

Name:

Teacher:

Grade Eight Math Snapshot

Assessment Summary

Competency / Content	Proficiency Marker		
Number Sense	Emerging	Developing	Proficient
Representation (1-2)			
Ordering (3-4)			
Fraction, Percent, Decimal Relationships (5-8)			
Computational Fluency (Part 1)			
Multiplication (1-3)			
Division (4-6)			
Decimal Operations (7-10)			
Computational Fluency (Part 2)			
Operations with Integers (1-2)			
Order of Operations (3-4)			
Solving Equations (5-9)			
Linear Relations & Geometry			
Linear Relations (1-2)			
Geometry (3-4)			

Grade Eight

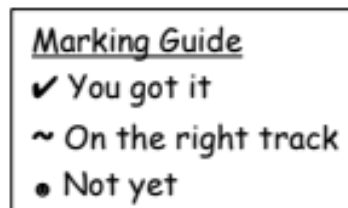
This grade eight Math Snapshot has been designed as a formative assessment and universal screener for students entering grade eight. The assessment is based on foundational skills from the prior year and is designed to allow educators to identify the learning needs of students.

The information gained from this tool will serve as a universal screener and will inform individual, small group, and class instruction. It will also help identify patterns of instructional needs in a class as we work to ensure students master these foundational math skills.

Teachers are encouraged to administer the assessment in *small sections* during the first weeks of the semester. A small team of teachers will come together to mark the assessments and heat map the results by class.

This snapshot is an inventory of skills and does not represent the full, complex set of skills necessary for proficiency in mathematics. It can provide information to inform our Inclusive Education team about planning and support for student success.

Use the column to the right of each question to indicate student understanding using the following marking guide. Scoring of the assessment will not be calculated numerically, but rather will be looked at holistically to help inform instruction:



Students will also complete a self-reflection following each section of the snapshot:

<p><u>This was (circle one):</u> Easy for me I need some review Difficult</p>

Number Sense

Representation

1. Circle the correct fraction for the shaded area of the rectangle below

a) $\frac{5}{6}$

b) $\frac{3}{6}$

c) $\frac{5}{8}$

d) $\frac{3}{8}$



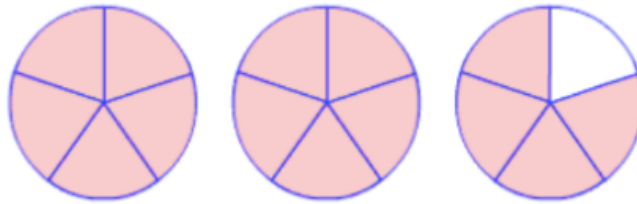
2. Circle the correct improper fraction and mixed # for the shaded area of the circles below.

a) $\frac{4}{5}, 2\frac{4}{5}$

b) $\frac{14}{5}, 2\frac{1}{5}$

c) $\frac{4}{5}, 2\frac{1}{5}$

d) $\frac{14}{5}, 2\frac{4}{5}$



Ordering

3. Circle the values greater than 0.82

a. three quarters

b. 0.815

c. 75%

d. $\frac{85}{100}$

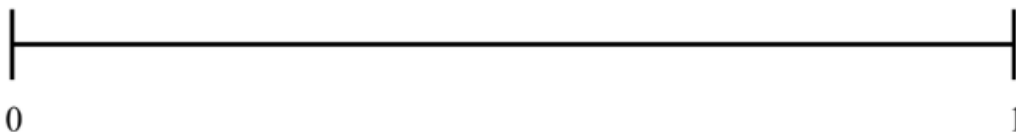
e. $\frac{810}{1000}$

f. 91%

g. $\frac{41}{50}$


h. nine tenths

4. Place the following numbers on the number line: 0.25, $\frac{1}{2}$, 10%, $\frac{8}{10}$



Fraction-Percent-Decimal Relationships

5. Complete the table (the first row is an example):

Fraction	Percent	Decimal	Visual
$\frac{3}{8}$	37.5 %	0.375	
$\frac{3}{5}$			


6. Complete the table (the first row is an example):

Fraction	Percent	Decimal	Visual
		0.2	

7. Complete the table (the first row is an example):

Fraction	Percent	Decimal	Visual
	75%		

8. Complete the table (the first row is an example):

Fraction	Percent	Decimal	Visual
			

This was (circle one):

Easy for me

I need some review

Difficult

Computational Fluency (Part 1)

Multiplication		
1.	Solve: $8 \times 4 =$	Solve: $7 \times 6 =$
2.	Solve: $\begin{array}{r} 123 \\ \times 8 \\ \hline \end{array}$	
3.	Solve: $\begin{array}{r} 27 \\ \times 12 \\ \hline \end{array}$	
Division		
4.	Solve: $\begin{array}{r} 3 \overline{)78} \end{array}$	
5.	Solve: $24 \div 6 =$	Solve: $63 \div 7 =$
6.	Solve: $740 \div 9 =$	

Decimal Operations

7.

Solve:

$$\begin{array}{r} 5.3 \\ + 2.1 \\ \hline \end{array}$$

8.

Solve:

$$\begin{array}{r} 7.2 \\ - 4.3 \\ \hline \end{array}$$

9.

Solve:

$$\begin{array}{r} 6.2 \\ \times 3 \\ \hline \end{array}$$

10.

Solve:

$$4 \overline{)8.4}$$

Computational Fluency (Part 2)

Operations with Integers

1. Solve:
 $-9 + 2 =$

2. Solve:
 $(-10) \times (-2) =$

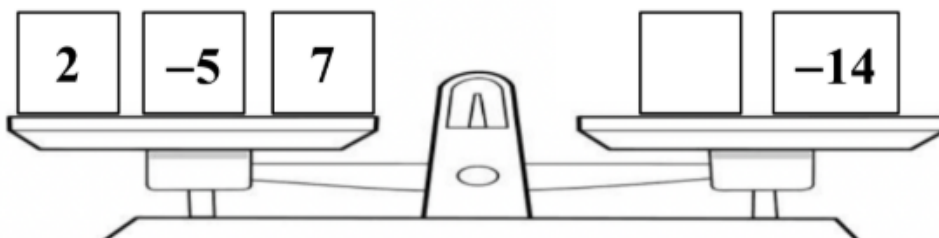
Order of Operations

3. Solve:
 $3 + 5 \times (6 - 2) =$

4. Solve:
 $-6 \div (2 + 1) =$

Solving Equations

5. Below are a set of numbers on a scale. Choose a number to put in the blank box that would best balance the scale.



Solve the following equations for x :

6.

$$4x = 12$$

7.

$$x - 3 = 4$$

8.

$$3x - 2 = 10$$

9.

$$4 + 6x = 16$$

This was (circle one):

Easy for me

I need some review

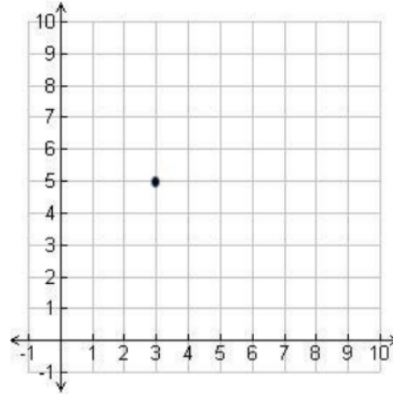
Difficult

Linear Relations & Geometry

Linear Relations

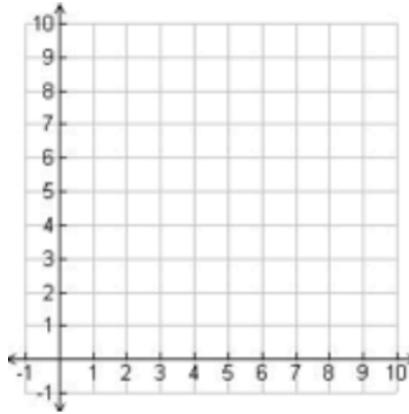
1. What are the coordinates of the point?

(,)



2. Placing the following coordinates on the graph:

x	y
1	6
2	7
3	8



Geometry

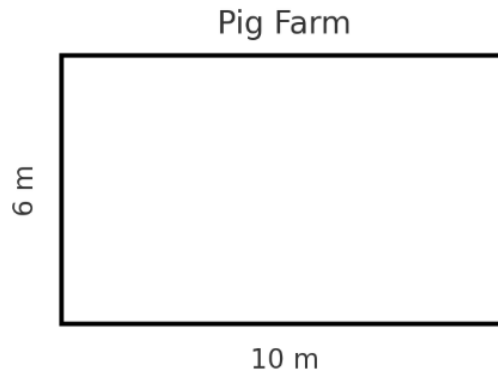
3. A pig farm is shaped like a rectangle with a length of **10 meters** and a width of **6 meters**.

1. What is the **perimeter** of the farm?

Perimeter = _____

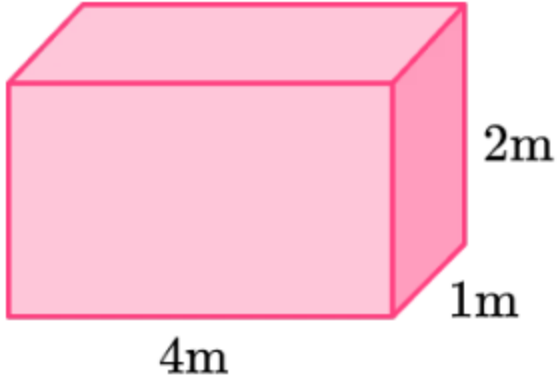
2. What is the **area** of the farm?

Area = _____



4.

A rectangular box has a length of 4 meters, a width of 1 meter, and a height of 2 meters.



Volume = _____

This was (circle one):

Easy for me

I need some review

Difficult

Answer Key

Number Sense	Answers	
Representation	1.	C
	2.	D
Ordering	3.	D, F, H (G is equal to)
	4.	Answers will vary
Fraction-Percent-Decimal Relationships	5.	60% 0.6 visuals will vary
	6.	1/5 20% visuals will vary
	7.	3/4 0.75 visuals will vary
	8.	2/5 40% 0.4
Computational Fluency (Part 1)		
Multiplication	1.	32 42
	2.	984
	3.	324
Division	4.	26
	5.	4 9
	6.	83.2 (repeating)
Decimal Operations	7.	7.4
	8.	2.9
	9.	18.6
	10.	2.1
Computational Fluency (Part 2)		
Operations with Integers	1.	-7
	2.	+20
Order of Operations	3.	23
	4.	-2
Solving Equations	5.	18

	6.	$X = 3$
	7.	$X = 7$
	8.	$X = 4$
	9.	$X = 2$
Linear Relations & Geometry		
Linear Relations	1.	(3,5)
	2.	You're on your own!
Geometry	3.	$P = 32 \text{ m}$ $A = 60 \text{ cm}^2$
	4.	$V = 8 \text{ m}^3$