

Math Manipulatives Special Documented Accommodations Grades 3-8 Smarter Balanced Mathematics Assessment

WHAT ARE SPECIAL DOCUMENTED ACCOMMODATIONS?

In exceptional circumstances, there may be a student whose disabilities are such that the allowable embedded and non-embedded accommodations described in [CSDE Assessment Guidelines](#) provide insufficient access to the Smarter Balanced and/or the Next Generation Science Standards (NGSS) Assessments. In this case, non-standard accommodations may be determined by the Planning and Placement Team (PPT)/Section 504 Team for students with an identified need based on evidence documented in relevant sections of the IEP/Section 504 Plan (e.g., Present Levels of Performance, Goals and Objectives). These accommodations typically align to those used by the student during instruction and in other learning environments. If appropriate, the team should select applicable accommodations in the Statewide Testing module in CT-SEDS. Once plans are fully implemented, accommodations will sync with the student's TIDE (Test Information Distribution Engine) test settings/accommodations dashboard used for state testing.

For some students, the math manipulatives accommodation provides access to math content and facilitates greater understanding of math skills and concepts using concrete visual and tactile materials during instruction. A variety of math manipulatives may be appropriate for use when taking the Smarter Balanced Math Assessments as a non-embedded special documented accommodation to allow eligible students to use concrete mathematical tools strategically to support their problem solving as they transition to more abstract supports.

The selection of this special documented accommodation on statewide summative assessments should be aligned with IDEA guidelines with the intent to minimize access barriers while ensuring minimal impact to the test constructs, such that students can demonstrate what they know and understand, in a fair and appropriate way. Accommodations provided on state assessments are intended to remove barriers to a student's demonstration of knowledge and skills resulting from their disability(ies) without altering the assessed construct. This attention to detail provides for accurate interpretation of test results.

WHO IS ELIGIBLE TO USE MATH MANIPULATIVES ON SMARTER BALANCED MATHEMATICS ASSESSMENTS?

Math manipulatives may be selected for students using this accommodation in daily instruction to support their access to math content and problem solving as indicated in their Individualized Education Program (IEP) or Section 504 Plan in CT-SEDS. Students eligible for this special documented accommodation are typically identified as students with visual disabilities or math-related disabilities, such as dyscalculia, and are typically students with Learning Disabilities, Autism, Visual Impairments, or Intellectual Disabilities. However, other students with documented need based on their IEP or 504 Plan may also be eligible. Without the provision of math manipulatives, eligible students would not be able to demonstrate their conceptual understanding and fluency in mathematics on the Smarter Balanced Mathematics Assessments. The following sections explain more about selecting and using math manipulatives during testing.

HOW ARE MATH MANIPULATIVES REQUESTED?

Math manipulatives may be selected for the Smarter Balanced Mathematics Assessments based on the Planning and Placement Team (PPT) or Section 504 Planning Team's determination in an IEP or 504 Plan finalized in CT-SEDS. The IEP or Section 504 Plan must contain supporting evidence, such as:

- Documentation of student need as manifested in the student's present levels of performance, mathematics goals and objectives, and in the supplementary aids and services/program accommodations section of the IEP or 504 Plan.
- Psychological assessments (if available) and/or academic performance assessments referenced in the IEP/504 Plan, showing processing disabilities related to mathematical calculations or disabilities in understanding/use of language. Skills related to listening, thinking, speaking, reading, writing, or spelling may also be reflected.
- Documented difficulties in cognition, memory, problem solving, or attention (Note: the use of math manipulatives should not be considered solely as a behavioral support, but rather an accommodation to support processing abstract concepts on the assessment).
- Progress reports or service provider assessments that provide evidence of the need and monitoring of the math manipulatives accommodation used in instruction, as well as results when the accommodation is not used.

WHICH TYPES OF MATH MANIPULATIVES ARE PERMITTED?

The provision of math manipulatives on the Smarter Balanced Mathematics Assessments must be consistent with those used during instruction although manipulatives used during testing must be numberless and not include words or labels that might give students an unfair advantage. Formulas and other features that might compromise the math constructs being measured must also be removed from the manipulatives prior to use on the assessment.

Examples of allowable math manipulatives include colored tiles, base ten blocks, Geoblocks, Geoboards, blocks, popsicle sticks, Unifix cubes, fraction towers, and a ten frame with no numbers or labels.

The non-embedded [100 Numbers Table](#) and the [Multiplication Table](#), accommodations for eligible students, can be downloaded and printed directly from the [Connecticut Comprehensive Assessment Program Portal](#) and disseminated prior to testing.

WHAT TYPE OF TEST SETTING IS REQUIRED?

Students must be tested separately from other students who are not using math manipulatives. Students must be able to access manipulatives independently without teacher prompting or direction. Materials should be presented in an organized manner.

TESTING SECURITY TIPS

- Math manipulatives without numbers, formulas, or labels must be provided to the student in a sealed bag or bin **BEFORE** the assessment begins.
- Manipulatives must be stored at the student's workspace/testing area to minimize movement.
- The test administrator may not interact with the manipulatives once they are provided to the student.
- The test administrator may not count out/supply manipulatives to the student.
- The test administrator may not direct or prompt the student to use the math manipulatives.