1125-L5-2441 Gregory D Foley* (foleyg@ohio.edu), 321D McCracken Hall, Athens, OH 45701-2979. Professional Development in Mathematical Modeling to Support the Common Core.

The Mathematical Modeling and Spatial Reasoning (Modspar) project develops technological, pedagogical, and content knowledge among teachers in Grades 9–12 via two yearlong courses: Modeling with Algebra and Modeling with Geometry. Modspar addresses discrete, continuous, and geometric models, the modeling process and spatial reasoning; creating and implementing cognitively demanding student tasks and assessments; using algebra, graphing, and geometry software; and in Modeling with Geometry, using physical models, including the Lénárt sphere. This session will describe these courses and their relationship to the Common Core State Standards for Mathematics and will present the results of the related research since 2009. The session will explain how the standards for mathematical practice are integrated into Modspar and how these courses could be adapted to preservice teacher preparation. (Received September 20, 2016)