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Most Frequent Health Problems and Their Relationship with Workload in University Teachers

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Abstract

Advances in medicine have generated an increase in life expectancy in the world. However, society faces greater occupational demands, which impact the physical, mental and emotional health of many professionals, especially those who are multifaceted, such as university professors. **Methodology:** The research follows a qualitative approach, a descriptive methodology, using a non-experimental design and a documentary-bibliographic analysis. It is based on a systematic examination of scientific works related to the topic, exploring written documents, scientific articles and bibliographic reviews. **Conclusion:** The review highlighted the prevalence of job stress among teachers, indicating a significant effect on physical and mental health due to imbalances between job demands and resources. Emotional exhaustion is common among university professors, exacerbated by COVID19 workloads, assessment systems, and the online teaching shift. Administrative stress and lack of physical activity contribute to this. Depression, stress, pain and weight changes decrease health-related quality of life.

Key words: Stress, Health, Teacher, Work Environment, Workload

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Introduction

In its relentless pursuit of progress, humanity today finds itself in an era of remarkable achievements in healthcare, technology and living standards, which has resulted in longer and healthier lives around the world. Advances in medicine, sanitation, and public health initiatives have propelled humanity into an era of unprecedented prosperity, where ailments that once devastated populations are now easily suppressed through scientific progress.

With greater access to health services, people today enjoy increasingly longer life expectancy even compared to recent periods, as stated by the World Health Organization (WHO) life expectancy has increased more than 6 years between 2000 and 2019: from 66.8 years in 2000 to 73.4 years in 2019. While healthy life expectancy (HALE) has also increased by 8%, from 58.3 in 2000 to 63.7 in 2019.¹

Paradoxically, along with these advances in health and well-being, society is facing increased occupational demands that take a toll on the physical, mental and emotional health of various professions. The repercussions of this phenomenon affect everyone, from healthcare professionals facing the stresses of patient care to corporate executives facing the pressures of the boardroom.

Among all professions, university professors occupy a distinctive niche within the modern employment landscape, constantly subjected to high levels of stress, as they are regularly charged with the dual responsibilities of teaching and research, sometimes even administrative burdens are involved. Furthermore, given the multifaceted and social nature of the profession, they often lack control over their workload, which is confusing and excessive given the same multidisciplinary nature. These are, for the WHO itself, psychosocial risks for the mental health of teachers.²

As higher education institutions face funding constraints, changing academic priorities, and the marketization of education, the burden on faculty intensifies, leaving little respite from the relentless demands of academia. Excessive work-related stress is detrimental to the well-being of university professors, leading to resignations and dismissals. According to Inside Higher Ed's 2022 survey of college and university chief academic officers, 79% of chancellors have confirmed a higher-than-usual faculty turnover rate.³

The proliferation of administrative tasks, committee obligations, and the expectation of continuous academic production conspire to create a pressure cooker environment where the boundaries between work and personal life become blurred; another study found that college professors spend a portion of their time working on weekends and about 60% of them reported that they took their work home almost every weekend.⁴

Amid all the demands, the effects on the health of university teachers are significant, affecting both their work and personal lives. They face risks such as burnout due to overwork and various health problems due to their heavy workload. As indicated in the review work Almhadawi et al, about 55% of university professors are affected by musculoskeletal disorders, with neck pain being the most prevalent with 54%, followed by low back pain in 43% of cases.⁵

These musculoskeletal disorders that arise from spending long hours hunched over desks⁶, long periods of standing during lectures⁷, mental health problems arising from the relentless pursuit of academic success and the erosion of work-life balance under the weight of institutional expectations, highlight the profound impact of workload on the health and well-being of university professors.² While in other cases barely less than a fifth of respondents did not report any health problems.⁴

Thus, it is imperative to resolve the relationship between workload and its effects on the health of university professors, and highlighting which are the most common effects in most cases. For this reason, the researchers of this work formulate the general objective of the research to determine which are the most frequent health problems and their relationship with the workload of university teachers.

Materials and Methods

This study uses a qualitative approach that is based on a descriptive methodology and a nonexperimental design, reinforced with a documentary-bibliographic analysis. It is based on a thorough and detailed examination of scientific works relevant to the research topic, involving an exhaustive exploration of written documents, academic journals, scientific articles and other bibliographic reviews that represent the main sources within the scope of study.

Inclusion criteria

Original articles, bibliographic reviews and magazines. Availability of information whether partial or complete. Written in Spanish, Portuguese or English. Published from 2019 onwards. Absence of conflicts of interest between the authors and the topic. Mainly linked to the health and nursing area.

Exclusion criteria

Duplicate articles. Topics outside the health area. Publications with inaccessible information. Languages other than Spanish, Portuguese and English.

Results and Discussion

Among a large part of the reviewed works, the starting point was the judgment of work stress, forming an imbalance between both the demands required by the work environment and the resources available to the individuals studied. There was emphasis on psychosocial factors and how these in the short and long term manifested both mental and physical responses, especially in those professionals subjected to external factors that leave their resolution capacity impotent.⁸

In addition, a large number of studies frequently cited stress-related symptoms such as low mood, fatigue, musculoskeletal pain, headaches, inability to fall asleep or even loss of appetite. This is consistent with the conclusions reached by Menghi et al, who highlighted five stress symptoms as the most common, those being fatigue, inability to sleep, headaches, lack of concentration, and changes in appetite.⁹

Depressive symptoms resulting from stress are common mental health problems that are associated with poor working conditions, undervaluation of professional image and high exposure to dangers.^{4,10}

The study carried out on 68 teachers by Acosta et al, presented a relationship between sources of stress, alterations in mental health, violence and psychological harassment. And it was highlighted that the group of nursing teachers made up of 23 individuals faced a poorer work environment, based on poor leadership, in addition to labeling interpersonal relationships as non-harmonious, they rated their personal fulfillment for work as poor.¹¹

Within the working conditions of university teachers, there are several that constitute a factor that generates chronic stress, such as role ambiguity and occupational overload, more concrete examples being the accumulation of many tasks, including teaching, research, outreach and administrative activities, this finding is consistent with a previous study that female teachers experience lower levels of job stress when these working conditions are improved.¹²

In this sense, the conclusions of Garce s et al. support the apparent susceptibility of the female sex since in their work it was verified that women in the initial stages of their professional careers, especially those with a high workload and without management responsibilities in the college, are more likely to experience higher levels of stress.¹³

In a systematic review of faculty researchers, 20% experienced stressful psychological variables, such as lack of control and emotional fatigue caused by overload, multitasking, demanding evaluation systems, complexities of tenure, and lack of recognition. Thus, responses of all kinds are appreciated, at a psychosomatic level irritability and restlessness could be observed.^{14,15}

Healthy Professional Worker Partnership conducted multidisciplinary research in Canada to examine the relationship between the mental health of various professions including university teachers, of whom a majority cited heavy workloads as a key source of stress. Additionally, more than a third of respondents noted digital stress as a critical concern. This is likely due to intensification of workloads plus the shift to online teaching and the need to maintain research and service commitments remotely.¹⁶

On the other hand, physical manifestations such as neck pain and low back pain turned out to be the most common, followed by headaches, difficulty staying seated, and sweaty hands.^{5,10,15} Likewise, many presented both a worse quality of sleep, associated with the workload itself, such

as the inability to reconcile it.¹⁰ A smaller group of articles also included dyspepsia and even cardiopulmonary problems among individuals.^{5,15}

Work-related stress, particularly emotional exhaustion, is a common problem among university professors, characterized by feelings of psychological exhaustion, depersonalization, and reduced personal accomplishment. Several factors contribute to emotional exhaustion, including mental overload, high psychological demands, and external triggers such as the COVID-19 pandemic. Research stress, arising from aggressive research standards and intense evaluation criteria, is a significant predictor of emotional exhaustion among junior faculty.¹⁷

Teaching stress, arising from the dual demands of teaching and research, also contributes to emotional exhaustion due to the conflicting nature of interaction-based teaching and analysis-based research tasks. Furthermore, administrative stress, driven by bureaucratic tasks perceived as irrelevant to academic advancement, exacerbates emotional exhaustion by fostering a sense of low reward and frustration.¹⁷

Teachers who take work home and work on weekends may have fewer opportunities to engage in physical activity, which could negatively impact their physical health. These results are consistent with a previous study by Flores et al., which found a higher prevalence of overweight and obesity among male teachers compared to female teachers, suggesting an association between work time and increased waist diameter, as well as a relationship between male sex and the increase in body mass index (BMI) in workers.^{4,18}

Overall, higher depression, stress, neck disability, and weight change were significantly associated with lower Health-Related Quality of Life (HRQoL). While higher satisfaction with distance learning, self-rated health, and workload change were significantly associated with higher HRQoL.⁵

University professors in a study in Jordan demonstrated good quality of life and mental health during the COVID-19 lockdown, which were significantly associated with greater satisfaction with distance learning, better medical care, and changes in workload. job. Interestingly, better teacher well-being was shown to be associated with better student well-being and fewer difficulties for students.^{5,19}

Of the studies mentioned, a large number have a great variety of instruments used, even if they are different from those of other works, this makes it difficult to draw up contrasts between them, since it makes it difficult to socialize the results obtained by different studies.^{4,5,6,9,11,12,13,15,17,19} For Rojas et al, in this sense, the most outstanding were the Questionnaire for the evaluation of stress and the Maslach Burnout Inventory (MBI) Questionnaire.²⁰

Regarding the age of the participants, little mention was observed, although it is important to highlight that various stages of the life cycle react differently to stressful stimuli, so in each future review it is necessary to interpret the results with these physiological differences in mind, especially considering that stressful events throughout life can have diverse meanings and effects.²⁰

In the literature consulted, several terms are used to describe stress in the workplace, such as work stress, occupational stress and organizational stress. However, it is important to keep in mind that the lack of a legitimate consensus at the level of health institutions regarding the definition of stress makes its analysis difficult, so the contextualization of all the aspects included in manifested stress must be specified.²¹

Conclusion

The literature review emphasized the prevalence of job stress among teachers, pointing out the imbalance between job demands and available resources, which significantly impacts physical and mental well-being, especially for those facing external stressors. Common symptoms included low mood, fatigue, musculoskeletal pain and sleep disturbances, often related to poor working conditions and high exposure to stress.

Female teachers, particularly those at the beginning of their careers with heavy workloads and no managerial responsibilities, were identified as being especially vulnerable to high levels of stress. Furthermore, emotional exhaustion, arising from the workload, intense assessment systems and

the shift to online teaching due to COVID-19, was prevalent among university professors, often manifesting as psychological exhaustion, depersonalization and reduced personal fulfillment.

Teaching stress, derived from the demands of both teaching and research, contributes to emotional exhaustion due to the conflictive nature of these tasks. Administrative stress, derived from bureaucratic tasks perceived as irrelevant, exacerbates emotional exhaustion. Teachers who work after hours may have less time for physical activity, which affects their health. Additionally, depression, stress, pain, and weight change were associated with lower health-related quality of life (HRQoL), while satisfaction with distance learning, self-rated health, and change in workload were related to higher HRQoL. Variations in the instruments used between studies complicate the comparison of results. The lack of consensus when defining terms such as work stress, occupational stress and organizational stress makes analysis difficult, which underlines the need for contextualization to understand manifested stress.

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