Consensus document on COVID-19 vaccination for patients with lymphoedema

Contributors:
Professor Peter Mortimer. Professor of Dermatology and Lymphovascular Medicine.
Dr Kristiana Gordon. Consultant of Dermatology and Lymphovascular Medicine.
Professor Derek Macallan. Professor of Infectious Diseases and Medicine.
Professor Sahar Mansour. Professor of Clinical Genetics.
Professor Vaughan Keeley. Professor of Palliative Medicine and Lymphoedema.
Dr Julian Pearce. Dermatology Registrar and Academic Clinical Fellow.

COVID-19 is an infection caused by an infectious respiratory coronavirus. Vaccinations are currently being rolled out across the U.K to help protect the population from this infectious disease. There are currently four vaccines available; none contain live forms of the virus, so you cannot get COVID-19 infection from the vaccine. The vaccine mimics parts of the virus; this triggers the immune system to produce antibodies which protect from COVID-19. The initial dose gives some protection, but protection is better after the subsequent ‘booster’ dose, given at a later date.

This consensus document aims to give advice regarding vaccination to patients with lymphoedema, based on the best available evidence and expert opinion.

It is important that individual patients liaise with their General Practitioner about their own medical circumstances, as this guidance cannot cover other medical problems patients may have, which can influence suitability for vaccination.

In general, patients with lymphoedema are not considered to have a weakened immune system. Some patients with rare forms of genetically inherited lymphoedema may have weakened immune systems; you will have been told if this applies to you.

- **COVID-19 vaccination is advisable for patients with lymphoedema and should help your body produce antibodies to fight the virus should you encounter it in the future.**

- **Patients with forms of genetically inherited lymphoedema associated with weakened immune systems should also have the vaccine. However, it is possible that these patients may not make a full immune response, and therefore should continue to take precautions.**
• Patients are recommended to accept whichever vaccine is offered, providing they have no other reason not to.

The vaccination is usually given as an injection into the upper arm. Within the areas of the body affected by lymphoedema, the immune cells which fight infection may not work as well. Vaccination into these areas may therefore result in a weaker immune response and less protection from COVID-19. Damage to the skin within an area of lymphoedema can also act as an entry site for infection, so careful skin care and protection is advisable for areas of swelling. We therefore recommend that vaccination is avoided in these areas.

We have produced the following guidance to help select the most appropriate area of the body for vaccination:

• **If you have one arm affected by lymphoedema:** Both doses of COVID-19 vaccine should be given in the unaffected, opposite arm.

• **If you have had the lymph nodes removed from the axilla (armpit) of one arm:** Both doses of COVID-19 vaccine should be given in the opposite arm.

• **If both arms are affected by lymphoedema, but not the legs:** Both doses of COVID-19 vaccine should be given into the thighs or buttocks.

• **If both arms and one leg is affected by lymphoedema:** Both doses of COVID-19 vaccine should be given into the unaffected thigh or buttock.

• **If both arms and both legs are affected by lymphoedema:** Both doses of COVID-19 vaccine should be given into the limb least affected by lymphoedema.

Please note that both the Pfizer and Moderna COVID-19 vaccine documents (in the footnotes) confirm that injection maybe given into the thigh. Lymph node swelling can occur after any vaccine and is a known side effect of both Moderna and Pfizer COVID-19 vaccines. It should resolve promptly after the vaccination.