Sustainable Solutions

"To provide sustainable engineering solutions to our clients with creativity, accountability and resolve."

Sustainable Solutions

Statement of Qualifications

About Us

Our Mission:

"To provide sustainable engineering solutions to our clients with creativity, accountability and resolve."

The team of Sustainable Solutions believe that the needs of the present can be accomplished without comprising the ability of future generations to meet their own needs. The challenges as they relate to engineering are complex and the solutions not simple. Sustainable Solutions embraces these challenges.

To achieve the best possible outcome for its clients, Sustainable Solutions recognizes the need for a collaborative integrated approach to engineering and design. Sustainable Solutions will strive to accomplish a true partnership that will integrate all members of the project team. It is this philosophy that drives them to find engineering solutions that are not only creative, effective and flexible, but also sustainable.

Our Strengths and Interests

The team at Sustainable Solutions embody a wealth of strengths and skills including project management, problem solving, communication and adaptability. As a group, Sustainable Solutions approaches every project with a positive, forward thinking attitude, organization, and leadership. Sustainable Solutions has a keen interest in green buildings, the LEED rating system, and sustainable urban planning practices incorporating energy efficiency, water and waste water treatment systems. Other interests of the group include building envelope practices, architecture and photography.

Sustainable Solutions

Memorial University of Newfoundland
Faculty of Engineering and Applied Science
St. John's, NL

Email:
sustainablesolutions.nl@gmail.com
Phone:
(709)765-3126

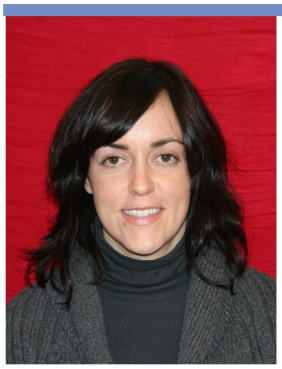
Catherine Comerford

Catherine Comerford is a senior civil engineering student studying at Memorial University. Through her six work terms and academic choices, Catherine has developed a range of skills and experience in a variety of fields including project management, environmental, and sustainment engineering. Her love of both structures and the environment has driven her focus on "green" buildings and sustainable design.

Catherine's project experience includes:

- Completing Phase I of the Vegetation Management Study's reliability analysis involving system reliability and tree maintenance relationships as a sustainment engineer for Hydro One Networks in Toronto, ON,
- Managing several projects with respect to new building installations, building upgrades, and building removals for Building Engineering Services at Aliant Telecom. These projects included preparing contract and tender documents, monitoring and enforcing the progress, and budgeting of each project, and
- Catherine's design and drafting experience includes upgrades to existing dam and spillway structures for Newfoundland Power as well as structural elements of accommodation units for remote Aliant sites in Labrador based on specific requirements and limitations.

Lesleigh Sturge



Lesleigh Sturge is a senior Civil Engineering student attending Memorial University of Newfoundland. Over the course of the civil engineering program Lesleigh has gained valuable experience in various fields including municipal, geotechnical, project management, environmental and consulting engineering. Motivated by environmental ethics, Lesleigh is interested in pursuing research, development, and construction of sustainable buildings under the principles of the Leadership in Energy and Environmental Design (LEED) philosophy.

Lesleigh's project experience includes:

- Coordinating the sustainable building documentation and collection for platinum, gold and silver LEED targeted buildings under the New Construction & Major Renovations LEED rating system for Dominion Construction. Lesleigh developed a company wide Dominion Sustainable Building and LEED Reference Guide.
- Conducting environmental site assessments, conducting indoor air quality testing, reporting, designing retaining walls, and conducting quality assurance of various geotechnical projects for Levelton Consultants.
- Assistant in the development of The Leak Detection Program, water auditing, conservation techniques for regional water supply, assisted in the preparation of water and sewer implementation for various

Shawn Varghese

Shawn Varghese is in the final term of his Bachelor of Civil Engineering at Memorial University. Shawn was exposed to his major area of interest, Building Envelope science, during his work term with K&P Contracting and Heat Seal Ltd. He furthered his experience in this area with the Building and Facilities division of Morrison Hershfield Ltd. in Vancouver. Following graduation, Shawn would like to pursue further experience in Building Envelope science.

Shawn's project experience includes:

- Reviewing R-2000 homes slated for construction using the HOT2000 computer aid,
- Performing various on-site building envelope tests (ie. Window Tests, BASF insulation tests) on high-rise and wood frame structures, and
- Performing a Building Envelope Condition Assessment on a multi-building complex for BC Housing.

Sarah Wilson

Sarah Wilson is in her final term of civil engineering. Throughout her program she has focused on environmental areas such as assessment, remediation, monitoring, and water/wastewater management. Sarah has a great interest in responsible building practices extending into urban and suburban planning. Once she has gained experience in civil engineering Sarah would like to study architecture.

Sarah's project experience includes:

- Determining best approach to division of a water distribution system pressure zone into three smaller District Metered Areas (DMAs) for the City of St. John's and following up with a work plan, cost estimate, and final report,
- Laboratory bench scale testing of process streams in the CVRDInco Demonstration Plant in Argentia for flocculent settling rate and stream viscosity including the writing of an instruction manual for the DV-III Ultra Rheometer, and
- Phase I ESA writing, environmental monitoring, field work coordination, project scheduling, and proposal writing on work terms with Jacques Whitford in Halifax and PWGSC in Argentia.