



Reactive Arthritis

Reactive Arthritis is a form of arthritis that develops in reaction to an infectious agent, such as bacteria, usually in the bowel or genital areas. Those developing the illness experience pain, swelling and stiffness, usually in larger joints, particularly the lower limbs, as well as the spine and ligaments. Typically the immune system readjusts its response to the infection and the condition ultimately goes away. However, reactive arthritis can last many months, even a few years, and, if prolonged, requires medical treatment.

Fast facts

- Reactive arthritis is characterized by swollen, painful and stiff joints, often involving the knees and/or ankles.
- Those experiencing this reaction to an infectious agent are typically male, between the ages of 20-50.
- Although self limiting, reactive arthritis can be prolonged and severe enough to require medication.

What is reactive arthritis?

Reactive Arthritis is a self-limiting form of arthritis that develops in response to an infectious agent. Depending on the infectious agent itself and the individual's genetic predisposition (background), the illness also can be associated with other symptoms including conjunctivitis (a redness and irritation of the outer layer of the eye called the conjunctiva), urethritis or cervicitis (eye redness or discharge from the penis or cervix), genital ulcers which may or may not be painful, and/or a skin rash on the palms of the hands or soles of the feet.

Although many infections, including viruses, can result in a reactive arthritis, the term usually applies to symptoms occurring after an infection of the bowel (caused by the germs *Campylobacter*, *Salmonella*, *Shigella* and *Yersinia*) or genitals (caused by *Chlamydia trachomatis*).



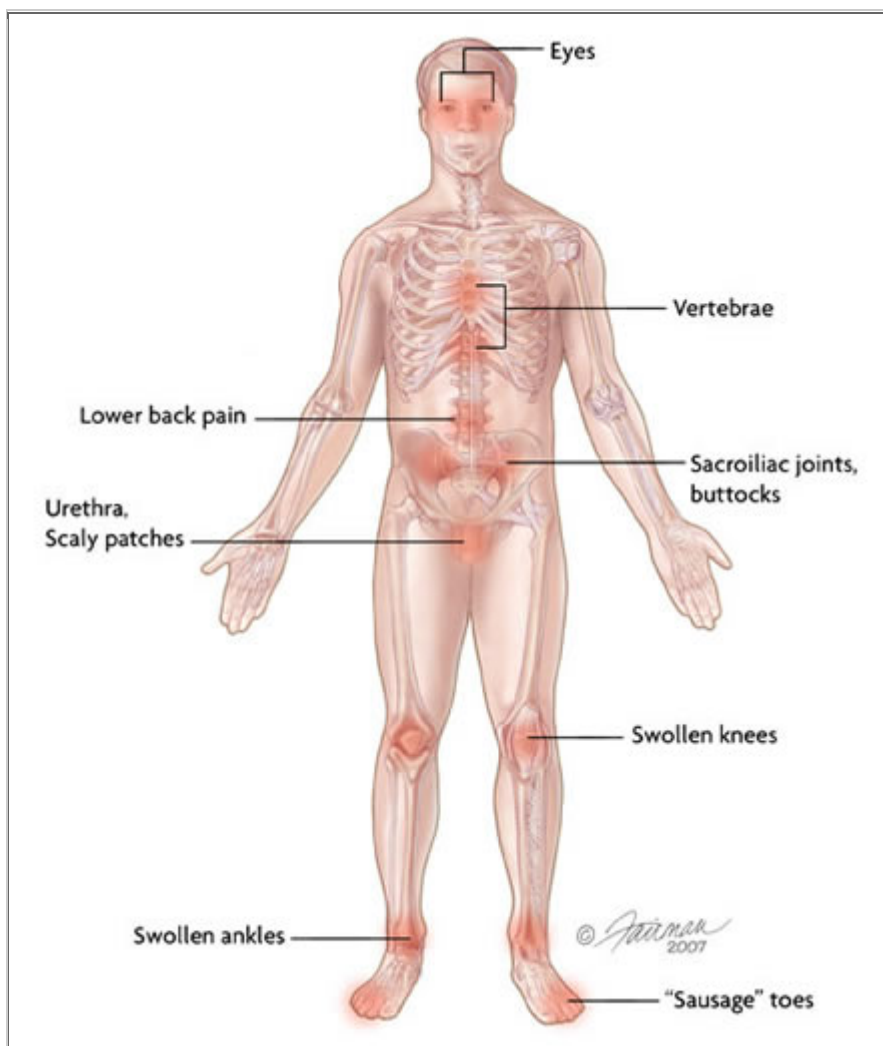
What causes reactive arthritis?

No one is entirely sure of the relationship between the bacteria and the cause of the arthritis. Clearly, the genetic predisposition to react to these specific bacteria with an arthritis illness must exist. However, the joints themselves are not actually infected. Rather, they are inflamed as a result of these bacteria triggering the immune system. In reactive arthritis, typically the immune system readjusts this response and the condition ultimately goes away.

Who gets reactive arthritis?

About 10 – 20 percent of people experiencing bowel and/or genital infections will get reactive arthritis, typically those whose genetic profile includes the presence of antigens called HLA-B27. Most of these individuals, usually males between 20 and 50 years of age, will have a self-limiting disease. However, 15% will face recurrence of the arthritis if re-exposed to infection, or chronic arthritis. This is more likely to occur if the bacterium triggering the illness is *Chlamydia trachomatis*, a common sexually-transmitted disease.

Changes in the function of the immune system can also influence this illness. For instance, infection with the HIV/AIDS virus increases the risk of getting reactive arthritis.



In reactive arthritis, the joints themselves are not actually infected. Rather, they are inflamed as a result of bacteria triggering the immune system. In reactive arthritis, typically the immune system readjusts this response and the condition ultimately goes away.



How is reactive arthritis diagnosed?

The diagnosis of reactive arthritis is based on the pattern of joint involvement and on the temporal association (when the arthritis occurs within one month of an infection).

In the case of a gastrointestinal infection, a culture of the stool showing the presence of the bacteria prior to the arthritis is the best way of diagnosing reactive arthritis. The bacteria which caused a gastrointestinal infection may have resulted in symptoms of food poisoning, with watery or bloody diarrhea and/or fever.

The genital infection known to trigger reactive arthritis is *Chlamydia trachomatis* which is frequently associated with a pus-like or watery genital discharge. Identifying this bacterium is also important in diagnosing reactive arthritis. This can be done by taking a culture (using a special swab) of the genitals. If *Chlamydia* is found, it is very important to treat this infection.

How is reactive arthritis treated?

Three types of treatment have been used in managing reactive arthritis: The acute inflammation can be treated with nonsteroidal anti-inflammatory drugs (NSAIDs) such as naproxen (*Aleve*®), diclofenac (*Voltaren*®), indomethacin (*Indocin*®) or celecoxib (*Celebrex*®). These should be used at the maximal dose. They will relieve symptomatic pain and stiffness, but will not make the arthritis go into remission. As a word of warning, NSAIDs can cause gastrointestinal upset. If this occurs, contact your health professional.



The acute inflammation can be treated with nonsteroidal anti-inflammatory drugs (NSAIDs).

- The infection should be identified by a physician and treated with appropriate antibiotics. If the infectious agent is *Chlamydia*, then any sexual partners also must be treated.
- Chronic (i.e., long-lasting) reactive arthritis may need to be treated with a disease modifying anti-rheumatic drug (DMARD) such as sulfasalazine or methotrexate. These medications take longer to become fully effective, but can bring about remission. In some cases very inflamed joints may be injected with corticosteroids.

Talk to your physician about stopping the use of NSAIDs and DMARDs once the arthritis has resolved.

Points to remember

- If you develop arthritis within one month of a gastrointestinal infection or in relation to a genital infection associated with a discharge, consult a health professional about the possibility of reactive arthritis.
- If you have had reactive arthritis, you could be at risk of recurrence if exposed to an infection known to trigger infectious arthritis.
- While reactive arthritis usually clears up, it can be prolonged and should be treated.



To find a rheumatologist

For a listing of rheumatologists in your area, [click here](#).

Learn more about [rheumatologists](#) and [rheumatology health professionals](#).

For more information

The American College of Rheumatology has compiled this list to give you a starting point for your own additional research. The ACR does not endorse or maintain these Web sites, and is not responsible for any information or claims provided on them. It is always best to talk with your rheumatologist for more information and before making any decisions about your care.

The Arthritis Foundation

www.arthritis.org

The Arthritis Society

www.arthritis.ca

The Spondylitis Association of America

www.spondylitis.org

The National Institute of Arthritis and Musculoskeletal and Skin Diseases

http://www.niams.nih.gov/Health_Info/Reactive_Arthritis/default.asp

Written December 2006

Written by Vivian Bykerk, MD, and reviewed by the American College of Rheumatology Patient Education Task Force.

This patient fact sheet is provided for general education only. Individuals should consult a qualified health care provider for professional medical advice, diagnoses and treatment of a medical or health condition.

© 2010 American College of Rheumatology