Supine Surgical Achilles Tendon Repair: Post-Operative Infection, Wound Complications, Re-rupture, and Sural Nerve Injury
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Introduction/Purpose: Open Achilles tendon repair is typically performed in the prone position for easy visibility of the tendon, but serious complications may be associated with general anesthesia in this position. Open Achilles tendon repair with supine position has been described and potentially avoids these issues, but it is not known whether this position is safe. We reviewed the complication rate of supine open Achilles tendon repair in a retrospective series of patients, looking specifically at wound healing, infection, re-rupture, and sural nerve injury.

Methods: CPT codes for Achilles tendon rupture were used to search the records of one surgeon for the years 2010-2014. The charts were then reviewed. Patients were included if they had an Achilles tendon rupture that was surgically treated with primary repair in the supine position within 15 days of injury. Patients were excluded if further reconstruction or tendon transfer was performed. A paramedian incision was utilized 1 cm medial to the Achilles sheath.

Results: A total of 37 patients met the inclusion criteria. Of these 37 patients, 31 were men and 6 were women. The average age was 40.0 years (range, 20 to 66 years). Average length of follow-up was 159 days (range 25 to 1589 days). The average BMI was 28 (range 24-36). There were no major complications, including no infections or wound complications. No reruptures and no sural nerve injuries were observed.

Conclusion: In 37 patients with early follow-up, supine open Achilles tendon repair had a complication rate equivalent to reported historical data for the prone procedure.