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May 20th, 12:30 PM

## Social Support and Total Joint Replacement: Differences Preoperatively between Patients Living Alone and Those Living with Others

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Lemay C, Harrold LR, Li W, Ayers DC, Franklin PD. (2014). Social Support and Total Joint Replacement: Differences Preoperatively between Patients Living Alone and Those Living with Others. UMass Center for Clinical and Translational Science Research Retreat. Retrieved from [https://escholarship.umassmed.edu/cts\\_retreat/2014/posters/75](https://escholarship.umassmed.edu/cts_retreat/2014/posters/75)

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## **Social support and total joint replacement: Differences preoperatively between patients living alone and those living with others**

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**Introduction:** Social relationships affect mental health, physical health, and mortality risk. Little is known about social support and patients electing to have total joint replacement (TJR) surgery. We explored the differences between participants living alone and those living with at least one other adult prior to TJR surgery.

**Materials & methods:** Preoperative and 6 month postoperative FORCE-TJR Registry survey data were collected from 6269 primary unilateral TJR patients between May 2011 and December 2013. Data included demographics, comorbid conditions, operative joint pain severity (HOOS/KOOS), musculoskeletal disease burden, physical function (SF-36 PCS), and mental health (SF36 MCS).

**Results:** Participants living alone were more likely to be older, female, on Medicare, with a high school education or less, and a racial/ethnic minority. Prior to surgery, they reported a greater number of comorbid conditions and non-surgical joints causing pain. Those living alone also had lower mean MCS summary measure, lower Social Functioning Scale score and a lower HOOS/KOOS Activities of Daily Living score before TJR. There were no differences preoperatively in mean BMI, mean PCS, or HOOS/KOOS surgical joint pain, symptoms, or quality of life scores between the two groups. Six months postoperatively, those living alone had lower mean PCS and MCS, but were more likely to report less pain and symptoms in the surgical joint. Unadjusted analyses of mean change over time found less improvement in PCS for those living alone compared to those not living alone.

**Conclusion:** Recognizing differences in social support prior to TJR surgery could inform interventions and potentially influence patient reported outcomes postoperatively.