

2020

Robust internal thermal insulation of historic buildings

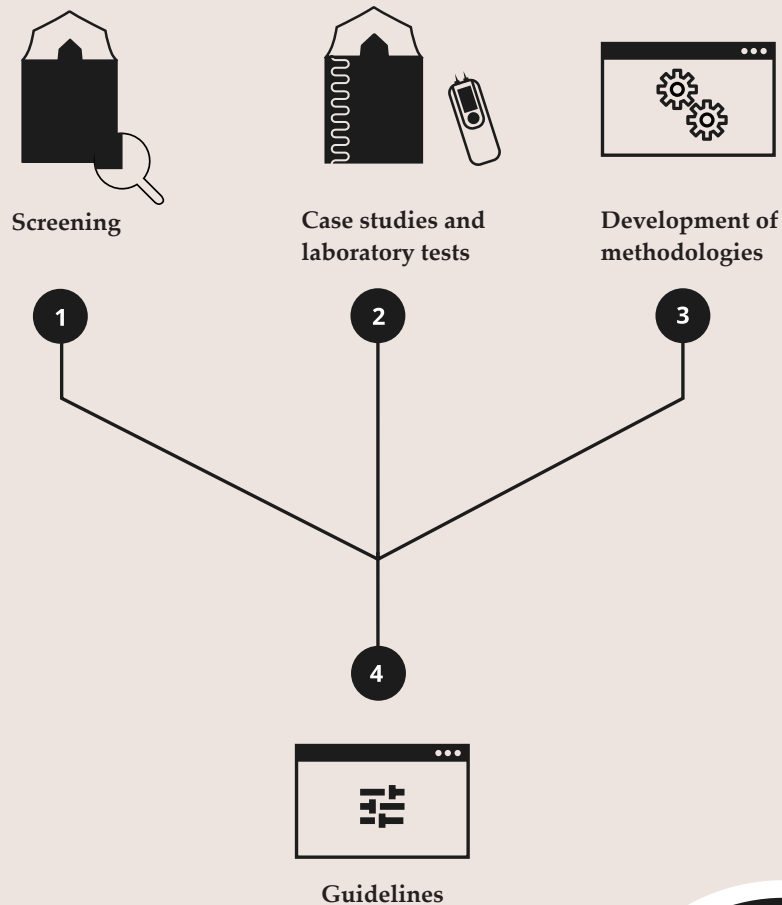


ERIKarkitekter



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5 goals with internal insulation:

- Decrease energy consumption
- Decrease environmental impact
- Decrease energy and other costs
- Improve indoor climate
- Loss of floor areas

RIBuild is an EU research project that develops guidelines on how to install internal thermal insulation with an acceptable safety level against deterioration and collapse of heavy external wall structures. The aim is to make historic buildings more energy efficient while maintaining their architectural and cultural heritage.

Why

Historic buildings built prior to 1945 make up a significant part of the European building stock. Most of these buildings have great architectonic and cultural value, but they also consume almost 40 % of the total energy consumption of buildings in Europe and is responsible for 36 % of CO₂ emissions. Therefore, historic buildings are an important focus area in order to reach the EU climate and energy targets.

How

Potentially 15-20 % of the total energy consumption in the building can be saved by installing internal insulation. However, internal insulation is a very complex measure involving several variables and risks with possible failures and high costs.

What

RIBuild summarizes the latest research on internal insulation in historic buildings. The www.ribuild.eu website presents an introduction to visual assessment of your building and an online checklist with useful knowledge, possible risks, and questions, that will help you to collect building specific data.

Research partners

RIBuild is an international research project across countries including ten research institutions and companies from Denmark, Sweden, Latvia, Germany, Belgium, Italy and Switzerland. Hence, RIBuild covers diverse climates and building traditions which will result in guidelines applicable to historic buildings all over Europe.

Practitioners

The guidelines are divided into two layers of knowledge; a website with brief introductions, guides, and videos addressing entrepreneurs, architects, building owners, craftsmen etc. and a written report presenting the latest findings and a more profound knowledge on internal insulation. Thus, anybody with an interest in building physics, internal insulation and energy efficient restoration can benefit from the guidelines and RIBuild webtool.