



The Impact of Income-based Deductibles on Drug Use and Cost

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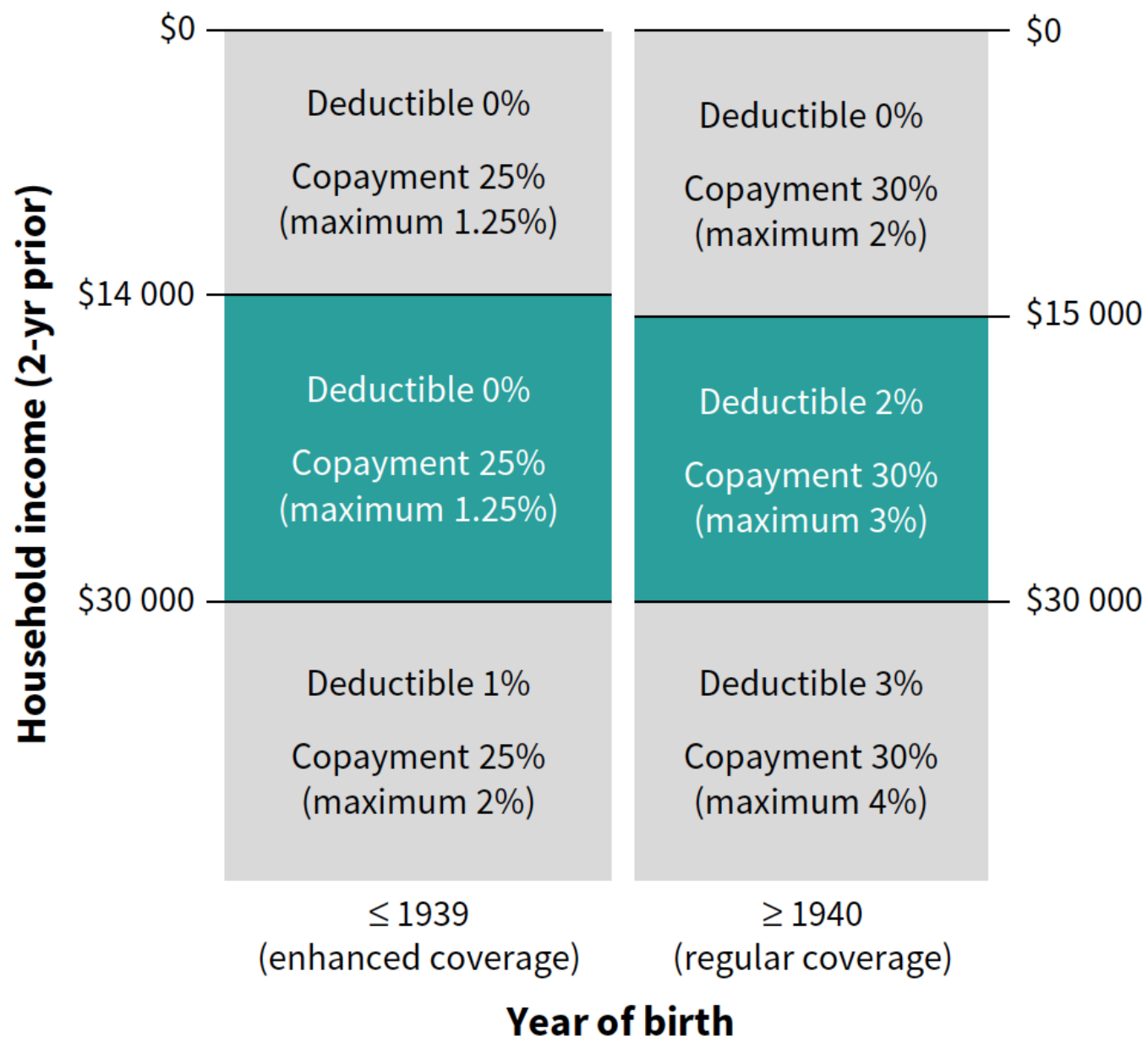


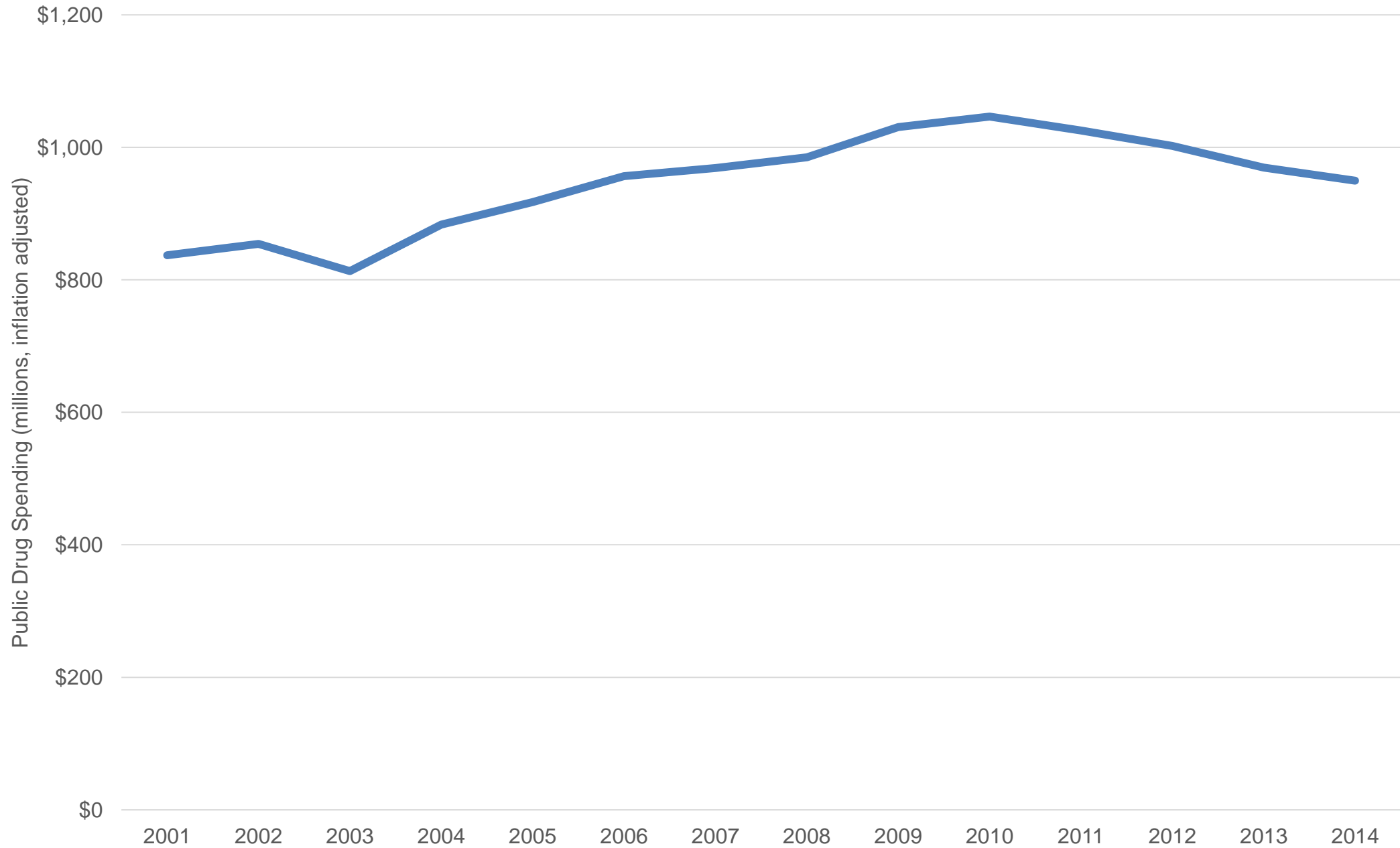
Are Income-Based Public
Drug Benefit Programs Fit
for an Aging Population?



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**Should Public Drug
Plans be Based on Age
or Income?**

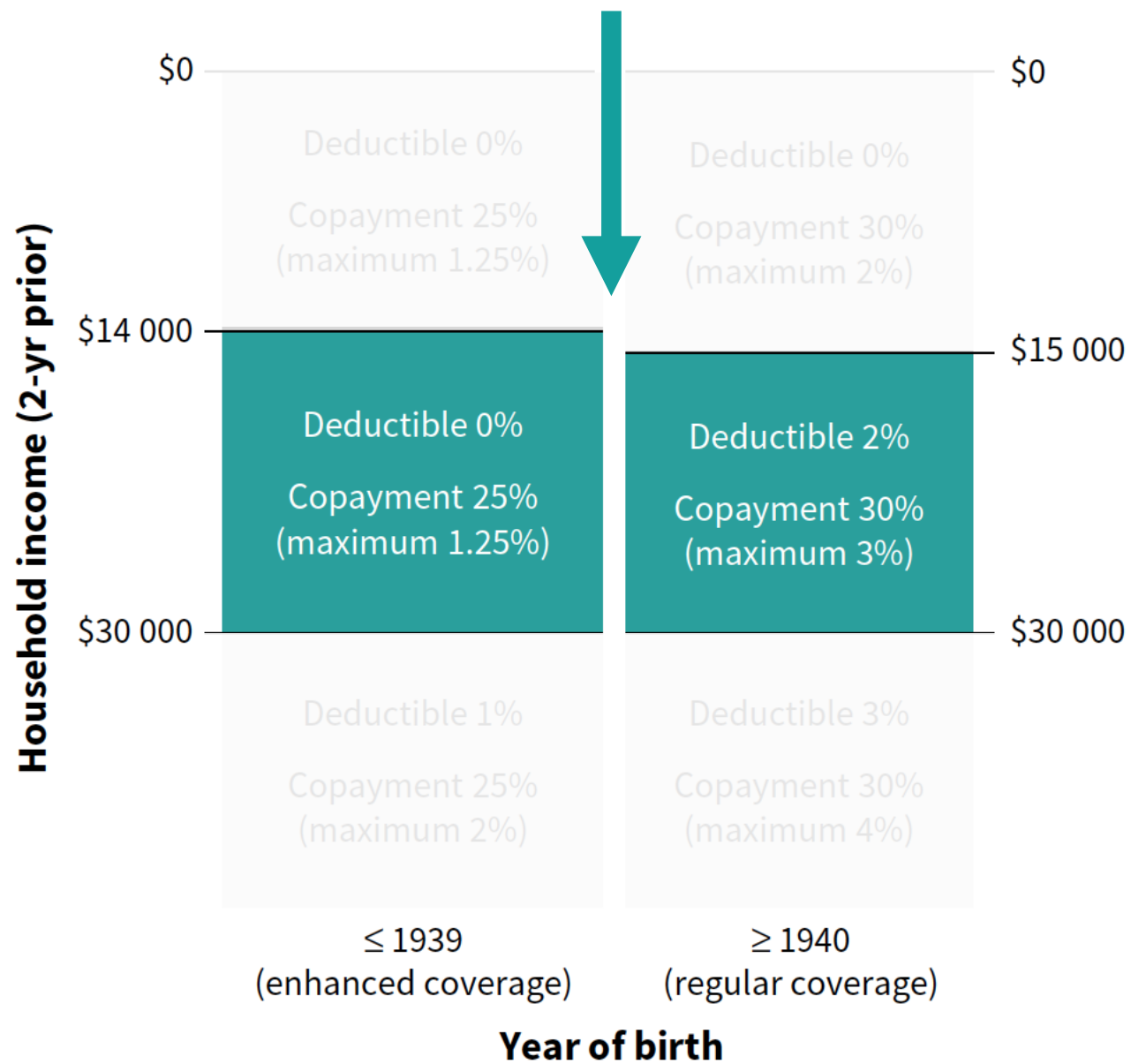


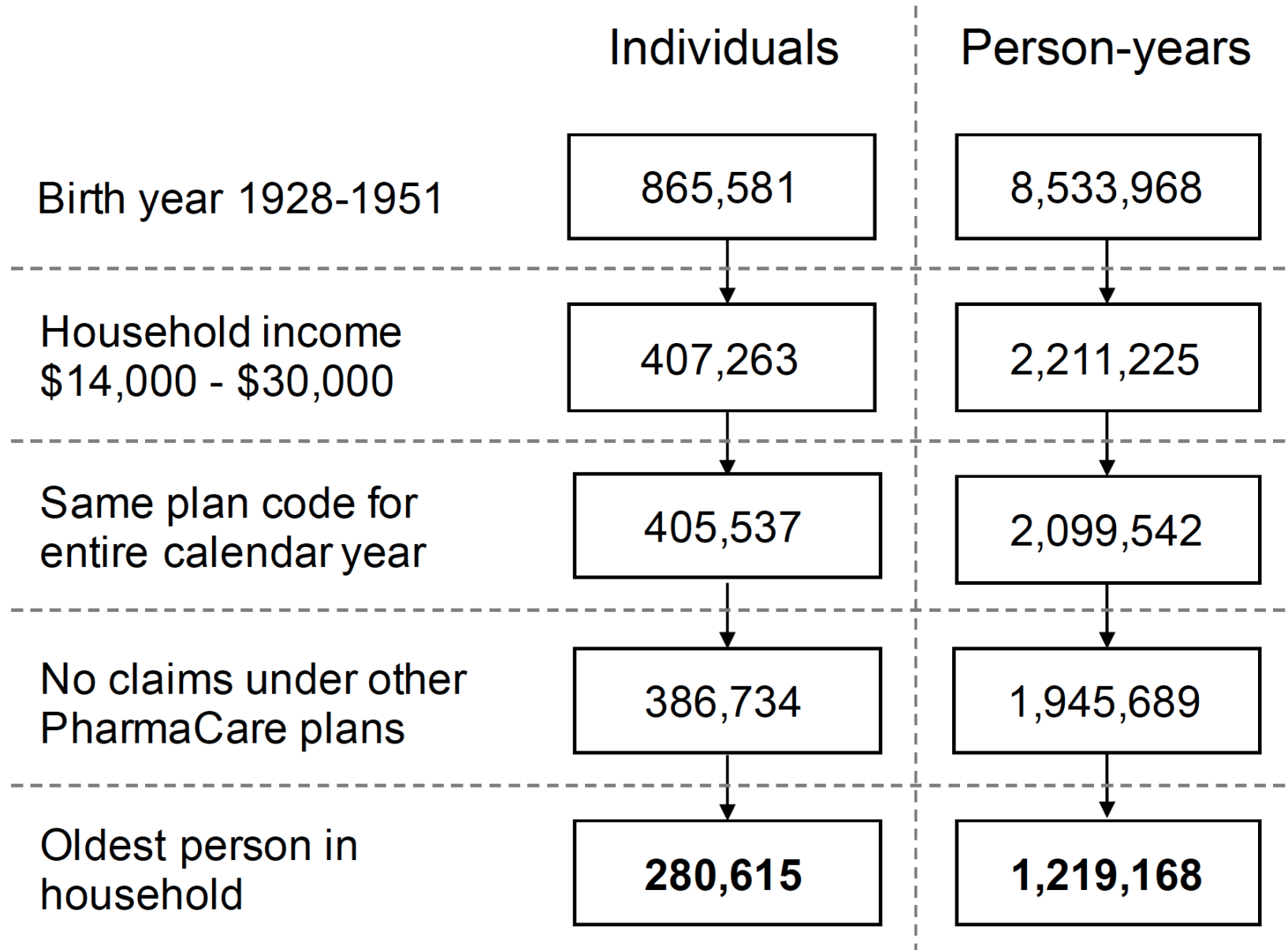


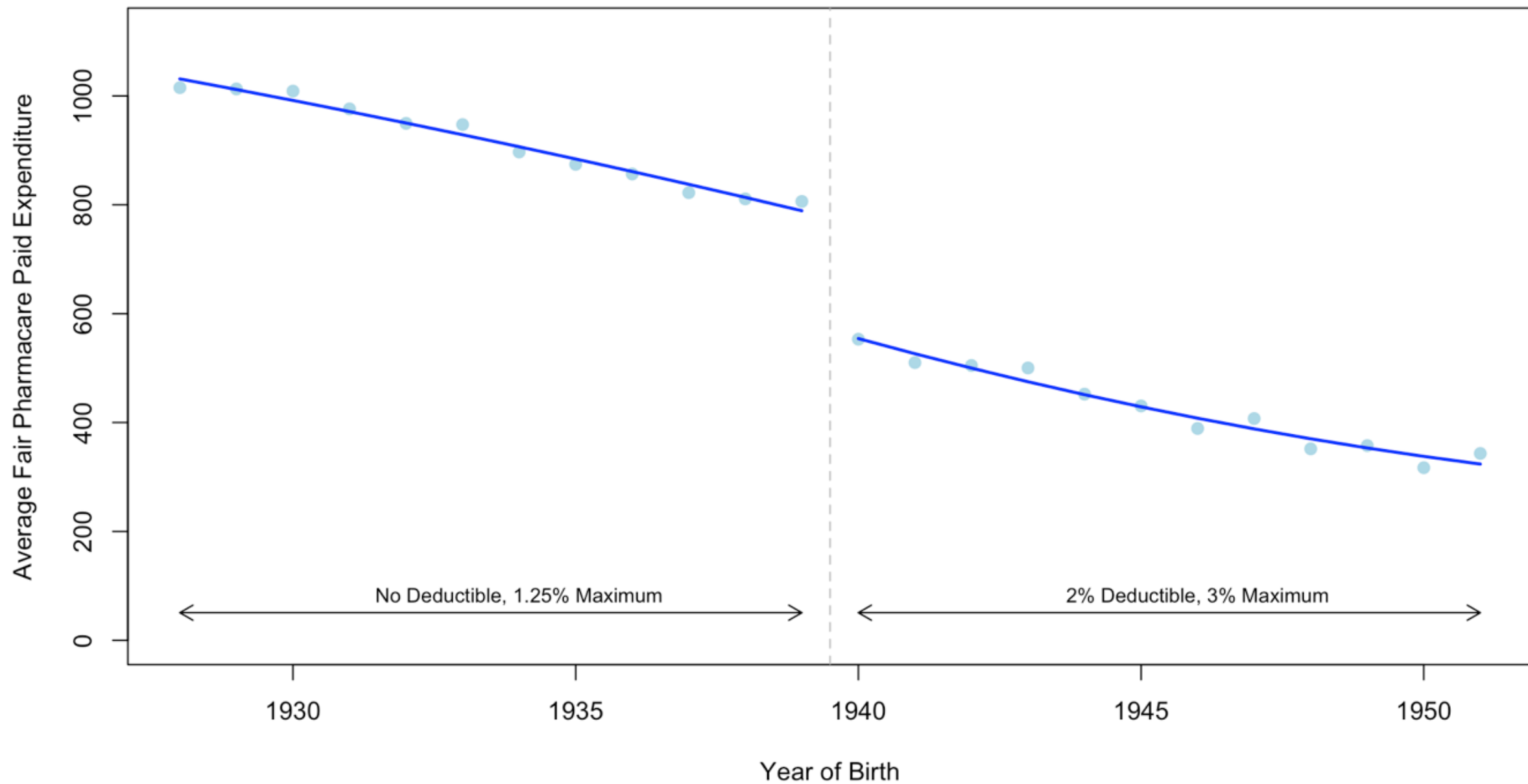


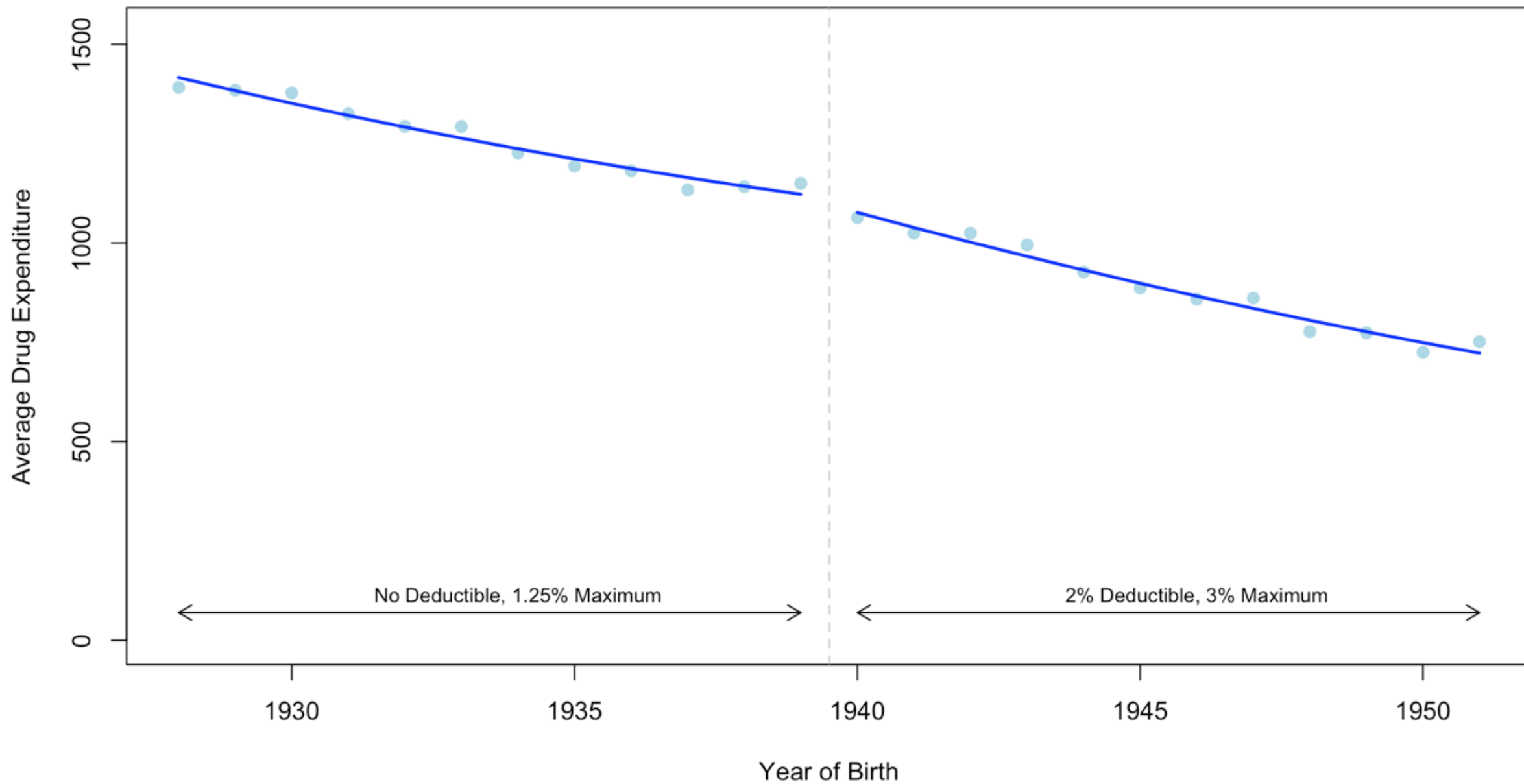
Methods

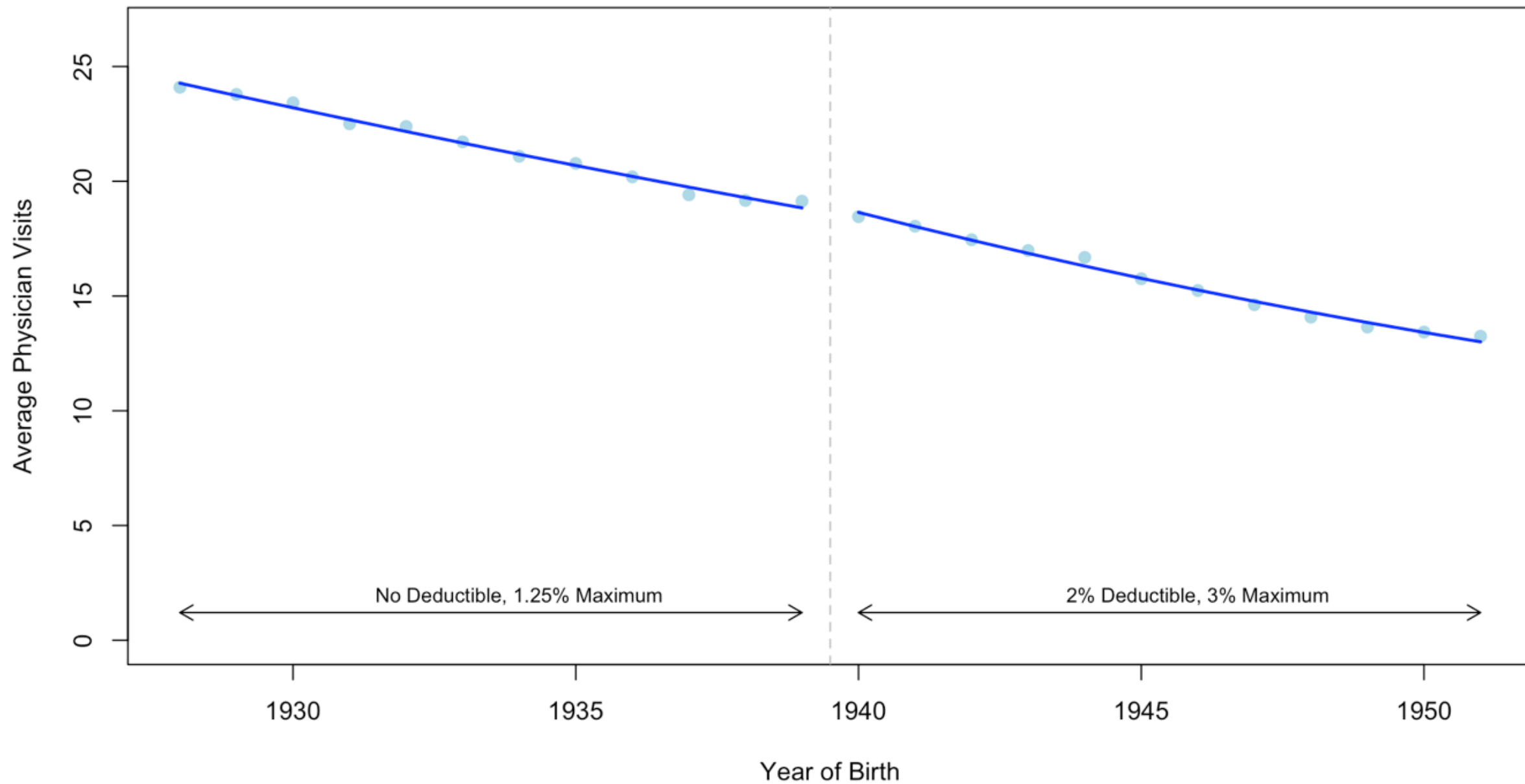
- Data sources
 - PharmaNet
 - Medical Service Plan billings
 - Discharge Abstract Database
- Study population
 - 2003-2015
 - Adults registered for Fair PharmaCare
 - Born in 1939 or earlier
 - Born in 1940 – 1951
 - Person-years

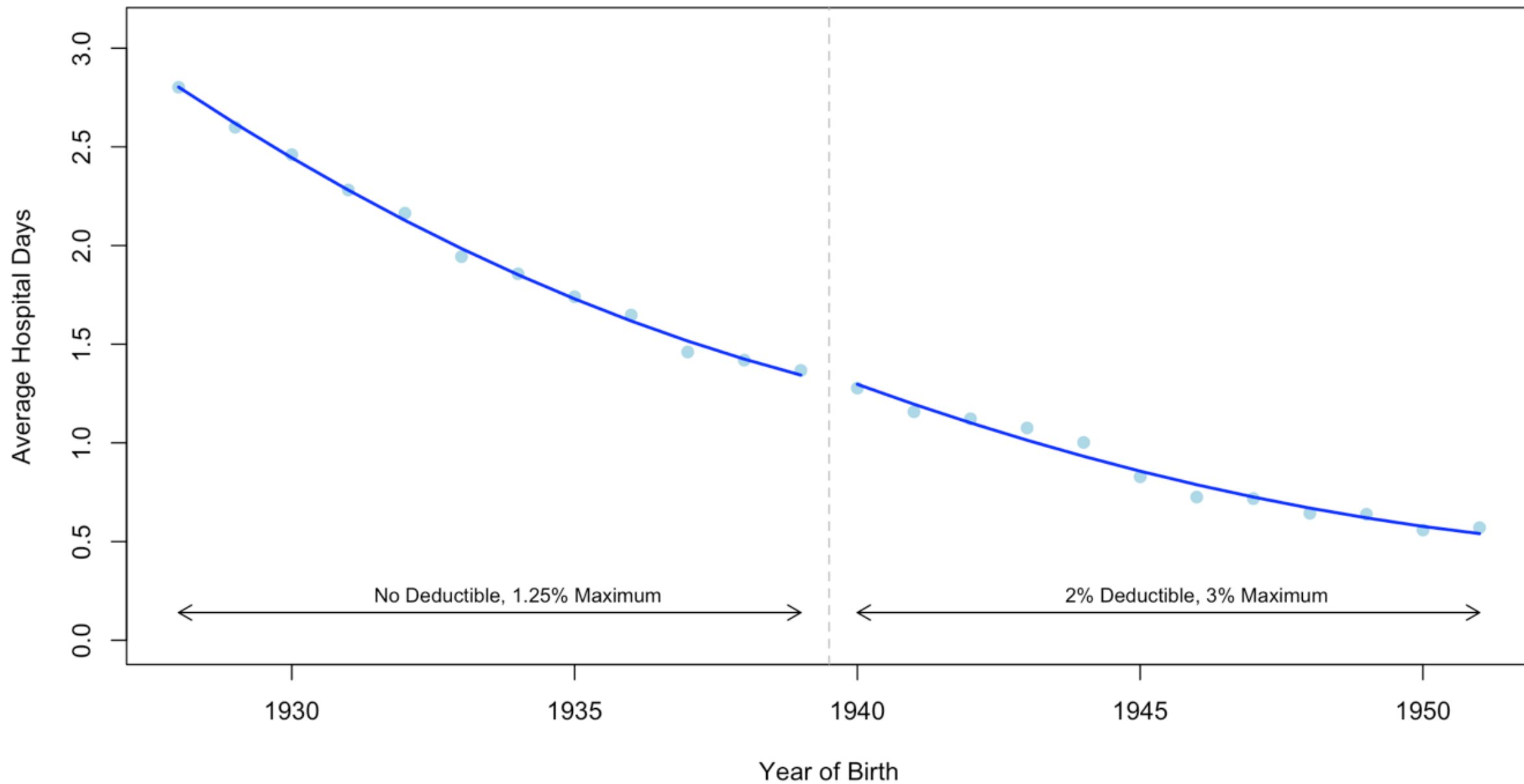














RESEARCH

Impact of income-based deductibles on drug use and health care utilization among older adults

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See related article at www.cmaj.ca/lookup/doi/10.1503/cmaj.170169

ABSTRACT

BACKGROUND: Income-based deductibles are present in several provincial public drug plans in Canada and have been the subject of extensive debate. We studied the impact of such deductibles in British Columbia's Fair PharmaCare plan on drug and health care utilization among older adults.

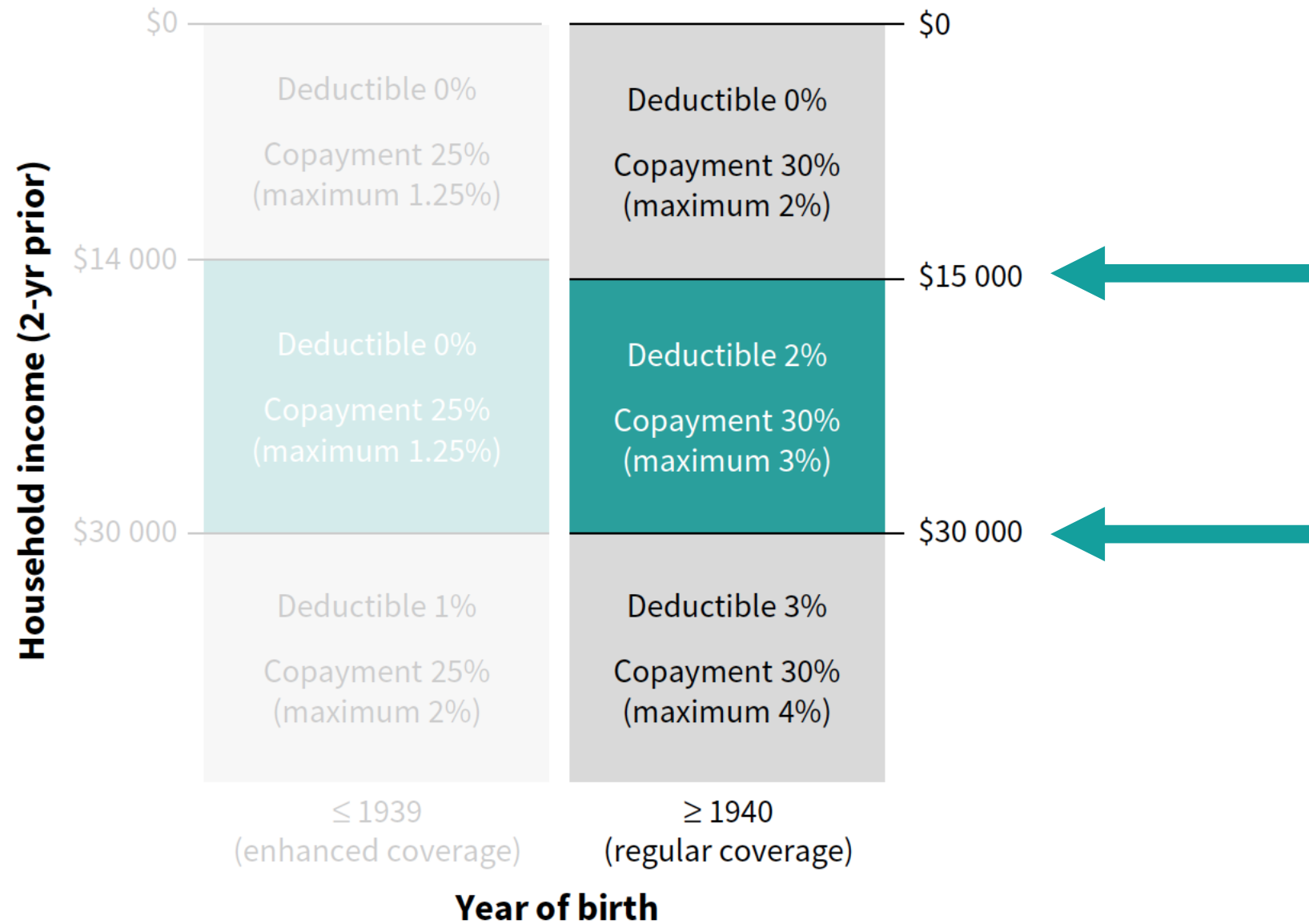
METHODS: We used a quasi-experimental regression discontinuity design to compare

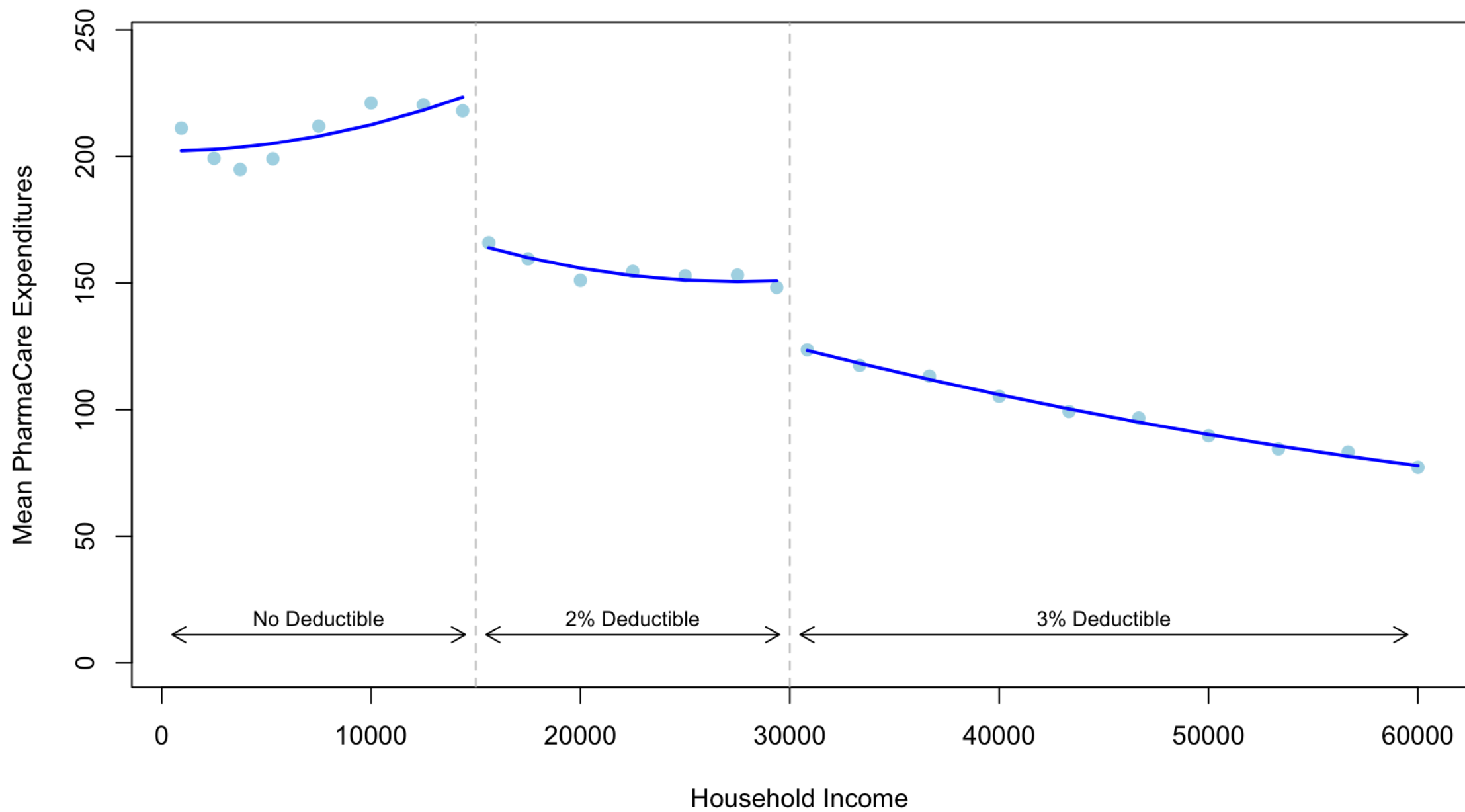
2% of household income). We used 1.2 million person-years of data between 2003 and 2015 to study public drug plan expenditures, overall drug use, and physician and hospital resource utilization in these 2 groups.

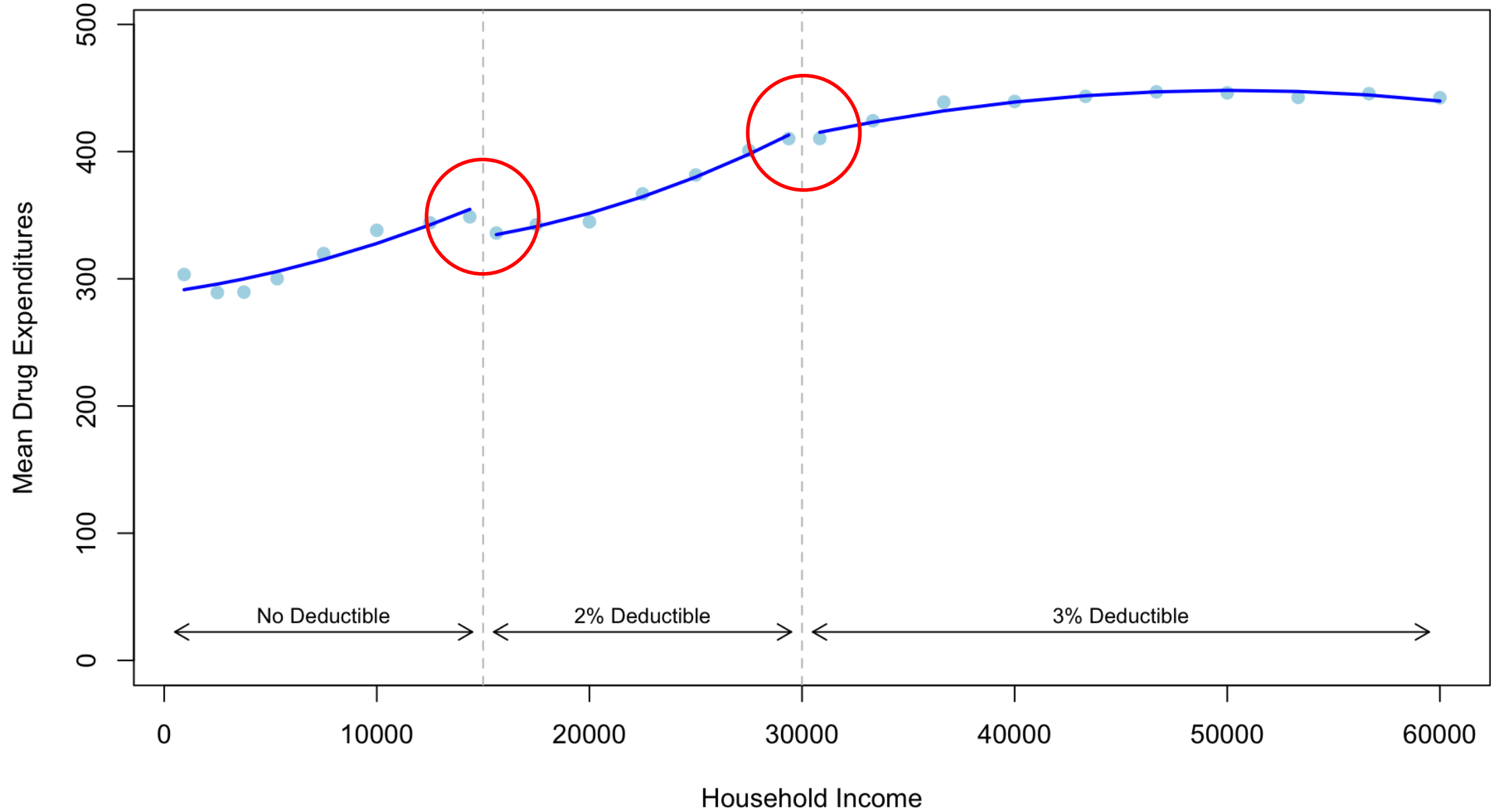
RESULTS: The income-based deductible led to a 28.6% decrease in person-years in which public drug plan benefits were received (95% confidence interval [CI]

total drug spending once privately paid amounts were accounted for ($p = 0.4$ and 0.8 , respectively). Further, we found only small or nonexistent changes in health care resource utilization at the 1939 threshold.

INTERPRETATION: A modest income-based deductible had a considerable impact on the extent of public subsidy for prescription drugs. However, it had









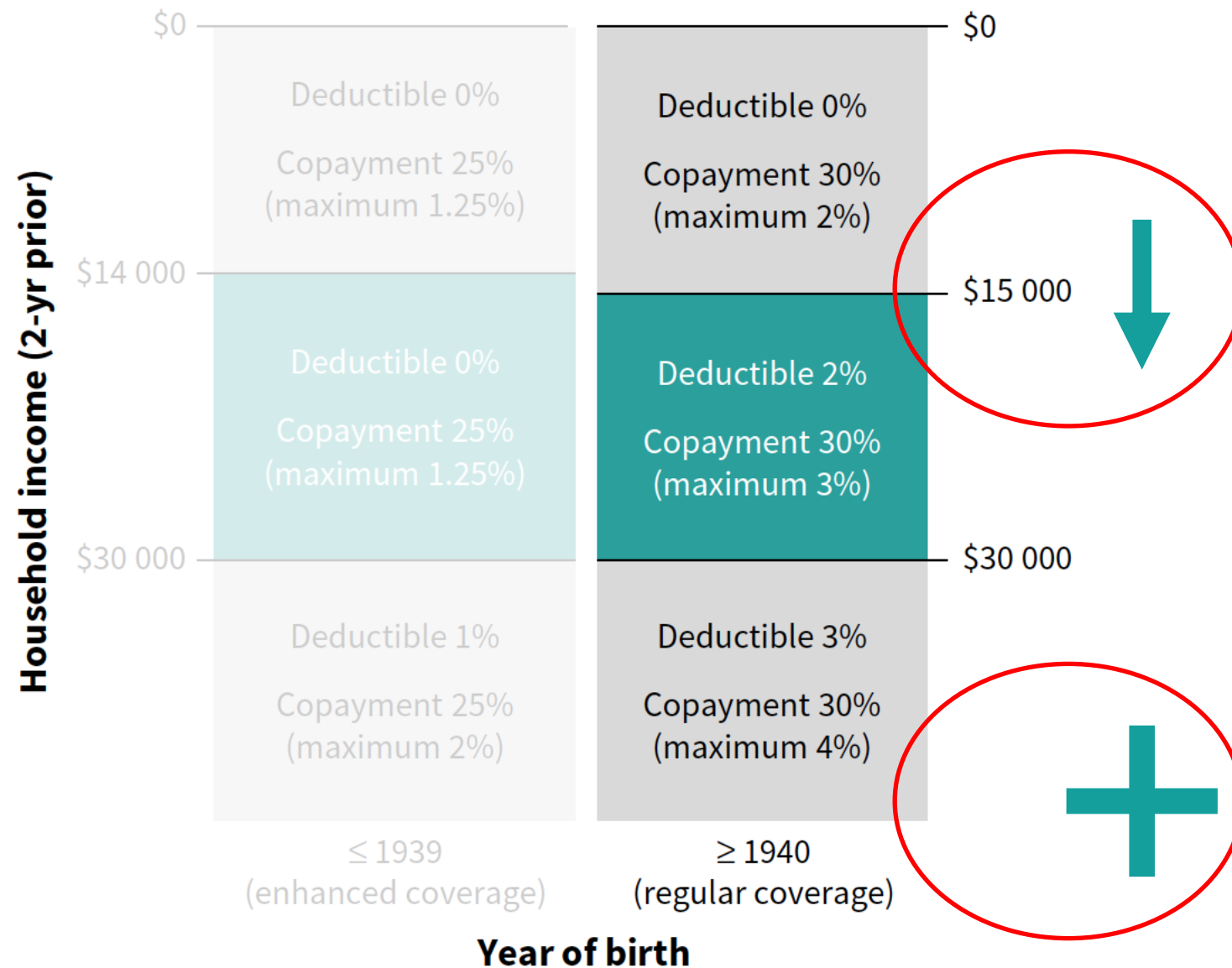
Sub-analyses

- Results persist across:
 - Age groups (< 65 vs. > 65)
 - Household size (kids vs. no kids)
 - Sex (male vs. female)
 - Drug type (generic vs. brand)
 - Drug importance (“essential” vs. “non-essential”)
- Results differ across:
 - Pharmacare benefit status (benefit vs. non-benefit)



Interpretation

- Deductibles
 - Reduced public spending
 - Reduced overall drug use, but only at lower income
- Limitations
 - Limited to local average treatment effect
 - No information on private drug coverage





Thank you!

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