## **Platelet Rich Plasma**

for Chronic Knee Pain by Dr. Richard Bechert

We routinely have inquiries on this procedure for the treatment of knee pain. Here is a summary of our approach and the current research.

First, before you consider PRP for your knee pain, you should try more conservative care. Examples of conservative care include exercise, medication, distraction knee manipulation, steroid injection, acupuncture, low level laser, weight loss, glucosamine supplements, and knee braces. If these options have failed to relieve your pain, you may be a candidate for PRP.

PRP: What is it?

PRP is a concentrate of platelet-rich plasma protein derived from your whole blood, centrifuged to remove blood cells. It has a greater concentration of growth factors and cytokines than whole blood. PRP has been used to encourage a brisk healing response across several specialties. This includes plastic surgery, dentistry, orthopedics and dermatology. In our practice, we use PRP for chronic knee pain. PRP is plasma with many more platelets than are typically found in blood. The concentration of platelets — and, thereby, the concentration of growth factors can be 5 to 10 times greater (or richer) than usual. This could potentially help you to heal faster and decrease pain.

What is the process for administering PRP?

PRP involves drawing your blood, spinning it down in a centrifuge, and injecting the platelet rich plasma from your own blood into your knee. All of this is done during the same office visit. The total time is approximately 45 minutes.

There are several current studies on the success of PRP.

In a comparison study between Hyaluronic Acid (also call rooster cone) and PRP, patients received one or the other treatment. The PRP group had better outcomes, although both groups improved. Ultrasound of the knee showed increased synovial hypertrophy and less swelling in the PRP group. The knee was injected 3 times, two weeks apart (Int J Rheum Dis. 2018 May;21(5):960-966).

In published data on the side effects of PRP, other than knee soreness there have been very few problems reported. Because you are using your own platelets, the risk of allergic reaction is minimal. The present overview demonstrates that PRP is an effective intervention in treating knee osteoarthritis without increased risk of adverse events (Int J Rheum Dis. 2017 Nov;20(11):1612-1630).

Early osteoarthritis of the knee can be treated with just one injection instead of three with a positive outcome possible (Joints, 2017 Jun 5;5(1):2-6). We have treated several patients in our clinic who were able to treat their knee pain with one visit instead of the standard three.

Platelet-rich plasma treatment significantly improves pain, stiffness, and disability in patients with knee osteoarthritis compared with normal saline treatment. Additional strength training is recommended to enhance muscle strength recovery (Am J Phys Med Rehabil. 2018 Apr;97(4):248-254). We have found that adding exercise to PRP treatment enhances positive outcomes.

In the research, a higher percentage of relief among responses was observed in the PRP group (72.7%) than in the HA group (45.8%) Our office has witnessed similar results, with an estimated 70-75 percent of patients treated with PRP reporting "good to excellent" relief (Arthroscopy. 2018 May;34(5):1530-1540).

Another article published in 2013 in the American Journal of Sports Medicine found that PRP injections helped to reduce knee osteoarthritis pain compared to saline injections.

Famous athletes such as Tiger Woods, tennis star Rafael Nadal, and several others have received PRP for various issues.

If you have questions about Platelet Rich Plasma treatments, give us a call! You can reach us at Victory Health in Guntersville, Alabama. Our phone number is (256) 582-1066, and our email address is victoryhealth@outlook.com. More information is also on our website, <u>www.victory.healthcare</u>. We will be happy to answer your questions about PRP. ©