

Dear families,

We would like to share information about the two general education math course options available for seventh grade: **Pre-Algebra** and **Algebra 1**. Students will automatically be placed in **Pre-Algebra**. However, families may choose to self-select their child into **Algebra 1**, **after considering the information provided below.**

Course descriptions

- Pre-Algebra: Students learn the 8th grade Michigan Math Standards.
- Algebra 1: Students learn high school Michigan Math Standards.

The [math learning pathways](#) document shows the future math courses students can take based on their placement in either Pre-Algebra or Algebra 1.

Important Considerations for Algebra 1

Algebra 1 is a high school-level course, and students' grades will be recorded on their high school transcripts. Please note that the rigor and complexity of the Algebra 1 curriculum may require increased effort and time from students. To be fully prepared for high school math concepts, students must have mastered 8th grade math standards.

To be successful in Algebra 1, students need to have mastered the following 8th grade concepts:

- Solve Equations with variables on both sides
- Translate, reflect, rotate, and dilate figures
- Find missing angles in polygons and in parallel lines/transversals
- Graph and write linear equations
- Solve a system of linear equations in two variables
- Approximate the line of best fit in a scatter plot
- Use the properties of exponents to find equivalent expressions
- Use the pythagorean theorem to solve problems.
- Find a square root and cube root
- Find the Volume of cylinders, cones, and spheres

Please note that Algebra 1 teachers will not be expected to reteach 8th grade content or provide extensive individual tutoring. Students who opt for Algebra 1 should already be confident in these foundational skills.

Suggested criteria

We have included criteria below to help families determine if Algebra 1 is the right choice for their child. If your child learned 8th grade math in a previous course, please provide documentation of this class by emailing their middle school counselor. Families who are considering Algebra 1 should complete the table below using your child's assessment scores, linked [Pre-Algebra Test](#) score, and the [disposition inventory](#) scores. Students ready for the Algebra 1 course should be scoring at the levels indicated in the table.

	State or Standardized Test Score	Normed Diagnostic Assessment ex. iReady	Pre-Algebra Test	Student Disposition Inventory Score	Parent/ Caregiver Inventory Score
Your Child's Score					
Expected Score for an Algebra 1 Student	Advanced	90th percentile or above OR 8th grade level	84% or better	45 or higher	28 or higher

If, after reviewing this information, you determine that **Pre-Algebra** is the most appropriate placement for your child, no further action is required, and your child will be automatically enrolled in Pre-Algebra.

If you believe **Algebra 1** is the best fit for your child, please contact your child's counselor with their scores from the table above or documentation of any previous course where they learned 8th-grade math. Once this information is provided, the counselor will ensure your child is enrolled in Algebra 1 when scheduling their classes.

Sincerely,

RCS Curriculum Department

Possible Study Materials for Algebra 1

- [Khan Academy 8th Grade Course](#)
- [IXL 8th Grade Skills](#) - paid subscription
- [Big Ideas Modeling Real Life Grade 8 Textbook](#)