

**Introduction.** The distal radioulnar joint (DRUJ) is unique as it is not a joint but a continuation of the forearm joint. The incidence of DRUJ instability after a distal radius fracture is reported to be between 10% - 40%. DRUJ instability is an increasingly recognized clinical problem. Most patients experience no symptoms but in some people it can lead to disabling symptoms such as pain and impaired function. There has been an increasing trend to intervene surgically to treat DRUJ instability but with variable result.

**Aim of the study.** To evaluate the intermediate term results (follow up of five years) posttraumatic DRUJ instability according to data from medical records, surgically method used in DRUJ instability, follow-up by Mayo wrist score, Disabilities of the Arm, Shoulder and Hand questionnaire (DASH score).

**Materials and methods.** We have performed a study of patients with DRUJ instability that consecutively was treated in department of Hand Pathology with the application of microsurgical techniques (6 Section) of Traumatology and Orthopedics Clinical Hospital, Chisinau in the period 2013 - 2017. Outcomes were determined by using DASH and Mayo wrist scores. All results were presented as mean  $\pm$  standard deviation ( $\pm$ SD).

**Results.** We found 28 patients with posttraumatic DRUJ instability. The report between sex was 18:10 with predominance of female gender. Exist 3 types of surgically methods: direct, indirect and reconstruction of ligaments of DRUJ. At 26 patients was applied direct surgically procedure from them extrinsic interventions: were 4 – Darrach procedure; correction osteotomies of ulna – 9; correction osteotomies of posttraumatic malunion of distal radius – 12; and one intrinsic procedure Sauve-Kapandji. Stabilization by reconstruction of ligaments of DRUJ instability were treated 2 patients. DASH and Mayo wrist scores showed poor results at patients after Darrach procedure with a mean of  $55\pm 2$  and  $60\pm 1$ , satisfactory result at Sauve-Kapandji procedure 75 and 80, relatively good results at correction osteotomies of posttraumatic malunion of distal radius  $70\pm 2$  and  $75\pm 1$  and excellent result were obtained just at younger patients (6 cases) to which were applied surgically procedure of correction osteotomies of ulna  $88\pm 2$  and  $90\pm 1$ , in rest was poor result  $50\pm 5$  and  $60\pm 2$ .

**Conclusions.** Diagnostics of the DRUJ Instability was problematic early in Republic of Moldova. It is necessary to make a study to improve the imaging quality diagnoses of soft tissue pathology, especially for peripheral TFCC tears and TFCC detachment from the fovea for establishing the correct diagnosis and apply an ample reconstruction.

**Key words:** distal radioulnar joint, instability, stabilisation.

### 193. SURGICAL TREATMENT OF OSTEOPOROTIC TROCHANTERIC FRACTURES

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**Introduction.** The trochanteric fractures are often encountered in elderly people and make up 3 - 5% of all falls. At the same time, the fracture rate of these fractures increases with age and in patients over 70 years risk for fracture will be ten times bigger than those aged 50-60 years.

Over 50% of women and 45% of men over the age of 50 do physiological osteoporosis, older women have a 50% higher risk than men to make a fracture.

**Aim of the study.** To establish the correlation between trochanteric fractures and osteoporosis, as well as the implant that will be necessary to be used for the surgical treatment of these fractures.

**Materials and methods.** In this study were included 34 patients with trochanteric fractures, 14 men and 20 women hospitalized in the 2nd Department at the Clinical Hospital of Orthopaedics

and Traumatology from January 2015 to December 2015. All patients were treated surgically, with age average of 67 years, the youngest was 46 and the oldest was 85 years old.

**Results.** The study was based on 34 medical cases. The types of implants or endoprostheses used in the treatment of trochanteric fractures were: total cemented hip prosthesis Zimmer in 4 patients, blade-plate 95° - 14 patients, 2 cases fixed with DHS (dynamic hip screw), another 2 cases with PFN (proximal femoral nail) and cemented unipolar Austin-Moore prosthesis in 12 cases. In patients with high degree of osteoporosis with total or unipolar cemented prosthesis, were mobilized in second day after surgery, they had no sitting or lying difficulties and maximum in 6 days after surgery they start to walk with pressure on lower limb as soon as the painful postoperative syndrome was solved. In patients operated with blade-plate, DHS or PFN with better bone quality mobilization in the bed was done in the second day after surgery and in the first week after surgery they start to walk in crutches without pressure on the operated limb.

**Conclusions.** Surgical treatment of trochanteric fractures remains the basic method of treatment complications of bed immobilization. Hip replacement is a successful procedure for the elderly, over 75 years with osteoporosis and comorbidities, being life saving, because it makes possible to accelerate patients mobilization and movement, therefore maximized the patients functional outcomes.

**Key words:** trochanteric fractures; hip arthroplasty; proximal femoral nail; osteoporosis.

#### **194. PERIPHERAL NERVE INJURY OF THE FOREARM: ETIOLOGY AND LESIONAL COMPLEXITY ASPECTS**

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**Introduction.** Peripheral nerve disorders comprise a gamut of problems that significantly affect patient function and quality of life. Peripheral nerves are structures that suffer injuries similar to those seen in other tissues, resulting in important motor and sensory disabilities. It is estimated that the incidence of traumatic lesions is as high as 500.000 cases per year in some countries, where 2,8% of the patients become permanently disabled due to prolonged nerve regeneration time (Noble et al., 1998; Rodrigues et al., 2004)

**Aim of the study.** Identification and examination of etiology and lesional complexity aspects in peripheral nerve injuries of forearm, as well as their independent contribution to obtained results after repair.

**Materials and methods.** A retrospective study of 200 patients surgically treated during the period 2014-2016 in our clinic. From total amount of patients, 81% (162) were men and 19% (38) women. Age limits were between 17 and 83 years. Most frequently was affected ulnar nerve, being injured in 56% cases (112 patients). Lesion of median nerve was in 36.5 % cases (73 patients) and radial nerve - in 7.5% cases (15 patients).

**Results.** In study group, the most frequently lesional mechanisms were by cutting in 78 % cases and traction or contusion in 22 % cases. Therewith was established that in 96% cases were associated a muscular or tendon injury, in 31.4% cases – open fractures of forearm bones and vascular lesions - in 48.6 % cases.

**Conclusions.** In open injuries of the forearm the ulnar nerve is the most frequently injured, being often accompanied by damage of tendons and vessels. Complexity of trauma has a negative influence on primary survey, recovery and restoration of work capacities.

**Key-words:** nerve, injury, forearm