Jonathan Rogness* (rogness@math.umn.edu), Vincent Hall 4, 206 Church St SE, Minneapolis, MN 55455, and Harvey B Keynes. Creating Regional Networks of Elementary and Middle School Teachers through Professional Development.

We will describe unique aspects to our professional development programs for elementary and middle school teachers. Supported by a variety of MSP and ITQ grants, we focus on improving content knowledge of core topics in algebra and geometry, and especially the connections between these areas. Like many similar programs, the main component of our program is a two or three week summer course, but with key differences: (1) participants receive graduate credit in mathematics, not in education, (2) teachers come from many districts, and (3) teachers must attend events in our Academic Year Network to obtain a high grade. These events include opportunities to mentor students in their home schools, teach innovative Saturday morning enrichment classes to students in grades 4-7, attend seminars covering interesting mathematics outside of the regular school curriculum, and go to workshops addressing issues in mathematical knowledge for teaching. (Received September 10, 2008)