

## RECOVERY PROGRAM IN CERVICAL SPONDYLOSIS

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### Abstract

*Introduction: Cervical Spondylosis – arthrosis located at the level of anatomical elements of the cervical region of the spine is manifested through restriction of movement in the body and the pain that can radiate and scapular regions, to the hands. Anatomic narrowing of the spinal canal space by ossification and pressure on the nerve occurs. Objective: He has thought to combat the pain, reduce muscle contracture and restore joint function, increasing mobility, muscle tone, about extra revitalization. Material and Method: The study was carried out on a lot of 16 adult patients, 9 women and 6 men, aged between 31 and 60 years. He has practiced massage therapy and medical gymnastics. Results: The group studied, after treatment, was observed: the disappearance of pain in 11 cases (68,75%); increase joint mobility in 10 cases (62,50%); improvement of the patient's condition at 12 cases (75 %). Discussion and conclusions: Cervical spondylosis is the most common disease of the spine. The incidence of the disease rises significantly after the age of 50 years. The incidence of the disease to the studied is higher in women. At the group studied, the incidence has the great location between C5-C6. Drug treatment acts against cervical pain but his effects are short term and can sometimes be aggressive to people with gastric problems.*

**Key words:** cervical spondylosis, therapeutic massage, exercises

### Introduction

The backbone is the median axis of the trunk and consists of 33-34 vertebrae. Vertebral column begins with the 7 cervical vertebrae (Trașcă, 2008). Cervical Spondylosis – arthrosis located at the level of anatomical elements of the cervical region of the spine is manifested through restriction of movement in the body and the pain that can radiate and scapular regions, to the hands. Anatomic narrowing of the spinal canal space by ossification and pressure on the nerve occurs (Voiculescu, 1990). Symptomatology and causes – this condition can cause headaches, dizziness, circulatory system disorders, brain disorders and bass, and to old people – depressive moods (Ciobanu, 1991). Prophylaxis: giving up to high perinies; exercises conducted periodically; avoid excessive overweight; no smoking; avoid trauma to the spine; prophylaxis, treatment of osteoporosis; avoiding incorrect positions of the cervical spine; presentation to the doctor at the first signs of the disease; avoid positions with the flecked head, for a long time. Medical gymnastics it follows (Avramescu, 2007): cervical muscle toning, combating static postural imbalance, development of the mobility of the spine at the level of the region. Therapeutic massage movement represents all handmade, to the surface of the body for therapeutic purposes. The massage is effective in the treatment of spondylosis. The purpose of the massage on the neck area is to bring blood from the brain. Blood circulation in the brain is directly affected by the movements of breathing time so it is very important that your breath away to be surveilled very well. The patient should sit with his head high very outstretched arms downwards as much as possible, in that way as the neck to be in a state of expansion as more advanced (Serac, 2009).

Effects of massage are both local and general. Of local effects are the release the pain of the spine in the lower back muscles loosening spondylosis, to allow more efficient mobilisation of the coulmm joints, optimizing local manifested by skin redness and heat at the level at which massage is performed . Effects of massage are both local and general business of massage are: inquiry of the status of the general confort of the patient, through the removal of the fatigue, improve sleep and relaxing effect on the entire body, activating the blood circulation at the entire body, increase the basal metabolism, muscle toning, improving the respiratory activity. Therapeutic massage maneuvers are complex and are run in the order of their beneficial effects, not only in the cervical spine affection in our case , cervical spondylosis but also all the anatomical structures ( skin, tendoans, muscles, etc.), as such on the whole body, but the technique respects following rules: Smoothing: is the first and the last maneuver used in massage. Long run by sliding and holding of hands (palmara, fingertips), easy and slow at first and becoming deeper towards the end of the meneuvers. This technique involves slipping and rhythmic hand of the therapist on the patient's skin return circulation (venous and lymphatics). In the case of spondylosis smoothing is made with both palms, starting from the lower chest up , on the grand dorsal trapezium, surrounding the shoulders then reaching the neck. It can perform and smoothing on the column, with 2 fingers apart among which include spiny processes of the vertebrae. The last form of smoothing is the comb, which is done on the muscles well developed: the grand dorsal, the fist unrolled from the root to the tips of the fingers several times. Smoothing has the effect of increasing the muscle, and the exciting terms of psyche, induces wellbeing.

To induce these physiological effects smoothing must run continuously, to be repeated with a constant pressure and average execution rate. The knead. The technique involves lifting the muscles on the bone by compressions plan and quality of police and repeated the other fingers. In the same way they run and knead with two hands. After each kneading is done smoothing of cancellation. The knead is made of 2-3 times each direction. The giving with gel is a form of kneading. Run on the column with 2 fingers spread apart, with spina between fingers. Giving with gel is made with two fingers close together you can run across my back muscles and intercostal muscles. The knead has mechanical effect, increases circulation of blood return, grows muscle excitability and muscle tone, balances the effect of decongestion. Friction -it is made after smoothing by cancellation. I tis made on the column with 2 fingers spread apart, with moves from top to bottom, left, right, left right and vice versa. Friction can be applied and the intercostal muscles, with 2 fingers spread apart, with circular movements, or at the back muscles, muscles with fingers close. Friction vasodilatation favors local train and increases the depth and temperature also has effect it is an analectic calming effect in the treaty and in general on the subject. Vibration -run manually or mechanically. To make the whole palm of the weigher of the vibratory movements Massages are used as independent or joins smoothing, frictioning and pressures. fast and deep.

It is warming and reduces the sensitivity of the skin. Produces a numbing sensation in private. The vibrations associated with other maneuvers have soothing, relaxing effects. Vibrations (or mechanical) applied on the nerve longer decrease sensitivity and their conductivity. . Methodically they activate the circulation of repeated in nerve sheath, favoring the nutrition and stimulating the activity of functional. Vibration effects depend on the magnitude of the pressure and the duration of the manoeuvres. he vibrations are well tolerated, are sometimes the only maneuver allowed the treatment of affections of the nerves. The vibrations help lower the exciting nervous system, correct fatigue . When executed, the stimulant effect scored, and when they are performed on larger surfaces have calming effect. Smooth closing -it is made like smooth from the beginning of the massage, but in reverse order of the sequence of manoeuvres. It has effect of relaxing, calming, smoothing. After the massage you can go to the physiotherapy exercises, muscles being heated, relaxed, pain alleviated, thus mobilizations the spine will be made easier, and the exercise will be more effective. The intensity of these maneuvers must be adapted to local sensitivity. These soothing effects are greater if the massage is applied after beforehand has practiced a shoot of thermotherapy, as effective proving hydro hot or the application of hot air showers. The benefits of the massage increases if after every massage utilizes specific creams with pain relievers, decontracturante effects (Iaroslav, 2002).

**Objectives**

He has thought to combat the pain, reduce muscle contracture and restore joint function, increasing mobility, muscle tone, about extra revitalization.

**Material and methods**

The study was carried out on a lot of 16 adult patients, 9 women and 7 men, aged between 31 and 60 years. He has practiced massage therapy and medical gymnastics. Medical gymnastics exercises (during execution of movements can occur with vertiginous moods and it is recommended that the exercises will run in slow pace and with open eyes):

I – in the supine position with the knees bent and the soles of the soil:

Ex. 1 – the introduction of the chin in the chest, without lifting his head off the ground (trombones chin up);

Ex. 2 – lean forward of the head to the right and to the left with the tendency to stick your ear to your shoulder;

Ex. 3 – roll your head to the right and to the left (the movement is accomplished by describing an arc of a circle with your chin, from one shoulder to the other);

Ex. 4 – raise your chin down the shoulders on the ground, then get off your chin with the neck attached to the ground and lift your shoulders off the ground;

Ex. 5 – exercises of lifting and descending ofshoulders blade (with the neck is glued to the ground, his head in a spin and ear on the ground approaching Chin, shoulder rotation – right then left to head up slightly off the ground with your chin projected forward);

II– the lie flat ventral position (lying on your belly) – hands crossed under the chin:

Ex. 1 – location meant the chin and forehead on the hands;

Ex. 2 – chin to shoulder rests his left, then to the right;

Ex. 3 – with your arms extended and head supported on the ground rises the head on the ground, with "double chin";

III – the position of lateral pressure sores:

Ex. 1 – lifting your head with a tendency to approach shoulder ear;

Ex. 2 – her head resting on her hand, pushing his head down; These exercises are performed on the right and on the left side The exercises were done 4 times a week. After 30 days you will do 2 sessions a day two days break (3 times a week). We study the age, gender, origin and evolution of disease stage. Lot components studied fit the following age groups:

Table 1 Cases studied by age group

Groups of age (years)	Number cases	%
31 – 40	2	12,50
41 – 50	5	31,25
51 – 60	9	56,25
TOTAL	16	100

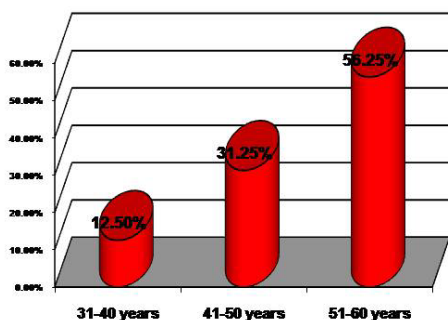


Figure 1 Distribution by age groups

The study of the figure. 1 and table 1. 1 based on the following: morbidity in cervical spondylosis is concentrated in the age range 50 to 60 years, 56,25% of cases. The distribution by sex of the patients with cervical spondylosis of the group studied.

Table 2 Distribution by gender

Gender	Number cases	%
Male	7	43,75
Female	9	56,25
Total	16	100%

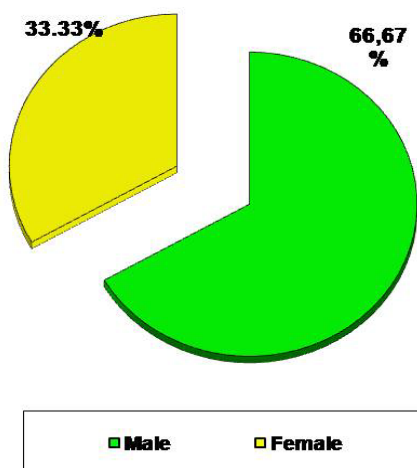


Figure 2 Distribution by gender

The data in fig. 2 and table 2 indicates female sex prevalence, cervical spondylosis, appearing at lot studied, the percentage of 56,25% in women and in the percentage of male. 43,75%. The origin of patients in the studied lot.

Table 3 Origin of patients from the studied lot

The environment arising	Number cases	%
Urban	10	62,50
Rural	6	37,50
Total	16	100

It is observed, the group studied, that the incidence of the patients is dominant in urban areas (62,50%) compared to rural (37,50%) due to a higher exposure to risk factors.

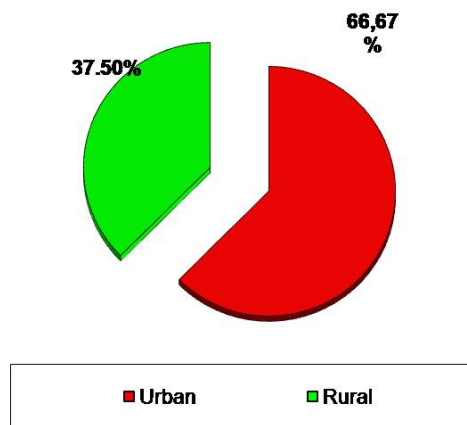


Figure 3 Percentage distribution of patients according to the origin

Risk factors in the patients studied, is presented as follows: \* obesity, found at 8 patients, 50% of the cases; \* osteoporosis, sometimes encountered at 3 patients; 18,75% of cases; \* physical inactivity, met on 12 patients; 75% of cases; \* trauma, found in 5 patients, 31,25% of cases.

**Results**

The group studied, the following treatment was observed: \* the disappearance of pain in 11 cases (68,75%); \* increase joint mobility in 10 cases (62,50%); \* improvement of the patient's condition at 12 cases (75 %).

Table 4 Results obtained following treatment

Obtained results	Number cases	%
Dissapearance of pain	11	68,75
Increase joint mobility	10	62,50
Improvement of patient's condition	12	75,00
Total	16	100

Figure 4 The results obtained following treatment kinetoterapeutic

It should be noted that drug treatment help only temporarily. If you realize the essence of artrozic-type injuries, it's clear that the wear and tear of the joints and bony changes cannot be remedied with medication. You can get treatment for joint protection, but decreased to pain, reducing muscle contracture and restore joint function can be achieved best through physical therapy and therapeutic massage.

**Conclusions**

Imaging tests are conclusive in stating the diagnosis and the attitude to take. Cervical spondylosis is the most common disease of the spine. The incidence of the disease rises significantly after the age of 50 years.

Preventive measures is an important role, resulting in decreased incidence of this disease. the incidence of the disease to the studied is higher in women, 56,25% compared with males, 43,75%. To prevent the aggravation of symptoms, early detection of the disease is very important. Being a chronic disease, degenerative, spondylosis can be submitted completely, but it effectively treats joint pain, immobility, obtaining patient condition improvement and avoiding complications. At the group studied, the incidence has the great location between C5-C6, 11 cases, the percentage of 68.75%, followed by the location of the C6-C7, 31,25% respectively 5 cases. Drug treatment acts against cervical, pain but his effects are short term and can sometimes

be aggressive to people with gastric problems. Physical therapy acts directly on the cause (of the vertebrae and intervertebral disc degeneration describe their rehydration. It leads to restore joint mobility, increasing elasticity and muscle tone, decrease the adverse effects of osteofitels and improve the general condition of the organism in terms of psycho-motric.

Physical therapy associated with therapeutic massage acts against cervical pain with antialgic effect, help increase the troficity of the spine and adjacent areas at decontraction paravertebrale cervical muscle. Physiotherapy effects are much more beneficial and more long-lasting if these procedures associated with therapeutic massage.

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## PROGRAM OPORAVKA KOD CERVİKALNE SPONDILOZE

### Sažetak

*Uvod: Cervikalna spondiloza – artroza, lokalizirana na razini anatomskih elemenata cervikalnog područja kralježnice se manifestira kroz restrikciju kretanja tijela i bol koji se može razviti radijalno kroz skapularno područje u ruke. Pojavljuje se anatomski promjena prostora spinalnog kanala i pritisak na nerv. Cilj: Promišljanja o borbi protiv bola, reducirane mišićne kontrakcije i povrat zglobne funkcije, povećana pokretljivost, kao i tonus mišića i ekstra revitalizacija. Materijal i metode: Istraživanje je provedeno na 16 odraslih pacijenata, 9 muškaraca i 6 žena, uzrasta 31 – 60 godina. Oni su provodili terapiju masažom i medicinsku gimnastiku. Rezultati: Grupna analiza, nakon tretmana je pokazala: smanjenje boli u 11 slučajeva (68,75%); povećanje pokretljivosti zgloba u 10 slučajeva (62,50%); poboljšanje kondicije pacijenata u 12 slučajeva (75 %). Rasprava i zaključak: Cervikalna spondiloza je najčešća bolest kralježnice. Incidencija bolesti značajno raste nakon 50-e godine života. Prema istraživanjima češća je kod žena. Kod istraživanih grupa, incidencija je bila uglavnom između C5-C6 kralježaka. Terapija lijekovima djeluje protiv cervikalnih bolova ali su učinci kratkoročni i ponekad mogu biti agresivni prema ljudima sa želučanim poteškoćama.*

**Ključne riječi:** cervikalna spondiloza, terapija masažom, vježbanje

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