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# Economic commentaries

## Are household debt-to-income ratios too high?

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## Are household debt-to-income ratios too high?

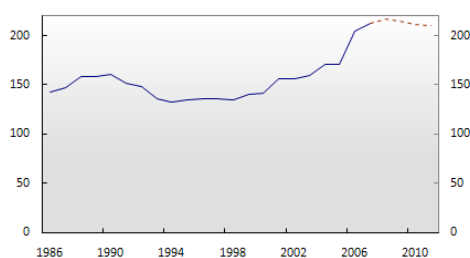
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Household debt growth has been high over the past 8-9 years and it has been far higher than growth in disposable income<sup>1</sup>. As a result, the household interest burden has risen sharply and is now at a historically high level (see Chart 1). Outstanding debt for private households<sup>2</sup>, wage earners and benefit recipients is now about twice as high as their disposable income, i.e. a debt burden of around 200 per cent. Due to the recent reduction in bank lending rates, the household interest burden<sup>3</sup>, i.e. interest expenses as a share of income, is nevertheless fairly moderate. However, lending rates will normalise again over time. In this *Commentary*, we examine the relationship between the debt burden, the interest burden and lending rates.

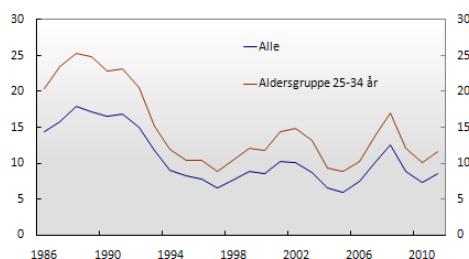
Household interest expenses depend on the interest rate level and the size of the debt. There was a period of very high lending rates during the banking crisis and in 1988 an average of 18 per cent of household income was used to pay interest (see Chart 2). The lending rate that year was around 16½ per cent and households with the main wage earner in the 25-34 age group spent one quarter of their income on interest payments. There are many first-home buyers in this age group. In the period 1986-2006, the interest burden for households averaged 11 per cent. The interest burden was fairly high in 2008 when the interest rate had reached a more normal level after a long period of relatively low interest rates. If household debt and income develop broadly in line with the projections in *Monetary Policy Report 1/09*, the household interest burden will be fairly moderate in the coming years.

Figur 1 Gjeldsbelastning<sup>1)</sup> i privathusholdninger . Årstall<sup>2)</sup>. Referansebanen



1) Gjeld i prosent av disponibel inntekt  
2) Fremskrivinger for 2007 - 2011  
Kilde: Statistisk sentralbyrå og Norges Bank

Figur 2 Rentebelastning i privathusholdninger . Årstall<sup>1)</sup>. Referansebanen



1) Fremskrivinger for 2007 - 2011  
Kilde: Norges Bank

The average interest burden in the period 1986-2006 was 11 per cent, while the interest burden in 1988 was 18 per cent. A normal interest burden is estimated at 11 per cent and a high interest

<sup>1</sup> Disposable income is income after tax less interest expenses.

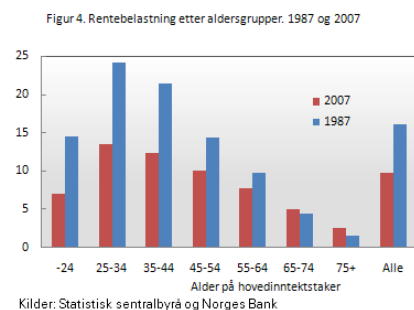
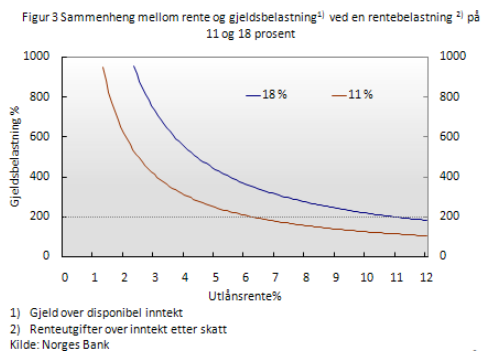
<sup>2</sup> The data is from Income statistics for households, Statistics Norway. Debt, interest expenses and income are based on information given in the income tax self-assessment form.

<sup>3</sup> The interest burden is household members' total interest expenses before tax as a percentage of total income after tax. Note that the rules for tax deduction for debt interest were changed in 1992.

burden at 18 per cent. The graphs in Chart 3 show combinations of level of household debt burden and interest rate level that result in an interest burden of 11 and 18 per cent respectively.

With today's debt burden of around 200 per cent, a lending rate of 6½ per cent will result in an interest burden close to the average for the period 1986-2006. A lending rate of 6½ per cent is in line with the expected long-term interest rate level. The lending rate would have to rise to 12 per cent for the interest burden to reach 18 per cent. Compared with the interest burden levels we have seen over the past twenty years and expected future lending rates, the current debt burden of around 200 per cent does not seem particularly high.

There are, however, substantial differences in behaviour across households and household groups. The interest burden is highest in the 25-44 age group (see Chart 4). Compared with previous years, the youngest and oldest age groups now account for a larger share of household debt. Income is on average lower in these groups than in the other groups.



The interest burden is only one of a number of factors affecting the optimal household debt burden. Changes in the value of the underlying debt object, primarily housing, will also play a role. If expectations with regard to house prices fall, households will probably seek to reduce mortgage debt and thereby reduce their debt burden.