

Antidepressant Treatment in Childhood

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Abstract

Mental health disorders tend to emerge in childhood, with half starting by age 14. This makes early intervention important, but treatment rates are low, and antidepressant treatment for children remains controversial since an FDA warning in 2004 that highlighted adverse effects. Linking individuals across Danish administrative registers, we provide some of the first evidence of impacts of antidepressant treatment in childhood on objectively measured mental health indicators and economic outcomes over time, and the first attempt to investigate under- vs overtreatment. Leveraging conditional random assignment of patients to psychiatrists with different prescribing tendencies, we find that treatment during ages 8–15 improves test scores at age 16, particularly in Math, increases enrolment in post-compulsory education at age 18, and that it leads to higher employment and earnings and lower welfare dependence at ages 25–30. We demonstrate, on average, a reduction in suicide attempts, self-harm, and hospital visits following AD initiation. The gains to treatment are, in general, larger for low SES children, but they are less likely to be treated. Using a marginal treatment effects framework and Math scores as the focal outcome, we show positive returns to treatment among the untreated. Policy simulations confirm that expanding treatment among low SES children (and boys) generates substantial net benefits, consistent with under-treatment in these groups. Our findings underscore the potential of early mental health treatment to improve longer term economic outcomes and reduce inequality.

Keywords: Antidepressants, mental health, education, test scores, human capital, Denmark, physician leniency, marginal treatment effects

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