Pelvic operation for bone impingement

Submission date	Recruitment status No longer recruiting	Prospectively registered		
04/05/2023		☐ Protocol		
Registration date	Overall study status	Statistical analysis plan		
14/05/2023	Completed	☐ Results		
Last Edited	Condition category Musculoskeletal Diseases	Individual participant data		
12/05/2023		Record updated in last year		

Plain English summary of protocol

Background and study aims

Femoroacetabular impingement (FAI) syndrome (where the hip joint is not shaped normally) is a dynamic cause of hip arthritis and is commonly diagnosed in young adults without any other causes of hip pain. Pincer-type FAI, which is discussed in this study, is typically present in active middle-aged females. The aim of this study was to evaluate a series of patients who were treated surgically for the pincer or combined type of FAI to assess their clinical and radiological results and the complications of their surgical treatment.

Who can participate?

Patients with pincer/combined type FAI who needed surgery

What does the study involve?

Patients who underwent surgery between 2011 and 2020 are followed up, including MRI scans.

What are the possible benefits and risks of participating?

The benefits are a complete range of motion in the hip after the operation without any pain. Risks are possible rear FAI sign (a clinical sign with patients with FAI) after the operation.

Where is the study run from? Ortopedicka klinika FNB (Czech Republic)

When is the study starting and how long is it expected to run for? January 2011 to December 2020

Who is funding the study? Investigator initiated and funded

Who is the main contact?

Dr Magersky Stepan, smagersky@gmail.com

Contact information

Type(s)

Principal investigator

Contact name

Dr Štěpán Magersky

ORCID ID

https://orcid.org/0000-0002-1855-084X

Contact details

Křižíkova 66 Praha 8 Czech Republic 186 00 +420 (0)603 338 344 smagersky@gmail.com

Additional identifiers

Clinical Trials Information System (CTIS)

Nil known

ClinicalTrials.gov (NCT)

Nil known

Protocol serial number

Nil known

Study information

Scientific Title

Triple pelvic osteotomy in the treatment for pincer-type femoroacetabular impingement syndrome

Study objectives

The aim of this study was to evaluate our series of patients who were operated for pincer femoroacetabular impingement (FAI) or combined-type FAI, their clinical and radiological results, and complications of surgical treatment. It is hypothesized that redirection triple pelvic osteotomy will correct the retroversion of the acetabulum measured by MRI scan and improve clinical outcomes in our cohort of patients. It is expected that this change in the orientation of the acetabulum will not affect the joint arthritis in negative way.

Ethics approval required

Old ethics approval format

Ethics approval(s)

Approved 17/05/2022, Faculty Hospital Bulovka Ethical Committee (180 81, Prague 8, Czech Republic; +420 (0)26608 2717; bozena.zachovalova@bulovka.cz), ref: 16.5.2022/10A425/EK-Z

Study design

Single-centre observational longitudinal case-control study

Primary study design

Observational

Study type(s)

Treatment

Health condition(s) or problem(s) studied

Femoroacetabular impingement (FAI) syndrome

Interventions

Eighteen patients diagnosed with pincer/combined type FAI received triple pelvic reverse osteotomy between 2011 and 2020 and were followed in a prospective study for clinical and radiological evaluation. The average age of the patients was 37.3 years (28.0-45.0). Middle-age follow-up was performed. MRI scans were used to see the exact retroversion of the acetabulum before and after surgery.

Intervention Type

Procedure/Surgery

Primary outcome(s)

- 1. Pain management measured with the Visual Analog Scale (VAS) before the operation and 1 year after the operation.
- 2. Pain, function, absence of deformity, and range of motion measured with the Harris Hip Score (HHS) at 11/2011, 02/2016 and 04/2020
- 3. Pain, stiffness, and function measured with the Western Ontario and McMaster Universities Osteoarthritis Index (WOMAC) before and after the operation

Key secondary outcome(s))

There are no secondary outcome measures

Completion date

31/12/2020

Eligibility

Key inclusion criteria

- 1. Patients diagnosed with pincer/combined type FAI
- 2. Received a reverse triple pelvic osteotomy for treatment of pincer/combined type FAI at the Orthopedic Clinic Faculty Hospital Bulovka in Prague between 2011 and 2020

Participant type(s)

Mixed

Healthy volunteers allowed

No

Age group

Adult

Sex

Total final enrolment

18

Key exclusion criteria

There are no exclusion criteria

Date of first enrolment

15/01/2011

Date of final enrolment

20/12/2020

Locations

Countries of recruitment

Czech Republic

Study participating centre Bulovka Faculty Hospital

Budinova 2 Prague 8 Czech Republic 180 81

Sponsor information

Organisation

Ortopedicka klinika FNB

Funder(s)

Funder type

Other

Funder Name

Investigator initiated and funded

Results and Publications

Individual participant data (IPD) sharing plan

The datasets generated during and/or analysed during the current study are not expected to be made available due to a contradiction with the joint-preserving-surgery committee.

IPD sharing plan summary

Not expected to be made available

Study outputs

Output type	Details	Date created	Date added	Peer reviewed?	Patient-facing?
Participant information sheet	Participant information sheet	11/11/2025	11/11/2025	No	Yes