
**Dinosaurs, deserts and volcanoes: the creation of a series
of paintings depicting scenes from the Mesozoic Fundy
Basin of Nova Scotia and New Brunswick**

ROB FENSOME¹, JUDI PENNANEN², TIM FEDAK³,
ANDREW MACRAE⁴, PAUL OLSEN⁵, JOHN WADE⁶,
GRAHAM WILLIAMS⁶, KEN ADAMS⁷, JENNIFER BATES⁶,
DAVE BROWN⁸, HOWARD FALCON-LANG⁹,
KATHY GOODWIN⁷, RANDY MILLER¹⁰,
GEORGIA PE-PIPER⁴, AND DEBORAH SKILLITER¹¹

1. *Natural Resources Canada, Geological Survey of Canada
(Atlantic), P.O. Box 1006, Dartmouth, NS, B2Y 4A2
<rfensome@nrcan.gc.ca>* ¶ 2. *44 Queensbury Drive, Quispamsis,
NB, E2E 4W3* ¶ 3. *Department of Biology, Dalhousie University,
Halifax, NS, B3H 4J1* ¶ 4. *Saint Mary's University, Halifax,
NS, B3H 3C3* ¶ 5. *Lamont-Doherty Earth Observatory of
Columbia University, Palisades, New York, 10964, USA* ¶
6. *Natural Resources Canada, Geological Survey of Canada
(Atlantic), P.O. Box 1006, Dartmouth, NS, B2Y 4A2* ¶ 7. *Fundy
Geological Museum, Two Islands Road, Parrsboro, NS, B0M 1S0* ¶
8. *Canada-Nova Scotia Offshore Petroleum Board, 6th Floor TD
Centre, 1791 Barrington Street, Halifax, NS, B3J 3K9* ¶
9. *Department of Earth Sciences, University of Bristol, Bristol
BS8 1RJ, UK* ¶ 10. *New Brunswick Museum, 277 Douglas
Avenue, Saint John, NB, E2K 1E5* ¶ 11. *Nova Scotia Museum,
1747 Summer Street, Halifax, NS, B3H 3A6*

A team consisting of an artist (JP) and numerous geologists (the rest of us) has created a series of five paintings, mostly watercolours. Four of the images represent the four principal Fundy Basin formations (Wolfville, Blomidon, North Mountain Basalt and McCoy Brook) that are collectively the late Triassic to earliest Jurassic Fundy Group. The fifth painting dramatically portrays Canada's oldest confirmed dinosaur. The geologists on the team represent various specialities, such as sedimentology, vertebrate paleontology, paleobotany and volcanology. The principal challenge was to construct a coherent vision of what the Mesozoic Fundy region looked like based on accurate scientific observations and information, and convey that vision to the hands of the artist. In building the images, evidence from Fundy Group rocks was used wherever possible. All the terrestrial and aquatic vertebrates shown are based on known skeletons or footprints. The dinosaur that peers at us through 200 million years in the fifth painting represents a new genus of prosauropod, several skeletons of which have recently been found in the McCoy Brook Formation at Wasson Bluff, near Parrsboro. As for aerial vertebrates, although no evidence for pterosaurs has been found in the Fundy Group, we decided that, as these flying reptiles had evolved by Blomidon times, we could indulge in a couple of these exotic creatures. Despite common root casts locally in some horizons, very few well-preserved plant fossils have been found in the Fundy Group – discoveries are limited to a few ferns and sparse spores and pollen; hence, coeval forms known from elsewhere had to be used to portray the flora. Beyond fossils, structural geology suggested major landscape features such as the bluffs along the