

Musculoskeletal complaints in caregivers of the elderly in the municipality of Ecoporanga - ES

Queixas osteomusculares em cuidadores de idosos do município de Ecoporanga - ES

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ABSTRACT

Introduction: The caregiver of the elderly is the person responsible for taking care of the elderly, participating in their routine and taking care of their physical, emotional and social needs. The caregiver donates his/her time to care by working most of the day in positions that are uncomfortable and harmful to the musculoskeletal system, leading to the development of occupational diseases. Objective: To analyze musculoskeletal complaints in caregivers of the elderly. Methodology: This is a quantitative, exploratory and descriptive research carried out through the application of the Nordic Musculoskeletal Symptom Questionnaire composed of 18 structured questions. The sample consisted of 14 Caregivers of the Elderly in the Municipality of Ecoporanga-ES. The questionnaires were applied from May 23 to 24, 2023. Of the inclusion criteria, caregivers who agreed to participate in the research were observed. Results: It was noted that the questionnaire was answered by 57.14% of women and 42.85% of men aged between twenty-one and fifty-nine years, 71.41% of the interviewees felt cervical discomfort and 85.69% felt discomfort in the lumbar stomach. Conclusion: It was concluded that all caregivers complain



of at least one type of musculoskeletal disorder associated with the activity of caregiving, and that despite the pain, 85.71% never took sick leave and no caregiver underwent surgery to treat the pain.

Keywords: Physical Therapy, Caregivers, Elderly, Musculoskeletal, Disorders.

1 INTRODUCTION

The caregiver of the elderly is the person responsible for taking care of the elderly by participating in their routine and taking care of their physical, emotional and social needs. The caregiver can be formal, being paid, or informal, taking care of a family member or an unrelated elderly person voluntarily. The caregiver is committed to ensuring food, personal hygiene, protection and well-being for the elderly, thus donating their time to care and consequently working most of the day in uncomfortable positions that are harmful to the musculoskeletal system.

With the increasing number of elderly population, it is estimated that the number of informal caregivers of older adults will increase progressively, also increasing the number of caregivers working in an interrupted and uninterrupted manner. rest, which imposes emotional and physical overload, since these professionals often do not receive instructions from a specialist before starting to work, allowing uncomfortable postures when performing their duties.

The dependence of the elderly requires an intense working day with maintenance of inadequate postures and repetitive effort, which motivates the appearance of musculoskeletal disorders. RSI (Repetitive Strain Injury) and WMSD (Work-Related Musculoskeletal Diseases) are the main causes of pain, heaviness and fatigue, among other discomforts in caregivers of the elderly.

This study addresses the main complaints of pain, numbness, tingling or discomfort throughout the body described by caregivers of elderly residents of the The municipality of Ecoporanga, Espírito Santo, Brazil, with aspects of daily life and the perception of the quality of work of these caregivers.

2 THEORETICAL BACKGROUND

The increase in population has been globally significant in recent years, with the elderly population also growing. With advancing age, the appearance of comorbidities becomes common, leading the elderly to depend on someone who can help them with their basic needs, such as food, medication, hygiene, and company. These caregivers are present in the daily life of the elderly,



being part of their routine from dawn to dusk, and in some cases it is necessary to change diapers and change positions, which requires a certain physical effort on the part of the caregiver, which in the long term overloads the upper limbs, spine, and lower limbs (DE MELO, *et al.*, 2020).

2.1 EMOTIONAL EFFECTS OBSERVED IN CAREGIVERS OF THE ELDERLY

It is understood that caring encompasses donating one's time, being present, caring for the patient, and keeping company on a daily basis. This routine can radically modify the family's daily life, so that the time that would normally be directed to work, leisure and rest will be invested in the care of the elderly. This will possibly provide the caregiver with the possibility of psychological, physical and financial decline, since the caregiver is almost always unable to maintain his/her employment relationships (ALVES, *et al.*, 2022).

In most cases, the caregivers are women, being daughters or spouses of the elderly person who did not work outside the home or who need to dispense with employment opportunities because they are committed to the care of the elderly. The lack of income of these caregivers is capable of causing financial difficulties in low-income families, as well as personal, collective and programmatic fragility (HUBERT, *et al.*, 2021).

It is necessary to think about the well-being of caregivers of the elderly who, most of the time, are family members in middle age who, consequently, are unable to have a paid job and attend social events (DA SILVA, *et al.*, 2022).

The dependence of the elderly directly affects the family and especially the responsible caregiver, who is constantly subjected to a feeling of loneliness, anxiety, anguish and frustration. These feelings are provoked by the absence of discoveryand lack of knowledge of the evolution and the need for change (VIEIRA, et al., 2021).

The caregiver of the elderly is the one in whom he carries the commitment to support the physically and/or mentally dependent elderly, and may or may not be financially rewarded. Usually, the caregiver performs his duties without any instruction to take care of himself and without worrying about his well-being, consequently being subjected to overload due to persistent physical effort (GOMES, *et al.*, 2021).

2.2 MUSCULOSKELETAL DISORDERS IN CAREGIVERS OF THE ELDERLY

Many chronic pathologies that most often have a complex treatment come from musculoskeletal disorders associated with occupational tasks and work situations, mainly causing



pain derived from physical fatigue and prostration in workers in conditions in which they overload the worker's body (BATISTA, *et al.*, 2020).

Musculoskeletal disorders can be related to intense working hours, repetitive strain, maintenance of inappropriate postures, physical exertion, and mechanical pressure on certain segments of the body. They are usually in conjunction with the psychosocial environment that is almost always overloaded (SILVA, *et al.*, 2017).

The muscles, tendons, bones, cartilages, ligaments and nerves make up the locomotor system, and are often the target of postural overloads, muscle tension, repetitive movements and psychosocial problems, often causing limitations in activities of daily living and physical diseases such as musculoskeletal disorders (EHMKE, *et al.*, 2021).

2.3 REPETITIVE STRAIN INJURIES/WORK-RELATED MUSCULOSKELETAL DISORDERS (RSI/WMSD)

Musculoskeletal diseases result from the lack of optimization of work, excessive load on a certain body area, repetitive movements for a prolonged period and reduced rest. Two types of musculoskeletal disorders are common among workers, namely, Repetitive Strain Injuries (RSI) and Work-Related Occupational Diseases (WMSD) (SANTANA, *et al.*, 2020).

Repetitive Strain Injuries/Work-Related Musculoskeletal Disorders (RSI/WMSD) are directly linked to absenteeism and presenteeism at work, paresthesia, pain, heaviness and fatigue, constantly generating short-term or permanent insufficiency at work (SOARES, *et al.*, 2020).

Workers who care for the elderly are subject to high daily demands and enormous emotional exhaustion, which can have a strong influence on physical and mental health, which can lead these caregivers to trigger occupational stress and *Burnout* It can be defined as a psychological disturbance leading to physical and mental exhaustion, hindering their productivity at work (BRUNONI, *et al.*, 2015).

Musculoskeletal disorders affect the upper limbs specifically in the wrists, hands, forearms, arms, cervical spine and shoulders. The pathologies are defined by the INSS (National Institute of Social Security) and are a syndrome derived from the accumulation of repetitive movements and uncomfortable postures necessary for the performance of workers' activities. These pathologies are due to a combination of factors and lack of diagnosis (DA SILVA, *et al.*, 2022).

The impairment of muscles, joints, ligaments, nerves and tendons that arises due to the type of activity performed at work is one of the musculoskeletal disorders that affect caregivers of the



elderly. These alterations have varied signs such as tingling, numbness, fatigue and especially pain (MOREIRA, *et al.*, 2019).

The human body has the spine as its fundamental support structure during movements, allowing lateral inclinations, rotations, flexion and extension of the trunk, enabling daily tasks to be performed effectively. The spine receives the body load, the tension of the ligaments and muscles, the intra-abdominal pressure and the load imposed by the tasks that involve the joint movement of the spine (DA SILVA, *et al.*, 2020).

Long-lasting postures in inadequate conditions, excessive and erroneous use of the upper limbs are agents of misfortune in the lower limbs, particularly the thigh, leg and foot, since they motivate locomotion and support of the organs, serving as a basis of support and balance for the body (NASCIMENTO, *et al.*, 2022).

3 METHODOLOGY

This is a quantitative, exploratory and descriptive research, where we studied the main musculoskeletal complaints and the perception of the quality of work of caregivers of the elderly using a structured questionnaire validated and modified. The questionnaire applied is the Nordic Musculoskeletal Questionnaire (NMQ), consisting of 18 structured questions. The sample consisted of 14 Caregivers of the Elderly in the Municipality of Ecoporanga-ES. The questionnaires were applied from May 23 to 24, 2023. Of the inclusion criteria, caregivers who agreed to participate in the research were observed. Caregivers of elderly people who, for some reason, did not agree to participate in the study were excluded. All participants signed the Free and Informed Consent Form, agreeing to participate in the research. It is important to note that respondents can withdraw from participating in the survey at any time if they wish. They will under no circumstances be identified or have their names disclosed.

4 RESULTS AND DISCUSSION

Based on the factors analyzed in the survey, of the interviewees are single (57.14%), aged between twenty-one and fifty-nine years (100%), 57.14% female and 42.85% male, 64.28% with body mass index (BMI) within the criteria considered normal, 28.57% underweight and 7.14% above the ideal weight.

Regarding biomechanical factors, 100% of the interviewees have the right side as dominant, 100% work as caregivers for more than two years, 100% work as caregivers, and 100% have been caregivers.or for more than eight hours a day. Regarding the physical sensation at the



end of the workday, 42.85% reported that they feel a little tired, 28.57% reported feeling tired, 21.42% felt very tired and 7.14% felt exhausted. They were asked if they practice physical activities regularly and 42.86% answered yes.

Culturally, women are linked to home and family care functions, which explains the fact that most caregivers are female (DE ANDRADE, et al., 2020).

Due to the commitment and responsibility towards the elderly, many caregivers fail to take care of themselves, having the habit of not going to appointments with health professionals, do not have healthy habits of eating, sleeping and physical activities (MAIA JÚNIOR, *et al.*, 2019).

The caregiver must be healthy to perform his/her work, but the act of caring ends up being exhausting, causing pain, discomfort, exhaustion and dependence on medication to those who donate their time to the care of the elderly. It's important that the caregiver has healthy lifestyle habits so that he or she remains in good physical and emotional quality (ANDRADE, *et al.*, 2019).

Regarding the frequency with which the interviewees feel numbness, tingling, or discomfort in the body, Table 1 shows that In the cervical region, 35.71% of the people interviewed rarely have any of these symptoms, 28.57% do not have symptoms, 21.42% have symptoms frequently and 14.28% always feel some discomfort in the cervical region. In the shoulders, 28.57% do not feel pain, 42.85% rarely feel it, 21.42% feel it frequently, and 7.14% feel it always. In the arms, 42.85% do not feel discomfort, 42.85% rarely feel it, 7.14% feel it frequently and 7.14% feel it always. In the elbows, it was noted that 64.28% did not feel discomfort, 28.57% rarely felt it, 7.14% frequently and 0% felt it all the time. In the forearm region, 64.28% do not feel discomfort, 21.42% rarely, 14.28% frequently and 0% always. In the wrists, hands and fingers, 78.57% do not have discomfort, 14.28% rarely, 7.14% frequently and 0% always feel it. In the dorsal region, 71.42% of the interviewees do not have discomfort, 14.28% have it rarely, 7.14% frequently and 7.14% always feel some type of discomfort. Of the interviewees, 14.28% reported not feeling discomfort in the lumbar region, 42.85% feel it rarely, 21.42% frequently, and 21.42% always feel some discomfort. In the hip and lower limb region, 28.57% do not feel discomfort, 64.28% rarely do, 0% frequently and 7.14% always feel it.

Table 1 - Frequency with which respondents feel pain, numbness, tingling or discomfort.

Pain Region	They don't feel pain	Rarely	Often	All the time
Cervical region	28,57%	35,71%	21,42%	14,28%
Shoulders	28,57%	42,85%	21,42%	7,14%
Arms	42,85%	42,85%	7,14%	7,14%
Elbows	64,28%	28,57%	7,14%	0%
Forearms	64,28%	21,42%	14,28%	0%
Fists/hands/fingers	78,57%	14,28%	7,14%	0%
Dorsal region	71,42%	14,28%	7,14%	7,14%
Lower back	14,28%	42,85%	21,42%	21,42%
Quadril/MMII	28,57%	64,28%	0%	7,14%

Source: Survey data

The presence of musculoskeletal symptoms in the upper limb region due to exertion is notorious. The spine is also overloaded, and the region is most affected mainly in caregivers responsible for elderly people with a high rate of dependence (FIGUEIREDO, *et al.*, 2019).

In similar studies, the predominance of musculoskeletal complaints in caregivers of the elderly in the regions of the cervical and lumbar spine due to daily activities (SANTOS, *et al.*, 2017).

The level of depeThe physical presence of the elderly directly interferes with the overload imposed on the caregiver's spine due to the dependent elderly person's need for transportation and ambulation, thus compromising the caregiver's spine (SANTOS, *et al.*, 2019).

Another study conducted with Caregivers of the elderly also evidenced the lumbar spine as one of the regions of the body with the highest frequency of pain. Discomfort in the spine may appear due to the overload derived from the excess of tasks (VAZ, *et al.*, 2018).

In relation to the time when the Table 2 shows that 21.42% of the interviewees have felt pain in the cervical region for days, 28.57% of people have felt it for months, 21.42% of people for years and 28.57% do not feel neck pain. Of the caregivers who felt some discomfort in the shoulder region, 28.57% reported that they had felt it for days, 28.57% for months, 14.28% for years and 28.57% did not feel pain. According to the respondents' answers, 42.85% answered that they have had pain in the arm region for days, 14.28% for months, 7.14% for years and 35.71% did not feel discomfort in this region. Of the interviewees, 28.57% said they had pain in the elbow region for days, 14.28% had felt it for months, 0% had felt it for years and 57.14% said they had

not felt discomfort in the elbow region. In the forearms, 14.28% of the people who answered the questionnaire said they had been feeling discomfort for days, 21.42% for months, 0% for years, and 64.28% reported no pain. The answer for those who have felt some discomfort in the wrists, hands and fingers for days was 21.42%, for those who have felt it for months it was 7.14%, those who have felt it for years it was 7.14%, and 64.28% answered that they did not feel discomfort in this region. Of the respondents who said they felt discomfort in the dorsal region, 28.57% said they had felt it for days, 7.14% had felt it for months, 7.14% for years and 57.14% had no pain in the dorsal region. In the lower back, 28.57% of respondents said they have been feeling discomfort for days, 42.85% said they have felt it for months, 21.42% have felt it for years, and 7.14% have not felt discomfort. The answer for those who have felt discomfort in the hip and lower limbs region for days was 28.57%, those who have been feeling it for months was 21.42%, those who have felt it for years was 7.14% and for those who have not felt anything in the hip and lower limbs region it was a total of 42.85%.

Table 2 - Amount of time interviewees feel pain.

Pain Region	They don't feel pain	Days	Months	Years
Cervical region	28,57%	21,42%	28,57%	21,42%
Shoulders	28,57%	28,57%	28,57%	14,28%
Arms	35,71%	42,85%	14,28%	7,14%
Elbows	57,14%	28,57%	14,28%	0%
Forearms	64,28%	14,28%	21,42%	0%
Fists/hands/fingers	64,28%	21,42%	7,14%	7,14%
Dorsal region	57,14%	28,57%	7,14%	7,14%
Lower back	7,14%	28,57%	42,85%	21,42%
Quadril/MMII	42,85%	28,57%	21,42%	7,14%

Source: Survey data

The variety of tasks such as the transport and movement of the elderly that cause inadequate static postures, the flexion and twisting movements of the spine common to caregivers of the elderly usually bring consequences such as musculoskeletal pain throughout the body (SOUZA, et al., 2018).



Activities such as handling bedridden elderly people increase the prevalence of pain in the dorso-lumbar area. Frequent handling of high loads causes constant critical and sometimes chronic injuries to the spine (CARDOSO, *et al.*, 2017).

Due to the forward projection of the spine during the execution of various activities and movements, it is common to experience greater exhaustion for prolonged periods of time in a given task and greater pressure on the intervertebral disc, especially in the body.te in L4 and L5 (ARRUDA, *et al.*, 2015).

Regarding the cases in which the symptoms are related to the work of caregivers of the elderly, Table 3 shows that 71.42% of the interviewees said that the pain felt in the cervical region is related to work, 7.14% said no and 21.42% had no pain. 64.28% of the interviewees said that the pain they feel in the shoulders is related to the work they do, 7.14% answered that they do not and 28.57% do not feel pain in the shoulders. Of those interviewed, 57.14% said that the discomfort in their arms has to do with work, 7.14% said it does not and 35.71% do not feel anything in their arms. Of the respondents who answered that the pain felt in the elbows is related to the work they perform caring for the elderly, 21.42% answered that it is not related and 64.28% do not feel pain. Of the interviewees, 28.57% said that the discomfort felt in the forearms was related to the task of caring for the elderly, 7.14% said no and 64.28% answered that they did not feel pain in the forearms. Of the respondents who feel discomfort in their wrists, hands and fingers, 28.57% said that the pain they feel is related to their work, 7.14% said they had no relationship and 64.28% said they did not feel anything. Of the interviewees who feel some discomfort in the dorsal region, 42.85% said that this discomfort is related to the work they perform, 0% answered that they do not and 57.14% answered that they do not feel pain. 85.71% said that the discomfort felt in the lower back was related to the task of caring for the elderly, 0% answered no and 14.28% answered that they did not feel anything in the lower back. Of the respondents who feel discomfort in the hip and lower limbs, 64.28% answered that this discomfort is related to caring for the elderly, 0% said that it is not, and 35.71% of the interviewees do not feel discomfort in the hip or lower limbs.



Table 3 - Comparison between symptoms in relation to daily tasks.

Pain Region	They don't feel pain	It has a relationship	It's unrelated
Cervical region	21,42%	71,42%	7,14%
Shoulders	28,57%	64,28%	7,14%
Arms	64,28%	21,42%	14,28%
Elbows	64,28%	28,57%	7,14%
Forearms	64,28%	28,57%	7,14%
Fists/hands/fingers	57,14%	42,85%	0%
Dorsal region	14,28%	85,71%	0%
Lower back	35,71%	64,28%	0%
Quadril/MMII	35,71%	57,14%	7,14%

Source: Survey data

The repetitive tasks of transfers and mobilizations of dependent elderly people cause musculoskeletal pain because they are performed with prolonged and inadequate static posture (GOMES, *et al.*, 2018).

The excessi loadsInadequate postures required by the daily activities of caregivers of the elderly are profoundly associated with the presence of musculoskeletal symptoms, especially in the spine, contributing to impaired quality of life of caregivers and compromising care (LOPES, *et al.*, 2013).

The process of muscular and mental fatigue begins due to the great physical and psychological exhaustion caused by the excess of repetitive activities and inadequate postures, which require a certain physical effortThe double workday often increases the number of complaints of musculoskeletal pain (ALENCAR, et al., 2010).

Regarding the intensity of the interviewees' pain, Table 4 shows that 28.57% of those who feel pain in the cervical region reported that This pain is weak, 28.57% reported being medium, 14.28% severe and 28.57% did not have cervical pain. In the shoulder area, it was noted that 28.57% of the interviewees said that the pain they feel is weak, 35.71% said that this pain is medium, 7.14% of the interviewees said it is strong and 28.57% do not feel it at any time. Of the interviewees, 35.71% reported that they feel a slight discomfort in their arms, 14.28% answered that this discomfort is medium, 7.14% reported that it is strong and 42.85% did not feel any discomfort. 21.42% of respondents said they feel mild discomfort in the elbows, 7.14% reported that this discomfort is medium, 0% said it is strong and 71.42% feel no discomfort in the elbows

at all. In the forearms it is shown that 7.14% of the interviewees reported feeling a weak discomfort or discomfort, 14.28% said that this discomfort is medium, 7.14% said that it is strong and 71.42% reported not feeling any type of discomfort in the forearms. Of the answers that stated feeling pain in the wrists, hands and fingers, 14.28% said that this pain is weak, 7.14% said that it is medium, 7.14% strong and 71.42% reported not feeling any type of discomfort in the region of the wrists, hands and fingers. 21.42% of the interviewees who said they felt pain in the dorsal region reported that the pain is weak, 7.14% answered that the pain is medium, 14.28% that it is severe, and 57.14% reported not feeling anything in the dorsal region. In the lower back, 42.85% of people said they felt weak pain, 28.57% said the pain was medium, 14.28% said the pain was severe, and 14.28% said they did not feel pain in this region. 35.71% of the people who said they felt pain in the hip or lower limbs said that the intensity of this pain is weak, 21.42% said that it is medium, 7.14% that it is strong, and 35.71% do not feel pain in this region.

Table 4 - Intensity of pain felt by the interviewees.

Pain Region	They don't feel pain	Weak	Average	Strong
Cervical region	28,57%	28,57%	28,57%	14,28%
Shoulders	28,57%	35,71%	35,71%	7,14%
Arms	42,85%	14,28%	14,28%	7,14%
Elbows	71,42%	7,14%	7,14%	0%
Forearms	71,42%	14,28%	14,28%	7,14%
Fists/hands/fingers	71,42%	7,14%	7,14%	7,14%
Dorsal region	57,14%	7,14%	7,14%	14,28%
Lower back	14,28%	28,57%	28,57%	14,28%
Quadril/MMII	. 35,71%	21,42%	21,42%	7,14%

Source: Survey data

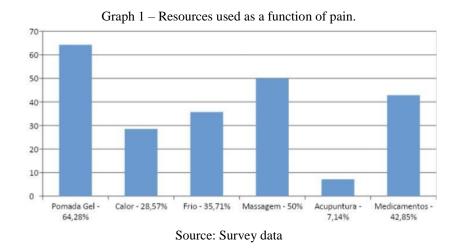
The constant need for mobilization found by the caregiver of dependent elderly people to perform their daily activities requires physical strength and adequate posture to prevent muscle stress, pain and injuries. It's in the There are frequent complaints of pain, especially in the spine, upper and lower limbs (CUNHA, *et al.*, 2013).

The greater the burden received by the caregiver, the worse the intensity of the pain. Older adults with a high level of dependence require more FHSphysical budget on the part of the caregiver may result in the worsening of the pain (DA SIVA GOMES, *et al.*, 2018).



Among the musculoskeletal disorders, the existence of pain throughout the body stands out, being moderate, intense, persistent and uncomfortable. Also the presence of chronic diseases such as arthritis, arthrosis and osteoporosis is noticeable (GOMES, *et al.*, 2021).

Graph 1 shows that 64.28% of the interviewees confirmed the use of ointment or gel, 28.57% said they used heat, 35.71% used cold, 50% resorted to massage, 7.14% used acupuncture, 42.85% took medication for pain relief and 0% resorted to physical therapy.



In terms of chronic pain, nowadays there are a number of options for drug and non-drug treatments, with the purpose of improving the quality of life of patients (DE PAULA PRUDENTE, *et al.*, 2020).

Massage is able to promote good The patient's work is on the muscles and ligaments of the body, reducing and preventing pain. Through manipulation, pressure, friction and sliding movements, it is possible to achieve pain relief, relaxation and improved blood circulation (MILK, *et al.*, 2021).

The use of cold or heat on the skin are effective interventions indicated in the prevention of functional disability, promoting improvement and recovery in the patient's movements and physical function. In addition to having a low cost, ass can be indicated ther means of treatment (DOS SANTOS, *et al.*, 2019).

Regarding the position in which the caregiver of the elderly remains for the longest time during the day of activity, 100% of the interviewees answered that they remain standing most of the time.

In relation to the nWhen they needed sick leave due to pain, 14.28% of the interviewees answered yes and 85.71% never took sick leave despite the pain. Regarding the need for surgery to treat pain, 100% of the interviewees answered that they had never had it.



Standing and static, remaining for a long time leads to the appearance of musculoskeletal symptoms, especially in the lumbar spine (SOUZA, *et al.*, 2022).

Physical damage caused due to the tasks performed in the caregiver's daily life may be linked to the fact that the caregiver spends most of the time standing or in a sitting position, causing pain affected mainly in the lumbar region (DE OLIVEIRA, *et al.*, 2018).

Despite the significant number of caregivers who reported the presence of The number of individuals who have needed sick leave is lower than those who have already needed it. These results can be explained by the fact that the caregiver is often unable to move away from the elderly person because they do not have any support in the performance of their function (MARTINS, *et al.*, 2019).

The responsibility of caring for another person requires renunciations on the part of the caregiver who ends up leaving their personal needs aside, explaining the fact that even with the frequent reports of musculoskeletal symptoms throughout the body, it is common for them not to seek treatments and possible surgeries (LOPES, *et al.*, 2020).

5 CONCLUSION

This study evidences musculoskeletal complaints in caregivers of the elderly in the city of Ecoporanga, Espírito Santo. In view of the results collected, analyzed and compared, it can be affirmed the predominance of musculoskeletal disorders in the lumbar region (71.41%) of the caregivers of the elderly who participated in the research. According to the survey data, the most used resource due to pain is the use of ointment/gel (64.28%). It is concluded that all caregivers of the elderly (100%) complain of musculoskeletal disorders associated with the activity of caring and that despite the discomfort felt, most of the interviewees (85.71%) never needed sick leave due to pain, and all participants (100%) of the research never had the need for surgery to treat pain.

Thus, musculoskeletal alterations represent worrisome complications in the daily lives of caregivers of the elderly, compromising quality of life and causing a feeling of incapacity in these workers. Therefore, the results of the research prove the importance of a multidisciplinary approach to the complaints of caregivers of the elderly, with adequate support to reduce the incidence of these disorders. Encouraging healthy eating habits and physical activity, together with teaching appropriate techniques used to mobilize the elderly, can be examples of preventive care that will contribute to the reduction of musculoskeletal complaints in caregivers of the elderly.



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