## Expected Fluency (K-8)

- K Add/Subtract within 5
- 1 Add/Subtract within 10
- 2 Add/Subtract within 20 (know single digit sums from memory)
- 2 Add/Subtract within 100 using strategies based on place value
- 3 Multiply/Divide within 100 (know single digit sums from memory)
- 3 Add/Subtract within 1000 using strategies based on place value
- 4 Add/Subtract multi-digit whole numbers using the standard algorithm
- 5 Multi-digit multiplication using the standard algorithm
- 6 Multi-digit division
- 6 Multi-digit decimal operations

Solve one-variable equations of the form $p x+q=r$ and $p(x+q)=r$

## Recommended Fluency (9-12)

- Algebra I
- Solving characteristic problems involving the analytic geometry of lines
- Fluency in adding, subtracting and multiplying polynomials
- Fluency in transforming expressions and seeing parts of an expression as a single objec $\dagger$
- Geometry
- Fluency with the triangle congruence and similarity criteria
- Fluency with the use of coordinates
- Fluency with the use of construction tools
- Algebra II
- Divide polynomials with remainder by inspection in simple cases
- See structure in expressions and use the is structure to rewrite expressions
- Fluency in translating between recursive definitions and closed forms

