Резюмета Г7 от Академична справка

1. ROLE OF MULTIDISCIPLINARY TEAMS FOR INTEGRATED CARE IN THE SURGICAL TREATMENT OF OSTEOARTHRITIS

Galina R. Petrova, Gergana Nenova, Kalin Mihov, Svetoslav Dobrilov, Todorka I. Kostadinova

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The aim of the following article is to present the role of multidisciplinary team in the implementation of integrated care for patients scheduled for surgical treatment of osteoarthritis. It can include different professionals from health care and social sectors depending on patients‘ needs. Integrated provision of care is connected to a system evaluation of every aspect of the health status of the patient by different health care professionals and team planning of the procedures needed for the patient. Care provided by multidisciplinary team help for the improvement of activity after surgical intervention, functional abilities, psychological and social health.

Key words**:** multidisciplinary team, osteoarthritis, treatment, integrated care

2. DUAL MOBILITY CUPS REDUCE DISLOCATION RATE IN TOTAL HIP ARTHROPLASTY FOR DISPLACED FEMORAL NECK FRACTURES

Maksim Zagorov, Kalin Mihov, Svetoslav Dobrilov, Atanas Tabakov, Alexander Gospodinov, Gergana Nenova

Journal of IMAB. 2018 Apr-Jun;24(2)

PURPOSE: To assess the dislocation rate after total hip arthroplasty with dual mobility cup (DMC) for displaced femoral neck fractures and to compare the results with that of conventional total hip arthroplasty (THA) and bipolar hemiarthroplasty (BHA) in the same clinical setting at our institution.

MATERIALS AND METHODS: 49 cases (47 patients) treated with total hip arthroplasty with DMC, 38 cases (38patients) with BHA and 29 patients (29 cases) operated on with conventional THA were retrospectively reviewed.

RESULTS: In the DMC total hip arthroplasty group, there were no dislocations (0%). %). One dislocation (3,1%) occurred in the BHA group, and 3 dislocations occurred (11,1%) in the THA group.). There was a statistically significant difference in favour of DMC group compared to THA group regarding dislocation rate (p=0,05). Dislocation

rate did not differ significantly between DMC and BHA groups. There was no significant difference in mortality, complications and re-operation rate between groups.

CONCLUSION: Dual mobility cups significantly reduce dislocation rate in total hip arthroplasty performed for displaced femoral neck fractures compared to conventional total hip arthroplasty while sImilar advantage over bipolar hemiarthroplasty could not be demonstrated in the current study.

Keywords: dual mobility cup, dislocation, total hip arthroplasty, femoral neck fractures.

3. MENTORING IN THE FIELDS OF PHYSIOTHERAPY AND INTEGRATED CARE

Gergana Nenova, Paraskeva Mancheva, Todorka Kostadinova, Kalin Mihov, Svetoslav Dobrilov

Journal of IMAB. 2018 Jan-Mar;24(1)

A survey on the opinion of students studying Rehabilitation as a major subject on the role of their mentors and their qualities in the "Student Practice project." The aim of the study is to investigate the point of view of the students, involved in the "Student Practice" project, about the role and the qualities that mentors and academic coaches (physiotherapists) should possess in order to be created a selection criteria. Subject of the survey are 14 students studying at the Medical College of MU-Varna which study "Rehabilitation". These students participated in the "Students practice" project for the period November 2016 - March 2017. A feedback was sought from them through a questionnaire method with an exclusively prepared for the survey questionnaire. The results of the feedback from trainees showed their increased confidence in dealing with patients and their better integration within the work team. The knowledge and skills acquired by students in the "Student practices" project are a prerequisite for the development of mentoring as a priority for the state's education policy, with clear indications for choosing the most appropriate mentor and setting clear tasks for the acquisition of specific knowledge.

Keywords***:*** mentoring, integrated care, physiotherapy

4. COMPUTER TOMOGRAPHIC ANALYSIS OF THE GLENOID COMPONENT IN REVERSE SHOULDER ARTHROPLASTY

Svetoslav Dobrilov

Journal of IMAB. 2022 Oct-Dec;28(4)

The positioning of the glenoid component in RSA (Reverse Shoulder Arthroplasty) is one of the factors determining implant survival and postoperative outcomes. Therefore,

accurate determination of the glenoid version and inclination in RSA is essential for the surgeon – preoperatively to plan his work and postoperatively - to assess the outcome. Excessive retroversion and superior inclination are prerequisites for unsatisfactory results and are associated with a high frequency of revisions. The glenoid inclination is often described as the angle between the glenoid fossa line and the suprascapular reference line. The study included a 2-year follow-up of patients with reverse shoulder arthroplasty in the Department of Orthopedics. The analysis is based on pre / postoperative CT and three-dimensional reconstruction using Medi Cad software. A comparative analysis was made with the results obtained by X-ray examination. The results showed a high incidence of superior inclination of native glenoid fossae. The obtained ß-inclination angle averaged 13.8 °, and the difference in this radiographically measured parameter was 7.3 °. CT analysis preoperatively significantly improves the position of the glenoid component and avoids the superior inclination of the baseplate of the prosthesis.

Keywords: RSA, ß-angle, CT, glenoid inclination

Резюмета Г8 от Академична справка

5. CUSTOM HIP ARTHROPLASTY

Kalin Mihov, Maksim Zagorov, Svetoslav Dobrilov, Atanas Tabakov, Gergana Nenova

Scripta Scientifica Medica, vol. 48, No. 3, 2016, pp. 22-29 Medical University of Varna

Total hip replacement is a rapidly growing procedure due to pain relief, restoring the range of motion and patient's satisfaction. The primary goal is to restore the individual geometry of the patient's hip joint, to achieve long-term component survival and most importantly – to improve the patient's quality of life. In past decades this surgery has had several limitations such as patient's age, bone morphology (incl. Anatomical deformities), previous surgeries, etc. Recently, with the development of modern implants (cups and stems) these limitations have been eliminated. Young patients indicated for THA are always a great challenge, because of their functional requirements, life expectancy, anatomical variations (due to congenital or acquired disorders), greater mobility and higher risk of aseptic loosening. Standard cementless stems have some unsolved issues such as fixed intra/extramedullary dimensions, proximal stress shielding, impingement, etc. They are based on 2D planning and often have a mismatch between the acetabular and the femoral center of rotation. Custom femoral stems are based on a specific 3D scan of the hip joint, which presents the individual shape of the acetabulum and especially that of the femoral canal. This allows for optimal bone support for the stem, preserving bone substance, excellent bone-stem contact and most importantly - restores the center of rotation. For the period 2010-2014 we have operated on 16 patients, 8 were with osteoarthrosis (OA); 4 - with avascular necrosis (AVN); 2 - with dysplastic hips (DDH) and two - with posttraumatic osteoarthrosis. The followup is in 6-42 months. We performed THA with a modified posterior surgical approach

with minimal femoral reaming, due to individual femoral rasp with the same size as the customized femoral stem. During the follow-up period we found no complications. The Harris Hip Score was 97 pts. and 85% of the patients had regular physical exercises for 3 weeks.

Keywords: osteoarthrosis, THA, cementless stems, custom hip, 3D-planning

6. TRANEXAMIC ACID IN THE MANAGEMENT OF BLOOD LOSS IN TKA

Kalin Mihov, Svetoslav Dobrilov, Maksim Zagorov, Todor Gerov, Aleksandar Gospodinov,Gergana Nenova

Scripta Scientifica Medica, vol. 48, No. 4, 2016, pp. 22-28 Medical University of Varna

Total knee replacement is one of most common orthopedic procedures, which is associated with significant blood loss. Administration of tranexamic acid is one of the methods to decrease the perioperative bleeding and haemotransfusion necessity. In the Dept. of Orthopedics and Traumatology, 383 TKA have been performed since 2013. In 250 patients 500 mg IV were administered 10 min prior to first incision and 500 mg IV - at tourniquet release. Topical use of tranexamic acid (TXA) was applied in 58 cases. 1.5 g TXA in 100cc NaCl for 3 min before deflation was administered to the patients. Peri- and postoperative blood loss, hemoglobin level decrease and transfusion requirements were observed. Results showed about 45 % lower bleeding than the control group compared to IV use and about 15% less bleeding compared to the topical application group. All the patients from the control group required blood transfusion after surgery due to blood loss - about 890 ml on average. The topical application group showed average blood loss of 560 ml and the IV group - about 460 ml. None of the patients with IV application of TXA required blood transfusion. Blood loss in the groups with administer TXA, IV or topical, was significantly lower with better results in IV application. Administration of TXA is a safe and reliable method for reducing bleeding associated with TKA which decreases the necessity of haemotransfusion.

Keywords: *TKA, tranexamic acid, blood loss, tourniquet*

7. Arthroscopic treatment of shoulder calcifying tendinitis

Svetoslav Dobrilov, Maksim Zagorov

Medicine and Sport Journal vol 3-4,2016 pp 12-18

Calcifying tendinitis is a common cause of shoulder pain and is characterized by deposition of calcium deposits in the rotator cuff tendons. Mostly prejudice m.Supraspinatus

and rarely m. Infraspinatus or m.Subscapularis. The pathology is characterized more for the females between the ages of 25-45 years and affects more often dominant hand.

Clinical tests and imaging are typical and easy to apply. Arthroscopic treatment is the method of choice in symptomatic patients with prescription of complaints over 3 mounths refractoriness to conservative therapy. This includes arthroscopic debridement, bursectomiya, acromioplasty and in some cases with massive deposites - suture rotator cuff.

For a period of 18 mounths are treated arthrscopically and followed 15 patients with preoperative Constant Score average 34 pts. and achieved postoperative Constant Score - 75 pts.

Key words: calcifying tendinitis, arthroscopic bursectomy,rotator cuff, Constant Score

8. Arthroscopic recovery of partial intra-articular two-line tear of the supraspinatus muscle

Maksim Zagorov, Kalin Mihov, Svetoslav Dobrilov

Medicine and Sport Journal vol 3-4,2017 pp 12-16

Partial thickness articular sided supraspinatus tears are a common cause of pain and functional disability in the shoulder. Despite that the diagnosis and optimal treatment remain controversial. The purpose of this article is to present our surgical approach in the treatment of partial thickness articular sided supraspinatus tears and results at 5 to 48 months follow-up in a group of 12 patients.

Key words : partial thickness articular sided supraspinatus

9. TOTAL HIP REPLACEMENT USING DUAL MOBILITY CUP

Maksim Zagorov, Kalin Mihov, Svetoslav Dobrilov, Emil Konstantinov

Bul. Journal Ortoped. Trauma vol 54 1-2017 pp 48-53

Dislocation after total hip replacement (THR) is major complication. Instability has become the leading cause for revision THR in a number of national registries in the past few years. A number of patient related risk factors lead to an increased risk of instability after THR. The dual mobility cup concept has been developed and introduced in France in mid 1970's in attempt to improve range of motion and decrease the risk of instability. We present our clinical experience with the dual mobility cup in total hip replacement in a series of 85 cases (76 patients) with mean follow up of 12.1 months (7-54 months).

Significant risk factors for postoperative hip instability were present in most of the patients in our cohort. 71 cases of primary hip replacement and 14 cases of revision hip arthroplasty were included. A major finding was that no dislocation of both groups of primary and revision THR was recordered during follow up period. Total hip replacement using dual mobility cup is safe and efrective method in terms of reducing the risk of dislocation in both primary and revisional settings and gain very good functional results in risk group patients.

10. Primary muscular echinococcosis in the gluteal region - a clinical case

Zhelyazkov G., Dobrilov S., Mihov K., Gerov T., Nenkov R., Marinova R.

Bul. Journal Ortoped. Trauma 2017, 54(1), 54-56

Cystic echinococcosis (hydatid disease, dogtape worm) is a severe parasitic disease in humans which is caused by Echinococcus granulosuss encapsulato. The man is an intermediate host in the life cycle of the parasite.The dog or other predators represent definitive (final or primary) host. In humans lungs and liver are the most common localisation (95%) of this parasitic disease. Primary cystic echinococcos is of skeletal muscle is an extremely rare form with a frequency of 3-5%.

We present a case of a 30-years old woman with complaints of recent onset of swelling in the left gluteal muscle, confirmed by ultrasound and MRI as unilocular lesion, with approximate dimensions 15/13/10 cm. PAIR-surgery with subsequent surgical excision established a hydatid cyst with a diameter of 15 cm located in the left gluteal muscle reaching the iliac bone without any lesion of the bone itself. The histology confirmed the diagnosis. Abdominal ultrasonography and chest x ray showed no other cystic lesions.

Keywords: cystic hydatid disease, hydatid cyst, skeletal muscle

11. Distal rupture of the quadriceps femoris

Mihov K., Dobrilov S., Zagorov M., Tabakov A., Gospodinov A., Nenova G.

Medicine and Sports, 2018, 1-2, 4-7

Muscle ruptures are highly frequent in sport traumatology, representing 31% of all football injuries, 16% of all injuries in athletics and between 22% and 46% of the injuries in basketball and American football. In the event of such an injury occurs, the fibrosis of the ruptured area may lead to reduced muscle functions resulting in reduced ability to perform in sport. The ruptures of quadriceps femoris are one such example. They occur while jumping,

squatting, kicking i.e. at a phase of contraction against resistance. Distal ruptures of the quadriceps are not that common; they are observable in middle-aged athletes. Nevertheless, they represent a challenge due to the accompanying alterations of the muscle, patient's activity and duration of recovery. We hereby present a study involving four patients at an average age of 57.2 years who underwent surgery at the Orthopedics & Traumatology Unit of the St. Marina Hospital (Varna) in a space of 18 months. During the surgical intervention, the free ends of the muscle were mobilized and sewn with the thread of the bone anchors which were placed in the upper pole of the patella. The post-surgical protocol involved gradual flexion of the knee joint followed by normal steps under bodyweight pressure.

KEY WORDS**:** quadriceps femoris, ruptures, bone anchors, rehabilitation

12. Dual mobility cups reduce dislocation rate in revision total hip arthroplasty

Zagorov M., Mihov K., Dobrilov S., Gospodinov A., Tabakov A.

Bul. Journal Ortoped. Trauma 2018, 55(4), 172-182

Dislocation is major complication after revision total hip arthroplasty with rate rangig up to 28%. There is worldwide growing interest in the use of dual-mobility cups (DMC) in revision total hip arthroplasty and a numbers of recent papers report lower dislocation rate in revision hip arthroplasty using dual-mobility acetabular constucts compared to conventional cups with femoral heads ≥ 32 mm.

The aim of this study is to evaluate wether the use of dual-mobility cups results in lower dislocation rate in revision total hip arthroplasty compared to the use of convetional cups with fixed polyethylene bearing and femoral heads with diameter 32mm or 36mm.

Two groups of patients treated with revision total hip arthroplasty in our institution between November 2013 and November 2017 were retrospectively reviewed. First group consisted of 25 cases of revision total hip arthroplasty with DMC nad the second group consisted of 14 cases of revision total hip arthroplasty with convetional cup wit fixed polyethylene bearing. Mean follow-up was slightly over 2 years.

In the DMC revision hip arthroplasty group there were no dislocations (0%).Two dislocations (14.29%) occurred in the convetional cup group and the difference was statistically significant ($p < 0,05$).

This study shows that the use of DMC lead to lower dislocation rate in revision total hip arthroplasty compared to convetional cups with fixed polyethylene liner and head diameter 32-36 mm.DMC can help prevent dislocation in high-risk patient undergoing revision total hip replacement. Our results demonstrate excellent survivorship and absence of specific complications at mean follow up of 2 years.

13. Coblation tenoplasty in patellar tendinitis (jumper’s knee)

Mihov K., Dobrilov S., Zagorov M., Marinov M., Tabakov A., Nenova G.

Medicine and Sports, 2018, 3-4, 12-16

Jumper's knee/ Patellar Tendonitis (PT) is a clinical condition characterized by pain in the lower pole of the patella resulting from chronic overuse and development of degenerative changes in the patellar tendon. PT is most common among athletes practicing disciplines with multiple jumps - basketball, volleyball, etc. Chronic loading is considered the most common cause, although the etiology and pathogenesis of this condition has not been fully studied. The absence of a typical inflammatory response in the tendon is the reason that this condition is defined as tendinosis. Clinical differentiation of the tendinosis and tendinitis is often not possible - this becomes histologically. The frequency of PT in sportsmen's populations varies between 40% and 50% for volleyball players and 35% -40% for basketball players. Lack of improvement after conservative treatment of this condition is an indication of operative treatment. Coblation tenoplasty is a mini-invasive method leading to revascularization and repair of the degenerative segments of the patellar tendon. Over a period of 1 year, we followed 4 patients treated with the indicated methodology. For the follow up period, we have reported pain reduction, tendon repair, and return to sport to the pre-morbid level.

Key words: patellar tendonitis. tendinosis, coblation tenoplasty, jumper’s knee

14. Stitches for meniscal lesions in athletes - contemporary trends

Mihov K., Marinov M., Dobrilov S., Zagorov M., Tabakov A., Nenova G.

Medicine and Sports, 2018, 3-4, 12-16

Meniscal lesions are the most common damage to soft tissues of the knee, reaching up to 74% of all. They are often found in dynamic and contact sports - football, basketball, volleyball, rugby, wrestling, skiing. In these sports, the knee is often placed in a position of light flexion, where rotational movements are made - a prerequisite for squeezing meniscus between the tibia and femoral condyles.

Diagnosis is performed by clinical examination and imaging, preferably MRI. As a standard, arthroscopic treatment is now underway, and meniscal suture is operation for which there are strong indications. For a period of one year, 275 patients with meniscal lesions were operated in Department of Orthopedics and Traumatology at "St. Marina" University Hospital in Varna, with 9 of them having meniscal suture.

KEY WORDS: Meniscal lesion, Meniscal suture, Diagnosis, Clinical examination, MRI.

15. “Snapping” scapula due to osteochondroma of the bone surface

Mihov K., Dobrilov S., Zagorov M., Marinov M., Nenova G.

Medicine and Sports, 2019, 1-2, 8-12

“Snapping” scapula is a syndrome causing impairment in scapulathoracic movement. The etiology of “snapping” scapula varies, and the predisposing factors are scapular winging, bursitis overload and periscapular lesions, most common of which is ostreochondroma. We present a case of 16-year-old boy with clinical presentation of “snapping” scapula. The patient complains of movement restriction, “snapping” and pain during shoulder movement. Up to now, the periodical conservative treatment has led to no improvement. A CT exam with 3D reconstruction demonstrated bone exostosis of the ventral surface of the scapula, with characteristics of osteochondroma which deforms the ribs and lungs. Open resection is the method of choice in symptomatic lesions. The postoperative period has been mainly focused on early recovery of the range of motion.

KEY WORDS: “snapping” scapula, osteochondroma, scapular dyskinesia.

16. Distal rupture of musculus triceps brachii in athletes: a clinical case study

Zagorov M., Dobrilov S., Hadji S., Mihov K

Medicine and Sports, 2020, 1-2, 12-16

A limited number of case reports and small series report mixed clinical results on the optimal treatment of distal ruptures of m. triceps brachii. Early surgical repair is usually recommended to avoid functional impairment of the elbow. A number of surgical techniques have been proposed with not enough literature to support one over another. We present a case of total distal rupture of m. triceps brachii in a 42 years old weight lifting athlete. Our preferred surgical technique combines a proximal row of two suture anchors with two transosseus sutures to achieve anatomic reconstruction of the tendon footprint.

KEY WORDS: distal rupture of m.triceps brachii, anatomic repair, suture anchor technique.

17. ACL reconstruction with quadruple ST-graft, full size tibial tunnel and extracortical fixation- surgical technique

Dobrilov S., Zagorov M., Mihov K., Tabakov A.

Medicine and Sports, 2021, 1-2, 24-28

Rupture of the anterior cruciate ligament (ACL) is one of the most common sports injuries. The main tendons used for reconstruction are those of the patellar tendon (BTB) and that of the semitendinosus (ST) - alone or in combination with the gracilis tendon (G). Anatomical reconstruction of ACL with extracortical graft fixation is a technique that is gaining popularity due to a number of advantages of surgical technique and graft fixation. The extracortical fixation system allows optimal regulation of the graft tension, stable fixation and the possibility of early rehabilitation, without the risk of a number of complications typical of other techniques.

KEY WORDS: Extracortical fixation, button, quadruple ST graft.

18. Diagnosis and treathment of osteochondral defects of the knee joint attending the meniscal injurys

Marinov M., Raikov D., Mihov K., Dobrilov S., Zagorov M., Grigorov V., Nenova G.

Medicine and Sports, 2022, 1-2, 12-16

Treatment of knee cartilage damage remains a major challenge for the orthopedic practitioner. Nowadays, a wide range of therapeutic approaches are used, starting with conservative methods, arthroscopic interventions, osteochondral auto and allo-transplantation, cell-based techniques, growth factors and the latest gene therapy techniques (1). Regardless of the method of treatment or the origin of the recovery factors, the result is usually fibrous cartilage, which does not have the biomechanical characteristics needed to withstand the stress developing in the knee of an active athlete (2). This cartilage usually deteriorates over time, as a result of which the initial symptoms return, progression and sometimes osteoarthritis occur. When inappropriate treatment is chosen, damaged hyaline cartilage, which has limited reparative capacity, shows a tendency to degeneration and subsequent deterioration of knee function.

KEY WORDS: Debridment, Abrasion arthroplasty, Microfracture.

19. Functional knee phenotypes of young osteoarthritic patients

Grigorov V., Dobrilov S., Mihov K., Zagorov M.,

Medicine and Sports, 2022, 1-2, 20-23

`The currently used classification of the lower limb alignment (neutral, varus and valgus) does not consider the orientation of the joint line or its relationship to the overall limb alignment. Similarly, current total knee arthroplasty alignment concepts do not sufficiently consider the variability of the native coronal alignment. Therefore, there is a need of change in the classification of the lower limb alignment, based on phenotyping, in non-osteoarthritic patients and in ones with developed osteoarthrosis.

KEY WORDS: Hip-knee-ankle angle (HKA); Femoral mechanical angle (FMA); Tibial. mechanical angle (TMA); Joint Line Convergence Angle (JLCA).

20. EPIDEMIOLOGY AND RISK FACTORS FOR MENISCUS INJURIES

Marinov M., Raikov D., Dobrilov S., Grigorov V., Nenova G.

Varna Medical Forum 2022 (11) 1 108-118

Meniscus injuries are the cause of some of the most common surgical interventions. They represent 15% of all sports injuries. There are modifiable and non-modifiable risk factors. The modifiable ones include body mass index (BMI), sports and occupational exposure. The second type includes: sex, age, anatomical features— differences in the length of the limbs, biconcave tibial plateau, joint laxity, and disc-shaped meniscus.

Keywords: meniscus injuries, risk factors, epidemiology

21. THE POSSIBILITIES OF OSTEOPATHY IN THE ORTHOPEDIC PRACTICE

Svetoslav Dobrilov, Slavyan Ivanov, Kristina Vasileva

Bulgarian patients' problems related to chronically recurring complaints in the locomotor apparatus prompted them to search for new possibilities to deal with the disease. Doctors in orthopedics and traumatology are the first medical specialists such patients seek help from. Related professionals applying manual techniques are chiropractic doctors, chiropractors and osteopaths. Historically, the practice of osteopathy began in the USA in 1874 and later spread throughout Europe and the Balkan Peninsula. Today, the presence of osteopathy in Bulgarian healthcare is indisputable, but to what extent it has found its place in the treatment of orthopedic problems is a question that still awaits its answer. The purpose of

this article is to explore the essence and possibilities of the application of osteopathy in orthopedic practice.

Keywords: osteopathy, traumatology, orthopedy, chiropractic

Резюмета на публикации извън минималните изисквания

22. Adverse reaction to metal debris in metal-on-metal the with large diameter femoral head. A report of 2 cases

Zagorov M., Mihov K., Antonov B. , Dobrilov S., Krasnaliev I., Kinov P.
Bul. J. Ortop. Trauma Vol. 52, 2-2015 , 89-100

Despite the potential advantages of large diameter metal-on-metal (MoM) total hip arthroplasty (THA) a number of adverse local tissue reactions resulting from wear and hypersensitivity to metal debris have been described that may lead to pain, osteolysis, loosening and early failure of MoM THA. Adverse Reaction to Metal Debris (ARMD) is the currently preferred umbrella term that describes the variety of clinicopathologic forms with typical histologic features. We describe the first two in Bulgaria cases of documented MoM THA failure due to ARMD with formation of periprosthetic pseudotumor and joint effusion. Revision to non metal-on-metal bearing is the choice of treatment. Surgical treatment should be undertaken before significant bone loss and soft tissue damage occurs in order to gain good clinical results.

Key words : pseudotumor, metal-on-metal THA, ALVAL, ARMD

Резюмета на публикации използвани за заемане на АД „гл. асистент“

23. Subpectoral tenodezis of long head of m. biceps brachii with bone anchor

Zagorov M., Dobrilov S.

Medicine and Sports, 2016, 1-2, 6-10

Pathology of the tendon of long head of biceps muscle (LHB) is common cause for shoulder pain. There is a great variety of tendon alterations starting from tendinosis and tendinitis, instability presented always with co-existing rotator cuff pathology , spontaneous rupture and pre-rupture and frequently with biceps insertion pathology- SLAP lesions. Present operative treatment of LHB is consisted of tenotomy or tenodesis. Despite some controversies , more autors prefer tenodesis, because effective pain relief combined with preserving length/tension ratio , avoiding cosmetic deformity and painful muscle cramps

and preserving function of the LHB in elbow. Mini-open subpectoral tenodesis of LHB with bony anchor has certain advantages and is safe nad effective method with excellent clinical results.

KEY WORDS: Biceps, subpectoral, tenodesis, anchor, tendinosis.

24. INTEGRATED CARE MODELS FOR PATIENTS WITH OSTEOARTHRITIS IN CANADA

G. Petrova, G. Nenova, K. Mihov, Sv. Dobrilov, T. Kostadinova, E. Georgieva, P. Mancheva

Social Medicine 2015 , (4) , 31-33

The publication presents some Canadian integrated care models for patients with osteoarthritis. The implementation of these multidisciplinary care is connected with good communication and connection between the sides involved. Key elements are: application of disease specific interventions, varying from diagnostics, treatment, rehabilitation, and patients training. Integrated care models for patients with osteoarthritis includes mainly general practitioners and/ or teams of health specialists (psychologist, physiotherapist, etc.) in the system of primary medical care. Determination of the components and evaluation of the integrated care for patients with osteoarthritis is based on the theory of Alter.

Key words: models and methods of evaluation, integrated care, osteoarthritis, multidisciplinary teams

Резюмета на публикации използвани за придобиване на ОНС „Доктор“

25. TREATMENT OF ANTERIOR SHOULDER INSTABILITY WITH ACCOMPANYING BONE LOSS

Dobrilov S., Zagorov M., Mihov K.,

NOTICES OF THE UNION OF SCIENTISTS – VARNA "Medicine and Ecology" SERIES vol 17, 2’2012, 25-29

Anterior shoulder instability is condition which has very high percent among young sportsmen, especially over-head athletes and contact sports. It is a result from primary traumatic anterior dislocation which has coexisting bone loss. Instability, as complication, has significant importance for active and professional sportsmen. Bony defect of anterior

glenoid rim (Bony Bankart) is the primary cause for anterior instability.
Material and methods: Since 2010 in the Department of Orthopedics and Traumatology (UMHAT St. Marina) has been operated 12 patients - 4 of them are professionals and total 8 are with high physical activity (fitness, swimming, athletics).
75% of them had at least two traumatic recurrent anterior dislocations. Standart X-rays, CT (contrast CT) and MRI/with contrast are used for evaluating bone loss. In combination ISIS score is used for operating decision. Latarjet technique (coracoid transfer) has been used for treatment of anterior instability.
Results: All patients had smooth postoperative period and no inflammations were noticed. More than 80% of patients had at least 90 degrees of active abduction 6 weeks post operation. Two of professional players returned to competitive sports on schedule (18-th week). No recurrent instability has been detected- negative Apprehension test.
Discussion: Latarjet operation (coracoid transfer) is method of choice for treatment young athletes with recurrent dislocations with coexisting bone loss. This method is reliable and has two main advantages: enlarges contact surface of glenoid and forms dynamic stabilization when upper limb is at unstable position- abduction and external rotation

Key words: Recurrent shoulder dislocation; anterior instability; Bony Bankart; Latarjet technique

26. Bipolar bone defects of the glenohumeral joint - evaluation and treatment

Dobrilov S., Zagorov M., Mihov K.,Tabakov A.

NOTICES OF THE UNION OF SCIENTISTS – VARNA "Medicine and Ecology" SERIES vol 19, 1'2014, 10-15

Background: Glenohumeral instability is inability of the humeral head to stay centered in the glenoid fossa. It is a clinical diagnosis manifesting abnormal translation of the humeral head over glenoid in active rotation. Bipolar bone defects are result from traumatic glenohumeral dislocation and are cause for instability and failure of arthroscopic stabilization. Due to this fact, it is of great importance accurate diagnostics of these defects, evaluation of their volume and their relation to each other.

Material and methods: Since 2010 in the Department of Orthopedics and Traumatology (UMHAT St. Marina) has been operated 18 patients-more than half are with high physical activity(fitness, swimming, athletics). All of them had at least three traumatic recurrent anterior dislocations. Most of the patient had bipolar bone defects. Clinical evaluation (stress-tests), standart Xrays and 3-D CT (contrast CT) are used for evaluating bone loss. In combination ISIS score is used for operating decision. Bipolar bone defects are indicated for Latarjet technique (coracoid transfer) for treatment of anterior instability.

Results: 70% of the patients had Rowe score excellent and 16 % had very good score. Smooth post-operative period and no inflammations were noticed. We noticed mean 7° restriction of external rotation. Three of professional players returned to competitive sports on schedule (18-th week). No recurrent instability has been detected-negative Appre- hension test.

Discussion: Bipolar bone defects are estimated to 8-95% for Bony Bankart and 25-100 % for Hill-Sachs defects. Itoi et al. introduced "glenoid track " consept, with 3-D CT, bipolar bone defect were identified and evaluated in different upper extremity positions.

Key words: bipolar bone defects, instability, "glenoid track"; Latarjet technique

27. ASSOCIATION BETWEEN THE RISK FACTOR FOR ANTERIOR GLENOHUMERAL INSTABILITY AND BONE LOSS IN ACTIVE SPORT PLAYERS

Dobrilov S., Zagorov M., Mihov K.

Scripta Scientica Medica, vol. 47, No 3, 2015, pp. 33-38

INTRODUCTION: Practicing mass and professional sport is with growing popularity among young people. Sports like football, basketball, volleyball, and contact disciplines-boxing, martial arts , etc. are highly connected to trauma. Shoulder dislocation is very frequent, which in most of the cases turns into instability. The main cause for it is glenoid and/or humeral bone loss.

MATERIAL AND METHODS: For the period 2010- 2015 in the University Hospital "St.Marina" there were operated 22 patients with high physical activity- 5 of them were professional athletes. The volume of bone loss is measured with CT and with method proposed by Sugaya. The indications for operative treatment are based on history, clinical exam, imaging and ISIS score. The operative treatment performed is coracoid transfer over glenoid rim.

RESULTS: All patients had significant, for instability, bone loss. The postoperative period was smooth and there were no instability recurrences detected for the follow-up period.

CONCLUSIONS: Glenohumeral instability in athletes is a result of recurrent shoulder dislocations, thenmain cause for which is glenoid and/or humeral bone loss. Detecting and measuring the level of this bone loss is of great importance to the correct treatment algorithm , leading to joint stability and return to active and competitive sports.

Keywords: *Glenohumeral instability, glenoid, bone loss, ISIS score*

28. Treatment of recurrent anterior shoulder instability with associated glenoid bone loss.

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Recurrent anterior shoulder instability is commonly associated with glenoid bone defects. Unrecognized bony deficiency is a major reason for failure of soft tissue Bankart procedure (either arthroscopic or open). When the defect is significant, bony reconstruction is typically necessary. Our series consist of 11 patients with recurrent anterior shoulder instability with significant glenoid bone loss treated by mininvasive modified congruent arc Latarjet procedure. During follow up no redislocation was observed. Rowe score was excellent in 70% and very good in 16% of cases. Bony augmentation of glenoid articular surface by the technique described is a safe and reliable method for treatment of anterior shoulder instability in the demanding group of patients presenting with glenoid bone loss and concomitant risk factors.

KEY WORDS: Recurrent anterior shoulder instability, glenoid bone loss, Latarjet.