

ASHFIELD COTTAGE - HEREFORDSHIRE

High-quality cottage amongst beautiful Luston conservation area

Project Name: Ashfield Cottage

Company: Frame Technologies

Sector: Self Build

Technology: TechVantage™ S

Overview:

With limited funds and no construction experience, the homeowners-to-be approached Frame Technologies with their dream to build a three-bedroom cottage that would integrate naturally with nearby Tudor houses. Once the homeowners had secured a plot in their family garden, they appointed Frame Technologies to produce an affordable but high-quality cottage amongst beautiful Luston conservation area surroundings.

The Challenge:

Given the conservation area location, it was important to sensitively integrate Ashfield Cottage amongst other beautiful Tudor buildings – despite budget limitations. To develop traditional cottage aesthetics while remaining within budget, Frame Technologies applied small oak elements both internally and externally, including a light oak porch to create a natural-style entrance to the home. Frame Technologies made the best use of space by incorporating dormer windows and sloping ceilings on the first floor, both of which contribute to the commodious cottage design.

Achieving The Optimum Performance:

The mortgage provider stipulated a required energy rating of B, making insulation and airtightness key to the brief. Frame Technologies used the TechVantage™ S system, which uses a breathable wall principle and natural insulation. This system enabled Frame Technologies to construct the cottage self build on a budget while meeting the brief's requirements. Using recycled glass wool timber batt and a PIR liner board with full airtightness detailing and service battens to insulate the external walls, the system achieves an optimum U-value of 0.14 W/m2K.

To further achieve maximum thermal performance, Frame Technologies used tophung metal web floor joists and constructed the roof from glulam laminated roof purlins with double bob tail trusses, which are situated between the rafters to form the dormer roof area. Frame Technologies also inserted airtightness ribs during the construction phase and advised on sealing joints when adding further insulation to the interior. Having secured outstanding thermal properties, the homeowners will be able to make considerable savings on energy costs during the entire lifetime of the home, continuing their low-budget home plan indefinitely.

Partnership Approach:

The homeowners were keen to be involved in the build process of their family home but did not have any construction experience. Frame Technologies invited them on a factory tour to learn about the self-build process that their home would undergo, enabling them to contribute to the overall development.

The clients were delighted with the outcome:

“The team at Frame Technologies were great from start to finish. They



understood that I was completely new to the self-build process and were always happy to answer my questions and offer advice. We met with the team regularly throughout the design phase and were even invited on a factory tour to see our flat-packed house while it was being constructed. A number of people have stopped at the house to ask about who we used and I always point them in Frame Technologies' direction."