Job Stress among ECE Teachers of Karachi

Amna Shahid
Institute of Business Management
amna.shahid@iobm.edu.pk

Sarwat Nauman
Institute of Business Management
sarwat.nauman@iobm.edu.pk

Abstract

This research was aimed at discovering the levels of job stress among Early Childhood Education (ECE) teachers of Karachi and the contribution of their marital status on job stress. The research method was quantitative in nature, for which two hypotheses were formed. First hypothesis assumed that the ECE teachers of Karachi would have a significant level of job stress and the second assumed that there would be a noteworthy dissimilarity between the scores of job stress of married and single teachers of ECE. For this purpose, 127 single and married ECE teachers from schools of Karachi responded to an adapted form of Job Stress Inventory (JSI), which measured their level of overall job stress. The results revealed that the ECE teachers of private schools of Karachi did not face any significant level of job stress and both, married and single ECE teachers experienced the same level of stress at job.

Keywords: early childhood education; ECE teachers; job stress; teacher stress

Introduction

The word stress was first used by an endocrinologist Hans Selye in 1930’s to refer to the conditions of organisms while they reacted and adjusted to their environments (Viner, 1999). Earlier, in 1920s, Walter Cannon had termed the phenomenon of animals reacting to dangers and fears with an overall stimulation of sympathetic nervous system as acute stress response which later became the first of the three stages of General Adaptation Syndrome (GAS) as proposed by Selye (1976). Selye discovered that if a range of stimuli are to be presented to an
organism for long periods of time, they may produce responses that are general and not only specified to the stimulus presented. According to Selye, stress is a condition established by a disorder that includes all the non-specifically triggered fluctuations in the body (Krohne, 2001). Payne stated that psychological well-being ensues from an ultimate level of motivation. When people report that they are feeling stressed, they are actually experiencing more stress than they can cope with; hence, every living being is always under stress, but realizes it only when it is unable to handle it (Payne & Donaghy, 2010).

Stress does not only come from trauma or severe incidents like accident or death, but it can also be caused by everyday problems that persist over long periods of time. There may be concerns of work and employment, such as disproportionate demands at job, insecurity of job, conflicts at work, lack of authority, inadequate training, unproductive and time-consuming assemblies, meetings and seminars and hectic travelling schedules (Agarwal, 2015; Chandani, Mehta, Mall & Khokhar, 2016). Stressors can also be internal, causing stress from within the mind or body of the person experiencing stress (Agarwal, 2015; Ahmad & Ashraf, 2016). Not only negative feelings, fears, worrisome thoughts and unrealistic perfectionist expectations cause stress but so do customary behaviors such as overscheduling, failing to be persistent and postponing tasks and dwindling beyond the deadlines are also examples of stressors (Miller, Smith & Rothstein, 1994). Despite these factors, people generally prefer ignoring it or continuing to experience it without seeking any treatment, medication or therapy until it gets out of hand and starts showing noticeable affects.

Stress affects the mind, body, behavior, daily functioning as well as relationships (Lupien, McEwen, Gunnar & Heim, 2009). Stress coming from the job or the job environment impairs work related behavior and relationship with colleagues and afflicts socialization, eating and sleeping patterns outside the workplace (Jackson & Maslach, 1982). The consequences of job stress on performance of employees persist in every profession (Murray-Gibbons & Gibbons, 2007); therefore, similarly, job stress may have negative effects on the performance of teachers in classroom as well. Stress in teachers may be caused by their personal traits such as procrastination, obsession with perfection, being disorganized, or by job factors such as workplace conflicts, workload, cramped classroom, lack of privacy or excessive school timings. It may affect their creativity, their problem solving...
skills, the way they teach or their overall classroom management (Montgomery & Rupp, 2005), ultimately effecting the academic progress of their students. Since stress not only affects our life but also the lives of individuals related to us therefore it cannot be neglected and must be addressed. The Following hypotheses were developed to test through this research:

- H1: There is a significant level of job stress among ECE teachers of Karachi
- H2: There is a significant difference between the job stress levels of single and married ECE teachers.

**Literature Review**

**General Adaptation Syndrome**

According to the General Adaptation Syndrome model given by Selye (1936), the changes that occur in the body due to stress, progress in three stages (as shown in Figure 1.1). The model of General Adaptation Syndrome consists of alarm, resistance and exhaustion, the three reactions to stress that advance in a progression.

![Figure 1. General Adaptation Syndrome model](image)

Selye (1936) explained the model through the various stages; in first stage, body enters into an alarm reaction, and physiological responses are organized either into shock phase, or the counter-shock phase. Shock phase is where the body is excited with an adrenaline rush and counter-shock phase is where the body prepares to get defensive and adrenocortical activity is increased. If stressful stimuli are continued to be presented, body enters the second phase; i.e. resistance. While the
body resists harmful stimuli for some time, its resistance to other kind of stressors, which previously the body was overcoming, reduces simultaneously. If stressful stimuli persist, then the body enters into the third stage where body gets exhausted from trying to adapt to the stressors, and there may come a point where the organism becomes week and dies of exhaustion (Krohne, 2001). Critics argue that Selye’s General Adaptation Syndrome seems to be fixated on the physical stressors only and the element of emotional impact of stress and the human ability to perceive and interpret stressful involvements is overlooked. This may be because his work on this model was the outcome of experiments performed on animals.

Relationship Between Demand and Performance

Stress was redefined by Cox and Macay in 1976 as a mental phenomenon. According to them, stress was generated when people are unable to meet the demands and expectations other people have from them. They developed a model that displays the relationship between the work expectations from an individual and their performance.

![Figure 2. Relationship between demand and performance](image)

According to the model, increasing demands improve performance to a point, after which, if the demands continue to grow, performance starts declining.
Eustress is the positive stressor that improves performance because it is perceived to be within our coping abilities, it is short-term, hence ignites motivation and excitement (Nelson & Simmons, 2005). Distress in contrast is the negative stressor that lowers an individual’s performance. It may be short-term or long-term, and causes concerns and anxiety because it is perceived to be beyond one’s coping capabilities (Lupien, McEwen, Gunnar, & Heim, 2009). Therefore, stress is not a negative influence as long as it challenges individuals and helps them perform better. In this paper, distress, the negative stressors would be discussed.

**Job Stress**

Some work settings are unusually stressful and negatively impact mental and physical health of employees resulting in frequent malfunctioning of employees and gradual deformation of the organizations. Job stress may be triggered by macro system, such as economic, political, and social factors that affect the environment of an organization, and microsystem, such as the factors of job role and performance conditions (Anbazhagan & Rajan, 2013). Nonetheless, job stress cannot be classified as a disease, because employees respond to stresses in ways that can be negative or positive, conditional to the types of challenges and expectations they face, level of control they possess over any stressful situation, extent of support they obtain from superiors and coworkers, and the way they respond to the stressful situation in terms of their thoughts, behaviors, and attitudes.

Increased job stress has a negative impact on various areas of personal and professional life. A study conducted on police officers (males and females) showed that job stress affected their personal lives, where they exhibited more anger, showed a lack of tolerance at home and were likely to stay away from their home (Jackson & Maslach, 1982). Kawakami, Araki and Kawashima (1990) carried out a cohort revision on 15 Japanese factory workers who had lately developed symptoms of major depression, to analyze the relationship between job stress and depression. The results revealed that long term job stress could lead to depression in individuals. Therefore, higher intensities of occupational stress cause less job satisfaction, more negative attitudes towards one’s profession (Agarwal, 2015), reduced efficiency (Bashir & Ramay, 2010), being late to work more often, high amount of absences and turnover (Eskridge & Coker, 1985). Researches also reveal that higher levels of stress and quantitative workload disrupts sleeping patterns (Kalimo, Tenkanen, Härmä, Poppius & Heinsalmi, 2000) and eating habits (Nishitani, Sakakibara &
Akiyama, 2009). Hence, stressed employees are more likely to have an adverse insight on their jobs, higher sensitivity, negative feelings towards coworkers, and deteriorated performance along with personal life disturbances such as mental and physical instabilities.

Teacher Stress

Even though clear differences have been observed in the demographic variables of teachers such as age, marital status, gender and experience (Brown & Ralph, 1992); yet, one out of three teachers consider teaching immensely stressful (Borg & Falzon, 1989; Brown & Ralph, 1992; Solman & Feld, 1989). Brenner and Bartell (1984 as cited in Boyle, Borg, Falzon & Baglioni, 1995) argued that teacher stress is an outcome of actual stressors in school environment and perceived stressors in teaching, characteristics of teachers’ personality and the way they choose to cope. Factors such as role conflict or role ambiguity (Al-Amri, 2004; Pearson and Moomaw 2005), lack of work authority and insufficient autonomy, increased workload and time perseverance and low pay-scales cause job stress in teachers (Alam & Farid, 2011; Rasheed, Humayon & Awan, 2016). According to a research carried out on elementary school teachers in New Zealand, overload of work has the highest rate of causing job stress (Dewe, 1986). At times, the genuine deficiency of competencies in teachers can also be the reason of maladministration initially, and if continued, it eventually results in stress (Lambert & McCarthy, 2006). Pervez and Hanif, (2003) conducted a research in Pakistan on 100 female teachers of primary and secondary schools of Islamabad where Teacher Stress Inventory was used to measure the levels and causes of job stress. Findings suggested that higher number of students in a class may be a reason of work load and teacher’s job stress as well. Therefore, sometimes job stress may have various manageable factors and controlling those factors can significantly reduce job stress.

Marital Status and Job Stress

Recent researches from Pakistan reveal that married women who work are more likely to face job stress because of added responsibilities (Maqsood, Chaudhry, Zia & Cheema, 2005) and experience psychological effects of stress (Sadiq & Ali, 2014) as compared to unmarried working women (Parveen, 2009). Same is the case with married teachers, the workplace stress for them increases due to their household responsibilities (Naseem & Khalid, 2012). Therefore, it can be
assumed that the job stress of married ECE teachers would be higher than the job stress of unmarried ECE teachers since they have added responsibilities and hence lesser time to comply adequately with the work demands.

**Methodology**

Quantitative method was used to collect and analyze data from 127 ECE teachers of private schools in Karachi, Pakistan. The schools were selected through non-probability based judgmental sampling method. It is the most common and effective sampling technique for studying a broad range of participants who have similar experiences (Marshall, 1996). Out of the sample set, 62 teachers were single and 65 were married. All ethical considerations were made without infiltrating or manipulating the results.

**Research Instrument**

A questionnaire of Teachers’ Job Stress was adapted from a subscale of ‘Overall Stress’ from Job Stress Inventory (JSI) developed by Lowman and the Organizational Consulting Center Staff in 2002. JSI is a reliable and valid measure for determining the level of job stress in a wide variety of professions (Zekaj, 2015). Teachers’ Job Stress questionnaire was used to measure the level of overall stress among teachers at school and the difference of job stress score between married and unmarried ECE teachers of Karachi. The questionnaire had three parts: The first part consisted of a consent form, the second part asked for demographic information, and the third part had 20 close ended questions that are based on 5-point Likert scale (0 = Never, 1 = Occasionally, 2 = Somewhat often, 3 = Frequently, 4 = Almost always), and an open ended question regarding stressors at job. 2 was considered the test value, being the mid-point of the Likert scale. Pilot study was conducted on the questionnaire.

**Data Analysis**

Data was coded and analyzed using descriptive statistics through SPSS. Cronbach’s alpha was applied to the questionnaire to assess the internal consistency and reliability of the scale. One-sample t-test was run on the data to test the first hypothesis and independent sample t-test was run to test second hypothesis of this research.
Findings

Reliability Statistics of Questionnaire

The data collected through interviews and questionnaires was organized, tabulated and analyzed. Test to measure the internal consistency or reliability was run on the quantitative questionnaire for job stress among ECE teachers of Karachi, since it was adapted from JSI.

The Cronbach’s alpha was 88.9% for the questionnaire for overall job stress among teachers of ECE, indicating a high level of internal consistency and reliability for the scale.

Hypothesis 1

One-sample t-test was conducted through SPSS to analyze the level of job stress among ECE teachers of Karachi.

Results render $p < .05$, implying that the mean test scores of level of job stress among ECE teachers is significantly less than 2 ($M=1.1362$, $SD=.67063$), which was taken as the threshold level of job stress, suggesting that majority of teachers of ECE are most likely to be coping satisfactorily with the job stress at their schools. Hence Hypothesis 1 stating that there would be a significant level of job stress among ECE teachers of Karachi does not hold true and is rejected.

Hypothesis 2

Independent Sample t-test was conducted on the responses that were obtained from the sample to compare the levels of job stress between married and single ECE teachers. The independent Sample t-test renders that 2-tailed significance ($p$ value) for overall job stress among ECE teachers is .502 ($p > 0.05$), implying that there is no significant difference between the job stress levels of single ($M=1.1774$, $SD=.69019$) and married ($M=1.0969$, $SD=.65436$) ECE teachers. Hence Hypothesis 2 does not hold true and is rejected.

Discussion

The results revealed that the mean job stress level is significantly low among ECE teachers of private schools of Karachi, demonstrating that majority
of teachers may most likely be coping adequately with their job stress. However, through percentage analysis, it was observed that while 64.57% of the respondents had scores significantly lower than 26 on job stress questionnaire, 35.43% of them had a total job stress score of 26 or higher, indicating that they were most probably suffering from a significant level of job stress. This points out that there is a majority of ECE teachers that experiences job stress of minimal level and is able to cope with it, whereas, a minority of ECE teachers experience significant levels of job stress beyond their coping competencies. This percentage is problematic as the education especially in early years is critically important and 35.43% of 127 participants cannot be overlooked.

Research proves that ECE teachers’ enthusiasm to teach and passion to help students learn while catering to their learning needs, showing trust and confidence in the child’s abilities facilitates children to grow cognitively, emotionally and socially (Malik & Khan, 2012). However, results of a recent Albanian research show that majority of teachers experience high levels of stress and it impacts their productivity in classrooms (Ali, Ishtiaq & Ahmad, 2013; Zekaj, 2015). Nurturing students’ citizenship, their psychosocial and socio-emotional areas can develop them into a self-sufficient population (Syed, Asif & Yousaf, 2011). The targeted goals of fruitful ECE education can be only achieved if ECE teachers are stress free.

It is also possible that a certain proportion of teachers who experienced job stress, may have little or no passion for teaching. Research proposes that some of the teachers who experience job stress also confess to having insignificant interest in teaching, resulting in a less enjoyment and more difficulties in their job with every passing day (Sultana, Bano, Bano & Shafa, 2012). This may not necessarily be the case with everyone unless proven otherwise through further research.

Considering the results of the first hypothesis where mean job stress level among ECE teachers of Karachi is below the threshold level, it could most probably be eustress; the stress that is beneficial for professional development as proposed by Cox and Macay (1976). Nelson and Simmons (2005) proposed that eustress enhances performance as it is regarded to be within one’s coping aptitudes, and motivates and ignites excitement. These findings can further be verified by separate analysis of items on job stress questionnaire. In the questionnaire, item 1; I feel little enthusiasm for teaching, item 2; I feel tired even with adequate sleep, item
6; I feel negative, useless, or depressed about teaching, item 10; I feel physically, emotionally or spiritually exhausted, item 18; I am easily bored, and item 19; I feel a sense of dissatisfaction as if something is wrong or missing, all signify lack of excitement and motivation due to job stress. 90.24% of the 64.57% respondents who had scored significantly lower than 26 on job stress questionnaire, had answered to four or more of these items mentioned, with 1 or 0, indicating that they never or occasionally ever felt lack of excitement, referring that they are mostly motivated and enthusiastic about their job. This indicates that the respondents’ reaction to eustress may be that of alarm, as proposed by Selye’s General Adaptation Syndrome (1936). They are either experiencing adrenaline rush or emotional regulation that motivates them in their job. The reason being that the image of their workplace and trainings that they receive from their schools play a substantial affirmative role in developing motivation and enthusiasm (Mahmood, Hashmi, Shoaib, Danish & Abbas, 2014). As per the data of this study, almost all participating schools were private, mostly catering to the middle class, upper-middle class and upper class families, therefore having a sound designation and image for their schools. Moreover, since majority schools under study were well reputed private schools, they are more likely to be providing professional development, a supporting environment among coworkers and constant appreciations and rewards. International researches endorse the impact of school environment and training on reduction of job stress among teachers (Ismail & Abdullah, 2019; Sandilos, Goble, Rimm-Kaufman & Pianta, 2018). A research conducted on private schools of Karachi to govern the elements that regulate job satisfaction of ECE teachers supports the argument that supervision and guidance, appreciation and rewards and support from fellow teachers develop job satisfaction (Bhamani, 2012) and accordingly, the sample of this study exhibited lowers levels of job stress.

Researchers argue that financial position of employees influences level of stress perceived by them (Lazzarino, Hamer, Stamatakis & Steptoe, 2013; Ursache, Noble & Blair, 2015). The sample was mostly of teachers from sufficiently provided, middle class, upper middle class and upper class families as the demographic data revealed that 93.7% of the participants may not have been working for monitory gains or to support their family (40.16% upper middle class families and 53.54% from middle class families). The same was derived from responses to item 20; When I ask myself why I get up and go to school, the only answer that arises in my mind is “my salary.” 80 out of 83 participants, who responded to this item with 0 or
1 were not working for monetary gains. These investigations indicate that majority of participants were financially satisfied hence mean score of their job stress was significantly low.

Results of second hypothesis, in contrast to literature review, indicate that there is a negligible difference between the job stress levels of single and married ECE teachers. These findings are consistent with the results of a study conducted by Aftab and Khatoon (2012) on Indian secondary school teachers where no significant difference was found in the stress of married and unmarried teachers. Research indicates that although married women have added responsibilities, their in-laws still favor their jobs for financial support, and those working women are satisfied by their jobs despite all the issues and challenges (Maqsood, Chaudhry, Zia & Cheema, 2005) so probably joint family culture in Karachi and supportive nature of society helps working women with extra workload or other responsibilities that they can share outside work environment. Also, it must be kept in mind that all teachers, married and unmarried, were from affluent families and hence could afford paid help to cope with the responsibilities at home, leading to lesser stress levels.

**Conclusion and Recommendations**

The results and findings of this research established that the data projects low levels of job stress among majority of ECE teachers of well-established private schools of Karachi, which is a positive sign of a productive contribution of the private education sector in improvement of education quality and learning experiences of young. Moreover, a large number of women from financially stable and emotionally supporting households were found to be teaching with low levels of job stress, technically eustress which enhances performance instead of declining it. It also must be kept in mind that these women enjoyed their work and found teaching at the ECE level to be interesting and motivating. This points towards a brighter future of majority of young privileged children of Karachi. Thus, there were two factors responsible for a healthy level of stress in the teachers: First, they enjoyed working as ECE teachers and second they were not economically pressed.

The schools offering ECE must first make sure that the teachers that they hire should have the aptitude to teach ECE. Also, even when inducting teachers
from lower economical background, the schools must pay well to the teachers so that they can get paid help in case they are either married or have household responsibilities in one form or the other.

References

Aftab, M., & Khatoon, T. (2012). Demographic differences and occupational stress of secondary school teachers. *European Scientific Journal, 8*(5).

Agarwal, R. N. (2015). Stress, job satisfaction and job commitment’s relation with attrition with special reference to Indian IT sector. *Management and Innovation for Competitive Advantage*.

Ahmad, N., & Ashraf, M. (2016). The impact of occupational stress on university employees’ personality. *Journal of Education and Educational Development, 3*(2), 178-202.

Alam, M. T., & Farid, S. (2011). Factors affecting teachers’ motivation. *International Journal of Business and Social Science, 2*(1), 298-304.

Al-Amri, A. A. (2004). Job Stress among Teachers. *J. of King Saud University-Arts, 16*(2), 36-42.

Ali, K., Ishtiaq, I., & Ahmad, M. (2013). occupational stress effects and job performance in the teachers of schools of Punjab (Pakistan). *International Journal of Academic Research in Business and Social Sciences, 3*(11), 665.

Anbazhagan, M., & Rajan, D. L. S. (2013). A conceptual framework of occupational stress and coping strategies. *ZENITH International Journal of Business Economics & Management Research, 3*(5), 154-172.

Bashir, U., & Ramay, M. I. (2010). Impact of stress on employees job performance a study on banking sector of Pakistan. *International Journal of Marketing Studies, 2*(1), 122-126.

Bhamani, S. (2012). Factors Determining Job Satisfaction of Early Childhood Teachers. *IOSR Journal of Humanities and Social Science, 3*(1), 43-48.

Borg, M. G., & Falzon, J. M. (1989). Stress and job satisfaction among primary school teachers in Malta. *Educational Review, 41*(3), 271-279.

Boyle, G. J., Borg, M. G., Falzon, J. M., & Baglioni Jr, A. J. (1995). A structural model of the dimensions of teacher stress. *British Journal of Educational Psychology, 65*(1), 49.

Cartwright, S., Cooper, C. L., & Barron, A. (1993). An investigation of the relationship between occupational stress and accidents amongst company car drivers. *Journal of General Management, 19*, 78-78.
Chandani, A., Mehta, M., Mall, A., & Khokhar, V. (2016). Employee engagement: A review paper on factors affecting employee engagement. *Indian Journal of Science and Technology, 9*(15), 1-7.

Cox, T., & Macay, C. J. (1976). Psychological model of Occupational stress, A Paper presented to medical research council meeting. Mental health in Industry, London. November.

Dewe, P. J. (1986). An investigation into the causes and consequences of teacher stress. *New Zealand Journal of Educational Studies.*

Eskridge, D. H., & Coker, D. R. (1985). Teacher stress: Symptoms, causes, and management techniques. *The Clearing House,* 387-390.

Essa, E. (2013). *Introduction to Early Childhood Education.* Cengage Learning.

Ismail, S. N., & Abdullah, A. S. (2019). A structural equation model describes factors contributing teachers’ job stress in primary schools. *International Journal of Instruction,* 12(1), 1251-1262.

Jackson, S. E., & Maslach, C. (1982). After-effects of job-related stress: Families as victims. *Journal of Organizational Behavior,* 3(1), 63-77.

Kalimo, R., Tenkanen, L., Härmä, M., Poppius, E., & Heinsalmi, P. (2000). Job stress and sleep disorders: findings from the Helsinki Heart Study. *Stress and health,* 16(2), 65-75.

Kawakami, N., Araki, S., & Kawashima, M. (1990). Effects of job stress on occurrence of major depression in Japanese industry: a case-control study nested in a cohort study. *Journal of Occupational and Environmental Medicine,* 32(8), 722-725.

Krohne, H. W. (2001). Stress and coping theories. *The international encyclopedia of the social and behavioral sciences,* 22, 15163-15170.

Lambert, R. G., & McCarthy, C. J. (2006). *Understanding teacher stress in an age of accountability.* Iap.

Lazzarino, A. I., Hamer, M., Stamatakis, E., & Steptoe, A. (2013). The combined association of psychological distress and socioeconomic status with all-cause mortality: a national cohort study. *JAMA Internal Medicine,* 173(1), 22-27.

Lupien, S. J., McEwen, B. S., Gunnar, M. R., & Heim, C. (2009). Effects of stress throughout the lifespan on the brain, behavior and cognition. *Nature Reviews Neuroscience,* 10(6), 434-445.

Mahmood, H. K., Hashmi, M. S., Shoaib, M., Danish, R., & Abbas, J. (2014). Impact of TQM Practices on Motivation of Teachers in Secondary Schools.
Empirical Evidence from Pakistan. *Journal of Basic and Applied Scientific Research, 4*(6), 1-8.

Malik, S. K., & Khan, K. (2012). Contributions of AGA Khan Education Services Pakistan in Early Childhood Development. *Elixir Soc. Sci., 47*(2012), 8731-8740.

Maqsood, R., Chaudhry, B., Zia, Q., & Cheema, A. (2005). Problems of employed women at Faisalabad-Pakistan. *Journal of Agriculture & Social Sciences, 1*(3), 245-247.

Marshall, M. N. (1996). Sampling for qualitative research. *Family practice, 13*(6), 522-526.

Miller, L. H., Smith, A. D., & Rothstein, L. (1994). The stress solution: An action plan to manage the stress in your life. Pocket. In Kerr, C. B. (1997). *Stress and burnout in independent piano teachers in Oklahoma* (Doctoral dissertation).

Milstein, M., & Farkas, J. (1988). The over-stated case of educator stress. *Journal of Educational Administration, 26*(2), 232-249.

Montgomery, C., & Rupp, A. A. (2005). A meta-analysis for exploring the diverse causes and effects of stress in teachers. *Canadian Journal of Education/Revue canadienne de l’éducation*, 458-486.

Murray-Gibbons, R., & Gibbons, C. (2007). Occupational stress in the chef profession. *International Journal of Contemporary Hospitality Management, 19*(1), 32-42.

Naseem, Z., & Khalid, R. (2012). Daily stressors of university teachers of Pakistan: Development and validation of a scale. *Journal of Research, 6*(1), 1-15.

Nelson, D. L., & Simmons, B. L. (2005). Eustress and attitudes at work: a positive approach. *Research Companion to Organizational Health Psychology*, 102.

Nishitani, N., Sakakibara, H., & Akiyama, I. (2009). Eating behavior related to obesity and job stress in male Japanese workers. *Nutrition, 25*(1), 45-50.

Parveen, N. (2009). Investigating occupational stress among married and unmarried working women in Hyderabad City. *Bahria Journal of Professional Psychology, 5*, 21-37.

Payne, R., & Donaghy, M. (2010). *Payne’s handbook of relaxation techniques*. London: Churchill Livingstone.

Bagheri, H., & Bagheri, M. (2013). Equilibration in transcendental Meditation (TM). *Journal of Arts and Humanities, 2*(3), 14-20.

Pearson, L. C., & Moomaw, W. (2005). The relationship between teacher autonomy
and stress, work satisfaction, empowerment, and professionalism. *Educational Research Quarterly, 29*(1), 38-54.

Pervez, S., & Hanif, R. (2003). Levels and sources of work stress among women school teachers. *Pakistan Journal of Psychological Research, 18*(3-4).

Rasheed, M. I., Humayon, A. A., & Awan, U. (2016). Factors affecting teachers’ motivation. *International Journal of Educational Management, 30*(1), 101-114.

Sadiq, R., & Ali, A. Z. (2014). Dual responsibility: A contributing factor to psychological ill-being in married working women. *Academic Research International, 5*(2), 300.

Sandilos, L. E., Goble, P., Rimm-Kaufman, S. E., & Pianta, R. C. (2018). Does professional development reduce the influence of teacher stress on teacher–child interactions in pre-kindergarten classrooms? *Early Childhood Research Quarterly, 42*, 280-290.

Selye, H. (1936). A syndrome produced by diverse nocuous agents. *Nature, 138*(3479), 32.

Solman, R., & Feld, M. (1989). Occupational stress: Perceptions of teachers in Catholic schools. *Journal of Educational Administration, 27*(3).

Sultana, B., Bano, Y., Bano, F., & Shafa, M. D. (2012). The nature and impact of teacher stress in the private schools of Gilgit-Baltistan, Pakistan. *International Journal of Academic Research in Progressive Education and Development, 1*(2), 10-14.

Syed, S. Z., Asif, M., & Yousaf, A. (2011). Rethinking ECE in Pakistan. *Journal of Elementary Education, 21*(2), 65-76.

Ursache, A., Noble, K. G., & Blair, C. (2015). Socioeconomic status, subjective social status, and perceived stress: Associations with stress physiology and executive functioning. *Behavioral Medicine, 41*(3), 145-154.

Viner, R. (1999). Putting stress in life Hans Selye and the making of stress theory. *Social Studies of Science, 29*(3), 391-410.

Zekaj, X. (2015). Impact of stress on teachers’ productivity as an important factor in the increase of educational quality. *Mediterranean Journal of Social Sciences, 6*(2), 245-251. doi: 10.5901/mjss.2015.v6n2s2p245

**Citation of this Article:**
Shahid, A., & Nauman, S. (2019). Job stress among ECE teachers of Karachi. *Journal of Education and Educational Development, 6*(2), 254-268

Received: July 2019
Revised: September 2019
Accepted: October 2019