The Geological Survey is active in a wide range of geotourism and geoheritage projects throughout the Province. Many of the geotourism projects are collaborative with colleagues at the Department of Business, Tourism, Culture and Rural Development, as well as with local partners and stakeholders on a variety of geotourism projects, including the Aspiring Discovery Geopark on the Bonavista Peninsula and the Aspiring Cabox Geopark in the Bay of Islands region.



Figure 2. Aerial view from Mount Patricia on the west coast of Newfoundland, looking to the South with the City of Corner Brook in the background. The area pictured forms part of the proposed Cabox aspiring Geopark.

In collaboration with the Aspiring Cabox Geopark, the geological survey is involved in the Northern Peripheries and Arctic Region Project entitled – "Drifting Apart". This project supports the development of new and aspiring Global Geoparks, the promotion of innovative products and services for social and economic prosperity and to continue to build a strong network of geoheritage destinations in the Northern Periphery and Arctic Region. As part of this project the Survey produced drone imagery, panoramas and 3D models.



Figure 1. Aerial view from Blow-me-down Mountain on the west coast, looking to the North. The area pictured forms part of the proposed Cabox aspiring Geopark. The imagery was collected as part of the Survey's commitment to the Drifting Apart project.

Over the last several years, the Survey has supported the bid for Mistaken Point to become a United Nations Educational, Scientific and Cultural Organization (UNESCO) World Heritage Site. Fossils found at the site are the oldest, large, architecturally-complex, multicellular life forms found on Earth and represent the remains of soft-bodied creatures that lived 560 to 580 million years ago (Ediacaran Period). This June, the coastline of Mistaken Point Ecological Reserve was inscribed as a World Heritage Site by the UNESCO. This is the first provincially-managed World Heritage Site in Newfoundland and Labrador.

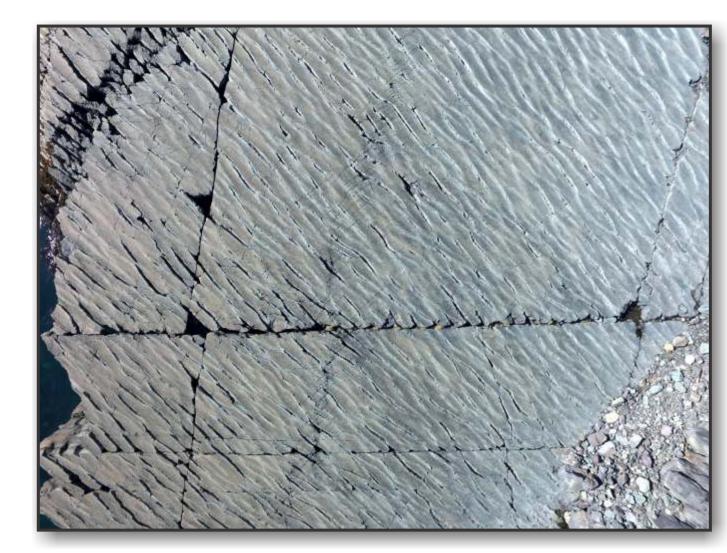


Figure 3. Aerial view of the E surface at the newly inscribed Mistaken Point UNESCO World Heritage Site. This surface preserves abundant Ediacaran fossils in ancient volcanic ash beds.

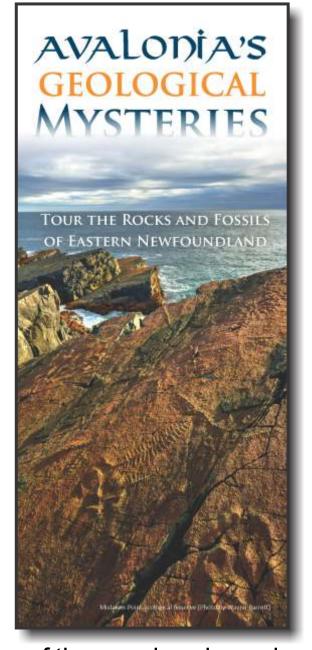


Figure 4. Cover of the new brochure developed by the Eastern NL Geological Network to promote the geological story and assets of Eastern Newfoundland.

This year also saw the development of the Eastern NL Geological Network which is a partnership between Bell Island Community Museum and #2 Mine, Discovery Aspiring GEO Park, Fortune Head GEOLOGY Centre, Johnson GEOCENTRE, Manuels River Hibernia Interpretation Centre, Mistaken Point, and the St. Lawrence Miner's Museum. The purpose is to undertake cooperative efforts to ensure the sustainable development and promotion of the geological story for eastern Newfoundland. To this end a brochure connecting the sites was produced entitled "Avalonia's Geological Mysteries" and was distributed throughout the province.



Figure 5. Aerial view of the Bonavista Peninsula, looking to the South, with the Bonavista Lighthouse in the foreground. The lighthouse area is part of the Bonavista! Geological Tour Through Time App.

The Survey has continued developing projects utilising our drone (UAV) to capture high quality imagery of our provincial geoheritage sites. This video and picture data will be used in a variety of ways; from developing apps to creating new digital access to the geology of the province. We plan to add a layer to our digital atlas that allows user to view videos of select geoheritage sites. We anticipate releasing a new app highlighting the geological heritage of the Bonavista Peninsula entitled "Bonavista! Geological Tour Through Time".



Figure 6. Ediacaran fossil preserved in front of the board walk in front of the factory in Port Union. This site forms part of the proposed Discovery Aspiring Geopark and will also be included in the new app for the region.