Osteoporosis and Arthritis: Two Common but Different Conditions

Many people confuse osteoporosis and some types of arthritis. This fact sheet discusses the similarities and differences between these conditions.

Osteoporosis

Osteoporosis is a condition in which the bones become less dense and more likely to fracture. In the United States, more than 53 million people either already have osteoporosis or are at high risk due to low bone mass. In osteoporosis, there is a loss of bone tissue that leaves bones less dense and more likely to fracture. It can result in a loss of height, severe back pain, and change in one’s posture. Osteoporosis can impair a person’s ability to walk and can cause prolonged or permanent disability.

Risk factors for developing osteoporosis include:

- thinness or small frame
- family history of the disease
- being postmenopausal and particularly having had early menopause
- abnormal absence of menstrual periods (amenorrhea)
- prolonged use of certain medications, such as those used to treat lupus, asthma, thyroid deficiencies, and seizures
- low calcium intake
- lack of physical activity
- smoking
- excessive alcohol intake.

Osteoporosis is known as a silent disease because it can progress undetected for many years without symptoms until a fracture occurs. Osteoporosis is diagnosed by a bone mineral density test, which is a safe and painless way to detect low bone density.

Although there is no cure for the disease, the Food and Drug Administration has approved several medications to prevent and treat osteoporosis. In addition, a diet rich in calcium and vitamin D, regular weight-bearing exercise, and a healthy lifestyle can prevent or lessen the effects of the disease.
Arthritis

Arthritis is a general term for conditions that affect the joints and surrounding tissues. Joints are places in the body where bones come together, such as the knees, wrists, fingers, toes, and hips. Two common types of arthritis are osteoarthritis and rheumatoid arthritis.

- **Osteoarthritis** (OA) is a painful, degenerative joint disease that often involves the hips, knees, neck, lower back, or small joints of the hands. OA usually develops in joints that are injured by repeated overuse from performing a particular task or playing a favorite sport or from carrying around excess body weight. Eventually this injury or repeated impact thins or wears away the cartilage that cushions the ends of the bones in the joint. As a result, the bones rub together, causing a grating sensation. Joint flexibility is reduced, bony spurs develop, and the joint swells. Usually, the first symptom of OA is pain that worsens following exercise or immobility. Treatment usually includes analgesics, topical creams, nonsteroidal anti-inflammatory drugs, appropriate exercises or physical therapy; joint splinting; or joint replacement surgery for seriously damaged larger joints, such as the knee or hip.

- **Rheumatoid arthritis** (RA) is an autoimmune inflammatory disease that usually involves various joints in the fingers, thumbs, wrists, elbows, shoulders, knees, feet, and ankles. An autoimmune disease is one in which the body releases enzymes that attack its own healthy tissues. In RA, these enzymes destroy the linings of joints. This causes pain, swelling, stiffness, malformation, and reduced movement and function. People with RA also may have systemic symptoms, such as fatigue, fever, weight loss, eye inflammation, anemia, subcutaneous nodules (bumps under the skin), or pleurisy (a lung inflammation).

Although osteoporosis and osteoarthritis are two very different medical conditions with little in common, the similarity of their names causes great confusion.

These conditions develop differently, have different symptoms, are diagnosed differently, and are treated differently.

Osteoporosis and arthritis do share many coping strategies. With either or both of these conditions, many people benefit from exercise programs that may include physical therapy and rehabilitation. In general, exercises that emphasize stretching, strengthening, posture, and range of motion are appropriate. Examples include low-impact aerobics, swimming, tai chi, and low-stress yoga. However, people with osteoporosis must take care to avoid activities that include bending forward from the waist, twisting the spine, or lifting heavy weights. People with arthritis must compensate for limited movement in affected joints. Always check with your doctor to determine whether a certain exercise or exercise program is safe for your specific medical situation.

Most people with arthritis will use pain management strategies at some time. This is not always true for people with osteoporosis. Usually, people with osteoporosis need pain relief when they are recovering from a fracture. In cases of severe osteoporosis with multiple spine fractures, pain control also may become part of daily life. Regardless of the cause, pain management strategies are similar for people with osteoporosis, OA, and RA.

Resource

For more information on osteoporosis, contact the:

**NIH Osteoporosis and Related Bone Diseases National Resource Center**

2 AMS Circle
Bethesda, MD 20892–3676
Phone: 202–223–0344
Toll free: 800–624–BONE
TTY: 202–466–4315
Fax: 202–293–2356
Website: www.bones.nih.gov
Email: NIHBoneInfo@mail.nih.gov

If you need more information about available resources in your language or another language, please visit our website or contact the NIH Osteoporosis and Related Bone Diseases ~ National Resource Center.
For Your Information

This publication contains information about medications used to treat the health condition discussed here. When this publication was developed, we included the most up-to-date (accurate) information available. Occasionally, new information on medication is released.

For updates and for any questions about any medications you are taking, please contact the Food and Drug Administration toll free at 888–INFO–FDA (463–6332) or visit its website at www.fda.gov. For additional information on specific medications, visit Drugs@FDA at www.accessdata.fda.gov/scripts/cder/drugsatfda. Drugs@FDA is a searchable catalog of FDA-approved drug products.