# UVA Research Day 2016 Rahman Kandil Title

Factors associated with patient-initiated phone calls after orthopaedic foot and ankle surgery

## **Background**

Patient telephone calls after surgery may place significant burden on clinic personnel. As our healthcare system moves toward outcome-based medicine with greater emphasis on patient satisfaction, improving safety, efficiency, and communication at the time of discharge is paramount. After discharge, patients rely on information from perioperative counseling and written discharge instructions. If this information is inadequate or unclear, or an unanticipated issue arises, a phone conversation may be required to address the issue. By analyzing the content of these phone calls, one may begin to understand deficiencies in the discharge process. To our knowledge, no study has examined this topic. The primary aim of this study is to investigate factors associated with patient-initiated postoperative telephone calls after foot and ankle surgery. Secondary goals are to determine reasons for patient calls, timing of calls, and procedures most frequently associated with calls.

### Methods

A retrospective chart review was conducted of 707 patients who underwent surgical treatment by one of our three orthopaedic foot and ankle surgeons between January 1, 2014 and December 31, 2014. The primary outcome measure was a patient initiated telephone call documented within 14 days postoperatively. Univariate and multivariate analyses were done to determine significant factors associated with a telephone call within 14 days postoperatively.

### Results

36.4 percent (n=257) of patients initiated a telephone call within 14 days after surgery. The most common reasons for telephone calls were pain control (47.1%), dressing/wound/bathing (16.0%), work notes/handicap parking permit (8.2%), and questions regarding weight-bearing status (7.0%). The procedures associated with the highest percentage of telephone calls were Lapidus hallux valgus correction with first tarsometatarsal joint arthrodesis (50%), deep hardware removal (50%), and ankle arthroscopy with extensive debridement (47.8%). Univariate analysis found that lower age, female sex, lower number of medical comorbidities, telephone call within 2 weeks prior to surgery, nerve block, lower American Society of Anesthesiology (ASA) score, outpatient surgery, and discharge to home were associated with more patient calls (p<0.05). Multivariate analysis found younger age (OR = 0.60) and female gender (OR = 0.99) to be significant independent predictors for patients calling 14 days or less postoperatively.

## Conclusions

More than one third of patients undergoing orthopaedic foot and ankle surgery call the surgeon's clinic or office before their first follow-up appointment. Our study identifies common reasons and procedures associated with more patient-initiated telephone calls after orthopaedic foot and ankle surgery. These data may help identify areas for improvement in communication in the perioperative period to improve efficiency, patient care, and patient satisfaction.