

1067-C1-397

**Nathan M Wodarz\*** (nwodarz@uwsp.edu), Department of Mathematical Sciences, University of Wisconsin - Stevens Point, 2100 Main Street, Stevens Point, WI 54481. *Putting the Cart before the Horse? Teaching Differentiation Rules as “Review” in First Semester Calculus.*

Many students enter first semester calculus courses with prior exposure to the subject. This can lead to problems in two different ways. Students who have previously had a calculus course are frequently overconfident in their skills. Meanwhile, other students may worry that they are starting off well behind the first group. In both cases, students mistake computational skill for true understanding of the material. We discuss the results of one attempt to remedy this misconception - trying to level the playing field by immediately teaching differentiation techniques at the start of the semester. We analyze student proficiency in both applying these rules and conceptual understanding of calculus. These results are compared with a similar analysis of a class taught in a more traditional manner. (Received August 31, 2010)