



ONTARIO PUBLIC
SCHOOL BOARDS'
ASSOCIATION

Leading Education's Advocates

EFFECTIVE PRACTICES IN ELEMENTARY MATHEMATICS EDUCATION

School Board _____ Peel District School Board _____

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Name of Program/Initiative/Strategy ___ EngageMath – A Comprehensive Numeracy Strategy _____

Hyperlinks to Documents or Website(s) Describing this Program/Initiative/Strategy

<http://www.peelschools.org/parents/helpyourchild/math/Pages/default.aspx>

Description of Program/Initiative/Strategy

The focus is on exemplary mathematics practices that excite, engage and increase student confidence and achievement. In the brief description please provide answers to the following questions: Where the program/initiative/strategy is delivered (school/board locations)? Who is responsible for delivering and monitoring the program/initiative/strategy? Who is the target audience? Are there any community partnerships involved? Are there any staffing or budget implications? Are there any special resources required? What are your indicators of success, etc.?

Numeracy is our curricular focus in the Peel District School Board. We have explicitly defined our strategy to empower all educators to support the implementation of improved numeracy instruction in Peel classrooms. Our Comprehensive 3-year Numeracy Strategy has 3 drivers: the instructional focus, instructional strategies and assessment. It has been designed to foster student engagement and positive mindsets in mathematics.

Instructional Focus: Educators across all grades and subject areas will focus on teaching and learning through the lens of numeracy with an emphasis on proportional and spatial reasoning in order to make student learning visible.

Instructional Strategies: Educators will use learning goals and co-created success criteria, teach using the 3 part lesson framework, employ rich tasks and use thinking tools and manipulatives in order to support student learning and thinking.

Assessment for Learning: Educators will use descriptive feedback and formative assessment in order to improve student achievement.

The Professional Learning focus for teachers:

- Deepening our mathematical content knowledge for teaching, (PRIME training and Content Coaching in Math (Metamorphosis)
- Use of rich tasks for instructional and assessment purposes (open questions and parallel tasks)
- Numeracy and how it relates to Mathematics
- Assessment for Learning to enhance instruction and student learning (learning goals and success criteria from Growing Success

The above strategy is coordinated, led and monitored by the Curriculum and Instruction Support Services, including superintendents of education, Instructional Coaches/Consultative staff, Instructional Coordinators, coordinating principals, Student Work Study Teachers.

The target audience is all teachers and school administrators in the district. Implementation partners include but not limited to: Nelson Publishers, Metamorphosis TLC, The Critical Thinking Consortium, and YouCubed.org.

What has been the impact on Student Learning?

The initial phase of the strategy has intentionally focused on teacher learning in mathematics. From purposeful survey sampling of participating teachers, improvements are being noted in the areas of the use of rich math tasks, the use of effective learning goals, clarity around mathematical thinking, and gathering evidence of student thinking. Evidence of student improvement is being curated online (for district purposes only at this time) at <http://list.ly/> to be corroborated with performance measures such as EQAO.