

KAMMA

Driving the Retrofit Revolution

Creating a Tipping Point in the
Customer Journey that Puts
Property on the Path to Net Zero



kammadata.com

Introduction

Rate rises, government regulation, a sharp decline in new mortgage applications: the priority list for lenders may never have been longer.

At first glance this may justify a refined focus on traditional priorities, relegating climate commitments to optional extras. Yet the world does not stand still: the energy crisis, coinciding with rising climate-related risk, has ensured that Net Zero goals are now inherently linked to lenders' priorities and the customer journey.

The slow decarbonisation of UK property to-date means the mortgage lending industry's aggressive climate targets have to be met against an accelerated timetable. Continued failure to address the climate crisis has serious financial implications, including rising mortgage defaults, volatile house prices, and loss rates equivalent to an annual drag on profitability of 10-15%¹. Meaningful action is needed to meet new regulatory targets and avoid damaging accusations of greenwashing, as Asoka Woehrmann, former CEO of Deutsche Bank, discovered when forced to step down over such allegations².

So what does meaningful action look like?

Climate action is not new; there has been a 76% increase in lenders offering green mortgages in the last 12 months³. It is the first year that many of the UK's largest businesses are required to disclose financed emissions and PRA scenario testing has expanded to encompass additional climate-related credit risks.

Yet these changes alone will fail to deliver Net Zero by 2050. Property in the UK is some of the oldest in Europe and was largely built before the climate crisis, or even energy efficiency, were a priority. These buildings need to be retrofitted on a huge scale and, until this singular challenge is met, progress will continue to be slow and lenders' own Net Zero targets will be missed.

'[A tipping point occurs] when a zero-carbon solution becomes more competitive than the existing high-carbon option. More sales lead to cheaper products, creating feedback loops that drive exponential growth and a rapid takeover.'

Damian Carrington on The World Economic Forum's report The Breakthrough Effect: How tipping points can accelerate Net Zero

Lenders must catalyse a super tipping point in customer decision making in order to deliver the UK's retrofit revolution. Retrofitting needs to be included as standard in the customer journey and the majority of customer decisions. A property's environmental profile is already having an impact on its market value, so whether buying, remortgaging or home improving, every decision needs to include a choice on upgrading the energy efficiency, and reducing the environmental impact, of the property.

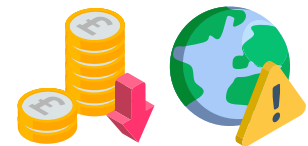
¹ 2021 Climate Biennial Exploratory Scenario, Bank of England | ² Financial Times

³ Mortgage Advice Bureau



76%

Increase in green mortgage solutions in the last year, the vast majority rewarding already efficient homes



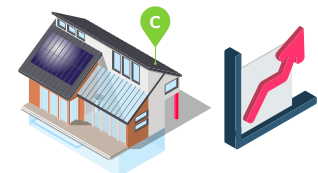
10-15%

Potential equivalent hit to profitability caused by a failure to address the climate crisis



13%

Total progress in decarbonising UK housing stock, the slowest moving of all major emitters



12.5%

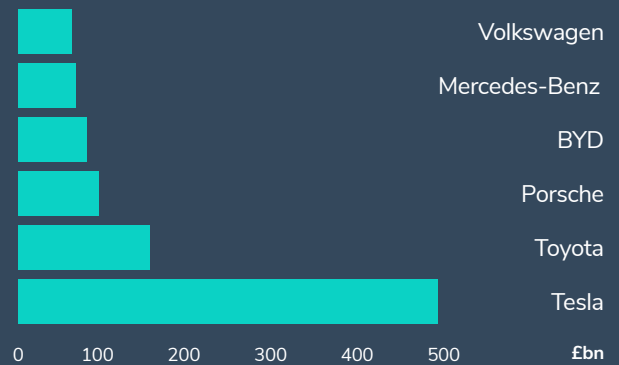
Average valuation uplift of improving a property to an EPC rating of C or above

Driving the tipping point delivers market leadership

In the UK, the automotive industry is the only other major emitter of carbon to have decarbonised as slowly as property.

For this sector, the government has found the right lever to pull to deliver a tipping point. Plans to ban the sale of new petrol engine cars from 2035 were confirmed as early as 2020, and sent a clear signal to industry. This tipping point has resulted in a dramatic rise in investment in new, cleaner tech, and equally dramatic changes in company valuations.

Tesla became the world's most valuable car company in 2020 and now its market cap tops the five closest competitors



Source: Companies Market Cap, March 2023

The 2020 regulations have rapidly accelerated the growth of EVs and supporting infrastructure



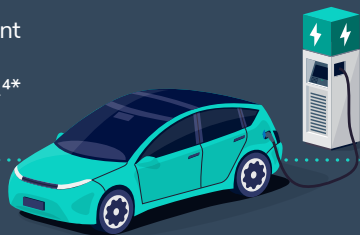
£1.1bn

average annual investment from UK manufacturers between 2011 and 2021^{4*}



758.2k

new EV registrations in 2020, which grew steadily from 83,900 in 2010⁶



£4.5bn

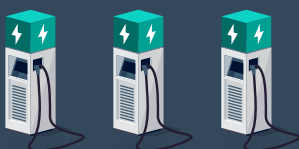
investment from UK manufacturers in 2022, almost 4x the annual average in the previous decade^{5*}



1.8m

new EV registrations by 2022, more than doubled in just two years

Feedback loops drive exponential growth, helping EVs to reach cost parity with combustion engine vehicles by 2025



The number of charging devices has more than doubled (2020-2022)



EV market share has more than doubled (2020-2022)



The cost of making EVs is projected to reach cost parity with combustion engine vehicles (2025-2026)⁷

* Figures account for announcements made by vehicle and battery manufacturers, and do not include wider supply chain investment

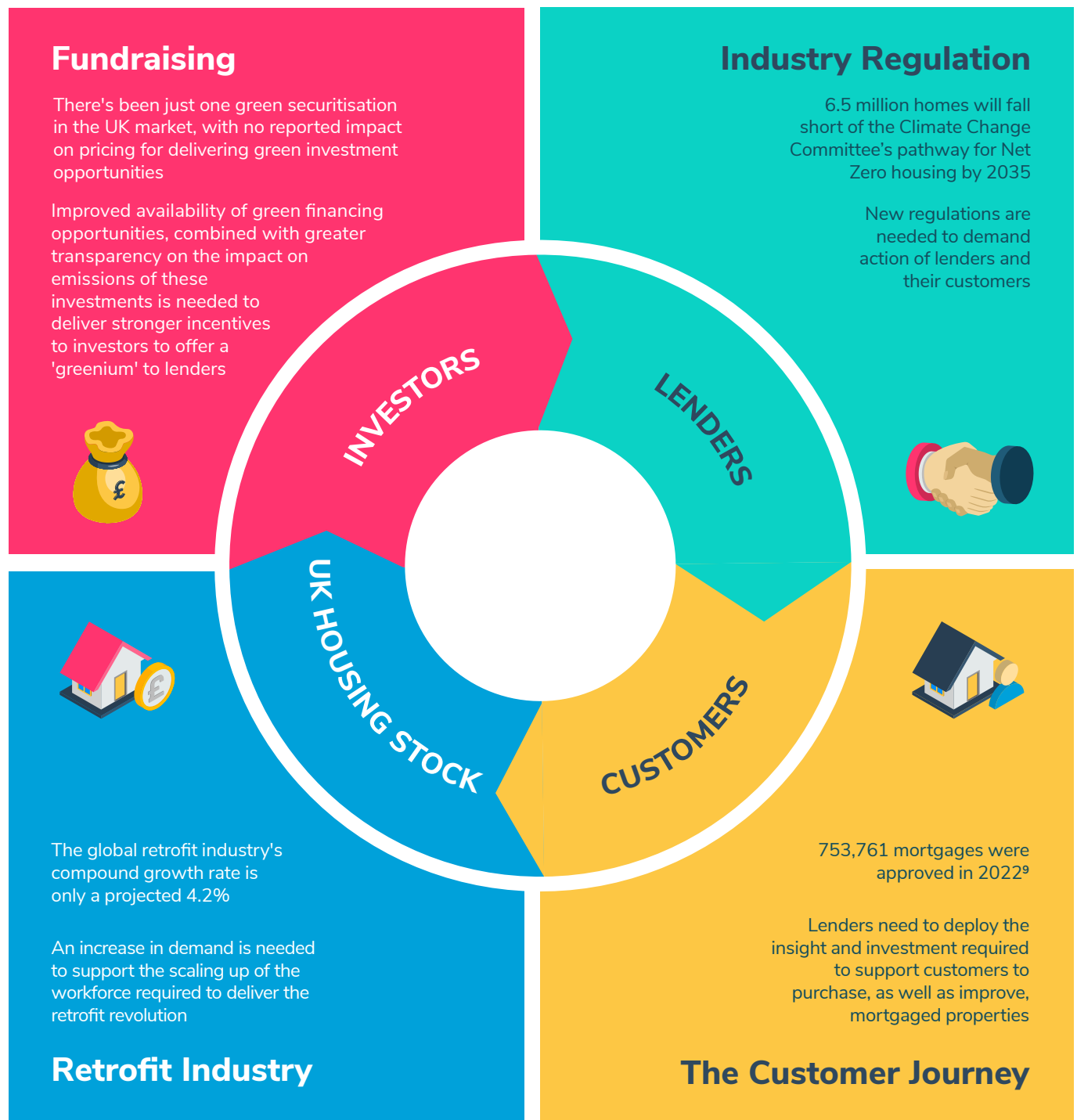
⁴ Society of Motor Manufacturers and Traders (SMMT) | ⁵ Society of Motor Manufacturers and Traders (SMMT) | ⁶ Department for Transport (DfT) | ⁷ Envision Racing

Tipping points in the lending ecosystem

Multiple actors at each stage of the mortgage lending ecosystem must support the creation of tipping points that drive new customer behaviour and stronger market forces.

Improving energy efficiency and reducing emissions reduces risk on mortgage back books, but also classifies properties as “green”. Lenders must be able to leverage these assets to gain favourable rates on securitisations as fair reward for supporting these actions. Where this occurs, the proceeds can also then be used to fund further retrofits, further improving energy efficiency. This process unlocks a virtuous circle, with each actor incentivised to take greener actions, driving property towards a Net Zero future.

The tipping points we need in the lending ecosystem



⁸ Fortune Business Insights | ⁹ Money

Creating a customer journey tipping point

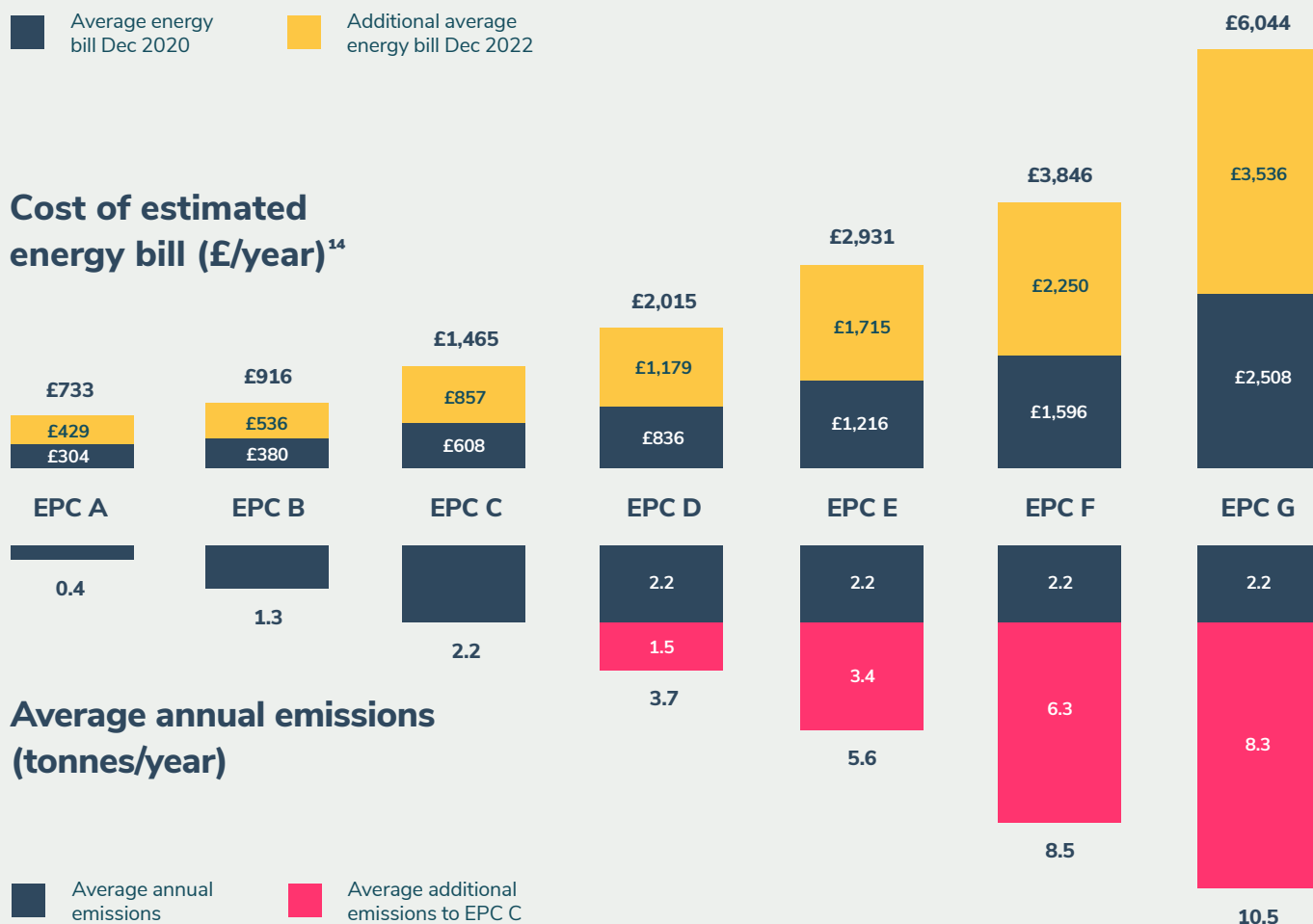
How can the improved business case for retrofit help lenders drive the revolution required?

Lenders are more active than ever before: the value of mortgage lending in the UK is the highest it has been for 15 years, with 2021 seeing total gross mortgage lending reach £316bn¹⁰. Each customer journey creates an opportunity to drive uptake of retrofitting. Lenders can do this simply by focussing on the business case, yet too few do. It is a major missed opportunity that the high return on investment offered by retrofitting is rarely illustrated to customers. For the climate conscious, this may not matter. Their knowledge of the cost to the environment provides all the motivation needed to reduce their carbon footprint. However, a financial case also needs to be made to those with lower levels of awareness and differing motivations, particularly in an era of stalling real-term wage growth and falling living standards.

Customers need to offset rising costs. The 241% increase¹¹ in the price of energy since 2020 is a huge challenge for UK mortgage customers, yet it provides a strong financial case to reduce energy consumption and switch to cheaper energy systems.

Although the majority of consumers at present are unfamiliar with retrofits¹², a recent study by RICS and YouGov found that 45% of customers are still motivated to improve their homes in order to save money on energy bills, in addition to 34% who would do so to reduce their carbon footprint¹³. With the right education and support, lenders can drive decarbonisation and unlock solutions that benefit both the planet and customers' pockets.

It is now eight times more expensive to power the UK's least efficient properties than the most efficient



¹⁰ Money | ¹¹ UK Parliament | ¹² TrustMark | ¹³ RICS and YouGov | ¹⁴ Cornwall Insight

Impact on asset value, the business case grows stronger

Considering the huge cost of heating inefficient homes and the impact of aggressive regulation, it is no surprise that energy efficiency ratings are already impacting house prices. This is partly a function of market forces, with customers willing to pay more for a home that is greener and costs less to run.

It is also partly a function of regulation, with over two-thirds of landlords favouring properties that comply with proposed Minimum Energy Efficiency Standards (MEES) that will require all private rented sector (PRS) properties to meet a minimum of Energy Performance Certificate (EPC) rating of C by 2028¹⁷. Collectively, these drivers have added a premium, with various quantitative studies highlighting a large differential.

The only silver lining to a challenge as large as a global energy crisis, is that it is now financially rational to retrofit a property. This simple fact should catalyse mass adoption, support rapid sector growth, and drive Net Zero wins, but Lenders need to act on the opportunity. They are well placed to do so thanks to their two greatest assets: the lending capital needed to finance the transition; and their trusted relationship with customers.

Equipped with both funds and facts, customers will find it far easier to make smart, green decisions, unleashing the retrofit revolution.

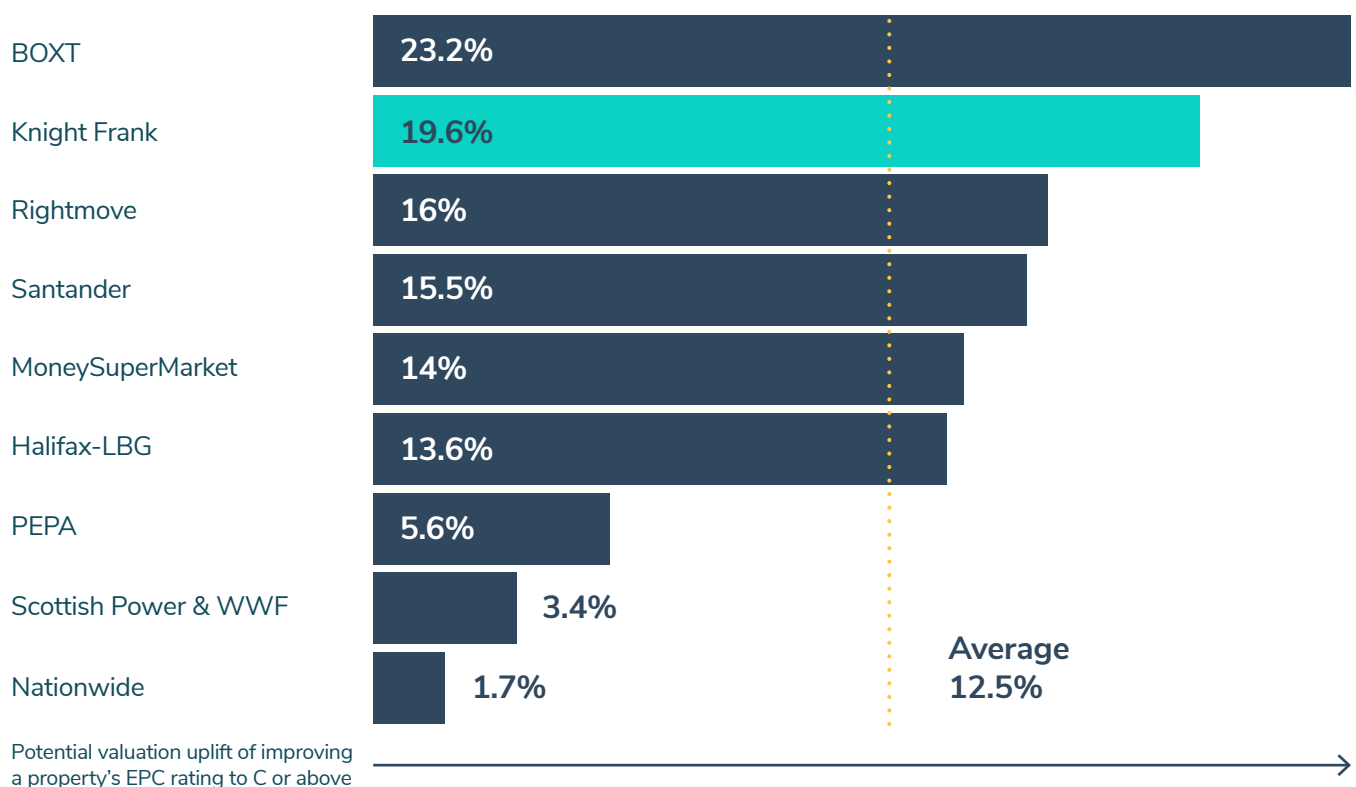
55%

of consumers would consider retrofit measures that result in a green premium on property value¹⁵

68%

of landlords are less likely to purchase a property with an EPC rating below C¹⁶

Multiple studies link energy efficiency to rising in property valuations



Knight Frank points to a 19.6% increase in value for a property to move from EPC Band F or G to C. However, a property making the small jump from D to C can also benefit from an increase of 3.2%. This amounts to an increase of £9,440 on the UK average home¹⁸. Set against average retrofit costs of around £3,369*, this represents a substantial return on investment even before fuel savings are factored into the equation.

¹⁵ RICS and YouGov | ¹⁶ Foundation for Intermediaries | ¹⁷ Minimum Energy Performance of Buildings (No. 2) Bill | ¹⁸ HM Land Registry

* Based on the typical UK property improving from EPC D to C

Data-driven decision making in the retrofit process

Data is needed to educate and support customers on the retrofit journey. Data provides evidence that:

- Strong fuel savings offset rising energy costs
- Market forces reduce the price of retrofit solutions
- Changing customer preferences toward efficiency and emissions performance deliver a measurable impact on property values

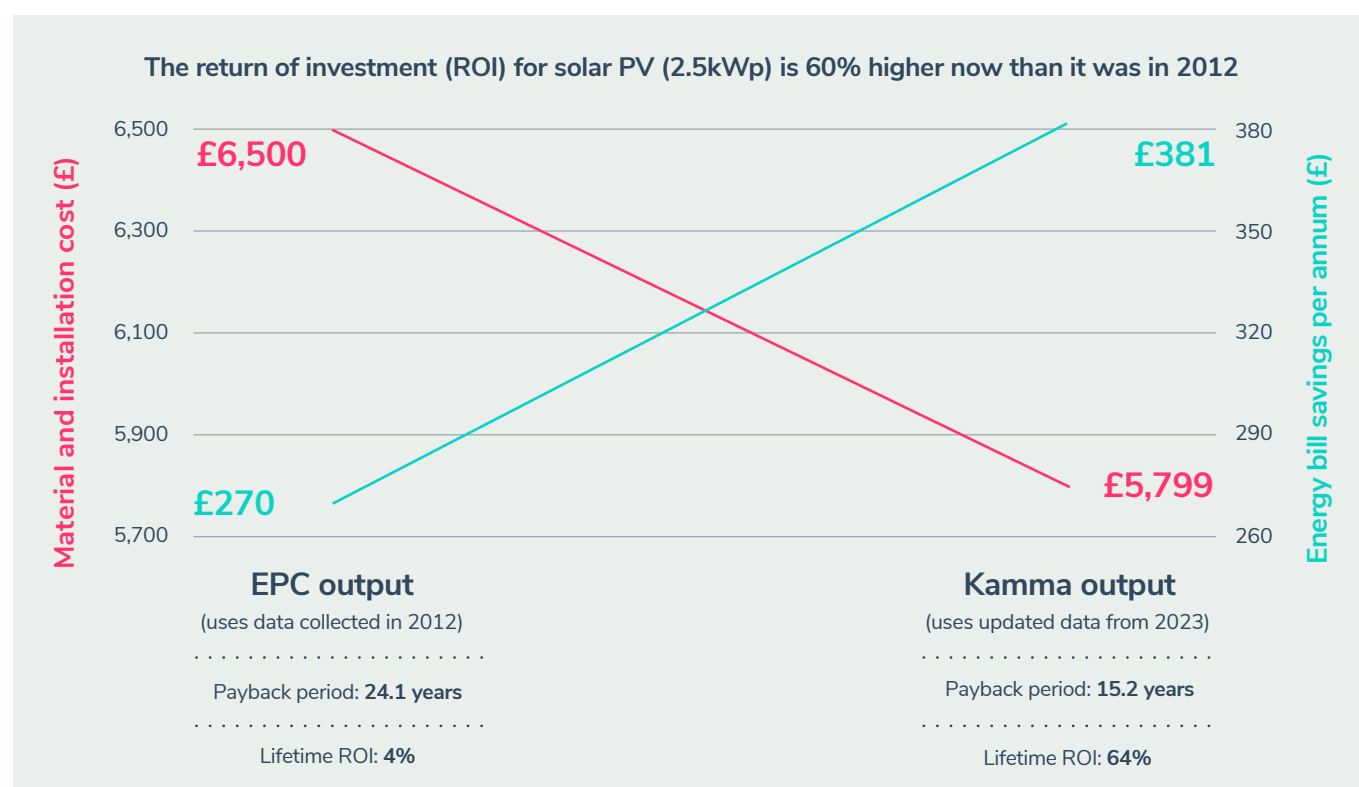
Yet most property data relies on Environmental Performance Certificates (EPC) that draw on inaccurate and obsolete information. The result: the impact of retrofits is misrepresented. The SAP 2012 methodology behind EPCs is over 10 years old, and while it may still be an acceptable method to assess the core efficiency of a property, it can misguide customers on other key data points.

This includes the cost and impact of retrofit solutions. EPC data ignores the impact of both technological development

and changing market forces over the last decade. As shown in the graph below, the growth of the solar industry has dramatically reduced the material cost of solar panels, as well as the time taken to recuperate this expenditure through energy bill savings. The rising cost of energy has also made it more important than ever to reduce consumption of gas and electricity from the grid, meaning solar panels now save customers more on their energy bills than they did previously. Overall, using up-to-date cost and fuel savings data paints a profoundly different picture of the expected return on investment (ROI) of retrofit works than the EPC.

Retrofit recommendations are also as old as the EPC. As EPCs last for 10 years, many of the newer improvements in the market are not included, and these are typically more cost effective. The EPC also recommends retrofit solutions in a methodological order, often suggesting more expensive options, such as wall insulation, ahead of cheaper ones, such as energy efficient lightbulbs and draught-proofing. These 'quick wins' can significantly improve the emissions performance of a property while being more widely accessible to consumers.

Falling costs and rising fuel prices have changed the business case for energy efficiency upgrades



Climate crisis as credit crisis: a summary of why lenders should care

The size and scale of the retrofit revolution will change the market.

New regulations, changing customer demands and investor preferences is shifting how lenders need to operate. Understanding and anticipating these shifts will separate winners from losers, presenting opportunities to become a market leader.

What are these huge shifts for the lending industry?

Challenges

Credit risk



The slow decarbonisation of UK housing stock, a major barrier to Net Zero goals, is now also a major credit risk as the energy crisis has dramatically increased the average cost of energy bills. Affordability is a major concern: Leeds Building Society have already started to include EPC ratings in affordability assessments¹⁹

Physical risk



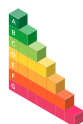
Over 5.2 million properties and businesses in the UK are already at risk of flooding²⁰, threatening a rise in mortgage delinquencies and shortfalls

Transition risk



Proposed government regulation targeting the Private Rented Sector (PRS) is the most punitive facing the entire built environment, with landlords needing £29 billion to improve properties up to the future minimum standard of EPC Band C²¹. Those that do not meet this standard will not be able to legally let their property, increasing risk of arrears on 63% of all Buy-To-Let (BTL) loans

ESG reporting



Lenders are now required to disclose climate-related financial risk and opportunities, meaning greater transparency, accountability, and an additional market differentiator for customers and investors

Opportunities

Increase drawdowns



Rise in energy costs and homeowners being priced out of moving both leads to more energy efficiency improvements to existing homes. This leads to increased lending, offsetting the slowdown in mortgage transactions

Protect asset value



Improving properties increases valuation, protecting LTVs from a potential fall in UK house prices

Grow market awareness



Customers are becoming increasingly aware that energy inefficient homes will be less attractive to new buyers, whereas efficient homes will attract a premium

Green premiums



Investment markets need to lower transition risk on green loans, and should seek to offer lower rates on securitised fundraising to those with greener back books or those using the proceeds to fund retrofit

Whether lenders choose to prioritise them or not, a combination of market and regulatory forces have ensured that climate issues now carry bottom line impact.

¹⁹ Leeds Building Society | ²⁰ Environment Agency | ²¹ Kamma

Capitalising on these opportunities creates reinforcing feedback loops, resulting in more value for lenders



The lender-customer conversation: more important than ever

The market has changed, and so too has the role of lenders.

At a time when energy bills are at an all time high, supporting customers is more important than ever before. Lenders have the funds required to deliver the retrofit revolution, and they also have the credibility. With a legacy built over many years of supporting customers to do more with their money, they are now in a position of trust.

Many of the ingredients needed to create this super tipping point already exist. The one missing is data.

Data can deliver the insight needed to help customers make greener decisions. Collected from multiple sources, deployed from a trusted source, and surfaced to the customer at the right time in the journey, it has the power to rapidly accelerate the decarbonisation of UK housing.

For lenders too, the case is strong. Deploying at scale not only increases drawdown amounts and improves the customer-lender relationship, it also de-risks back books against future legislation, reduces financed emissions now required to be reported by law, and delivers green assets to investors. It provides the work that the retrofit industry needs to develop economies of scale and further reduce cost. Data allows lenders to support customers to survive and thrive through the energy crisis today, and helps protect and grow their own lending in the climate-conscious market of tomorrow.

The tipping point to Net Zero starts here, for those with the insight to capitalise on it.

Contact us now to find out more about how **Kamma can support your business to manage, decarbonise and de-risk property-related assets**

Get in touch

How does Kamma help

Kamma works with mortgage lenders to drive the built environment to Net Zero. We combine world-leading data collection and address matching with insightful analysis to articulate the fastest and most cost-effective decarbonisation strategies. We ensure regulatory compliance, manage risk, identify green growth opportunities and qualify green assets.



Visit the site at

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