers overcome these impacts and maintain a pleasant work life.

Furthermore, Research gaps that were identified are, since this study consider only the primary school teacher's occupational stress and teachers from only one educational zone, the sample size can be expanded by including Secondary school teachers from all of the Nuwara Eliya district or the central province in order to capture various sample characteristics. Also this expansions of sample could be identified as the future Research area.

Disclaimer (Artificial intelligence)

Option 2:

Author(s) hereby declare that generative AI technologies such as Large Language Models, etc. have been used during the writing or editing of manuscripts. This explanation will include the name, version, model, and source of the generative AI technology and as well as all input prompts provided to the generative AI technology

Details of the AI usage are given below:

1. OpenAI. (2024). *ChatGPT* (version 4.0) [Large language model]. OpenAI.-For defining some of the key terms required for the article

References

- Aaker, A., Kumar, V. D., & George, S. (2000). *Marketing Research*. New York: John Wiley and Sons Inc.
- Ackoff, R. L. (1953). *The Design of Social Research*. Chicago: University of Chicago Press.
- Alan, H. S., Chan, K. C., & Elaine, Y. L. (2010, March). Work Stress of Teachers from Primary and Secondary Schools in Hong Kong. *Proceedings of the International Multi Conference of Engineers and Computer Scientists, III*.
- Altheide, D. L., & Johnson, J. M. (1994). Criteria for Assessing Interpretive Validity in Qualitative Research. In *Handbook of Qualitative Research* (pp. 485-499).
- Antoniou, Vasiliki, Fotini, & Olga. (2023). Occupational Stress in Main Stream and Special needs of Primary School teachers and its relationship with self Efficacy. *Educational Studies*.
- Baker, T. L. (1994). *Doing Social Research* (2nd Edition ed.). New York: McGraw Hill Inc.
- Cooper, Cummings, G. T., & Cary, L. (1979). A Cybernetic Framework for Studying Occupational Stress. *Human Relations*, 32, 395-418.
- Cooper, Peter, Hart, & Cary. (2001). Occupational Stress: Toward a more Integrated Framework. *Handbook of Industrial, Work and Organizational Psychology*.
- Cronbach's Alpha : Level of Reliability*. (n.d.). Retrieved from Research Gate: https://www.researchgate.net/figure/Cronbachs-Alpha-Level-of-Reliability_tbl5_316859646
- David, W., & Peter, B. (2003). *Using Research Instruments: A guide for Researchers*. London: Taylor and Francis Group.
- Edwin, R., & Vanora, H. (2001). The Importance of Pilot Studies: Social Research Update.
- Fitzgerald, P. (2020). *Burnout in Primary School Teachers: The Impact of Occupational Stress, Social Support and Physical Activity*. Dublin Business School.
- Gaziel, & Haim. (1993). Coping with Occupational Stress among Teachers: A Cross-Cultural Study. *Comparative Education*, 29, 67-79.
- Hair Jr, J. F., Black, W. C., Babin, B. J., & Anderson, R. E. (2018). *Multivariate Data Analysis* (8 ed.). Annebel Ainscow.
- Hamed, T. (2016). Sampling Methods in Research Methodology: How to choose a sampling technique for research. *International Journal of Acedemic Research in Management (IJARM)*, 5(2), 18-27.

- Haradhan, K. M. (2017). Two Criteria for Good Measurements in Research: Validity and Reliability. *Munich Personal RePEc Archive*, 58-82.
- Hasan, & Ansarul. (2014, April). A Study on Occupational Stress of Primary School Teachers. *Educationia Confab*, 3, 11-19.
- House, J., & LaRocco, J. (1980, September). Social Support, Occupational Stress and Health. *Journal of Health and Social Behaviour*, 21, 202-218.
- James, & House, S. (1974, March). Occupational Stress and Coronary Heart Disease: A Review and Theoretical Integration. *Journal of Health and Social Behavior*, 15, 12-27.
- Joseph, M. (1970). *Social and Psychological factors in Stress*. New York.
- Julie, P. (2016). *SPSS Survival Manual* (6th Edition ed.).
- Katoch, Nain Sing, & Anupama. (2017, July). Study of Occupational Stress of Secondary School Teachers. *International Journal of Advanced Education and Research*, 2, 28-31.
- Kavitha, K., & Hassan, N. C. (2018). Work Stress Among Teachers: A Comparison Between Primary And Secondary School Teachers. *International Journal of Academic Research in Progressive Education and Development*, 7(4), 60-66.
- Krejcie, V. R., & Morgan, D. W. (1970). *Determining Sample Size for Research Activities: Educational and Psychological Measurement*.
- Kyriacou, C., & Sutcliffe, J. (1978). A model of teacher stress. *Educational Studies*, 4, 1-6.
- Lambert, R., Lauren, B., Paul, F., & Christopher, M. (2018). Risk for occupational Stress among U.S Kindergarden teachers. *Journal of Applied Developmental Psychology*.
- Legesse, B. (2014). *Research Methods in Agribusiness and Value Chains*.
- Luthans, F. (1994). *Organisational Behaviour*.
- Marshall, J., & Cooper, C. L. (1976). Occupational Sources of Sress: A review of Literature relating to coronary heart disease and mental ill health. *Journal of Occupational Psychology*, 49, 11-28.
- Mortimer, A. H., & Trumbull, R. (1967). *Psychological Stress*. (eds, Ed.) New York.
- Nart, S., & Batur, O. (2014). The relation between work-family conflict, job stress, organizational commitment and job performance: A study on Turkish Primary Teachers. *European Journal of Research on Education*, 2(2), 72-81.
- Natasha, C., David, C., Maureen, D., & Carol, E. (2004). A Review of Occupational Stress Interventions in Australia. *International Journal of Stress Management*, 11, 149-166.

- Nurul, I., Saidi, M., & Haslinda, A. (2010, October). Assessment of Stress and its Risk factors among Primary School Teachers in the Klang Valley, Malaysia. *Global Journal of Health Science*, 2, 163-171.
- Ogunmakin, Moyosola, & Abel. (2014, May). Job Satisfaction among Secondary school Teachers: Emotional Intelligence, Occupational Stress and Self Efficacy as Predictors. *Journal of Education and Social Research*, 487- 498.
- Olaitan, L., Oyerinde, O., Obiyemi, O., & Kayode, O. (2010, March 4). Prevalence of Job Stress among Primary School Teachers in South-West, Nigeria. *African Journal of Microbiology Research*, 4(5), 339-342.
- Pakarinen. (2010). Classroom Organization and Teacher Stress predict learning motivation in kindergarden children. *European Journal of Psychology of Education*, 25, 281-300.
- Sandra, I. A., Agustinus, K. W., & Basillus, R. W. (2020, June). Work Related Stress and Performance among primary school teachers. *International Journal of Evaluation and Research in Education*, 9(2), 352-358.
- Saunders, M., & Thornhill, A. (2009). *Research Methods for Business Students*. Pearson Education LTD.
- Selye. (1956). *The stress of life*. New York.
- Sharon, G. C., & Cary, L. C. (2010, July 14). The Risk Management of Occupational Stress. *Health, Risk and Society*, 173-187.
- Spector, P. E. (2002, August). Employee Control and Occupational Stress. *Current Directions in Psychological Science*, 11, 133-136.
- Sutton, & Robert. (1984). Job Stress among Primary and Secondary School Teachers. *Work and Occupations*, 11, 7-28.
- Wadesango, N., Gudyanga, E., & Mberewere, M. (2015). Occupational Stress among School Head Teachers: A Case for Hwedza District Secondary Schools' Head Teachers. *Journal of Social Science*, 45(1), 31-35.
- Zonal Education Office, W. (2022). *Annual Hand Book*. Walapane.