Does Owning Your Home Make You Retire Early?

A Comparative Analysis of Germany and the UK Using Targeted Maximum Likelihood Estimation

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Background & Hypotheses

Housing is the **largest storage of wealth** for most households and a **source of "property-based welfare"** (Doling and Ronald, 2010), but its role for critical life course transitions is understudied, especially for retirement.

Home ownership (1) provides a permanent income, (2) limits labour market mobility, and (3) is a source of subjective security of life; therefore:

H1 *Compared to renting, home ownership increases the risk of entering retirement throughout later life.*

H2 *The positive effect of home ownership is larger for outright owners.*

Housing is more central to welfare provision and much more common in the UK and renting is less secure than in Germany; therefore:

H3 *The positive effect of home ownership is larger in the UK.*

Estimand & Identification

Estimand: ATE as the difference in the risk of being retired at each age from 51 to 65 between always-renters and always-homeowners.

Confounding presents the main threat to identification and requires sufficient adjustments, especially for wealth, other household characteristics, and individuals' labour market position.

Data & Measures

I use data on individuals **aged 50+ during 1991-2021** from three household panel surveys. MICE is used to complete missing data (up to 13.2%).

Outcome: Retirement status (not working; self-defines as "retired")
Treatment: Tenure status (homeowner vs. renter)
Controls (t-1): Gender, Year, Region, Rural residence, Education level, Marital status, Any children, Occupation, Employment status, Partner employment status, Net HH income (equiv.), Unemployment rate

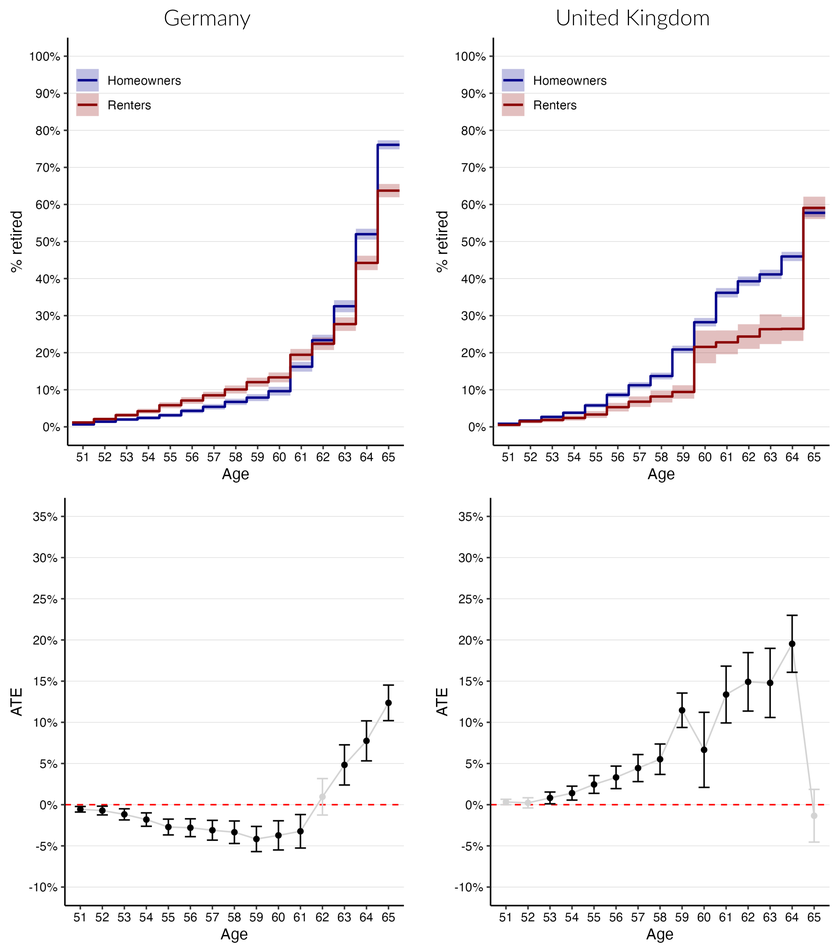
	Germany SOEP	UK BHPS/UKHLS
Person obs.	12,394	12,394
Person-years	90,453	102,590

Targeted Maximum Likelihood Estimation (TMLE)

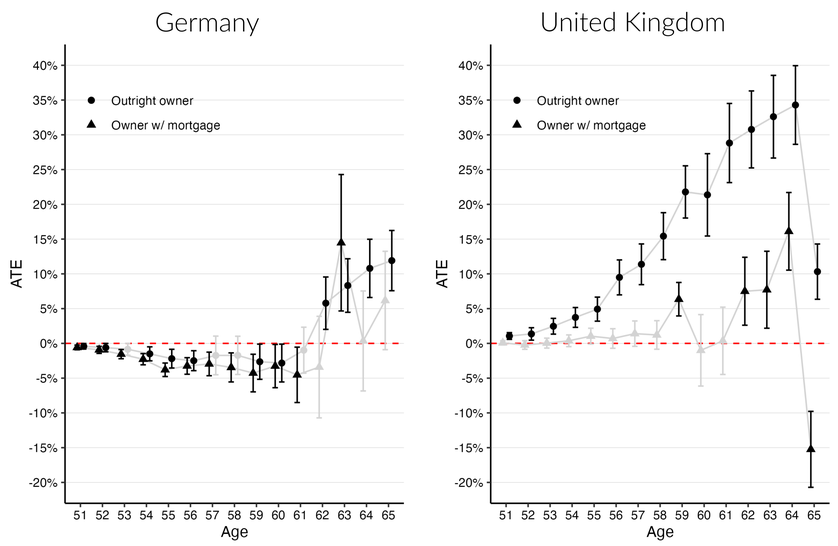
TMLE allows for the use of machine learning methods, is doubly-robust and reduces bias and the risk of misspecification. It involves four steps:

1. **Estimate outcome model** to predict retirement status at each age
2. **Estimate treatment mode** for tenure status based on confounders and determine probability of receiving treatment
3. **Correct predictions from first step ("Targeting")** by identifying weight that can be used to correct initial predictions
4. **Use updated model** to estimate risk curves for homeowners and renters and difference in risks at each age from 51 to 65

All estimation steps use the SuperLearner ensemble learner (GLM, Random Forest, Gradient Boosting) (van der Laan and Rubin, 2006)



What about homeowners with outstanding mortgage debt?



Key results

- Compared to renting, home ownership **raises the risk of being retired** in later life by up to 12pp. in Germany and up to 20pp. in the UK.
- The effect is **larger for outright owners** than for owners with outstanding mortgage debt.
- The size and age pattern of the homeowner effect **differs between the UK and Germany**.
- Institutionalised **age thresholds** appear to modify the causal effect of home ownership.

Discussion

Contribution: This is the first comparative study that examines the causal effect of home ownership on individuals' retirement transition in two distinct European welfare and housing regimes.

Housing causally affects a critical life course transition

- Using a highly flexible, doubly-robust method, this paper finds large causal effects of home ownership on a major later life course transition
- More studies are needed that use causal identification and methods to examine the role of housing for critical life course transitions
- TMLE is a well-suited methods for many life-course-related questions, especially if theory is lacking and the risk of misspecification is high

Institutional context matters

- The causal effect varies between Germany and the UK and changes at statutory age thresholds, indicating that institutional conditions modify the role of home ownership across the life course.
- More studies are needed that examine the effects of home ownership on life course transitions across different welfare and housing regimes.

Limitations and next steps

- Data limitations: High share of missing data, Low observation counts at older ages, Other types of wealth not directly observed
- Examine heterogeneous effects by gender and location (rural vs. urban)

References & Acknowledgements

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