INTEGERS RECAP

Grade 9

Learner homework

Day 1

First name:
Surname:
School:
Grade and class: e.g. Gr 9B



1) Work out the following without using a calculator

Date:

- a) 3 8
- b) 8-3
- c) -3 + 8

- d) -3 8
- e) -3 (-8)
- f) -3 (+8)

2) Work out the following without using a calculator

- a) 1-5+2
- b) 5 1 + 2
- c) -5-1+2

- d) -5 + (1-3)
- e) -5 (1 3)
- f) -1 + 2 3 + 5

3) Work out the following without using a calculator

- a) $\frac{15}{3}$
- b) $\frac{-15}{3}$
- c) $\frac{15}{-3}$

- d) $\frac{-15}{-3}$
- e) $\frac{-(-3)}{15}$
- f) $\frac{-3}{-(-15)}$

4) Work out the following without using a calculator

- a) $\frac{12+3}{-3}$
- b) $\frac{3-12}{-2-1}$
- c) $\frac{-3-12}{-7+4}$

- d) $\frac{-5-4}{+6+(-3)}$
- e) $\frac{-5-4}{(+3)(-1)}$

5) Work out the following without using a calculator

- a) $(-5)^2$
- b) $(-4)^3$
- c) $\sqrt[3]{-8}$

- d) $2^3 (-4)^2$
- e) $-4 + \sqrt[3]{64} (2)^2$

6) Challenge!! (still no calculators)

a) $-5 + \frac{3-12}{4-1} + 6$

b) $-5 - \frac{3-12}{+3-1} + 7$

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Day 2

First name:	
Surname:	
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A. Put a number in a box to make the following statements true

Date:

- i)
 - x(-6) = 12 ii) -(-3) = 4 iii) 7 + -4
- B. Give 3 possible answers to make the following statements true.

For example: x = -12

Possible answers are:

$$3 \times -4 = -12$$
 $-2 \times 6 = -12$

$$-2 \times 6 = -12$$

$$\boxed{-24} \quad x \quad \boxed{\frac{1}{2}} \quad = \quad -12$$

1) = -10

-(-2) =7)

9)

= -3

5) 3 + = -2

- $6) \qquad -5 \left(\square + \square \right) = -23$
- 12) $\Box + \Box = -2$

INTEGERS RECAP

Grade 9

Learner homework

<u>Day 3</u>

First name:
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Grade and class: e.g. Gr 9B



1) Calculate the following without the use of a calculator

Date:

a) (7-12)4

- d) (7-12)(-4)
- g) (-11+6)5

- b) (7-12)-4
- e) -4(7-12)

c) (7-12)+4

f) 4(7-12)

2) Choose a number for the box which will make each statement true.

- a) $3(\Box + 5) = -3$
- b) $(-\Box + 7) 4 = -9$
- c) -4(+ 7) = 20

3) Look at the responses to the questions below and decide which ones are correct and which ones are not correct. Where responses are not correct, provide the correct responses.

i.
$$-5 + 10 - 2 + 4 = 15 + 6 = 21$$

ii.
$$2(-4) + (-2)(4) = -8 + (-8) = 16$$

iii.
$$6 - (3)(2) = 3(2) = 6$$

iv.
$$13 - 4 + (4) = 13$$

4) The responses of one learner are given below. Are her answers correct? Say what is wrong with any incorrect answers.

i.
$$3 + (4 - 7) = 3 + 3 = 6$$

ii.
$$3 - (4 - 7) = 3 - (-3) = 6$$

iii.
$$3 + (7 - 4) = 3 + 3 = 9$$

5) Given p = -2, q = 7 and r = -1. Substitute these values into the expressions and simplify without using a calculator.

- a) 2*pq*
- b) p(q-p)
- c) (p+q)-p
- d) (p q) q
- e) $10r^2 \div p$

- f) $q^2 pq$
- g) $\frac{1}{2}pq r$
- h) 3p + 2q
- i) $\frac{4pqr}{-2}$
- j) $(pqr p^2q^3r^4)^0$