HARKA ARCHITECTURE

Portland, Oregon



Key Metrics Acheived

Harka Architecture transformed a 1939 Art Deco office building into their Net Zero HQ.

GB

ENERGY

Installed rooftop solar system that provides more than 100% of the proposed energy needs.

CARBON

Attained 100% reduction in overall carbon emissions across scopes 1, 2, and 3.

CERTIFIED



Assessed in 2024 | Reassess by 2027

CERTIFIED



Assessed in 2024 | Reassess by 2027

Net Zero Strategies

Harka sought to create a space that would be educational for current and future clients.

Resource and spatial restrictions required the team at Harka to prioritize sustainability features that would yield the greatest reductions in site EUI and CO2e. The renovation posed unique challenges, such as air sealing a 680 square foot, 1939 stucco building and balancing aesthetics with high-performance strategies and low-carbon materials.

The design team was intentional about material selection, such as the 5.5" of hempwool ceiling insulation layered with 13" of cellulose (achieving an R-value of 66). Patrick Donaldson, the Principal Architect and Owner of Harka Architecture, emphasized their commitment to salvag-ing the lumber, trim, and lath and plaster walls from the existing building, a former dentist office. Additionally, they minimized the use of concrete and carefully selected new materials – opting for low-carbon and non-toxic options such as Gutex wood fiber boards for insulation, non-latex milk paint for the interior, and FSC certified lumber.

Harka installed an onsite renewable energy system (rooftop solar) that provides 123.6% of the proposed design site energy consumption, and their approach to the build-ing's design and materials selection was integral to their nearly 92% reduction in overall carbon emissions. To reach a 100% reduction, Harka purchased 1 tonne of carbon offsets for their embodied carbon under a 3-year commitment.



Get Started on the Journey





thegbi.org/journeytonz



Benefits of the Green Globes Journey to Net Zero

"We are founded on this idea of low carbon...that's our DNA. To get that recognition is important to the public and to be a participant is critical."

Patrick Donaldson, Principal Architect and Owner of Harka Architecture

GBI's Green Globes Journey to Net Zero is designed to meet building owners and portfolio managers where they're at, whether they're just beginning to implement energy and carbon emissions reduction strategies or have already made significant progress.

The assessment process provided a third-party, expert assessment of Harka's energy and carbon reduction strategies, highlighting the success of the firm's approach to sustainable, low-carbon architecture. With the help of their assessor and GBI's proprietary Net Zero Calculator, the data showed that the building exceeded their expectations for both metrics [Energy and Carbon].



info@thegbi.org