

Contents

Introduction	v
Yvette D. Kuiper, J. Brendan Murphy, R. Damian Nance, Robin A. Strachan, and Margaret D. Thompson	
1. Paleozoic orogenies and relative plate motions at the sutures of the Iapetus-Rheic Ocean	1
Uwe Kroner, Tobias Stephan, and Rolf L. Romer	
2. Provenance control on the distribution of endogenic Sn-W, Au, and U mineralization within the Gondwana-Laurussia plate boundary zone	25
Rolf L. Romer and Uwe Kroner	
3. Evolving views of West Avalonia: Perspectives from southeastern New England, USA	47
M.D. Thompson, S.M. Barr, and J.C. Pollock	
4. New detrital zircon U-Pb ages and Lu-Hf isotopic data from metasedimentary rocks along the western boundary of the composite Avalon terrane in the southeastern New England Appalachians	73
Allison R. Severson, Yvette D. Kuiper, G. Nelson Eby, Hao-Yang Lee, and J. Christopher Hepburn	
5. U-Pb detrital zircon analysis of sedimentary rocks of the southeastern New England Avalon terrane in the U.S. Appalachians: Evidence for a separate crustal block	93
Yvette D. Kuiper, Daniel P. Murray, Sonia Ellison, and James L. Crowley	
6. Geochemical and Nd isotopic constraints on the origin of uppermost Silurian rhyolitic rocks in the northern Appalachians (northern New Brunswick): Tectonic implications	121
Jaroslav Dostal, Pierre Jutras, and Reginald A. Wilson	
7. U-Pb zircon ages and Sm-Nd isotopic data from the Cobequid Highlands, Nova Scotia, Canada: New contributions to understanding the Neoproterozoic geologic history of Avalonia	135
Chris E. White, Sandra M. Barr, James L. Crowley, Deanne van Rooyen, and Trevor G. MacHattie	
8. Insights from Lu-Hf zircon isotopic data on the crustal evolution of Avalonia and Ganderia in the northern Appalachian orogen	173
Jeffrey C. Pollock, Sandra M. Barr, Deanne van Rooyen, and Chris E. White	
9. Conditions and timing of metamorphism near the Baie Verte Line (Baie Verte Peninsula, NW Newfoundland, Canada): Multiple reactivations within the suture zone of an arc-continent collision	209
A.P. Willner, C.R. van Staal, J. Glodny, M. Sudo, and A. Zagorevski	

- 10. A reevaluation of the tectonic history of the Dashwoods terrane using in situ and isotope-dilution U-Pb geochronology, western Newfoundland.** 243
Eben B. Hodgkin, Francis A. Macdonald, Paul Karabinos, James L. Crowley, and Douglas N. Reusch
- 11. Core complex fault rocks of the Silurian to Devonian Keisarhjelmen detachment in NW Spitsbergen.** 265
Harmon Maher, Alvar Braathen, Morgan Ganerød, Per Terje Osmundsen, Tim Redfield, Per Inge Myhre, Christopher Serck, and Sara Parcher
- 12. Pressure-temperature-deformation-time path for the Seve Nappe Complex, Kebnekaise Massif, Arctic Swedish Caledonides.** 287
Graham B. Baird, Fawna J. Korhonen, and Kevin R. Chamberlain
- 13. The Blåhø Nappe, central Norwegian Scandinavian Caledonides: An oceanic arc-back-arc assemblage distinct from the Seve Nappe Complex.** 315
Kurt Hollocher, Peter Robinson, Maria Van Nostrand, and Emily Walsh
- 14. Revised tectono-stratigraphic scheme for the Scandinavian Caledonides and its implications for our understanding of the Scandian orogeny** 335
Johannes Jakob, Torgeir B. Andersen, Geoffroy Mohn, Hans Jørgen Kjøll, and Olivier Beysac
- 15. Testing petrogenetic models for contemporaneous mafic and felsic to intermediate magmatism within the “Newer Granite” suite of the Scottish and Irish Caledonides.** 375
Donnelly B. Archibald, J. Brendan Murphy, Mike Fowler, Robin A. Strachan, and Robert S. Hildebrand
- 16. Sedimentary provenance of Silurian basins in western Ireland during Iapetus closure.** 401
Nancy Riggs, Brian McConnell, and John Graham
- 17. Detrital zircon sources in the Ordovician metasedimentary rocks of the Moroccan Meseta: Inferences for northern Gondwanan passive-margin paleogeography** 419
Cristina Accotto, David Martínez Poyatos, Antonio Azor, Cristina Talavera, Noreen Joyce Evans, Antonio Jabaloy-Sánchez, Hassan El Hadi, and Abdelfatah Tahiri