

4224 6th Avenue • Building #1 Renovation Lacey Campus

PROJECT SPECIFICS

GROSS SQUARE FOOTAGE CONSTRUCTION COST PROJECT OCCUPIED ENERGY SAVINGS WATER SAVINGS WATER RECYCLED ADDED LEED COST

INCENTIVES

LEED PAYBACK CO₂ SAVINGS 51,892 SF \$9,168,357 JULY 2015 \$ SAVED AND MMBTUS \$ SAVED AND GALLONS TONS / \$ \$ FOR CONSTRUCTION AND FEES / % OF CONSTRUCTION \$ RECEIVED FROM UTILITIES AND OTHER # YEARS PAYBACK ## TONS

DESIGN-BUILD PROJECT TEAM

OWNER'S REPRESENTATIVE

PROJECT MANAGER ARCHITECT STRUCTURAL ENGINEER MECHANICAL CONTRACTOR ELECTRICAL ENGINEER ELECTRICAL CONTRACTOR ACOUSTICAL ENGINEER TELECOMMUNICATIONS INTERIOR DESIGN SUSTAINABILITY SPECIALIST DEPARTMENT OF ENTERPRISE SERVICES, STATE OF WASHINGTON YELENA N. SEMENOVA KMB DESIGN GROUP AHBL MACDONALD-MILLER INC AULT ELECTRIC CO INC CROSS ENGINEERS, INC THE GREENBUSCH GROUP INC HARGIS ENGINEERS INC GS INTERIORS INC INVENTRIX ENGINEERING INC



PROJECT DESCRIPTION

From the onset of the project, the overall goals and parameters of the project have focused on the programmatic elements of the project, converting the existing leased office space into a new, dynamic center for student learning and business enterprise. Section 8 of the Lacey Campus Development Plan stated the design should "focus on capital investment on replacing deficient systems, correcting any code and/or life safety requirements and transforming the former multi-tenant office building into the envisioned "entrepreneurial center and higher education campus".

The existing office structure was previously subdivided for multiple tenants with a total area of 48,589 square feet. Building #1 will provide a mix of computer lab/ classrooms, offices and conference rooms for the South Puget Sound Community College. In addition, the facility will accommodate office and conferencing space for Thurston Economic Development Council (EDC).

The two agencies as end users resulted in a collaboration of individuals as one team to provide a seamless flow and usage of all rooms for their needs. The mission had been accomplished successfully providing the state-of-the-art audio and visual equipment, sound proof conference and meeting rooms, and a friendly environment for staff, workers, and students.

Although the project did not register to achieve LEED Silver Standard, the Team had moved forward and achieved many of the other aspects of the LEED design and construction criteria outlined in the following categories listed on the following page.

SUSTAINABLE FEATURES

SUSTAINABLE SITES

- The project involves the renovation of a building on a previously developed site and is located in a high density area of the City of Lacey with several nearby multi-story buildings. (SSc2)
- The project is located across the street from a major public transit center (SSc4.1)
- Striping and signage for fuel-efficient and carpooling parking is provided near the front entrance to the building (SSc4.3)

WATER EFFICIENCY

Initially, the team's proposal included the replacement of all plumbing fixtures in the building including toilets, urinals, sinks, and drinking fountains with low-flow fixtures and sensors throughout. However, during field investigations of existing conditions, it was discovered that the existing water line was under-sized at 3-inches in diameter. The feasible approach was to install wall-hung fixtures instead of floor mounted units reducing the cost and achieving for daily sanitary cleaning and long-term maintenance reasons.

ENERGY AND ATMOSPHERE

- The project includes a "hybrid" system. High efficiency rooftop air handlers (Aaon units) serve the large assembly space in the front of the building and the open office areas occupied by the EDC and College administration. Standard efficiency roof-top air handlers (Trane units) make up the bulk of the system and serve the classrooms, computer labs, and circulation areas. This system is anticipated to achieve a 25%-26% improvement in energy performance over the standard baseline performance stablished by the Washington State Energy Code.
- An Enhanced Building Commissioning process was put in place to conduct pre-commissioning meetings and regular commissioning observations. (EAc3)
- A Mechanical and Ventilation Plan was developed for the project as a component of the commissioning efforts. The plan covers for at least one full year of occupancy. (EAc4)

MATERIALS AND RESOURCES

- Most of the exterior structure was salvaged during construction including the roof structure, roof sheathing, exterior wall framing, and exterior sheathing (MRc1.1)
- The Construction Waste Management Plan was developed. Nearly all of the demolished materials were salvaged for recycling by placing the materials in co-mingled containers and delivered to a recycling center. (MRc2)
- The use of regional and recycled materials will exceed the 10% threshold for each credit. Local materials included concrete, masonry, reinforcing steel, rigid foam insulation, and skylights. Recycled materials include reinforcing steel, steel wall framing, batt insulation, hollow metal doors and frames, and carpet.

INDOOR ENVIRONMENTAL QUALITY

- Indoor Air Quality Plans were developed for the construction process and the pre-occupancy process. During construction the HVAC equipment was sealed, dust was kept to a minimum, routine house cleaning took place. For preoccupancy a building flush-out process is current being coordinated with the project schedule. (IEQc3.1 and IEQc3.2)
- Project specifications include provisions for low-emitting materials including interior adhesives, mastics, sealants, paint, carpeting, and composite woods. Carpeting will met the Carpet and Rug Institute Green Label Plus Program. (IEQc4.1, 4.2, 4.3, and 4.4)
- The building consists of 33 different zones controlled by individual air handlers. This allows for localized, individual control of the units. (IEQc7.1)
- A thorough analysis was conducted for daylighting and views for new windows installed. (IEQc8.1 and 8.2)

INNOVATION AND DESIGN

- Achieved exemplary performance for recycled and salvaged materials as part of the Construction Waste Management Plan.
- The College has already incorporated Green Cleaning Plans at other sites that could be adapted to the site.

In summary, the project was designed and constructed to the LEED Silver Standard and met sustainability goals of the State and the users by retaining most of the LEED strategies during the construction process.

