

# IXL Skill Alignment

3rd alignment for GO Math! 2015 Common Core Edition

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#### Addition and Subtraction Within 1,000

| Textbook section                                | IXL ski               | IXL skills  |  |
|---|-----------------------|---|--|
| 1.1: Number Patterns                            | A.2                   | Even or odd: arithmetic rules >>                            |  |
|   | See als<br><b>N.3</b> | so: Properties of addition >>                               |  |
| 1.2: Round to the Nearest Ten or Hundred        | P.1                   | Rounding - nearest ten or hundred only >>                   |  |
| 1.3: Estimate Sums                              | P.5                   | Estimate sums up to 1,000 >>                                |  |
| 1.4: Mental Math Strategies for Addition        |                       |   |  |
| <b>1.5:</b> Use Properties to Add               | N.4                   | Solve using properties of addition >>                       |  |
|   | See als<br><b>N.3</b> | so: Properties of addition >>                               |  |
| <b>1.6:</b> Use the Break Apart Strategy to Add |                       |   |  |
| 1.7: Use Place Value to Add                     | C.1                   | Add two numbers up to three digits >>                       |  |
|   | C.3                   | Add two numbers up to three digits - word problems >>       |  |
|   | See also:             |   |  |
|   | C.4                   | Complete the addition sentence - up to three digits >>      |  |
|   | C.6                   | Add three numbers up to three digits each >>                |  |
|   | <b>C.7</b>            | Add three numbers up to three digits each: word problems >> |  |
|   | P.5                   | Estimate sums up to 1,000 >>                                |  |
| <b>1.8:</b> Estimate Differences                | P.8                   | Estimate differences up to 1,000 >>                         |  |
| 1.9: Mental Math Strategies for Subtraction     |                       |   |  |
| 1.10: Use Place Value to Subtract               | D.1                   | Subtract numbers up to three digits >>                      |  |
|   | D.3                   | Subtract numbers up to three digits - word problems >>      |  |



|  | D.4                   | Complete the subtraction sentence - up to three digits >> |
|--|-----------------------|---|
|  | See als<br><b>D.9</b> | Subtraction: fill in the missing digits >>                |
| 1.11: Combine Place Values to Subtract | D.1                   | Subtract numbers up to three digits >>                    |
|  | D.3                   | Subtract numbers up to three digits - word problems >>    |
| 1.12: Model Addition and Subtraction   |                       |   |



#### Represent and Interpret Data

| Textbook section                      | IXL skills |   |
|---------------------------------------|------------|---|
| 2.1: Organize Data                    | U.4        | Interpret tally charts and tables >>                        |
| 2.2: Use Picture Graphs               | U.11       | Interpret pictographs >>                                    |
| 2.3: Make Picture Graphs              | U.12       | Create pictographs >>                                       |
| <b>2.4:</b> Use Bar Graphs            | U.5<br>U.6 | Interpret bar graphs >> Use bar graphs to solve problems >> |
| 2.5: Make Bar Graphs                  | U.7        | Create bar graphs >>  |
| <b>2.6:</b> Solve Problems Using Data | U.6        | Use bar graphs to solve problems >>                         |
| 2.7: Use and Make Line Plots          | U.8<br>U.9 | Interpret line plots >> Create line plots >>                |



### **Understand Multiplication**

| Textbook section                                   | IXL skills |   |
|--|------------|---|
| 3.1: Count Equal Groups                            | E.1        | Count equal groups >>                                   |
| 3.2: Relate Addition and Multiplication            | E.2        | Identify multiplication expressions for equal groups >> |
|  | E.3        | Write multiplication sentences for equal groups >>      |
|  | E.4        | Relate addition and multiplication for equal groups >>  |
|  | N.9        | Relate addition and multiplication >>                   |
| <b>3.3:</b> Skip Count on a Number Line            | E.8        | Write multiplication sentences for number lines >>      |
| 3.4: Model Multiplication                          |            |   |
| 3.5: Model with Arrays                             | E.6        | Write multiplication sentences for arrays >>            |
|  | E.7        | Make arrays to model multiplication >>                  |
|  | See al     | 'so:  |
|  | E.5        | Identify multiplication expressions for arrays >>       |
| <b>3.6:</b> Commutative Property of Multiplication |            |   |
| 3.7: Multiply with 0 and 1                         | F.1        | Multiply by 0 >>  |
|  | F.2        | Multiply by 1 >>  |



#### Multiplication Facts and Strategies

| Textbook section                                 | IXL ski    | IXL skills  |  |
|--|------------|---|--|
| <b>4.1:</b> Multiply with 2 and 4                | F.3        | Multiply by 2 >>  |  |
|  | F.5        | Multiply by 4 >>  |  |
| <b>4.2:</b> Multiply with 5 and 10               | F.6        | Multiply by 5 >>  |  |
|  | F.11       | Multiply by 10 >>   |  |
| <b>4.3:</b> Multiply with 3 and 6                | F.4        | Multiply by 3 >>  |  |
|  | F.7        | Multiply by 6 >>  |  |
|  | See als    | 50:   |  |
|  | <b>G.1</b> | Multiplication tables for 2, 3, 4, 5, and $10 >>$                       |  |
|  | <b>G.2</b> | Multiplication facts for 2, 3, 4, 5, and 10: true or false? >>          |  |
|  | G.3        | Multiplication facts for 2, 3, 4, 5, and 10: sorting >>                 |  |
|  | G.4        | Multiplication facts for 2, 3, 4, 5, and 10: find the missing factor >> |  |
| <b>4.4:</b> Distributive Property                |            |   |  |
| <b>4.5:</b> Multiply with 7                      | F.8        | Multiply by 7 >>  |  |
| 4.6: Associative Property of Multiplication      | N.5        | Properties of multiplication >>   |  |
| <b>4.7:</b> Patterns on the Multiplication Table |            |   |  |
| <b>4.8:</b> Multiply with 8                      | F.9        | Multiply by 8 >>  |  |
| <b>4.9:</b> Multiply with 9                      | F.10       | Multiply by 9 >>  |  |
|  | See als    | 50:   |  |
|  | <b>G.5</b> | Multiplication tables for 6, 7, 8, and 9 $>>$                           |  |
|  | G.8        | Multiplication facts for 6, 7, 8, and 9: find the missing factor >>     |  |
|  | <b>G.9</b> | Multiplication tables up to 10 >>                                       |  |
|  | G.12       | Multiplication facts up to 10: find the missing factor >>               |  |



**4.10:** Problem Solving - Multiplication

- **H.6** Multiplication word problems >>
- **H.7** Multiplication word problems: find the missing factor >>



### **Use Multiplication Facts**

| Textbook section  | IXL ski | lls   |
|---|---------|---|
| <b>5.1:</b> Describe Patterns                               | H.4     | Multiplication input/output tables >>                                   |
|   | H.5     | Multiplication input/output tables: find the rule >>                    |
| <b>5.2:</b> Find Unknown Numbers                            | G.4     | Multiplication facts for 2, 3, 4, 5, and 10: find the missing factor >> |
|   | G.8     | Multiplication facts for 6, 7, 8, and 9: find the missing factor >>     |
|   | G.12    | Multiplication facts up to 10: find the missing factor >>               |
| <b>5.3:</b> Problem Solving - Use the Distributive Property |         |   |
| <b>5.4:</b> Multiplication Strategies with Multiples of 10  |         |   |
| <b>5.5:</b> Multiply 1-Digit Numbers by Multiples of 10     | Н.1     | Multiply by a multiple of ten >>  |



#### **Understand Division**

| Textbook section                               | IXL ski     | IXL skills                                       |  |
|--|-------------|--|--|
| <b>6.1:</b> Problem Solving - Model Division   | L.5         | Division word problems >>                        |  |
|  | See als     | 50:  |  |
|  | 1.1         | Divide by counting equal groups >>               |  |
| <b>6.2:</b> Size of Equal Groups               | 1.1         | Divide by counting equal groups >>               |  |
| <b>6.3:</b> Number of Equal Groups             | I. <b>1</b> | Divide by counting equal groups >>               |  |
|  | L.5         | Division word problems >>                        |  |
| <b>6.4:</b> Model with Bar Models              |             |  |  |
| <b>6.5:</b> Relate Subtraction and Division    |             |  |  |
| <b>6.6:</b> Model with Arrays                  | 1.4         | Write division sentences for arrays >>           |  |
| <b>6.7:</b> Relate Multiplication and Division | 1.5         | Relate multiplication and division for arrays >> |  |
|  | N.10        | Relate multiplication and division >>            |  |
| <b>6.8:</b> Write Related Facts                | 1.5         | Relate multiplication and division for arrays >> |  |
|  | N.10        | Relate multiplication and division >>            |  |
| <b>6.9:</b> Division Rules for 1 and 0         | J.1         | Divide by 1 >>                                   |  |



#### **Division Facts and Strategies**

| Textbook section                                 | IXL skills            |   |
|--|-----------------------|---|
| <b>7.1:</b> Divide by 2                          | J.2                   | Divide by 2 >>                                    |
| <b>7.2:</b> Divide by 10                         | J.10                  | Divide by 10 >>                                   |
| <b>7.3:</b> Divide by 5                          | J.5                   | Divide by 5 >>                                    |
| <b>7.4:</b> Divide by 3                          | J.3                   | Divide by 3 >>                                    |
| <b>7.5:</b> Divide by 4                          | J.4                   | Divide by 4 >>                                    |
|  | See als<br><b>K.1</b> | Division facts for 2, 3, 4, 5, and 10 >>          |
| <b>7.6:</b> Divide by 6                          | J.6                   | Divide by 6 >>                                    |
| <b>7.7:</b> Divide by 7                          | J.7                   | Divide by 7 >>                                    |
| <b>7.8:</b> Divide by 8                          | J.8                   | Divide by 8 >>                                    |
| <b>7.9:</b> Divide by 9                          | J.9                   | Divide by 9 >>                                    |
|  | See als               | 50:   |
|  | <b>K.4</b>            | Division facts for 6, 7, 8, and 9 >>              |
|  | K.7                   | Division facts up to 10 >>                        |
| <b>7.10:</b> Problem Solving - Two-Step Problems |                       |   |
| 7.11: Order of Operations                        | M.11                  | Perform multiple operations with whole numbers >> |



### **Understand Fractions**

| Textbook section                               | IXL skills |   |
|--|------------|---|
| <b>8.1:</b> Equal Parts of a Whole             | W.1        | Identify equal parts >>   |
| 8.2: Equal Shares                              |            |   |
| 8.3: Unit Fractions of a Whole                 | W.7        | Match unit fractions to models >>                                 |
|  | W.16       | Unit fractions: modeling word problems >:                         |
|  | W.17       | Unit fractions: word problems >>                                  |
| <b>8.4:</b> Fractions of a Whole               | W.2        | Understand fractions: fraction bars >>                            |
|  | W.3        | Understand fractions: area models >>                              |
|  | W.4        | Show fractions: fraction bars >>                                  |
|  | W.5        | Show fractions: area models >>                                    |
|  | W.8        | Match fractions to models >>                                      |
|  | W.18       | Fractions of a whole: modeling word problems >>                   |
|  | W.19       | Fractions of a whole: word problems >>                            |
| <b>8.5:</b> Fractions on a Number Line         | W.11       | Identify unit fractions on number lines >>                        |
|  | W.12       | Identify fractions on number lines >>                             |
|  | W.13       | Graph unit fractions on number lines >>                           |
|  | See als    | o:  |
|  | W.14       | Graph fractions on number lines >>                                |
| <b>8.6:</b> Relate Fractions and Whole Numbers | X.7        | Graph fractions equivalent to 1 on number lines >>                |
|  | X.8        | Select fractions equivalent to whole numbers using area models >> |
|  | See als    | o:  |
|  | X.9        | Find fractions equivalent to whole numbers >>                     |
| <b>8.7:</b> Fractions of a Group               |            |   |



- **8.8:** Find Part of a Group Using Unit Fractions
- **Z.1** Fractions of a number unit fractions >>
- **Z.3** Fractions of a number unit fractions: word problems >>
- **8.9:** Problem Solving Find the Whole Group Using Unit Fractions



### **Compare Fractions**

| Textbook section  | IXL ski | IXL skills  |  |
|---|---------|---|--|
| <b>9.1:</b> Problem Solving - Compare Fractions         |         |   |  |
| <b>9.2:</b> Compare Fractions with the Same Denominator | Y.3     | Graph and compare fractions with like denominators on number lines >> |  |
|   | See als | 50:   |  |
|   | W.15    | Graph smaller or larger fractions on a number line >>                 |  |
| <b>9.3:</b> Compare Fractions with the Same Numerators  | Y.4     | Graph and compare fractions with like numerators on number lines >>   |  |
| 9.4: Compare Fractions                                  | Y.1     | Compare fractions using models >>                                     |  |
|   | Y.6     | Compare fractions >>  |  |
| 9.5: Compare and Order Fractions                        | Y.10    | Order fractions with like denominators >>                             |  |
|   | Y.11    | Order fractions with like numerators >>                               |  |
| 9.6: Model Equivalent Fractions                         | X.1     | Find equivalent fractions using area models >>                        |  |
|   | Х.3     | Find equivalent fractions using number lines >>                       |  |
|   | See als | 50:   |  |
|   | X.2     | Identify equivalent fractions on number lines >>                      |  |
| 9.7: Equivalent Fractions                               | X.1     | Find equivalent fractions using area models >>                        |  |



### Time, Length, Liquid Volume, and Mass

| Textbook section   | IXL skills             |  |
|--|------------------------|--|
| <b>10.1:</b> Time to the Minute                          | T.1<br>T.3             | Match clocks and times >> Read clocks and write times >> |
|  | See also<br><b>T.5</b> | o: Write times >>  |
| <b>10.2:</b> A.M. and P.M.                               | T.4                    | A.M. or P.M. >>  |
| <b>10.3:</b> Measure Time Intervals                      |                        |  |
| <b>10.4:</b> Use Time Intervals                          | Т.6                    | Elapsed time >>  |
| <b>10.5:</b> Problem Solving - Time Intervals            |                        |  |
| <b>10.6:</b> Measure Length                              | BB.3                   | Measure using an inch ruler >>                           |
| 10.7: Estimate and Measure Liquid Volume                 |                        |  |
| <b>10.8:</b> Estimate and Measure Mass                   | BB.14                  | Which metric unit of weight is appropriate? >>           |
| <b>10.9:</b> Solve Problems About Liquid Volume and Mass |                        |  |



# **Chapter 11**Perimeter and Area

| Textbook section                                 | IXL ski | lls  |
|--|---------|--|
| 11.1: Model Perimeter                            |         |  |
| 11.2: Find Perimeter                             | FF.1    | Perimeter of rectangles >>                       |
|  | FF.2    | Perimeter of rectilinear shapes >>               |
| <b>11.3:</b> Algebra - Find Unknown Side Lengths | FF.4    | Perimeter: find the missing side length >>       |
| 11.4: Understand Area                            | FF.6    | Find the area of figures made of unit squares >> |
|  | FF.7    | Select figures with a given area >>              |
|  | FF.8    | Select two figures with the same area >>         |
|  | FF.9    | Create figures with a given area >>              |
| 11.5: Measure Area                               | FF.6    | Find the area of figures made of unit squares >> |
|  | FF.7    | Select figures with a given area >>              |
| <b>11.6:</b> Use Area Models                     |         |  |
| 11.7: Problem Solving - Area of Rectangles       |         |  |
| 11.8: Area of Combined Rectangles                |         |  |
| 11.9: Same Perimeter, Different Area             |         |  |
| 11.10: Same Area, Different Perimeters           |         |  |



#### **Two Dimensional Shapes**

| Textbook section                                     | IXL skil  | IXL skills   |  |
|--|-----------|--|--|
| 12.1: Describe Plane Shapes                          | CC.3      | Open and closed shapes >>                                    |  |
|  | CC.5      | Lines, line segments, and rays >>                            |  |
| <b>12.2:</b> Describe Angles in Plane Shapes         | CC.6      | Angles greater than, less than, or equal to a right angle >> |  |
| 12.3: Identify Polygons                              | CC.2      | Count and compare sides and vertices >>                      |  |
|  | CC.3      | Open and closed shapes >>                                    |  |
|  | CC.4      | Is it a polygon? >>  |  |
|  | See als   | 50:  |  |
|  | CC.1      | Identify two-dimensional shapes >>                           |  |
| <b>12.4:</b> Describe Sides of Polygons              | CC.7      | Parallel, perpendicular, and intersecting lines >>           |  |
| <b>12.5:</b> Classify Quadrilaterals                 | DD.3      | Parallel sides in quadrilaterals >>                          |  |
|  | DD.5      | Identify trapezoids >>                                       |  |
|  | DD.6      | Identify rectangles >>                                       |  |
|  | DD.7      | Identify rhombuses >>  |  |
|  | See also: |  |  |
|  | DD.8      | Classify quadrilaterals >>                                   |  |
| <b>12.6:</b> Draw Quadrilaterals                     |           |  |  |
| <b>12.7:</b> Describe Triangles                      |           |  |  |
| <b>12.8:</b> Problem Solving - Classify Plane Shapes |           |  |  |
| <b>12.9:</b> Relate Shapes, Fractions, and Area      |           |  |  |