

# Math Teachers and Social Media: Professional Collaboration or Support Group?

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<http://mathed.net>

April 11, 2014



University  
of Colorado  
Boulder



# About Me

## Academic cred:

- PhD candidate in Curriculum & Instruction, Mathematics Education
- Current research focus involves helping Algebra 1 teachers make productive curriculum adaptations

## Internet cred:

- Internet content creator since 1996
- Blogger since 2001
- Created MathEd.net and @MathEdnet in 2009, coinciding with starting grad school

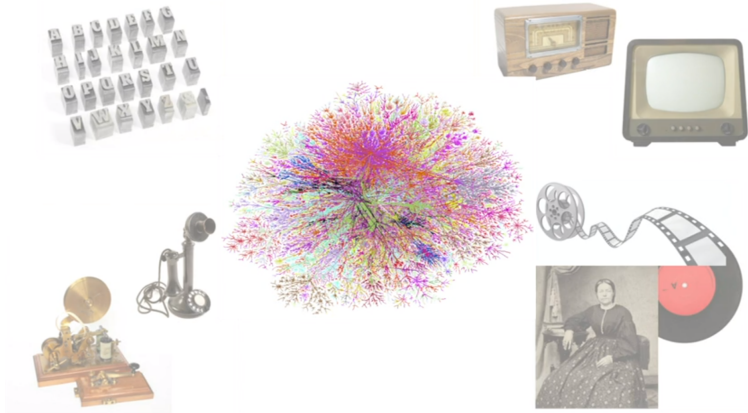
## Why?

After teaching in rural Colorado for 6 years, **I craved knowledge and collaboration.**

# Outline

- 1 Framing the Issues
  - The Social Web
  - The Makings of a Profession
- 2 Perspectives of Teaching and the Social Web
- 3 Challenges and NCTM's Role

# Many-to-many



Source: [http://www.ted.com/talks/clay\\_shirky\\_how\\_cellphones\\_twitter\\_facebook\\_can\\_make\\_history](http://www.ted.com/talks/clay_shirky_how_cellphones_twitter_facebook_can_make_history)



# Eleanor Roosevelt Theory of Social Media Use



*"Great minds discuss ideas;  
average minds discuss events;  
small minds discuss people."*

People	↔	Facebook
Events	↔	Twitter
Ideas	↔	Blogs/Google+

## Axe Grind #1: Choose your tools carefully.



Every tool has affordances and constraints!

Twitter is far better at transcending **geographic** constraints than **temporal** constraints. **Ideas on Twitter have short half-lives.**



Chris Robinson

@absvalteaching



Following

[My] observations of the "T" in #MTBoS: (1)  
It's really poor at organizing conversation. (2)  
It's really good at sharing resources. +

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6:01 PM - 20 Jan 2014

Source: <https://twitter.com/absvalteaching/status/425432906975420416>



**Chris Robinson**

@absvalteaching



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+ (3) It's good at getting a quick answer to a question. (4) It's not so good at relaying the subtlety of a point or opinion. +

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Source: <https://twitter.com/absvalteaching/status/425432991561949184>



**Chris Robinson**

@absvalteaching



Following

+ (5) It's used beyond its capability or intention. (6) It's a good gateway to where the rubber should really be hitting the road.

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Raymond Johnson

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# The Mathematics Teaching Community

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[ratio-proportional-relationships](#) [proportional-relationship](#)

296 views
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**Equations for different purposes**  
commented on 1 week ago by [Joel Reyes Noche](#) (1,390 points)  
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Welcome to The Mathematics Teaching Community, where you can post submissions and receive comments from other members of the community. Check out our [Frequently Asked Questions](#) for more information.

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got a question about the site itself? [meta.matheducators](#) is the place to talk about things like what questions are appropriate, what tags we should use, etc.

Mathematics Educators Stack Exchange is a question and answer site for those involved in the field of teaching mathematics. It's 100% free, no registration required.

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Here's how it works:



Anybody can ask a question



Anybody can answer



The best answers are voted up and rise to the top

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The "rearranging" approach to teaching logarithms

pedagogy

algebra

55m ago Chris Cunningham 1,485

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votes

3

answers

145

views

How can we help students who are very anxious about math?

pedagogy

anxiety

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56m ago Mandy Jansen 726

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To unsubscribe from an EDG at any time, follow the directions given at the very bottom of every message sent to you from the list.

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If you have any problems using the Registration form, choose "About Electronic Discussion Groups" below in "See also." Select your course from the list at the bottom of the page to send an e-mail to the moderator, including full details about the problem you are experiencing.

## Mathematics Education (K-12)

Challenge and support.

Notifications off



Public 2,804 members

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## All posts

\*Say Hello!\* 2

General Discussion 11

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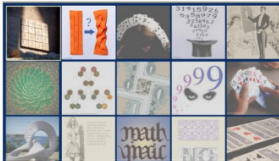


Justin Lanier

General Discussion - Apr 3, 2014

#Mathematics

April is Mathematics Awareness Month! Here's the new Math Munch post to jumpstart your month. Math Awareness Month, Hexapawn, and Plane Puzzles.



## About this community

Invite people

Share this community

Welcome to the Mathematics Education (K-12) Community on Google+!

This is a forum for all stakeholders—teachers, students, mathematicians, researchers, and laypersons. The only requirement is that you have an interest in mathematics education.

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Algebra - 8:24 AM

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Solve this!

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Sources: <http://www.edreform.com/2012/04/k-12-facts/> and <http://www.nsf.gov/statistics/seind12/c1/c1s3.htm>

# What makes something a profession?

Discuss with those around you:

- Is teaching a profession?
- Why or why not? What criteria should we consider in our argument?

# Shulman's “attributes” of a profession

- the obligations of *service* to others, as in a “calling”;
- *understanding* of a scholarly or theoretical kind;
- a domain of skilled performance or *practice*;
- the exercise of *judgment* under conditions of unavoidable uncertainty;
- the need for *learning from experience* as theory and practice interact; and
- a professional *community* to monitor quality and aggregate knowledge

(Shulman, 1998, p. 516)

# Attribute #1

Professions are characterized by:  
the obligations of *service* to others, as in a “calling”

- Teachers' perception? **Positive**
- Public perception? **Positive**
- Social media potential? **Positive**

## Is it Worth Being a Teacher?

Posted on [March 29, 2014](#)

[Five years ago](#), I decided not to continue with my career in high-tech. After twenty-five years rising, and falling, and rising again, through the [ranks in my field](#), I decided to follow a growing [calling to teach](#).

Little did I realize, or appreciate in others, that teaching entails great sacrifice. This from a man whose wife started teaching nearly a decade before him.

While the sacrifices I detail below are true, and challenging, I still feel that the call to teach outweighs their weight. The true test will be do I feel the same next week, month, or year, as this job is the most demanding I have ever held, even though I have worked for some demanding high-tech companies, such as Motorola and Qualcomm, and a start-up where I slept on my office floor many nights and weekends.

Source: <http://mathequality.wordpress.com/2014/03/29/is-it-worth-being-a-teacher/>



Professions are characterized by:

*understanding* of a scholarly or theoretical kind

- Teachers' perception? **Mildly Positive**
- Public perception? **Unfavorable**
- Social media potential? **Positive**

## Axe Grind #2: Open Access or Else.

Set your work free!

Teachers love to share freely, yet much of the scholarly knowledge around teaching is not free to share.



Captain A.D.D.

@approx\_normal



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Stats peeps: did any of you order "Teacher Proof" yet? I'm dying to talk about this book with somebody: [amazon.com/Teacher-Proof-](https://www.amazon.com/Teacher-Proof/)

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Amazon Books

**Teacher Proof: Why research in education doesn't always mean what it...**

'Tom Bennett is the voice of the modern teacher.' - Stephen Drew, Senior Vice-Principal, Passmores Academy, UK, featured on Channel 4's Educating Essex Do the findings from educational science ever...



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Samuel Otten

@ottensam



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[nctm.org/news/content.a...](http://nctm.org/news/content.a...)

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## Research Clips and Briefs

NCTM's Research Clips and Briefs are research-based responses to questions of practice.

- **Clips** are short and provide only the findings.
- **Briefs** include more information and list related research.

[Send questions](#) or topics related to classroom practice that you would like to see addressed. Research Clips and Briefs are [designed](#) to closely connect to practitioner needs.

### Algebra (March 2007)

Algebra in the Elementary Grades

[Clip](#)[Brief](#)

Introduction to Algebra Symbols

[Clip](#)[Brief](#)

### Curriculum (September 2007)

Selecting the Right Curriculum

[Brief](#)

Producing Gains

[Clip](#)

### Discussion (January 2013)

Benefits of Discussion

[Clip](#)[Brief](#)

Strategies for Discussion

[Clip](#)[Brief](#)

### Effective Instruction (March 2007)

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Key Strategies

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# Linking RESEARCH & PRACTICE

## The NCTM Research Agenda Conference Report

*Fran Arbaugh*

*Beth Herbel-Eisenmann*

*Nora Ramirez*

*Eric Knuth*

*Henry Kranendonk*

*Judith Reed Quander*

## ***Research Committee***

---

### **Reporting Research for Practitioners: Proposed Guidelines**

NCTM Research Committee

Daniel J. Heck  
*Horizon Research, Inc.*

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*University of Virginia*

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Karen D. King  
*National Council of Teachers of  
Mathematics*

The National Council of Teachers of Mathematics (NCTM) espouses priorities to foster stronger linkages between mathematics education research and teaching practice. Of the five foundational priorities, one is directly focused on research, indicating NCTM's commitment to "ensure that sound research is integrated into all activities of the Council" (NCTM, n.d.). Another priority specifically references



Journals & Books

Teaching Children  
Mathematics

Mathematics Teaching in  
the Middle School

Mathematics Teacher

Mathematics Teacher  
Educator

Journal for Research in  
Mathematics Education

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**David Wees**  
@davidwees



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**Kate Nowak** @k8nowak · Apr 4  
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**Chris Lusto** @Lustomatical · Apr 4  
@davidwees @k8nowak @TheJLV I would be delighted.

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**Jose Vilson** @TheJLV · Apr 4  
@davidwees do as you must. @Lustomatical @k8nowak

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Professions are characterized by:

a domain of skilled performance or *practice*

- Teachers' perception? Typically Positive
- Public perception? Mixed to Unfavorable
- Social media potential? Optimistic

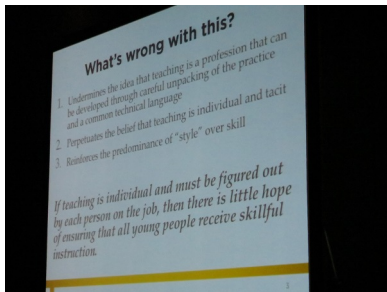


Axe Grind #3: We talkin' about *practice*.

Forget “teaching comes naturally” and “born to teach.”

Just as we want students to focus on effort instead of perceived notions of “natural” ability, teachers should, too. **We shouldn't be teaching like we'd do amateur night at the improv theater.**

# What's wrong with this?



Slide from Nicole Garcia's TeachingWorks presentation 2014-04-10 at NCTM.

- ① Undermines the idea that teaching is a profession that can be developed through careful unpacking of the practice and a common technical language
- ② Perpetuates the belief that teaching is individual and tacit
- ③ Reinforces the predominance of "style" over skill

*If teaching is individual and must be figured out by each person on the job, then there is little hope of ensuring that all young people receive skillful instruction.*

# Unveiling the hidden work of teaching

- Conferences
- Lesson planning
- Curriculum design
- Summer workshops
- Professional development
- Reading
- Collaboration
- Grading
- Reflections
- Policy positions

Professions are characterized by:

the exercise of *judgment* under conditions of unavoidable uncertainty

- Teachers' perception? **Positive**
- Public perception? **Mixed to Positive**
- Social media potential? **Cautiously Optimistic**

Professions are characterized by:

the need for *learning from experience* as theory and practice interact

- Teachers' perception? **Positive**
- Public perception? **Mixed to Positive**
- Social media potential? **Cautiously Optimistic**

# Unveiling the hidden work of teaching

- Conferences
- Lesson planning
- Curriculum design
- Summer workshops
- Professional development
- Reading
- Collaboration
- Grading
- Reflections
- Policy positions



Professions are characterized by:

a professional *community* to monitor quality and aggregate knowledge

- Teachers' perception? Positive with too many false positives
- Public perception? Mixed to Negative
- Social media potential? Positive (but we can do better)

Axe Grind #4: No secret handshakes.

I refuse to use “MathTwitterBlogosphere” or “MTBoS”

If you want to attract people into a community, use familiar language and symbols. **What’s cute to insiders looks like alphabet soup to outsiders.**

Math-myspace Blogger-osphere

VS.

Math-myspace WORDPRESS-osphere



**Chris Robinson**  
@absvalteaching



Following

Had a few conversations w/ newcomers to the #MTBoS. There's a feeling of being intimidated and not being able to "break in" to the +

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7:10 PM - 18 Jun 2013

Reply to @absvalteaching



**Megan Hayes-Golding** @mgolding · Jun 18

@absvalteaching I've been on Twitter longer than any of y'all (get off my lawn!), but was shy for 2+ years to break in & that was preTMC. +

Details

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**Megan Hayes-Golding** @mgolding · Jun 18

@absvalteaching + I think we're worse now. Not that we mean to. Just that we have inside jokes, friendships... Maybe we encourage cohorts?

Details

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**Chris Robinson** @absvalteaching · Jun 18

@mgolding Yeah. It's def. not intentional. But there is the "I'm afraid to ask to sit at their lunch table" mentality right now.

# Exploring the MathTwitterBlogsphere

8 WEEKS OF FUN MISSIONS & PROMPTS, STARTING OCTOBER 6.

📅 November 24, 2013    👤 samjshah

## Mission #8: Sharing is Caring in the MTBoS

It's amazing. You're amazing. You joined in the *Explore the MathTwitterBlogsphere* set of missions, and you've made it to the eighth week. It's Sam Shah here, and whether you only did one or two missions, or you were able to carve out the time and energy to do all seven

Get the weekly missions via email:

[Click me.](#)

Get the weekly missions via RSS:

Source: <http://exploremtbos.wordpress.com/>

# More than a support group?

Whether they draw members from the same school or from different schools, groups of “teachers helping teachers” offer many benefits. Based on accounts of five diverse teacher groups oriented around the challenges of reform, Helen Featherstone (1996) identifies the following benefits:

They address particular problems of practice, they contribute to the professional development of members; they provide social, emotional and practical support; they nurture the development of professional identities; they craft a collective stance on issues related to teaching. (p. 2)

What distinguishes professional learning communities from support groups, where teachers mainly share ideas and offer encouragement, is their critical stance and commitment to inquiry. Exercising what Lord (1994) calls “the traits of critical collegueship,” teachers ask probing questions, invite colleagues to observe, and review their teaching and their students’ learning and hold out ideas for discussion and debate. Among critical colleagues, disagreements (Feiman-Nemser, 2001, p. 1043)

Do we have a critical stance and commitment to inquiry?

Do we know *how*?



EACH DAY  
WE NEED TO  
LOOK AT THE WHY.  
WHAT ARE WE DOING,  
AND WHY ARE WE DOING IT.  
AND REMEMBER  
IT'S ALL ABOUT  
OUR KIDS.

Steven Anderson  
@web20classroom



Source: <https://twitter.com/sjunkins/status/446258513757491202>



## Recap:

- How do we better use available social tools?
- How do we facilitate research to practice?
- How do we build on a shared vision of quality practice?
- How do we welcome newcomers?
- How do we develop norms for a critical stance?
- What's NCTM's role in this?



**Dan Meyer**  
@ddmeyer



Following

There's an "old NCTM" and a "new NCTM,"  
said someone who went to 2 happy hours last  
night. Bridging those 2 ain't a small task.  
[#nctmdenver](#)

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**Christopher**  
@Trianglemancsd



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It has been reported to me that the median age of @nctm member is 55 years. What do we make of this, #MTBos?

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Source: <https://twitter.com/Trianglemancsd/status/381458462854504449>



**Christopher** @Trianglemancsd · Sep 21

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**Marshall Thompson**

@MTChirps



**Follow**

@Trianglemancsd I haven't been an @NCTM member in years. #trueconfessions As a young teacher I struggled to find the value.

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1:12 PM - 21 Sep 2013

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**Christopher** @Trianglemancsd · Sep 21

It has been reported to me that the median age of @nctm member is 55 years. What do we make of this, #MTBos?

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**Lisa Henry**  
@lmhenry9



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@Trianglemancsd I have been an @NCTM since I started teaching. Honestly, I have not read MT in about 3 years (no time & too academic imo)...

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**Christopher** @Trianglemancsd · Sep 21

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**Lisa Henry** @lmhenry9 · Sep 21

@Trianglemancsd About the only reason I continue to belong to @NCTM is for resume purposes. I am seriously considering not reupping next yr.

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**Johanna Cheney**

@JJJsally



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@lmhenry9 @Trianglemancsd @NCTM I join each year because of the magazine for math in the middle school.

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**Christopher** @Trianglemancsd · Sep 21

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**Brian R. Lawler**

@blaw0013



Following

@Trianglemancsd 50% of @NCTM members began teaching when the purpose of HS Alg. 1 was to fail 50% of kids out of math.

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**John Golden** @mathhombre · Apr 22

@TCM\_at\_NCTM re: bridging worlds. Become a platform to connect tchrs. Give subscribers access to all yr content. Organize articles by CCSS.

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**John Golden** @mathhombre · Apr 22

@TCM\_at\_NCTM make it social! Support teachers in collaborating.

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## Discussion

## Follow the *Teachers Leveraging Technology* strand

9:30	Dan Meyer	Video Games and Making Math More like Things Students Like	Great Hall A/D
11:00	Karim Kai Ani	Keeping It Real: Teaching Math through Real-World Topics	Great Hall B/C
12:30	Ashli Black and Chris Hunter	The Mathtwitterblogosphere: Creating Your Own Online Professional Learning Communities	225/226/227
2:00	Kate Nowak	One of Us: Every Teacher a Blogging Teacher	225/226/227
3:30	Panel	Teachers Leveraging Technology in the Classroom	Jefferson Ballroom (Hilton)
8:00 SAT	David Wees	Online Professional Learning Opportunities for Mathematics Educators	R07

Raymond Johnson

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- <http://mathed.net>
- @MathEdnet, +RaymondJohnson

# References I

- Arbaugh, F., Herbel-Eisenmann, B., Ramirez, N., Knuth, E. J., Kranendonk, H., & Quander, J. R. (2010). *Linking research and practice* (Tech. Rep.). Reston, VA: National Council of Teachers of Mathematics. Retrieved from <http://www.nctm.org/news/content.aspx?id=25315>
- Feiman-Nemser, S. (2001, December). From preparation to practice: Designing a continuum to strengthen and sustain teaching. *Teachers College Record*, 103(6), 1013–1055. Retrieved from <http://www.blackwell-synergy.com/links/doi/10.1111/0161-4681.00141> doi: doi: 10.1111/0161-4681.00141
- Heck, D. J., Tarr, J. E., Hollebrands, K. F., Walker, E. N., Berry III, R. Q., Baltzley, P. C., ... King, K. D. (2012). Reporting research for practitioners: Proposed guidelines. *Journal for Research in Mathematics Education*, 43(2), 126–143.

Shulman, L. S. (1998). Theory, practice, and the education of professionals. *The Elementary School Journal*, 98(5), 511–526.