Design package for selfbuilders

German architect Nico Rensch has come up with an eco house design package which he believes is ideal for both selfbuilders and developers alike.

Now based in the UK, Rensch has spent the past four years researching and developing the Wunderhaus concept, which he claims performs exceptionally well while not compromising architectural integrety or aesthertic good looks.

"The Wunderhaus is energy positive, carbon negative, and has an EPC of 120, far better than most eco builds in the UK," he explains. "Not only has the house been designed to be as eco-friendly as possible but it is fast and simple to construct, taking just two weeks to erect the SIPs shell and make it watertight."

Wunderhaus won an international Red Dot award for 'design concept' in 2022 and was recently recognised under Paragraph 80 of the National Planning Policy Framework which allows for exemplar homes in open countryside otherwise considered unsuitable for housing.

"The way our business works is we sell a licence to developers or individuals for which we provide full construction and planning drawings/documents in order for the licencee to construct their house which we will certify as a Wunderhaus once built to our design/specifications," explains Rensch, who previously designed luxury homes for the super rich.

"We do not get involved with planning or construction but supply all the necessary drawings, specifications

and supplier list. We have a strategic partnership with suppliers for the main elements of the building so we can pass on preferential terms for the SIP structure, lighting, energy package, windows, cupboards and kitchen, staircase, sanitary ware, cladding, roof and flooring.

The Wunderhaus portfolio consists of three standard designs ranging in size from 87sqm to 300 sqm, with estimated design and build costs starting from just under £200,000.

"The bill of quantities is coming in at around £210/sq ft, including foundations and our licence fee (8.2 per cent of total cost), but excluding site services and landscaping." says Rensch. This price includes all materials and labour down to a full energy package, kitchen appliances, built-in cupboards and all finishes. The specification meets the Passivhaus Standard, generating more energy than it uses over a year, and is carbon negative.

"Wunderhaus architecture is innovative – not because of cleaving to a much-used, classic shape – but in the ways it reinterprets and optimises these proportions to suit the present day."
Nico Rensch

"Wunderhaus can be built by any competent construction firm or we can recommend an experienced and efficient team that can build the superstructure anywhere in the UK," says Rensch. The rest of the construction can be completed by local trades.

A Wunderhaus show home has been completed in Battle. (wunderhaus.co.uk)