# Taxation of household savings

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BETTER POLICIES FOR BETTER LIVES

# Taxation of Household Savings

OECD Tax Policy Study released in April on ***The Taxation of Household Savings***. The report:

- Examines how countries tax savings, covering a wide range of asset types in 40 countries.
- Calculates marginal effective tax rates (METRs) across asset types in 40 countries.
- Assesses the distribution of asset holdings in 18 countries.
- Examines the implications of AEOI for savings tax policy.

# Marginal Effective Tax Rates (METRs)

## METRs combine various factors into a single tax burden indicator

- Focus on a marginal savings decision.
- Calculate NPV of taxes as percentage of NPV of gross returns, over an asset holding period.
- Take account of the impact of multiple taxes, deductions and variations in tax bases.
- Take account of the impact of inflation.

## We need to make some assumptions…

- Rate of return of assets. To provide comparability we use the same rate for all assets (=3%).
- Holding period (we assume 20 years for housing and pensions; 5 years for all other assets).
- Types of return generated (e.g. mix of dividends and capital gains).
- We specify three income/wealth levels representing “low”, “average” and “high” income/wealth.

## We calculate METRs for a wide ranges of assets and savings vehicles

# METR methodology

- The methodology follows closely that of the OECD's 1994 *Taxation and Household Savings* study, which itself draws on the methods used by King and Fullerton (1984).
- We focus on a **marginal** investment. The scenario considered is one where a saver is contemplating investing an additional currency unit in one of a range of potential savings vehicles.
  - This is marginal both in terms of being an incremental purchase of an asset; and generating a net return just sufficient to make the investment worthwhile.
- We assume a fixed pre-tax real rate of return and calculate the minimum post-tax real rate of return that will, for that asset, at the margin, make the investment worthwhile (as compared to the next best savings opportunity).
- The post tax return is determined by explicitly modelling the stream of returns and costs (taxes) associated with the asset over time (see next slide…)

# METR methodology

- The stream of returns, $R_t$, and taxes, $T_t$, can be modelled as:

$$V = -1 + \int_{n=0}^{\infty} \lambda e^{-\lambda n} \left[ \int_{t=0}^{n} (R_t - T_t)\, e^{-\rho_H t} dt \right] dn$$

- where the returns and costs are discounted at a rate $\rho_H$, with the stream in each period weighted by the probability that the asset is sold in that period, $\lambda e^{-\lambda n}$.

- Setting V=0 and solving for $\rho_H$ will yield an expression for the investor's after-tax nominal rate of return on the particular savings vehicle. The after-tax real rate of return of investing in a particular savings vehicle, $s$, given an inflation rate of $\pi$, is then:

$$s = \rho_H - \pi$$

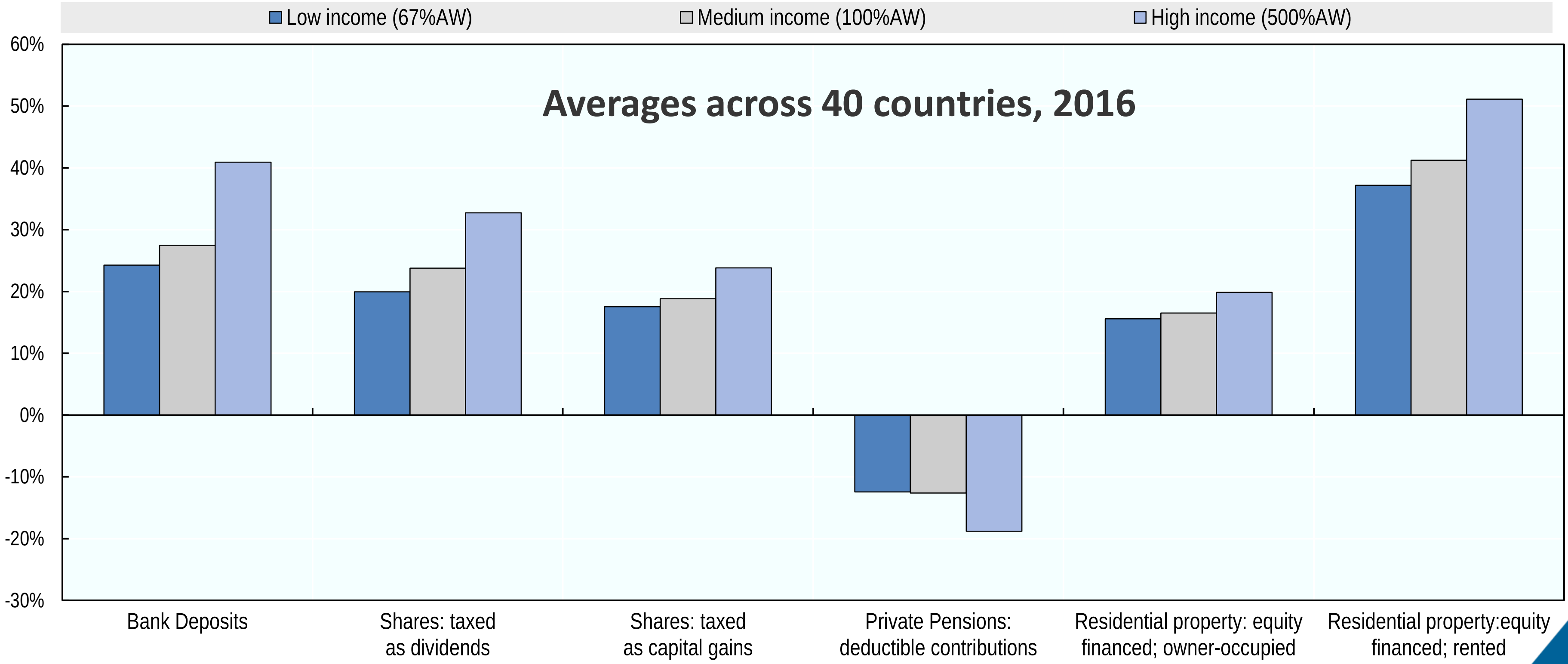
- The investment is assumed to earn a fixed real return, $r$. Consequently, the METR, $t_e$, is:

$$t_e = \frac{r - s}{r}$$

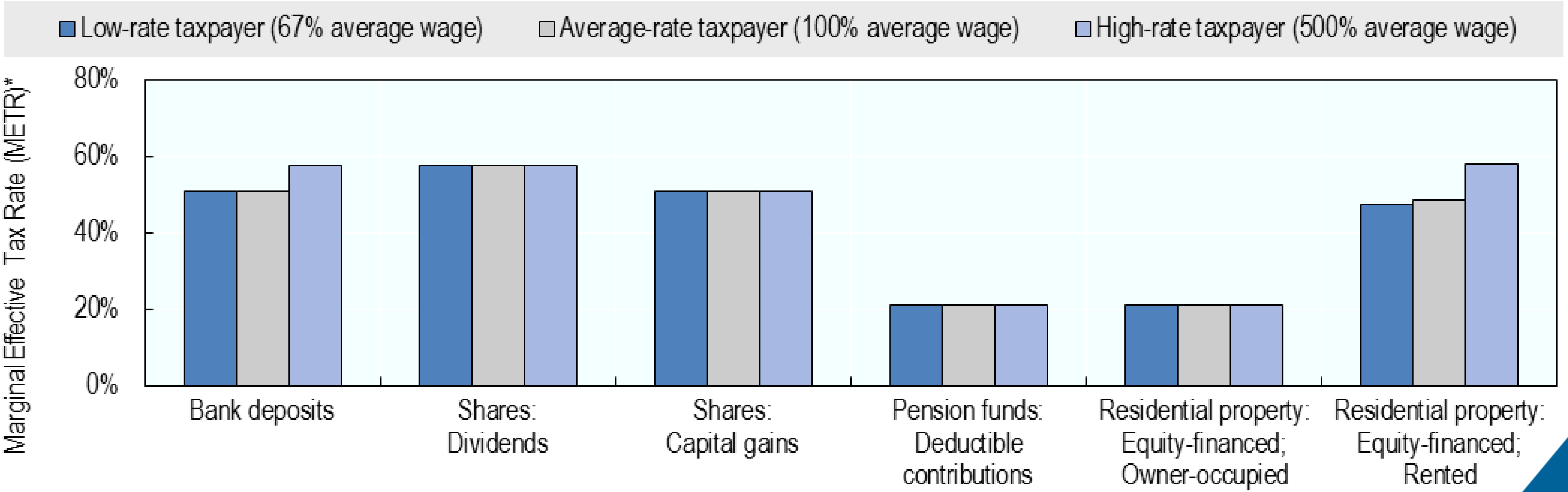
# Assets/savings vehicles modelled

- METRs are modelled for the following assets /savings vehicles:
  - Bank deposits
  - Corporate bonds
  - Government bonds
  - Equities (purchase of corporate shares)
  - Investment funds
  - Private pensions
  - Deposits in individual tax-favoured savings accounts
  - Equity-financed owner-occupied and rented residential property
  - Debt-financed owner-occupied and rented residential property

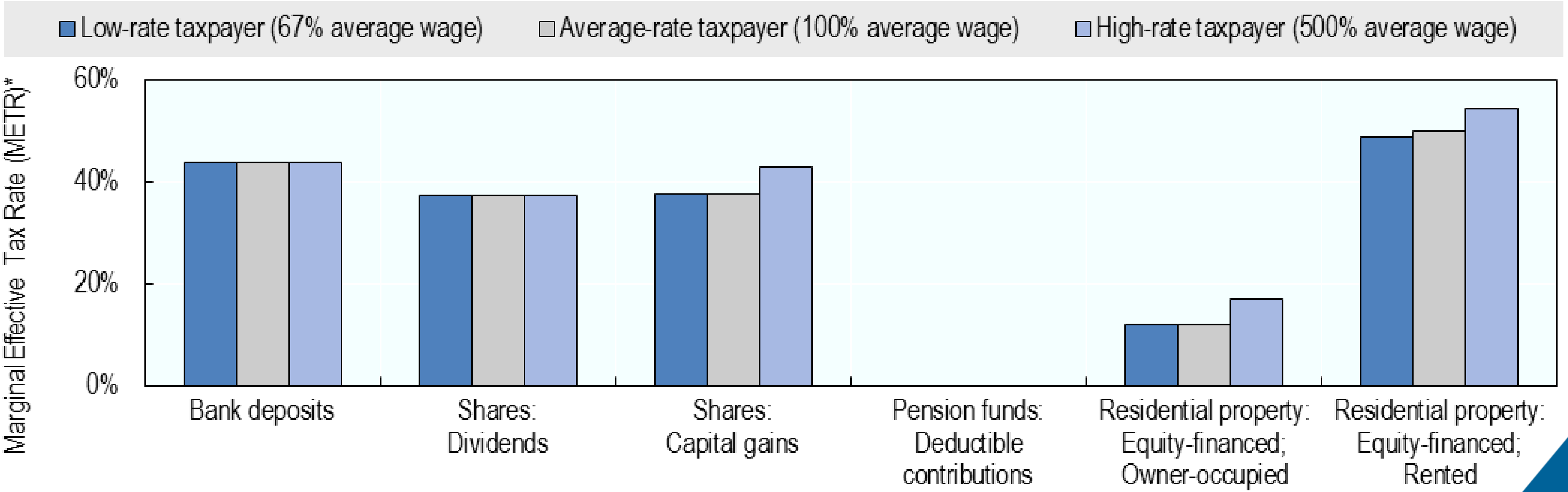
# Marginal Effective Tax Rates by asset type



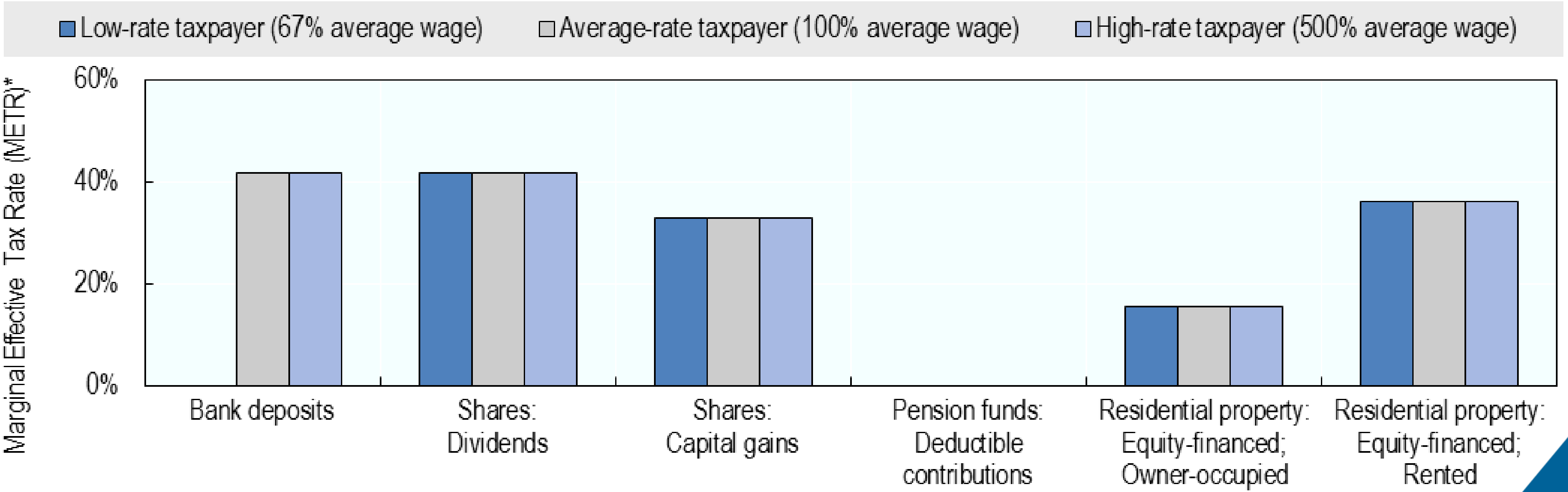
# Marginal Effective Tax Rates: Denmark



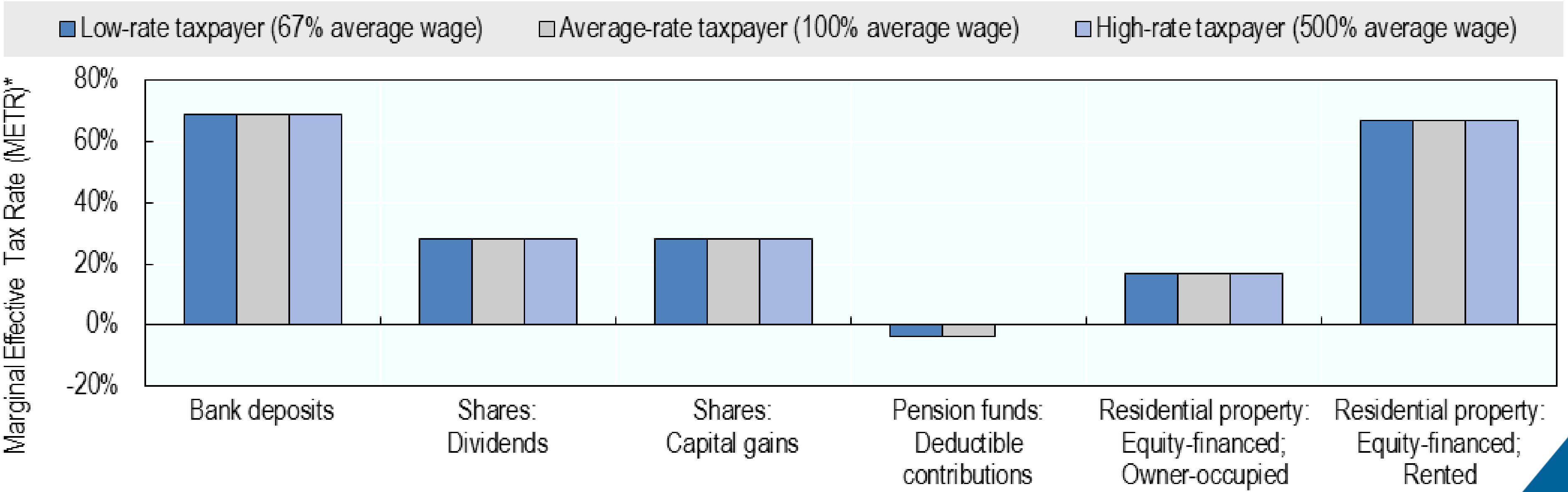
# Marginal Effective Tax Rates: Finland



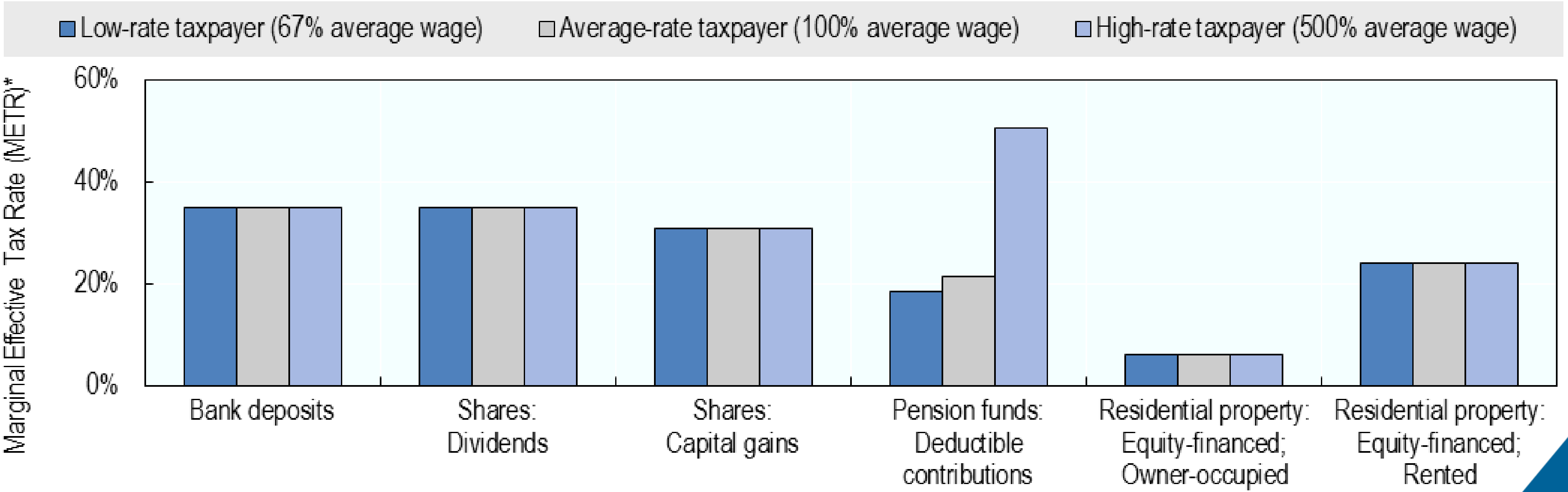
# Marginal Effective Tax Rates: Iceland



# Marginal Effective Tax Rates: Norway

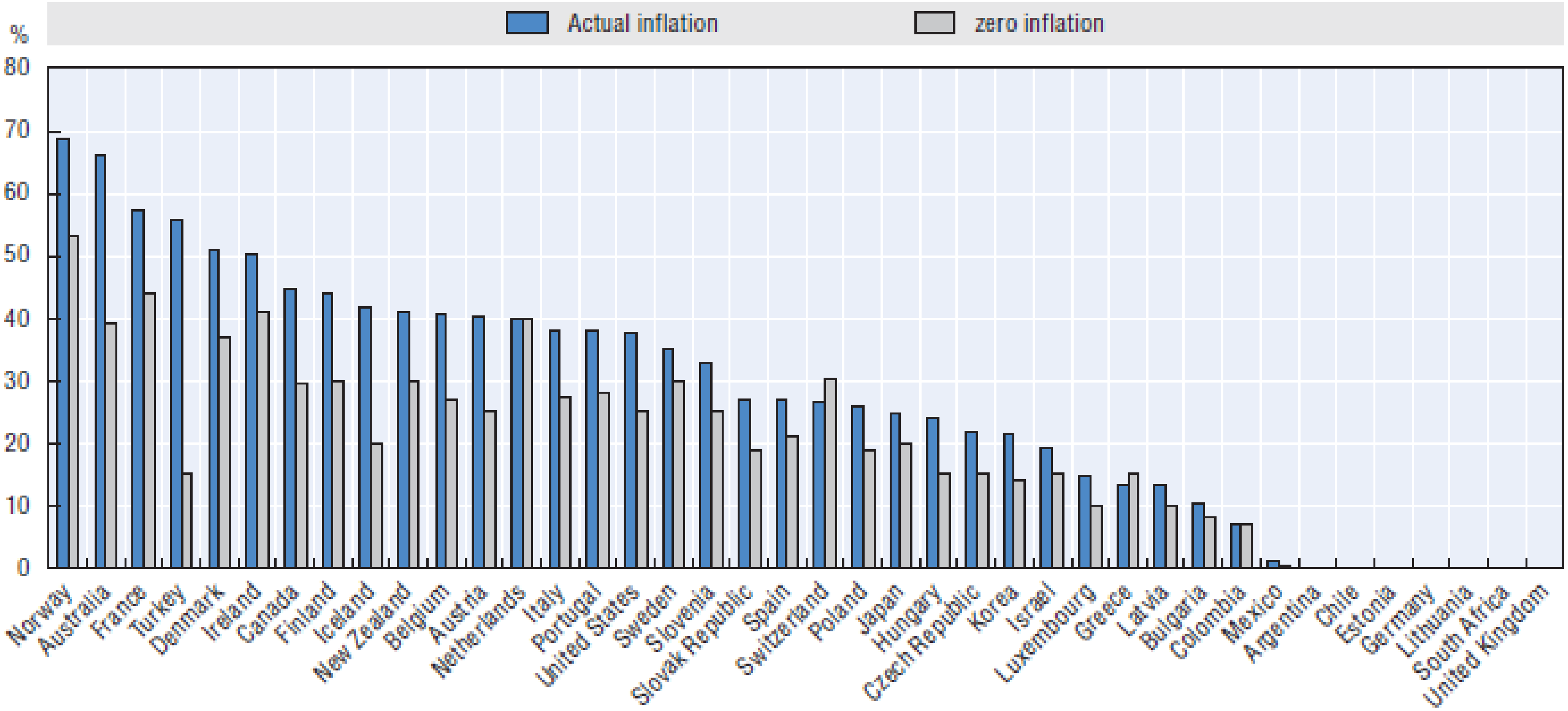


# Marginal Effective Tax Rates: Sweden



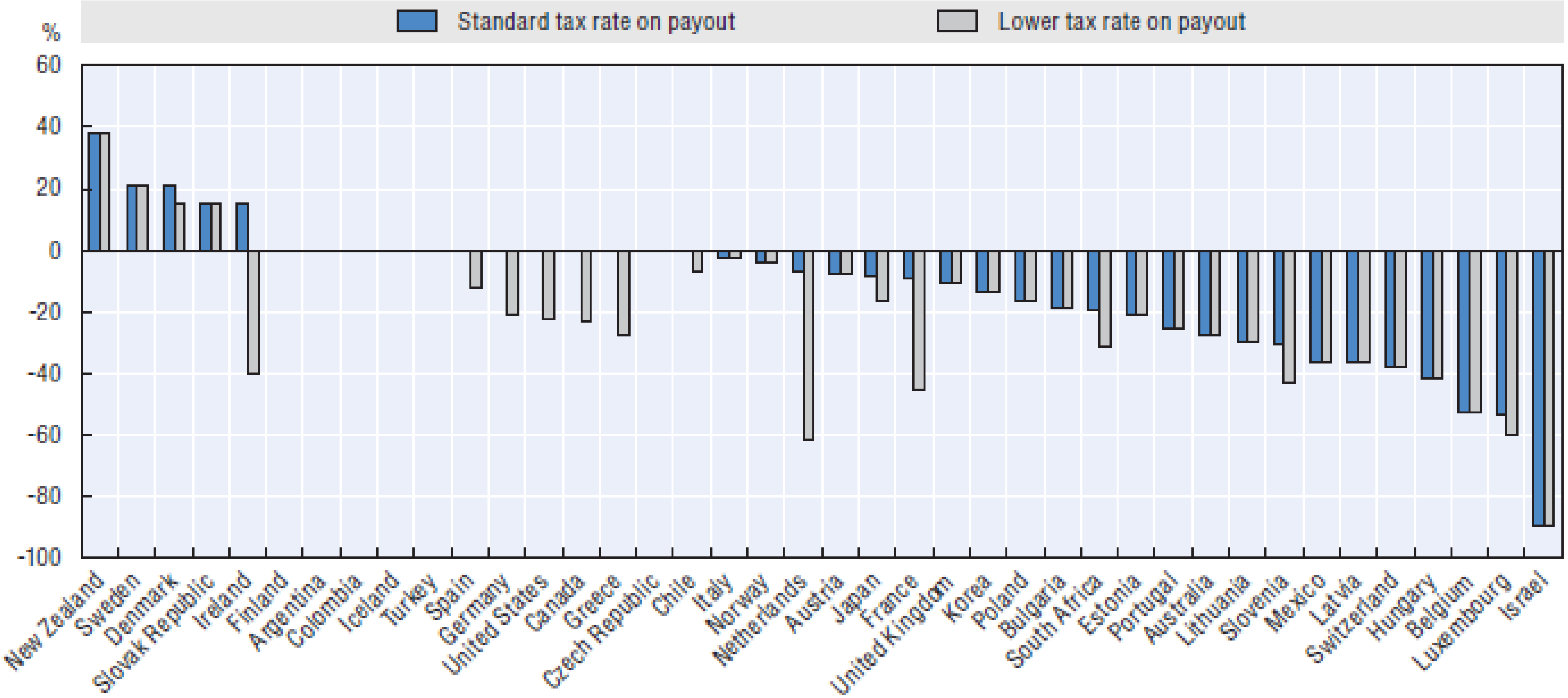
# Inflation is a tax!

## Marginal effective tax rates on bank interest, 2016



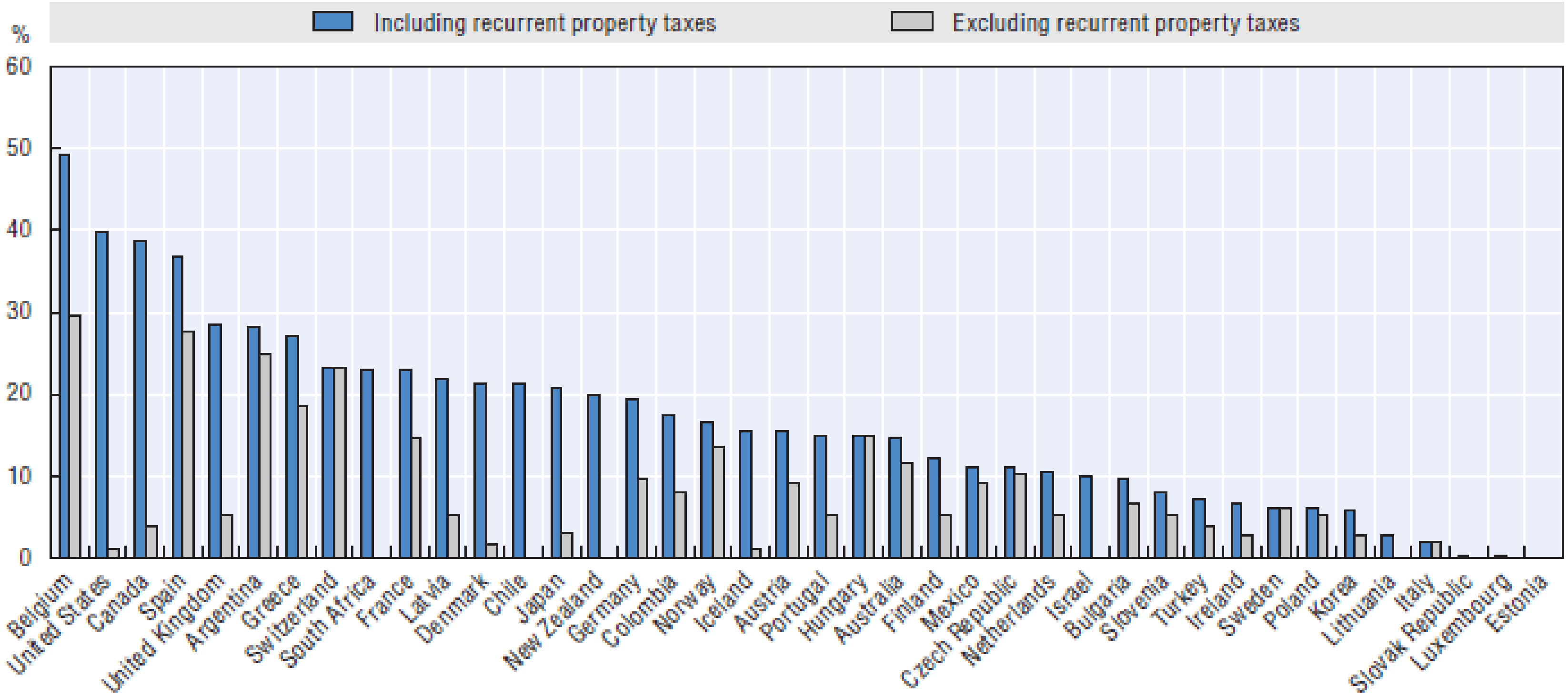
# Private pensions are highly tax favoured

## Marginal effective tax rates on private pensions, 2016 (deductible contributions)



# Property taxes change the picture…

**Marginal effective tax rates on owner-occupied residential property (equity financed), 2016**

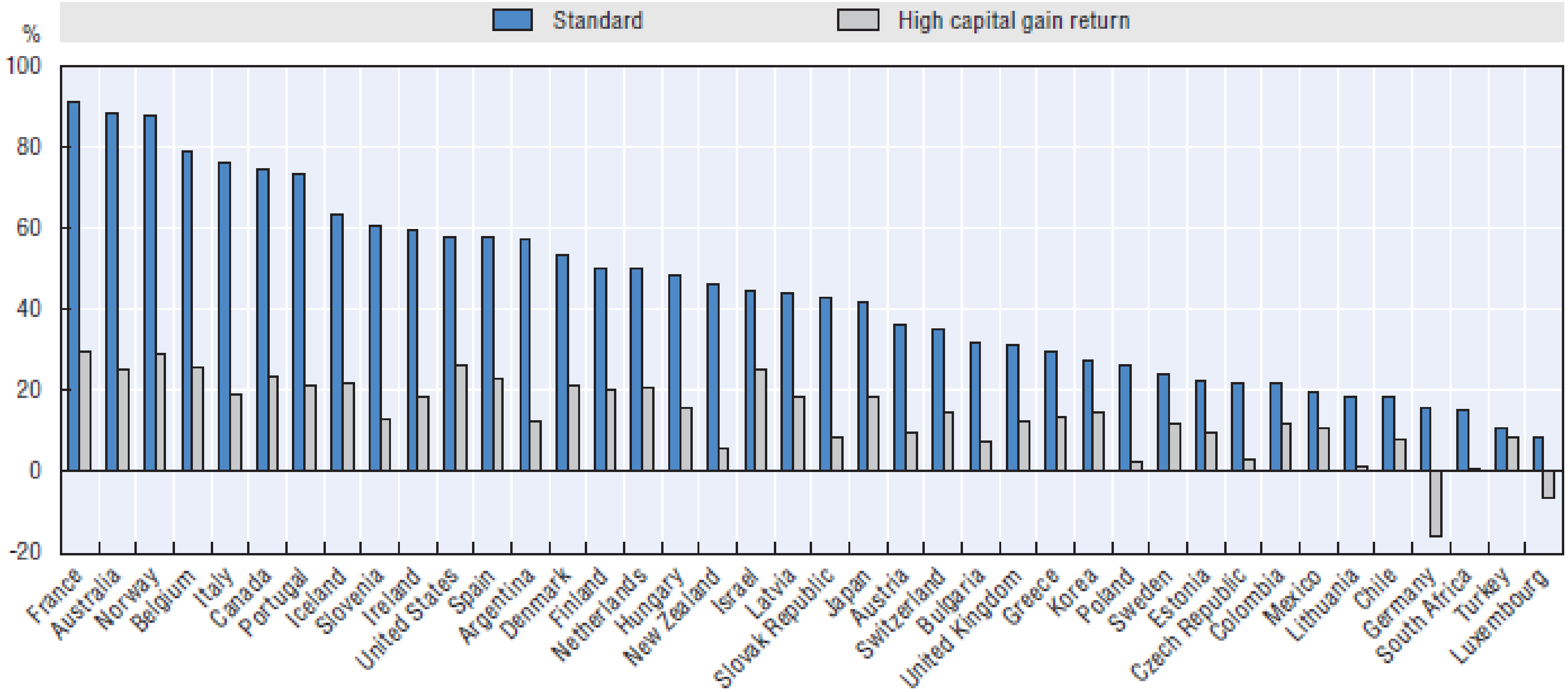


# ...but less so for rented property

## Marginal effective tax rates on rented residential property (equity financed), 2016

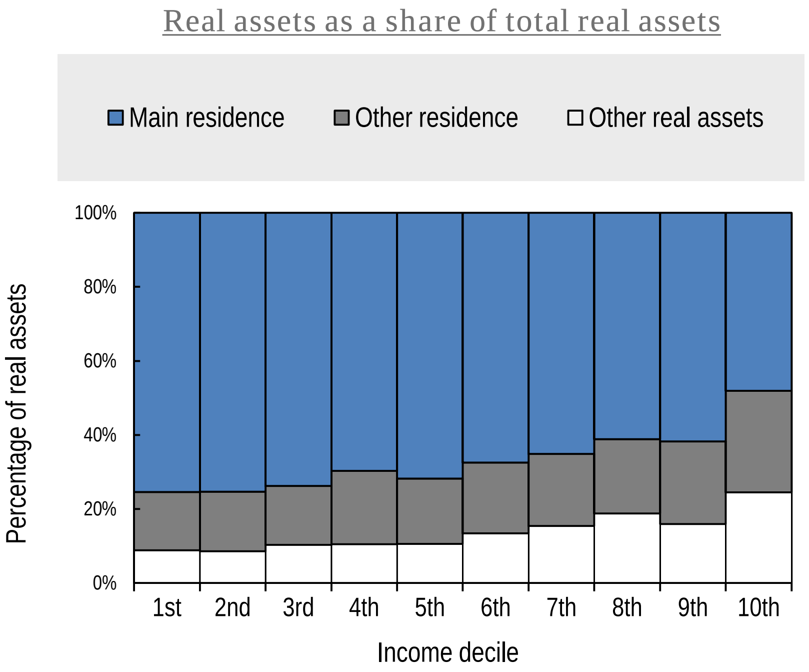
# Assumptions on size and type of return can strongly impact METRs

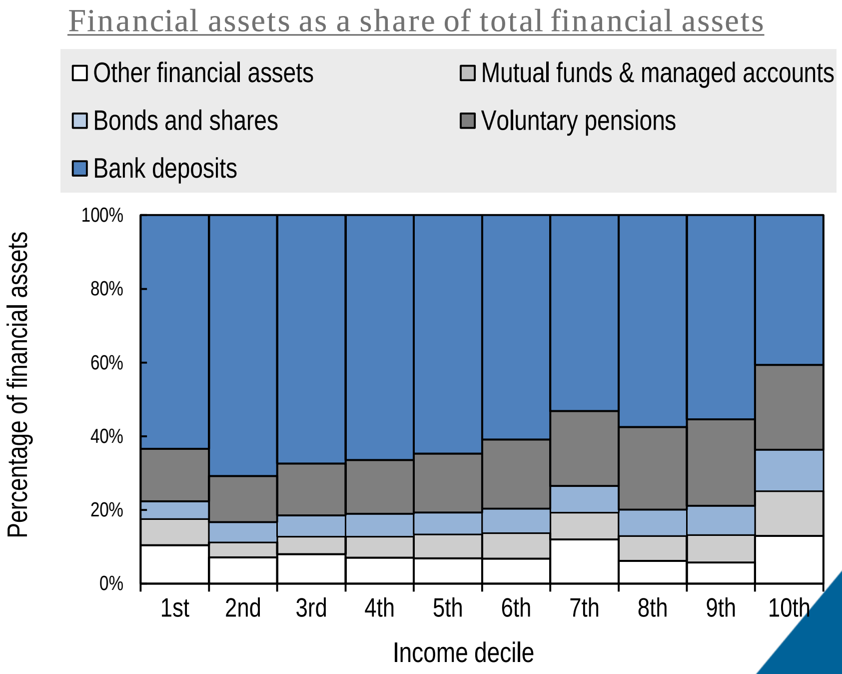
**Marginal effective tax rates on rented residential property (debt-financed), 2016**



# The asset-holding mix of households

## Averages across 18 European countries from the 2016 Household Finance and Consumption Survey

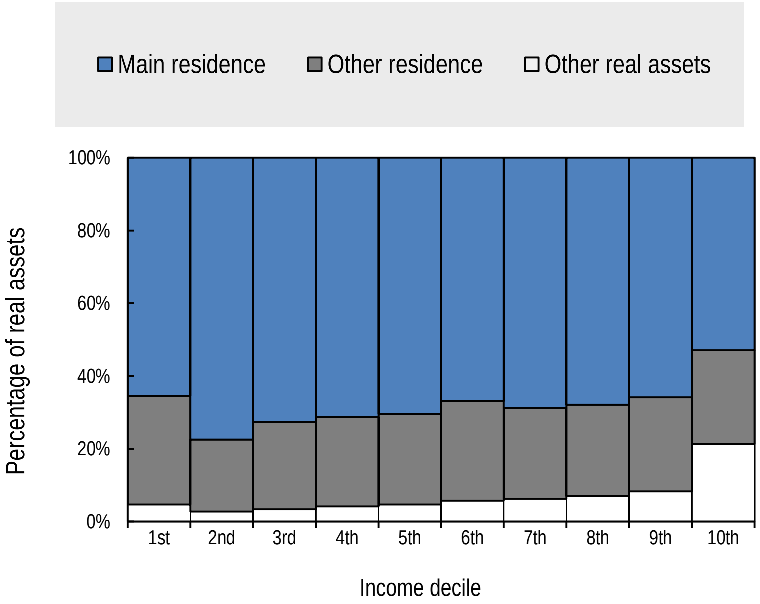


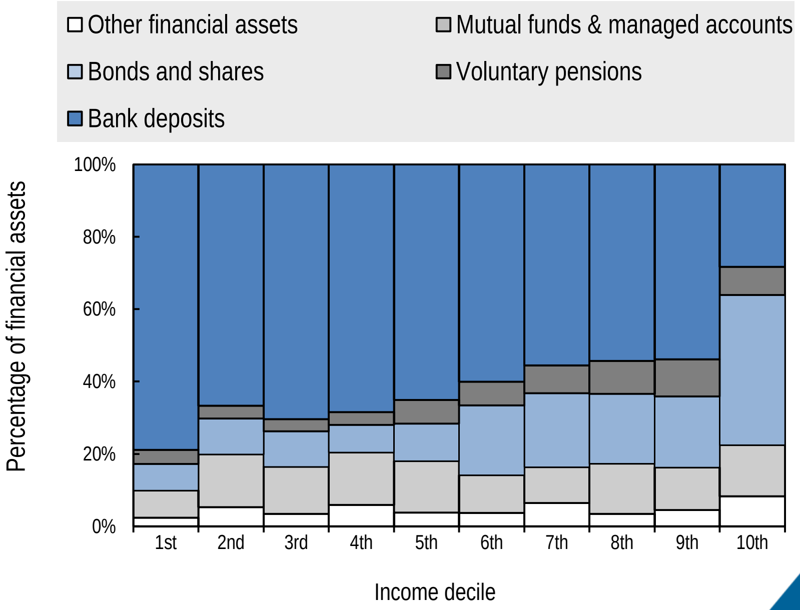
# The asset-holding mix of households

## Finland
## 2016 Household Finance and Consumption Survey

Real assets as a share of total real assets

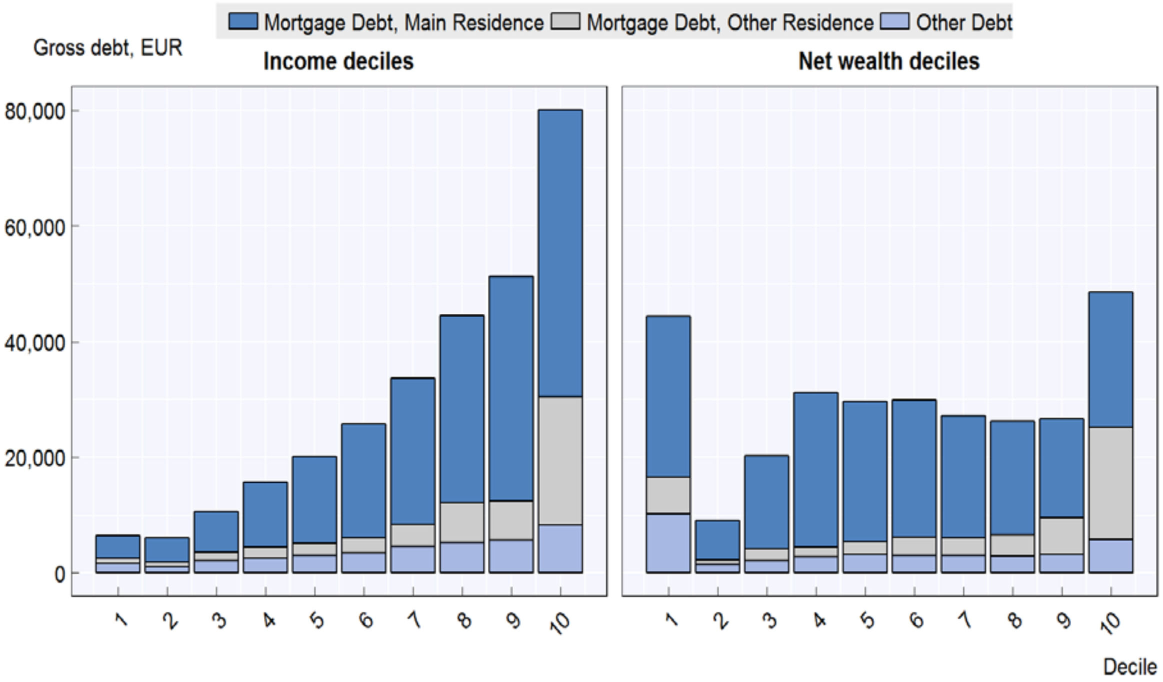



Financial assets as a share of total financial assets



# High income households hold more mortgage debt

**Averages across 18 European countries from the 2016 Household Finance and Consumption Survey**



# Key findings from the report

METRs vary widely across asset types in most countries, thereby distorting the allocation of savings

The variation in METRs often favours the savings of those that are financially better off

Automatic exchange of financial account information between tax administrations is likely to make offshore tax evasion harder

# Policy implications

## FOUR MAIN THEMES

- Opportunities for countries to increase neutrality
- Opportunities for some countries to increase progressivity
- Case to maintain concessionary treatment of retirement savings
- Opportunities to improve tax design, particularly regarding pensions and residential property

# More on residential property

- Non-taxation of imputed rental income and concessionary treatment of capital gains creates a significant bias towards owner-occupied property.
  - This tends to favour the middle of the income and wealth distribution in particular (as the very poorest are more likely to rent)
  - But high-income and wealthier taxpayers also benefit significantly in aggregate terms.

- Where present, mortgage interest deductibility exacerbates the advantage.
  - 19 of 40 countries provide tax relief for mortgage interest on owner-occupied residential property.
  - Favours the better off: higher income taxpayers have more mortgage debt; and in most cases relief is in the form of a deduction.
  - Concession may be capitalised into house prices making removal difficult.

- The combination of concessionary tax treatment of capital gains and mortgage interest deductibility can create the opportunity for significant tax planning for debt-financed property (owner-occupied and rented).

# Potential reform options

- Tax imputed rental income (but strong political economy difficulty)
- Recurrent property taxes can play a role in substituting for the taxation of imputed rental income (though still a challenge from a political economy perspective).
  - Needs to be applied above and beyond the level of local public service provision.
  - Implies different rates for owner-occupied and rental property.
  - Growth friendly.

- Tax capital gains on owner-occupied property (but political economy difficulty; also lock-in concerns).
- One option would be to apply a generous allowance and only tax gains above this amount.
- (Fully) tax capital gains on rental property (easier to overcome pol. econ. constraints)

- Remove mortgage interest deductibility where the corresponding income is not taxed; or at least provide a tax credit rather than deduction, and/or a cap.

- Remove transaction taxes (at least on owner-occupied residential property)

Thank you

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