Box 6C-2 What is the relationship between voluntary savings and changes to the SG?

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The purpose of this study is to examine how the compulsory employer superannuation system interacts with voluntary savings. The study focuses in particular on the extent to which the existence of compulsory superannuation — and increases in the compulsory superannuation rate — might affect voluntary savings.

Our study, like others before it, finds evidence of substitution between compulsory and private household saving in Australia; in other words, increases in compulsory saving are associated with decreases in private household saving. However, the substitution effect is significantly less than one — hence, for every dollar increase in compulsory superannuation, the associated decrease in private saving is less than one dollar. This suggests that the compulsory superannuation system in Australia generates a net overall saving increase. By contrast, international evidence on whether savings in pension accounts create positive net saving is mixed.

In this report, we examine the impacts of the SG on private household saving(s) using three different measures of SG for comparative analysis:

- An SG dummy variable, taking the value of one if any member of the household received a compulsory superannuation contribution from employers.
- The SG policy rate in percentage terms.
- The compulsory employer contribution in dollar terms.

We use two measures of saving(s). The first is a flow concept, where *saving* is defined as the difference between household disposable income and final household consumption (including rental payments and mortgage repayments). The second measure uses the household's wealth as a proxy for accumulated savings, or the stock of savings. Both are measured in terms of dollars.

Data for the study was sourced from the HILDA Survey, Restricted Release 18, which collects information about households' disposable income and expenditure annually, and household wealth-related data at four-year intervals. Due to data availability of expenditure, our analysis period is from 2005 to 2018.

Our models control for households' various socio-demographic-economic characteristics, and consider the possible non-linearity between household saving and household income, size and age, as reflected in prior studies. The Government's 2007 'Simpler Super' reform is included in our model as a dummy variable.

We find that **the voluntary private saving of households receiving SG are not significantly lower than the voluntary private saving of households without SG.** However, increasing the SG rate reduces voluntary private household saving. The findings are consistent with behavioural models, which suggest that when the SG rate increases, people have less incentive to save by themselves because they know employers are saving more on their behalf. We also find that changing the rate of SG has no significant effect on the saving behaviour of households that receive additional employer superannuation contributions over the prescribed SG rate as non-cash benefits. The signs of all other control variables are in line with the conventional saving models.

We find that **increasing the SG rate from 9 per cent to 9.25 per cent increases household wealth by 17.5 per cent, and from 9 per cent to 9.5 per cent increases net household wealth by 53.7 per cent during 2006-18.** These effects are larger for households where at least one member is receiving SG.

We find that **each dollar of compulsory employer contributions reduces private household saving by 43 cents.** This compares with the findings of Connolly (2007) of a 38-cent reduction. The difference may be explained by our contrasting methodologies and timeframes. Depending on the period under consideration, our estimated *'crowding-out'* effect gets smaller when measured within shorter and later time windows. The substitution rate is less than one, which means SG overall increases wealth for households.

A large part of the decline in net household saving is accounted for by increased mortgage repayments — which for most people means increased savings in housing assets. **Mortgage repayments increase by 24 cents in response to each additional dollar of compulsory employer contribution (Figure 6C-1).**

We find that **a $1 rise in compulsory employer contributions increases net household wealth by $2.21, over a four-year period**. Household wealth includes superannuation balance, property (net of debt), and non-superannuation and non-property wealth.

Most of the increase in wealth associated with an increase in compulsory employer contributions occurs in superannuation and property (housing). We find that **a $1 increase in compulsory employer contributions boosts the superannuation account balance by $1.51, and housing wealth by $1.21** (due to higher mortgage repayments). In contrast, there was a decline of approximately $0.51 in non-superannuation and non-housing wealth.

Our analysis of the impact of compulsory employer contributions on households' investment in property assets supports the existence of a 'signalling effect' — which suggests compulsory superannuation provides a degree of confidence for households to increase debt to invest in property, resulting in lower net household saving. This occurs with the knowledge that they can access superannuation savings to extinguish debt in the future and that the residential home is not counted in the Age Pension assets test under current rules.

Our report also shows how the saving behaviour of households varies across different demographic and economic groups. We find that home owners save 26 cents less for each dollar increase in compulsory employer contributions compared to non-home owners.

We employed the Heckman sample selection model to test our findings. The results were consistent, although with slightly different magnitudes. Overall, the results suggest that households with saving(s) behave differently to those without saving(s) in response to changes in eligibility for compulsory employer contributions or changes in SG rates.

In conclusion, the study has two main findings. First, we demonstrate that compulsory superannuation, while associated with a significant reduction in private household saving, leads to net additional household wealth. Second, we find that compulsory superannuation encourages and leads to the reallocation of household wealth into property from other forms of investment.

Figure 6C-1 The relationships between compulsory employer contributions, household saving and wealth