Patient Discharge to A Skilled Nursing Facility Is Associated with Higher Rates of Complications and Costs Following Primary Total Hip Arthroplasty: A Matched-Control Analysis

Background: As the rate of primary total hip arthroplasty (THA) procedures continues to rise in the United States, studies evaluating the health and cost outcomes of discharge location have been sparse. Therefore, the purpose of this study is to investigate whether primary THA patients discharged to a skilled nursing facility (SNF) have higher rates of (1) in-hospital lengths of stay (LOS), (2) medical complications, and (3) cost of care.

Methods: Patients discharged to a SNF undergoing primary THA were identified and matched to controls in a 1:5 ratio by age, sex, and medical comorbidities. The query yielded 806,546 patients discharged either to a SNF (n = 134,434) or discharged elsewhere (n = 672,112). Primary outcomes analyzed included in-hospital LOS, 90-day medical complications, and costs of care. A p-value less than .001 was considered statistically significant.

Results: Patients discharged to a SNF had significantly longer in-hospital LOS (4- vs. 3-days, P < .0001), higher incidence and odds of 90-day medical complications (18.72 vs. 13.41%, OR: 1.47, P < .0001), and significantly higher 90-day EOC costs ($16,428.73 vs. $15,280.91, P < .0001). Additionally, specific medical complications were found to occur at an increased frequency for patients discharged to a SNF.

Conclusion: Upon adjusting for age, sex, and comorbidities, the study was able to demonstrate that patients discharged to a SNF have increased rates of in-hospital LOS, 90-day medical complications, and cost. The study is suitable for use by orthopedists to adequately educate patients on potential outcomes following primary THA procedures.