1145-R1-1398 Scott Zinzer* (szinzer@aurora.edu). Number Theory Through Programming. Preliminary report.

While a mathematics major prepares a student well for a variety of careers, employers have consistently reported a strong desire for candidates with an established computer science background. In response to this need, our program has begun to capitalize on opportunities to encourage computer programming throughout the mathematics major. In this talk, I will describe the inclusion of short programming assignments throughout my department's Elementary Number Theory course for the mathematics major. The assignments are designed to increase familiarity with the theoretical aspects of the course, to promote the further development of mathematical habits of mind, and to develop or refine computer programming skills in students with varying backgrounds. In addition to sharing sample assignments, I will give an overview of student reactions to the assignments and the impacts on student learning and engagement. (Received September 21, 2018)