1163-01-60 Amy Ackerberg-Hastings* (aackerbe@verizon.net). Analysis and Synthesis in Robert Simson's The Elements of Euclid (1756).

In the 18th and 19th centuries, three understandings of the terms 'analysis' and 'synthesis' were particularly influential with the creators and readers of elementary geometry textbooks in Western Europe and North America: as perceived contrasts in styles of mathematical practice in Great Britain and France, as contemporary appeals to ancient methods of proof, and as approaches to mathematics education. One widely-used textbook arose from the attempt by University of Glasgow mathematics professor Robert Simson to restore Euclid's text, which appeared in 1756 as *The Elements of Euclid*, in simultaneous English and Latin versions. The talk will explore what we can learn about the book's preparation and reception by examining it through the lenses of analysis and synthesis. (Received August 03, 2020)