USING LAKE SUPERIOR PARKS TO PRESENT THE MIDCONTINENT RIFT

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Some of the Midwest's most spectacular scenery occurs near Lake Superior, in places like Pictured Rocks and Apostle Islands National Lakeshores, Isle Royale National Park, Interstate Park, and Porcupine Mountains State Park. These landscapes provide an enormous, but underutilized opportunity for park interpreters and educators to explain some of the most exciting concepts of modern geology. A crucial aspect of doing this is recognizing that many of the rocks and landforms in individual parks are pieces of a huge regional structure. This structure, called the Midcontinent Rift System (MCRS), is a 1.1 billion year old 3000 km long scar along which the North American continent started to tear apart, just as Africa is splitting today along the East African Rift, but for some reason failed to form a new ocean. Drawing on our experience as researchers and teachers studying the MCRS (Seth and Carol Stein) and as an interpreter at Isle Royale National Park (Blavascunas), we seek to give interpreters a brief introduction to MCRS to help them present information about what geologists know already and what they are learning from continuing research. Our goal is to help interpreters visualize how what they see at a specific site fits into an exciting regional picture spanning much of the Midwest.



Location and general structure of the Midcontinent Rift (Stein et al., 2011), showing some of the parks where rift-related rocks can be seen. Igneous rocks can be seen at Interstate (IP), Isle Royale (IR), Amincon Falls (AF), Gooseberry Tettegouche (T), Falls (GF). Cascade River (CR), Lake Superior (LS), and Porcupine Mountains (PM) parks. Sediments deposited after the volcanism can be seen at Apostle Islands (AI) and Pictured Rocks (PR) National Lakeshores. The history of copper mining in the rift rocks is presented at Keweenaw National Historical Park (K). (Stein et al., Park Science, 2015.)

Material we are developing is available at http://www.earth.northwestern.edu/people/seth/research/mcr.html.