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**Treatment of the ulnar nerve for overhead throwing athletes undergoing ulnar collateral ligament reconstruction**

Matthew S Conti, Christopher L Camp, Neal S Elattrache, David W Altchek, Joshua S Dines

#### Abstract

Ulnar nerve injuries are a common complaint amongst overhead athletes. The ulnar nerve is strained during periods of extreme valgus stress at the elbow, especially in the late-cocking and early acceleration phases of throwing. Although early ulnar collateral ligament (UCL) reconstruction techniques frequently included routine submuscular ulnar nerve (UN) transposition, this is becoming less common with more modern techniques. We review the recent literature on the sites of UN compression, techniques to evaluate the UN nerve, and treatment of UN pathology in the overhead athlete. We also discuss our preferred techniques for selective decompression and anterior transposition of the UN when indicated. More recent studies support the use of UN transpositions only when there are specific preoperative symptoms. Athletes with isolated ulnar neuropathy are increasingly being treated with subcutaneous anterior transposition of the nerve rather than submuscular transposition. When ulnar neuropathy occurs with UCL insufficiency, adoption of the muscle-splitting approach for UCL reconstructions, as well as using a subcutaneous UN transposition have led to

#### Match Overview

1	CrossCheck 54 words Elbow Ulnar Collateral Ligament Injury, 2015.	2%
2	CrossCheck 34 words Rosy, William H., and Luke S. Oh. "Pitcher's elbow: m... dial elbow pain in the overhead-throwing athlete". <i>Curre</i>	1%
3	CrossCheck 27 words M. A. Vitale. "The Outcome of Elbow Ulnar Collateral Liga ment Reconstruction in Overhead Athletes: A Systema...	1%
4	CrossCheck 22 words Glenn C. Terry. "Cubital Tunnel Syndrome", <i>Operative Tr eatment of Elbow Injuries</i> , 2002	1%
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7	CrossCheck 17 words Lopez, Javier, and Alexandro Aguilera. "Compression Ne uropathies". <i>Peripheral Neuropathy - A New Insight Int...</i>	<1%
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作者: CC Dodson - 2012 - 被引用次数: 5 - [相关文章](#)

Keywords: **overhead athlete**, **ulnar collateral ligament**, docking technique ... medial epicondylitis or **ulnar nerve** symptoms are initially **treated** conservatively with ... **While** the fascia of the flexor-pronator mass is exposed, care is taken to identify ...

## The outcome of elbow ulnar collateral ligament reconstruction in ...

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作者: MA Vitale - 2008 - 被引用次数: 123 - [相关文章](#)

The outcome of elbow **ulnar collateral ligament reconstruction** in overhead ... ligament (UCL) of the elbow are common injuries in **overhead athletes** that may be ... ulnar neuropathy in patients **treated** with obligatory **ulnar nerve** transposition ...

## Rehabilitation of the Overhead Athlete's Elbow

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作者: KE Wilk - 2012 - 被引用次数: 13 - [相关文章](#)

Rehabilitation following injury or **surgery** to the throwing elbow is vital to fully restore ... Keywords: **ulnar collateral ligament**, valgus extension overload, baseball pitcher .... **During** this phase, the **overhead athlete** may be placed on the Advanced .... The initial **treatment** consists of modalities, stretching exercises, and light ...

## Medial Ulnar Collateral Ligament Reconstruction of the Elbow in ...

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作者: CC Dodson - 2006 - 被引用次数: 122 - [相关文章](#)

**Reconstruction** of the medial **ulnar collateral ligament** was initially described by Jobe ... Methods: **During** a 3-year period, 100 consecutive **overhead-throwing athletes** were **treated** with ... The **ulnar nerve** was transposed in 22 cases. ... **Treatment** of Medial Collateral Ligament Injuries of the Elbow with Use of the "Tommy ...

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作者: CC Dodson - 2012 - 被引用次数: 6 - [相关文章](#)

The majority of **athletes** who **undergo UCL reconstruction** of the elbow can ... Keywords: **overhead athlete**, **ulnar collateral ligament**, docking technique ... epicondylitis or **ulnar nerve** symptoms are initially **treated** conservatively with ... Few studies have evaluated nonoperative **treatment** of UCL injuries in **throwing athletes**.

## Ulnar Collateral Ligament Reconstruction

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作者: BJ Erickson - 2016 - 被引用次数: 2 - [相关文章](#)

2016年1月28日 - **Ulnar collateral ligament reconstruction** (UCLR) is a common **surgery** ... The **ulnar nerve** was subcutaneously transposed in 79 (42%) patients. .... of flexion, and therefore, the most important part of the UCL in **overhead athletes**. .... The overall number of UCLRs and the ages of patients **undergoing** UCLR ...

## Medial Ulnar Collateral Ligament Reconstruction of the Elbow in ...

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作者: CC Dodson - 2006 - 被引用次数: 124 - [相关文章](#)

**Reconstruction** of the medial **ulnar collateral ligament** was initially described by Jobe and ... Hypothesis: The docking technique can return **overhead-throwing athletes** to sport with minimal ... The **ulnar nerve** was transposed in 22 cases. ... **Treatment** of Medial Collateral Ligament Injuries of the Elbow with Use of the "Tommy ...

## [PDF] Ulnar Collateral Ligament Reconstruction in Major League Baseball ...

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作者: BW Gibson - 2007 - 被引用次数: 53 - [相关文章](#)

**throwing athletes**. ... monly performed for **overhead athletes** with UCL injury. ... **surgery**, and to identify risk factors for **undergoing** UCL ... Conclusion: Most major league pitchers return from **ulnar collateral ligament** ..... 12 of 14 (86%) **athletes treated** with UCL reconstruction .... the **ulnar nerve** at the time of

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The majority of athletes who undergo UCL reconstruction of the elbow can ... Keywords: overhead athlete, ulnar collateral ligament, docking technique ... epicondylitis or ulnar nerve symptoms are initially treated conservatively with ... Few studies have evaluated nonoperative treatment of UCL injuries in throwing athletes.

## Medial Ulnar Collateral Ligament Reconstruction of the Elbow in ...

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Reconstruction of the medial ulnar collateral ligament was initially described by Jobe and ... Hypothesis: The docking technique can return overhead-throwing athletes to sport with minimal ... The ulnar nerve was transposed in 22 cases. ... Treatment of Medial Collateral Ligament Injuries of the Elbow with Use of the "Tommy ...

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