the Money Advice Service

Savings evidence review

Table of Contents

1 Introduction

The Financial Capability Strategy for the UK seeks to improve the financial capability of all people in the UK to enable them to manage their money well and cope with significant life events and periods of financial difficulty (Money Advice Service, 2015a).

In relation to saving, the strategy aims to improve the financial resilience of working-age adults by focusing on the capability to build a savings habit and positive attitudes towards savings, as well as the skills and knowledge to manage life events.

Financial capability interventions for this age-group need to address diverse needs and experiences including the financial pressures of making ends meet, balancing costs and commitments day to day with longer-term goals like buying a home, starting a family or planning ahead for later life.

The Strategy also considers the role of the workplace and employers in supporting improved financial capability, and the scalability and sustainability of different interventions.

This review is intended to help the Money Advice Service implement the Financial Capability Strategy by examining the existing savings evidence base in terms of what works in encouraging saving among working-age adults.

1.1 Context

Encouraging and increasing saving among working-age households is challenging. Historically, the UK has had a low net saving rate[1] compared to other countries: in 2012 the UK net saving rate was 2.4%, compared to an average in Europe of 7.0% (CBI, 2014). Since the recession interest rates have fallen to a historic low[2] meaning that there is much less financial incentive for people to put money into cash savings. Interest rates have not kept up with inflation and tax incentives have little relevance for those who do not pay tax or only have small sums to save (Financial Inclusion Commission, 2015).

The risk caused by this lack of savings is that many people are vulnerable to income shocks, such as losing a job, or unexpected expenditure peaks. They may also find it challenging to make optimal decisions relating to budgeting and saving. For example, the Money Advice Service Financial Capability Survey shows that four in ten adults have less than £500 savings to cover an unexpected bill and almost three-quarters of working-age people do not have a savings buffer equal to or exceeding three months' pre tax income (Money Advice Service, 2015a).

In recognition that it is important to have a savings buffer, the Government introduced Help to Save, a savings scheme providing savings bonuses to people on low incomes in receipt of working tax credits or Universal Credit.

To encourage longer-term savings, the Government has also introduced the Lifetime ISA, aimed at people aged under 40 to help them save for either buying a home or for retirement.

A discussion of how these schemes serve to encourage savings will be presented later.

1.2 Review aims and scope

This review articulates the key barriers to saving in the UK and examines the evidence available (both internationally and in the UK) on savings interventions. The aim of the review is to understand the current evidence on how to encourage people to save (or to save regularly). It also identifies gaps in the evidence, including interventions that have yet to be evaluated. This review will provide a reference point to help organisations involved in the implementation of the Financial Capability Strategy; specifically, where they could focus new research and analysis.

[1] Measured as net household income minus consumption as a percentage of household income.

[2] The UK's Bank Rate of interest remained at 0.5% pa from 2009 to August 2016.

The review focuses on:

- people of working age – although much of the evidence reviewed covered adults of all ages;
- people on low to middle incomes;
- adult cash savings (rather than investments or saving for children); and
- community-based interventions.

The evidence included in the review focuses specifically on interventions that promote savings behaviours; it does not cover in any detail wider issues around financial inclusion and borrowing. The evidence we have reviewed is of four main types:

- official data / national statistics on savings behaviour;
- think pieces and policy briefs that discuss the problem of low saving and make suggestions on how to address the issue;
- research studies – both qualitative and quantitative – on saving behaviour, attitudes and motivations; and
- evaluation evidence on saving interventions. It should be noted that very few evaluations show a causal link between an intervention and a change in a measured outcome using control or comparison groups.[3]

The review draws heavily on the evaluations of two interventions that meet high standards of evidence: the Saving Gateway, and Individual Development Accounts (IDAs). Both were large-scale interventions that were independently evaluated and used comparison or control groups to explore causal links between intervention and savings outcomes. Details on the two programmes are presented in the Appendix.

1.3 About this report

Chapter 2 uses research insights and official statistics to present an overview of saving behaviour in the UK, exploring the characteristics of savers and non-savers and the barriers to saving.

Chapter 3 considers the research evidence on interventions that could encourage people to save (or save regularly).

Chapter 4 sets out interventions that could have the potential to encourage working-age people to save (or save regularly), but are either untested or have yet to be substantially evaluated.

This document is based on an initial evidence review prepared for the Money Advice Service by the team at the Personal Finance Research Centre at the University of Bristol.

[3] fincap.org.uk/standards_of_evidence

2 Saving behaviour in the UK

To understand the potential scale and focus of any intervention to encourage people to save (or to save regularly), it is necessary to have an overview of people's saving behaviour. Specifically, we consider what is the status quo for household savings.

The UK has a good evidence base in this respect, from the Family Resources Survey; the Wealth and Assets Survey; and the Financial Capability of the UK Survey. Market studies carried out by financial services regulators provide another source of evidence, including analysis of large-scale firm-level data on savings products; as do ad hoc consumer surveys (eg, those commissioned by financial services firms). It is also important to set out some of the structural barriers to saving in the UK, including disincentives to save in the cash market and complexity of products.

Drawing on this evidence base, we set out in this chapter a high-level picture of how many people save in the UK; how much people have in savings; and the challenges that people face when saving. We stop short of analysing the various savings behaviours that people exhibit, given our focus on interventions. Instead, we refer to the saving typologies as outlined in the Money Advice Service's 'Closing the Savings Gap' research (2016):

- Non-Savers
- Irregular Savers, Low Balance
- Monthly Savers, Low Balance
- Irregular Savers, High Balance
- Monthly Savers, High Balance

2.1 How many people save?

In general, money saved is defined as having money saved in a banking product or held in investments. While the data from individual surveys do vary, overall it seems that around two-thirds of households have money saved. However, only around half of households were actively saving (ie, putting money aside into a savings account) at the point they were surveyed.

Having savings is not the same as actively saving which could be described as the behaviour of putting money aside for deferred expenditure or as buffer for unexpected bills. The data below highlights the difference between households that have savings and those that actively save.

In terms of whether people have money in savings (which may not reflect current saving behaviour), data from the Family Resources Survey (an annual UK survey of around 20,000 households) found that 66% of UK households held savings, while 34% had none (DWP, 2017). Similarly, an online survey of 5,000 UK adults for Scottish Widows found that two in three had savings. At the same time, 19% were without savings and a further 15% reported that they did not know what savings they had (Scottish Widows, 2014).

Another study that analysed data from the Wealth and Assets Survey defined active saving as the amount a household saves or invests over time, measured by the change in their level of financial wealth. From 2006–08 and 2010–12, 55% of households were estimated to have actively saved as per this definition (Crawford et al, 2015).

Money Advice Service research (2016) shows that nearly three-quarters of households receive an unexpected bill every year, with a typical cost of £200–400. However, 26% of working-age adults have no savings to fall back on and a further 29% have less than £1,000 saved.

In terms of interventions to promote saving, the evidence above indicates that there is a potentially large target audience: the same Money Advice Service research shows that 16.8m adults – 40% of working-age people across the UK – lack a savings buffer, with less than £100 in savings available to them at any time.

2.2 How much do people have in savings?

Statistics from the Family Resources Survey shows that in 2015/16 46% of households had either no savings (34%) or savings of less than £1,500 (12%). A further one in five (23%) had savings of between £1,500 and £9,999 and a third of households (30%) had savings of £10,000 or more (Department for Work and Pensions, 2017).

Looked at another way, data from the Money Advice Service's Financial Capability Survey shows that four in ten UK adults have less than £500 in savings to cover an unexpected bill, and almost three-quarters of working-age people do not have a savings buffer equal to or exceeding three months' income (Money Advice Service, 2015a).

2.3 Which groups of people save?

There is no one specific group of people who save more in either income or frequency than others. The Money Advice Service's analysis (2016) shows that older people, those with families, and those with higher incomes are more likely to save. There are however also people within these demographics who do not save. Similarly, there are younger people, with no children and on lower incomes, who do save. Here, we look at situational factors that increases the likelihood that certain groups of people will save.

2.3.1 Income, employment and saving

Employment has a large impact on household savings. The Family Resources Survey shows that 79% households where one or more working-age adults is unemployed has no savings (Department for Work and Pensions, 2017).

Unsurprisingly, saving frequency increases up the income scale with higher income households saving more regularly than lower income households. Household income has been found to be the biggest predictor of saving frequency: households with the lowest incomes (below £13,500/year) have the highest proportion of people who rarely or never save; whereas households with the highest incomes (above £35,000/year) contain the highest proportion of people who save every month, with over half doing so (Money Advice Service, 2015b).

Although published over 10 years ago, quantitative analysis of data from a longitudinal survey (the British Household Panel Survey) which interviewed the same individuals every year across several years, provides some of the most comprehensive analysis of the effects of life events on saving (McKay and Kempson, 2003). It seems unlikely that the overall picture presented by the analysis will have changed significantly over time.

The analysis found that the following changes all had negative consequences for saving across the income distribution:

- job loss;
- drops in income or earnings; and
- movements from employment into self-employment.

While a move into paid employment greatly increased the odds of someone starting to save, the analysis found that the negative effect of a fall in income on the number of people saving (from 48% before the fall, to 39% afterwards) was more powerful than the positive effect of an increase in earnings (from 46 to 51% of people).

The analysis also looked at other life events. The effect of getting divorced (or separating) was to reduce overall saving by five percentage points, from 34% to 29%. The average amounts saved also fell. Those getting married slightly reduced their saving, though this was from a relatively high base. When people started families, the proportion saving dropped from 45% to 39%. When families added to their family size, the proportion of savers and amount of saving were already below average, and these fell further (McKay and Kempson, 2003).

2.3.2 Future focus

Evidence from both UK and US consumer surveys finds that respondents with longer financial planning horizons save more regularly and save higher amounts (Fisher and Anong, 2012; Fisher and Montalto, 2010; Money Advice Service, 2015b). They are also more likely to save for a 'rainy day' (such as unexpected or emergency events, or for later life).

Analysis of the US Survey of Consumer Finances (2007), a nationally representative survey of US families, found that among non-retired respondents, those with a saving horizon of a few years or more were more likely to save regularly, and saved higher amounts, than those with a saving horizon of less than a year (Fisher and Montalto, 2010).

Based on an online survey conducted at a large US university, Rodermund (2012) describes the 'live for today' attitude as a "present-fatalistic time perspective". The survey findings suggest that individuals with a present-fatalistic time perspective are less likely to save money because they live in the present, feel that lessons of the past are irrelevant, and feel powerless to change their future, and consequently feel that money and saving for the future does not matter.

For any intervention to encourage people to save, these findings indicate that people on lower incomes are a potential target audience, but at the same time they are likely to have less spare money and more competing demands on any money that is spare. That said, there is clear evidence that some people on lower incomes do already save. The Money Advice Service's segmentation model corresponds to these conclusions, where income is one element of a more nuanced understanding of ability to save. Other factors such as financial confidence, mindset, and financial engagement over the life-course, all have an impact on savings behaviours.

2.4 Barriers to saving

The Money Advice Service's financial capability model articulates the enablers and inhibitors that can enhance financial wellbeing. There are six enablers and inhibitors: savings mindset, financial confidence, considered spending, financial numeracy, digital engagement, and financial engagement. This evidence review focuses on savings mindset. Interventions that can establish a positive savings mindset can influence how people manage money day to day, as well as how they manage and prepare for life events.

At the same time, savings behaviours manifest within an existing market. In the UK, there are structural inefficiencies in the operation of the cash savings market, creating a disincentive to save. This could mean that financial behaviours may only reach an optimal point within the existing constraints of the market. It is important to understand these barriers, so that interventions can be designed to account for and/or overcome these constraints.

2.4.1 Money mindset

Across numerous studies, the most common self-reported reason that people give for not saving (or saving more) is lack of spare money. Possible implications for interventions to encourage people to save (or save regularly) are that people need to feel they have some spare money to save, without it significantly impacting on their current standard of living. In terms of interventions, this might include income maximisation (for example, through welfare benefit checks), fostering good money management and budgeting skills, and exploring small changes to spending patterns that would make it possible to put money into savings.

From different sources of evidence (consumer survey data; analysis of large-scale public datasets and qualitative research), the most common reason why people say they do not save is because they cannot afford to, or because they have debts to pay off first (Crawford et al, 2015; Kempson and Finney, 2009; Scottish Widows, 2014). Correspondingly, improvements in people's financial circumstances, as a result of moving into work or a rise in earnings, have been found to have a positive impact on saving behaviour (Kempson and Finney, 2009).

However, income is not the only factor that explains saving behaviour. One qualitative study with people on low-to-middle incomes (Finney and Davies, 2011) was designed to look beyond income, to better understand other barriers and motivations to saving. In line with quantitative studies, it found that an individual's perceptions about their financial situation presented the biggest challenges to saving.

There was widespread acknowledgement by participants that they lived to their means, with some degree of choice, and that they could afford to save if they chose to. In discussing factors that might encourage saving, focus group participants were attracted to the idea of identifying small, affordable amounts to save. This derived from agreeing, through group discussion and peer testimony, that saving small amounts was both affordable and would have sufficient value in the medium to longer term to make it worthwhile.

A recent report by Toynbee Hall (2017) looked at the impact of small-sum and informal savings on financial resilience. It found that formulating a savings behaviour through identifying and saving small sums is more effective at improving

financial resilience for low income individuals than having a pot of savings set aside. This is because, in developing the savings behaviour, individuals build the knowledge and skills to manage financial resources that prepares them for future potential difficult situations (Toynbee Hall, 2017). Therefore, identifying spare money to save is closely related to budgeting and good money management. Research for the Money Advice Service (2015c) found that for those who were 'spenders' rather than 'savers' the biggest barrier to saving was a perceived lack of money, suggesting that as a first step towards saving people need to be shown that they can cut back and budget so that they can save spare money.

Savers, in general, have been found to have a more organised approach to money management and to be more engaged with financial services, for example, having a bank and savings account. Conversely a lack of day-to-day money management skills has been shown to be a barrier to saving (Finney and Davies, 2011; Money Advice Service, 2015b).

Furthermore, good savings role models are hard to find, and achieving a savings buffer does not feel like an aspirational goal for many people. Research has identified a 'live for today' attitude among people who are less likely to save money, where they prioritise spending over saving as they are not prepared to sacrifice their current living standards to save for the future (Finney and Davies, 2011; Kempson and Finney, 2009; Money Advice Service, 2015d). Another characteristic associated with non-savers is the perception that it is normal to spend money and not save; and a concern with what other people, such as friends, will think if they reduce their spending and do not have what other people have (Finney and Davies, 2011; Money Advice Service, 2015d).

2.4.2 Problems with the cash savings market

A market study published by the FCA in 2015 showed that the cash savings market is not working well for many consumers. Among other things, this means that cash savers are not receiving as much interest on their savings as they might do, at a time when interest rates are at an historic low (see below). The problems it found included:

- Savings providers had significant amounts of consumers' savings balances in accounts opened a long time ago that paid lower interest rates than those opened more recently.
- The majority (80%) of easy-access accounts had not been switched in the last three years and consumers were put off switching to another account by the expected hassle and low perceived gains (Financial Conduct Authority, 2015).

The remedies proposed by the FCA to make the market work better (Financial Conduct Authority, 2015; 2016) focus on four main areas: disclosure, switching, transparency and convenience. The disclosure remedy, which improves the information available to consumers both at and post-sale, and the switching remedy, which helps customers switch both cash savings accounts and cash ISAs, came into effect at the end of 2016. The FCA has also implemented the 'sunlight' remedy, that improves transparency of interest rates by publishing data on the lowest-paying rates available on easy-access cash savings accounts and cash ISAs.

While not directly relevant to the scope of this evidence review, if the FCA's remedies work to produce a more competitive market for cash savers, this may give people reassurance and foster trust in the savings industry.

2.4.2.1 Savings interest rates

Savers have been heavily impacted by the long-term Bank Rate (set by the Bank of England's Monetary Policy Committee), which means that savings interest rates are low, with the risk that savings interest does not keep pace with cost of living increases. In August 2016, the Bank of England cut the Bank Rate to a new historic low of 0.25% from 0.5% (Bank of England, 2016). Additionally, the majority of average saving rates now pay half of what they did in 2011 (MoneyFacts.co.uk, 2016).

Historically low saving interest rates reinforce the problems in the cash savings market set out above, because savers see little benefit in saving at all, let alone in shopping around for a better interest rate. At the same time, UK savers are reluctant to put money into investments (HMRC, 2016; Evans and Mian, 2014) because of the risk of losing their original capital and because it locks capital away, making it harder to access cash (Evans and Mian, 2014).

Making it financially attractive to put money into cash savings is therefore a significant challenge for interventions that aim to encourage people to save regularly. Recent government programmes such as the Lifetime ISA and the Help to Buy scheme include relatively generous bonuses to overcome this problem.

While it falls outside the remit of this evidence review, for people who hold relatively large sums of money in cash savings, there is a question about whether they should consider saving or investing their money in other ways that might produce a better return over the long term; and what interventions might help achieve this.

2.4.2.2 Informal saving

There is a small proportion of households that have savings, but do not hold them in any type of formal account. Statistics from the Family Resources Survey (2015/16) show that 3% of households had no formal accounts, but held their savings informally (Department for Work and Pensions, 2017), rising to 9% of households on the lowest incomes. People on low incomes are more likely to use informal methods of saving such as saving money at home, entrusting money to a friend or family member, buying saving 'stamps', Christmas saving clubs/schemes, and using rotating savings and loan schemes (Finney and Davies, 2011). Informal methods of saving are viewed as being more accessible and better suited to meeting short-term needs (Kempson and Finney, 2009).

One possible focus for savings interventions is to encourage people to become 'responsive habitual savers' (Toynbee Hall, 2017). Interventions that apply behavioural insights, such as the EAST framework, can be applicable across saver types and income groups (Money Advice Service 2016; Toynbee Hall, 2017). We turn to the issue of incentives to save in Chapters 3 and 4.

3 Encouraging people to save: what does the evidence tell us about interventions?

Interventions can be targeted toincentivise working-age adults to save. While the channels used are varied, the overall aim remains to change behaviours over the long term. This section sets out evidence relating to savings interventions aimed at either directly influencing behaviour or designing products that encourage savings behaviour through their use. The evidence is mixed, with some interventions more successful than others or inconclusive overall. This emphasises that careful consideration is required when designing interventions to encourage savings.

3.1.1 Financial education

An evidence review of research to understand the barriers to saving among lower-income households concluded that the evidence on the impact of financial education and advice on saving was mixed (Kempson and Finney, 2009). In the US, the Individual Development Accounts (IDA) scheme targets low-income households and offers matched savings on deposits used for specific purposes (refer to the Appendix for more information). There is evidence from the US of a positive impact of compulsory financial education on saving levels when delivered as a component of IDA programs. Evidence from the UK suggests, however, that compulsory education could deter people from opening a savings account. Evaluation of the Saving Gateway (details of the programme in the Appendix), where financial training was available to participants found that very few – between just 8% and 18% in the different pilot areas – took up the offer (Harvey et al, 2007).

Another review of US studies (Crossley et al, 2012) reached similar conclusions. Evidence from the US 'Money Smart' financial education programme (a taught course targeted at low-income individuals involved in other financial-related activities such as buying a house) showed that there was some effect on savings behaviour (opening a savings account and switching savings account); however, there was no control group and the evaluation did not measure the effect on total saving levels.

In relation to financial education delivered as part of IDA programs in the US, studies show a positive impact of receiving education on saving deposits, but limited evidence on the impact on overall saving rates because IDA saving contributions could represent a redistribution of existing savings from elsewhere. Overall, the Crossley review concludes that new evidence from studies that employ randomised controlled trial designs is required to understand what works, for whom and in what contexts.

More recently, a study that involved a follow-up survey of 822 people who registered for an online personal finance course produced by The Open University ('Managing My Money') provides useful information about the impact of online learning (Collard and Bramley, 2016). Survey respondents reported feeling less stressed about their finances and less confused by financial products at the end of the course than they were before they took the course. A significant number had altered their spending habits, leading to a reduction in credit card borrowing and fewer missed payments on debt. While there were small changes in savings behaviour in the survey data, these were not statistically significant.

Overall, the evidence that financial education for adults influences savings behaviour is limited or inconclusive. This suggests that the value of interventions with this aim could be marginal. Traditional financial education often focuses on improving skills whereas changes in mindset and attitude need to be put in place alongside newly developed skills.

3.1.2 Setting savings goals

There is good evidence from qualitative and quantitative research that one of the characteristics of people who do not save is that they do not have any reason to save. They have no savings goals and without these they have no reason to prioritise saving over spending and not to spend all of their income (Kempson and Finney, 2009; Money Advice Service, 2015b; Scottish Widows, 2014).

On the strength of their findings, these UK studies (and at least one US study) have recommended that interventions to encourage saving should include a focus on helping people to set savings goals. A savings goal motivates people to save for a specific purpose and then spend the money on its intended purpose once the goal has been achieved, while having the added benefit of providing both a buffer and skills to manage their finances if an emergency occurs (Money Advice Service, 2015b; Scottish Widows, 2014; Fisher and Anong, 2012; Finney and Davies, 2011). The reasoning is that, with a clear goal, people can visualise what they are aiming for and set out a plan of action to achieve it.

In terms of the nature of savings goals, qualitative research with people on low and middle incomes found that goals need to be both meaningful and tangible (Finney and Davies, 2011). Some non-savers in the research had unrealistic expectations about how much they needed to save to make a difference. Similarly, the concept of saving for a 'rainy day' could be difficult for people to imagine. One study, which analysed the US 'Survey of Consumer Finances' (2007), a nationally representative survey of US families, found that having a specific savings motive is not necessarily related to an increased probability of saving in the short term (Fisher and Montalto, 2010). In other words, having a savings goal may not be sufficient to encourage actual saving, unless there is a plan of how to achieve this (such as identifying spare money to save).

Short-term, goal-based saving is the most common type of saving among lower-income households (Fisher and Montalto, 2010; Kempson and Finney, 2009). However, it is associated with less regular or sporadic saving, saving smaller amounts and is reported to reflect these savers' shorter financial planning horizons (Fisher and Montalto, 2010; Fisher and Anong, 2012; Kempson and Finney, 2009; TNS-BMRB, 2015). An important question, therefore, is whether it is possible to move people from short-term goal-based saving to longer-term saving (or ideally get them to do both, resources permitting).

There is evidence that setting savings goals, and identifying actions to achieve goals, encourages saving. The studies did not look at whether saving was sustained over the longer term.

The *Money Lives* study from the Money Advice Service (2014) used quasi-experimental methods to test five interventions designed to help people develop a savings habit. With a sample of 72 participants, the qualitative and ethnographic work showed that budgeting tools and tools to control spending did help people to form savings habits. These interventions have not been tested or evaluated on a larger-scale. However, based on their findings, the authors suggest ways to help people put savings goals and plans into action, and thereby foster a savings habit, that could be built into the design of future interventions:

- Give people a clear outcome to work towards.
- Enable people to access information about that outcome, such as why it matters, and the difference it will make to them.
- Give people structure and the relevant tools to help them work towards the desired outcome.
- Give people regular feedback on their progress.
- Help people to feel in control of their financial situation, for example through budgeting and good money management.

Those participants who worked towards savings goals tended to save most, and more regularly, as their goals tended to be more tangible and more easily visualised, and as a result were more emotionally resonant. Some participants were so pleased with their progress that they intended to continue with their new savings habit after they had achieved their initial savings goal.

3.1.2.1 Effect of parents on setting savings goals

Based on a comprehensive evidence review of qualitative and quantitative research, Kempson and Finney (2009) concluded that, among 'rainy day savers' (ie, regular savers who tend to save for the longer term), a savings habit can develop during childhood through parental influence and encouragement, and this habit is retained into adulthood through a self-reinforcing habit. The authors' own re-analysis of a large-scale survey of saving for and by children (which was originally carried out for HM Revenue and Customs at the inception of the now-defunct Child Trust Fund scheme) provided further support for the positive impact of parental influence on savings habits (Kempson and Finney, 2009). Based on the evidence they reviewed and their own data analysis, the authors concluded that:

"…rainy day savers are 'born' at a very early age and retain that aspiration for life even though they may have periods when they are unable to save through lack of money."

(Kempson and Finney, 2009: 56)

A Swedish study that matched 14,930 twins (aged between 20 and 65) with annual data from their tax filings from 2002 to 2006 concluded that genes explained about 33% of the variation in saving behaviour (using a range of measures) across individuals.[4] This genetic effect did not disappear in later life. Parental wealth in childhood and an individual's current socio-economic situation was found to moderate genetic predispositions to save. (Cronqvist and Siegel, 2013).

3.1.3 Targeted Savings Programs

In addition to the research discussed above, evidence from evaluations of the Saving Gateway and IDAs (refer to Appendix for details) show that incentivised, more structured saving programs can also initiate and develop saving habits in people who previously were not regular savers.

A study of saving habits among IDA participants, which analysed survey data from a treatment and a matched comparison group (Loibl et al, 2011) tentatively concluded that the IDA programme created savings habits through a combination of targeted interventions such as: financial counselling to develop savings action plans, professional support and motivation, financial incentives through matched savings and repetition of new saving actions over a period of time.[5] Their analysis showed that, after six months, habit strength increased and peaked at around two years of participation. Once habits have developed, savings behaviour seems to be largely unaffected by conscious thoughts or emotions that could lead to the decision not to save.

The same study also suggests that savings habits form through a cycle of success. Once people start saving and see progress towards their goal they gain self-confidence and belief in their ability to succeed which in turn strengthens their savings habit (Loibl et al, 2011). Qualitative evidence from the first evaluation of the Saving Gateway shows that the psychological benefits of saving and having a financial safety-net were valued by participants (Kempson et al, 2005), which might encourage them to continue saving. Conversely, qualitative research commissioned by Money Advice Service found that, where people doubt their capacity to make changes, motivations to adopt new behaviours such as saving are difficult to sustain (TNS-BMRB, 2015).

3.2 Use of saving products

There are a variety of different products that households can choose for depositing cash savings. The main feature of cash savings products is that savers earn an interest rate return. Alternatives to cash savings accounts include interest-bearing personal current accounts, offset mortgage accounts, premium bonds and investment saving accounts such as stocks-and-shares ISAs (Financial Conduct Authority, 2015).

---

[4] This is based on what the authors call "an intuitive insight" (Cronqvist and Siegel, 2013: 3). Identical twins share 100% of their genes, while the average proportion of shared genes is only 50% for fraternal twins. Therefore if identical twins have more similar savings behaviour than fraternal twins, then there is evidence that the propensity to save, at least partly, originates from an individual's genetic composition.

[5] In this study, the comparison group was matched to the intervention group of IDA participants using propensity score matching (a standard and respected method). This reduced the final size of the comparison group to N=37; with a sample of N=91 IDA participants. On this basis, they reported their findings to be "tentative in nature, yet directive for future research".

Looked at from a household level, analysis of the Wealth and Assets Survey (2010/12) shows that the largest proportion of households' financial wealth is held in savings accounts (accounting for 22% of gross financial wealth), followed by cash ISAs (12%), fixed-term investment bonds (11%), UK shares (9%) and investment ISAs (8%) (Crawford et al, 2015). Box 2.1 provides some information about ISAs, from HMRC statistics.

Tax incentives, such as those offered by ISAs, do not benefit those on low incomes who do not pay tax (Searle and Köppe, 2014) and the current interest rates returns on conventional saving accounts are insufficient to attract those who do not save or only save informally (Kempson and Finney, 2009) – particularly those who only want to save a few pounds a week (Financial Inclusion Commission, 2015). For those on lower incomes other savings products may be more appropriate.

Box 2.1: How popular are ISAs and who uses them?

Individual Savings Accounts (ISAs) are tax-exempt cash and/or stocks-and-shares accounts under which any income received in the form of interest and dividends is free of tax, and on which there is exemption from capital gains tax on any capital growth.

HMRC regularly publishes account-level information about ISAs. This shows that around 12.7 million adult ISA accounts were subscribed to (ie, had money saved or invested in them) in 2015/2016. Just under 80% of these accounts are cash ISAs; the rest are stocks-and-shares, serving to highlight the risk-averse nature of UK savers. Higher-income groups show a stronger preference for stocks-and-shares over cash ISAs; the opposite is true for lower-income groups.

Income and age are closely associated with saving and this is true of ISAs. The median ISA holder (by income) has an annual income of between £10,000 and £19,999, and is most likely to have between £4,000 and £5,999 saved in 2013-14. For ISA savers with incomes of £150,000 or more, values averaged £64,148 at the end of 2013-14. The average amount of ISA savings in the under 25 age group at the end of 2013-14 was £3,650 compared with £37,864 in the 65 and over group. (Source: HMRC, 2016)

A review of the evidence on saving in low-income households (Kempson and Finney, 2009) reported that people save more when they establish a routine for doing so, whether this is through automatic payments or other methods (eg, making cash deposits at a set time in the week or month, or having a routine for saving loose change). The advantage of automatic saving methods is that among those who intend to save, the likelihood of actually doing so increased when saving deposits were made automatically and depended less on will power (Rabinovich and Webley, 2007, cited in Kempson and Finney, 2009).

3.2.1 Matched savings

A matched saving scheme offers a set level of matched funding for every pound saved and is the type of scheme that has been most extensively trialled and evaluated.

In the UK, two pilots of the Saving Gateway matched saving scheme were undertaken between 2002 and 2007. In the US, IDA programs are available across the country. The evidence from these schemes show positive impacts on saving, albeit with certain caveats (refer to Appendix).

A review of the evidence on a range of matched saving schemes, including IDAs and Saving Gateway, concluded that their impacts may not be very large in terms of raising overall levels of saving, as the majority of funds that are placed in such accounts represent either a transfer of existing savings or the diversion of funds that would have been saved in a different form (Crossley et al, 2012).

A very similar scheme to IDAs was trialled in Canada. Called 'learn$ave' it offered a matched savings scheme to promote adult learning among low-income Canadians. Although the use of learn$ave matched funding was restricted to education or training and small business start-up, of particular interest to this evidence review is that three of the trial sites used an experimental design including: two treatment groups, one that only received the matched funding incentive (N=1,195) and another that received the matched funding plus financial training and account management support (N=1,193); and a control group that received neither (N=1,195) (Leckie et al, 2010). Key findings from the experimental sites were:

- Both treatment groups were more likely to have set financial goals than the control group – 5% more likely among those that received only the financial incentive and 9% more likely among those that received the incentive and the financial education and support.
- learn$ave participants saved more than the control group early in the programme to obtain the matched credits (average savings at 18 months were slightly higher among the group that received financial training and support at C$674, compared to those who only received the financial incentive C$583), but they then saved less than the control group in subsequent months when they withdrew savings and cashed in their matched funding.

The evaluation showed that learn$ave had no significant long-term effect on the amount of financial savings. Reflecting this, the scheme did not show an impact on overall net worth for participants.

3.2.2 Prize-linked savings

Prize-linked or lottery-linked savings offer savers the chance to win a prize. Some schemes offer only cash prizes, while others offer a smaller interest rate with a cash prize (Searle and Köppe, 2014). They draw on the popularity of lotteries and, because people tend to over-estimate their chances of winning, they can provide a strong motivation to save (Chandrasekhar et al, 2015).

Overall, the evidence shows that prize-linked saving schemes have been successful in attracting people – including those on low incomes – to make deposits into these accounts, and that they provide a route into financial inclusion (Searle and Köppe, 2014). However, their impact on savings behaviour does not seem to have been evaluated – "there is no systematic empirical evidence on the effect of prize-linked accounts on total savings of individuals" (Kowalski p139, 2014) – and is an area that requires further research. Prize-linked savings schemes have also raised ethical concerns around encouraging gambling (Searle and Köppe, 2014).

In the US, 'Save to Win' is offered in a number of states by credit unions. Savers earn a capped number of raffle tickets for every $25 deposited in their credit union account with cash prizes drawn each month.[6] The Michigan 'Save to Win' demonstration project, involving eight credit unions, ran from January to December 2009. Despite laws that prohibit private lotteries in the US, Michigan law permits credit unions to offer 'savings promotion raffles' where those who save are eligible to win prizes. The Michigan credit unions were located in some of the more economically depressed parts of the Mid-West, with high levels of unemployment and economic hardship. Credit union members could open a qualifying share certificate account to enter the savings raffle. This certificate was a 12-month time deposit and required only $25 to open. Deposits were unlimited, but the number of entries in the raffle was capped at 10 per month. The amount of interest paid on savings ranged from 1 to 1.5%. Monthly prizes ranged in value from $15 to $400. A grand prize of $100,000 was awarded in early 2010. One withdrawal was allowed during the 12-month period, and certificate early-withdrawal fees applied.

In the 11 months in which Save to Win operated, 11,600 accounts were opened and generated over $8.6 million in deposits. A survey of 6,000 certificate holders found that the scheme was popular across credit union members (of all ages and income levels) and 56% of certificate holders reported that they had not saved money regularly before. The demonstration project suggests that prize-linked savings schemes are popular and have appeal for demographic groups that tend to have low levels of formal savings. However, there is no data on the effectiveness of the programme in generating new savings (Kearney et al, 2010).

[6] savetowin.org/financial-education/prize-linked-savings-

In South Africa, the First National Bank offered the 'million-a-month account' (or 'MaMa account') between 2005 and 2008 with monthly prizes. The MaMa account was a no-fee savings account which paid a nominal interest rate (0.25 percent) and rewarded savers with one prize entry for every 100 rand invested. Prize draws were held monthly and at each draw, 114 prizes were awarded ranging in value from 1 million rand to 1,000 rand. Account holders had to give 32 days' notice prior to withdrawing their funds from the programme. Between 2005 and 2008 over 1.1 million accounts were opened and 1.4 billion rand was deposited. Analysis of customer data estimates that the scheme opened accounts for 7% of banked South Africans and brought 1% of unbanked South Africans into the banking system (Kearney et al, 2010). The scheme was closed in 2008 following a High Court ruling that judged it to be an illegal lottery and that it contravened the National Lotteries Act.

In the UK, Premium Bonds offer a prize-linked savings account. Instead of paying interest, Premium Bond holders are entered into a monthly prize draw for tax-free prizes. Prizes range from £25 to £1 million. Statistics from the Family Resources Survey (2015/16) shows that 20% of households hold Premium Bonds (Department for Work and Pensions, 2017) and that they are popular across the income range, with over one in ten households at the lower end of the income range holding them. The average amount held in Premium Bonds as at April 2017 was £3070.36.[7] The Financial Inclusion Commission has recommended that the Premium Bonds scheme could be updated to more closely match the US 'Save to Win' scheme by reducing the minimum purchase amount (currently set at £100, or £50 for existing holders buying by standing order or electronic transfer) and better marketing.

[7] NS&I Premium Bond Data, 2017

4 Emerging areas for further research

There are other interventions that could encourage savings among working-age people that have not been discussed above because they are either untested or have yet to be substantially evaluated. Technological innovations and emerging understandings of how to influence customer behaviours are areas for further research.

4.1 Financial Technology (FinTech)

Financial technology (FinTech) is the application of digital technology to financial services. There is interest among policymakers and firms about the potential of FinTech to encourage good savings behaviours, including saving regularly. The apps and services that exist do not (yet) appear to have been subject to any robust evaluation of their effectiveness.

In the UK and elsewhere, FinTech is changing the types of financial services that are available, who can access them, and how (Parliamentary Office of Science & Technology, 2016). FinTech is particularly evident in payment services (for example apps that allow transactions to be made with a smartphone provided by banks and others) and financing (for example online platforms that offer crowdfunding or peer-to-peer lending). There are also a range of apps to help children and adults manage their money and encourage sensible spending, with the possibility of saving.

There are also several 'impulse saving' apps to encourage people to put money into savings 'on the go'. The idea behind these apps is to capitalise on people's impulse behaviours to encourage a saving habit. To do this, the act of saving must be made as simple (or simpler) than spending. For example, 'Impulse Saver' by Westpac (New Zealand) is a mobile app to encourage customers to save money. The customer chooses the amount they would like to save (from five pre-selected amounts ranging from NZ$2 to NZ$50). Each time they have the impulse to save they open the app and press a button to transfer the pre-defined amount from their current account to their savings account.

Other examples include 'Shake 'n' Save' (by the bank Emirates NBD, operating in UAE) and 'Small Sacrifices' (by ING Direct in Canada). In the latter case, customers are encouraged to make 'small sacrifices' such as foregoing buying a daily coffee or taking a packed lunch to work. Users can define their favourite small sacrifices and assign a dedicated amount and a defined account to transfer the money into (such as a savings account or a retirement account). The app uses charts to visualise how much customers can save over a 5–25 year period, which may be a way to help people think about the longer term, and make them more future-focused.

The only provider currently offering such a service in the UK is Nationwide. Their 'Impulse Saver' feature is incorporated into their main banking app, rather than being offered as a standalone app. It appears to be most similar to the Westpac 'Impulse Saver' in that customers can transfer pre-defined amounts from their current accounts to their savings accounts, without logging in.

None of these apps appears to have been evaluated, so we currently do not know their potential to encourage people to save regularly. Like other schemes to encourage saving, an important element of any evaluation would be to try and ascertain the extent to which FinTech fosters new saving and new savers, rather than encouraging existing savers to move their savings around.

In terms of designing interventions to promote savings, it is worthwhile noting that the adoption of FinTech varies by socio-demographic group. This means that FinTech may be more suitable for some target audiences than others. The 2015 EY Fintech Adoption Index found that, globally, there was higher use of FinTech among younger, higher-income and urban-dwelling people.[8] Although widespread, not everyone in the UK has, or indeed wants, access to the technology required (for example, a smartphone) and there are concerns about low levels of digital skills amongst some groups (Parliamentary Office for Science & Technology, 2016). Many people in lower-income households find the cost of mobile data packages prohibitive and therefore cannot access FinTech applications when not connected to a wifi network.

[8] ey.com/GL/en/Industries/Financial-Services/ey-fintech-adoption-index

4.2 Messages

Several research studies have made recommendations about the phrasing of messages to promote saving. However, the effectiveness of messages and messengers has not been tested in the field. This is an area where research and evaluation may be useful.

Several research studies have made recommendations about the phrasing of messages to promote saving. These studies include qualitative research with working-age adults to investigate their attitudes and motivations towards saving (Finney and Davies, 2011) and their financial wellbeing (Money Advice Service, 2015d); and an online survey of 3,000 UK working-age adults to explore barriers to saving and test responses to different messages (Money Advice Service, 2015c). Messages to promote saving need to counter common negative perceptions that:

- saving is not the social norm;
- people who save are 'tight' or 'boring'; and
- by saving, people will have to sacrifice their current lifestyle and living standards.

In other words, messages need to promote a positive image of saving. For example: "It is right for my children that I am careful with money"; "Being careful with money provides security for my family" (Money Advice Service, 2015d); "You want to live for today but you need to live for tomorrow too"; and "Every little helps" (Finney and Davies,2011). In one study that tested messages to encourage saving, the most popular message was "Find the £100 you never knew you had" (Money Advice Service, 2015c).

Real-life examples of how people can cut back on spending, could also be useful, with examples of people who have managed to do this and save (Money Advice Service, 2015c); and credible messengers and role models to whom low-income households can relate (Finney and Davies, 2011).

Analysis of data from the World-Values Survey that examined the effect of a country's language on saving behaviour found that languages where the present and future tense are grammatically close (use the same verb conjugation) are more likely to engage in future-oriented behaviour such as saving (Chen, 2013). In the English language, the present and future tenses are not grammatically close. The findings from this analysis suggest that messages to encourage saving may be more effective if they place less emphasis on the future and more on the present.

The Financial Conduct Authority have conducted research into general financial communications with consumers, and recommend that any communications use plain language with short, understandable messages; are designed with the target audience in mind; display clearly and frame correctly the prominent information; and use graphics and images to focus readers' attention. (Financial Conduct Authority, 2016a).

4.3 Rules of Thumb

A rule of thumb is a rule for general guidance based on experience or practice rather than theory.

In its final report prepared for HM Treasury and the Financial Conduct Authority, the Financial Advice Working Group suggested 'Save when you can – even a little helps a lot' as one of the 'Financial Five' rules of thumb to help consumers meet their most common financial needs. The report recommends that further research is carried out to test, refine and embed the five high-level rules of thumb (Financial Advice Working Group, 2017).

In relation to non-pension savings, the Money Advice Service website suggests a number of rules of thumb (see Box 4). The UK Financial Capability Survey also asks whether respondents have enough money put aside to pay for a £300 unexpected bill, which implies another possible rule of thumb. This £300 could represent a more realistic and achievable savings goal, particularly for those on lower incomes or who currently have no savings. The rule of thumb of having three months of outgoings in savings could feel like an impossible and therefore demotivating target for many.

Box 4: Rules of thumb for non-pension saving

Who should save?

The rule of thumb is to have three months' essential outgoings (things like rent and food) in an instant access savings account. This is called an emergency fund.

Saving or investing?

If you'll use the money in under five years, save.

If you'll use the money more than ten years in the future, invest.

If you'll use the money in between five and ten years, then consider your attitude to different risks, your investment goal and financial situation. In this situation, it may be suitable that you do a bit of both saving and investing.

Source: adapted from the Money Advice Service
moneyadviceservice.org.uk/en/articles/should-i-save-or-invest

There has been work on the use of rules of thumb in pension saving, which suggests that "the more the rules are founded on empirical observation of people's attitudes, circumstances and characteristics (including their financial capability) so much the better." (Hardcastle, 2012: 20). In-depth qualitative interviews carried out for DWP in 2010 with working-age people found that respondents tended to use rules of thumb for pension saving that were based on their current income or wealth and not on their likely future needs (Kotecha et al, 2010). Rules of thumb or norms can also become out-of-date because they are passed on between individuals and even generations (Hardcastle, 2012: 4).

More recent research conducted by the Pensions Policy Institute (based on qualitative research with consumers and an expert round table) identified two easy-to-understand rules of thumb that could be helpful to UK individuals under the new pension freedoms (which give people with defined contribution pensions greater access and flexibility in terms of how they use their pension savings). These were:

- The '4% rule', where an individual could withdraw this amount of their DC pension savings in the first year and, in subsequent years, the same amount indexed by inflation. Using this rule should make the individual's pension fund last their lifetime.
- The 'secure a basic income to meet essential needs' rule helps address the risk that pension savers draw down their pension saving too quickly (Eschalier and Luheshi, 2015).

These two rules of thumb do not appear to have been empirically tested with pension savers.

4.4 Linking saving to day-to-day financial transactions

There is some insight into how these approaches work in non-pension saving and qualitative evidence that shows that saving linked to loan repayment can be a way of getting low-income borrowers to save. Other than that, there is little evidence about the effectiveness of these approaches; and there do not seem to have been any large-scale evaluations.

As existing saving products do not appear to encourage saving, particularly among low-income households, there have been various recommendations for integrating saving with other financial services or transactions, to make saving a routine part of other day-to-day activities such as spending, making loan repayments and pension saving (Chandrasekhar et al, 2015; Collard and Bramley, 2014; Financial Inclusion Commission, 2015; StepChange Debt Charity, 2015). This builds on the ideas of behavioural economics in terms of making desired behaviours simple and easy to achieve or making them a default behaviour (see for example Money Advice Service, 2014).

There seems to have been little evaluation of the effectiveness of these approaches, and indeed we were unable to find very much research insight either. We describe below the evidence there is in relation to saving linked to loan repayment and saving linked to spending accounts. We did not find any research evidence that looks in detail at other proposals to encourage saving, such as saving linked to debt repayment; and saving linked to pension saving (proposed by StepChange Debt Charity, 2015; and the Financial Inclusion Commission, 2015).

The new Standard Financial Statement for debt advice includes a savings category, which allows for a small amount of saving as part of a debt solution. Future evaluation of the use of this category could provide evidence into saving linked to debt repayment, specifically if this form of intervention influences behaviour or increases capacity to withstand income shocks.

4.4.1 Savings products that are linked to loan repayments

This is where borrowers repay a small amount extra on top of their loan repayments which is then put into a savings account, and/or are encouraged to continue making payments once the loan is paid off (Collard and Bramley, 2014). This service is already offered by some credit unions and community development finance institutions. As a specific intervention to encourage saving, its effectiveness does not appear to have been evaluated.

There is some qualitative evidence that suggests such an approach might be effective. As part of an evaluation of the DWP Growth Fund, which aimed to stimulate lending by credit unions and community development finance institutions to people who were financially excluded, the saving behaviour of low-income loan applicants was examined (Collard et al, 2010). Qualitative interviews with successful loan applicants found that many had opened a savings account with the credit union when they took out the loan, to have social security benefits paid into the credit union from which loan repayments could be directly deducted. While saving was by no means mandatory for borrowers, some lenders used 'soft compulsion' to encourage saving at the point of lending. This meant that, when the loan agreement was made, the lender routinely agreed with the borrower a set amount of money to be paid into savings by direct deduction at the same time as their instant access loan was being repaid. Almost all of those Growth Fund borrowers who started saving in this way said they continued to save on a regular basis after receiving the loan, generally because once the arrangement was set up they took no further action.

4.4.2 Saving products that are linked to spending accounts

Encouraging saving by linking savings accounts to spending accounts is suggested as an idea worth considering by Chandrasekhar et al (2015). While examples of this approach exist, their effectiveness does not appear to have been evaluated.

Examples include 'MAGIC Mojo', a pre-paid card with an attached savings account where customers are able to move money easily from their pre-paid card into their savings account (see Box 1 for further information). Another example is Lloyds Bank's 'Save the Change' account where all debit card spending is rounded up to the nearest pound and the difference is transferred into a savings account, an approach suggested as an option to be explored by the Financial Inclusion Commission (2015).

Box 1: MAGIC Mojo – United States

MAGIC Mojo was an optional savings product attached to the MAGIC prepaid MasterCard. The MAGIC prepaid card allowed users to load money onto the card for everyday spending (where MasterCard is accepted). A key feature of the product was that it was designed to tap into impulsive behaviour. The aims of MAGIC Mojo were to help underbanked low-income consumers build emergency savings and reach financial goals. MAGIC card users could text MAGIC Mojo at any time to transfer money from their pre-paid card into the savings side of the card, for example if they had foregone an impulse purchase or spent less on an item, the money not spent could be quickly and easily saved, enabling people to build up a small savings fund. On opening the account customers were asked to identify a savings goal. MAGIC Mojo then broke down the goal into weekly target amounts and sent regular text message reminders to help savers stay on track. The MAGIC Mojo savings product ran from January 2013 to June 2014.

Analysis of transactions data (December 2012–June 2014) and savings goal information on 398 MAGIC Mojo customers was conducted to provide consumer insight.

Analysis showed that MAGIC Mojo was used as a short-term savings product with the most common savings goal to provide an emergency fund (36%). The next most common savings goals were a holiday (17%) and saving up to buy something (12%). Deposits and withdrawals into and out of MAGIC Mojo were very dynamic. Reasons why customers withdrew money were to: buy something (37%); cover an emergency expense (30%); or to pay household bills (21%), indicating that users were readily able to move money out of their savings to cover emergency and immediate expenses.

Despite being designed as an impulse saving product, 71% of saving transactions were made on an automated recurring basis and 29% were impulsive transactions. Impulse-only savers saved more per transaction, but made fewer saves than those who had set up automatic recurring saves. Recurring saves were for lower amounts, but were more frequently made. People who saved by using both automated and impulse saves saved the most overall.

A limitation of the product was that pre-paid cards in general have a short lifespan – ie, they are not kept active for long and so do not work as a long-term savings product. The average number of days MAGIC Mojo users kept their cards active for was 143 days (Dorrance et al, 2015).

Overall the evidence suggests that the design of savings products linked to spending accounts has a small influence on people's savings intentions (Kempson and Finney, 2009; Building Societies Association, 2007), but that poor product design could discourage some people who have made the decision to save from following this through. More generally, there is some evidence that people on lower incomes can feel that mainstream financial services (which includes savings accounts) are 'not for them' (see, for example, Collard et al, 2016).

A review of saving among lower-income households concluded that savings products for this target group need to be easy to understand with transparent terms and conditions (Kempson and Finney, 2009) – a point that is relevant for savers more generally. To encourage people on lower incomes to keep saving once they have started, the evidence indicates that savings products also need to be flexible, allowing low-income households to make small regular payments and adjust payment amounts when circumstances change (Kempson and Finney, 2009). We were unable to find any evidence that where these design features are present, people save more.

Above all else, the evidence highlights the importance of offering people on lower incomes a clear and easy-to-understand financial incentive to start saving, or to save more/regularly (Financial Inclusion Commission, 2015; Finney and Davies, 2011; Harvey et al, 2007; Kempson and Finney, 2009).

4.4.3 Commitment devices

Commitment devices have been recommended as a design element of saving products to encourage saving. Commitment devices that restrict access to funds can help overcome difficulties people have in exercising self-control and lead to better savings outcomes. Research has found that such devices are attractive to low-income households. We did not find any evaluation evidence from the UK or other developed countries about the effectiveness of commitment devices within savings products as a means of encouraging saving.

Research insights show that low-income households respond positively to the idea of savings products that restrict immediate access to savings or incentivise them not to make withdrawals, but which do not prevent access in an emergency. Where people are saving money for a purpose (such as Christmas), they can prefer restricted access so that they cannot access their money at all until a pre-determined date (Crossley et al, 2012; Finney and Davies, 2011; Kempson and Finney, 2009). Similarly, in the first Saving Gateway pilot the majority of participants were in favour of not being able to access their money until the end of the matching period (18 months) to stop them being tempted to draw the money out before the matched funding was paid.

Evidence from developing countries suggests that commitment accounts can be an effective way to raise savings amongst a population that may not have access to private savings markets and that may be particularly prone to conflicting short-term needs to spend and long-term desires to save. They can also help people to protect their savings from being shared with wider social networks such as family and friends (Chandrasekhar et al, 2015; Crossley et al, 2012). However, this would have limited applicability in the UK.

5 Conclusions

This final chapter assesses the evidence base for helping people to save (or save regularly), identifies some of the apparent gaps in evidence (both in terms of research insight and the evaluation of interventions), and explores how these might be addressed.

5.1 Target audience

In terms of interventions to promote saving, the evidence indicates there is a potentially large target audience: around half of households could be encouraged to start putting money into savings, and to save regularly; the two-thirds of households who already have money in savings could be encouraged to save more or to save regularly if they are not already doing so.

For any intervention to encourage people to save, these findings indicate that people on lower incomes and younger adults are potential target audiences. At the same time, they are likely to have less spare money and more competing demands on any money that is spare.

The Savings Propensity work by the Money Advice Service (2015c) also shows there is a potential target group among the 'spender' middle-income group. If they can be shown how to save without impacting their lifestyle and how to cut back on their spending, then they could be encouraged to save.

In terms of target audiences for savings interventions, an evidence gap is what distinguishes people who save from those who do not, where their personal circumstances (such as income and age) are similar. This gap might be filled by secondary analysis of large-scale datasets such as the Family Resources Survey and the Wealth and Assets Survey.

While it falls outside the remit of this evidence review, for people who hold relatively large sums of money in cash savings, there is a question about whether they should consider saving or investing their money in other ways that might produce a better return over the long-term; and what interventions might help achieve this.

5.2 'What works' to encourage saving (or regular saving)

Table 5.1 summarises the evidence presented in chapters 3 and 4 to set out what we know and our gaps in knowledge. It shows that the evidence base for 'what works' seems limited. For some other interventions we have research insights into the types of interventions that might encourage saving, but no evaluation evidence. When it comes to FinTech, we seem to lack research insights that relate to online services and apps designed to help people to save.

Between 2016 and 2018, the Money Advice Service's What Works Fund is designed to address some of these evidence gaps, in order to inform the future commissioning of services.

Table 5.1: What we know about 'what works' to encourage saving (or regular saving) and our gaps in knowledge

Type of intervention	Do we have evaluation evidence that suggests causal attribution?	Do we have other non-evaluation research insights?	What levers might this type of intervention link to?	What don't we know?
Setting saving goals	Yes (Fiorillo et al, 2014)	Yes (Money Advice Service, 2014)	Forming a saving habit Having saving goals Being future focused	■ Whether goal-setting interventions result in sustained saving over the longer-term ■ Whether goal-setting interventions produce *new* savings
Commitment contracts	Yes, but only from the health field (Volpp et al, 2008 and John et al, 2011, cited in Halpern, 2012)	Yes (stickk.com)	Having savings goals	■ How effective commitment contracts are in relation to saving ■ Whether commitment contracts vary in effectiveness depending on the saving goal and its time horizon ■ What sorts of people are likely to successfully use a commitment contract ■ How to sustain behaviour change over time – eg, using incentives
Financial incentives to save	Yes, for matched saving (Harvey et al, 2007; Kempson et al, 2005; Grinstein-Wiess et al, 2011; Sherraden, 2008; Schreiner et al, 2002; Sherraden, 2002)	Yes (Finney and Davies, 2011)	Forming a saving habit Having saving goals Attractive savings products	■ Can financial incentives result in sustained saving over the longer-term ■ Can financial incentives produce *new* savings ■ What factors prevent some lower-income households saving despite attractive financial incentives, when similar households do save? ■ Are prize-linked savings schemes effective at encouraging savings habits and/or *new* saving?
Linking saving to day-to-day	No	Yes, in relation to savings linked to loan	Forming a savings habit	■ Whether saving linked to day-to-day financial transactions is an effective

Type of intervention	Do we have evaluation evidence that suggests causal attribution?	Do we have other non-evaluation research insights?	What levers might this type of intervention link to?	What don't we know?
financial transactions		repayment (Collard et al, 2010)	Identifying spare money to save	way to help people develop a savings habit ■ How linking non-pension saving to debt repayment or pension saving might work in practice
Commitment devices that restrict access to savings	No	Yes, among low income households (Crossley et al, 2012; Finney and Davies, 2011; Kempson and Finney, 2009)	Forming a savings habit Having a 'saver's mindset' (because it encourages self-control)	■ Whether commitment devices are an effective way to help people develop a savings habit ■ Whether commitment devices only work to encourage short-term savings
Automatic savings payments	No	Yes (Kempson and Finney, 2009)	Forming a savings habit	■ Whether automatic saving payments are an effective way to help people develop a savings habit ■ What sorts of people automatic saving payments work for
Messages	No	Yes (Finney and Davies, 2011; Money Advice Service, 2015d; Money Advice Service, 2015c; Chen, 2013)	Having a 'saver's mindset'	■ Whether messages are an effective way to help people develop a savings habit ■ What messages and messengers work best, and for what types of people ■ What is needed to reinforce messages
Rules of thumb	No	Yes (Eschalier and Luheshi, 2015)	Identifying spare money to save	■ Whether rules of thumb are an effective way to help people develop a savings habit
Financial education	No	Yes (Kempson and Finney, 2009; Harvey et al, 2007;	Forming a savings habit Having savings goals	■ Whether messages are an effective way to help adults develop a savings habit ■ How financial education might be combined with or

Type of intervention	Do we have evaluation evidence that suggests causal attribution?	Do we have other non-evaluation research insights?	What levers might this type of intervention link to?	What don't we know?
		Crossley et al, 2012)	Identifying spare money to save Having a 'saver's mindset'	integrated in other interventions to encourage saving
FinTech	No	No	Having savings goals Identifying spare money to save	■ Who uses apps and online services and who does not? ■ What effect do apps and online services have on saving behaviour in the short and long terms? ■ Can FinTech help people develop a savings habit?

6 Appendix

The **Saving Gateway** was a UK matched saving scheme targeted at low income households aged between 16 and 65. There were two pilots of the scheme: Saving Gateway 1 piloted in five areas between August 2002 and November 2004; and Saving Gateway 2 piloted in six areas, from February 2005 to March 2007. The evaluations included comparison and control groups and they are the most robustly evaluated savings intervention in the UK. Saving Gateway was not rolled out after the pilots; however, the current Government's planned Help to Save scheme has some similar features.

Individual Development Accounts (IDAs) is a US scheme that targets low-income households and offers matched savings on deposits used for home ownership, post-secondary education, or setting up a small business. The American Dream Demonstration project was the largest evaluation of IDAs, covering 14 programmes (across 13 host organisations) and ran for four years (1997–2001). Although only one of these programmes was evaluated using a control group, there is a large range of available evidence to draw on.

Box 2: Saving Gateway – UK

Saving Gateway (SG) was a matched saving scheme targeted at low-income households aged between 16 and 65. There were two pilots of the scheme:

- Saving Gateway 1 (SG1): piloted in five areas, August 2002–November 2004; and
- Saving Gateway 2 (SG2): piloted in six areas, February 2005–March 2007.

In SG1, matched funding of £1 for every £1 saved was offered up to £25 per month and an overall cap over 18 months of £375. SG2 trialled different match-rates from 20 pence up to £1 and trialled different maximum monthly contribution limits from £25/month up to £125/month, with a maximum government match of 16 months of full contributions. Eligible low-income households were recruited to the pilot schemes, recruitement was via three methods; random telephone dialling; samples taken from DWP benefit records; and the Postcode Address File. Therefore, the evaluations do not provide any information about the best ways to promote take-up of this type of intervention.

Evaluation method:

- The Saving Gateway 1 evaluation included: analysis of saving account transaction data for 1,478 accounts; a survey (N=1,030) and depth interviews with account holders soon after opening the account; a survey (N=539) and depth interviews with account holders around the time of account closure; a reference (or comparison group) who matched the eligibility criteria for Saving Gateway accounts, but lived outside of the pilot areas who were surveyed at the same times as Saving Gateway participants (N= 445 first survey, N=126 follow-up survey).
- The Saving Gateway 2 evaluation was a larger study and included: analysis of saving account transaction data for 21,504 accounts; a telephone survey of people in both pilot (N= 2,379 account openers and 3,359 people who were offered an account but did not open one) and control areas (N=2,591); and two waves of qualitative interviews with account holders. Recruitment included randomised selection of people offered the opportunity to open an SG2 account (as well as non-randomised recruitment) which was important for measuring the outcomes between the pilot and control groups.

Both evaluations were of high quality in that they included pilot and control groups; however the design of the SG2 evaluation meant it was better able to attribute causality because of larger sample sizes and the randomised recruitment of some of the treatment group.

Evidence from the pilot showed positive results:

- Among the lower-income target group, those with relatively higher and lower incomes increased their savings account balances over the pilot period. In SG1, 52% of participants saved the maximum amount of £375, with an average amount saved of £282. In SG2, the maximum amount that participants could save varied across the pilot areas from £400 to £2,000, with 61% participants saving the maximum amount (although this fell to 43% in London).
- In SG2, higher match-rates led to increased account opening: take-up of SG2 accounts was lowest in East London (6.5%) where the match-rate was the least generous at 20 pence, and was highest where the match rate was 50 pence and offered a bonus of £50 when a participant had saved £50.

- In SG2, higher match-rates also led to higher saving levels: account balances were highest in the areas with the highest contribution limits as savings deposits were primarily driven by the contribution limit.
- Overall, the SG2 evaluation found a positive effect on account balances for both lower- and higher-income groups.
- The scheme encouraged people who were previously saving informally to put their money into a formal savings account.
- Qualitative evidence found that for new savers the scheme had taught them that they could save and gave them confidence in their ability to save in a formal account in the future.
- Many participants in the SG2 qualitative research were positive about the incentive the accounts created for regular saving: having a target to work towards, both in terms of monthly deposits and the longer-term goal of achieving the maximum matched funding was felt to offer a strong incentive, particularly to those who did not previously feel that they were capable of saving.

However:

- Despite a positive effect of SG2 on savings account balances, there was no statistically significant change on participants' overall net worth. Many participants had other savings assets and had transferred these into their SG account.
- Eligible people were invited to participate in the pilots but take-up among the lower-income target group was relatively low. The scheme attracted more highly educated and more employed people compared to the eligible population.
- Some new savers felt that although they had managed to cut back on spending for their SG account they would not be able to continue with these cutbacks in the longer term.
- Some non-savers had saved very little and the scheme had had little impact.

(Harvey et al, 2007; Kempson et al, 2005)

Box 3: Individual Development Accounts – USA

Individual Development Accounts (IDAs) target low-income households and offer matched savings on deposits that are used for home-ownership, post-secondary education, or setting up a small business. There is a limit on the maximum amount of savings that can be matched (typically ranging from $300-$600/year), known as the 'match cap'. Withdrawals made for other purposes do not receive the matched funding (unmatched withdrawals). Most IDA trials also involve financial education and administrative support for participants from community-based organisations.

The American Dream Demonstration (ADD) was the largest evaluation of IDAs, covering 14 programs (across 13 host organisations) and ran for four years (1997–2001).

Evaluation method:

The evaluation ran for seven years (1997–2003) and collected data on 2,364 participants across the 14 programs, covering participant characteristics and their savings behaviour. Only one programme used a randomised control trial to assign participants to the IDA programme or to a control group. In the rest of the programmes the host organisation targeted groups who met the eligibility criteria. As such the majority of the evidence from the ADD evaluation is unable to report on impacts that compare the outcomes of participants to the outcomes of non-participants. It does, however, provide a robust source of understanding on how the different design elements of the IDA influenced participants' behaviour.

Key findings:

- Just over half of participants (56%) were savers – defined as having net deposits of $100 or more. Average savings were $16.60/month. The other 44% saved, but also made unmatched withdrawals and had net deposits of less than $100 (most often zero).
- Higher match-rates were associated with a higher likelihood of being a saver, but had no significant effect on the average amount people deposited. This suggests that higher match-rates may attract people to join, but may have a disincentive effect on the amount they save.
- Among savers, higher 'match caps' were strongly associated with higher amounts of saving, suggesting that it operated as a savings target or goal.
- Those who set up automatic deposit payments were 22% more likely to be savers, but did not save higher amounts.
- The delivery of financial education (up to 10 hours) was positively associated with greater monthly net deposits.
- Income was not associated with being a saver – those with very low incomes saved as successfully as others (however, it is important to note that these participants may have different characteristics to very low-income households that did not enrol onto the scheme).
- 64% of participants made unmatched withdrawals, indicating the difficulty of encouraging long-term asset accumulation among those on low incomes who may often need to dip into IDA balancesIt appears that participants did understand the consequences of withdrawing funds early.
- Qualitative research found that IDAs helped participants to visualise their goals and created a 'road map' for participants to achieve them.
- The financial education and administrative support provided is costly, estimated at $64 per participant per month.

Key findings from the one ADD progamme that used an experimental design to compare the outcomes of participants allocated to the IDA programme (N=412) to those allocated to a control group (N=428) were that IDAs had a significant impact on promoting home ownership (although these impacts were only short-term and home-ownership rates among the control group caught up after the trial ended) but had no effect on overall net worth/wealth.

(Grinstein-Wiess et al, 2011; Sherraden, 2008; Schreiner et al, 2002; Sherraden, 2002)

Reviews of the evidence on IDAs (Crossley et al, 2012; Boshara, 2005) also make the following points:

- While IDAs led to an increase in home-ownership rates, non-pension wealth reduced; this may reflect that savings were used to purchase other assets such as a home or get a mortgage.
- It is also not clear whether savings contributions reflected an increase in overall saving or a reshuffling of what would have been saved anyway.
- With regard to the high level of unmatched withdrawals, many were repaid into the account and it appeared that some participants used their IDA as a bank account. Boshara (2005) suggests that those on low incomes have many reasons to save and the allowable uses of IDAs should be broadened.
- It is not clear whether positive impacts were the result of the financial incentives **or** the provision of additional support and education. Providing this additional support is also costly, making schemes expensive to deliver.

Except for the one experimental design, participants were self-selecting and may have had higher levels of motivation and greater disposition to save than those who did not enrol.

7 References

Bank of England (2016). *Monetary Policy Summary, 4 August 2016.*
Available at: bankofengland.co.uk/publications/minutes/Documents/mpc/mps/2016/mpsaug.pdf

Boshara, R. (2005). Individual Development Accounts: Policies to Build Savings and Assets for the Poor, Welfare Reform & Beyond #32, March 2005. Retrieved from:

brookings.edu/research/individual-development-accounts-policies-to-build-savings-and-assets-for-the-poor/

Building Societies Association. (2007). *The individual's saving decision*. Retrieved from:
bsa.org.uk/document-library/information/publications/theindividual-ssavingdecision.pdf

CBI. (2014). *A better off Britain - improving lives by making growth work for everyone*. Retrieved from:
news.cbi.org.uk/reports/better-off-britain/a-better-off-britain/

Chandrasekhar, C., Wyman, O., & Partner, T. S. (2015). *Reimagining financial inclusion, Ideas42*.
Retrieved from:
oliverwyman.com/content/dam/oliver-wyman/global/en/2015/nov/Reimagining-Financial-Inclusion-Final.pdf

Chen, M.K. (2013). *The effect of language on economic behaviour: evidence from savings rates, health behaviors, and retirement assets,* Cowles Foundation Discussion paper No. 1820, Yale University.

Collard, S., Hale, C. and Day, L. (2010). *Evaluation of the DWP Growth Fund – revised final report*. HM Treasury. Accessed on 15 June 2016. Available at:
bris.ac.uk/media-library/sites/geography/migrated/documents/pfrc1101.pdf

Collard, S., & Bramley, W. (2014). *Saving us from ourselves - how can we make the UK more financially resilient?* Open University. Retrieved from
open.ac.uk/business-school-research/pufin/sites/www.open.ac.uk.business-school-research.pufin/files/files/PUFin-Green-Paper-saving-us-from-ourselves-13July2015(2).pdf

Collard, S. and Brambley, W. (2016). *White Paper: Online personal finance learning.* Open University. Accessed on 16 June 2016. Available at: bit.ly/1Q4ifRU

Collard, S., Coppack, M., Lowe, J. and Sarkar, S. (2016). *Access to Financial Services in the UK. FCA Occasional Paper 17.* Financial Conduct Authority. Available at:
fca.org.uk/publications/occasional-papers/occasional-paper-no-17-access-financial-services-uk

Crawford, R., Innes, D., & O'Dea, C. (2015). *The Evolution of Wealth in Great Britain: 2006-08 to 2010-12*. IFS Report R109. Retrieved from: ifs.org.uk/uploads/publications/comms/R109.pdf

Cronqvist, H. and Siegel, S. (2013). *The Origins of Savings Behavior.* AFA 2011 Denver Meetings Paper. Retrieved from:
papers.ssrn.com/sol3/papers.cfm?abstract_id=1649790

Crossley, T., Emmerson, C., & Leicester, A. (2012). *Raising household saving*. Institute for Fiscal Studies. Retrieved from:
britac.ac.uk/templates/asset-relay.cfm?frmAssetFileID=11106

Department for Work and Pensions (2017). *Family Resources Survey – FRS Savings Tables* (spreadsheet).

Dorrance, J., Donnelly, R. and Gorham, L. (2015). *Impulse savings: evaluating the impacts of MAGIC Mojo.* UNC Center for Community Capital. Available at: communitycapital.unc.edu/research-item/impulse-savings-evaluating-the-impacts-of-magic-mojo/

Eschalier, M. and Luheshi, S. (2015). Transitions to Retirement: *Myths and rules of thumb in retirement income*. Pensions Policy Institute. London. Accessed 15 June 2016. Retrieved from: pensionspolicyinstitute.org.uk/publications/reports/transitions-to-retirement-myths-and-rules-of-thumb-in-retirement-income

Evans, K. and Mian, E. (2014). *Savings in the Balance. Managing Risk in a Post-Crisis World.* Social Market Foundation. Available at: smf.co.uk/wp-content/uploads/2014/12/Social-Market-FoundationPublication-Savings-in-the-Balance-Managing-risk-in-a-post-crisis-world.pdf

Financial Advice Working Group (2017). *Rules of Thumb and Nudges: Improving the financial well-being of UK consumers*. Retrieved from: fca.org.uk/publication/research/fawg-rules-of-thumb-nudges.pdf

Financial Conduct Authority (2015). *Cash Savings Market Study Report – Part I: Final Findings, Part II: Proposed Remedies*. Retrieved from: fca.org.uk/static/documents/market-studies/cash-savings-market-study-final-findings.pdf

Financial Conduct Authority (2016a). *Smarter Consumer Communications* (FS16/10). Retrieved from: fca.org.uk/publication/feedback/fs16-10.pdf

Financial Conduct Authority (2016b). *Cash Savings Market Study Update* (MS14/2.4). Retrieved from: fca.org.uk/publication/market-studies/ms14-02-4-update.pdf

Financial Inclusion Commission (2015). *Financial inclusion – improving the financial health of the nation.* London: Financial Inclusion Commission. Available at: financialinclusioncommission.org.uk/pdfs/fic_report_2015.pdf

Finney, A., & Davies, S. (2011). *Towards a nation of savers: understanding and overcoming the challenges to saving on a lower income*. University of Bristol. Retrieved from: bristol.ac.uk/media-library/sites/geography/migrated/documents/pfrc1105.pdf

Fiorillo, A., Potok, L. & Wright, J. (2014). *Applying behavioral economics to improve microsavings outcomes.* Grameen Foundation / Ideas42.org. Available at: ideas42.org/wp-content/uploads/2015/05/Applying-BE-to-Improve-Microsavings-Outcomes-1.pdf

Fisher, P. J., & Montalto, C. P. (2010). *Effect of saving motives and horizon on saving behaviors*. Journal of Economic Psychology, 31(1), 92–105. doi:10.1016/j.joep.2009.11.002

Fisher, P., & Anong, S. (2012). *Relationship of Saving Motives to Saving Habits*. Journal of Financial Counseling and Planning, 23(1). Retrieved from: papers.ssrn.com/sol3/papers.cfm?abstract_id=2222006

Grinstein-Weiss, M., Sherraden, M. W., Gale, W. G., Rohe, W., Schreiner, M. J., & Key, C. (2011). *The Ten-Year Impacts of Individual Development Accounts on Homeownership: Evidence from a Randomized Experiment*. SSRN Electronic Journal. doi:10.2139/ssrn.1782018

Halpern, S.D., Asch, D.A. and Volpp, K.G. (2012). *Commitment contracts as a way to health*. British Medical Journal, Volume 344. Available at: bmj.com/content/344/bmj.e522

Hardcastle, R. (2012). *How can we incentivise pension saving? A behavioural perspective*, DWP Working Paper No. 109 [online]. Accessed 15 June 2016. Available at: gov.uk/government/uploads/system/uploads/attachment_data/file/214406/WP109.pdf

Harvey, P., Pettigrew, N., Madden, R., Mori, I., Emmerson, C., Tetlow, G., & Wakefield, M. (2007). *Final Evaluation of the Saving Gateway 2 Pilot: Main Report*. Retrieved from: webarchive.nationalarchives.gov.uk/20130129110402/ hm-treasury.gov.uk/d/savings_gateway_evaluation_report.pdf

HMRC (2016). *Individual Savings Accounts (ISA) Statistics* (August 2016 Release). Available at: gov.uk/government/uploads/system/uploads/attachment_data/file/547217/Full_Statistics_Release_August_2016.pdf

HM Treasury. (2016). *Budget 2016* (HC 901) – March 2016. Available at: gov.uk/government/publications/budget-2016-documents

John L.K., Loewenstein G., Troxel A.B., Norton L., Fassbender J.E., Volpp K.G. (2011). *Financial incentives for extended weight loss: a randomized, controlled trial*. Journal of General Internal Medicine 26:621-6. Available at: ncbi.nlm.nih.gov/pubmed/21249462

Kearney, M.S., Tufano, P., Guryan, J. and Hurst, E. (2010). *Making savers winners: an overview of prize-linked savings products,* NBER Working Paper 16433, National Bureau of Economic Research. Available at: nber.org/papers/w16433

Kempson, E., McKay, S. and Collard, S. (2005). *Incentives to save: encouraging saving among low-income households*. London: HM Treasury. Available at: pfrc.bris.ac.uk/publications/Reports/SG_Incentives_to_save_final.pdf

Kempson, E., & Finney, A. (2009). *Saving in lower-income households A review of the evidence*. Bristol. Retrieved from: bristol.ac.uk/media-library/sites/geography/migrated/documents/pfrc0909.pdf

Kotecha, M., Kinsella, R. and Arthur, S. (2010). *Research on Predictions of Income in Retirement*. DWP Working Paper No. 87 [online]. Accessed 15 June 2016. Available at: gov.uk/government/uploads/system/uploads/attachment_data/file/214385/WP87.pdf

Leckie, N., Taylor, |, Hui, S.-W., Tattrie, D., Robson, J., & Voyer, J.-P. (2010). *Learning to save, saving to learn - learn$ave Individual Development Accounts Project - Final Report*. SRDC/SRSA (Canada). Retrieved from: srdc.org/uploads/learnsave_final_en.pdf

Loibl, C., Kraybill, D. S., & DeMay, S. W. (2011). *Accounting for the role of habit in regular saving*. Journal of Economic Psychology, 32(4), 581–592. doi:10.1016/j.joep.2011.04.004 library/sites/geography/migrated/documents/pfrc0302.pdf

McKay S., Kempson E. (2003) Savings and Life Events (DWP Research Report 194) Retrieved from: researchgate.net/profile/Stephen_Mckay2/publication/252341127_Savings_and_Life_Events/links/54bfad740cf28a63249fcc70.pdf

Money Advice Service (2014). *Money Lives: The financial behaviour of the UK* [online]. Accessed on 16 June 2016. Available at: masassets.blob.core.windows.net/cms/money-lives-report-march-2014.pdf

Money Advice Service (2015a). *The Financial Capability Strategy for the UK*. Available at: fincap.org.uk/uk_strategy

Money Advice Service. (2015b). *Financial Capability in the UK 2015 – Initial results from the 2015 UK Financial Capability Survey*. Available at: masassets.blob.core.windows.net/cms/files/000/000/261/original/MAS_FinCap_UK_Survey_2015_AW.PDF

Money Advice Service (2015c). *Savings Propensity Research*. Available at: masassets.blob.core.windows.net/cms/files/000/000/238/original/Savings_Propensity_Research_Debrief.pdf

Money Advice Service (2015d). *Financial Capability and Wellbeing - A qualitative report*. Available at: masassets.blob.core.windows.net/cms/files/000/000/213/original/financial-capability-and-wellbeing.pdf

Money Advice Service (2016) *Closing the savings gap.* Available at: masassets.blob.core.windows.net/cms/files/000/000/548/original/MAS_Savings_Report_Sept_2016_FINAL.pdf

MoneyFacts.co.uk (2016). *Savings Market Left Devastated.* Available at: moneyfacts.co.uk/news/savings/savings-market-left-devastated/

Parliamentary Office for Science &Technology (2016). *Financial Technology (FinTech), POSTNOTE* – May 2016*.* Accessed 15 June 2016. Available at: researchbriefings.files.parliament.uk/documents/POST-PN-0525/POST-PN-0525.pdf

Rodermund, R. (2012). *Examining the Savings Habits of Individuals with Present-Fatalistic Time Perspectives using the Theory of Planned Behavior*. Lindenwood University. Available at: academyfinancial.org/resources/Documents/Proceedings/2012/F2-Rodermund.pdf

Schreiner, M., Clancy, M., & Sherraden, M. (2002). *Saving Performance in the American Dream Demonstration: A National Demonstration of Individual Development Accounts*. Washington University in St Louis. Retrieved from: microfinance.com/English/Papers/IDAs_in_ADD_Final_Report.pdf

Scottish Widows (2014) *Savings report 2014*. Further details available at: reference.scottishwidows.co.uk/literature/doc/2014-03-SavingsReport

Searle, B., & Köppe, S. (2014). *Assets, savings and wealth, and poverty: a review of evidence – final report to the Joseph Rowntree Foundation*. Personal Finance Research Centre, University of Bristol. Retrieved from:

bristol.ac.uk/media-library/sites/geography/pfrc/pfrc1405-assets-savings-wealth-poverty.pdf Sherraden, M. (2002). *Individual Development Accounts: summary of research,* Center for Social Development, Washington University. Available at: csd.wustl.edu/Publications/Documents/R02-16_SherradenResearchReport2002.pdf

Sherraden, M. (2008). *IDAs and Asset-Building Policy – Lessons and Directions,* CSD Working Papers No. 08-12, Center for Social Development, Washington University. Available at: https://csd.wustl.edu/Publications/Documents/WP08-12.pdf

StepChange (2015). *An action plan on problem debt*. StepChange Debt Charity. Retrieved from: stepchange.org/Portals/0/documents/media/reports/additionalreports/StepChange_Action_Plan_on_Problem_Debt_2015.pdf

Toynbee Hall (2017). *Savings for the Future - Solving the Savings Puzzle for Low Income Households*. Retrieved from: toynbeehall.org.uk/data/files/Research_and_Evaluation/Savings_for_the_Future_Final_v6_002.pdf

Volpp K.G., John L., Troxel A.B., Norton L., Fassbender J., Loewenstein G. (2008). *Financial Incentive-Based Approaches for Weight Loss: A Randomized Trial*. Journal of the American Medical Association, 300:2631-7. Available at: jamanetwork.com/journals/jama/fullarticle/183047