University of Connecticut—Math Unit Field Test

Field Test Details
The field test will evaluate an innovative math unit designed for 3rd graders in general education classrooms.

- **Goal #1:** Compare math outcomes among students receiving the math unit with students continuing the district’s math curriculum.
- **Goal #2:** Examine teachers’ beliefs about their math teaching self-efficacy and recognizing potential talent in academically, culturally, linguistically, or economically diverse communities.

District Benefits
- Participation is at no cost for all districts and includes the cost of substitute teachers during the 2-day professional development.
- The math unit is aligned with Common Core State Standards (CCSS) and National Council of Teachers of Mathematics (NCTM) Best Practices.
- Access to student outcome data from the pre/post unit test and Measures of Academic Progress (MAP) testing.
- Ongoing informal professional development and enrichment opportunities for participating teachers that will enhance their competencies and skills.

Teacher Benefits

**Experimental Teachers**
- Involvement in 2 days of professional development.
- Access to the math unit with all materials and bonus resources.
- Opportunity to implement differentiated and enriched math lessons.

**Control Teachers**
- Continue with the district’s math curriculum.
- Future access to unit materials.
- Future opportunity to learn how to design differentiated and enriched math lessons.

Student Benefits

- Students’ individual instructional needs will be addressed in academically diverse settings through flexible grouping.
- Lessons include interactive manipulatives and engaging activities.
- Students receive direct instruction and experience in key mathematical practices.
- Opportunities to develop the 21st Century Skills 4Cs (Communication, Collaboration, Critical Thinking, and Creativity).
- Practice mathematical writing and talk moves.

Field Test FAQs

Q: How many teachers must participate in a school or district?
   A: Agree that a minimum of two, grade 3 teachers in a school will participate in the math unit field test. In addition, out-of-state schools will need a minimum of 10 grade 3 teachers across the district.

Q: What is the time commitment for teachers participating in the field test?
   A: Teachers randomly assigned to use the math unit in intact classrooms will participate in 2 days of professional development and participate in 3-5 hours of tasks (e.g., assessments, observation, surveys, and one interview). Teachers selected to continue using the district’s math curriculum will participate in 2-5 hours of tasks (e.g., assessments, observation, and surveys).

Q: What does the 2-day professional development entail?
   A: Teachers who implement the math unit will be introduced to the self-contained unit and accompanying resources, learn how to implement the differentiated and enriched lessons, and use curriculum as an indicator of students’ academic potential.

Q: How will this unit align with our current math curriculum?
   A: The unit focuses on algebraic thinking, multiplication, and division. Additionally, lesson content aligns with Common Core State Standards (CCSS) and National Council of Teachers of Mathematics (NCTM) Curriculum Standards while incorporating CCSS Mathematical Practices and the 21st Century Skills 4Cs. The lessons can be implemented daily across a 5-week period or weekly across a 4-month period depending on teacher preference.

Q: What is unique about this math unit?
   A: The unit includes enriched and differentiated lessons that emphasize mathematical thinking and foster the development of the 4Cs. The unit is modeled after other award-winning curriculum and developed by the same authors.

Q: What materials are included with the unit?
   A: The unit includes a teacher manual, student mathematician notebook, answer key, manipulatives, flash drive with bonus resources, and all additional materials needed for lesson activities.

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