



SPARKNotes

Students Pursuing Advanced Reasoning & Knowledge

September 6, 2024

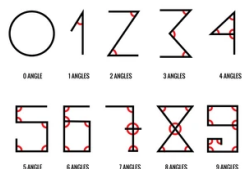
From the Director



What are these students doing? We often have problem-solving activities throughout the year so the students learn how to work together and come up with creative solutions. In this activity, they had to line up according to the months of their birthdays. If more than one student was in a month, they had to line up in numerical order. There was just one catch - they couldn't talk. So students came up with creative ways to organize themselves.

Lesson Summaries

Math



To help the students with mental math, I began class this semester by introducing math 0-9, a concept taught by Scott Flansburg (The Human Calculator). He teaches how each digit's symbol from 0 to 9 was originally chosen for the amount of angles it contains and that many math patterns can be found with 9, which can speed up mental math calculations. This week we reviewed the Properties of Numbers.

Algebra

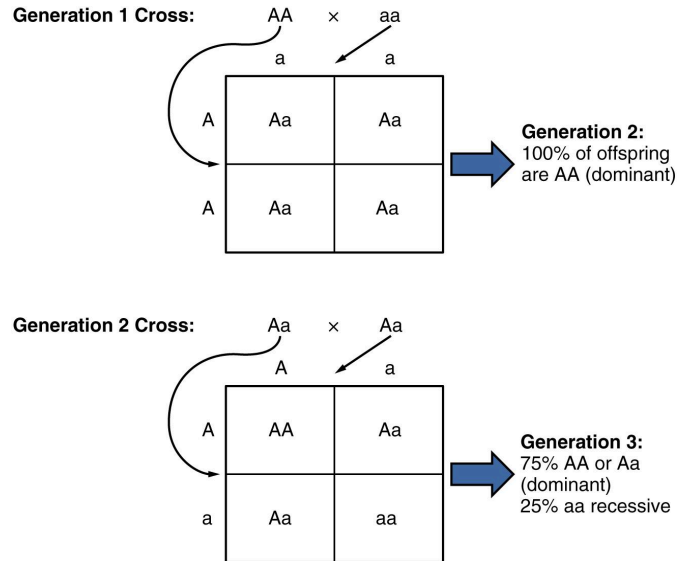
This first week was introductory as we entered our study of the properties of numbers. We focused on the distributive property, as it is used all the time in the later algebra chapters. Students will often have different assignments for my class, as their assignment is based on how well they understood the content in class and how fast they were able to work through it. I do this to allow no wasted time for those who already understand the subject matter well. I look forward to this group of students this year, they are all very hard working.

Geometry

This week, students learned real-world applications of geometry, the defined and undefined terms of geometry, basic constructions, and how to solve geometry problems using algebra.

Science

If you thought it was strange that your child asked to look at your earlobes and toes this week, it was because he or she was looking for Mendelian traits you have in common. We are starting with Genetics in our Human Body Unit this semester. We learned about Gregor Mendel, the father of genetics, and his pea plant experiments. Students learned how to create a Punnett square with dominant and recessive alleles. They also tested themselves for right and left-side dominance. We discovered we have five students and one teacher that is left-handed. While the average population is only 10% lefties, we have 17%.



Language Arts

The students presented their Summer Reading Book Commercial this week. The goal was to try to “sell” the other students on wanting to read the book. Afterwards, we voted on whether to put the book on our SPARK Students Recommended Book List. One of our goals in LA this year is to read more books - for some students that means reading one book, for others it could mean reading an entire series. One of the hardest parts of getting a child to read more is to find a book they find interesting. This list should help.

Social Studies

We began this year discussing the different areas of social studies since it is such a broad subject. Students will be studying world history this semester, which will also include geography, anthropology, and civics. I like to begin with geography because the students need to know where in the world we are studying before we dive into the topic. Our first lesson is on Mesopotamia, so I had the students compete in a Middle East geography quiz on Geoguessr. Reece was the winner by completing all 16 countries in the region in 19 seconds! This weekend’s assignment is to research an ancient site from the region to give us insight into the history of ancient Mesopotamia.