

Sheriff's Office HVAC Upgrade
MECHANICAL DESIGN

Owner/Client:
Marion County
100 High Street NE
Salem, OR 97301
Bob Hutchenson (503) 588-5154

Project Start: June 1996
Project Finish: August 1998
Facility Type: Courthouse
Building Age: Built 1954
Construction Cost (Total): \$214,802
Engineering Fees: \$11,715
Project Size: 12,500 square feet

EESI Staff Involved: Jim Cook, Fred Shaub, & Ron Phelps.

Project Description: The basement Sheriff's Offices and detention areas had inadequate ventilation and minimal air conditioning. EESI was commissioned to provide new design and construction management services for Marion County Courthouse Sheriff's Office HVAC Upgrade Renovation.

EESI provided engineering design of new rooftop HVAC equipment and air distribution system for Marion County Sheriff's Office and holding cells within the downtown courthouse located in Salem, Oregon. HVAC upgrade also included small cafeteria, kitchen, and dining facility.

EESI provided engineering supervision during the construction phase of this project. This project involved an extensive overhead air distribution system. Installation was accomplished in occupied spaces with minimal impact on occupant usage and security.

**Health Service Building, Jail, Parole, & Probation Office
HVAC UPGRADE**

RENOVATION

Owner/Client:
Marion County
100 High Street NE
Salem, OR 97301
Bob Hutchenson (503) 588-5154

Project Start: August 1999
Project Finish: December 2002
Facility Type: Government
Building Age: Jail Built 1987
Health Services Built 1973
Parole & Probation Built 1998
Construction Cost (Total): \$202,000
Engineering Fees: \$19,090
Project Size: MCCF* 220 square feet
Health Services 370 square feet
Parole & Probation 6,845 square feet

EESI Staff Involved: Fred Shaub, John Wallin, Peter Sanford, and Ron Phelps.

Project Description: Included design HVAC upgrades for three projects:

Health Service Building:
New independent air conditioner for file server (computer) room.

*Marion County Correctional Facility (MCCF):
New independent air conditioner for Jail Intake control room.

Marion County Parole & Probation Offices:
Total renovation of HVAC system, including air distribution to correct comfort deficiencies. Two major deficiencies from the design/build by others:

- ∇ Undersized HVAC units
- ∇ No outside air intakes

Replace design/build air distribution system consisting of flex duct with sheet metal ducting and addition of air conditioning units. The original system had inadequate HVAC equipment sizing and lack of outside air introduction per UBC Chapter 12 Code Compliance. Also provide construction management services.

**Courthouse Square Transit Mall
COMMISSIONING**

NEW BUILDING - - - LEED CERTIFIED

Owner/Client:
Salem Area Mass Transit / Marion
County
3140 Del Webb Avenue NE
Salem, OR 97303
David Kussman (503) 588-2424

Project Start: December 1999
Project Finish: December 2001
Facility Type: Transit Mall
Building Age: Built 2000
Construction Cost (Total): \$20,120,000
Commissioning Fees: \$60,880
Project Size: 153,293 square feet

EESI Staff Involved: Fred Shaub, Steve Barney, Alan Wright, Dan Pullen, and Pete Sanford.

Project Description: The Courthouse Square Transit Mall facility is a modern 5 story office building with basement parking. The facility encompasses about two-thirds of a city block in downtown Salem, Oregon with approximately 50 percent of the ground level area serving as the mass transit bus transfer station.

The following systems, including all components and controls, were commissioned by EESI:

- Central building automation systems, including linkages to remote monitoring and control sites.
- All equipment of the heating, ventilating, and air conditioning systems.
- Life safety systems (fire alarm, egress pressurization, fire protection, etc.)
- Emergency power and uninterruptible power supply (UPS) systems.
- Lighting control systems (included lighting sweep controls).
- Domestic water systems.
- Security & CCTV systems.
- CO monitors.