**Training Towards**

**UMathX Master Teacher Certification – Part 1**

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<tr>
<th>K-ALG1 FLORIDA 3H</th>
<th>DESCRIPTION</th>
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<td><strong>Requirements:</strong></td>
<td>A laptop or a desktop computer with “flash” – (most have it but a free download) If by webinar – a laptop / desktop computer with “flash”, audio and webcam.</td>
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<td><strong>Suggested Pre-Session:</strong> <a href="http://www.UMathX.com">www.UMathX.com</a> - About – About Us – About UMathX – Introduction -Media - select Videos – UMathX, What is it?</td>
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**UMathX – Making A Difference**

UMathX, 10th version of “Understanding Math”, is a cutting edge solution for K to Alg1.

"UMathX is a full service K to Alg1 learning environment, supporting a ‘growth mindset’ within a “learning pit” encouraging students and teachers to ‘grapple’ with concepts.”…2016 Gess Conf. Dubai

**Website**– [www.UMathX.com](http://www.UMathX.com) – About–Resources–Training–Media-Testimonials

**2017 UMathX Brochure** - History and Features of UMathX

**Modeling and Discourse to Make Thinking Visible**

[CreatetheUMathXLearningEnvironment](http://CreatetheUMathXLearningEnvironment) .. Link to A Powerpoint
**SUMMARY LEARNING PRINCIPLES**

- Interactive with audio;
- Encourage “grappling” to support a “growth mindset” - learn from mistakes;
- Multiple representations of concepts;
- Moving from concrete to pictorial to abstract;
- Pacing controlled by the learner;
- Using a wide variety of teaching strategies – options/suggestions within “Frameworks”

**NAVIGATION, MENUS, INTERFACE**

4 Types of Logins: Student, Teacher, Principal, Supervisor

URL for this training only: www.umathx.com/preview

Generic Login: count (as a teacher)

Generic Password: umathx

**CONTENT MENU** - contains all mathematics in all curricula – follows conceptual path – fills gaps

**CURRICULUM MENUS** – for particular curriculum – grade focus – analyze data & redirect learning

**EXAMPLES TO INTRODUCE**

1. **MENUS**
   - First, within the CONTENT Menu, follow path …
     - Fractions> Equivalent Fractions> Pattern Blocks> Hexagon 1 … and also …
     - Fractions> Equivalent Fractions> On a Square Grid> Example 1 & Example 3
   
   **Within the Florida Standards CURRICULUM Menu, follow path to MAFS3.NF.01.03b**
   
   Double Click the lesson-Fractions> Equivalent Fractions> Pattern Blocks> Hexagon1

2. **NAVIGATION**
   - First, within the CONTENT Menu, follow path …
     - Measurement & Geometry> Perimeter and Area of Polygons> Areas of Polygons>
     - Polygons Broken into Simpler Shapes> Example 1
   
   **Within the Florida Standards CURRICULUM Menu, follow path to MAFS7.G.02.06**
   
   Double Click the lesson- Measurement & Geometry> Perimeter and Area of Polygons>
   
   Areas of Polygons> Polygons Broken into Simpler Shapes> Example 1
3 part model lessons .. Get Started, Work at It, Reflect and Connect
- Give suggestions for implementing UMathX within curriculum.
- Open the door to Tiered Learning – RTI
- Open the door to STEM

Located: On www.umathx.com under Resources www.umathx.com/frameworks
also available in Curriculum Menu with the corresponding lesson

Frameworks use the Content Menu, hence they can be used within any curriculum.

Step 1: Select the CURRICULUM Menu Choice – Florida Standards - in UMathX

Step 2: Navigate to CURRICULUM Menu choice within Florida Standards.
Check Florida Standards ..MAFS.1.OA.03.06; MAFS.2.NBT.02.07; MAFS.3.NF.01.01; MAFS.4.NBT.02.05; MAFS.5.NF.02.04a; MAFS.8.F.02.04
Select “lessons button” .. lessons are in a suggested order
Select “frameworks button” to check for available selections

Step 3: Refer to the Framework and navigate to the CONTENT Menu choice.

Note: Previous content & curriculum menus also remain for convenience.

The objective is to solidify functionality and to examine possibilities for learning.
UMathXTreasureHuntCCSSGr6toAlg1 or UMathXTreasureHuntCCSSKto5
Consider setting up a jigsaw activity to investigate content within various grades.

http://www.jamesnottingham.co.uk/learning-pit
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<td><strong>DESCRIPTION</strong></td>
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<td><strong>TESTS RESULTS, DATA ANALYSIS, &amp; BOOKMARKS TO DIRECT LEARNING</strong></td>
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Example: For teacher count within the URL, “preview”, select “Data Module”
Select “Test Data” – Class 6A – Common Core – Student1 – 5.NF
For 5.NF – Aug 26, 2016 – 13/16 – 81.25% - click on line – see que 11 –
Select Action – Review Results (ans & correct answer) or Launch a Lesson for the concept.
Select “Growth Over Time” – CCSS – 5th Grade – Fractions – 1/1/16 to 6/30/16 – **Student1**
Select “Growth Over Time” – CCSS – 5th Grade – Fractions – 1/1/16 to 6/30/16 – **Class 6A**
Teacher count sets a **bookmark** for **Student1**.

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<th><strong>TESTS: CURRICULUM CONTENT CUSTOM</strong></th>
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2 Ways To Access: UMathX Landing Page .. Click on “Do a Test” 📜 or Activity Window .. Click on the 📚 icon.
Test Results are only saved automatically into perpetuity for students when test is completed.
- **Curriculum Tests** - Items within a certain CCSS domain – Ex - 5.NF – see Instructions
  - Try 5.NF test – note que types – show “understanding” & algorithm
- **Content Tests** cover items within a certain content area across grade levels.
- **Custom Tests** are generated by the user by choosing any specific content.

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<th><strong>INTRODUCE SPECIFIC URL, SECURE LOGINS &amp; PASSWORDS</strong></th>
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Participants have been sent their URL, _____, secure individual login _____, password ______
Call up any browser and key in **www.umathx.com/__________**
Participants log in with their logins and passwords and navigate for a few minutes.
The session leader will show: permissions for a specific teacher
- permissions for a specific student
- permissions for a specific Principal
- permissions for a specific supervisor

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<th><strong>THE FIRST LESSON – A KEY</strong></th>
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Whole class lesson, directed from the teacher computer with internet access projected to screen
- Share relevant parts of “Training Towards UMathX Master Teacher Certification – Part 1”
- Choose a lesson topic (perhaps next day’s). This could lead into “Training – Part 2”

R.Neufeld - UMathX – Senior Author –rneufeld@UMathX.com – 866 429 6284