## TAURANGA GIRLS COLLEGE YEAR 10 HOMEWORK SHEET

## Series A Sheet 1

TGC Values: Respect, Participation, Pride

Name: $\qquad$

Due Date: $\qquad$
8. If $p=4$ and $q=6$ give the value of $(p+q)^{2}$
9. Calculate:
a) $10 \%$ of $160=$
b) $75 \%$ of $200=$
10. Find $\frac{3}{5}$ of $30=$
11. What is the perimeter of this rectangle?

5. $71 / 2 \mathrm{~m}=$ $\qquad$ mm
6. How many kilogrammes are there in one tonne? $\qquad$
7. How many millilitres are there in one litre? $\qquad$
13. Complete the table for this pattern:

| Plain tiles, P | 1 | 2 | 3 | 4 |
| :---: | :---: | :---: | :---: | :---: |
| Coloured tiles, C | 8 |  |  |  |


a) Write a rule connecting the number of plain tilers and coloured tiles using the letters $P$ and $C$.
b) How many coloured tiles are needed for 50 plain tiles?
$C=$
Key Skills Total:

## CURRENT WORK (CL 4 - 5): Number

A Use your calculator ...

1. $25^{2}=$
2. $5^{3}=$
3. 16 squared $=$
4. 6 cubed $=$
5. $\sqrt{64}$
6. $2^{6}=$
7. $6 \times(8-3)=$
8. $24 \div(2+2)=$
9. $(9-5) \times(5+3)=$
10. $-7+{ }^{-} 4=$
11. $8-{ }^{-} 7=$
12. ${ }^{-} 42 x^{-} 7=$
13. $(-15)^{2}=$
14. $-6+{ }^{-} 4 \times 2=$
15. $\frac{3}{7}+\frac{1}{7}$
16. $\frac{3}{5}+\frac{1}{4}=$

B Place Value ...

1. In the number 6375.214 which number is in the
a) ones column
b) tens column
c) thousands column
d) tenths column
e) hundredths column
2. In the number 156.372 which number is in
a) the tenths column
b) the thousandths column
3. 67.853 to the nearest tenth
4. 0.618 to the nearest hundredth
5. Complete this table

|  | Decimal | Fraction |
| :--- | :---: | :---: |
| eg | 0.7 | $\frac{7}{10}$ |
| a) | 0.3 |  |
| b) |  | $\frac{9}{10}$ |
| c) | 0.09 |  |
| d) |  | $\frac{3}{100}$ |
| e) |  | $\frac{13}{100}$ |
| f) | 0.27 |  |

C Rounding.......... Round:

1. 382 to the nearest ten
2. 379 to the nearest hundred
3. 4320 to the nearest thousand
4. 85 to the nearest ten
5. 62.1 to the nearest whole number
6. 6.17 to the nearest tenth
7. 37.23 to the nearest tenth
$\qquad$ / 38

## CURRENT WORK (CL 5-6 ): Number

## A Everyday calculations ...

(Show your calculation and use
your calculator to get the
solution)

1. Find the cost of:
a) 5 kg of bananas at $\$ 2.90$ per kg
...... X $\qquad$ = $\qquad$
b) 8 kg of sausages at $\$ 8.95$ per kg
c) 12 ice creams at $\$ 2.40$ each
d) 1 dozen coke at $\$ 1.40$ each
2. How many chocolate bars can be bought with $\$ 60$ if they are $\$ 2.50$ each?
3. How many pens can you buy for $\$ 36$ for they are 90c each?

B Use your calculator ...

1. $\quad 1.6$ squared $=$
2. $\sqrt{625}$
3. $2.1^{6}=$
(to the nearest whole number)
4. $\frac{6+12}{2+2}$
5. $\frac{-6+12}{2 \times 3}$
6. $\sqrt[3]{125}$
7. $\frac{3}{5}+\frac{1}{4}=$
8. $\frac{3}{8}-\frac{2}{7}=$
9. $2 \frac{1}{5}+3 \frac{1}{4}=$
10. $3 \frac{1}{4} \times 5=$

C Place Value ... Complete this table

|  | Decimal | Fraction |
| :--- | :--- | :---: |
| a) |  | $\frac{5}{1000}$ |
| b) | 0.103 |  |
| c) |  | $\frac{137}{100}$ |
|  | Decimal | Improper Fraction |
| d) | 14.2 |  |
| e) | 9.103 |  |

D Rounding $\qquad$ Round

1. 456,320 to the nearest ten thousand
2. $6,177,812$ to the nearest million
3. 0.61348 to the nearest ten thousandth

Current Work CL5-6: $\qquad$ / 24

## APPLICATIONS and TASKS

For each of these tasks you must show your working.
(One mark for the working and one mark for the correct answer)

## Task One

Linda has a small business making and selling jars of organic handcream and moisturiser. She sells the jars of handcream for $\$ 15$ each, and moisturiser for $\$ 23$ each. She made 25 jars of handcream and 30 jars of moisturiser.
What was the total value of her sales for this week?
Linda's total sales were: $\qquad$

## Task Two

Mary has a small business making and selling jars of jams, pickles and marmalade. She sells the jars of jam for $\$ 4.60$ each, jars of pickles for $\$ 5.20$ each and jars of marmalade for $\$ 3.80$ each. She sold 45 jars of jam and 52 jars of pickles and 18 jars of marmalade.
What was the total value of her sales for this week?
Mary's total sales were: $\qquad$

## Task Three

Ella and Sarah went shopping at Fitwell Clothing. The prices
 were:

T-shirts, \$24
Skirts, \$68
Tops, \$29.50 Sweatshirts, \$30
Ella bought two T-shirts, a Skirt and two Tops and Sarah bought three tops, a sweatshirt and four Tshirts. Who spent the most and by how much?
$\qquad$ spent the most, by an extra \$ $\qquad$

Applications Total: $\qquad$ / 6

Overall Results:

| KS | CL4-5 | CL5-6 | APP | Parent Signature: |
| :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |
| 16 | 38 | 24 | 6 |  |

