

RE: Common Core, Calculus, and the "Accelerated Path"

Chairman Hayes, Subcommittee members,

Thank you for allowing me to testify before you last Thursday, February 16, 2012. I am writing to address comments that have been made concerning the Common Core and the "accelerated" math path as described in what is now misleadingly called "Appendix A" and as have been made with respect to South Carolina in particular.

1. The suggested "accelerated" path achieves it by pushing a bunch of content from grade 8 to grade 7, to make space for some algebra content in grade 8. No content is pushed from grade 7 down to grade 6 or below. Consequently, this approach fails on two levels.

First, it creates a bloated grade 7 content that only few students will be able to handle in one year. Further, it creates a large gap between grade six and grade seven expectations, instead of distributing the needed content across multiple grades as California did in 1998. Just to illustrate this point, as a result of a judicious approach of distributing the needed content across multiple grades in 1998 rather than only to grade 7, California more than quadrupled Algebra 1 taking by grade 8 (from 17% in 1998 to 67% in 2011) while simultaneously increasing(!) the fraction of proficient & advanced. When we assessed a similar approach for Common Core as a part of the California Academic Standards Commission deliberations in 2010, we concluded that we will need to distribute content at least down to grade six to assure success, rather than trying to push everything only into grade 7 as Appendix A suggests (and that was California's approach before 1998 and that resulted in only 17% taking Algebra by grade 8).

To sum this up, the accelerated path seems instructionally unsound, and it seems more as an effort to rebut criticism than a real and effective option.

2. "Appendix A" only pretends to be a true appendix to the Common Core Math Standards. In reality it was not published in June of 2010 together with the Common Core Math Standards (and with the ELA standards with their appendices), but instead it was published by Achieve in August 2010, three months after the Common Core writing teams and the validations committee were already disbanded. Consequently, this "appendix" was not adopted by any state as far as I know (most state adoptions occurred before August 2, 2010, the Race to the Top deadline), and the assessment

consortia have no plan to provide for two distinct tests in grades seven and eight to support this accelerated path. In other words, it is not an "appendix" to the Common Core but a separate and non-approved document.

3. The suggestions of taking two years of math in one calendar year simultaneously in one form or another are, to put it bluntly, foolish and disingenuous. While there always exists a tiny fraction of students, on the order of 1/10 of one percent, that can cope with such double doses, it is completely unrealistic to expect a significant number of students to take such paths.

In summary, no significant amount of students in Common Core public schools will be able to take calculus by their senior high school year under the Common Core. It is another matter for the private schools, which tend not to be bound by such slowed-down curricula, and will probably maintain their current rates. I don't think I need to elaborate on what it will do to the achievement gap, and to the rate of acceptance of students from challenged backgrounds to elite colleges.

Ze'ev Wurman