

Title: Osteoarthritis: A Patient Guide

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Abstract:

Osteoarthritis (OA) is a degenerative disorder of the joints and is the most common cause of arthritis in adults. Osteoarthritis, also known as degenerative joint disease (DJD), occurs because of “wear and tear” of the joints that is often related to increased stress on the joint or injury to the joint. However, in many cases, OA occurs simply in relation to aging. In osteoarthritis, the cartilage that protects the edges of our bones wears away and causes irritation of the underlying bone. As a result, moving the joint becomes more painful. Risk factors for OA include obesity, heredity, joint injury, and increased stress on the joint. Symptoms of OA include joint stiffness that improves with exercise, pain that worsens with use of the joint, and possibly joint enlargement. The knee is the most commonly affected joint in OA, but joints of the hands, feet, hips, and spine may also be involved. Treatment is largely aimed at relieving pain associated with OA. Initial treatments include weight loss, physical therapy and exercises, and joint braces. Therapeutic medications include acetaminophen, NSAIDs such as ibuprofen, and topical medicines. Patients may receive steroid or viscous injections in a single joint for temporary relief. If these interventions are not helpful, a patient may be referred to an orthopaedic surgeon for further management and possible surgery.

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Questions?

- This pamphlet is only an introduction to osteoarthritis (OA). Please call your doctor with any questions or concerns regarding OA.
- Other resources include:
 - MedlinePlus:
<http://www.nlm.nih.gov/medlineplus/osteoarthritis.html>

- NIAMS:
http://www.niams.nih.gov/Health_Info/Osteoarthritis/default.asp

X-rays courtesy of:

<http://www.yorkshirekneeclinic.co.uk/images/D3.jpg>

and

<http://www.yorkshirekneeclinic.co.uk/images/D1.jpg>

Osteoarthritis

A Patient Guide

By Shauna S Morrow

QuickTime™ and a
TIFF (Uncompressed) decompressor
are needed to see this picture.

joints. In addition,
bone spurs can form
where the bone is not
protected by cartilage.
Bone spurs or
osteophytes are
outgrowths of bone that
result from OA.

QuickTime™ and a
TIFF (Uncompressed) decompressor
are needed to see this picture.

What is osteoarthritis?

- Osteoarthritis (OA) is the most common cause of arthritis in adults. It is caused by "wear and tear" of *the articular cartilage* between our bones. *Articular cartilage* is a material that acts as a cushion for our joints and protects the ends of our bones. As our bodies age, the cartilage can become damaged by activity and increased stress on our

- Factors that contribute to OA are injury to the joint, increased body weight, heredity, and age over 50. The knee is the most commonly affected joint. However, hands, hips, feet, and the spine can also be involved.
- Patients with OA often have a dull, aching pain in one or more joints that becomes worse with activity. It may also worsen with cold or damp weather. There is often stiffness in the affected joints that improves with exercise. The joints involved may become enlarged.

* The x-ray above shows a normal knee. Between the bone above the knee joint (the femur) and the bone below the knee joint (the tibia) there is a dark space representing a healthy joint.
* In the x-ray below, however, there is very little space between the bones, especially on the right side of the image. On the edge of the tibia and femur on the right, you can see a bone growth, an *osteophyte*, which often occurs in OA.

QuickTime™ and a
TIFF (Uncompressed) decompressor
are needed to see this picture.

How is OA treated?

- OA is treated depending on the severity. Initial therapy may consist of weight loss, physical therapy and exercise, and/or joint braces.
- Weight loss in obese patients with OA is important to relieve stress on the joint and also to improve overall health.
- Medications used to treat OA include acetaminophen, NSAIDs, and topical medicines. Sometimes steroid or viscous injections are given within a joint for short-term relief.
- Supplements such as glucosamine and chondroitin have not yet been proven to reduce pain in patients with mild to OA. However, these supplements may help

patients with moderate to severe osteoarthritis.

- If a patient has severe OA that does not respond to these therapies, he or she may be referred to a joint specialist. A patient may undergo surgical repair or "joint replacement" to restore function of the joint and to reduce pain.
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