

## VISCOSUPPLEMENTATION: A NEW ALTERNATIVE

Steroid injections are often the last resort before surrendering to joint-replacement surgery. However, another subcutaneous treatment called viscosupplementation has become increasingly popular. It has been shown in some cases to delay or even eliminate the need for surgery.

Viscosupplementation is the injection of hyaluronic acid (HA) into a knee joint that has lost either cartilage or shock-absorbing synovial fluid, usually due to untreated or repeated knee injuries. HA is a naturally occurring substance found in the intercellular matrix of animal connective tissue. When it is injected, it creates a pain-relieving cushion between the bones. HA is already present in many parts of the body, and some researchers think that these injections may spur the production of even more.

HA was discovered in 1934. Japan and Italy began using it in subcutaneous form in 1987; Canada in 1992. Physicians in the United States have been injecting HA since its FDA approval in 1997.

HA injections are only available by prescription and must be administered by a physician. Two types are available: a solution of naturally occurring sodium hyaluronate (brand names include Supartz® and Hyalgan®) and a synthetic version (such as Synvisc®). The pain relief provided by both types appears to last six to eight months.

HA injections have extended the career of Hall of Fame golfer Nancy Lopez, who received them in 1999. She credits HA with allowing her to escape knee replacement surgery and has since become a spokesperson for Synvisc®.

In addition to the subcutaneous form of HA, ingestible liquid and capsule versions have recently been developed. Oral HA is classified as a supplement rather than a drug, so it is not subject to FDA approval. It's also less expensive- about \$45 for a 30-day supply, while injections run as much as \$600 for each of the three to five shots given over several weeks.



## ELIMINATING THE REAL CAUSE OF PAIN

K. Dean Reeves, MD, a specialist in physical medicine and rehabilitation, heads a research study of Synthovial 7™, a liquid form of HA. Reeves feels that HA may be safer and more effective than NSAIDs, such as aspirin and ibuprofen, in treating the noninflammatory form of OA.

According to Reeves, NSAIDs can alleviate symptoms, but the arthritis will still progress. He hopes that HA can be combined in the future with growth-inducing stimulants and used as a form of prolotherapy, which he defines as an "injection to try to cause growth of normal cells or tissue." Instead of simply easing pain, this could help mend the joint.

"Since hyaluronic acid not only provides a cushion between surfaces but also breaks down into glucosamine and glucuronic acid, it has a double benefit in OA," says Reeves. A free six month supply of Synthovial 7 was made available to patients who qualified for Reeves' study, which is now full.

For more information go to his website at [www.IntegrativeMedicineResearchOnLine.com](http://www.IntegrativeMedicineResearchOnLine.com).

## A PROMISING APPROACH

There are a number of different approaches to treating osteoarthritis, but most experts agree that HA is one of the most promising. And with new synthetic forms being developed, even roosters may have something to crow about!

Freelance writer Bartt Warburton keeps his knees in shape by digging rocks out of the garden of his Los Angeles home.

