

# Sample Items 

## Grade 4

## MATHEMATICS

## Original CRCT

## Grade 4 Items MATHEMATICS

## MATHEMATICS

1. Look at the 2 boxes.


John fills $\frac{1}{2}$ of his box with tennis balls. If David fills the same fraction of his box as John, what fraction of David's box is filled?
A. $\frac{3}{4}$
B. $\frac{2}{2}$
C. $\frac{1}{4}$

* D. $\frac{2}{4}$

2. Which line segment is parallel to $\overline{\mathbf{M N}}$ ?


* A. $\overline{W V}$
B. $\overline{O P}$
C. $\overline{\boldsymbol{S T}}$
D. $\overline{\boldsymbol{R P}}$

3. What is the ordered pair of the point on the graph?

A. $(3,2)$
B. $(1,3)$

* C. $(2,3)$
D. $(3,1)$

4. What number belongs in the box to make the number sentence true?

$$
(2+1)+3=\square+(1+3)
$$

A. 1

* B. 2
C. 3
D. 6

5. Solve.

$$
3 \times(4+5)=\square
$$

* A. 27
B. 30
C. 36
D. 39


## Grade 4 Items MATHEMATICS

1. Look at the 2 boxes.


David's Box


John fills $\frac{1}{2}$ of his box with tennis balls. If David fills the same fraction of his box as John, what fraction of David's box is filled?
A. $\frac{3}{4}$
B. $\frac{2}{2}$
C. $\frac{1}{4}$
D. $\frac{2}{4}$

## MATHEMATICS

2. Which line segment is parallel to $\overline{\mathbf{M N}}$ ?

A. $\overline{W V}$
B. $\overline{O P}$
C. $\overline{\boldsymbol{S T}}$
D. $\overline{\boldsymbol{R P}}$

Helpful Hint
Parallel lines: Lines that are the same distance apart and will never intersect.
3. What is the ordered pair of the point on the graph?

A. $(3,2)$
B. $(1,3)$
C. $(2,3)$
D. $(3,1)$

## Helpful Hint

$(x, y)$

## MATHEMATICS

4. What number belongs in the box to make the number sentence TRUE?

$$
(2+1)+3=\square+(1+3)
$$

A. 1
B. 2
C. 3
D. 6

## Helpful Hint

Apply a mathematical property to solve the problem.
5. Solve.

$$
3 \times(4+5)=\square
$$

A. 27
B. 30
C. 36
D. 39

| Item Sequence | Georgia Performance Standard | KEY |
| :---: | :--- | :--- |
| 1 | Domain: Number \& Operations <br> M4N6. Students will further develop their understanding of the <br> meaning of decimal fractions and common fractions and use <br> them in computations. <br> a. Understand representations of equivalent fractions and/or <br> decimal fractions. | D |
| 2 | Domain: Geometry <br> M4G2. Students will understand fundamental solid figures. <br> b. Describe parallel and perpendicular lines and planes in <br> connection with the rectangular prism. | A |
| 3 | Domain: Geometry <br> M4G3. Students will use the coordinate system. <br> b. Locate a point in the first quadrant in the coordinate plane <br> and name the ordered pair. | C |
| 4 | Domain: Number and Operations <br> M4N7. Students will explain and use properties of the four <br> arithmetic operations to solve and check problems. <br> c. Compute using the commutative, associative, and <br> distributive properties. | B |
| 5 | Domain: Number and Operations <br> M4N7. Students will explain and use properties of the four <br> arithmetic operations to solve and check problems. <br> b. Compute using the order of operations, including <br> parentheses. | A |


| Item Sequence | Commentary |
| :---: | :--- |
| All | - The font size was increased on all items. <br> - Geometric figures and other graphic images were enlarged. <br> - The line spacing between items was increased. |
| 1 | A helpful hint was added to remind the student that the fractions must be <br> equal. |
| 2 | - The term parallel was boldfaced to help the student focus on critical <br> information. <br> - A helpful hint box was added with the definition of parallel lines to help <br> the student focus on applying the concept being assessed. |
| 3 | A helpful hint was added to show how an ordered pair is represented to <br> reduce the cognitive load. |
| 4 | A helpful hint was added to focus the student on applying a mathematical <br> property to solve the problem. |
| 5 | No changes have been made. |

