

Guidelines to be followed by centres, services and units in order to be designated as Reference Centres, Services and Units of the National Health System, as agreed by the Interterritorial Board

25. PELVIC OSTEOTOMIES FOR THE TREATMENT OF HIP DYSPLASIA IN ADULTS

Pelvic osteotomy involves making cuts in some sections of the pelvic bones rotating the cut fragments in order to covert the femoral head with the acetabulum, trying to improve the structural and biomechanical anomalies of the hip joint^{1,2,3,4}.

This surgical technique is indicated for hip dysplasia cases, that is, for hips lacking coverage or incongruent hips; for patients under 60 years old who have a degenerative hip disease in early stages, Tönnis grades “0” and “1”^{1,5,6}.

There are multiple pelvic osteotomies techniques, most of them performed in many hospitals, except for periacetabular osteotomy, a complex procedure where experience is important in order to obtain good results and requires a learning curve in order to avoid complications^{7,8,9,10}.

Centres performing these specific techniques must have experience in diagnosis and treatment of pathologies often related to hip dysplasia such as coxofemoral joint labrum injuries and open or arthroscopic treatment of the femoroacetabular impingement syndrome. Besides, in order to treat these pathologies, they must have surgical experience on hip arthroscopic techniques and open osteoplasty technique, either through minimally invasive techniques or through secure dislocation of femoral head^{21,22}.

A. Rationale for the proposal

► Epidemiological data on the condition (incidence and prevalence).	Coxarthrosis affects 2-4% of the population over 40 years of age. Hip dysplasia causes this type of arthrosis in 40% of the cases in the fifth decade of life ^{11,12,13} .
► Data on the use of pelvic osteotomies for the treatment of hip dysplasia in adults.	Periacetabular osteotomies are performed in a low number of cases in our hospitals. In Spain there are not data published on the number of osteotomies performed; however, according to data from cases presented in national symposiums, there are no more than 300 cases in a year of all types of pelvic osteotomies performed in young adults (Chiari, etc.) ^{14,15,16,17,18} , with no more than 50 cases of periacetabular osteotomy.

B. Guidelines to be followed by Centres, Services and Units in order to be designated as Reference Centres, Services and Units performing pelvic osteotomies for the treatment of hip dysplasia in adults

<p>► Experience of the Reference Centres, Services and Units:</p> <p>- Activity:</p> <ul style="list-style-type: none"> • Number of pelvic osteotomies for the treatment of hip dysplasia in adults that should be performed in a year to ensure an adequate care. <p>- Other data: research on the subject, postgraduate teaching, continuing training, etc.</p>	<ul style="list-style-type: none"> - 15-20 pelvic osteotomies for the treatment of hip dysplasia in adults in a year^{19,20}. - Accredited postgraduate teaching: unit participation in the internship and residency programme of the centre. - Participation in research projects and publications in the field^a. - Continuing training programme standardized and authorized by the centre board of directors. - Availability of training on hip osteotomy for other professionals.
<p>► Specific resources of the Reference Centres, Services and Units:</p> <p>- Human resources required for the adequate performing of pelvic osteotomies for the treatment of hip dysplasia in adults.</p> <p>- Basic education of the team members^b.</p> <p>- Specific equipment required for the adequate treatment of pelvic osteotomies for the treatment of hip dysplasia in adults.</p>	<ul style="list-style-type: none"> - 1 Hip unit coordinator. - At least 3 orthopaedic surgeons assigned to the Hip unit. - Nursing staff, surgical auxiliaries and technicians. - Hip unit with at least three years of experience in pelvic osteotomy, hip and pelvic surgery and acetabular osteosynthesis. - Operating theatre with: <ul style="list-style-type: none"> • Radiopaque tabletop. • Intraoperative radiology equipment.

<p>► Resources from other units and services besides those belonging to the Reference Centres, Services and Units required for the adequate performing of pelvic osteotomies for the treatment of hip dysplasia in adults.</p>	<ul style="list-style-type: none"> • Specific instrumental for hip surgery. • Osteosynthesis instruments. <ul style="list-style-type: none"> - Intensive care services/unit. - Anaesthesia services/unit. - Vascular surgery services/unit. - Rehabilitation services/unit. - Radiodiagnosis services/unit, including three-dimensional CT scan and MRI. - Transfusion services. - Laboratory services/unit.
<p>► Procedure and clinical results indicators of the Reference Centres, Services and Units ^c:</p>	<p>The indicators will be agreed with the Units that will be designated.</p>
<p>► Existence of an adequate IT system (Type of data that the IT system must include to allow identification of the activity and evaluation of the quality of the services provided)</p>	<ul style="list-style-type: none"> - Filling up the complete MBDS of hospital discharge. - The unit must have a <i>registry of patients</i> who have undergone pelvic osteotomy which at least must include: <ul style="list-style-type: none"> - Medical record number. - Date of birth. - Sex. - Admission date and discharge date. - Circumstances of the discharge (home, hospital transfer, voluntary, death, transfer to a healthcare centre, other.) - Main diagnosis (ICD-9-CM). - Number and type of therapeutic procedures provided to the patient (ICD-9-CM): <ul style="list-style-type: none"> • Pelvic osteotomy (type of osteotomy performed) • Other therapeutic procedures. - Date of pelvic osteotomy. - Diagnostic procedures provided to the patient (ICD-9-CM): - Complications (ICD-9-CM): <ul style="list-style-type: none"> • Intraoperative. • Postoperative.

	<p>- Follow-up and clinical and radiological progress of the patient:</p> <ul style="list-style-type: none"> • Preoperative and postoperative scales for clinical evaluation of the hip (Harris²³, Merle D'Aubigne²⁴). • Acetabular inclination, Wiberg's CE angle and Lequesne's VCA angle, degree of arthrosis. <p>- The unit must have the required data which should be sent to the Spanish National Health Service Reference Centres, Services and Units Appointment Commission Secretariat for yearly reference unit monitoring.</p>
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^a *Criteria to be assessed by the Appointment Commission.*

^b *Experience will be accredited by certification from the hospital manager.*

^c *Clinical results standards, agreed to by the experts group, will be assessed, initially by the Appointment Commission, while in the qualification process, as more information from the Reference Centres, Services and Units is being obtained. Once qualified by the Appointment Commission, the Quality Agency will authorize its compliance, as for the rest of guidelines.*

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