orthoconsulting group

Research Report: Osteoarthritis in the EU

June 2022

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- Osteoarthritis (OA) has been historically classified based on joint location, but not on the underlying pathophysiological process. Increasingly it is becoming clear that OA affects all the tissues in the joint.
- OARSI* define osteoarthritis in lay terms as "*a disorder that can affect any moveable joint of the body, for example knees, hips and hands. It can show itself as a breakdown of tissues and abnormal changes to cell structures of joints, which can be initiated by injury. As the joint tries to repair, it can lead to other problems.*

*Osteoarthritis Research Society International

Sources: www.oarsi.org, www.eular.org, Genes 202,0

Osteoarthritis: A definition

- *Osteoarthritis first shows itself as a change to the biological processes within a joint, followed by abnormal changes to the joint, such as the breakdown of cartilage, bone reshaping, bony lumps, joint inflammation, and loss of joint function. This can result in pain, stiffness and loss of movement.*

- *There are certain factors which make some people more vulnerable to developing osteoarthritis, such as genetic factors, other joint disorders (such as rheumatoid arthritis), injury to the joint from accidents or surgery, being overweight or doing heavy physical activity in some sports or a person's job."*

*Osteoarthritis Research Society International

Sources: www.oarsi.org, www.eular.org, Genes 202,0

Osteoarthritis around the world

- There are more than 100 types of arthritis, and related diseases.
  - Osteoarthritis and rheumatoid arthritis are the most common.
  - 250m people around the world suffer from osteoarthritis.

- OA of the knee is the most common form of OA.
  - 85 per cent of the OA burden around the world is on the knee.
  - Prevalence OA of the knee among adults aged 60 or older is estimated to be 10 per cent among men and 13 per cent among women.

- Osteoarthritis is one of the leading causes of global Years Living with Disability (YLD).

- It is the second leading musculoskeletal disorder in the Disability Adjusted Life Years (DALYs) calculation in the elderly population.

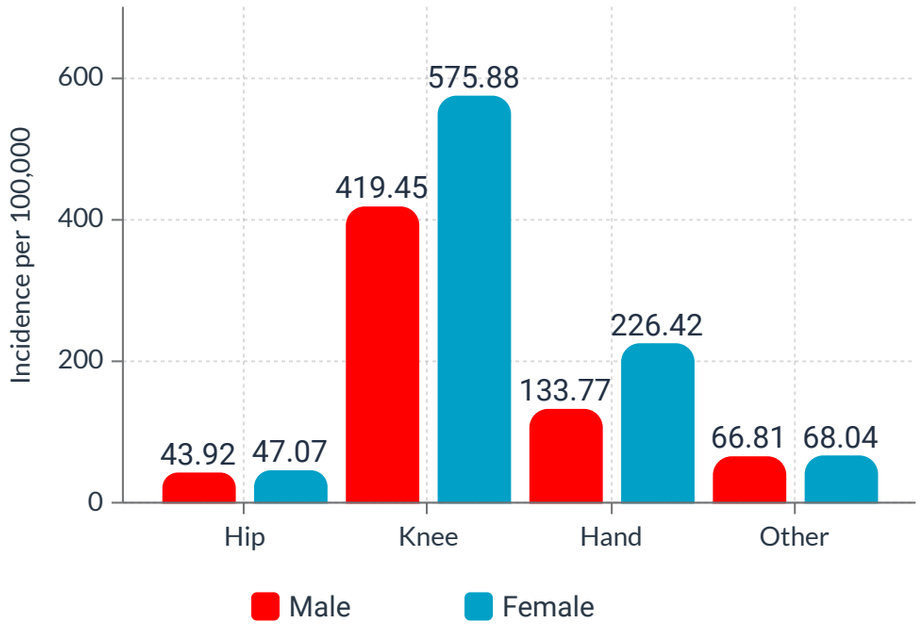
Sources: Genes 202,0 Osteoarthritis and Cartilage WHO Musculoskeletal Conditions Arthritis Foundation

Osteoarthritis within Europe

- 57m people are affected by OA in Western Europe, out of a population of nearly 200m.
  - The number of people affected by OA has grown by 54 per cent since 1990.
  - 91 per cent of those affected say their normal activities are limited.
  - 43 per cent of those affected are of working age.
  - One in five of all Europeans are under long-term treatment for rheumatism and arthritis.

Incidence of osteoarthritis in Europe in 2019, by joint and gender

(per 100,000 population)



Sources: Genes 202,0 Osteoarthritis and Cartilage WHO Musculoskeletal Conditions Arthritis Foundation

Healthcare costs

- Osteoarthritis has a direct negative impact on economies globally, with absenteeism and early retirement in the workplace and patients' needs for care.
  - The impact of osteoarthritis can be as much as one-to-two per cent of GDP in high income countries, with knee and hip accounting for the majority of the cost
  - Three out of five workers in the EU-28 report musculoskeletal disorder (MSD) complaints
  - Sixty per cent of sick leave of persons on early retirement or long-term sick leave claim musculoskeletal problem as the reason
  - Osteoarthritis and back diseases account for 64 per cent of the costs of MSDs

- Costs across Western Europe alone are:
  - Direct healthcare costs: €7.2bn
  - Indirect healthcare costs: €4.4bn
    - This figure is likely to be under-represented and could be as much as four times that of direct costs

Sources: The Economist Genes 202,0 European Bone and Joint Health Strategies Project EU-OHSA

Treatment

- The main course of treatment for OA has not changed much since 1968, with modern medicine not yet able to stop the progression of the condition
  - Between 27 per cent and 54 per cent in Europe continue to experience pain despite taking medication
  - Only 30 per cent of those in Europe are very satisfied with their osteoarthritis medication

- In 2017 the World Health Organisation (WHO) have launched a rehabilitation program, called Rehabilitation 2030, to draw attention to the unmet need for rehabilitation worldwide, with more than 50 per cent of people in some low and middle-income countries not receiving the rehabilitation they require.

Sources: Genes 202,0 The Economist the Lancet WHO Musculoskeletal Conditions

THANK YOU

To access the full report with proprietary data and details regarding key players, specific market attitude and reimbursement costings, please get in touch with us.