

Steroid Injections

What are Steroids?

Corticosteroids are a class of medications that are related to cortisone. Cortisone is a naturally occurring corticosteroid hormone produced by your adrenal glands.

Where are Steroids (Cortisone) Injected?

Steroids can be injected directly into the joints (intra-articular) or around the joints (peri-articular) or tendons.

How do Steroid (Cortisone) Injections Work?

After injection, corticosteroids work to reduce inflammation (heat, redness, swelling, & pain) in and around the joint. As a result you should feel less pain, swelling, stiffness and warmth and be able to function a little easier.

Why are Steroids (Cortisone) Injected Locally?

A steroid injection into or around the joint is an effective way to reduce inflammation in or around a single joint. The goal is to deliver the medication directly to the site where it is needed aiming to reduce the need for systemic treatment (pills).

What types of Steroids (Cortisone) are available for injection?

There are a few different varieties of steroids available for injection. The choice will likely depend on the preference of the treating physician. There is no available evidence that one type of steroid is significantly better than another. The types of steroids available are as follows: Methylprednisolone Solumedrol® 10 – 120 mg, Triamcinolone Acetonide Kenalog® 10 – 80 mg and Betamethasone Celestone Soluspan® 1 – 12 mg

What types of Patients can receive Steroid (Cortisone) Injections?

Steroid injections are useful for many types of arthritic conditions. Local steroid injections can be valuable treatment for patients with inflammatory types of arthritis such as rheumatoid arthritis, psoriatic arthritis, gout, and lupus. Similarly, patients with osteoarthritis often derive benefit from steroid injections. Finally, local steroid injections can be safely used for the treatment of conditions such as tendonitis, bursitis, and tendon nodules.

How is a Steroid (Cortisone) Injection given?

A steroid injection into a joint or around a joint is much like an injection into the arm. Most injections are safely and routinely performed in a physician's office. For some joints in the spine or hip, injections are usually given by a radiologist under x-ray or ultrasound guidance. Local anaesthetic is sometimes used prior to the injection or can be mixed with the steroid and injected directly into the joint to give immediate relief.

Does a Steroid (Cortisone) Injection Hurt?

In the hands of a skilled physician, the injections are relatively comfortable and as pain free as a simple blood test or injection into the muscle in the arm.

How long does it take for a Steroid (Cortisone) Injection to Work and how long will it Last?

Most injections typically take 24-48 hours to take full effect. If local anaesthetic was given with the steroid injection, you may feel improvement relatively quickly. The duration of improvement varies. Some patients report months of relief whereas others find only a few days of relief.

If the first Steroid (Cortisone) Injection doesn't work, can I try a second Injection?

In general, most patients, if they are going to respond, will respond after the first injection. Patients who have gained no symptom relief or functional benefit from two injections should probably not continue with repeat injections as the likelihood of improvement is small.

How often can I have repeat Steroid (Cortisone) Injections?

If a significant benefit is achieved after the first injection then an argument can be made for a repeat injection. There is some controversy that too many injections may weaken tendons, ligaments, and accelerate the loss of cartilage but other studies have found that injections can slow joint damage and help preserve the joint. As a general rule a reasonable approach is to limit the frequency of injections to 3-4 for a single joint per year.

Who should NOT receive Steroid (Cortisone) Injections?

Patients who should not receive an injection include those who have had a previous serious allergic reaction to a corticosteroid and those with an infection in the joint or in the skin or soft-tissues overlying the joint.

What should I feel after a Steroid (Cortisone) Injection?

If local anaesthetic was injected with the steroid your pain may be improved over the few hours after the injection. Otherwise, it is normal to feel a transient increase in discomfort in the joint which should resolve within 24 hours. You can treat this discomfort by applying a cold pack such as a gel pack, bag of frozen vegetables, or crushed ice in a bag or by using medications such as Acetaminophen (Tylenol®) or Non-Steroidal Anti-Inflammatory Drugs (Check with your doctor).

What should I do after a Steroid (Cortisone) Injection?

If possible, it is best to rest the joint for 24-48 hours. Studies have shown this may improve the effect of the injection.

What are the possible side-effects of a Steroid (Cortisone) Injection?

Most joint injections result in no side-effects. Side-effects which rarely occur include: injury to the joint or tendon, loss of the fat layer below the skin, loss of skin pigmentation (vitiligo), calcification around the joint, and joint Infection (see below). The joint may 'flare-up' transiently after an injection. Systemic effects may occur due to absorption of some of the steroid from the joint.

When Should I call my Physician or seek Medical Attention?

If the injected joint becomes very painful, red, or swollen seek medical attention immediately as the joint may be infected. As your doctor has explained, one of the very rare (1 in 15,000) risks of a joint injection is infection. If the joint is infected it is very important to seek medical attention as soon as possible. However,

the most common cause of these symptoms is a reaction to the injected steroid (“steroid flare”) which occurs in 2 to 5% of patients. A “steroid flare” usually begins 6-12 hours after the injection and may last for 2-3 days. Regardless of the cause, it is important to see a physician with these symptoms.

Are Steroid (Cortisone) Injections safe in Pregnancy?

It is generally advisable to avoid all medications during pregnancy and while you are trying to become pregnant. However, local steroid injections are believed to be one of the safer treatments for arthritis during pregnancy.

What is the injection for?

Steroid injections are known to be a useful treatment for pain, swelling and stiffness within a joint. or the area around the joint. They are mainly used to reduce inflammation and pain. The joint is injected with a preparation of local anaesthetic and corticosteroid. The anaesthetic will reduce the initial pain and the corticosteroid will reduce the inflammation.

Restrictions with Injections?

Please let us know if any of the following before you attend the clinic for an injection;

- any open wounds such as leg ulcers or cellulitis
- an artificial joint present in the area to be injected
- on any antibiotic treatment and within 48 hours of stopping
- allergic to local anaesthetic or steroid
- on HIV treatment (Corticosteroid can interact with HIV medication)
- are receiving any chemotherapy treatment for the management of cancer
- have uncontrolled blood clotting levels on a blood thinning drug (eg Warfarin)
- Accessing the joint is difficult
- You have uncontrolled Diabetes Mellitus
- You are pregnant or breast feeding (if injection is essential it is not advisable to have more than 40mg of steroid in a day)

Your clinician administering the injection will discuss the side effects with you at the time of the injection. These are very unlikely.

What are the potential side effects?

- Flare Up: Occasionally people notice a flare in their joint pain within the first 24 hours after an injection. This usually settles on its own within a couple of days. Use your usual pain killers to relieve symptoms.
- Infection: Very rarely infection might be introduced into the joint at the time of an injection (estimated as 1 in 23000). If the joint becomes more painful and hot, red, or swollen; you should see your doctor immediately.
- Thinning of skin: Occasionally some thinning of the skin or dimpling skin colour change may occur at the injection site. This is more likely to happen if you have a higher dose of steroid,
- Facial flushing: Steroid injections may sometimes cause facial flushing or interfere with the menstrual cycle making them irregular temporarily. However you should consult your GP if concerned, or if it persists.

- **Mood change:** Any treatment with steroids may cause changes in mood – either elation or depression. This may be more common in people with a previous history of mood disturbance. If you have concerns please discuss this with your doctor.
- **Change in glycaemic control:** People with diabetes may find that the steroid injection affects their blood sugar control; sometimes you may notice a temporary blood sugar rise. It is recommended that you check your blood levels more regularly; it may take between 1-3 weeks for them to settle.

What should I expect after my joint injection?

- We advise you spend 30 minutes resting quietly in the clinic waiting area and make sure you feel well before you leave. Avoid strenuous activity for the rest of the day.
- The injected area may be numb for up to 24 hours.
- The injected site may be sore for one to two days.
- Do not use heat pads or any other form of heat on the injection site for two days following the injection. You may however choose to use an ice pack on the injection site as required, if you find this beneficial.
- For a weight bearing joint we recommend that you rest and gently potter at home for 2 days post injection to improve the likelihood of a good response.
- You may develop a bruise at the injection site.
- Most people notice improvement in their pain in 2 weeks. Maximum improvement of your pain may take up to 6 weeks following your injection.

IMPORTANT: If you develop a rash or if the injection site is red, hot, swollen or painful, you may be developing an infection. Please contact the musculoskeletal team, or your GP. If you are unable to contact either of these and continue to have concerns, please go to A&E.

If you have any queries or problems following your joint injection please contact MSK Partnership using the number on your appointment letter or contact your GP.