Unlocking Brussels' Rooftop Addition Potential

Concept note for a European project

1. Context & Problem Statement

In March 2026, Embuild.Brussels and Buildwise brought together around fifteen construction sector professionals — contractors, architects, structural engineers, public actors and sector federations — to explore the question of rooftop additions (*optoppen*) in Brussels. The workshop produced a strong consensus: the technical solutions exist, but the sector is held back by a critical absence of data and a lack of political strategy around the topic.

Like many European cities, Brussels faces growing housing pressure and must densify its built environment without consuming additional land. Rooftop addition (the vertical extension of existing buildings) offers a promising response: it can create new housing units and help finance deep energy renovation of the existing envelope, yet it remains largely underexploited. The barriers are not technical but regulatory, legal, fiscal and informational. Without reliable data on where the potential lies, it is impossible to convince decision-makers, identify priority zones or attract funding.

A 2011 Buildwise study estimated 3,000 housing units could be created through rooftop additions in Brussels, a figure widely considered a significant underestimate by sector professionals. Across Europe, some screening tools have been developed (Upfactor in France, optoppen.app in the Netherlands) and could be applied in Brussels and other European cities. Nevertheless, no tool combining potential mapping, structural pre-feasibility and an integrated financial model in a shared European framework has been identified.

2. What We Want to Do

We want to generate useful, actionable data on Brussels' rooftop addition potential, as a pilot case within a broader European project. The project would serve two complementary purposes: providing public administrations with a

decision-support tool to orient urban policies, and equipping the construction industry with the data needed to identify and develop market opportunities.

Project Ideas and Scope

One or several of the following components could be adressed depending on partners and available funding:

- **Mapping of rooftop addition potential**: a multi-criteria cartography of rehaussable buildings (regulatory, technical and market criteria), with simulation of potential under different regulatory scenarios
- **Standardised structural quickscan:** a lightweight feasibility diagnostic adapted to buildings without existing structural drawings
- **Interactive pre-feasibility web app**: a public tool allowing building owners and municipalities to quickly estimate the potential of a specific building
- **Integrated financial model, rooftop addition and energy renovation:** development and testing of a replicable economic model in which rooftop addition finances deep renovation of the existing envelope, adapted to different building typologies and ownership profiles
- **Permanent rooftop observatory:** a living tool updated automatically via open data and monitoring
- **Shared methodology development:** building a replicable framework applicable across different European urban contexts
- **Multi-city comparative study:** running the approach in parallel in several European cities to produce a shared benchmark

Potential Outputs

These are some of the outputs we have identified — the actual scope would be defined together with consortium partners:

- An interactive mapping of Brussels' rooftop addition potential as a European pilot case
- A benchmark of financial model replicable across different national contexts
- A shared methodology tested in multiple partner cities
- Practical tools such as a web app, quickscan or permanent observatory
- Direct contributions to affordable housing policies, energy renovation obligations and the objectives of the EU Renovation Wave and Green Deal

3. What We Are Concretely Looking For

We are looking to build a European consortium around this project. We are particularly interested in connecting with:

- A **project coordinator** with experience in managing European-funded projects
- Partners with **GIS and urban data expertise** in other European cities
- **Urban public actors** (cities, housing agencies) in other countries willing to serve as pilot cases alongside Brussels
- **Experts in energy renovation** and building performance to contribute to the integrated financial model
- **Construction sector actors** around Europe (federations, research centres) bringing an industry and knowledge-transfer perspective

The challenge of unlocking rooftop addition potential is shared by many European cities facing the same combination of housing pressure, ageing building stock and energy renovation obligations. A European project would therefore add value through a shared methodology, multi-city benchmarking and broader transferability of results.

The project aligns with key EU priorities: the European Affordable Housing Act, the Renovation Wave, and the Green Deal.

Partners Already Identified

Confirmed Brussels partners are Embuild.Brussels and Buildwise (construction R&D, expertise in timber construction, energy performance and digitalisation). The following actors have been identified as potential contributors to the pilot case but have not yet been approached: FARI/VUB (existing 3D model of Brussels, GIS expertise), CRR (geomatics expertise), Urban.Brussels, CityDev, SLRB and Brussels municipalities.

4. Contacts

Would you like to be involved ? Do you want to know more ? Do you have any insights to share ?

Contact us :

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Embuild.Brussels *is the federation representing Brussels construction companies, from structural works to finishing, across all company sizes. It supports its members on technical, regulatory and innovation matters, and acts as an interface between the industry and public authorities.*