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Exploring the Relationship Between Self-Esteem and Mental Workload among University Professors

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Abstract:

Introduction: Professors' mental workload is critical as an influential factor in the quality of education and the delivery of educational services. Self-esteem can significantly impact their behavior and performance. This study aimed to investigate the relationship between self-esteem and mental workload in professors.

Methods: This cross-sectional study was conducted in 2023 among 86 professors from all four faculties of Jiroft University of Medical Sciences (Medicine, Nursing and Midwifery, Health, and Paramedical Sciences), who were selected through census sampling. The data were collected using a three-part questionnaire consisting of demographic information, the standardized Rosenberg Self-Esteem Questionnaire, and the NASA Mental Workload Questionnaire. The data were analyzed using the Kolmogorov-Smirnov test, T-test, ANOVA, and Pearson correlation coefficient in SPSS v20 software at a significance level of 0.05.

Results: The majority of professors were aged 30–40 years, 58.1% were men, 72.1% were married, 48.8% held professional doctorate degrees, 53.5% were affiliated with the medical school, and 65.1% had 1–10 years of work experience.

Discussion: The findings revealed that professors experienced a higher-than-acceptable mental workload, while their self-esteem levels were categorized as high. Although an inverse relationship was observed between mental workload and self-esteem, it was not statistically significant. However, there was a significant relationship between mental workload and variables such as educational degree and faculty affiliation.

Conclusion: The study's findings suggest that while higher self-esteem may reduce mental workload among professors, no statistically significant relationship exists between these two factors. Nonetheless, mental workload was significantly associated with educational degree and faculty affiliation.

Keywords: Mental workload, Self-esteem questionnaire, Medical sciences, Nursing, Midwifery, Quality of education.

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1. INTRODUCTION

Mental Workload is a pervasive concept in human factors and ergonomics literature and is a topic of increasing importance [1]. Modern technology in many workplaces imposes more cognitive demands on operators than physical demands, so understanding how mental workload affects performance is of great importance [2]. Mental workload includes: Prediction: The ability to predict the workload level of a new system is valuable for system design. Predicting workload is useful when modifications are made to the system, how it operates, or how it works [2]. Evaluation: The most common application is to compare the workload created by alternative systems with previous systems. Evaluation of the workload levels imposed by a task or system is done to identify and eliminate low-performing units. Diagnosis: Appropriate workload assessment can potentially identify problematic areas and identify the exact nature of the need [3]. According to some research, self-esteem is a fundamental psychological need in the service of individual adaptation [4, 5]. One of the factors that can be somewhat related to the stress experienced by individuals in the workplace is self-esteem [6]. Self-esteem is what a person thinks about themselves. In other words, it is how a person evaluates their self-concept. In other words, self-esteem is defined as a person's subjective assessment of their value as a person [7, 8]. Therefore, people with high self-esteem have a positive attitude towards themselves and accept and respect themselves, while people with low self-esteem often experience doubts and feelings of failure [9]. Research has also shown that low self-esteem in teachers will cause a decline in educational quality and affect the behavior and performance of teachers in the workplace, and have an inverse relationship with the provision of their educational services [10]. On the other hand, studies that focused on increasing self-esteem showed that high self-esteem leads to positive results [11]. Self-esteem increases the individual's productivity and commitment to the organization, ensures the individual's physical and mental health, increases the individual's morale, and is satisfied with life by managing time and quickly learning new job skills.

Various studies have shown that self-esteem can affect employee job retention, performance quality, and productivity [12]. According to Wiens (2022), a teacher's self-esteem affects the strategies used in teaching that actively engage students in the classroom. Teaching knowledge and skills are related to the feeling of self-esteem as a key factor in the teacher's perception of their knowledge and skills [13]. The development of self-esteem is a way to improve activities in educational systems. The brilliance of an individual's action is not enough to bring an organization or company to the peaks of progress and success. Rather, the individual must have the ability to influence, persuade others, and the inner ability to fight for challenging goals in today's competitive environment [14]. What is currently most emphasized is Rogers' theory of self-esteem. The core of this view is based on the fact that humans use all their abilities to achieve self-fulfillment. This view emphasizes the responsibility and ability of the client to solve their problems. That is, individual and social factors play an important role in the formation and development of the (self) and the perceptual context of the individual. The perceptual context of the individual is formed by his evaluations of himself and also by the evaluations of others of him [15]. The qualification of a university professor is based on educational competence and knowledge related to the subject, the success of students in relation to educational achievements, professional growth, active interpersonal communication, and self-esteem [16, 17]. In fact, a person's true awareness of his/her mental and physical characteristics grows with self-concept, and the individual learns that there are ideal characteristics that he/she should have because they help the individual to behave and use skills in accordance with the standards that are valued in society [18]. In this context, the individual creates the ideal self. If teachers respect themselves and others, have self-confidence, care about themselves, build healthy relationships, be good friends to themselves and others [19], accept themselves as they are, and love themselves, their self-esteem increases [18, 20].

Previous research has often addressed burnout, stress, or job satisfaction, but the examination of self-esteem in relation to mental workload adds a valuable perspective. Identifying whether self-esteem mitigates perceived workload can inform support strategies and professional development initiatives for faculty members. The importance of the role of teachers' mental workload as an influential factor in the quality of education and the provision of educational services [21]. Drawing upon theoretical models such as the Job Demands-Resources (JD-R) model and self-determination theory, this study posits that self-esteem, as a key psychological resource, may buffer against the negative impacts of high mental workload in academic settings. By examining this relationship among medical sciences faculty, we aim to provide insight into whether fostering self-esteem could serve as a practical strategy for mitigating occupational stress and enhancing faculty performance. Considering that self-esteem can affect teachers' behavior and performance, researchers examined the relationship between teachers' mental workload and teachers' self-esteem.

2. METHODS AND MATERIALS

This cross-sectional (descriptive-analytical) study was conducted in 2023 among 86 professors from all four faculties of Jiroft University of Medical Sciences (Medicine, Nursing and Midwifery, Health, and Paramedical Sciences), who were selected through census sampling. Inclusion criteria for the study included all full-time professors employed at Jiroft University of Medical Sciences in 2023, who were willing to participate and provided informed consent. The exclusion criteria for participation in this study consisted of withdrawal from continued cooperation, failure to complete more than ten percent of the questionnaire items, and self-declared

neurological or mental disorders among the professors. For data collection procedures, the research objectives were first thoroughly explained to each potential participant, after which those who were willing to participate in the study provided informed consent before proceeding to complete the demographic characteristics information form along with the relevant research questionnaires. During the questionnaire completion process, the researcher closely monitored the proper filling out of all questionnaire items and provided necessary clarifications to answer any questions that the participants might have had. Following data collection, all completed forms and questionnaires were carefully gathered, entered into the SPSS version 20 statistical software package, and subsequently analyzed using appropriate statistical tests with the significance level set at 0.05. The data collection instruments employed in this research consisted of a comprehensive questionnaire comprising three main parts: the first part collected detailed demographic and contextual information, the second part incorporated the standardized Rosenberg Self-Esteem Scale (RSES) [22], and the third part contained the NASA Task Load Index (NASA-TLX) for assessment of cognitive workload [23].

The first section of the questionnaire gathers contextual information about the participating professors, including gender, age group, marital status, highest educational degree obtained, years of professional work experience, and their affiliated faculty within the university. The second section incorporates the standardized Rosenberg Self-Esteem Questionnaire, which consists of exactly 10 carefully worded statements designed to assess self-esteem levels. This validated questionnaire has demonstrated reliability through extensive use in numerous psychological studies. The scoring methodology for the Rosenberg Self-Esteem Questionnaire follows a specific protocol: For items 1 through 5, each agreement response receives a score of +1 while each disagreement response is scored as -1. Conversely, for items 6 through 10, this scoring pattern is reversed with agreement responses assigned -1 and disagreement responses assigned +1. After calculating individual item scores, the total sum is divided by 10 to obtain the final score. These scores are then interpreted according to established guidelines, where a perfect score of 10 indicates very high self-esteem, scores above zero signify high self-esteem, scores below zero reflect low self-esteem, and the minimum score of -10 represents very low self-esteem. The third and final section of the research instrument focuses on evaluating mental workload using the NASA-developed assessment tool.

The NASA Mental Workload Index is a validated multidimensional assessment tool presented in questionnaire format that systematically evaluates cognitive load and mental pressure when assessing specific tasks, operational systems, team performance metrics, or various work-related activities. This comprehensive instrument measures six fundamental dimensions, with three dimensions focusing on operational demands (mental processing requirements, physical exertion levels, and temporal constraints) and three dimensions evaluating performance outcomes (individual achievement levels, expended effort quantities, and frustration/disappointment intensities) [24]. The standardized assessment protocol involves three methodical stages that were rigorously implemented in this investigation. The initial stage requires participants to quantitatively evaluate each of the six workload components using a precisely calibrated 0-100 rating scale with clearly defined bipolar parameters (high versus low) to determine the proportional contribution of each element to overall cognitive load. For enhanced analytical precision in our study, we implemented a five-tier classification system where numerical ranges were categorized as: minimal load (0-9 points), moderate load (10-29 points), elevated load (30-49 points), substantial load (50-79 points), and extreme load (80-100 points). The scale's validity and reliability have been rigorously established through prior research, ensuring its robustness for accurate measurement [25, 26]. Given these established validation studies and the questionnaire's extensive use in peer-reviewed Persian-language research literature, we employed the professionally translated Persian version to maintain methodological consistency. Our sampling methodology employed a complete census approach encompassing all 86 currently employed faculty members at Jiroft University of Medical Sciences. For comprehensive data analysis, we implemented both descriptive statistical measures (including frequency distributions, percentage calculations, central tendency indicators, and dispersion metrics) and advanced inferential statistical analyses (incorporating independent samples t-tests, one-way analysis of variance (ANOVA), and Pearson correlation coefficients) to thoroughly examine variable relationships and test research hypotheses.

This study utilized SPSS version 26 statistical software for data analysis. The initial analytical step involved assessing data normality through the Kolmogorov-Smirnov test. Following confirmation of normal frequency distribution, we employed T-Test and ANOVA analyses to examine relationships between mental workload variables, professors' self-esteem scores, and demographic characteristics. The Pearson Correlation Coefficient test was specifically applied to evaluate the relationship between professors' mental workload levels and their self-esteem measures. Demographic information was presented using descriptive statistics including absolute numbers and percentages.

3. RESULTS

In this study, 86 professors were in the age group of 30 to 40 years, 58.1% were men, 72.1% were married, 48.8% had a professional doctorate degree, 53.5% were in the medical school, and 65.1% had 1 to 10 years of work experience. Table **1** shows information about the background characteristics of professors.

Table 1. Determining the background characteristics of professors.

Variables	Categories	Frequency	Percent
Age	20-30	6	7%
	30-40	48	55.8%
	40-50	32	37.2%
Gender	Female	36	41.9%
	Male	50	58.1%
Marital Status	Single	24	27.9%
	Married	62	72.1%
Degree	Professional Doctorate	42	48.8%
	Specialized Doctorate	20	23.3%
	Master's Degree	24	27.9%
Field of Study	Health	14	16.3%
	Nursing	12	14%
	Medicine	46	53.5%
	Paramedic	6	7%
	Midwifery	8	9.3%
Work Experience	1-10 years	56	65.1%
	10-20 years	24	27.9%
	20-30 years	6	7%

Table **2** shows information about the average self-esteem score of Jiroft University of Medical Sciences professors. The self-esteem score of the professors was 4.7, which is in the range of high self-esteem.

Table 2. Determining the average self-esteem score of professors.

Variables	Mean	Standard Deviation	Minimum	Maximum
self-esteem	4.7	4.9	-10	10

Table **3** shows the information related to the average mental workload score of Jiroft University of Medical Sciences professors. The overall mental workload score of the professors was 6.79, which is in the high range.

Table **4** shows the information related to the relationship between self-esteem and mental workload of professors at Jiroft University of Medical Sciences. The results indicate that there is no statistically significant relationship between self-esteem and the mental workload of professors.

Table **5** shows the information related to the relationship between contextual characteristics and professors' self-esteem. The results indicate that there was no significant relationship between any of the contextual characteristics and professors' self-esteem.

Table **6** shows the information related to the relationship between contextual characteristics and the mental workload of professors. The results indicate that there was a significant relationship between the degree and the faculty and the mental workload of professors, so that the highest mental workload score is observed in the professional doctorate degree group (83.7) and in the medical school.

Table 3. Determining the average mental workload score of professors.

Variables	Mean	Standard Deviation	Minimum	Maximum
Mental workload	79.6	15.7	20	110
Mental stress	83.7	14.3	40	110
Physical stress	78.8	15.8	30	110
Time pressure	78.8	15.8	30	110
Overall performance	79.3	15.1	40	110
Level of failure	80.2	16.8	20	110
Effort	77.4	20.3	20	110

Table 4. Determining the relationship between self-esteem and the mental workload.

Variables	Self-esteem	
Mental workload	Correlation coefficient	*p*-value
	0.047	0.677

Table 5. Determining the relationship between contextual characteristics and professors' self-esteem.

Variables		Mean	Standard Deviation	*p*-value
Age	20-30	4.6	2.6	0.925
	30-40	4.6	4.9	
	40-50	5.6	5.4	
Gender	Female	5	5.3	0.725
	Male	4.6	4.6	
Marital Status	Single	5.3	3.4	0.518
	Married	4.5	5.4	
Degree College	Professional Doctorate	5.7	4.4	0.162
	Specialized Doctorate	3.7	3.4	
	Master's Degree	3.5	6.1	
Field of study	Health	3.6	5.7	0.067
	Nursing	4.4	4	
	Medicine	5.3	4.4	
	Paramedic	8.6	1.3	
	Midwifery	1.5	7.4	
Work Experience	1-10	4.5	4.6	0.856
	10-20	5.2	6.1	
	20-30	5.3	3.5	

Table 6. Determining the relationship between contextual characteristics and the mental workload of professors.

Variables	Category	Mean	Standard Deviation	*p*-value
Age	20-30	85.5	9.5	0.19
	30-40	80.2	8.7	
	40-50	78.2	10.5	
Gender	Female	80.2	10.1	0.678
	Male	79.4	9.3	
Marital Status	Single	81.8	7.5	0.223
	Married	78.9	10.2	
Degree	Professional Doctorate	83.7	8.1	0.001
	Specialized Doctorate	77.6	11.7	
	Master's Degree	74.8	7.6	
College	Health	76.6	6.7	0.041
	Nursing	76.3	5.8	
	Medicine	82.7	9.5	
	Paramedic	75.0	13.6	
	Midwifery	76.6	11.6	
Work Experience	1-10 years	79.5	9.6	0.396
	10-20 years	81.3	10.9	
	20-30 years	75.5	7.4	

4. DISCUSSION

The findings from this study contribute to a growing understanding of occupational well-being in higher education. High mental workload, as evidenced among professors, underscores the need for academic institutions to evaluate the demands placed on faculty and to seek avenues for workload optimization. By proactively addressing these issues, universities can safeguard not only the well-being of their staff but also the quality and sustainability of educational outcomes. Although a statistically significant inverse relationship between self-esteem and mental workload was not observed, the tendency suggests that higher self-esteem may have a protective effect against occupational stress . Professors with greater self-esteem may be more resilient and equipped to manage academic pressures, supporting previous research that links self-esteem with better job performance, adaptability, and satisfaction. The significant influence of educational degree and faculty affiliation on mental workload indicates that certain subgroups face unique challenges. This highlights the importance of tailored strategies—for example, targeted mentoring or support initiatives for faculties with higher workload

scores. Recognizing and supporting these at-risk groups is vital for developing equitable wellness and workload interventions. A multidimensional and complex structure that has a mental workload that is influenced by external demands of the task, the environment, organizational and psychological factors, and the administrative and cognitive abilities of the person.

Now, if the mental workload is more or less than the limit, it reduces the individual's performance and, in the future, will affect the productivity of the entire system. Administrative jobs, computer users, and bank employees, because they deal with a high volume of mental activities daily, are among the groups that suffer a lot of mental load when performing their duties. The field of universities plays a major role in the growth of society, and professors and staff are the basic pillars of every university. It is obvious that disruption in these basic pillars will cause a decline in the quality of education and the provision of educational services. The present study was conducted with the aim of determining the relationship between self-esteem and mental workload of professors of Jiroft University of Medical Sciences in 2023. The results of the study showed that the mental workload of the professors studied was more than acceptable, and their self-esteem was in the high self-esteem range. In the same vein, in the study by Kaveh *et al*., the results of the study showed that although the mental workload of the faculty members studied was more than acceptable, its level was much lower than that of other occupations that are active in the health field, such as nurses and midwives [27]. Also, the mental workload of the individuals studied in this study was lower than that of administrative occupations and computer users [28].

The results of this study showed that although the mental workload of the work decreases with increasing self-esteem, there was no statistically significant relationship between the mental workload of the work and self-esteem. When the mental workload of the individual is less, the job performance will be better, since no study has examined the relationship between these two variables in the search conducted by the researchers. In addition, the heterogeneity of the results from the perspective of the professors and considering that the studies differ from country to country and situation to situation, here are mentioned several articles that have analyzed self-esteem and mental workload separately, for example, in the Johar study, the neurotic personality dimension of leaders has a great negative impact on the self-esteem of employees, so leaders must have a dynamic, stable and emotionally stable personality in order to be able to better manage people and affairs and be able to influence their employees more [29]. Yaghoobnia believes that people with low self-esteem show more depressive and anxious behaviors and despair, and are less efficient when they are in stressful situations. These people have more problems in the workplace due to their inability to establish successful interpersonal relationships compared to those with higher self-esteem, which leads to poor attitudes towards their work and life, and lower efficiency. On the contrary, those with high self-esteem have more confidence in performing professional tasks and can better influence the work environment and its conditions, and as a result, they gain more positive views of their jobs [30]. In the study by Fu *et al*., emotional exhaustion and depersonalization of Chinese special education teachers are at a medium level, and personal success is at a low level. Mediation analysis shows that in the educational background of exceptional education, self-esteem has a minor mediating role in the overall effectiveness of teaching or the effectiveness of personal teaching, and the job burnout of exceptional education teachers [31]. In the study by Ghaffari *et al*., the results showed that there is a positive and significant relationship between organizational self-esteem, organizational performance, and job adjustment, which confirmed the research hypotheses. Therefore, there is a direct and positive relationship between organizational self-esteem, organizational performance, and job adjustment, meaning that with increasing self-esteem in managers in the organization, the performance of individuals and their job adjustment increases, and in the sub-hypotheses, namely, in the components of organizational self-esteem (acceptance by others, being trustworthy, and being competent) with both variables of job adjustment and organizational performance, a significant relationship was confirmed [32]. In explaining this finding, it can be said that the level of self-esteem has a great impact on the way of relating to others and the mental health of the individual. Self-esteem is a vital necessity for every human being and is necessary for normal and healthy development. Non-acceptance of oneself and others, fear of rejection, use of defensive methods, addiction, problems related to life management, decision-making, and communicating with others are considered consequences of low self-esteem. Accordingly, improving the organization in the university requires a suitable structure, satisfactory resources, and the presence of competent professors who consider themselves valuable and develop high self-esteem. A person who considers himself valuable and important in his organization and workplace makes the most of the feedback he receives. Although this feedback may be negative. If people have a high sense of value and high organizational self-esteem, they are satisfied with their lives and jobs and always try to achieve their goals. In this case, these people will perform their duties better. They try to be productive in the group they work in. Also, in explaining this finding, it can be said that those who have high self-esteem can adapt to different situations better than those who have low self-esteem. People with high self-esteem are less anxious in different situations and are less emotional, depressed, and aggressive. People with poor self-esteem suffer from temper disorders, behavioral disorders, and sadness, and these people also complain of insomnia and mental and physical illnesses. Self-esteem is especially more evident in interpersonal relationships. Those who have a good view of themselves, love others, and accept their weaknesses, these people establish the best communication because of the positive feelings they have

towards others and accept them [33]. Since the teaching profession requires establishing appropriate communication between the teacher and the student, teachers with high self-esteem can better perform their educational duties. There was a statistically significant relationship between mental workload and the variables of academic degree and faculty. In the same vein, in the study of Kaveh *et al*. [27], a significant relationship was observed between mental demand and physical demand with faculty, which is consistent with the results of Zamanian *et al*., regarding university professors and staff [34]. In their results, it is clear that the workload of the professor group is higher than that of the staff group, and the workload of the professor group affiliated with the Ministry of Science is higher than that of the professor group of the University of Medical Sciences. Also, in Zamanian's study, individual characteristics such as age, status, and gender do not affect the decrease or increase in workload, which was consistent with the results of the present study. In the Denison study, which examined the workload of professors, the results showed that individual characteristics and individual characteristics do not affect workload and job satisfaction [35]. In the study of Kaveh *et al*., there was no significant relationship between the components of mental workload and gender [27], but in the study of Hoonakker *et al*., the mental workload of women is higher than that of men [36]. Psychological differences between men and women are important factors in the level of mental workload. For example, women are very emotional and are strongly affected by negative emotions, while men are less prone to accepting the outside environment.

The significant associations identified between mental workload, educational degree, and faculty affiliation in this study suggest that structural and contextual factors within the university meaningfully influence how workload is experienced by professors. Notably, professors affiliated with clinical-oriented faculties such as the medical school—and those holding professional doctorates or specialized degrees—reported higher mental workload levels. This pattern may reflect the dual pressures of clinical teaching and patient care responsibilities, as well as the additional administrative and service demands often encountered in these departments. Such roles likely require intensive cognitive, emotional, and time investments, which amplify overall workload. These findings underscore the need for a nuanced understanding of occupational stressors in academic medicine. Differences between faculties and educational backgrounds may originate from distinct cultural expectations, resource allocation, and job descriptions. Therefore, institutional strategies to reduce workload and promote well-being should be tailored to the specific challenges of each academic unit. Future research should seek to further unpack these contextual dynamics. Qualitative approaches, such as in-depth interviews or focus groups with faculty members across different departments, could provide valuable insights into the underlying sources of workload and stress. Additionally, longitudinal studies would help track how workload and its determinants evolve over time and across varying career stages. Such research could guide the development of more effective, context-sensitive interventions for academic staff well-being.

5. LIMITATIONS OF THE STUDY

The results of this research are limited to professors at Jiroft University of Medical Sciences, so caution should be exercised in generalizing the results to other professors. Limitations in interpreting and generalizing the results due to the limited tools used (questionnaires). This study did not account for additional potentially influential factors such as economic status, detailed weekly teaching workload, research responsibilities, physical health status, or levels of psychosocial support. The omission of these variables may limit the ability to fully explain or control for confounding influences on the relationship between self-esteem and mental workload. Future studies are recommended to include these dimensions to enhance the depth and explanatory power of research in this field. We fully acknowledge that this scarcity of prior research constrains the ability to situate our findings within a broader academic context and makes direct comparison with other samples. Another limitation is the broad work experience category that recommends more detailed stratification in subsequent research. This limitation was one of the motivations for conducting our study, as there appears to be a gap in the literature regarding these specific variables in this unique professional and cultural context.

CONCLUSION AND RECOMMENDATIONS

The study concluded that while professors at Jiroft University of Medical Sciences generally exhibited high levels of self-esteem, their mental workload was higher than acceptable. Although an inverse relationship between mental workload and self-esteem was observed—suggesting that higher self-esteem may help reduce mental workload—this relationship was not statistically significant. However, mental workload was found to have a significant association with variables such as educational degree and faculty affiliation. These findings highlight the need for targeted interventions to address mental workload in specific groups and emphasize the importance of fostering self-esteem to potentially mitigate its effects on academic staff performance and well-being.

AUTHORS' CONTRIBUTIONS

The authors confirm contribution to the paper as follows: M.F, A.A.: Study conception and design; S.D.: Data collection; A.A, M.F., M.A., K.H.: Analysis and interpretation of results; R.R., S.D.: Draft manuscript; All authors reviewed the results and approved the final version of the manuscript.

LIST OF ABBREVIATIONS

RSES	=	Rosenberg Self-Esteem Scale
NASA-TLX	=	NASA Task Load Index

ETHICS APPROVAL AND CONSENT TO PARTICIPATE

This project was approved by the ethics committee of Jiroft University of Medical Sciences, Iran under the ethics code IR.JMU.REC.1403.033.

HUMAN AND ANIMAL RIGHTS

All human procedures followed were in accordance with the guidelines of the Declaration of Helsinki of 1975.

CONSENT FOR PUBLICATION

Informed consent was obtained from the participants.

STANDARDS OF REPORTING

STROBE guideline has been followed.

AVAILABILITY OF DATA AND MATERIALS

The data that support the findings of this study are available from the corresponding author [S.D] upon reasonable request.

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CONFLICT OF INTERESTS

The authors declare no conflict of interest, financial or otherwise.

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REFERENCES

[1] Bruggen A. An empirical investigation of the relationship between workload and performance. Manage Decis 2015; 53(10): 2377-89. http://dx.doi.org/10.1108/MD-02-2015-0063

[2] Zafar Q, Ali A, Hameed T. The influence of job stress on employees performance in Pakistan. American J Social Sci Res 2015; 1(4): 221-5.

[3] Kim Y-J, Im H B, Lee S Y, Kang J H. The relationship of emotional burnout on hospital nursing workload. J Korea Acad-Ind Coop Soc 2019; 20(9): 93-102.

[4] Swann W, Seyle DC. The antecedents of self-esteem.Self-Esteem Issues and Answers. Psychology Press 2013; pp. 201-6.

[5] Dlugonski D, Motl RW. Possible antecedents and consequences of self-esteem in persons with multiple sclerosis: Preliminary evidence from a cross-sectional analysis. Rehabil Psychol 2012; 57(1): 35-42. http://dx.doi.org/10.1037/a0027176 PMID: 22369115

[6] Krauss S, Orth U. Work experiences and self-esteem development: A meta-analysis of longitudinal studies. Eur J Pers 2022; 36(6): 849-69. http://dx.doi.org/10.1177/08902070211027142

[7] MacDonald G, Leary MR. Individual differences in self-esteem. Handbook of self and identity. (2nd ed.). The Guilford Press 2012; pp. 354-77.

[8] Trzesniewski KH, Donnellan MB, Robins RW. Development of self-esteem. Self-esteem. Psychology Press 2013; pp. 60-79.

[9] Zeira A, Dekel R. The self-image of adolescents and its relationship to their perceptions of the future. Int Soc Work 2005; 48(2): 177-91. http://dx.doi.org/10.1177/0020872805050208

[10] Manzari ZS, Mafi MH, Nasiri ZH, Asgari M, Ghaderi MS. The relationship between quality of work life and post-traumatic stress disorder in nurses during the COVID-19 pandemic: A cross-sectional study. Open Public Health J 2024; 17(1): e18749445294293. http://dx.doi.org/10.2174/0118749445294293240614054311

[11] Niveau N, New B, Beaudoin M. Self-esteem interventions in adults–a systematic review and meta-analysis. J Res Pers 2021; 94: 104131. http://dx.doi.org/10.1016/j.jrp.2021.104131

[12] Scherrer V, Preckel F. Development of motivational variables and self-esteem during the school career: A meta-analysis of longitudinal studies. Rev Educ Res 2019; 89(2): 211-58. http://dx.doi.org/10.3102/0034654318819127

[13] Wiens PD, Beck JS. But are they good teachers? examining who takes up teacher leadership and how their instruction differs from their peers. Sch Leadersh Manage 2022; 42(4): 381-401. http://dx.doi.org/10.1080/13632434.2022.2111413

[14] Memarbashi Aval M. The relationship between sense of coherence (SOC) and self esteem with job performance. J Career Organ Couns 2012; 4(12): 66-78.

[15] Masoom MR. Educators' self-esteem: The effect of perceived occupational stress and the role of organizational support. Int J Educ Manag 2021; 35(5): 1000-15. http://dx.doi.org/10.1108/IJEM-11-2020-0550

[16] Peagler S. Managing Teacher Attrition: Improving Teacher Self-Efficacy Through the Implementation of Professional Learning Communities. Clemson University 2023.

[17] Cohen MB. Understanding Teachers' attitudes toward professional development to ensure effective opportunities for professional learning. Thesis Union University 2022.

[18] Sassone KM. Teachers' perceptions and self-efficacy when implementing technology in nlmary classrooms grades 3-5: A mixed-methods study before and during the COVID-19 pandemic. Thesis Manhattanville College 2020.

[19] Lawrence D. Enhancing self-esteem in the classroom. SAGE Publications Ltd 2006. http://dx.doi.org/10.4135/9781446213513

[20] Afsharmanesh A, Ghamati M, Raesi R, Hushmandi K, Daneshi S. Investigating the relationship between cognitive errors and mental health among medical students. Curr Psychiatry Res Rev 2025; 21 http://dx.doi.org/10.2174/0126660822371915250324050058

[21] Zydziunaite V. Challenges in teacher leadership: Workload, time allocation, and self-esteem. European J Contemporar Edu 2020; 9(4): 948-62.

[22] Rosenberg M. Society and the adolescent self-image. Princeton university press 1965. http://dx.doi.org/10.1515/9781400876136

[23] Hart SG, Staveland LE. Development of NASA-TLX (Task Load Index): Results of empirical and theoretical research. Advances in Psychology. Elsevier 1988; pp. 139-83. http://dx.doi.org/10.1016/S0166-4115(08)62386-9

[24] Arghami S, Kamali K, Radanfar F. Task performance induced work load in nursing. J of Occup Hyg Eng 2015; 2(3): 45-54.

[25] Rubio S, Díaz E, Martín J, Puente JM. Evaluation of subjective mental workload: A comparison of SWAT, NASA-TLX, and workload profile methods. Appl Psychol 2004; 53(1): 61-86. http://dx.doi.org/10.1111/j.1464-0597.2004.00161.x

[26] Mohammadi M, Mazloumi A, Kazemi Z, Zeraati H. Evaluation of mental workload among ICU ward's nurses. Health Promot Perspect 2016; 5(4): 280-7. http://dx.doi.org/10.15171/hpp.2015.033 PMID: 26933647

[27] Kaveh M, Akbari H, Saberi H, Sheikhlar Z. Correlation between job mental load and sleep quality with occupational burnout in non-clinical faculty members of Kashan University of Medical Sciences. Feyz Med Sci J 2020; 24(1): 109-21.

[28] Khandan M, Zamir S, Maghsoudipour M. Survey of workload and

job satisfaction relationship in a productive company. Iran Occup Health J 2012; 9(1): 30-6.

[29] Johar SSH. Dimension of neuroticism personality among leader and the impact towards self-esteem of employee at the workplace. Procedia Soc Behav Sci 2013; 91: 588-93. http://dx.doi.org/10.1016/j.sbspro.2013.08.458

[30] Yaghoobnia F, Roshan zamir S. Study of the relationship between self-esteem and burnout in nurses of hospitals of Mashad University of Medical Sciences in 1379 (2000). J Sabzevar Univ Med Sci 2003; 10((29)): 73-9.

[31] Fu W, Tang W, Xue E, Li J, Shan C. The mediation effect of self-esteem on job-burnout and self-efficacy of special education teachers in Western China. Int J Dev Disabil 2021; 67(4): 273-82. http://dx.doi.org/10.1080/20473869.2019.1662204 PMID: 34408862

[32] Ghaffari K. investigate the relationship betweenl self-esteem and organizational performance and job satisfaction among managers. J New Approach Edu Admin 2018; 9(33): 207-24.

[33] Ganster DC, Schaubroeck J. The moderating effects of self-esteem on the work stress–employee health relationship. Occupational stress. CRC Press 2020; pp. 167-77. http://dx.doi.org/10.1201/9781003072430-15

[34] Zamanian Z, Sarvestani MR, Sedaghati M. Assessment of the relation between subjective workload and job satisfaction in university faculty and staff. Iranian J Ergonom 2016; 3(4): 1-10.

[35] Denison H, Loveridege C. Nursing management in new paradigm. Asen Publisher 1996.

[36] Hoonakker P, Carayon P, Gurses AP, *et al*. Measuring workload of ICU nurses with a questionnaire survey: the NASA Task Load Index (TLX). IIE Trans Healthc Syst Eng 2011; 1(2): 131-43. http://dx.doi.org/10.1080/19488300.2011.609524 PMID: 22773941