

# OAME Leadership 2018

## Learning in the 21st Century

Keynotes and Breakouts from  
Dan Meyer      Cathy Fosnot      Graham Fletcher  
and more



November 8-9, 2018

St. Clair Centre for the Arts, 201 Riverside Dr W, Windsor

We are more than 1/6th the way into the 21st century and we are no longer bound to face-to-face options as our only choice for educator learning. Our keynote speakers, who are all prolific users of online communities, will talk about student, teacher and administrator learning, both from face-to-face and online perspectives. We will also see how our own learning can be personalized with tools and resources available at the click of a mouse.

Register at: <http://oame.on.ca/mcis/>



# Keynote Addresses:

Thursday Night  
Dan Meyer

Three Messages Your Teachers & Their Students  
Need to Hear

The teachers we support and the students they teach are bombarded with messages about math, the world, and themselves. But very few of those messages are explicit. They're more often communicated implicitly through curriculum and instruction. Teachers and students both need to understand a) that math is power, b) that power makes sense, and c) they already have that power. Come learn more about those messages and how to communicate them to the teachers and students you support.

Dan taught high school math to students who didn't like high school math. He has advocated for better math instruction on CNN, Good Morning America, Everyday With Rachel Ray, and TED.com. He earned his doctorate from Stanford University in math education and is the Chief Academic Officer at Desmos where he explores the future of math, technology, and learning. He has worked with teachers internationally and in all fifty United States. He was named one of Tech & Learning's 30 Leaders of the Future. He lives in Oakland, CA.



Friday Morning  
Cathy Fosnot

Professional Development in the 21st Century:  
Criteria, Models, and Research Results

This session will build a case for a blended learning model of PD, coupling online and face-to-face opportunities, and will provide several illustrations of possibilities using the tools of the 21st century as a way to meet the challenges of reaching diverse, geographically spread-out, small rural settings and going systemically across large urban settings. Now, more than ever, teachers have the ability to personalize their own PD and have support at the tips of their fingers by using online resources. They do not have to wait for a scheduled workshop or classroom visit from a consultant to learn when they can easily access meaningful and relevant video and information online. Challenges, hurdles, and criteria for developing new PD models will be discussed, and preliminary research on results showing promising effects on teacher change and student achievement will be shared.

Cathy is the author of the widely-recognized math series, *Young Mathematicians at Work* and *Contexts for Learning Mathematics* (CFLM), which she has now expanded into a full core program of over 40 units and 12 illustrated children's books. The Founding Director of Mathematics in the City at CCNY, Cathy retired from the college in 2012 to establish a company devoted to the production of state of the art materials for the 21st Century ([www.NewPerspectivesOnLearning.com](http://www.NewPerspectivesOnLearning.com)), incorporating the use of digital technologies for personalized professional learning and support and formative assessment. Her company is also focused on system-wide change, offering professional development workshops and on-site consulting with schools around the world using a blended learning approach. She has been the senior advisor to DreamBox since its inception and is a frequent guest on VoicEd Radio with Stephen Hurley.



Friday Afternoon  
Graham Fletcher

The Power of Progressions: Untangling the  
Knotty Areas of Teaching and Learning  
Mathematics

As more teachers look to add high-yield tasks to their repertoire, the struggle to make it all work becomes real. What makes it even more difficult is supporting this work in different classrooms or at multiple schools. Let's examine how problem-based lessons can be used to bring teachers together in meaningful collaboration and how this approach can build teacher capacity for years to come.

Graham has served in education as a classroom teacher, math instructional lead, and currently as a math specialist. Graham's work with the math progressions and problem-based lessons has led him to present throughout North America and beyond. He is continually advocating for best practice in elementary mathematics by seeking new and innovative ways to support students and teachers in their development of conceptual understanding.



# Breakouts

<b>B1</b> 6-12	<p><b>Charge Up Your Schools with Free Desmos Activities</b></p> <p>Dan Meyer</p> <p>Desmos Activities will help you build social and creative math classrooms. In those activities, students create representations of their mathematical thinking that go beyond multiple choice responses. Students share those representations with their entire class, not just their teacher or laptop. Come experience a Desmos activity as a student, learn the teaching moves that contribute to its success, and get access to more free activities just like it.</p>
<b>B2</b> K-3	<p><b>Making Sense of Math in a Primary Classroom in a Virtual Space</b></p> <p>Graham Fletcher</p> <p>Finding a balance between conceptual understanding and automaticity can be difficult to support, especially in the primary grades. In this session, we'll build our understanding of the number sense trajectory and model our session the exact same way groups of teachers are gathering virtually to learn and grow together each year. We'll explore the importance of conceptual understanding, application, and procedural fluency, and how they all play a critical role in building a solid foundation in our young mathematicians.</p>
<b>B3</b> K-12	<p><b>Build Your Own PLN with the Math Twitter Blog-o-Sphere</b></p> <p>Kyle Pearce (GECDSB), Jon Orr (LKDSB), David Petro (WECDSB)</p> <p>Finding like-minded math teachers to collaborate with and learn from is easier now than it has ever been. The Math Twitter Blog-o-Sphere (MTBoS) is a professional learning network for math teachers that has organically developed via Twitter and blogs over the last few years. Whether you have never Tweeted before or you write hashtags in your sleep, come to this session to maximize the potential of this online resource.</p>
<b>B4</b> k-8	<p><b>Conferring with Young Mathematicians at Work: Making Moments Matter</b></p> <p>Cathy Fosnot</p> <p>If children are to engage in problem solving with tenacity and confidence, good questioning by teachers during conferrals should engender learner excitement and ownership of ideas, while simultaneously be challenging enough to support further development. Video of conferrals in action across the elementary/middle years continuum will be used for examination and analysis.</p>
<b>B5</b> K-12	<p><b>Increasing mathematics leadership in Ontario: Leveraging (online) communities and resources</b></p> <p>Dragana Martinovic (UofW &amp; MKN), Heidi Horn-Olivito (GECDSB), Kathy Witherow (TDSB &amp; ML2N), Lori Higgins (ML2N), Kathy Prince (ML2N)</p> <p>A discussion about regional networks organized to support the RMS and how educators can benefit from engaging in the growing community of mathematics leaders.</p>



## Thursday Night

- 6:30-7:00 Registration
- 7:00-8:00 Dinner
- 8:00-9:00 Dan Meyer Keynote
- 9:00-11:00 Mix and Mingle

## Friday Day

- 8:30-9:00 Registration
- 9:00-10:00 Cathy Fosnot Keynote
- 10:10-11:20 Breakouts - B1, B2, B3
- 11:30-12:30 Lunch
- 12:40-1:50 Breakout - B2, B4, B5
- 2:00-3:10 Breakout - B3, B4, B5
- 3:20-4:20 Graham Fletcher Keynote

Type of Registration	Cost (OAME member/Non member)
Reg. only	\$349/\$399*
Reg w/ shared accommodations	\$429/\$479*
Reg w/ single accommodations	\$509/\$559*

\*includes 1 year digital membership

- Space is limited
- Registration closes Oct 1st, 2018

St. Clair Centre for the Arts  
201 Riverside Dr W, Windsor



### Hotel Accommodations include parking and full breakfast Friday morning.

**Directions from the 401:**  
Take Exit 13, "3B to Tunnel" and proceed North toward the riverfront. Highway 3B is known locally as Dougall Road which eventually becomes Ouellette Avenue. Continue on Ouellette Avenue all the way to the riverfront (straight in front of you). Turn left onto Riverside Dr. The St. Clair College Centre for the Arts is one block ahead on the left.

**Directions from The Windsor/Detroit Tunnel:**  
After clearing Customs, turn left onto Park Street and immediately move to the right lane. Turn right onto Ouellette Avenue (first light). Follow Ouellette Avenue to Riverside Drive. Turn left onto Riverside Dr. The St. Clair College Centre for the Arts is one block ahead on the left.

**Directions from The Ambassador Bridge:**  
After clearing Customs, move to the extreme right of the plaza and look for the "Downtown Windsor" sign. Follow the curve (Huron Church Road) and head back toward the river. Turn right onto Riverside Dr. The St. Clair College Centre for the Arts is approximately five minutes away on the right.

