Arthritis and Joint Pain

What is Arthritis?

Nearly half of all adults over the age of 65 are diagnosed with some form of arthritis. This painful condition affects the joints, causing inflammation and pain along with problems with mobility. The essential problem with arthritis is that cartilage continues to be made at the same rate as always, but the rate of resorption increases. It's a ratio problem.

The most common joints affected by arthritis are the hips, knees, shoulders, ankles and wrists. Among these joints, the weight-bearing areas, such as the knees and ankles are the most affected due to wear and tear on the muscles, bones, tendons and joints.

The National Institute of Pain reports that arthritis affects women more than men. There is no cure for arthritis yet, but the condition can be managed, slowed and treated.



What Kinds of Arthritis Are There?

There are several types of arthritis, with the most common being osteoarthritis and rheumatoid arthritis. Both result in significant pain that cannot be cured, merely managed. Osteoarthritis is the most common form of arthritis and is seen more in women than in men (Felson et al., *Annals of Internal Medicine*, 2002).

Below are two types of arthritis that can affect the joints, resulting in significant pain and tenderness:

Osteoarthritis



The most common form of arthritis is osteoarthritis, affecting the joints. It is believed that osteoarthritis is caused by wear and tear on the joints. Due to the nature of the condition, weight plays a key role in the progression of the disease. Obesity can cause a faster progression because of the added weight placed on the joints.

Osteoarthritis begins when the cartilage that protects the bone begins to wear away. Cartilage continues to be made at the same rate as before, but the rate of resorption accelerates. As a result, the body forms bone spurs as a protective mechanism. Osteoarthritis is seen most often in the larger joints in the body, such as the hips and knees. The spine is commonly affected too.

Why osteoarthritis occurs is unclear. There is definitely a hereditary component, and age is a significant risk factor. Under the age of 45, men are more often affected. Over age 45, women are more often affected. There is a correlation with obesity as it causes excess pressure and breakdown on joints. Those who participate in high level sports or excessive physical labor activities have a higher risk of developing osteoarthritis.

Symptoms of osteoarthritis include stiffness and tenderness of the joint that doesn't seem to go away. Pain may occur when the affected person is riding in a car, sitting for a long period of time or sleeping. If left unmanaged and untreated, osteoarthritis in the hips and knees may result in disability.

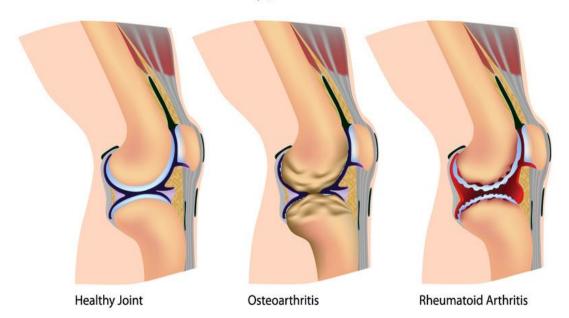
Rheumatoid Arthritis

Rheumatoid arthritis is an autoimmune condition that causes the body to actually attack itself, causing significant pain, swelling, stiffness and tenderness that last for long periods of time. Rheumatoid arthritis is more common in women than in men.

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Rheumatoid arthritis causes significant pain and if left untreated, may result in complete disability. Treatment is designed to relieve the painful symptoms and slow the progression of the disease.

Common types of Arthritis



What are the Symptoms of Arthritis?

No matter what kind of arthritis a person is diagnosed with, there are common signs and characteristics of the condition. Arthritis affects the joints and is commonly found in the hips, shoulders, knees, spine, wrists and ankles.

Some of the most common signs of arthritis include:

- Pain and tenderness in the joint (hip, ankle, shoulder, spine, wrist or knee)
- Redness and heat at the joint site
- Restricted mobility due to pain
- Joint swelling
- Ongoing pain that lasts for hours at a time

The symptoms may come and go, especially during early onset of the disease. Early detection is critical in pain management and controlling the symptoms.

How is Arthritis Treated?

There are a variety of treatments available for arthritis, no matter what joint is affected. Since there is no cure for arthritis, pain management and control is the primary goal of treatment. From medications to injections, pain relief is available.

Common forms of treatment may include:

Activity Avoidance and Ambulatory Assistance

If arthritis leads to significant pain, it may be prudent to avoid activities that cause that pain. For instance, if jogging causes knee pain from an exacerbation of arthritis, it would be prudent to switch to cycling or swimming.

In addition, a cane can reduce stress on the affected extremity by up to 50% and help decrease pain.

Medication management

Initial treatment for arthritis pain in the joints is the administering of non-steroidal anti-inflammatory drugs. This medication, commonly referred to as NSAIDs, is designed to reduce inflammation and painful symptoms, ridding tenderness and improving mobility.

For periods of exacerbation, narcotics may help relieve pain for short term use. It is best to avoid them for chronic use, as the risks start to outweigh the benefits.

Glucosamine and chondroitin sulfate are known as nutraceuticals. They are very low risk, non-prescription medications that have some research to back up their use for arthritis pain (Orthop Nurs. 2012 May-Jun;31(3):160-6).

Physical therapy

Physical therapy combines passive and active treatments to reduce pain and improve function. Passive forms of therapy include TENS unit, ultrasound, massage, heat and ice application, while active forms include patient participation in stretching and exercising. Exercise has been shown to greatly improve mobility and reduce pain in patients with arthritis (Iverson et al., *American College of Rheumatology*, 2001).

Joint injections

Joint injections consist of the insertion of corticosteroid drugs and anesthetics directly into the joint to relieve pain. Over 80% of all patients who undergo treatments of joint injections are provided with some form of pain relief (Tuthill, *British Medical Journal*, 2001).

Hyaluronic acid treatments such as with Synvisc have been shown to provide exceptional pain relief at both 3 and 6 month intervals after treatment (Int J Immunopathol Pharmacol. 2012 Oct-Dec;25(4):1093-8).

There are new treatments for arthritis involving regenerative medicine that are PRP therapy is showing promise for arthritis.

coming into play. These include platelet rich plasma therapy (PRP) and stem cell injections. PRP injections have some support in initial studies and multiple professional sports leagues have approved of its use.

Alternative therapy – acupuncture or chiropractic

Other forms of therapy to relieve joint pain associated with arthritis include acupuncture, chiropractic care and massage therapy. All are accepted as medical treatments and widely used in the care for patients with arthritis.