NFPS Mathematics Progression

Board of Education Curriculum Subcommittee New Fairfield Public Schools April 28, 2025



About 6-12 Mathematics in NFPS

New Fairfield Public Schools seeks to provide all students with the opportunity to excel in mathematics while ensuring a solid foundation of conceptual understanding and skills.

Opportunities to undertake accelerated mathematics pathways are available for high-performing students beginning in our middle school program.

6-12 Mathematics Course Offerings

| Grade 6 | Grade 7 | Grade 8 | Grade 9 | Grade 10 | Grade 11 | Grade 12 |
|---------|-------------|------------------------|---------------------------------|-------------|--|---|
| Math 6 | Math 7 | Math 8: Pre-Algebra | Algebra Intermediate Algebra I | Geometry | Algebra II | PreCalculus College Math Topics |
| | Pre-Algebra | Algebra I | Geometry | Algebra II | PreCalculus | Calculus AP/ECE Calculus (AB/BC) |
| | Algebra I | Geometry | Algebra II | PreCalculus | Calculus AP/ECE Calculus (AB/BC) | A/so, Statistics 1 & 2 AP Statistics AP Computer Science |
| | | | | | | Explorations in Data |

Students placed into an accelerated mathematics course are expected to:

- apply **higher-level thinking skills** independently and consistently;
- engage in elevated levels of mathematical discourse;
- demonstrate strong organizational skills and independent work habits; and,
- be highly motivated, self-directed learners who grasp new concepts quickly.

NFMS Placement Criteria - Grade 6 to Grade 7

Sixth Grade to Seventh Grade

The following are the requirements for placement into an accelerated mathematics pathway as a rising 7th grade student. Note that placement is based on a preponderance of data, not any single data point alone.

Math 6 to Pre-Algebra 7

- Level 3 or 4 SBAC
- iReady, grade 6, 80th% or above
- T1, T2, T3 grade 6 math report card grades, 90 or above
- District mathematics / algebra readiness screener
- Teacher recommendation

Math 6 to Algebra 1

- Level 4 SBAC
- iReady, grade 6, 90th% or above
- T1, T2, T3 grade 6 math report card grades, 95 or above
- District mathematics / algebra readiness screener
- Teacher recommendation

Continued participation in an accelerated mathematics course sequence is contingent upon a student meeting performance expectations in the current accelerated course throughout the school year and meeting the placement criteria for the next-year's course.

NFMS Placement Criteria - Grade 7 to Grade 8

Seventh Grade to Eighth Grade

The following are the requirements for placement into an accelerated mathematics pathway as a rising 8th grade student. Note that placement is based on a preponderance of data, not any single data point alone.

Pre-Algebra 7 to Algebra I

- Level 3 or 4 SBAC
- iReady, grade 7, 80th% or above
- T1, T2, T3 grade 7 math report card grades (Pre-Algebra), 85 or above
- Teacher recommendation

Algebra I to Honors Geometry 8

- Level 4 SBAC
- iReady, grade 7, 90th% or above
- T1, T2, T3 grade 7 math report card grades (Algebra I), 85 or above
- Teacher recommendation

NFMS Placement Criteria - Grade 8 to Grade 9

Eighth Grade to Ninth Grade (New Fairfield High School)

The following are the requirements for placement into an accelerated mathematics pathway as a rising 8th grade student. Note that placement is based on a preponderance of data, not any single data point alone.

Algebra I to Geometry

- T1, T2, T3 grade 8 math report card grades (Algebra I), 85 or above. (Placement into HS Algebra I will be considered for students who have a grade lower than 85 in Algebra I 8 to ensure algebra foundations are solid.)
- Algebra I 8 cumulative mid-term, 85% or above
- iReady, grade 8 (all semesters), 80th% or above
- Teacher recommendation

Honors Geometry 8 to Honors Algebra 2

- Students must complete Honors Geometry 8 with a grade of 85 or higher at the time of recommendations. (Placement into College Prep Algebra 2 will be considered for students who have a grade lower than 85 in Honors Geometry 8 to ensure foundations are solid.)
- iReady, grade 8 (all semesters), 90th% or above
- Honors Geometry 8 cumulative mid-term, 85% or above
- Teacher recommendation

It is important to note:

- (1) All mathematics classes provide differentiated instruction to meet student needs.
- (2) A solid foundation of skills is essential in mathematics.
- (3) Not all students will benefit from an accelerated pathway at the same time.

For this reason, **multiple entry points** into an accelerated mathematics pathway are offered to students both in the middle school and later in the high school years to allow students to advance when most appropriate for them.

| | Grade 6 | Grade 7 | Grade 8 | Grade 9 | Grade 10 | Grade 11 | Grade 12 |
|--|---------|-------------|-------------|---|---|--------------------------|--------------------------------|
| | | | | Algebra Intermediate | | | |
| | Math 6 | Math 7* | Math 8: | Algebra I | Geometry* | Algebra II | PreCalculus |
| | | | Pre-Algebra | | * Double math class option available: Geometry & Algebra II | | College Math Topics |
| | | Pre-Algebra | Algebra I | Geometry* | Algebra II | PreCalculus | Calculus AP/ECE Calculus |
| | | | | * Double math class option available: Geometry & Algebra II | | | (AB/BC) Also, |
| | | Algebra I | Geometry | Algebra II | PreCalculus | Calculus AP/ECE Calculus | Statistics 1 & 2 AP Statistics |
| | | | | | (AB/BC) | AP Computer Science | |
| | | | | | | | Explorations in Data |

When parents have questions ...

- Parents are encouraged to be in touch with their child's mathematics teacher if they have any questions regarding their child's mathematics performance or placement.
- Powerschool now provides parent access to student standardized testing results (iReady, SBAC) through the Portfolio link.
- Report card grades are available in Powerschool.
- Communication and dialogue is critical between parents/ guardians, mathematics teacher, and our 6-12 mathematics program leader in instances of placement concerns.