

Ergonomic working in the OR – Necessary or just a trend?



Key Facts at a glance:

Occupational injuries and hazards have gained increased attention in the surgical community in general and in the orthopedic literature specifically:

- Orthopedic surgeons work in an environment that puts a high demand on their bodies, especially the musculoskeletal system.
- On average, **44%–65% of orthopaedic surgeons** suffer from **work-related musculoskeletal disorders**
- The **high cost** of management and **rehabilitation** of **these injuries** in addition to the related number of **missed work days** indicate the need for **increased awareness** and implementation of **preventive measures**.



Executive Summary:

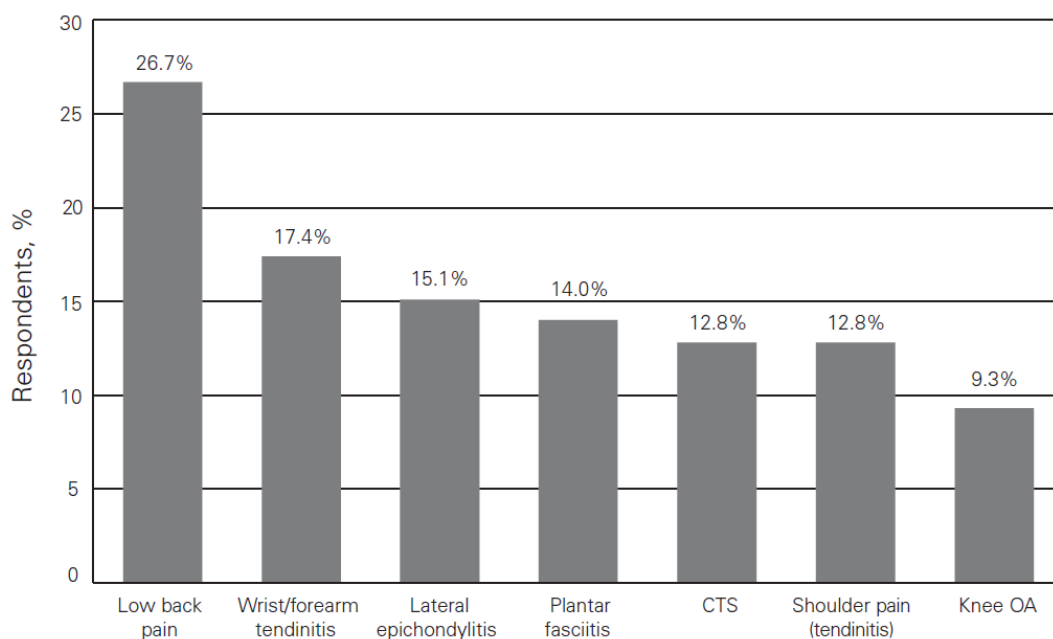
Orthopedic surgeons work in an environment that puts a high demand on their bodies, especially the musculoskeletal system.

Repetitive movements while using tools, prolonged standing and operating in sustained and non ergonomic positions, all contribute to this increased load on the bones and muscles. Studies have shown increased incidence of musculoskeletal complaints in orthopedic surgeons compared with other specialists.

A total of 86 surgeons completed a survey during the period of data collection.

Overall, 66.7% of responding surgeons reported a work-related musculoskeletal disorder, of which 26.7% required time off work because of their injuries.

Area injured: Musculoskeletal disorders



Musculoskeletal disorders and complaints among survey participants. CTS = carpal tunnel syndrome; OA = osteoarthritis.

Conclusion:

- These results indicate that attention should be directed toward making the operating room more surgeon-friendly in terms of more ergonomically safe postures and movements.

- The cost of management and rehabilitation of these injuries in addition to the number of missed work days because of these injuries indicate that they have a significant economic burden on the health care system.
- Increased awareness may help with the early detection of these injuries and with the implementation of preventive measures.

Source:

Saad M. AlQahtani, MD, MSc (candidate),* Mohammad M. Alzahrani, MD, MSc,* and Edward J. Harvey, MD, MSc; Prevalence of musculoskeletal disorders among orthopedic trauma surgeons: an OTA survey; CanJ Surg. 2016 Feb; 59(1): 42–47.
Link: <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4734918/>

Davis WT, Sathiyakumar V, Jahangir AA, Obremskey WT, Sethi MK; Occupational injury among orthopaedic surgeons; J Bone Joint Surg Am. 2013 Aug 7;95(15):e107.
Link: <https://www.ncbi.nlm.nih.gov/pubmed/23925752>