

September 2023

Name of journal: *World Journal of Orthopedics (WJO)*

Manuscript ID: 87661

Title: Triggering, clicking, locking and crepitus of the finger: A Comprehensive Overview

Dear Editor-in-Chief of the World Journal of Orthopedics,

On behalf of the other authors and myself, I would like to extend my gratitude for the efforts and time spent reviewing our submission. The Reviewer make excellent points and offer valuable suggestions to improve the manuscript. **Please find the responses in bold font under each of the comments made by the reviewer below, which can also be found highlighted in the revised manuscript:**

Reviewer 1 (number ID: 05630740)

Reviewer #1:

Conclusion: Minor revision

Specific Comments to Authors: The abstract is wordy and exceeds the limit of the usual 200-word count or less.

The abstract has been edited and shortened to 105 words.

The reference list is sparse, indicating the high likelihood of the lack of a thorough literature search.

Additional references have been added.

I have also sporadically detected numerous sentence fragments, run-ons, and grammatical errors. Please consider English language services input.

The modified paper has been corrected by a native English MD, PhD.

Clinicians must be conceded to the fact that high-quality medical writing is critically essential to professionalism and important. In general, authors should generate their defense by addressing the following inquiries: - WHAT DO WE CURRENTLY KNOW ABOUT THIS CONDITION? - WHAT ARE THE CURRENT THEORIES THAT DRIVE THE CLINICAL APPLICATIONS IN THE MANAGEMENT? - WHY STUDY THIS QUESTION FURTHER? - WHAT SPECIFICALLY REQUIRES FURTHER INVESTIGATION DUE TO LACK OF EVIDENCE, CONTRADICTIONS, AND LIMITATIONS? - WHAT CONTRIBUTIONS WILL YOUR WORK MAKE TO THIS FIELD? Authors are reminded that the purpose of a mini review is to summarize and evaluate the literature to show relationships between different studies; bearing in mind that one of the aims of a review article is to compare and contrast along with the interpretation of the works of others. This aspect is heavily lacking in this manuscript. Moreover, although prompted to show how published work relates to their work, authors should not fall into the habit of emphasizing their own work or field of research effort. In addition, the concluding remarks are suboptimal and not very convincing. I strongly encourage authors to address these areas of concern. Please make necessary revisions and re-submit.

To address these issues, the following has been added in the manuscript:

With regards to what we currently know about this condition, triggering, clicking, locking, and crepitus of the finger are symptoms typically associated with a condition known as "trigger finger" or stenosing tenosynovitis. This condition primarily affects the flexor tendons of the fingers and is characterized by certain signs and symptoms. Triggering is a sensation where the finger gets stuck in a bent position and then suddenly releases with a "click" or "pop." Clicking can be defined as an audible or palpable clicks or snaps during finger movement. Locking occurs when the finger becomes locked in a flexed position, requiring manual assistance to extend it. Crepitus can be described as the sensation or sound of grinding, popping, or crackling within the affected finger during movement.

Current knowledge suggests that these symptoms arise due to inflammation or thickening of the tendon sheath, causing an obstruction in the smooth gliding of the flexor tendon. The

exact causes of trigger finger are multifactorial, with risk factors including repetitive hand movements, underlying medical conditions, and genetic predisposition.

The current theories that drive the clinical applications in the management include the inflammation within the tendon sheath plays a key role in triggering finger symptoms. Treatments often involve anti-inflammatory medications, corticosteroid injections, or physical therapy. The Structural Theory is thought that structural changes in the tendon, such as nodules or thickening, are responsible for the condition. Surgical interventions, such as tenosynovectomy or release, aim to address these structural issues. The Biomechanical Theory includes mechanical factors, like repetitive strain or improper hand ergonomics, are thought to contribute to the development of trigger finger. Occupational therapy and ergonomic modifications are employed to alleviate symptoms.

Further research on trigger finger is essential for several reasons. Trigger finger is a common hand condition, and its prevalence is increasing, possibly due to changes in lifestyles and work habits. Understanding it better can help address this growing health concern. The condition can significantly impact an individual's quality of life, affecting their ability to perform daily activities and work. Improved management strategies can enhance patients' well-being. Trigger finger is associated with healthcare costs, including treatments, lost workdays, and rehabilitation. Better management approaches could reduce the economic burden.

Advancements in Treatment are fundamental. As our understanding of the condition deepens, more targeted and effective treatment options can be developed, potentially reducing the need for surgery and minimizing recurrence rates. Research should focus on long-term outcomes of different treatment modalities, including surgery, corticosteroid injections, and conservative therapies, to determine which provides the best sustained relief.

Understanding the underlying pathophysiological mechanisms of trigger finger can lead to more precise diagnostic tools and therapeutic targets. Identifying additional risk factors beyond those currently recognized can help with early detection and preventive measures. The efficacy of non-surgical treatments, such as physical therapy, occupational therapy, and ergonomic modifications, needs more extensive study to establish their role in managing trigger finger.

Studies investigating the long-term outcomes of various treatment approaches, elucidating the precise pathophysiological mechanisms, identifying novel risk factors, and assessing the effectiveness of non-surgical interventions, can provide a more comprehensive understanding of this condition. Clinician must seek to improve patient care and quality of life by guiding the development of more effective and evidence-based management strategies for trigger finger."

Many thanks for the thorough review of our paper. The aim of our invited manuscript was to provide only a brief review of adult eosinophilic esophagitis, and not an extensive assessment of the current literature. In accordance with the comment made by the Reviewer, however, several additional comments have been added throughout the manuscript. The abstract section has been checked and corrected according.

Kind regards,

Marco Zeppieri *(on behalf of the Grando Martina, De Pauli Silvia, Giovanni Miotti, and Balbi Massimiliano)*