



# Key Topics by Grade with Connecticut Mathematics Curriculum Framework



## 3rd Grade

- |                                     |                                     |
|-------------------------------------|-------------------------------------|
| 1. Place Value to 10,000            | 3:2.1a(1)<br>4:2.1a(1)<br>4:2.2a(1) |
| 2. Multi-Digit Addition             | 3:2.2b(1)                           |
| 3. Multi-Digit Subtraction          | 3:2.2b(1)                           |
| 4. Multiplication by a Single Digit | 3:2.2c(1)<br>3:2.2c(4)              |
| 5. Division by a Single Digit       | 3:2.2c(2)                           |
| 6. Geometry—Identifying Shapes      | 3:3.1a(1)                           |
| 7. Basic Fractions                  | 3:2.1b(1)<br>3:2.1b(2)<br>3:2.2d(1) |

## 4th Grade

- |   |                        |
|---|------------------------|
| 1. Place Value to 1,000,000                   | 5:2.1a(1)<br>5:2.1a(2) |
| 2. Multi-Digit Multiplication                 | 4:2.2b(1)<br>5:2.2a(3) |
| 3. Long Division w/Single Digit Divisor       | 3:2.2c(4)<br>4:2.2b(5) |
| 4. Geometry—Area and Perimeter                | 4:3.3a(3)              |
| 5. Algebra—Find the Missing Number or Sign    | 4:1.3a(1)              |
| 6. Add/Subtract Fractions w/Like Denominators | 4:2.2c(1)              |
| 7. Basic Decimals—Add/Subtract Decimals       | 5:2.1a(5)<br>5:2.1c(2) |

## 5th Grade

- |  |                                     |
|--|-------------------------------------|
| 1. Graphing Coordinates                          | 5:3.2b(1)                           |
| 2. Long Division w/Multi-Digit Divisors          | 5:2.2a(3)<br>6:2.2a(2)              |
| 3. Multiply/Divide Decimals                      | 6:2.2a(5)                           |
| 4. Geometry—Area of Parallelograms and Triangles | 5:3.1b(2)<br>6:3.1b(1)              |
| 5. Add/Subtract Integers                         | 7:2.2a(1)                           |
| 6. Add/Subtract Fractions w/Unlike Denominators  | 5:2.2d(3)                           |
| 7. Decimals, Fractions, and Percents             | 5:2.1c(1)<br>6:2.1c(2)<br>6:2.1c(3) |

## 6th Grade

- |  |                                     |
|--|-------------------------------------|
| 1. Factoring Numbers, GCF, and LCM                 | 5:2.1c(1)                           |
| 2. Geometry—Circumference/Area of a Circle         | 6:3.1b(2)                           |
| 3. Add/Subtract Mixed Numbers                      | 6:2.2a(5)                           |
| 4. Ratios and Proportions                          | 6:2.1d(2)<br>6:2.1d(3)<br>7:2.1a(3) |
| 5. Multiply/Divide Integers                        | 7:2.2a(1)                           |
| 6. Algebra—Solve One-Step Equations                | 5:1.3a(2)<br>6:1.3b(1)              |
| 7. Compare/Order Fractions, Decimals, and Integers | 6:2.1a(1)                           |

## 7th Grade

- |  |                        |
|--|------------------------|
| 1. Order of Operations                     | 6:2.2a(3)              |
| 2. Multiply/Divide Fractions               | 6:2.2a(5)<br>7:2.2a(2) |
| 3. Powers, Exponents, and Roots            | 7:2.1b(1)<br>8:2.1a(3) |
| 4. Algebra—Solve Two-Step Equations        | 7:1.3b(1)              |
| 5. Graphing Using the Slope Formula        | 8:1.2a(1-3)            |
| 6. Simplifying Fractions w/Variables       | 8:1.3a(1)              |
| 7. Pythagorean Theorem and Right Triangles | 8:3.1a(2)              |

## 8th Grade

- |                                       |           |
|---------------------------------------|-----------|
| 1. Algebra—Solve Multi-Step Equations | 8:1.3a(1) |
| 2. Add/Subtract Polynomials           | 8:1.3a(1) |
| 3. Multiply/Divide Polynomials        | 8:1.3a(1) |
| 4. FOIL                               | 8:1.3a(1) |
| 5. Factoring Polynomials              | 8:1.3a(1) |
| 6. Graph Linear Equations             | 9:1.2a(1) |
| 7. Quadratic Formula                  | 9:1.3a(1) |