1.5 A SUSTAINABLE HOUSING MARKET: BUILDING AN INTEGRATED ECOSYSTEM FOR EUROPE'S HOUSING TRANSITION

By EMF-ECBC Secretariat

Europe's housing sector now sits at the intersection of some of the European Union's most pressing priorities: competitiveness, affordability, energy security, climate resilience and sustainable growth. As housing has climbed to the top of the European political agenda, the focus is no longer solely on increasing the pace of renovation, but on ensuring that Europe's housing stock becomes more affordable, more sustainable and more resilient.

This shift is reflected in the growing prominence of housing within the European policy agenda. Alongside the continued implementation of the European Green Deal and the revised Energy Performance of Buildings Directive (EPBD), the European Commission's Affordable Housing Plan and the forthcoming Affordable Housing Act demonstrate a growing recognition that access to affordable, energy-efficient housing is fundamental not only to achieving climate objectives, but also to strengthening Europe's competitiveness, economic resilience and social cohesion.

Housing and housing finance therefore have a central role to play in Europe's transition economy. Buildings account for around 40% of energy-related emissions in Europe, while more than 220 million homes require improvements in their energy performance if the European Union is to achieve its long-term climate and energy objectives. Delivering this transformation will require unprecedented levels of investment that cannot be financed through public funding alone. Private finance must therefore play a central role in supporting the renovation of Europe's building stock, reducing household energy costs, addressing energy poverty and improving housing affordability, while simultaneously supporting economic growth and job creation.

Today, residential mortgage lending represents almost half of EU GDP, making mortgage lenders uniquely positioned to support this transformation. However, experience over the past decade has demonstrated that finance alone is insufficient to stimulate renovation at the scale required. While access to financing remains essential, homeowners also need trusted information, practical guidance, reliable renovation professionals, consistent market standards and confidence that the investment they are making will deliver long-term value.

It was in response to this challenge that the **Energy Efficient Mortgages Initiative (EEMI)** was established.

Since its launch, the EEMI has progressively evolved from a market-led initiative promoting energy efficient mortgage lending into a broader market ecosystem bringing together financial institutions, investors, valuers, public authorities, SMEs, technology providers and consumers. Rather than focusing solely on green mortgage products, the Initiative seeks to create the conditions that enable homeowners to undertake renovation with confidence by strengthening cooperation across the entire housing finance value chain.

The objective is straightforward: to transform what is often a fragmented and complex renovation process into a more coordinated customer journey supported by common market standards, trusted information, innovative financing solutions and collaboration between all actors involved in residential renovation. In doing so, the Initiative contributes not only to Europe's environmental ambitions but also to wider objectives relating to affordability, financial stability, competitiveness and consumer protection.

Over almost a decade, this vision has progressively taken shape through a series of complementary initiatives. At its heart sits the **Energy Efficient Mortgage Label (EEML)**, which provides a recognised market benchmark for energy efficient mortgage products and establishes common standards for transparency and disclosure. Around this foundation, successive initiatives, including the LIFE-funded DeliverEEM and OSSential projects (see below for more details), are strengthening the technical, behavioural and operational components needed to support the large-scale deployment of sustainable housing finance across Europe.

This evolution reflects an important lesson emerging across the European renovation market: successful renovation depends not on individual products or isolated policy measures, but on an integrated ecosystem capable of supporting consumers throughout the entire renovation journey. Finance, valuation, technical advice, trusted renovation professionals, digital tools and public policy must increasingly operate as complementary components of a single market framework if Europe is to achieve its housing, climate and competitiveness objectives.

FROM VISION TO IMPLEMENTATION

To translate this vision into practical market solutions, the EEMI has progressively expanded beyond developing common market standards to supporting their implementation through collaborative European projects.

This evolution has enabled the Initiative to move from establishing principles and market frameworks towards delivering practical tools, methodologies and partnerships that support financial institutions, investors, valuers, SMEs and, ultimately, homeowners themselves. As a result, the EEMI is no longer simply promoting sustainable housing finance: it is actively building the market ecosystem needed to make it work in practice.

FROM FRAMEWORK TO IMPLEMENTATION: DeliverEEM

Having established the foundations of the Energy Efficient Mortgage Ecosystem, the next stage has been to strengthen the market infrastructure needed to support its large-scale deployment.

To this end, the EEMI launched **DeliverEEM – Delivering the Energy Efficient Mortgage Ecosystem**, a project funded under the LIFE Programme. Rather than creating a new initiative, DeliverEEM builds directly on the foundations established by the EEMI and the Energy Efficient Mortgage Label, helping to translate the ecosystem from a market vision into practical solutions capable of supporting financial institutions, investors, valuers, SMEs and consumers.

Since its launch in October 2024, DeliverEEM has generated important advances across several areas that are fundamental to scaling sustainable housing finance across Europe.

One of the project's principal achievements has been strengthening the analytical foundations of energy efficient mortgage lending. Working with financial institutions, DeliverEEM has successfully developed and validated data-driven methodologies for identifying EU Taxonomy-aligned residential assets, testing these using both representative sample portfolios and live mortgage books. Alongside this work, a European benchmarking exercise has established the basis for a transparent and replicable methodology capable of supporting wider implementation across European mortgage markets. Building on previous EEMI research, the project has also begun extending its analysis of the relationship between building energy performance and mortgage credit risk while incorporating forward-looking physical climate risks into financial modelling. These developments contribute to improving the understanding of both transition and physical risks associated with residential mortgage portfolios.

DeliverEEM is also strengthening the integration of **environmental, social and governance (ESG)** considerations into residential property valuation. Survey work undertaken across six European countries has confirmed growing recognition within the valuation profession of the importance of energy performance and climate-related risks, while identifying practical challenges relating to data availability and methodological consistency. These findings are directly informing the development of an updated EEMI Valuation Checklist and Guidance, supporting greater consistency in valuation practices across European markets.

Recognising that the transition depends not only on finance but also on the capacity of the renovation market itself, DeliverEEM is supporting SMEs through the development of the **Green Print Sustainability Pathway**. By providing structured ESG assessments, sustainability analysis and decarbonisation planning, the project is helping renovation professionals strengthen operational resilience, improve ESG performance and prepare for future market opportunities. This work contributes to building a stronger, more transparent and more resilient renovation supply chain capable of supporting homeowners throughout their renovation journey.

DeliverEEM also places particular emphasis on **generating and sustaining consumer demand**. Behavioural research undertaken with participating financial institutions has demonstrated that barriers to renovation are frequently behavioural rather than purely financial. While financing products continue to evolve, many households remain uncertain about where to start, which renovation measures to prioritise and whom to trust. Working directly with lenders, DeliverEEM has therefore developed practical behavioural solutions designed to improve customer journeys, strengthen advisory processes, enhance communication and support financial institutions in engaging more effectively with homeowners. These approaches are now being incorporated into participating institutions' business models and customer interfaces, helping to transform research findings into practical market innovation.

Alongside these activities, DeliverEEM continues to strengthen the Energy Efficient Mortgage Label itself. Through the annual review of the Harmonised Disclosure Template and ongoing work on the technical framework underpinning the Label, the project is ensuring that the Label remains aligned with evolving European legislation while maintaining the transparency, comparability and market confidence expected by lenders, investors and regulators alike.

Taken together, these activities demonstrate the continued evolution of the Energy Efficient Mortgage Ecosystem. DeliverEEM is not simply developing new methodologies or technical tools; it is reinforcing the market infrastructure needed to support sustainable housing finance at scale. By combining advances in risk analysis, valuation, disclosure, consumer engagement and supply-chain capacity, the project is helping to create the conditions in which sustainable housing finance can become an increasingly mainstream component of European mortgage markets.

OPERATIONALISING THE ECOSYSTEM: OSSENTIAL

While DeliverEEM is strengthening the technical and market foundations of the ecosystem, the next stage of its evolution focuses on bringing these developments closer to citizens.

To this end, the EEMI has secured further LIFE Programme funding through **OSSential**, a project commencing in October 2026 that seeks to operationalise the ecosystem through a new generation of One-Stop Shops (OSS). The project addresses one of the most persistent barriers to residential renovation: the fragmentation of the renovation value chain. Homeowners frequently face a complex landscape of technical advisers, contractors, financial institutions and public support schemes, making it difficult to navigate renovation projects with confidence.

OSSential seeks to overcome this fragmentation by bringing together actors from across the renovation value chain within a coordinated local framework. Recognising that "trust is local", the project places One-Stop Shops at the centre of the customer journey, enabling homeowners to access technical advice, trusted renovation professionals, financing solutions and information on available public support through a single, integrated entry point.

Building directly on the work undertaken through DeliverEEM, OSSential will also strengthen cooperation between local authorities, financial institutions, SMEs and other market participants. The project's Navigator will help consumers identify trusted renovation experts and financing partners, while drawing on the ESG guidance and market tools developed through earlier EEMI initiatives. Through demonstration activities in Parma, the project will test how this integrated approach can accelerate renovation while improving the customer experience and strengthening collaboration across the entire value chain.

Together, DeliverEEM and OSSential demonstrate how the EEMI has evolved from establishing common market standards to supporting their practical implementation. They reinforce the Energy Efficient Mortgage Label, strengthen cooperation across the housing finance ecosystem and contribute to creating a more integrated, transparent and consumer-centred market for sustainable housing finance.

THE ENERGY EFFICIENT MORTGAGE LABEL: THE FOUNDATION OF THE ECOSYSTEM

At the heart of the Energy Efficient Mortgage Ecosystem lies the **Energy Efficient Mortgage Label (EEML)**, launched in 2021 as a voluntary quality benchmark designed to promote transparency, consistency and confidence in the market for energy efficient mortgage lending. Building on almost a decade of work under the Energy Efficient Mortgages Initiative, the Label provides a common market framework that supports lenders, investors, regulators and consumers while encouraging greater harmonisation across European mortgage markets.

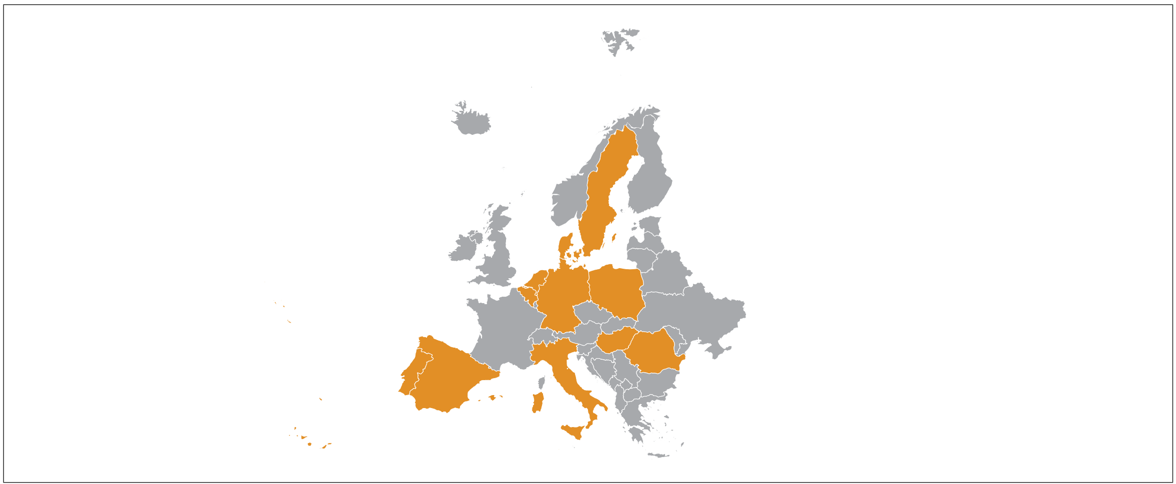
Developed using the internationally recognised Covered Bond Label as its blueprint, the EEML applies the same market-led philosophy of transparency, standardisation and self-certification. Through common disclosure standards and publicly available information, the Label enables market participants to identify energy efficient mortgage products that meet agreed market principles while supporting investor due diligence, reducing information asymmetries and reinforcing confidence in sustainable housing finance.

Today, however, the Label performs a broader role than simply recognising eligible products. It has become the common framework around which the wider Energy Efficient Mortgage Ecosystem continues to evolve. DeliverEEM strengthens its analytical foundations through improved methodologies, valuation guidance and disclosure practices, while OSSential extends these principles into the practical delivery of renovation support through trusted local partnerships. In this way, the Label acts as the anchor that ensures consistency, transparency and market confidence across the growing ecosystem.

The Label is built around the **EEML Convention** and a robust process of self-certification, supported by a governance structure comprising the Label Committee, the Label Secretariat and the Label Advisory Council. This governance framework ensures that the Label continues to evolve alongside market developments while preserving the transparency and credibility that underpin its success.

As of July 2026, the Label brings together **15 pioneering lending institutions from 9 countries**, demonstrating growing market acceptance across a diverse range of banking models, from large international lenders to regional institutions and FinTech platforms. This broad participation reflects increasing recognition that common market standards are essential for scaling sustainable housing finance across Europe.

> FIGURE 1: GEOGRAPHICAL BREAKDOWN OF EEM LABEL LENDING INSTITUTIONS



Source: EEM Label Data

KEY ELEMENTS OF THE ENERGY EFFICIENT MORTGAGE LABEL

Participation in the EEML is based on voluntary self-certification. Lending institutions wishing to obtain the Label commit to complying with the EEML Convention and to providing regular, transparent disclosure through the Harmonised Disclosure Template (HDT) or, where appropriate, the Harmonised Reporting Template (HRT) for retrofitting loans. These disclosures provide investors, regulators and other market participants with consistent information regarding labelled products, while supporting comparability across jurisdictions and strengthening confidence in the asset class.

The EEM Definition and the Label Convention

The EEM Definition, first introduced in 2018, establishes the principles underpinning the Label and provides the technical benchmark for determining eligibility. It defines Energy Efficient Mortgages as loans financing the purchase, construction or renovation of residential and commercial buildings that either meet recognised market best practice for energy performance or achieve a minimum 30% improvement in energy performance following renovation.

Evidence supporting eligibility is provided through a recent Energy Performance Certificate (EPC), complemented by an appropriate property valuation undertaken in accordance with the EEM Valuation & Energy Efficiency Checklist. Participating lending institutions further commit to providing regular disclosure through the HDT or HRT, ensuring ongoing transparency throughout the life of the labelled product.

Reflecting the dynamic nature of both European legislation and sustainable finance markets, the Label Committee continues to review and update the Definition and Convention to maintain alignment with developments such as the EU Taxonomy and the broader sustainable finance framework.

TRANSPARENCY THROUGH HARMONISED DISCLOSURE

Transparency remains one of the defining principles of the Energy Efficient Mortgage Label.

As sustainable finance continues to evolve, market participants increasingly require high-quality, consistent and comparable information. The Harmonised Disclosure Template (HDT) addresses this need by providing a common framework through which lending institutions disclose both portfolio-level and product-level information relating to their energy efficient mortgage activities. This facilitates investor due diligence, supports regulatory reporting and contributes to greater market transparency while helping to mitigate the risk of greenwashing.

The HDT also promotes greater consistency in the collection and management of mortgage, property and energy performance data, creating a common language across the European mortgage market. While maintaining a harmonised structure, the framework retains sufficient flexibility to accommodate national market characteristics through the work of National Coordinators and the annual review process undertaken by the Disclosure Working Group. This ensures that the template remains responsive to both market innovation and evolving regulatory requirements.

Recognising that sustainable finance regulation continues to develop rapidly, the HDT undergoes annual review. DeliverEEM contributes directly to this process, helping ensure that the Label remains aligned with emerging European legislation while preserving the transparency, stability and comparability that market participants expect.

> Figure 2: HDT data presentation on the EEML website

Source: EEM Label website: https://www.energy-efficient-mortgage-label.org/products

THE HARMONISED REPORTING TEMPLATE

Complementing the HDT, the Harmonised Reporting Template (HRT) provides a dedicated reporting framework for retrofitting loans that support improvements in the energy performance or environmental resilience of existing buildings.

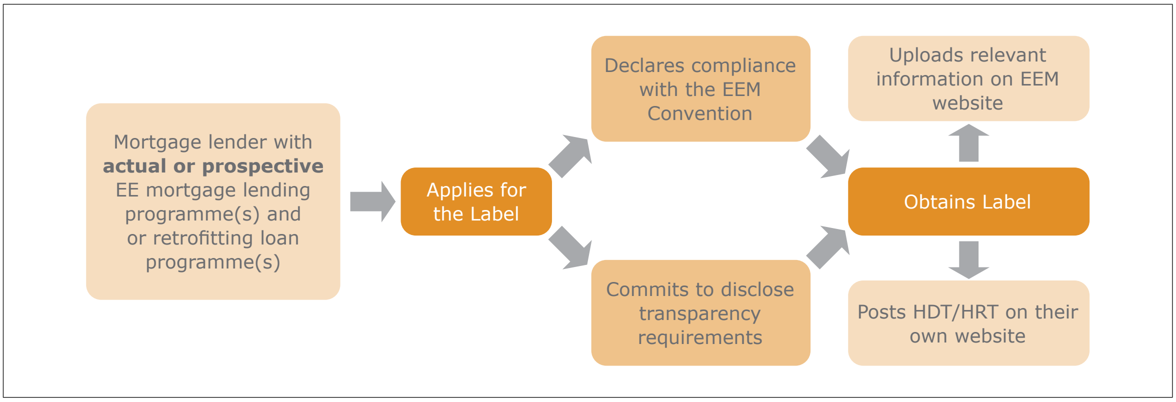
The HRT applies the same principles of transparency and standardisation while recognising the specific characteristics of renovation lending. By collecting consistent information relating to targeted loans, non-targeted loans and leasing products, it strengthens the market's understanding of financing dedicated to residential renovation and contributes to the continued development of sustainable housing finance across Europe.

SELF-CERTIFICATION: A MARKET-LED MODEL

As with the Covered Bond Label, the Energy Efficient Mortgage Label is founded on a process of self-certification.

Participating lending institutions declare compliance with the EEML Convention and commit to maintaining the transparency requirements established by the Label. Public disclosure through the HDT and HRT enables ongoing scrutiny by investors, rating agencies and other market participants, creating a market-led mechanism that reinforces credibility and significantly reduces the risk of greenwashing. In practice, the reputational importance of maintaining accurate disclosures provides a strong incentive for continued compliance and has proved an effective approach in supporting market confidence.

> Figure 3: EEM Label Self–Certification Process



Source: Energy Efficient Mortgage Label

CONCLUSION

The Energy Efficient Mortgages Initiative (EEMI) has evolved into one of Europe's leading market-led collaborations supporting the transition towards a more sustainable, affordable and resilient housing market. Over almost a decade, it has brought together financial institutions, investors, valuers, public authorities, technology providers, SMEs and consumers to develop common standards, practical tools and innovative solutions that strengthen the entire housing finance value chain.

This evolution reflects an important lesson emerging across Europe: achieving the housing transition is not simply about developing new financial products. While sustainable finance remains essential, successful renovation depends upon the interaction of many complementary elements, including transparent market standards, robust valuation methodologies, trusted renovation professionals, consumer engagement, behavioural insights and effective local delivery mechanisms. The Energy Efficient Mortgage Ecosystem seeks to bring these elements together within a coherent market framework capable of supporting homeowners throughout the renovation journey.

The Energy Efficient Mortgage Label provides the common foundation for this ecosystem, promoting transparency, comparability and confidence across the market. Building on this foundation, DeliverEEM is strengthening the analytical, technical and behavioural components needed to support the large-scale deployment of sustainable housing finance, while OSSential represents the next step by bringing these innovations closer to citizens through trusted local partnerships and integrated renovation support.

Together, these initiatives demonstrate how public policy, market innovation and private finance can work in partnership to accelerate Europe's housing transition. They also illustrate how the mortgage sector can contribute not only to climate objectives, but equally to improving housing affordability, reducing household energy costs, supporting economic competitiveness and strengthening long-term financial stability.

Yet, throughout this transformation, it is important to remember that the real decision-makers are homeowners themselves. Every renovation ultimately depends upon an individual or family deciding that improving their home is worthwhile. This decision must therefore be supported not only by appropriate regulation and public incentives, but also by clear information, trusted advice, accessible financing and confidence that the benefits will outweigh the costs.

The transition should not become the preserve of those households already able to invest in sustainability. On the contrary, it should create tangible benefits for those who need them most: families facing high energy costs, vulnerable households living in inefficient homes and citizens seeking greater comfort, resilience and affordability. Making sustainable housing both accessible and financially attractive is therefore fundamental to ensuring that the transition is socially inclusive as well as environmentally successful.

Indeed, our homes, the places where we raise our families, build our communities and shape our future, lie at the very heart of our economy. It is perhaps no coincidence that the ancient Greek word *oikos*, meaning "home", also forms the root of the word *economy*. A truly sustainable economy must therefore be built around the home, placing citizens at the centre of the transition and creating an ecosystem that promotes affordability, sustainability, resilience and long-term prosperity.

Through the Energy Efficient Mortgages Initiative and the wider Energy Efficient Mortgage Ecosystem, the mortgage and covered bond industries are helping to lay the foundations for precisely this new market paradigm. By combining market standards, innovation, transparency and collaboration across the housing finance value chain, the Initiative is contributing to a European housing market that is better equipped to meet the challenges of the future while supporting economic growth, financial stability and improved quality of life for citizens across Europe.