

### New Blood Test Effective For Early RA Diagnosis

Diagnosing rheumatoid arthritis (RA) in its early stages is difficult, leading to potential delays in treatment. But a recently approved blood test is highly effective at detecting RA, according to a Dutch study.

The study included 318 people with arthritis that could not be properly classified within two weeks of seeing a rheumatologist. Doctors carried out standard diagnostic tests for RA, including x-rays and testing for rheumatoid factor. In addition, patients were tested for antibodies to cyclic citrullinated peptide (CCP), an amino acid compound that is often found in the blood of people with RA.

Three years later, 40% of the people in the study had been diagnosed with RA. The disease developed in 93% of those who had tested positive for anti-CCP and 25% of those who had tested negative. The CCP test proved to be far more accurate than the standard tests at predicting who would develop RA.

Since approved by the FDA in 2002, this test is being more routinely used for the detection of early RA—especially when a rheumatoid factor test is negative.

ARTHRITIS & RHEUMATISM  
*Volume 50, page 709*  
*March 2004*

from the joint and counting the number of white blood cells, which fight infection but can also cause inflammation. Other causes of synovitis must still be considered, however. Although x-rays of affected joints are not useful during the early stages of RA, those taken more than six months after the onset of active disease can show the characteristic narrowing of the joint space and the bony erosions that point to a diagnosis of RA.

A blood test to check for the presence of rheumatoid factor is also useful. Rheumatoid factor is an abnormal protein present in the blood of about 85% of people with RA; larger amounts of this protein are present when the disease is most severe. Many people with RA who initially test negative for rheumatoid factor will test positive as the disease progresses. However, this test is not definitive because elevated levels of rheumatoid factor can be found in people with other autoimmune diseases, as well as a number of unrelated disorders. Other common blood abnormalities indicative of RA are mild anemia, an elevated sedimentation rate (a nonspecific sign of inflammation), and a low white blood cell count.

### Prognosis

About 10% of people diagnosed with RA experience long-term remission within one year. Another 40% to 65% go into remission within two years. In these two groups of patients, rheumatoid factor levels often are low or absent, and symptoms are relatively mild, even when the disease is active. The prognosis is much worse if the disease remains active for more than two years. Such patients have a far greater chance of significant joint deformity.

If the disease progresses for months or years, affected joints eventually become deformed and their range of motion is increasingly limited. Surrounding muscles may become atrophied from lack of use. Other possible side effects are carpal tunnel syndrome (pain, numbness, or tingling in the hand) and dryness of the eyes, mouth, and other mucous membranes. Less frequently, people may experience more serious systemic problems (problems affecting other sites in the body). These include an enlarged spleen and inflammation of the heart, the membrane covering the heart (pericarditis), the membranes surrounding the lungs (pleurisy), and the outer layers of the eyes (which can lead to blindness).

People with RA have a shorter life span than the general population, largely owing to an increased risk of heart disease. For this reason, people with RA need to take extra steps to prevent heart disease. For more information about reducing the risk of heart dis-