



## CHILDREN'S AND WOMEN'S MENTAL HEALTH FACILITY



### PROJECT TEAM

|                             |  |
|-----------------------------|--|
| <b>Owner:</b>               | Provincial Health Services Authority     |
| <b>Architect:</b>           | IBI Group/ Henriquez Partners Architects |
| <b>LEED Consultant:</b>     | Stantec Consulting Ltd.                  |
| <b>Mechanical:</b>          | Stantec Consulting Ltd.                  |
| <b>Electrical:</b>          | Stantec Consulting Ltd.                  |
| <b>Landscape Architect:</b> | Durante and Kreuk Ltd.                   |
| <b>General Contractor:</b>  | Smith Bros. & Wilson (BC) Ltd.           |
| <b>Commissioning Agent:</b> | Stantec Consulting Ltd.                  |

### PROJECT NARRATIVE

The original 1947 Jean Matheson Memorial Pavilion at BC Children's and Women's Hospital campus was adapted to support the needs of the new Children's and Women's Mental Health building. The renovated historical building now serves children and adolescents with serious mental health challenges from across the province. They can easily access services such as emergency care, long-term psychiatric care, outreach and eating disorder programs, as well as a women's reproductive mental health program.



This 69,000 square foot (6,400 m<sup>2</sup>) building provides 36 in-patient beds for psychiatric programs and care, as well as out-patient clinics, a child and adolescent psychiatric emergency unit, outreach services, specialty clinics, an eating disorders program. The building also houses education, administration and academic space at the BC Children's and Women's Hospital campus.

The innovative project was a joint venture between the architectural firms of Henriquez Partners and the IBI Group. The design was targeted as a LEED Silver Building, and as such, included some of the following green initiatives:

Features include:

- New interior and exterior interventions with modern character and visual interest consistent with the Ambulatory Care Building
- New windows and entrances
- New mechanical and electrical systems, elevators, seismic upgrading
- Single occupancy bedrooms, group and play therapy rooms, activity areas, and outdoor play areas

The new design preserved the pavilion from major demolition, thus reducing landfill and maintaining a sense of historic continuity on the hospital campus. As a result, the \$14.5 million construction cost was much lower in comparison to a new structure.

Sustainable features implemented in the reuse of the existing structure include many energy savings measures such as a radiant heating/cooling system, displacement ventilation, high efficiency luminaries and occupancy controls, as well as low VOC paints and finishes, water efficient fixtures, materials recycling and construction waste management.

In particular:

- The existing building was diverted from landfill and new resources were not required to construct a new building.
- Level-Right flooring was selected for its low VOC emissions and recycled material content.
- An innovative slab system, Bubble Deck was used for the new additions on the project. This floor system reduces the weight of the slab by 40% resulting in less material use, and reduced gravity and seismic loads.
- Radiant heating/cooling system with a humidified outdoor air ventilation system, which will operate at higher efficiency than conventional cooling system.
- HCFC free chillers were installed for ozone protection.
- Water efficient plumbing fixtures were installed.
- Electrical outlets were installed in the parking lot close to the building for alternative fuel vehicles.
- High efficiency direct/indirect fluorescent luminaries were installed to provide energy efficient, comfortable lighting in offices and administration areas.
- Individual sensors in each of the private offices and administration staff areas were installed to ensure that the artificial lighting is automatically de-activated when the room is unoccupied. Further energy savings are realized by the provision of two manual override switches in each office to enable the occupant to adjust the lighting in the room to his or her own comfort level, and enabling further reduction of energy used for artificial lighting when sufficient daylight is available.

Construction began in March 2005 and the facility officially opened in December 2006.

