Madison Burris, a Math Intervention Teacher at West Louisville Elementary School in Daviess County, celebrated the 100th day of school with a student dressed up as zero the Hero

"At Doss High School, we are focusing on building a math culture in our building. We want the focus and involvement of math to be school-wide, not with just the math department teachers. In addition, we want to build math confidence in both our students and our staff! It's too easy to say, "I'm just not that good at math." We believe that everyone can do math, with the right attitude and support."

Erin Kennev Mathematics Coach, Doss High School **Jefferson County**

The KCM Investment Spreads Across the State



KCM Programs Map

Coaching Program **№** Intervention Program

"Cognitive CoachingSM changed my life. I thought of myself as a good teacher but the coaching training took me to a place where I listened to people and students. I mean I really listened. I learned how to communicate with others."

Denise Justice Mathematics Coach Raceland-Worthington Independent Schools Greenup County

GRAVES

HARDIN GRAYSON HOPKINS CMUHLENBERG CASEY LAUREL' PULASKI ADAIR BARREN CHRISTIAN / TODD TRIGG MARSHALL CALLOWAY

Beth Meiman, a Math Intervention Teacher at Eastern Elementary School in Barren County, is pictured here with "Nellie Numeracy", a character created to assist in mathematics improvement.

"My school's math scores have improved 20% over the last two years. Teachers are now collaborating to discuss student progress, math content, and ideas to improve student achievement . . . My administrators encourage and support in my role as the Math Coach. I do not feel like I am put in the middle of situations where the administrator wants me to "fix" the teacher. I am still able to connect to teachers in a positive way since they do not see me as an evaluator. I believe teachers are hungry for one-on-one conversations with coaches. My experience has shown that by building rapport and trust, teachers are comfortable and confident as I observe their class to collect data."

Susan Gordon Mathematics Coach, East Jessamine Middle School Jessamine County



Sheila Samples, a Math Intervention Teacher at Estill Springs Elementary, received a 2008 **Mathematics Education Service Achievement** Award.

'As a teacher, I have never seen math results like this the intervention program training and support has given me knowledge I would never have acquired myself. In three years we have made double digits gains. We scored 105 on the state testing!!!"

Melanie Christmas Mathematics Intervention teacher, Yates Elementary, Fayette County

> "Through nationally norm-referenced assessments, I have seen my intervention students make over 2 years gains in a few months. The Math Achievement Fund Grants are the best run and supported grants I have ever encountered.

Suzanne Farmer Mathematics Intervention teacher, Anderson County Early Childhood Center

The Math Achievement Grant allowed me to continue to learn the most effective strategies to reach the lowest achieving child. Teachers will call on me to help with a struggling child and ask for suggestions to get them back on track. We have really come together to help all our children become successful in mathematics."

Tonda Thompson Mathematics Intervention Teacher, Albany Elementary, Clinton County Schools

"The addition of the math coach has been a definite plus for our District. Her support of our teachers (modeling, math strategy training, etc.) has benefited all the teachers she touches and consequently has accelerated student performance in many math deficit areas. We believe her continued presence, coupled with the energy she brings to the program, will bring about increases in our math index levels at our schools. . . . [Our coach] is involved with providing the math training for our teachers K-12. This year finds her doing planning and reflecting conversations with math teachers at different levels. She has made herself available to parents to assist them in helping their children with their math".

Frank Melvin Superintendent Raceland-Worthington Independent Schools **Greenup County**

Armed With Knowledge, Teacher Has Whole New Outlook on Math

By Scotty Bratcher, Primary Grades Mathematics Intervention Teacher Oran P. Lawler Elementary, Grayson County Schools

Last year, our school selected Number Worlds as the intervention program for the Mathematics Achievement Fund Grant. I saw first graders that were struggling at the beginning of the year become successful in the regular core math classroom. Our second graders also became successful in the classroom. However, third graders benefited the most from this program. **Some of our third graders** were at a kindergarten or first grade level in math ability and skill at the start of the year. After intense intervention with Number Worlds, 8 of 10 students scored proficient or distinguished on the CATS test. One of these third grade students currently holds the top fourth grade math average this year.

It was amazing how comments were made on the confidence gain of these intervention students. Many would stop me in the hall and say, "I don't know what you're doing in that room with these students but keep it up. These students are now raising their hands, asking questions, answering questions, and have become a leader in my classroom."

I feel as if I'm armed with so much math knowledge. It gave me a whole new outlook on math and math instruction. It's amazing that I can now sit down with a student and pin point exactly where they are in math ability and skill. The best thing about Math Recovery is that I also know in what direction to start and go with instruction for the student to increase math ability and skill to a level equal to their peers or above in only 10-15 weeks.

This year I will be able to tailor make math instruction to increase math ability and skill. In addition to intervention students benefiting from this program, students across the building will also benefit from the trainings I have received from the Kentucky Center for Mathematics.

A Note from the KCM Executive Director, Dr. Kirsty Fleming



During my tenure as Executive Director at the KCM, I have been fortunate to work with hundreds of mathematics educators and professionals who all have a deep love of learning and a commitment to the Commonwealth's educational attainment. I have seen phenomenal progress in mathematics proficiency from students all over the state.

In my travels, I have talked to teachers, administrators and parents who are grateful for the vision and investment of the Kentucky General Assembly in the Mathematics Achievement Fund and Teachers' Professional Growth Fund. Despite a potential shortfall of funding in the budgeted forecast, the KCM will fulfill our commitment to work together with schools across the Commonwealth to continue the significant improvement in mathematics scores as a direct result of the intervention and coaching programs.

My goal is to establish mathematics achievement in every county in Kentucky. With the help of students, teachers, families and administrators, my dream of giving Kentucky's students the mathematics education they need and deserve could one day be possible.

In addition to our core programs, the KCM will expand our efforts by sending out helpful tools to communities across the state to aid in mathematics education. I hope you find these tools helpful and I hope you will pass them along to those in your communities who may also find them helpful.

By working together to improve mathematics education, we will continue Kentucky's momentum in the education community.

Mathematics skills are a critical component of science, technology, engineering and mathematics success and a key driver of economic development opportunities for our citizens.

If you are interested in learning even more about our work, please visit our website at: http://www:kymathematics.org.

Meet the Program Directors for the Kentucky Center for Mathematics:



Jim Justice Director of Coaching Programs



Laura Plante
Assistant Director of

Coaching Programs



Alice Gabbard
Director Intervention

Programs



Jonathan Thomas Assistant Director of Intervention Programs

Good News from the:



Regional Coordinator Confident of KCM Improvement on Math Performance

Mary H. Hodges, Regional Coordinator for Mathematics Murray State University, Kentucky Center for Mathematics

Since the mathematics intervention program began, teachers of grades K-3 have received high quality training and professional development in how to best teach struggling primary students who are achieving below their peers. Teachers have learned how to assess students' early numerical knowledge and how to design and implement effective instruction for these students.

As a regional coordinator, I travel to schools who implement the mathematics grant. In every school I have visited I have seen teachers teaching with renewed confidence and enthusiasm and students who are excited about learning math.

Teachers are asking students, "How did you know that?" MITs are becoming strong mathematics leaders in their schools by sharing their knowledge with other teachers as they collaborate in classrooms and provide professional development during faculty meetings and grade-level meetings.

One of the strengths of the intervention program is the weekly online meetings in which regional coordinators (RCs) and mathematics intervention teachers (MITs) continually discuss ways to reach students and help them be successful. Another strength of the program is the school visits made by RCs. The weekly meetings and school visits provide a personal level of support and help to build a strong learning community. I have provided training for parents as to how they can help their children learn math and I have provided professional development for teachers.

The Kentucky Center for Mathematics has done an outstanding job in implementing the Mathematics Achievement Fund grants throughout the state. Thanks to their wisdom and guidance, both students and teachers are becoming strong and confident mathematicians.



Kris Jarboe (right), a Mathematics Intervention Teacher at Elkhorn Elementary, was presented the 2008 state finalist Presidential Award for Excellence in Mathematics and Science. Pictured with Jarboe is the Kentucky Department of Education's Linda Montgomery.

Interest for the KCM Website is Up

Over 4,000 people accessed in September. http://www.kymathematics.org

