Basecamp

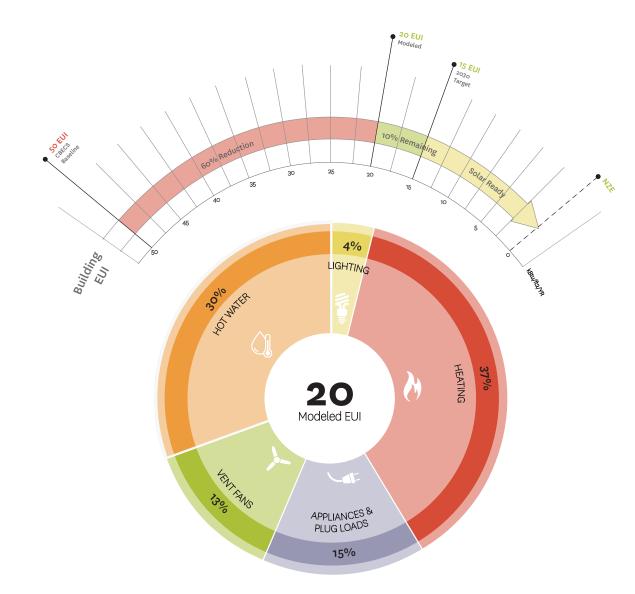
Sustainability Summary

Project Type: Multi-Family Residential

Location: Bend, Oregon **Built Area:** 62,950 SF

Scope: New Building, completed 2016 **Certification:** Earth Advantage Platinum

Architect: Hacker





Design Summary

Located in Central Oregon's high desert, Basecamp is a 25-unit townhouse project with 25 Accessory Dwelling Units, situated in the Mill District, Bend's premier burgeoning high density neighborhood. The unit layout and window placement create light-filled interiors with framed views of the surrounding landscape. The materials and color palette throughout the interior and exterior draw inspiration from the natural beauty of the high desert. The main exterior cladding retains the charred and weathered character of the site's sawmill origins, while the inset porches and balconies are lined in clear finished wood, revealing new life within.

Daylighting and optimal views of the outdoors are the most prominent elements driving the building's design. Thoughtful window placement and orientation balance the juxtaposition between oversize windows that enhance the indoor-outdoor experience and maintain privacy.

Key Sustainability Concepts

The design team sought to include a number of passive strategies for natural daylighting and ventilation in this project. The orientation and placement of windows was key. Optimal daylight in each unit helps reduce tenants' demand on electric lighting, and operable windows provide natural ventilation and reduce the demand on mechanical venting and cooling.

The high-performance envelope is the most significant sustainable design strategy used on this building, which incorporates R-23 wall insulation and R-49 roof insulation. Additional insulation is added to code minimum envelope assemblies in order to reduce the building's demand on mechanical heating in the winter and mechanical cooling in the summer.

Units also have high efficiency HVAC systems including gas fired 90% AFUE (Annual Fuel Utilization Efficiency) furnaces and tankless high-efficiency hot water heaters.

Water consumption is reduced with low flow plumbing fixtures throughout and the selection of native, drought resistant plants. This helps reduce the demand for landscaping irrigation.

Natural materials and finishes are used throughout Basecamp, inside and out. Local Douglas Fir lumber creates the structure of the building and cedar siding clads the exterior. Materials, finishes, paint and adhesives are all low VOC in order to promote a healthy indoor air environment.

While energy modeling was not done for this project, we are hopeful that post-occupancy utility bills will show a 60% reduction in energy consumption from the baseline