



Stem Cell Therapy

Approved by the COA Board of Directors on June 11, 2025

COA Position Statement Stem Cell Therapy

Osteoarthritis is a leading cause of pain and disability in Canada. Orthopaedic surgery can be an appropriate treatment modality to ease the pain that many patients experience in affected joints.

Stem cell therapy is a promising treatment strategy but only through basic and clinical research leading to robust randomized controlled trials will this therapy be shown to be a benefit to patients with joint disease. At present, there are no high-quality, sufficiently large clinical trials to provide definitive evidence of stem cell efficacy for the treatment of orthopaedic patients.

Stem cell treatments are complex and may involve variations in the cells used, the conditions under which the cells are handled, the matrix that supports the cells and the growth factors used to stimulate cells, thus carefully controlled trials must be planned and implemented.

The International Society for Stem Cell Research has issued a statement that “When a professional consensus on the safety and therapeutic value of a treatment is lacking, the ISSCR believes it is unethical and unprofessional to market such interventions directly to patients”. The COA supports this statement.

Non-evidence based treatments and particularly therapies that involve significant cost to the patient and pose unknown potential for harm, should be strongly discouraged.