

## Opioid Use Among Social Security Disability Insurance Applicants, 2013-2018

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### Key Findings and Policy Implications

This paper analyzes the extent to which opioid use by SSDI recipients is a continuation of treatment patterns initiated prior to SSDI enrollment, and the extent to which SSDI is itself a route to obtaining prescription opioids. To identify opioid use by SSDI applicants at the time of application, the study uses SSA administrative data, and applies a novel natural language processing algorithm to precisely identify opioid analgesics in free text medication entry fields on SSDI applications. The paper finds that:

- The prevalence of opioid use among SSDI applicants declined from 33% in 2013 to 24% in 2018. Applications reporting opioid use declined across both sexes and all age groups and education levels examined. Applications reporting opioid use also declined across all regions in the US, though there was substantial variation in the magnitude of decline with the smallest declines seen in parts of the Midwest and Southeastern United States.
- Among the subgroup of applicants with back and other musculoskeletal impairments, opioid use rates were notably higher: 50% of applicants with back impairments were already taking prescription opioids at the time of application, while 45% of applicants with musculoskeletal impairments were taking opioid.
- Both levels and changes in the rates of SSDI applications overall, as well as applications reporting opioid use, were positively associated with local opioid prescribing rates such that communities with higher prescribing rates also had higher rates of SSDI application.

Among chronic pain therapies, prescription opioids have been increasingly scrutinized and discouraged in light of limited evidence to support their efficacy together with growing evidence of their adverse effects. High rates of long-term opioid treatment and high dose prescribing among SSDI beneficiaries has been a source of particular public health concern. This study provides initial evidence on opioid use at program entry, the extent to which opioid treatment escalates following SSDI receipt, and whether features of the SSDI and Medicare programs might influence the trajectory of opioid use among beneficiaries.

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