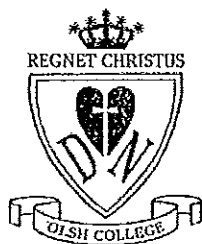


**OUR LADY OF THE SACRED HEART COLLEGE  
KENSINGTON**



STUDENT – NAME \_\_\_\_\_

MATHEMATICS TEACHER \_\_\_\_\_

**2010**

**Year 10**

**Non-Calculator Common Section**

Time Allowed: 15 mins

**Assessed Outcomes**

- NS3, 4.1, 4.2 Operations with whole number, Decimals & Integers
- NS4.3 Fractions, Decimals & Percentages
- NS5.1.1 Applies index laws to simplify and evaluate arithmetic expressions and use scientific notation to write large and small numbers
- NS5.1.2 Solves consumer arithmetic problems involving earning & spending money
- MS4.2 Calculates surface area of rectangular and triangular prisms and volume of right prisms and cylinders

**Instructions to Candidates:**

- Write your name, the student number and teacher's name on the top of the cover page.
- Formulae sheet may be used.
- Show all necessary working. Marks may be deducted for careless or badly arranged work.
- Good luck!

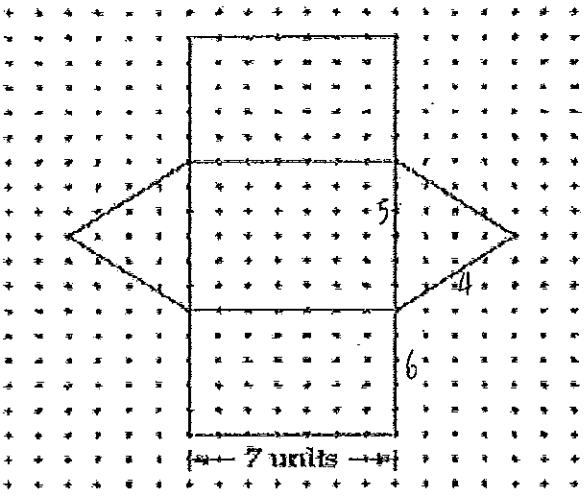
**Non-Calculator Common Section (15 marks)**

Attempt Questions 1 - 13

Allow approximately 15 minutes for this section

Questions	Working out and Answers	Marks
1. $336 \div 21 = 16$  What is the value of $336 \div 2.1$ ?		1
2. Insert grouping symbols to make the following statement true. $8 - 3 - 2 \times 5 = 15$		1
3. What number is halfway between -3 and 7?		1
4. Between which two consecutive whole numbers is the square root of 42.5?		2
5. Write 0.017 as a percentage		1
6 Find $\frac{1}{5} \div \frac{2}{3}$		1
7. $\frac{3}{5} < \frac{2}{\Delta}$ where $\Delta$ is the whole number. What is the largest possible value for $\Delta$ ?		1
8 Express $2.5 \times 10^{-3}$ in decimals		1
9. Sam claims that $2^3 \times 2^2 = 4^5$ .  Explain why Sam is incorrect.		1

Turn to next page

<p>10. Bob earns \$15 an hour. He worked 8 hours and spent 20% of his weekly wage. How much is left?</p>		1
<p>11. John sells cosmetics. He is paid by retainer and commission.  Briefly explain the meaning of <b>commission</b></p>		1
<p>Use the net below to answer Questions 12 and 13</p> 		
<p>12. What is the name of the solid formed by this net?</p>		1
<p>13. Calculate the surface area of this solid</p>		2

End of Common Section