

Joint distraction in the treatment of knee osteoarthritis: efficacy and underlying mechanisms

Submission date 26/02/2007	Recruitment status No longer recruiting	<input type="checkbox"/> Prospectively registered
Registration date 26/02/2007	Overall study status Completed	<input type="checkbox"/> Protocol
Last Edited 20/08/2021	Condition category Musculoskeletal Diseases	<input type="checkbox"/> Statistical analysis plan
		<input checked="" type="checkbox"/> Results
		<input type="checkbox"/> Individual participant data

Plain English summary of protocol
Not provided at time of registration

Contact information

Type(s)
Scientific

Contact name
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Additional identifiers

Study information

Scientific Title
Joint distraction in the treatment of knee osteoarthritis: efficacy and underlying mechanisms

Study objectives

Joint distraction is a relatively new approach in the treatment of severe Osteoarthritis (OA). Clinical efficacy has been proven for hip and ankle OA.

Hypothesis:

A two month distraction period results in similar clinical beneficial effects as a three month distraction period.

Ethics approval required

Old ethics approval format

Ethics approval(s)

Approval received from the Medical Ethical Committee of the University Medical Centre Utrecht on the 28th July 2004.

Study design

Non-randomised, non-controlled, interventional clinical trial

Primary study design

Interventional

Study type(s)

Treatment

Health condition(s) or problem(s) studied

Osteoarthritis

Interventions

Joint distraction applies temporary (two months) relief of mechanical wear and tear of the articular cartilage surfaces forming a joint. Nutrition of the cartilage is maintained due to intra-articular fluid pressure changes during treatment. Additionally subchondral sclerosis is diminished, diminishing mechanical stresses on the cartilage after treatment.

Intervention Type

Other

Phase

Not Specified

Primary outcome(s)

Pain (according to the The Western Ontario and McMaster Universities Osteoarthritis Index [WOMAC])

Key secondary outcome(s)

Functional disability (according to the WOMAC)

Completion date

01/03/2010

Eligibility

Key inclusion criteria

1. Age less than 55 years
2. Osteoarthritis, primary in the tibio-femoral joint, uni or bilateral
3. Severe osteoarthritis considered for joint replacement surgery/osteotomy

Participant type(s)

Patient

Healthy volunteers allowed

No

Age group

Adult

Sex

Not Specified

Key exclusion criteria

1. Osteoarthritis in both knees
2. Primary retro-patellar osteoarthritis
3. Deviation of the mechanical axis greater than 10 ° (independent of cartilage damage)
4. Primary intra-articular inflammation
5. Psychological problems, not allowing two months distraction

Date of first enrolment

28/07/2004

Date of final enrolment

01/03/2010

Locations

Countries of recruitment

Netherlands

Study participating centre

University Medical Centre Utrecht (UMCU)

Utrecht

Netherlands

3508 GA

Sponsor information

Organisation

University Medical Centre Utrecht (UMCU) (The Netherlands)

ROR

<https://ror.org/04pp8hn57>

Funder(s)

Funder type

Charity

Funder Name

Dutch Arthritis Association (Reumafonds) (The Netherlands)

Results and Publications

Individual participant data (IPD) sharing plan

IPD sharing plan summary

Not provided at time of registration

Study outputs

Output type	Details	Date created	Date added	Peer reviewed?	Patient-facing?
Results article		12/05/2011	20/08/2021	Yes	No