Patients Receiving Workers' Compensation Have Inferior Postoperative Knee Function and Take Longer to Return to Work after Unicompartmental Knee Arthroplasty

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INTRODUCTION: After total knee arthroplasty (TKA), patients receiving workers' compensation (WC) have inferior postoperative functional outcome scores and are less likely to return to work (RTW). The purpose of this study was to determine the influence of WC on functional outcomes and time to RTW after unicompartmental knee arthroplasty (UKA). METHODS: This retrospective cohort study was conducted at an academic practice from 2013 - 2021. Patients who underwent unilateral UKA and were able to RTW were included in the study. Bilateral UKA, bilateral TKA, and revision TKA were excluded, as were patients who did not return to work due to retirement, disability, or unemployment. Patients were queried for RTW and time until RTW after surgery. Amongst 270 patients who were successfully contacted, 103 (38.1%) were excluded [31 (11.5%) patients in the WC cohort and 72 (26.7%) patients in the non-WC cohort] due to retirement [89 (33.0%)], disability [10 (3.7%)], and unemployment [4 (1.5%)]. 167 (61.9%) patients who were able to RTW were thus included in this study. Amongst patients who were able to RTW, 37 patients received WC and 130 patients did not receive WC, with 29.7% and 8.7% of patients in the WC and non-WC groups being laborers, respectively. Functional outcomes were obtained through our prospectively maintained institutional arthroplasty database. Statistical analysis consisted of T-tests, Fisher's exact tests, and multivariate linear regression, with significance set at a p-value < 0.05.

RESULTS: While no significant differences existed between the WC and non-WC cohorts regarding age, body mass index, Charlson Comorbidity Index, operative laterality, and utilization of robotic-assisted UKA, patients receiving WC had a higher proportion who were male (70.3% vs. 49.2%; p = 0.038). Patients undergoing UKA with WC had a longer median RTW time than patients without WC (8 vs. 6 weeks; p = 0.016). While the two cohorts had a similar mean preoperative Knee Injury and Osteoarthritis Outcome Score, Joint Replacement [KOOS JR] score (48.7 vs. 50.0; p = 0.879), patients undergoing UKA receiving WC had a significantly lower postoperative KOOS JR scores (73.3 vs. 79.9; p = 0.037) at a mean follow-up of two years. Upon performing multivariate linear regression, receiving WC significantly predicted a longer RTW (p = 0.012), and being a laborer significantly predicted a longer RTW (p = 0.001).

DISCUSSION AND CONCLUSION: Patients receiving WC have a delayed RTW and inferior postoperative knee function after UKA compared to patients not receiving WC. This information can be used to temper expectations after UKA in those receiving WC.