### STAAR Standards Snapshot - Grade 6 Math
(New TEKS - 2014-15)

<table>
<thead>
<tr>
<th>Rptg Cat</th>
<th>STAAR</th>
<th>Readiness Standards</th>
<th>Supporting Standards</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>6.1(A)</td>
<td>apply mathematics to problems arising in everyday life, society, and the workplace</td>
<td>classify whole numbers, integers, and rational numbers using a visual representation such as a Venn diagram to describe relationships between sets of numbers</td>
</tr>
<tr>
<td>1</td>
<td>6.1(B)</td>
<td>use a problem-solving model that incorporates analyzing given information, formulating a plan or strategy, determining a solution, justifying the solution, and evaluating the problem-solving process and the reasonableness of the solution</td>
<td>identify a number, its opposite, and its absolute value</td>
</tr>
<tr>
<td>1</td>
<td>6.1(C)</td>
<td>select tools, including real-world objects, manipulatives, paper and pencil, and technology as appropriate, and techniques, including mental math, estimation, and number sense as appropriate, to solve problems</td>
<td>locate, compare, and order integers and rational numbers using a number line</td>
</tr>
<tr>
<td>1</td>
<td>6.1(D)</td>
<td>communicate mathematical ideas, reasoning, and their implications using multiple representations, including symbols, diagrams, graphs, and language as appropriate</td>
<td>extend representations to organize, record, and communicate mathematical ideas</td>
</tr>
<tr>
<td>1</td>
<td>6.1(E)</td>
<td>create and use representations to organize, record, and communicate mathematical ideas</td>
<td>analyze mathematical relationships to connect and communicate mathematical ideas</td>
</tr>
<tr>
<td>1</td>
<td>6.1(F)</td>
<td>display, explain, and justify mathematical ideas and arguments using precise mathematical language in written or oral communication</td>
<td></td>
</tr>
<tr>
<td>1</td>
<td>6.1(G)</td>
<td>apply mathematical knowledge to identify and explain the reasons for characteristics of families of functions or relationships between sets of numbers</td>
<td></td>
</tr>
</tbody>
</table>

### Supporting Standards

#### 1. Numerical Representations and Relationships

- **6.2(D)** order a set of rational numbers arising from mathematical and real-world contexts
- **6.4(G)** generate equivalent forms of fractions, decimals, and percents using real-world problems, including problems that involve money
- **6.7(A)** generate equivalent numerical expressions using order of operations, including whole number exponents, and prime factorization
- **6.7(D)** generate equivalent numerical expressions using the properties of operations: inverse, identity, commutative, associative, and distributive properties

#### 2. Computations and Algebraic Relationships

- **6.3(D)** add, subtract, multiply, and divide integers fluently
- **6.3(E)** multiply and divide positive rational numbers fluently
- **6.4(B)** apply qualitative and quantitative reasoning to solve prediction and comparison of real-world problems involving ratios and rates
- **6.5(B)** solve real-world problems to find the whole given a part and the percent, to find the part given the whole and the percent, and to find the percent given the part and the whole, including the use of concrete and pictorial models
- **6.6(C)** represent a given situation using verbal descriptions, tables, graphs, and equations in the form \( y = kx \) or \( y = x + b \)
- **6.10(A)** model and solve one-variable, one-step equations and inequalities that represent problems, including geometric concepts

#### 3. Geometry and Measurement

- **6.4(H)** convert units within a measurement system, including the use of proportions and unit rates
- **6.8(D)** determine solutions for problems involving the area of rectangles, parallelograms, trapezoids, and triangles and volume of right rectangular prisms where dimensions are positive rational numbers
- **6.11(A)** graph points in all four quadrants using ordered pairs of rational numbers
- **6.12(C)** summarize numeric data with numerical summaries, including the mean and median (measures of center) and the range and interquartile range (IQR) (measures of spread), and use these summaries to describe the center, spread, and shape of the data distribution
- **6.12(D)** summarize categorical data with numerical and graphical summaries, including the mode, the percent of values in each category (relative frequency table), and the percent bar graph, and use these summaries to describe the data distribution
- **6.13(A)** interpret numeric data summarized in dot plots, stem-and-leaf plots, histograms, and box plots

#### 4. Data Analysis and Personal Financial Literacy

- **6.12(C)** summarize numeric data graphically, including dot plots, stem-and-leaf plots, histograms, and box plots
- **6.12(B)** use the graphical representation of numeric data to describe the center, spread, and shape of the data distribution
- **6.13(B)** distinguish between situations that yield data with and without variability
- **6.14(A)** compare the features and costs of a checking account and a debit card offered by different local financial institutions
- **6.14(B)** distinguish between debit cards and credit cards
- **6.14(C)** balance a check register that includes deposits, withdrawals, and transfers
- **6.14(D)** describe the information in a credit report and how long it is retained
- **6.14(F)** describe the value of credit reports to borrowers and to lenders
- **6.14(G)** explain various methods to pay for college, including through savings, grants, scholarships, student loans, and work-study
- **6.14(H)** compare the annual salary of several occupations requiring various levels of post-secondary education or vocational training and calculate the effects of the different annual salaries on lifetime income

### # Items

<table>
<thead>
<tr>
<th>Category</th>
<th># Items</th>
</tr>
</thead>
<tbody>
<tr>
<td>Readiness Standards</td>
<td>52 (4 Gridtable)</td>
</tr>
<tr>
<td>Supporting Standards</td>
<td>18-21 questions from Supporting Standards</td>
</tr>
</tbody>
</table>

Source: Texas Education Agency STAAR Resources

REV 02/03/2014