

§111.2. Mathematics, Kindergarten, Adopted 2012.

(1) Mathematical process standards. The student uses mathematical processes to acquire and demonstrate mathematical understanding. The student is expected to: (A) apply mathematics to problems arising in everyday life, society, and the workplace;

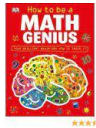
(6) Geometry and measurement. The student applies mathematical process standards to analyze attributes of two-dimensional shapes and three-dimensional solids to develop generalizations about their properties. The student is expected to:

(F) create two-dimensional shapes using a variety of materials and drawings.

§115.2. Health Education, Kindergarten.

(2) Health behaviors. The student understands that behaviors result in healthy or unhealthy conditions throughout the life span. The student is expected to: (A) identify the purpose of protective equipment such as a seat belt and a bicycle helmet

(8) Personal/interpersonal skills. The student understands ways to communicate consideration and respect for self, family, friends, and others. The student is expected to: (A) recognize and describe individual differences and communicate appropriately and respectfully with all individuals;



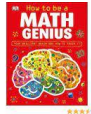
Day 1

Learning Objective: Help students understand how Mathematics is used in our everyday lives?

Reference: “How to be a Math Genius”, by Dr. Mike Goldsmith, Pages 6-7, &13.

Activity: Explain to students that our focus for our Social Emotional Learning this week. Students will be told we will be learning about a disability called Dyscalculia which is something that causes some students to struggle in math more than others. Also explain we will be learning about another feeling called “empathy” which will help us to understand how we can help our classmates, and other students we know who may have Dyscalculia. Students will then be introduced to the book “How to be a Math Genius”. Children will view pages 6, 7, bottom of page 13 using the document reader as teacher reads the page. Students will be encouraged to participate by sharing what they see going on in each picture how are the characters using or showing their mathematical skills in the pictures. Students will then get real world experience by working in groups as they participate in several activities shown on these pages. All students will rotate through each center Sand clock timers will be used to help students gain some understanding of “time”. As students are working in groups teacher will observe and interact with the different groups. After some time, teacher will ask students to stop. As a class we will then process how they felt as they tried each activity and how they think it relates to math. Discussion will center on how they felt, who gave the most help, who needed more help and how they were able to determine that. Answers will be listed on a t-chart. One side will list what was

hard about the activities(Weaknesses). The other side will list what was easy about the activities(Strengths). The last section will identify what were some things their classmate said or did that helped them or made them feel better about their efforts(Empathy). The t-chart will be reviewed continually throughout the week. Lesson will conclude with students providing answers to the question of how we use mathematics every day.

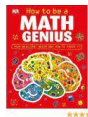


Day 2:

Reference: “How to be a Math Genius”, by Dr. Mike Goldsmith, Pages 10-13.

Learning Objective: Help students to understand what our brain does.

Students will be reminded what our focus is for the week and T-chart will be reviewed. New lesson will be opened by asking students what they know about the brain. Using a KWL chart, this will be listed on the chart. Students will be reminded about “Brain in the Palm of Hand” <https://youtu.be/V0BYs-LN5bY>. Teacher will facilitate a discussion encouraging all students to participate. Teacher will then ask what they would like to learn about the brain. This will also be listed on the KWL chart. It will be explained that today we are learning more about the brain as we continue to read “How to be a math Genius”, so that we can learn how we can help our friends who may have a learning disability like Dyscalculia, which is a math learning disability. Document reader will be used to show pages 10, 11, 12 & top part of 13 as teacher reads them. Students will then learn different hand motions for skills of our brain. This will help students draw a connection to the mental/physical connection to what they are learning. Next students will be placed on teams and participate in matching activities with the applicable side of the brain it is responsible for. Teacher will process with students what made it easy and what made it difficult using the T-chart as a guide. Students will be encouraged to add to the strengths/weakness/empathy list. Lesson will conclude with students be reminded that our brains are responsible for helping us learn. Students will then complete matching worksheet of left brain/right brain activities with a reminder to use the tips that their classmates shared to help them remember.



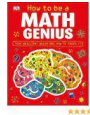
Day 3:

Learning Objective: Help students understand how our memory works.

Reference: “How to be a Math Genius”, by Dr. Mike Goldsmith, Pages 14-17.

Teacher will review what students have learned thus far. Teacher will then read pages 14-19 to students as they follow along using document reader. Students will be drawn into discussion over content of pages as we read them. For demonstration, the teacher will use polaroid camera as an analogy on how our brains captures memories much like a camera and then files them away in short term memory. Using a box decorated as a brain, teacher will show students how our short-term memory can only hold so much memory, and what happens from there. The box

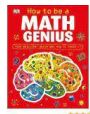
will be divided and marked to represent “sensory” memory, “short-term” memory, and “long-term” memory. Using explanation of how each works, teacher will use manipulatives and polaroid pictures to represent memories. Polaroid camera will represent when we learn something new. Students will then participate in a game in which they have determine what item was taken away. This will help to reinforce how our memory works. Teacher will then process with students how difficult or easy it was for them and why. Again, using the T-chart we will continue to add to each section.



Day 4:

Learning Objective: Help students understand what Dyscalculia is.

Teacher will review what has been covered thus far regarding mathematics, our brain and our memory. Students will then be reminded of how our likened our memories to that of a polaroid camera taking pictures. We will then review the actual demonstration from previous lesson. They will then be asked what would happen if the camera, box or any part of our imaginary brain was not working. Teacher will then explain that sometimes something may not work right in our brains that causes some students’ brains to miss steps that need to happen in the learning process. When it involves math, doctors call it Dyscalculia? It is an illness that can affect children of all ages and even some adults have it. Teacher will give examples of what it looks like for someone their age/grade? Using the polaroid camera and brain model, teacher will process this with students by asking them what are some things they have forgotten when they really needed to remember, and how they felt in those situations. Class will review their feelings t-chart from previous day and make additions to it, based on their answers. Teacher will then review with students what Dyscalculia is to ensure understanding. T-chart will be used to review what they’ve learned thus far.



Day 5:

Learning Objective: Students will learn about empathy and how to apply it with their peers in the classroom.

Teacher will review with students the importance of mathematics in our everyday lives, how the brain works, and what Dyscalculia is. Students will then be encouraged to discuss what we learned earlier in the year about feelings. A new feeling will be added to our feeling board. Children will be asked if they know what “empathy” is. Teacher will explain that empathy is placing ourselves in someone else’s shoes and trying to understand how they feel. Students will also be told how difficult it can be to have empathy when one of our friends is struggling with something. However, when we do it allows us to feel closer to the person and support them which is very important. Teacher will then give two classroom scenarios and brain storm wit students on how they can make their classmate feel better or cheer them up. Teacher will then summarize how all week long we have been learning about math, the brain, what happens when

someone's brain has a little harder time processing and therefore it makes it takes them longer to learn things. Correlation will be drawn to how we all have different strengths and weaknesses, but we are all very capable of learning. It just may be a different pace and that is OK. Teacher will then use the T-chart to review and facilitate a discussion around all the different ways they have been supportive of each other all week long. As a class the teacher will encourage the students to come up with several different statements of how they will commit to provide support when they notice a classmate is struggling. These statements will be written in a positive and supportive way. For example, "We will commit to only using kind words when a classmate takes a longer time to complete their work". " We commit to remaining silent even when we finish our work before our desk mate". At conclusion of discussion, students will sign the contract after it is written on butch paper. Students will be encouraged to decorate and it will be hung in the classroom.

Reference

Goldsmith, M. (2012). Train your brain to be a math genius. DK Publisher.