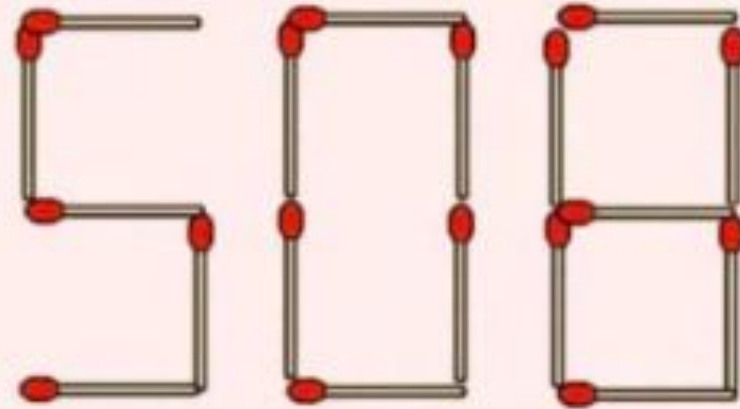


Welcome!

Engage your brain on
this problem while we
wait for all members
to arrive!



What is the biggest number
you can make by
moving exactly 2 matches?

Math Curriculum Adoption K-5, 6-8, High School 2024-2026 Committee Meeting

April 3, 2025
Coronado High School

Call to Order



Roll Call

The Committee

K-5

Julie Ballard- principal
Andrew Banister- teacher
Christine Bonow- Director of Community Education
Laura Batko- teacher
Melissa Caramucci- teacher
Carrie Chapman- teacher
Sierra Connell- teacher
Edie Dolan- parent
Colleen Felix- gifted coach
Nicole Hamilton- teacher
Laura Henry- ELD coach
Amber Lindsey- teacher
Carrie Miller- teacher
Dana Moore- teacher
Karen Pescatore- teacher
Danica Pohl- special education coach
Alyson Sawkiw- teacher
Stephanie Shamy- teacher
Raquel Thomas- teacher
Kim Vallejo- teacher
Nichole Viderman- teacher
Megan Zweig- parent

6-8

Jessica Angelo- special ed mentor teacher
Adrienne Bass- teacher
Abby Brown- parent
Jesus Curiel- teacher
Sarah Dorn- parent
Nicole Fagan- gifted coach
Tamara Jagodzinski- principal
Michelle Miller- teacher
Fred Rabach- teacher
Sara Ruggeri- teacher
William Williams- teacher
Audie Wyatt- teacher

High School

Ted Anderson- teacher
Sherry Belcher- teacher
Casey Boerner- teacher
Sarah Boustilla- teacher
Jacquelyn Buckley- teacher
Stephanie Carver- teacher
Kellen Castillo- teacher
Trey Checkett- community member
Jason Foster- teacher
Kelsey Maslowski- teacher
Christina Murray- teacher
Tim Reckell- community member
Gladis Roa- teacher
Mike Topczewski- teacher
Shannon Yoesle- teacher

Committee Support

Dr. Kim Dodds Keran - Director of Teaching and Learning

- Committee Co-Chair

Donna Dempsey- Math Academic Coach

- Committee Co-Chair

Carline Fried - Math Academic Coach

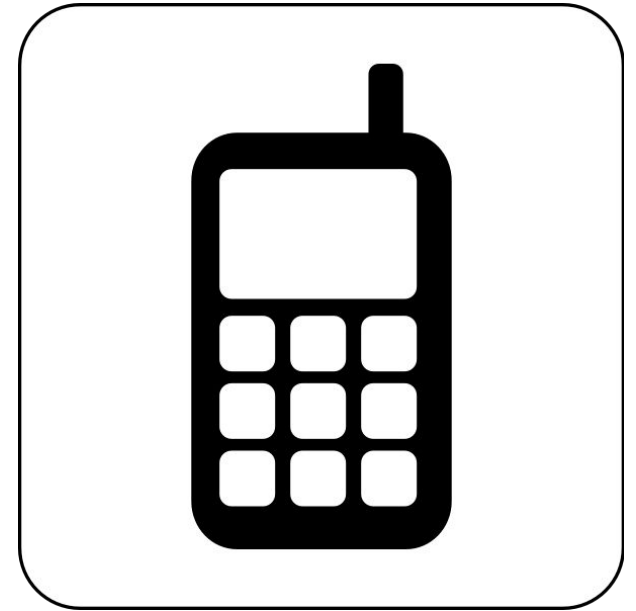
- Committee Co-Chair

Dede Johnston - Instructional Materials Coordinator

Sign In Sheets

Please record arrival time on the sign-in sheet as you arrive. Record departure time if you are leaving before the meeting officially adjourns.

Housekeeping



Agenda

Agenda for April 3, 2025

The Agenda for the meeting is:

1. Call to Order / Math Challenge Opening Slide
2. Roll Call

Information/Discussion and Possible Action

3. Approval of 04/03/2025 Meeting Agenda - Action Item
4. Approval of 03/20/2025 Meeting Minutes- Action Item
5. Math Challenge Share Out
6. Committee Norms Reviewed
7. Activity 1
8. Activity 2
9. A Focus on Best Practices
10. The Modern Math Classroom
11. Effective Teaching Practices
12. Student Practices
13. Connecting Practices to Content
14. Future Meetings



Scottsdale *Unified* School District

Engaging all students in world-class, future-focused learning

NOTICE and AGENDA
MATH CURRICULUM ADOPTION COMMITTEE:
K-5, 6-8, High School
SCOTTSDALE UNIFIED SCHOOL DISTRICT NO. 48

Date: Thursday, April 3, 2025 **Time:** 4:00 - 6:00 pm

Pursuant to A.R.S. §38-431.02, notice is hereby given to the members of the Math Curriculum Adoption Committee, K-5, 6-8, High School and to the general public that on **Thursday, April 3, 2025, at 4:00 PM, at Coronado High School, 7501 E. Virginia Ave. Scottsdale, AZ, 85257**, the Math Curriculum Adoption Committee will hold a meeting. One or more members of the Committee and non-member participants will participate in the meeting in-person.

The Agenda for the meeting is:

1. Call to Order
2. Roll Call

Information/Discussion and Possible Action

3. Approval of 04/03/2025 Meeting Agenda - Action Item
4. Approval of 03/20/2025 Meeting Minutes- Action Item
5. Committee Norms Reviewed
6. Activity 1
7. Activity 2
8. A Focus on Best Practices
9. The Modern Math Classroom
10. Effective Teaching Practices
11. Student Practices
12. Connecting Practices to Content
13. Future Meetings

MATH CURRICULUM ADOPTION COMMITTEE: K-5, 6-8 AND HIGH SCHOOL MATERIALS WILL BE AVAILABLE TWENTY-FOUR (24) HOURS IN ADVANCE OF THE MEETING, AT THE SCOTTSDALE UNIFIED SCHOOL DISTRICT, MOHAVE DISTRICT ANNEX, 8500 E. JACKRABBIT ROAD, SCOTTSDALE, AZ 85250-6768.

Date Posted: April 2, 2025

Action Item

Discussion and Approval of Meeting Agenda for April 5, 2025

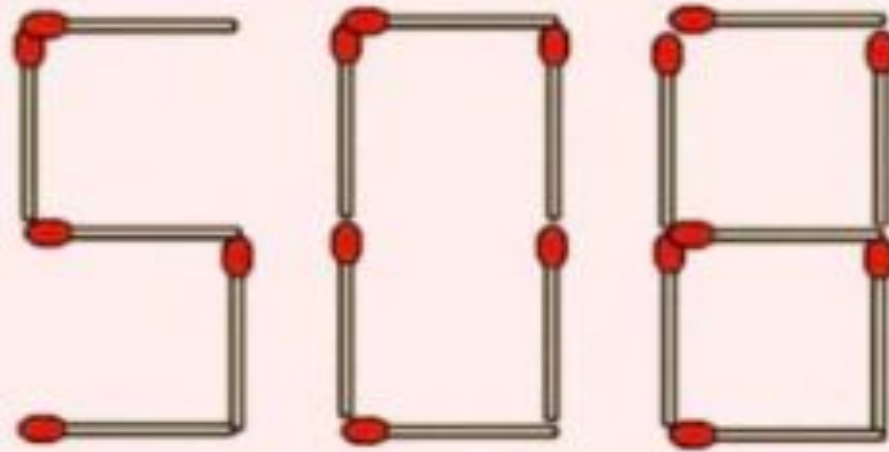
Meeting Minutes

Action Item:

Discussion and Approval of Meeting Minutes for
March 20, 2025

LINK: [3/20/2025 Minutes](#)

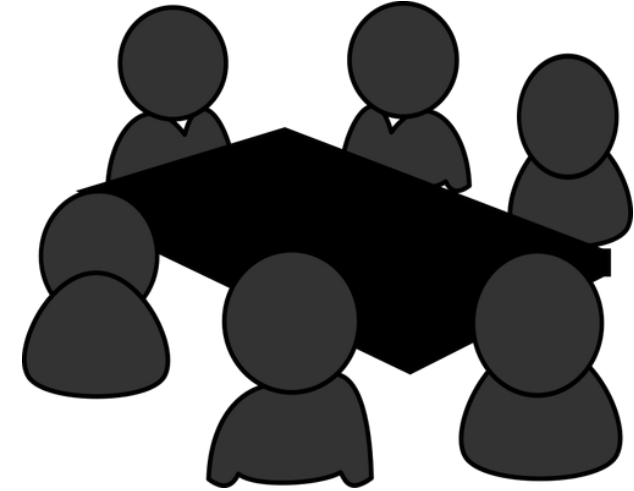
Math Challenge Share Out



**What is the biggest number
you can make by
moving exactly 2 matches?**

Committee Norms

Committee Norms



Establishing norms:

- **Encourages behaviors that allow groups to work together successfully.**
- **Allows groups to dialogue, engage productively in conflict, discuss and decide, invent and problem solve.**
- **Make it safe to examine one's practice and talk about difficult to discuss topics.**

Key Question:

How must we conduct ourselves to allow us to work together most successfully to accomplish our goals?

Norms

Listen to
understand
and ask
questions for
clarification.

Be open to
new ideas.

Invite and
welcome the
contributions of
every member.

Support the
group's
recommendation
after consensus
is reached.

Be mindful of
how often and
how long you
speak.

Questions and
challenges are
welcomed.
Question and
challenge the
idea, not the
person.

Be fully
present.

Activity #1

Exploring Unit Rate

Bargain Hunting Activity

For each exercise below, rates are given in Column A and Column B. Figure out the best buy.

Column A	Unit Rate A	Column B	Unit Rate B	Best Buy (A or B?)
1 apple for \$0.19		3 apples for \$0.59		
20 pounds of pet food for \$14.99		50 pounds of pet food for \$37.99		
A car that travels 308 miles on		A car that travels 406 miles on		

Activity #2

Would you rather buy

18 eggs at this price

or 18 eggs at this price?



h/t @mathcoachcorner



wouldyourathermath.com

A Focus on Best Practices

BALANCE IN MATH LEARNING



- **Conceptual Understanding**
In math education, conceptual understanding means grasping the "why" behind mathematical ideas, not just the "how," enabling students to apply knowledge flexibly and make connections between concepts, rather than just memorizing procedures.
- **Procedural Skill and Fluency**
The ability to apply mathematical procedures efficiently, flexibly, and accurately, while also being able to transfer, build, and modify procedures as needed.
- **Application**
Applying math to real-world situations helps students connect abstract concepts to tangible problems, making learning more meaningful and easier to grasp.

Goal

To identify components of a high quality instructional material (HQIM) by considering various lens.

The Modern Classroom
Effective Teaching Practices
Student Mathematical Practices

The Modern Math Classroom

Modern Math Classroom- Common Findings

What I know

Overall, the feedback emphasizes the need for a supportive, engaging, and high-quality learning environment that connects curriculum to broader educational goals while acknowledging the diverse needs of students.

What I find interesting

Overall, the feedback reflects a strong focus on quality materials, personalized and engaging instruction, and the evolving role of educators in creating supportive, student-centered learning environments.

What I question

Overall, the feedback indicates a strong desire for clarity on instructional strategies, assessment practices, parental involvement, and the overall direction of math education to better support students and teachers alike.

What features would we look for in a high quality curriculum that captures characteristics of “The Modern Math Classroom”?

Effective Teaching Practices

NCTM's Effective Teaching Practices



Math Teaching Practices

From NCTM's Principles to Actions



1 Establish Math Goals to Focus Learning



2 Implement Tasks that Promote Reasoning and Problem Solving



3 Use and Connect Mathematical Representations



4 Facilitate Meaningful Discourse



5 Pose Purposeful Questions



6 Build Procedural Fluency from Conceptual Understanding



7 Support Productive Struggle



8 Elicit and Use Evidence of Student Thinking



ADP Math Team:
Kerney, J. Kerney@azed.gov - Director of
Math and Ed Tech Standards
Larson, C. Larson@azed.gov - NCTM Math Specialist
Molina, T. Molina@azed.gov - NCTM Math Specialist

DOMAIN 1

PLANNING AND PREPARATION

- 1a Applying Knowledge of Content and Pedagogy
 - Disciplinary Expertise
 - Pedagogical Content Knowledge
 - Knowledge of Interdisciplinary Relationships and Skills
- 1b Knowing and Valuing Students
 - Respect for Students' Identities
 - Understanding of Students' Current Knowledge and Skills
 - Knowledge of Whole Child Development
 - Knowledge of the Learning Process and Learning Differences
- 1c Setting Instructional Outcomes Value and Relevance
 - Alignment to Grade-Level Standards
 - Clarity of Purpose
 - Integration of Multiple Aspects of Student Development
- 1d Using Resources Effectively
 - Instructional Materials
 - Technology and Digital Resources
 - Supports for Students
- 1e Planning Coherent Instruction
 - Tasks and Activities
 - Flexible Learning
 - Student Collaboration
 - Structure and Flow
- 1f Designing and Analyzing Assessments
 - Congruence with Instructional Outcomes
 - Criteria and Standards
 - Planning Formative Assessments
 - Analysis and Application

DOMAIN 2

LEARNING ENVIRONMENTS

- 2a Cultivating Respectful and Affirming Environments
 - Positive Relationships
 - Sense of Belonging
 - Cultural Responsiveness
 - Positive Conflict Resolution
- 2b Fostering a Culture for Learning
 - Purpose and Motivation
 - Dispositions for Learning
 - Student Agency and Pride in Work
 - Support and Perseverance
- 2c Maintaining Purposeful Environments
 - Productive Collaboration
 - Student Autonomy and Responsibility
 - Equitable Access to Resources and Supports
 - Non-Instructional Tasks
- 2d Supporting Positive Student Behavior
 - Expectations for the Learning Community
 - Modeling and Teaching Habits of Character
 - Self-Monitoring and Collective Responsibility
- 2e Organizing Spaces for Learning
 - Safety and Accessibility
 - Design for Learning and Development
 - Co-Creation and Shared Ownership

DOMAIN 3

LEARNING EXPERIENCES

- 3a Communicating About Purpose and Content
 - Purpose for Learning and Criteria for Success
 - Specific Expectations
 - Explanations of Content
 - Use of Academic Language
- 3b Using Questioning and Discussion Techniques
 - Critical Thinking and Deeper Learning
 - Reasoning and Reflection
 - Student Participation
- 3c Engaging Students in Learning
 - Rich Learning Experiences
 - Collaboration and Teamwork
 - Use of Instructional Materials and Resources
 - Opportunities for Thinking and Reflection
- 3d Using Assessment for Learning
 - Clear Standards for Success
 - Monitoring Student Understanding
 - Timely, Constructive Feedback
- 3e Responding Flexibly to Student Needs
 - Evidence-Based Adjustments
 - Receptiveness and Responsiveness
 - Determination and Persistence

DOMAIN 4

PRINCIPLED TEACHING

- 4a Engaging in Reflective Practice
 - Self-Assessment of Teaching
 - Analysis and Discovery
 - Application and Continuous Improvement
- 4b Documenting Student Progress
 - Student Progress Toward Mastery
 - Shared Ownership
 - Maintaining Reliable Records
- 4c Engaging Families and Communities
 - Respect and Cultural Competence
 - Community Values
 - Instructional Program
 - Engagement in Learning Experiences
- 4d Contributing to School Community and Culture
 - Relational Trust and Collaborative Spirit
 - Culture of Inquiry and Innovation
 - Service to the School
- 4e Growing and Developing Professionally
 - Curiosity and Autonomy
 - Developing Cultural Competence
 - Enhancing Knowledge and Skills
 - Seeking and Acting on Feedback
- 4f Acting in Service of Students
 - Acting with Care, Honesty, and Integrity
 - Ethical Decision-Making
 - Advocacy

What features would we look for in a high quality curriculum that captures characteristics of Effective Teaching Practices?

Student Practices

Standards of Math Practice - SMP's

Mathematically proficient students....

1. Make sense of problems and persevere in solving them	2. Reason abstractly and quantitatively	3. Construct viable arguments and critique the reasoning of others	4. Model with mathematics
5. Use appropriate tools strategically	6. Attend to precision	7. Look for and make use of structure	8. Look for and express regularity in repeated reasoning

Student Focus Group Feedback

Math's Role in Future Plans:

- Mixed views on relevance - some see clear connections to future careers, others struggle to see applicability.
- Many recognize math's importance for basic life skills like budgeting and financial management.
- Some wish for more practical, real-world applications in curriculum.

Favorite Math Teachers:

- Qualities appreciated: making connections to real life, showing care beyond academics, being fun and engaging, offering calm learning environments.
- Specific praise for teachers who explain well, offer individual help, and make students feel supported.

Challenging Math Teachers:

- Common complaints: moving too fast, not explaining well, relying too heavily on worksheets or videos.
- Some mentioned teachers who seemed irritable or made students feel "stupid."

Current Math Class - Positives and Areas for Improvement:

- Positives: Learning new concepts, engaging teaching styles, clear explanations.
- Areas for improvement: Need for more individualized help, better classroom management, more engaging activities.

Overall Themes:

1. Students desire more real-world applications in math curriculum.
2. There's a strong appreciation for teachers who show care and make learning engaging.
3. Students want to feel supported and believed in by their teachers.
4. There's a desire for balance between challenging work and achievable goals.
5. Technology in learning has mixed reviews - helpful for some, frustrating for others.

What features would we look for in a high quality curriculum that meets the needs of our students?

Connecting Practices to Content

BALANCE IN MATH LEARNING



- **Conceptual Understanding**
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- **Procedural Skill and Fluency**
The ability to apply mathematical procedures efficiently, flexibly, and accurately, while also being able to transfer, build, and modify procedures as needed.
- **Application**
Applying math to real-world situations helps students connect abstract concepts to tangible problems, making learning more meaningful and easier to grasp.

Standards Progression K-Alg 2

Grade Level or High School Course												
K	1	2	3	4	5	6	7	8	Algebra 1	Geometry	Algebra 2	
Standards for Mathematical Practice												
Counting & Cardinality						Ratios & Proportional Relationships	Functions	Functions			Functions	
Operations & Algebraic Thinking					Expressions & Equations			Algebra			Algebra	
Number & Operations in Base Ten					The Number System			Number & Quantity			Number & Quantity	Number & Quantity
		Fractions										
Geometry					Geometry				Geometry			
Measurement & Data					Statistics & Probability			Statistics & Probability			Statistics & Probability	
Domains									Conceptual Categories			

Future Meetings

Next Meeting

Thursday April 10, 2025 from 4:00 - 6:00 at Coronado High School.

Meeting adjourned!

