

Follow up on AHEAD math Webinar 10-25-22

Calculator usage for student with disabilities

Along these lines, it is important to point out that the controversy among mathematicians on the use of calculators in the classroom has died down. In fact, many colleges and universities require graphing calculators in all their courses except prealgebra. The American Mathematical Association of Two Year Colleges (AMATYC) came out with their classroom standards in a book titled *Beyond Crossroads: Implementing Mathematics Standards in the First Two Years of College* (AMATYC, 2001). The standards recommended calculators in all college courses except pre-algebra (arithmetic) courses. The National Council of Teachers of Mathematics also recommends the use of calculators in grade school (NCTM, 1989).

Students with disabilities are allowed to use calculators. The only real controversy in colleges and universities was the use of calculators in arithmetic or prealgebra courses. The legal aspect of this controversy was resolved in 1980 by an Office of Civil Right ruling. The Office of Civil Rights (Connecticut State Department of Education vs. Office of Civil Rights - 3/13/1980 LOF) case involved the use of a calculator by a student with a learning disability on a college admission test. The Office of Civil Rights ruled that calculators could be used on admissions tests that do not test basic arithmetic. According to Heyward, Lawton and Associates this case can be generalized to mean that students with learning disabilities are allowed to use calculators on all mathematics tests except the tests involving arithmetic calculation. This ruling is now be generalized to other student disability groups that have difficulty learning math (Nolting, 2022).

The question also came up about students with disabilities using calculators in elementary educations courses that teach learning mathematics. According to this ruling that may be a fundamental alteration of the program. However, I would seek guidance from the NCTM.