



Anglo-Chinese School (Primary)

END-OF-YEAR EXAMINATION 2013
MATHEMATICS
PAPER 1 (BOOKLET A)
PRIMARY FIVE

Name: _____ () Class: Primary 5 ____

Date: 25 October 2013

Duration of Booklet A & B: 50min

INSTRUCTIONS TO CANDIDATES

1. This question paper consists of 7 printed pages.
2. Do not turn this page until you are told to do so.
3. Follow all instructions carefully.
4. Shade your answers on the Optical Answer Sheet (OAS) provided.
5. You are not allowed to use a calculator.

Questions 1 to 10 carry 1 mark each. Question 11 to 15 carry 2 marks each. Make your choice (1, 2, 3 or 4) and shade the correct oval (1, 2, 3 or 4) on the Optical Answer Sheet (OAS). (20 marks)

1. How many hundreds are there in 895 300?

- 1) 300
- 2) 5 300
- 3) 8 953
- 4) 9 530

2. Find the value of $(67 + 5) + 7 - 4 \times 2$

- 1) 71
- 2) 75
- 3) 78
- 4) 150

3. The capacity of a pail is $6\,020\text{ cm}^3$. Express the capacity in litres and millilitres.

- 1) 6 l 2 ml
- 2) 6 l 20 ml
- 3) 60 l 2 ml
- 4) 60 l 20 ml

4. Sandra spent $\frac{4}{5}$ of her money on food and $\frac{1}{2}$ of the remaining amount on drinks. She spent \$15 on drinks. How much money had Sandra at first?

- 1) \$30
- 2) \$60
- 3) \$120
- 4) \$150

5. Leonard has 230 cards in a bag. He gives $\frac{2}{5}$ of them to Kaden. How many cards will Kaden get?

- 1) 46
- 2) 92
- 3) 115
- 4) 460

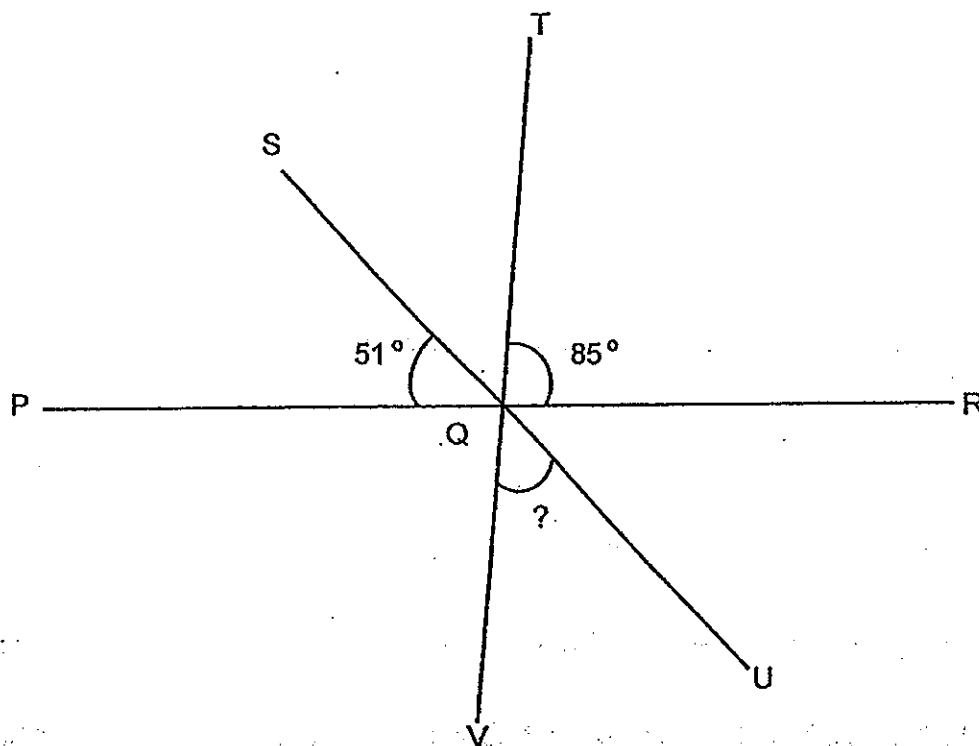
6. A baker spent \$28.20 on 18 identical packets of flour and 1 packet of sugar. If 6 such packets of flour cost \$9, how much did the packet of sugar cost?

- 1) \$ 0.70
- 2) \$ 1.20
- 3) \$ 1.50
- 4) \$ 1.60

7. The length of a rectangle is 5.7 cm. It is 3 times as long as its breadth. What is the perimeter of the rectangle?

- 1) 7.6 cm
- 2) 15.2 cm
- 3) 17.1 cm
- 4) 22.8 cm

8. The figure below is not drawn to scale. PQR, SQU and TQV are straight lines. $\angle PQS = 51^\circ$ and $\angle TQR = 85^\circ$. Find $\angle VQU$.



- 1) 44°
- 2) 51°
- 3) 85°
- 4) 136°

9. Jane scored a total of 86 marks for both her English and Science tests. She scored 65 for her Mathematics test and 77 for her Chinese test. What was her average score for all the 4 tests?

- 1) 57
- 2) 76
- 3) 114
- 4) 228

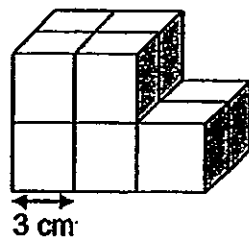
10. Roger spent 30% of his allowance during recess. If he had \$4.20 left, what was his allowance?

- 1) \$ 1.26
- 2) \$ 2.94
- 3) \$ 4.50
- 4) \$ 6.00

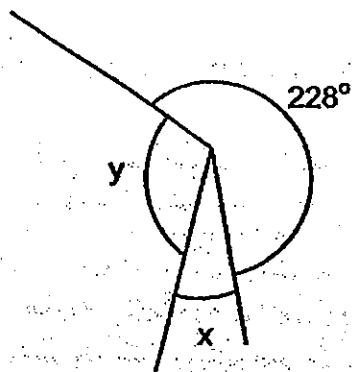
11. Gideon bought 5 boxes of curry puffs for a birthday party. If the total mass of the boxes of curry puffs was 5 kg 55 g, what was the mass of one box of curry puff?

- 1) 1.011 g
- 2) 1.11 g
- 3) 1.011 kg
- 4) 1.11 kg

12. The figure below is made up of 3-cm cubes. Find its volume.



- 1) 10 cm^3
 - 2) 30 cm^3
 - 3) 216 cm^3
 - 4) 270 cm^3
13. The figure below is not drawn to scale. $\angle x$ is $\frac{1}{3}$ of $\angle y$.
Find the value of $\angle y$.



- 1) 44°
- 2) 66°
- 3) 99°
- 4) 114°

14. The ratio of the number of chocolates Angie had to the number of chocolates Christie had was 5 : 4. The ratio of the number of chocolates Christie had to the number of chocolates Dionne had was 3 : 2. If Dionne had 32 chocolates, how many chocolates did Angie have?

- 1) 48
- 2) 60
- 3) 64
- 4) 96

15. In a carnival, 52% of the people were children. The rest of the people were either men or women. There were twice as many men as women. If there were 32 women at the carnival, how many people were there at the carnival altogether?

- 1) 100
- 2) 200
- 3) 320
- 4) 520



Anglo-Chinese School (Primary)

END-OF-YEAR EXAMINATION 2013
MATHEMATICS
PAPER 1 (BOOKLET B)
PRIMARY FIVE

Name: _____ () Class: Primary 5 ____

Date: 25 October 2013

Duration of Paper Booklet A & B: 50 min

Parent's/Guardian's signature

INSTRUCTIONS TO CANDIDATES

1. This question paper consists of 8 printed pages.
2. Do not turn this page until you are told to do so.
3. Follow all instructions carefully.
4. Answer all questions.
5. You are not allowed to use a calculator.

Paper 1 Booklet A. Multiple-Choice Questions	20	
Paper 1 Booklet B. Short Answers: Part 1	10	
Paper 1 Booklet B. Short Answers: Part 2	10	
Total Marks	40	

Short Answers: Part 1 (10 Questions x 1 Mark)

Questions 16 to 25 carry 1 mark each. Write your answers in the spaces provided. Give your answers to the units stated and to its simplest form whenever necessary.

16. Round off the value of $4\ 801 - 347$ to the nearest hundred.

Answer: _____

17. $\frac{3}{8}$ of a number is 51. What is the number?

Answer: _____

18. A container contains 18 l of lemonade. The lemonade is poured equally into 6 jugs, how much lemonade is there in each jug? Give your answer in millilitres.

Answer: _____ ml

19. In a computer game, Liam managed to complete 45% of the mission.
What fraction of the mission was not completed?

Answer: _____

20. In a class of 40 pupils, 40% of the class do not wear spectacles. $\frac{1}{2}$ of the pupils who wear spectacles are girls. How many boys wear spectacles?

Answer: _____

21. A piece of cloth is cut into three pieces in the ratio 5 : 4 : 1. The longest piece is 600 cm. Find the length of the piece of cloth.

Answer: _____ m

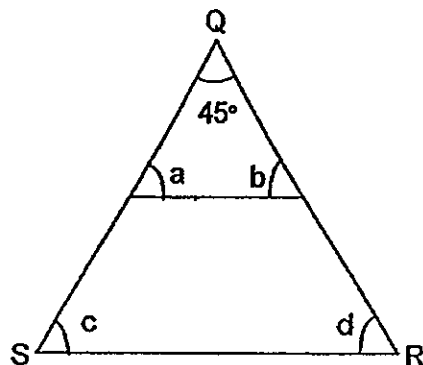
22. Mr Kim gave some money to Elliott and Sunny in the ratio 6 : 7. Elliott spent $\frac{1}{2}$ of his money on a folder that costs \$6. How much money did Sunny receive from Mr Kim?

Answer: \$ _____

23. Box A is 380 g heavier than Box B. Find the mass of Box A if the total mass of the 2 boxes is 2 kg 500 g. Leave your answers in grams.

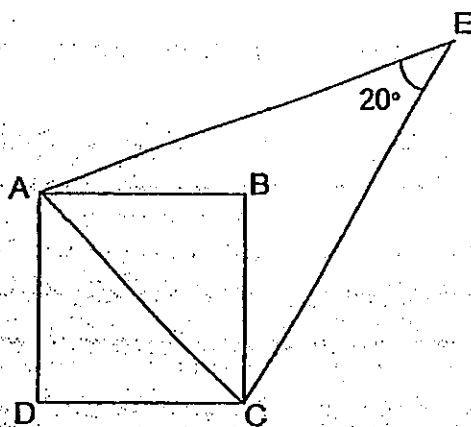
Answer: _____ g

24. In the figure below, not drawn to scale, QRS is a triangle and $\angle SQR = 45^\circ$. Find the value of $\angle a + \angle b + \angle c + \angle d$.



Answer: _____°

25. In the figure below, not drawn to scale, ABCD is a square and ACE is an isosceles triangle: $\angle AEC = 20^\circ$. Find $\angle EAB$.

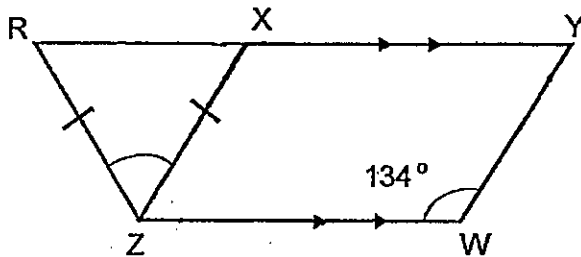


Answer: _____°

Short Answers: Part 2 (5 Questions x 2 Marks)

Questions 26 to 30 carry 2 marks each. Show all mathematical statements clearly in the space below each question and write your answers in the spaces provided.

26. The figure below is not drawn to scale. $XYWZ$ is a parallelogram. $RZ = ZX$ and RXY is a straight line. $\angle YWZ = 134^\circ$. Find $\angle XZR$.



Answer: _____°

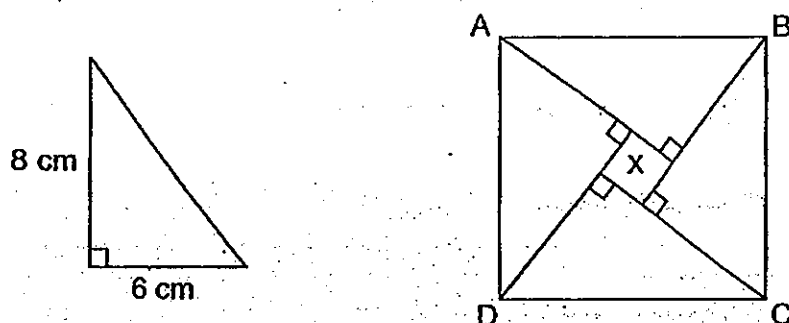
27. Ali has 40 more stamps than Caili. Ray has 30 stamps lesser ^{than} Caili and Sean has 20 more stamps than Ray. If 4 of them have an average of 65 stamps, how many stamps does Sean have?

Answer: _____

28. Wei Yan had a total of 400 old coins. 45% of them were local coins. After he had sold some of the foreign coins to a coin collector, the number of local coins made up 80% of the remaining coin collection. How many foreign coins did Wei Yan sell to the coin collector?

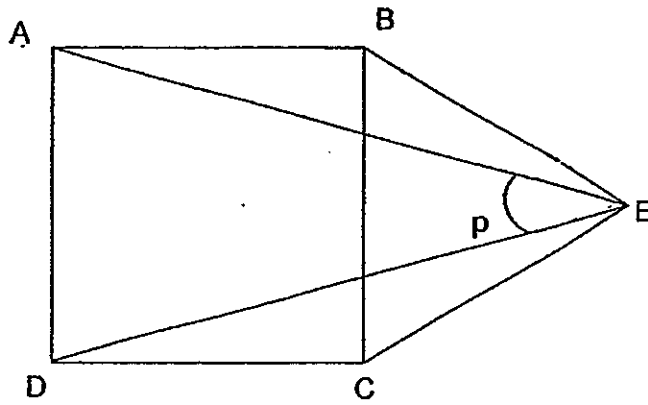
Answer: _____

29. 4 identical right-angled triangles are arranged to form a big square ABCD as shown below. What is the fraction of the area of the small square X to the area of the big square ABCD? Give your answer to its simplest form.



Answer: _____

30. In the figure below, ABCD is a square and ECB is an equilateral triangle. Find $\angle p$.



Answer: _____°

End-of-Paper



Anglo-Chinese School (Primary)

END-OF-YEAR EXAMINATION 2013
MATHEMATICS
PAPER 2
PRIMARY FIVE

Name: _____ ()

Class: Primary 5 _____

Date: 25 October 2013

Duration of paper 2: 1h 40min

Parent's/Guardian's signature

INSTRUCTIONS TO CANDIDATES

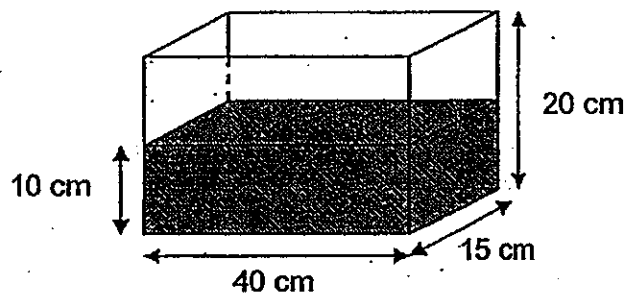
1. This question paper consists of 16 printed pages.
2. Do not turn this page until you are told to do so.
3. Follow all instructions carefully.
4. Answer all questions.
5. You are allowed to use a calculator.

Paper 2 Section A. Short Answers	10	
Paper 2 Section B. Problem Sums	50	
Total Marks	60	

Section A: Short Answers (5 Questions x 2 Marks)

Questions 1 to 5 carry 2 marks each. Show your mathematical statements clearly in the space provided for each question and write your answers in the spaces provided. Give your answers to the units stated and to its simplest form whenever necessary.

1. A rectangular tank measuring 40 cm long by 15 cm by 20 cm, was filled with water to a depth of 10 cm. When more water was added, the water level rose to 16 cm. What was the volume of water added?

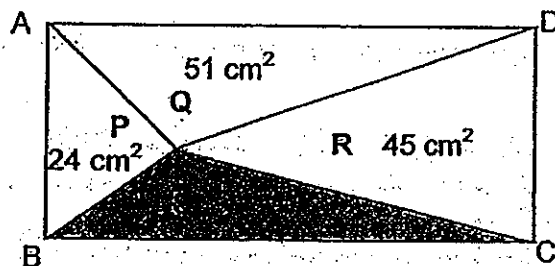


Answer: _____ cm^3

2. Victor has \$27 in his piggy bank. There was a mixture of 20 cent and 50 cent coins. There were 5 more 50 cent coins than 20 cent coins in the piggy bank. How many 20 cent coins are there in his piggy bank?

Answer: _____

3. ABCD is a rectangle. It is divided into 4 different triangles P, Q, R and S which meet at a point as shown. Find the area of triangle S.



Answer: _____ cm^2

4. Roy bought a toy gun at 20% discount. He paid \$74.90 for the toy gun which was inclusive of 7% GST of the discounted price. What was the original price of the toy gun?

Answer: \$ _____

5. A bottle which has a capacity of 4 l is currently $\frac{5}{8}$ filled. John poured an additional 650 ml of water into the bottle, how much more water is needed to fill up the bottle completely? Give your answer in litres.

Answer: _____ l

Section B: Problem Sums (50 Marks)

For questions 6 to 18, show your steps clearly in the space provided for each question and write your answers in the spaces provided. For questions which require units, give your answers in the units stated. The number of marks available is shown in brackets [] at the end of each question or part-question.

6. The usual price of a slice of cake is \$0.90. If you buy 4 slices of cake, you can buy 1 more slice of cake at half the price. What is the greatest number of slices of cake you can buy with \$99?

Answer: _____ [3]

7. Ken had half as many pink balloons as orange balloons. After he had given away 90 orange balloons, he had $\frac{1}{3}$ as many orange balloons as pink balloons left. How many balloons had he left?

Answer: _____ [3]

8. William had \$10.40 less than Victor. If William gave \$4.80 to Victor, Victor would have thrice as much money as William. How much money had Victor at first?

Answer: _____ [3]

9. The total length of 2 poles is 5.6 m. 30% of the length of the shorter pole and 50% of the length of the longer pole add up to 2.5 m. Find the length of the shorter pole.

Answer: _____ [3]

10. Charlie had a container of green jelly beans and red jelly beans. If he eats 12 green jelly beans, the ratio of the number of green jelly beans to the number of red jelly beans will become 5 : 4. If he eats 12 red jelly beans, the ratio of the number of green jelly beans to the number of red jelly beans will then be 7 : 5. What is the original number of green jelly beans?

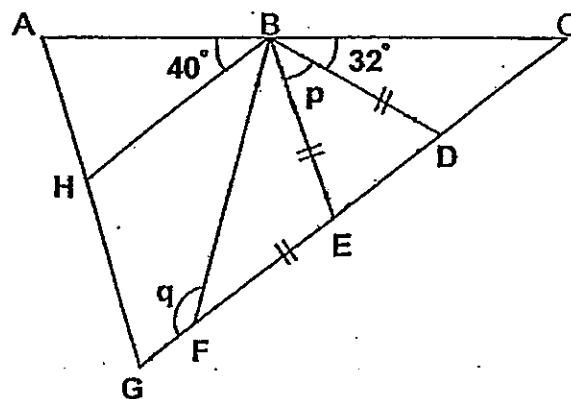
Answer: _____ [3]

11. In a market, there were 410 kg of apples and oranges in a market. After 70% of the apples and 20 kg of the orange were sold, the remaining apples and oranges were of equal mass. What was the original mass of the oranges?

Answer: _____ [4]

12. In the diagram, HBDG is a trapezium and triangles BEF and BDE are isosceles triangles. AC, AG and GC are straight lines. $BD = BE = EF$. $\angle ABH = 40^\circ$ and $\angle CBD = 32^\circ$.

- (a) Find $\angle p$.
(b) Find $\angle q$.



Answer: (a) _____ [2]

(b) _____ [2]

13. $\frac{3}{10}$ of the people at a beach were females and the rest were males.

$\frac{3}{4}$ of the females and $\frac{1}{5}$ of the males decided to go swimming.

- (a) What percentage of the total number of people at the beach went swimming?
- (b) The total number of people who went swimming was 146. How many people were there at the beach?

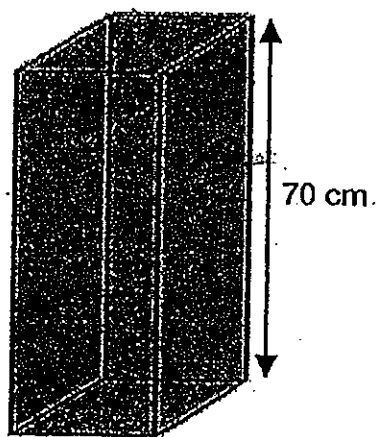
Ans: (a) _____ [2]

(b) _____ [2]

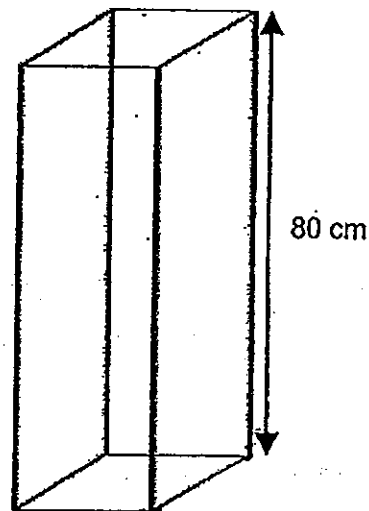
14. Shane, Raja and Vani took a Science Quiz. The average score of Shane and Raja was 45. The total score of Shane, Raja and Vani was 135 and Vani scored 10 more marks than Shane. What was Shane's score?

Answer: _____ [4]

15. Tank X and Y have the same square base area of 25 cm^2 . The heights of Tank X and Tank Y are 70 cm and 80 cm respectively. Tank X contains water filled to the brim while Tank Y is empty. If water from Tank X is transferred into Tank Y until Tank Y is $\frac{5}{8}$ filled with water, how much water is left in Tank X?



Tank X



Tank Y

Answer: _____ [4]

16. Tom had \$144 more than Ali at first. After Tom spent 25% of his money and Ali spent $\frac{1}{3}$ of his money, Tom had \$122 more than Ali.
How much did Tom have at first?

Answer: _____ [5]

17. James had a total of 2112 guavas and mangoes for sale at first. After 600 mangoes and $\frac{1}{3}$ of the guavas were sold, the ratio of the number of mangoes to the number of guavas became 3 : 5.

- (a) How many guavas did James have left?
(b) How many mangoes did James have at first?

Ans: (a) _____ [3]

(b) _____ [2]

18. The first three figures of a sequence are shown below.

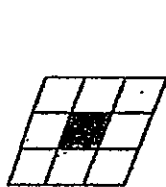


Figure 1

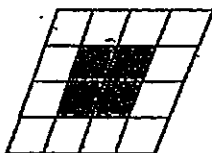


Figure 2

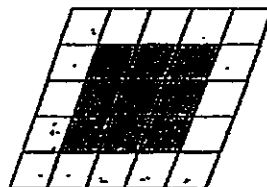


Figure 3

The table below records the number of shaded and unshaded rhombuses in each figure.

Figure	Number of shaded rhombuses	Number of unshaded rhombuses	Total number of rhombuses
1	1	8	9
2	4	12	16
3	9	16	25
4			36

Study the number patterns in the table and answer these questions

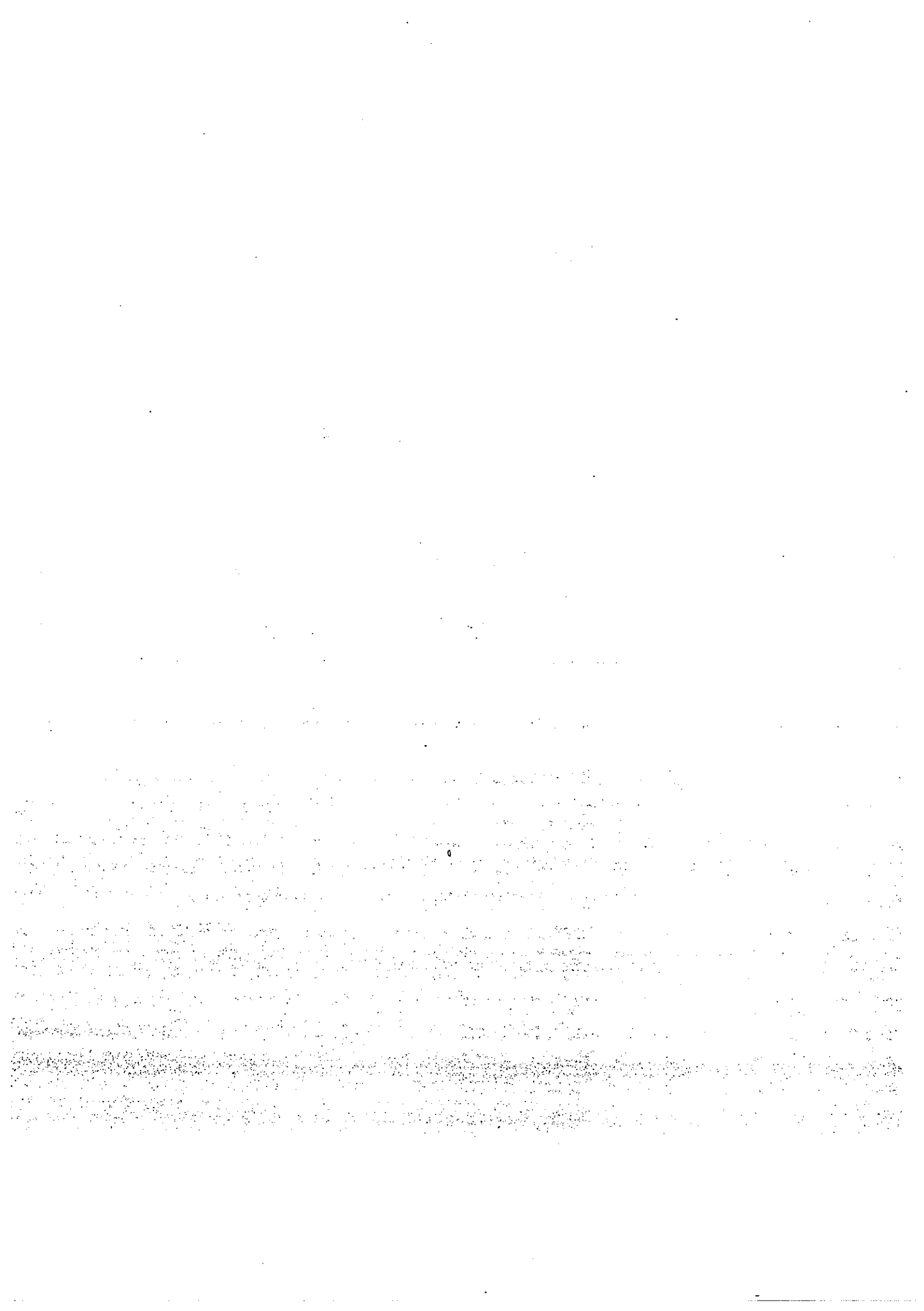
- Fill in the blanks in the table above for Figure 4.
- Find the number of unshaded rhombuses in Figure 30.
- Which figure has 81 rhombuses altogether?

Ans: (a) _____ [1]

Ans: (b) _____ [2]

Ans: (c) _____ [2]

End-of-Paper



Answer Key

EXAM PAPER 2013

SCHOOL : ACS

SUBJECT : PRIMARY 5 MATHEMATICS

TERM : SA2

Q1	Q2	Q3	Q4	Q5	Q6	Q7	Q8	Q9	Q10	Q11	Q12	Q13	Q14	Q15
3	1	2	4	2	2	2	1	1	4	3	4	3	2	2

16)4500

17)136

18)3000ml

19)11/20

20)12

21)12m

22)\$14

23)1440g

24)270°

25)35°

26)88°

27)55

28)175

29)1/25

30)30°

Paper 2

1) $16 - 10 = 6$

$40 \times 15 \times 6 = 3600\text{cm}^3$

2)35

3) $45 + 24 = 69$

$69 - 51 = 18\text{cm}^2$

4) $107\% \rightarrow 74.9$

$1\% \rightarrow 74.9 \div 107 = 0.7$

$100\% \rightarrow 74.9 \div 107 \times 100 = 70$

$80\% \rightarrow 70$

$100\% \rightarrow 70 \div 80 \times 100 = \87.50

5) $8u \rightarrow 4L$

$1u \rightarrow 0.5L$

$5u \rightarrow 2.5L$

$2.5L = 2500ml$

$2500 + 650 = 3150$

$4000 - 3150 = 850$

$850ml = 0.85L$

6) $0.90 \times 4 = 3.60$

$3.60 + 0.45 = 4.05$

$99 \div 4.05 = 24.4444 \approx 24.0$

$24 \times 5 = 120$

$120 + 2 = 122$

$4.05 \times 24 = 97.2$

$97.2 + (0.90 + 0.90) = 99$

Ans: 122

7) $90 \div 5 = 18$

$18 \times 4 = 72$

8) $4.8 + 10.4 + 4.8 = 20$

$20 \div 2 = 10$

$10 + 4.8 + 10.4 = \$25.20$

9) $2.5 \times 2 = 5$

$5.6 - 5 = 0.6$ (shorter pole) 40%

$0.6 = 40\%$

$0.6 \div 40 = 0.015$

$0.015 \times 100 = 1.5m$

10) 252

11) $410 - 20 = 390$

$390 \div 130 = 3$

$30 + 70 + 30 = 130$

$3 \times 30 = 90$

$90 + 20 = 110kg$

12) a) $\angle HBD = 180^\circ - 40^\circ - 32^\circ = 108^\circ$

$\angle BED = 180^\circ - 108^\circ = 72^\circ$

$\angle p = 180^\circ - (72^\circ \times 2) = 36^\circ$

b) $\angle BEG = 180^\circ + 3 = 36^\circ$

$(180^\circ - 108^\circ) \div 2 = 36^\circ$

$\angle q = 180^\circ - 36^\circ = 144^\circ$

13)a)(Female,swim) $\rightarrow \frac{3}{4} \times \frac{3}{10} = \frac{9}{40}$
(male,swim) $\rightarrow \frac{1}{5} \times \frac{7}{10} = \frac{7}{50}$
Total, swim $\rightarrow \frac{9}{40} + \frac{7}{50} = \frac{73}{200}$
 $\frac{73}{100} \times 100\% = 36.5\%$
b)36.5% \rightarrow 146 people
1% \rightarrow 4 people
100% $\rightarrow 100 \times 4 = 400$

14)45 \times 2 = 90
135 - 90 - 10 = 35

15)5 \times 5 \times 80 = 2000
2000 \div 8 = 250
250 \times 5 = 1250
5 \times 5 \times 70 = 1750
1750 - 1250 = 500cm³

16)At first
Tom $\rightarrow 12u + 144$
Ali $\rightarrow 12u$
After spending
Tom $\rightarrow 9u + \$108$
Ali $\rightarrow 8u$
 $8u + 122 = 9u + 108$
 $1u \rightarrow 14$
Tom at first
 $\rightarrow 12 \times \$14 + \$144 = \$168 + 144 = 312$

17)a)21u $\rightarrow 2112 - 600 = 1512$
1u $\rightarrow 1512 \div 21 = 72$
10u $\rightarrow 72 \times 10 = 720$
b)6u $\rightarrow 72 \times 6 = 432$
432 + 600 = 1032

18)a)16 , 20
b)30 + 1 = 31
31 \times 4 = 124
c)9 \times 9 = 81
9 - 2 = 7

