

Does loneliness contribute to psychological distress? A longitudinal analysis using data from the Understanding Society Panel Study 2017-2021.

Nico Seifert

TU Kaiserslautern, Germany

Keywords: Causal Panel Modeling, Fixed Effects Models, Understanding Society, Loneliness, Mental Health

Introduction: Loneliness is widely regarded as a major risk factor for psychiatric disorders. Although previous research has demonstrated a strong link between loneliness and mental illness, the causal nature of this association is still critically debated. While socio-cognitive models assume that loneliness contributes to psychiatric disorders through negative cognitive biases that set off a series of affective, behavioral, and biological processes (e.g., HPA axis dysregulation), other explanations emphasize the role of selection and suggest that symptoms of psychiatric disorders and/or associated vulnerabilities (e.g., genetic factors, early traumatic experiences) lead to impaired social functioning and social stigma that increase feelings of loneliness. This study seeks to disentangle the two perspectives by analyzing whether loneliness is still associated with psychological distress when accounting for selection.

Data and Methods: The analytic sample was drawn from the Understanding Society Panel 2017-2021. Psychological distress was assessed using the GHQ-12, and loneliness was measured using the 3-item UCLA Loneliness Scale and a single item measure. The study applies fixed effects models with individual slopes (FEIS) to account for the possibility that individuals with less favorable distress trajectories self-select into loneliness.

Results: Compared to previous research, the association between loneliness and psychological distress was significantly reduced when accounting for selection on distress trajectories, but its magnitude remained substantial. The differences amounted to approximately .5 to 1.5 within-individual standard deviations of the outcome, indicating moderate to large effect sizes. The results were highly consistent for both genders and across measures of loneliness.

Discussion: The results provide strong evidence that loneliness contributes to psychological distress, but also show that the role of selection has been understudied in previous research. Intervention strategies should focus more on mitigating the negative social outcomes of psychiatric disorders and associated vulnerabilities to break the vicious cycle of loneliness and mental illness.