C R E D S

Catalysing net-zero retrofit: feasibility of an innovative salary sacrifice scheme

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Executive summary

The shift towards hybrid working-from-home practices is seen by the authors as a great opportunity to introduce a novel financial mechanism, the Retrofit Salary Sacrifice (RSS) scheme that will help increase homeowners' awareness and uptake of retrofit works to improve their home-office environments. This novel approach is to encourage household-level retrofitting in order to reduce carbon emissions and lower energy costs (Figure 1). It is a tax-efficient incentive for home-owning employees to improve their properties, using the model of successful existing salary sacrifice schemes for the purchase of bicycles and EVs. This approach has a catalytic role for able-to-pay salaried homeowners to directly benefit from more attractive and affordable finance for retrofit projects, the prospect of lower energy bills in the long term, and a more comfortable working environment. Additionally, employers gain an extra benefit to offer their workforce, as well as a route to addressing Scope 1–3 of their direct and indirect carbon emissions.

This report presents results from work exploring the value of an RSS scheme to different stakeholder groups, assessing its feasibility for piloting and/or implementation, and understanding what needs to be in place for a successful RSS trial. Project activities leading to these specific outcomes involved ongoing conversations, online surveys, and a half-day workshop with key individuals from various groups in central and local government, the construction sector/supply chain, banks/lenders, and employers/companies, along with employees/homeowners.

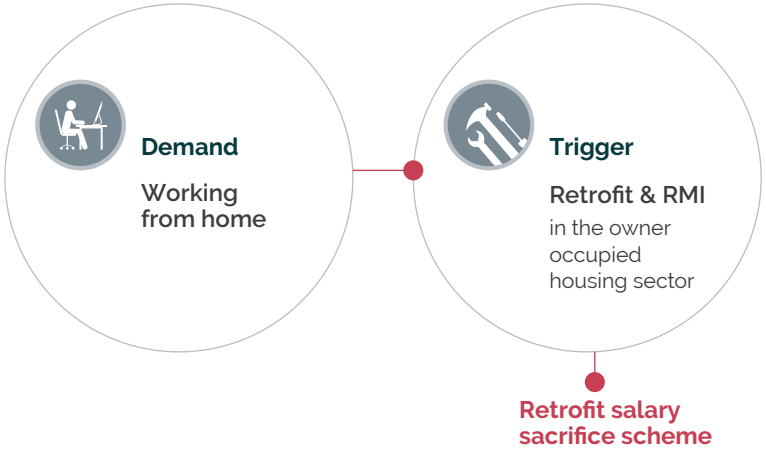

Figure 1: Retrofit Salary Sacrifice triggering demand

> Retrofit Salary Sacrifice to catalyse benefits for able-to-pay salaried homeowners, offering more attractive financing for retrofit projects, potential for long-term energy savings, and improved home working environments.

Key learnings

Across the stakeholder groups the key learnings in terms of perceived value, barriers and /or challenges and their associated mitigations for successfully delivering the Retrofit Salary Sacrifice scheme (RSS) are summarised below.

Value

Unique value of RSS scheme:

The RSS scheme enhances the variety of ways in which value is delivered, by offering additional benefits that are more challenging to achieve with other retrofit programs targeted at the homeowner able-to-pay sector.

Leveraging past experiences:

There exists a vast reservoir of insights and in place mechanisms and services from other retrofit pilots that can be instrumental in crafting an effective RSS scheme.

Detail-oriented planning:

For the successful pilot and subsequent rollout of the project, attention to detail is crucial in defining clear roles and responsibilities, managing cash flows effectively, and establishing robust risk management mechanisms.

Barriers

Perceived challenges and potential risks:

- Employees/Homeowners – what happens to the loan if I leave the employer providing the scheme?
- Employers/Companies – how do we make it fair to those who aren't homeowners?
- Government and Local Authorities – what if employees aren't interested?
- Construction Sector – how do we ensure consistent quality of delivery without making certification onerous?
- Banks/Lenders – complexity, quality assurance and attractiveness to homeowners

Introduction

Retrofitting owner-occupied homes is crucial in the UK and Europe to meet the ambitious 2050 net-zero emission targets. Despite the implementation of various policy instruments, the rate of retrofitting remains low at both national and international levels, particularly in the case of deep retrofits. The EU's Renovation Wave strategy and national financing mechanisms, including tax credits and soft loans, are good examples of policy initiatives addressing these challenges (European Commission, 2020). However, in the UK, the retrofitting pace is insufficient, especially in the privately-owned sector where many homes have lower Energy Performance Certificate (EPC) ratings. This situation underscores the need for more effective policy initiatives (Office for National Statistics, 2023b). Previous programs, such as the Green Deal and Green Home Grant voucher schemes, focused mainly on single measures rather than on holistic retrofit planning, failing to properly address issues like 'whole-house' building assessment and post-project customer support.

Post-pandemic, the shift towards remote working presents both challenges and opportunities for the UK's retrofit policy. This new normal has heightened the importance of home energy efficiency and resilience, pushing for policy innovation that supports flexible working arrangements while addressing carbon inequality and building suitability.

The UK government's recent consultation on flexible employment post-Covid-19 recognises the potential benefits of this shift, suggesting a need for integrated strategies (BEIS, 2021b) that harness the changing work and living patterns for energy efficiency improvements.

In 2021, the CREDS team at the University of Oxford and UCL began exploring an innovative concept for a financial retrofit incentive – the 'Retrofit Salary Sacrifice' (RSS) scheme. This idea was inspired by the potential of flexible working arrangements to promote the concept of whole-house retrofitting. In this research, the primary drivers of this financial incentive are examined through a lens of multiple benefits and co-benefits. We explore how this framing of energy efficiency helps in understanding and shaping the policy design for the scheme. The following section provides the background and rationale for the Retrofit Salary Sacrifice idea, introduces the research questions and objectives, and offers preliminary insights from the first stage of the feasibility study. This includes discussions on the value and challenges of an RSS scheme for various stakeholder groups, as well as considerations for its potential piloting and implementation.

Retrofit Salary Sacrifice background

The challenge of retrofitting the owner-occupied sector is enormous, and additional work activities at home increase energy use costs and highlight the importance of improved indoor quality, especially in inefficient leaky houses. With companies outsourcing their operations to employees' homes under flexible working arrangements, there is a duty to ensure that staff work in safe, amenable, and energy-efficient environments. The benefits of retrofitting become more compelling in the context of extended work-from-home periods as it remains resilient to pressures such as the end of the pandemic restrictions and increases in the cost of living (Office for National Statistics, 2023a).

In the context of home efficiency, the impact of changes in terms of geopolitics, climate, working patterns, lending mechanisms, and the construction industry is recognised but not necessarily translated into action for different stakeholders (Figure 2). The shift towards hybrid working-from-home practices has also implications in terms of carbon inequality, inclusivity, suitability of building environment, and energy resilience for employees' homes to accommodate the extra working activity and costs. It also offers new opportunities for changes in businesses, workforce and energy efficiency. In the latest consultation on flexible ways of employment after Covid-19 the UK government acknowledges considerable benefits for both employers and employees (BEIS, 2021b).

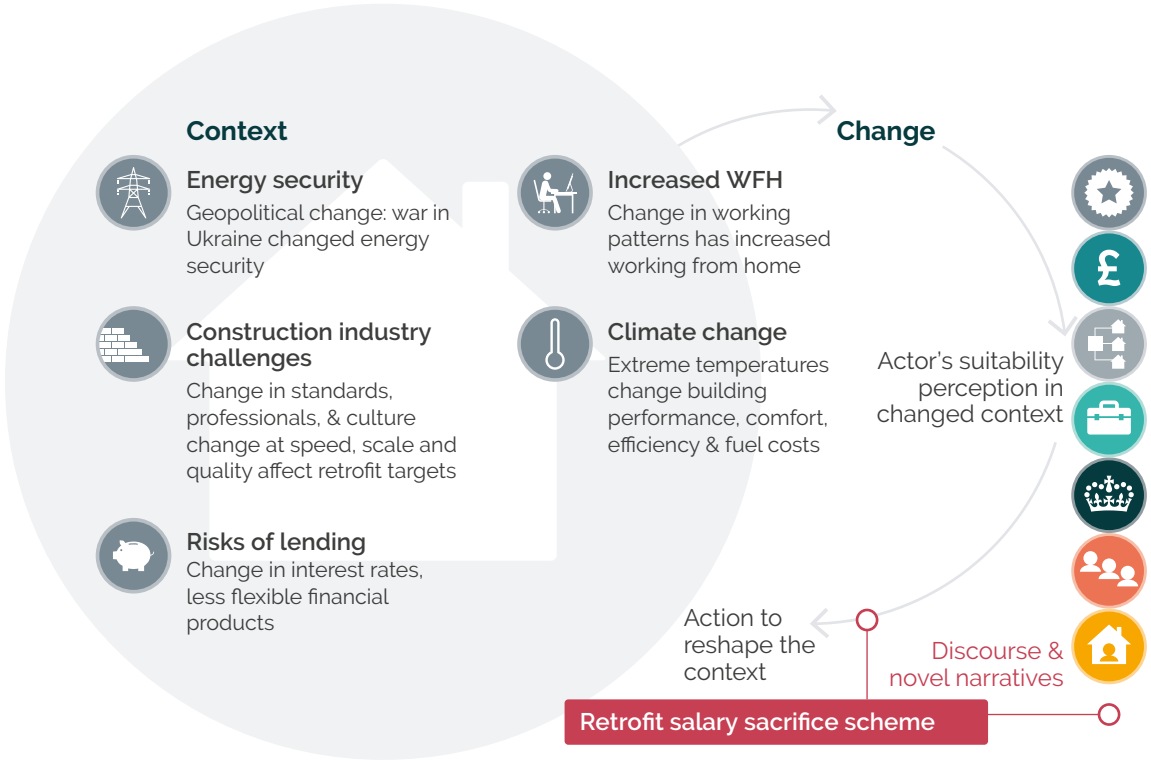

Figure 2: Changes in the context of home efficiency

The RSS financial incentive developed for a specific subgroup of salaried able-to-pay home-owners following principles of established salary sacrifice schemes (e.g. cycle scheme, ultra-low emission vehicles etc.) from other sectors. It is designed to allow employees (working from home homeowners) to invest in a whole-house service (i.e. assessment, retrofit planning, retrofit and systems installation and repair and maintenance) to help improve their home-work / office environment which is repaid via gross salary contributions (Topouzi, Mallaburn, & Mose, 2022).

Evidence has shown that able-to-pay doesn't necessarily mean 'able-to-retrofit' if there isn't any incentive and support in customer's retrofit journey (BEIS, 2021a). Recognising the failures from previous policies in the building sector (e.g. the Green Deal and the Green Home Grant) and barriers to deliver net-zero/low-carbon retrofit in the UK (Rosenow & Eyre, 2016; Rosenow, Fawcett, Eyre, & Oikonomou, 2016) this scheme is not suggested as a standalone single scheme but as part of a policy mix. Therefore, it identifies policy connections and expands boundaries towards other 'green' public or private lending mechanisms de-risking retrofit policy. Central to its design is giving weight to the customer journey, building on a 'retrofit service' that connects green finance, project management and appraisal of a building's condition and operation. This simple connection allows a significant deployment barrier to be overcome while increasing confidence in revenues, enabling private lenders to provide the bulk of the finance for the project. Acting as a catalyst it can help companies keen to bolster their sustainability credentials with clients and investors. While it can also support to sustain employers' reputation by balancing their outsourced operations and acknowledging the inequalities of working remotely.

The new working from home patterns are seen as the trigger to prime a specific niche of the market where demand is likely to be highest. Therefore, the focus is on the most receptive householders, primarily in the able-to-pay demographic (i.e. the employed owner occupied with capital reserve and lowest lending risk due to best Loan-to-Value ratio); and those most "able-to-accommodate" working from home with space for home-office facilities and energy efficiency retrofit technology (e.g. a garden to accommodate a ground source heat pump).

> The intent of the RSS design is to make capacity-building a key feature by creating an expert service to assess, advice and plan best retrofit solutions for each home-office property.

Research novelty and objectives

Previous financial incentives for the able-to-pay sector (Green Finance Institute, 2020; UKGBC, 2013) were hindered by obstacles to creating demand for retrofit uptake. The RSS approach is driven by the new working practices as a trigger to encourage retrofit home improvements to a specific group of salaried able-to pay- private-owned sector by addressing the question,

> "How can working from home (WFH) arrangements between employers and employees create demand for uptake of retrofit measures?"

In the RSS, the research design focuses on investigating both socio-economic and socio-technical challenges associated with building retrofits and employment. The business models developed to test and validate a 'retrofit my home-as-office' policy scheme. Adopting a tax-efficient, energy-efficient benefit approach, which has been successful in other UK sectors (e.g., transport with 'Cycle to Work' and 'Electric Car Salary Sacrifice', childcare with 'School Vouchers'), the RSS offers multiple benefits to various key stakeholders (Figure 3). A Systems Thinking approach is used in the RSS design to highlight how law, policy, and regulation can support flexible employment, enabling homeowners to gain access to affordable retrofit financing, the potential for long-term energy savings, and a more comfortable working environment. For employers, this offers an additional benefit to their workforce, as well as a means to address Scope 1-3 of their direct and indirect carbon emissions.

The RSS as a catalyst pulls together different key groups of stakeholders towards the same direction in retrofit, Figure 4. It builds on the UK Government's Net Zero objectives for a specific salaried able-to-pay/working -from-home homeowners using existing retrofit services (e.g. One-stop-shops like CosyHomes, Futureproof, People-Powered Retrofit and others) and mechanisms for quality assurance and retrofit roles and standards. One of the key objectives is to prioritise and cost a detailed evaluation of the existing building condition for planning retrofit and repair and maintenance improvement works. It recognises that 'understanding-first' of the building condition is not only a concern of existing building stock but also of new houses. In addition to the existing housing stock, the RSS also applies to new housing stock that is older than 5 years. This is intended to boost demand for low net-zero RMI services, while also addressing longer-term issues related to the future-proofing of buildings (see example in Appendix, Table 3).

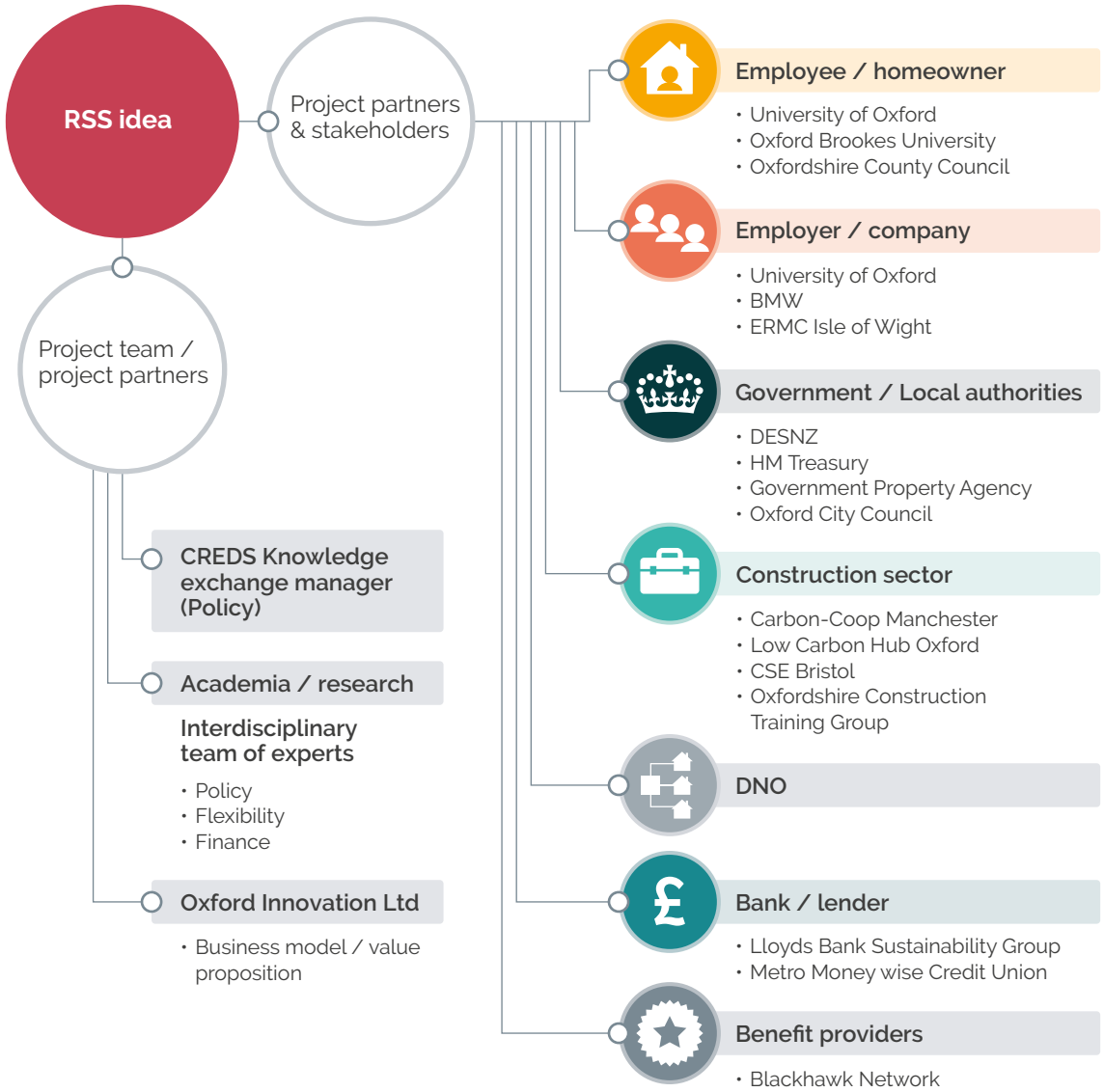

Figure 3: Project partner and key stakeholders involved in the RSS feasibility study.

A. Builds on:

- Government's Net Zero objectives
- Salaried 'able-to-pay' homeowners for flexible 'future work' patterns
- Existing retrofit services (OSS-CosyHomes), and mechanisms for quality assurance of works and price control of suppliers (PAS), and retrofit roles (and accredited installers (Trustmark)

B. Prioritises:

- Evaluation & 'understanding–first' the existing building condition, and Retrofit and Repair Maintenance & Improvement (RMI) planning

D. Facilitates:

- Access to retrofit planning advice and finance with customer/employee centred 'service' for retrofit and RMI
- Investment in retrofitting without upfront costs and without affecting credit scores

C. Creates:

- New narratives for home efficiency and trigger for 'home-office' improvement
- New narratives on employment relationships
- New narrative for employers addressing Scope 1-3 of their direct/indirect carbon emissions
- Leverage for additional demand for retrofit 'service' and professionals/roles

Figure 4: Key objectives addressed in the Retrofit Salary Sacrifice policy scheme design.

The RSS business model illustrates the connections between various stages and highlights the role of key stakeholders, such as the government, benefit providers, supply chain, lenders, employers, and homeowners/employees, within these stages.

A number of qualitative benefits of the RSS for various key stakeholders have been identified and are illustrated in Figure 6. While Distribution Network Operators (DNOs) are included among stakeholders in the RSS value proposition and benefits hypothesis, they were not part of the study at the feasibility stage. The illustrated benefits have been used as the foundation for hypotheses tested during this stage, which will be discussed in the following section.

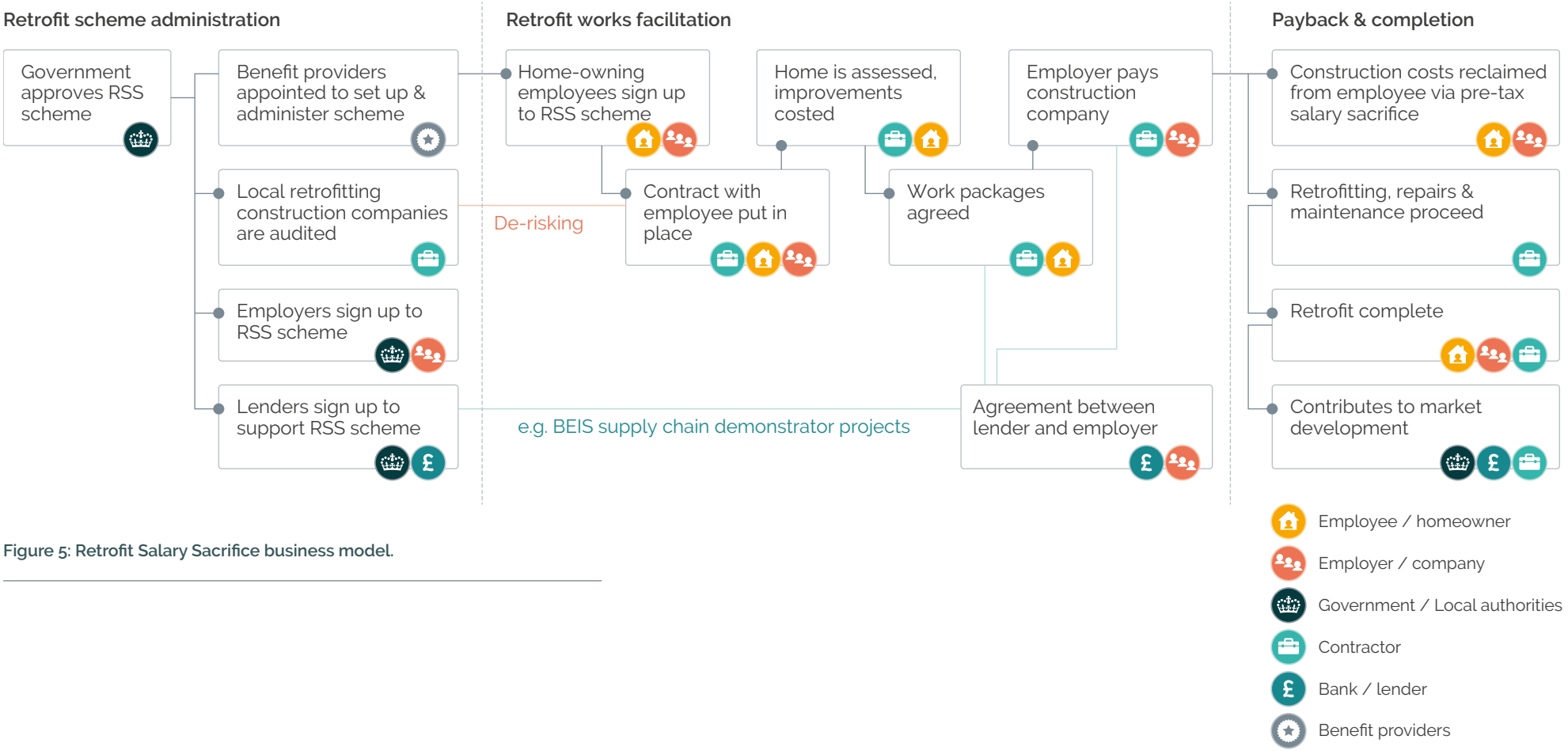

Figure 5: Retrofit Salary Sacrifice business model.

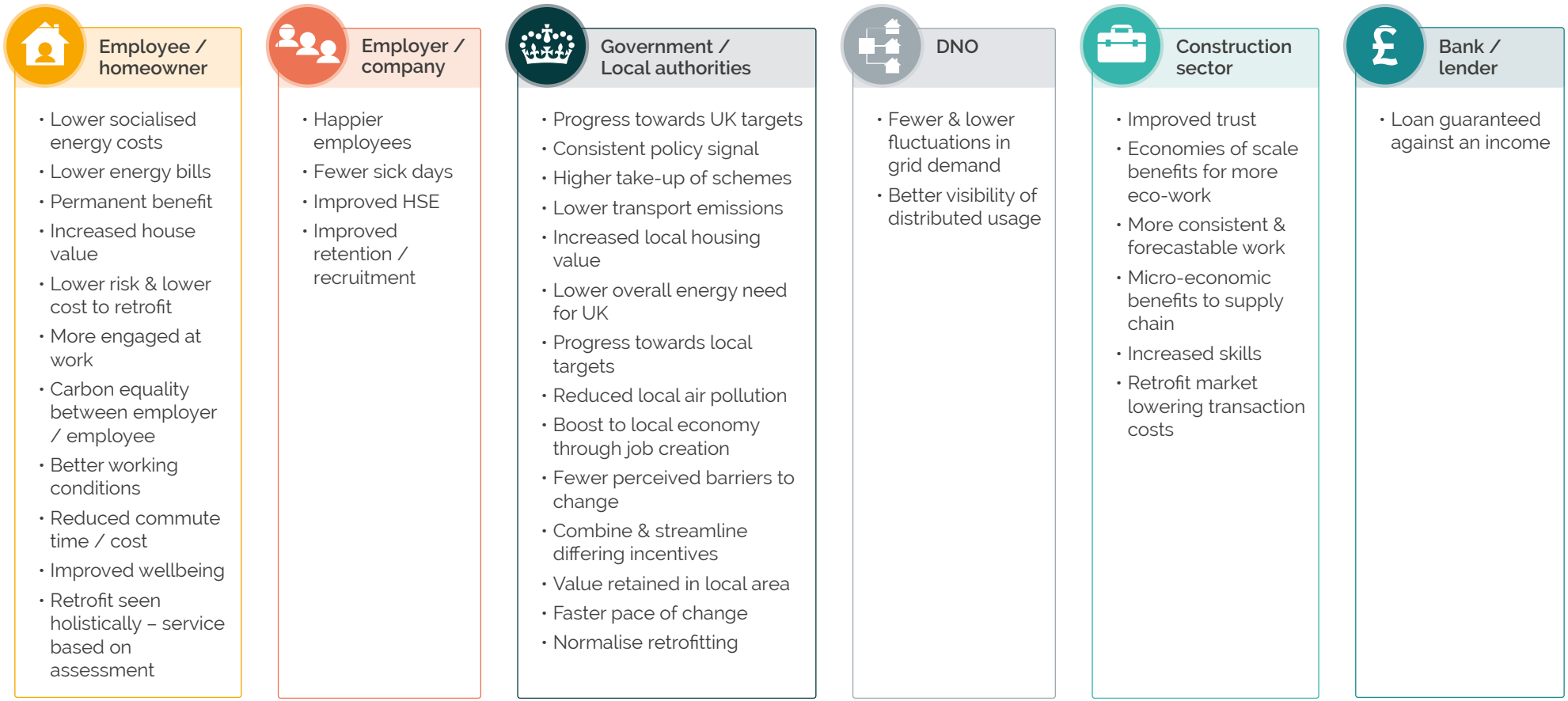

Figure 6: Hypothesis of the RSS value to different stakeholders.

Testing the Retrofit Salary Sacrifice idea and preliminary findings

Preliminary findings from stakeholder engagement, which tested the qualitative aspects of the RSS idea, are presented here. The study focused on understanding the value distribution within this model, the required investment from various stakeholders, and strategies for scaling up the business model. Employing diverse data collection methods (Table 2), including individual conversations, surveys, and a half-day workshop, the study aimed to assess the potential of an RSS scheme for different groups, explore its feasibility for piloting and implementation, and identify the necessary steps for launching an RSS pilot.

The key areas explored in these activities were to:

- identify where value will be delivered by RSS and to which sectors/stakeholders
- what additional benefits are associated with these value streams
- how do these benefits compare with alternative interventions

In addition, they were asked to identify any barriers or risks to successful delivery and their associated mitigations. These areas more systematically addressed in the survey and workshop activities.

Table 1: Approaches to data collection and types of data

Data Collection activities	Sources
Online survey	Open and closed-ended questions to 5 key stakeholder groups (n=71 in total): • employees-homeowners (n=50); • employers/companies (n=2) • Government and local authorities (n=9) • construction sector (n=9); v. banks/ lenders (n=1)
Half-day online workshop	With representatives from 4 key stakeholder group(n=18 in total: • employers/companies (n=2) • Government and local authorities (n=6) • construction sector (n=5) • banks/lenders (n=5) explored aspects related to value and implementation of the RSS
One-on-one conversations and meetings	From 2021 to 2023 continuous engagement with key stakeholders (n=45) from academia, business and government i.e. DESNZ, HM Treasury, CosyHomes Oxfordshire, Oxford City Council etc. reviewing, and co-creating the RSS business model and values proposition.

A thematic analysis was conducted on various data sources to explore participants' perceptions in response to specific questions. The findings, summarised in Figure 7, reveal common areas of shared value and co-benefits arising from the Retrofit Salary Sacrifice Scheme for different stakeholders.

Retrofit Salary Sacrifice	Construction sector	Employee / homeowner	Employer / company	Government / Local authority	Bank / lender
Convenience & practicality		Simplified process	Flexible working		
Carbon reduction & environmental goals		Meet their own carbon reduction goals →			
Policy alignment & utilisation	Existing skills / roles			Existing policies	
Engagement & market stimulation	Stimulate supply chain growth			Boost retrofit	
Enhanced reputation & value proposition	Prepare for future demands		Eco-conscious reputation		Ethical & sustainability goals
Quality & assurance	Accreditation & high-quality delivery	Customer trust			
Risk management & trust	Mitigates payments & quality assurance →				RSS structure
Economic & socioeconomic benefits	Job creation	Energy savings		Job creation & broader economy benefits	
Financial accessibility & affordability	Accessibility of funding & finance →		Staff retention		Reduced risks

Figure 7: Retrofit Salary Sacrifice's value and co-benefits to key stakeholders.

Values were identified in nine key areas related to the RSS process, such as:

1. Convenience and practicality
2. Risk management and trust
3. Financial accessibility
4. Engagement and market stimulation
5. Enhanced reputation and value proposition
6. Quality assurance.

And in relation to retrofit policy and socio-economic benefits, such as:

7. Carbon reduction and environmental goals
8. Policy alignment and utilisation
9. Economic and socio-economic benefits.

Most of the value is captured by the construction sector/supply chain and homeowners/employees. Shared value appears to be common in some aspects, like meeting carbon reduction targets for various stakeholders, while it varies in socio-economic co-benefits, ranging from job creation in the supply chain to energy savings and broader economic advantages.

The report also captures reflections from the stakeholders on the proposed delivery model for the scheme that was presented in the workshop, along with some specific suggestions for delivering a successful pilot.

Stakeholders' perception of the RSS delivery model

Two key areas of recommendations emerged around the governance and administration, and the implementation and delivery of RSS, as summarised below.

Governance and administration:

- Establish distinct governance layers for finance and retrofit quality, with clear differentiation in the delivery model.
- Address the mismatch between long-term retrofit vision and short-term contracts within the supply chain.
- Break down government interests in detail, focusing on departmental coordination, especially with HM Treasury.
- Acknowledge 'benefit providers' as a crucial stakeholder group that requires attention.
- Introduce a 'local convenor' role outside the construction sector to align with local/regional economic and environmental strategies.

Implementation and delivery:

- Define specific roles and responsibilities clearly, along with the processes to manage HR and risk flow, especially for retrofit failures.
- Set explicit conditions for the maintenance of retrofit measures for financiers/lenders, and determine the responsible entities for long-term customer care.
- Coordinate marketing efforts for the schemes and clarify the marketing roles among stakeholders.

- Clarify cash flow processes, including payment responsibilities, insurance, and management compensation within the model.
- Engage both local and national companies in the delivery to enhance local supply chain capacity Integrate the retrofit funding with other home improvements and define the funding scope.
- Assess and address the limitations of the electricity network, especially for new technology installations like heat pumps.

Recommendations for a pilot

Recommendations from key stakeholders on piloting the Retrofit Salary Sacrifice Scheme are summarised in the following distinct areas:

1. Pilot planning and management:

- Adopt a place-based approach for a small and local scale pilot, utilising existing retrofit supply chain infrastructure.
- Initially target homeowners/employees who own properties suitable for specific retrofit improvements within the pilot's timeline.
- Clearly define the responsibilities of different stakeholders involved (e.g., employers, employees, retrofit services, etc.) in managing the pilot and their impact on the eventual scheme.

2. Strategic partnerships and endorsements:

- Conduct the pilot in collaboration with key local employers like Oxford University and BMW, as well as with large organisations like the NHS or Police Forces.
- Secure an HMRC endorsement for the business model to strengthen the scheme's framework and partnerships.
- Engage with major credit unions for collaboration in the pilot, leveraging their capacity for a quicker scale-up.

3. Regulatory compliance and risk management:

- Address the role and potential challenges associated with the Financial Conduct Authority within the scheme.
- Implement 'sandboxes' and necessary exemptions to navigate liability issues within the pilot's delivery model.

4. Feedback and adaptation:

- Conduct extensive industry consultations during the pilot to gather feedback and better understand the service users, ensuring the pilot is responsive and adaptable to stakeholder needs and insights.

Conclusions

The thematic analysis of various data sources has provided comprehensive insights into participants' perceptions of the Retrofit Salary Sacrifice Scheme. These insights can be summarised in three key areas:

- **Shared value**: This is created across five stakeholder groups, including the construction sector, supply chain, employers, government, and homeowners/employees. Benefits extend beyond financial gains, encompassing environmental and social dimensions such as carbon reduction and job creation. The RSS model's design, which uses existing mechanisms and retrofit services, is perceived as key to mitigating risks and successfully piloting and rolling out the scheme.
- **Implementation and delivery**: This highlights the need for clear governance structures with an emphasis on detail-oriented planning that bridges the gap between long-term goals and short-term contracts. It stresses the importance of engaging both local and national companies to enhance the supply chain, clarifying cash flow processes, and refining roles and responsibilities. This approach aids in coordinating marketing efforts and setting conditions for retrofit maintenance.
- **Pilot scheme recommendations**: These emphasise the importance of starting with a place-based, small-scale pilot, targeting specific homeowner/employee groups and involving key local employers and large organisations. This includes addressing regulatory challenges, particularly with the Financial Conduct Authority, employing flexible 'sandbox' approaches for liability issues, and being responsive to feedback, adapting based on industry consultations.

Overall, the findings and recommendations point to a roadmap for effective piloting of the Retrofit Salary Sacrifice Scheme. There is a clear focus on shared value, strategic collaboration, and adaptive management. The scheme is perceived as an opportunity to not only meet immediate retrofitting needs but also to contribute to broader environmental and socio-economic goals, aligning with both local and national strategies.

Appendix

The appendix provides some back of the envelop calculation, examples and data collected from different activities testing the feasibility of the RSS.

Examples of the RSS

Examples of retrofit improvements that can be undertaken in a typical semi-detached house using the RSS scheme and their approximate cost (include supply and labour costs) and tax deduction for a homeowner/employee's Annual Salary over £15000 are illustrated in the table below. The examples show how assessment, maintenance and building fabric improvements and services installation can be supported within different time lengths from RSS scheme.

Table 2: Estimated examples of Retrofit Salary Sacrifice application- cost, time and tax deduction of retrofit measures using the scheme

Examples of application	Capital cost band (£)	Cost of measure (£)	Total gross cost/ Monthly gross salary reduction	Term (months)	Total lower rate (20%) tax payer cost/NI rate based upon 13.25%		Total higher rate (40%) tax payer cost/NI rate based upon 3.25%		Disruption band (measures examples)	Additional funds
					Total salary sacrifice	Monthly net salary reduction	Total salary sacrifice	Monthly net salary reduction		
Home assessment & Whole House planning	Up to £100	£100 - £500	(£100) £8.33	12	£66.75	£5.56	£56.75	£4.73	Low	No
	£100-£1000		(£500) £41.67		£333.75	£27.81	£283.75	£23.65		No
Sus floor insulation (U=0.136)	£1000-£5000	£2250	£187.50	12	£1501.88	£125.16	£1276.88	£106.41	Moderate -High	No
Sloping roof insulation (U=0.25)		£4200	£233.33	18	£2803.50	£155.75	£2383.50	£132.42	Moderate -High	No
Triple glazing patio doors (U=1.0)	£5000-£10,000	£5300	£294.44	18	£3537.75	£196.54	£3007.75	£167.10	Low	No
MVHR installation		£5000	£277.78	18	£3337.50	£185.42	£2837.50	£157.64	Moderate	No
Flat roof insulation(U=0.15)		£5800	£322.22	18	£3871.50	£215.08	£3291.50	£182.86	Low	No
Ex wall insulation (U=0.3)	Over £10,000	£6200	£258.33	24	£4138.50	£172.44	£3518.50	£146.60	Low	Yes
Heat-pumps		£7,000 – £10,000	(£10,000) £416.67	24	£6675.00	£278.13	£5675.00	£236.46	Low	Yes (BUS) up to £5,000

Depending the retrofit intervention, employment status (e.g. full-time, part-time) and home owners' lifestyle the payment can be spread as in Cycle to Work scheme from 12 month to 4 years. Examples of this are illustrated in Table 1 above.

Table 3: Example of the RSS approach in retrofit planning and maintenance for new and existing housing

Archetypes	A. New houses or existing houses retrofitted with MAJOR low-carbon improvements & EE measures installed older than > 5 years (Stages 1-3)	B. Existing houses with SOME low-carbon improvements & EE measures installed (Stages 1-4)	C. Existing houses with NO low-carbon improvements & EE measures installed (Stages 1-4)
RSS planning stages	**Stage 1**: Detailed building and energy audits (Building Performance Evaluation approaches of actual energy performance, building condition and indoor environmental quality IEQ (in all groups)		
	Stage 1: Short-term minor improvements/ repair and maintenance	**Stage 2**: Prioritising and planning improvements order (in groups B & C)	
		Stage 3: Short term repair maintenance and/or retrofit improvements	**Stage 3**: Short term retrofit improvements
	Stage 3: Long-term planning to mitigate lock-in effects from repair, maintenance and replacements	**Stage 4**: Long-term planning to mitigate lock-in effects from single measure packages	

Data collection approaches

The data collection and stakeholders' perceptions developed in three parallel strands involving different engagement activities with stakeholders.

1. The first strand involved ongoing conversations with key individuals from various groups in central government, such as DESENZ with the NZBI – Domestic, and the NZSI – Net Zero Strategy, as well as HM Treasury and the Department for Work and Pensions. Engagement also continued with local government groups and individuals from places like Oxfordshire County, Oxford City Council, and Leeds City Council. We also identified and began engagement with new key stakeholders important for RSS development, such as benefit providers like Blackhawk Network salary sacrifice provider, key lending / banking representatives from Metro Moneywise Credit Union, and the Head of Propositions and Partnerships at the Group Environmental Sustainability-Group Sustainable Business from the Lloyds Banking Group. The output of these conversations, surveys, and workshop activities meant that no additional interviews with these stakeholders were necessary.
2. The second strand involved undertaking online surveys with five different groups of key stakeholders such as employers/companies (n=2), employees/homeowners (n=50), government/local authorities (n=9), construction sector/supply chain (n=9), and banks/lenders (n=1). These surveys were circulated to specific groups to inform research objectives and questions on feasibility aspects of the RSS scheme. The surveys captured financial feasibility for different sectors to run the RSS scheme; technical feasibility looking at retrofit capacity and services; and market and organisational feasibility, capturing expressions of interest and administration from all sector stakeholders.
3. The third strand involved stakeholder participation and strategic engagement, delivered by a half-day workshop. The workshop explored the value of an RSS scheme to different stakeholder groups, assessing how feasible it would be to pilot and/or implement, and determining what would need to be done to make an RSS pilot happen. As part of this, workshop participants were asked to address the following three questions:

   > Identify where value will be delivered by RSS and to which sectors/stakeholders.

   > What additional benefits are associated with these value streams.

   > How do these benefits compare with alternative interventions.

The workshop also identified barriers and risks to successful delivery, along with their associated mitigations. Participants' responses to these questions are summarised in the Retrofit Salary Feasibility report and presented in the context of perspectives provided by each stakeholder group represented at the workshop. They also provided their views on the implications of such a scheme for employees/homeowners. The workshop was divided into three sessions with plenary discussions in between. These covered value streams for different stakeholders (Session 1), stakeholder perceptions of barriers and risks (Session 2), and the prerequisites for an effective pilot of the scheme (Session 3). The report captures reflections from the stakeholders on the proposed delivery model for the scheme presented in the workshop, along with specific suggestions for delivering a successful pilot.

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This report

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About CREDS

The Centre for Research into Energy Demand Solutions (CREDS) was established as part of the UK Research and Innovation's Energy Programme in April 2018, with funding of £19.5M over 5 years. Its mission is to make the UK a leader in understanding the changes in energy demand needed for the transition to a secure and affordable, net-zero society. CREDS has a team of over 140 people based at 24 UK universities.

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