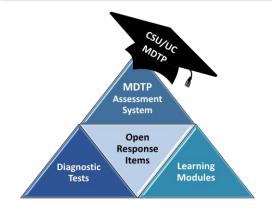
CSU/UC Mathematics Diagnostic Testing Project Using the MDTP Assessment System





MDTP is an intersegmental project funded by *CAPP*, *CSU*, and *UC* to provide the MDTP Assessment Systems *free of charge* to secondary math educators. MDTP assessments help educators to learn about their students' mathematical preparedness by course, topic, and skill development throughout their secondary coursework.

MDTP materials that are used in effective and appropriate ways support educators' efforts to purposefully plan instruction to build on students' current mathematical understandings and intervene on identified unfinished learning and gaps of content knowledge with the goal to promote students' readiness for college mathematics.

MDTP Diagnostic Tests

- MDTP Assessments of Preparedness and Readiness Tests are designed to assess students' preparedness in foundational topics of mathematics. MDTP assessments of preparedness and readiness tests provide robust diagnostic feedback to inform just-in-time instructional support, program reflection, and program design.
- MDTP 9th Grade Assessments are designed to inform appropriate options for students' mathematical engagement in coursework towards college preparedness. Diagnostic feedback from MDTP 9th grade assessments may also be used to inform program reflection and design.

MDTP Open Response Items

- **MDTP Written Response Items (WRI)** are designed to elicit student thinking and quantitative reasoning around foundational mathematical topics and concepts. Each MDTP WRI aligns to MDTP topics on MDTP diagnostic assessments, and many items can be used for multiple levels of mathematics coursework. WRIs require adequate time to allow students to think and reason deeply about the problem and to clearly explain or justify their thinking.
- MDTP Formative Constructed Response Items (FCRI) are a short and focused assessment designed to provide a postintervention check of students' understanding of a key mathematical topic or concept and should be administered after students have taken an MDTP assessment of preparedness or readiness test and an intervention has occurred. (Note: MDTP FCRIs are currently available in field-test versions aligned to the MDTP AMR45A19.)

MDTP Learning Modules

• **MDTP Learning Modules** were informed by diagnostic results from MDTP assessments and are designed to support students' independent practice in identified MDTP topics. These student-centered modules can be used to review content before or after an assessment, prior to entering a new course, or at the direction of their math instructor.



Framework of Effective and Appropriate Uses of the MDTP Assessment System

Enactment of a Formative Assessment Cycle

Use data from MDTP preparedness and readiness tests to initiate a formative assessment cycle to determine student and class strengths, unfinished learning, and potential gaps of content learning by examining MDTP topics, items, and/or item answer choices.

- Assess: Administer the appropriate MDTP grade-level assessment of preparedness or course-level readiness test.
- *Identify*: Identify students' current mathematical understandings, misconceptions, and potential gaps in content knowledge.
- *Analyze*: Unpack the progressions of mathematics that students need to build the essential understandings needed for access to and mastery of the content.
- Enact: Adopt strategies and design learning experiences to support these learning goals.

Learn more and register for MDTP assessments: <u>http://mdtp.ucsd.edu</u> Send inquiries to: <u>mdtp@ucsd.edu</u>