

Is there an Association between Orthopaedic Surgeon Brand-Name Drug Prescribing Patterns and Industry Payments? An Open Payments Analysis

Christian Joseph Hecht, Robert John Burkhart, Ryan McNassor, Alexander Joseph Acuña, Atul F Kamath¹

¹Cleveland Clinic

INTRODUCTION: As healthcare expenditure continues to rise in the United States, the decision to substitute brand-name for generic prescriptions has been proposed as one solution to reduce cost. This analysis evaluated the association between industry payments and brand-name drug prescribing patterns of orthopaedic surgeons.

METHODS: A cross-sectional analysis of orthopaedic surgeons in the Centers of Medicare and Medicaid Services Open Payments (CMS OP) and the Provider Utilization and Payment Public Use Files (Part D-PUF) databases from 2013 to 2019 was conducted. The datasets were filtered by provider specialty, and total and brand-name prescription claims and costs were extracted. Descriptive statistics and linear regression were utilized to evaluate changes in the percentage of brand-name drug claims and cost over time. Via two-tailed Kendall's τ correlation, the number and dollar value of payments associated with the percent of brand-name drug claims per physician was evaluated. Similarly, this analysis was repeated per payment type and for the top 10% of overall payment receivers.

RESULTS:

A total of 19,781 orthopaedic surgeons received industry payments and prescribed drugs to Medicare Part D beneficiaries between 2013-2019. There were 192,523 industry payments totaling \$470,865,415. The yearly percentage of brand-name prescription claims and costs decreased from 2013-2019 (both $p < 0.001$) (**Figures 1 and 2**). There were positive correlations between the number of industry payments and the percentage of brand-name prescription drug claims ($\tau = 0.087$; $p < 0.001$) and costs ($\tau = 0.103$; $p < 0.001$). Among the top 10% of orthopaedic surgeons by payment value, there were positive correlations between the number and value of industry payments and the percentage of brand-name prescription drug claims ($\tau = 0.081$; $p < 0.001$) and costs ($\tau = 0.081$; $p < 0.001$).

DISCUSSION AND CONCLUSION:

These findings encourage continued efforts to increase transparency about industry-surgeon relationships and implement policy and practice-level changes to promote generic substitution.

Figure 1. Boxplot illustrating the percent of brand-name prescription drug claims from 2013 to 2019.

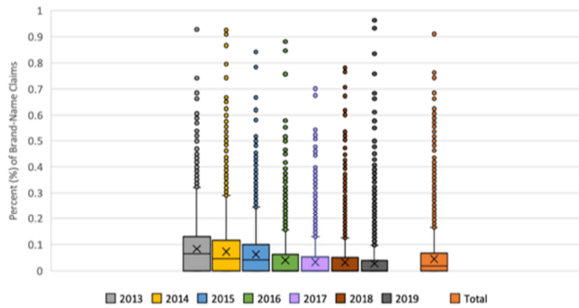


Figure 2. Boxplot illustrating the brand-name prescription drug cost per year relative to total prescription drug cost for individual orthopedic surgeons.

