

Case report

Rupture of flexor pollicis longus after carpal tunnel decompression

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Accepted 3 May 2000

1. Introduction

We describe a patient with a 50-year-old ununited scaphoid fracture who ruptured the flexor pollicis longus tendon following carpal tunnel decompression.

2. Case report

A 72-year-old, healthy, right-handed man was referred to our department with a complaint of slight pain and burning sensation in his right radial fingers. The symptoms were more severe during the night. On examination, there was mild wasting in his thenar eminence and Phalen's test was positive. Carpal tunnel syndrome was diagnosed and decompression (CTD) was performed 6 months later.

Four months after the CTD, he noticed a sudden loss of flexion of the interphalangeal joint of his right thumb associated with a sharp pain in the wrist. Examination at that time revealed that he was unable to flex the interphalangeal joint of the thumb. Rupture of the flexor pollicis longus tendon was diagnosed. An X-ray of the wrist showed an old ununited scaphoid waist fracture with scaphoid spurs (Fig. 1).

Further questioning revealed that 50 years ago his local doctor had diagnosed a scaphoid fracture and given him some painkillers. No further treatment was undertaken.

Following the rupture of the flexor pollicis longus tendon and a long discussion with the patient about the surgical options, an interphalangeal joint fusion of the thumb was performed. Three months later, he was satisfied with the function of the thumb and he no longer had pain.

3. Discussion

Tendon rupture associated with scaphoid non-union is uncommon [1,2]. This patient has had a scaphoid



Fig. 1. Anteroposterior X-ray of 50-year-old scaphoid non-union.

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ΒΙΒΛΙΟΘΗΚΗ ΕΠΙΣΤΗΜΩΝ ΥΓΕΙΑΣ

ΥΠΟΥΡΓΕΙΟ ΥΓΕΙΑΣ ΚΥΠΡΟΥ – Ι. Υ. & Υ. Δ. Υ.

ΕΙΔΟΠΟΙΗΣΗ: ΠΡΟΕΙΔΟΠΟΙΗΣΗ ΣΧΕΤΙΚΑ ΜΕ ΤΟΥΣ ΠΕΡΙΟΡΙΣΜΟΥΣ ΠΝΕΥΜΑΤΙΚΩΝ ΔΙΚΑΙΩΜΑΤΩΝ

Ο νόμος πνευματικών δικαιωμάτων των Ηνωμένων Πολιτειών (τίτλος 17, Ηνωμένος κώδικας) ελέγχει την παραγωγή των φωτοτυπών ή άλλων αναπαραγωγών του υλικού. Υπό ορισμένους όρους που διευκρινίζονται στο νόμο, οι βιβλιοθήκες και τα αρχεία εξουσιοδοτούνται για να εφοδιάσουν μια φωτοτυπία ή άλλη αναπαραγωγή. Ένας από αυτούς τους διευκρινισμένους όρους είναι ότι η φωτοτυπία ή η αναπαραγωγή δεν πρόκειται «να χρησιμοποιηθεί για οποιοδήποτε σκοπό εκτός από την ιδιωτική μελέτη, την υποτροφία ή την έρευνα». Εάν ένας χρήστης υποβάλλει ένα αίτημα, ή αργότερα χρησιμοποιήσει, μια φωτοτυπία ή την αναπαραγωγή για λόγους παραπάνω από τη «δικαιη χρήση», αυτός ο χρήστης μπορεί να είναι υπεύθυνος για την παράβαση πνευματικών δικαιωμάτων. Αυτό το όργανο διατηρεί το δικαίωμα να αρνηθεί να δεχτεί μια διαταγή πνευματικών δικαιωμάτων εάν, στην κρίση της, η εκπλήρωση της διαταγής θα περιελάμβανε την παραβίαση του νόμου πνευματικών δικαιωμάτων.

(η παραπάνω ειδοποίηση αποτελεί μετάφραση από τον πρωτότυπο σχετικό νόμο των Η.Π.Α. σχετικά με τα πνευματικά δικαιώματα που παρατίθεται παρακάτω).

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non-union for 53 years without complaint. The scaphoid non-union may have produced low-grade synovitis in the carpal tunnel. Carpal tunnel syndrome itself may also cause poor vascularisation of the flexor tendons in the carpal tunnel making them vulnerable to attrition forces [3]. The flexor pollicis longus tendon normally runs around the hook of the distal part of the scaphoid bone [4]. Division of the flexor retinaculum causes minor change in the anatomical position of the carpal bones and flexor tendons.

We propose that displacement of the flexor pollicis longus tendon over the scaphoid non-union and osteophytes, caused attrition between the tendon and osteophytes, and ultimately rupture of flexor pollicis longus tendon. Interphalangeal joint arthrodesis was performed 3 months after the carpal tunnel decompression with satisfactory results.

Zachee et al. [2] reported that inability to flex the interphalangeal joint of the thumb may arise from various pathologies. The authors would add attrition rupture of FPL tendon and would encourage X-ray examination of the wrist in these patients.

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Further Reading

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