

The Common Roof™ is a sustainable, affordable and highly visible facility that enhances the mission of partner organizations, allows efficient use of precious resources through shared space, services and infrastructure, and provides opportunity for cross organizational and cross sector collaboration. Supplying clean energy efficient air for a healthy environment in this building will strengthen the social programs offered while benefitting clients, service providers and community members therein.

# The Living Wall

**What** The Living Wall is a vertical hydroponic green wall containing specifically selected plants such as ferns and orchids. This interior plantscape effectively removes common indoor contaminants and improves conditions of the living environment. Air is forced through the green wall of plants and specialized biological components which degrade the air pollutants into their benign elements of water and carbon dioxide. The clean cool air is then distributed throughout the space by a mechanical ventilation system.

**Why** Indoor air quality is compromised by the off-gassing of materials, items, building residents and the activities within from chemicals such as VOCs, volatile organic compounds; which if accumulated can greatly reduce the well-being of the occupants. Supplying good quality outside air to the indoors requires heating or cooling to meet the comfort needs of building occupants and represents substantial energy costs as between 20 and 30% of building energy consumed is used to condition the outside air for ventilation.

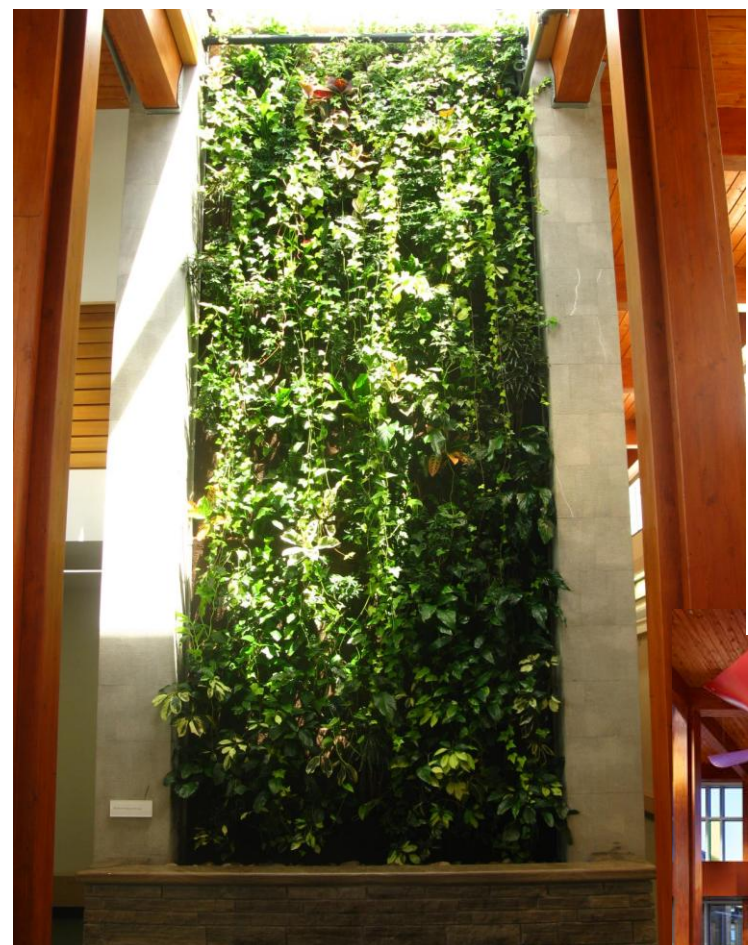


## Energy Benefits

- An alternative means of “refreshing” air without bringing new expensive outside air in
- Substantial energy savings; potentially generating clean ‘fresh’ air for 10% of energy as normally required to bring the same amount of outside air inside

## Health Benefits

- The Living Wall system can remove indoor contaminants like VOCs, known to affect occupant health, linked to poor air quality and sick building syndrome
- Lowers concentrations of dust, fungal spores and airborne bacteria
- Increases productivity and reduces absenteeism, saving between \$15,000 and \$45,000 per year or 20- 60% of air quality related absenteeism for 100 staff people. Based on absenteeism rates of 10 days per person per year (StatsCan) of which 30% is air quality related
- Walls covered in plants reduce noise
- Removes contaminants in aesthetically pleasing manner; requires limited floor space
- Greening the indoor space has psychological impacts on building occupants and their well-being; reducing stress, fatigue, sore throats, coughs, dry skin...



**The Nedlaw System: An Active Living Wall has been selected for installation in the Orillia Common Roof. Nedlaw Living Walls can enhance the value and performance of buildings with clean air, naturally.**  
Visit: [www.nedlaw.ca](http://www.nedlaw.ca)



 **the common roof**  
Together, for the common good.

[www.thecommonroof.ca](http://www.thecommonroof.ca)