

Assessment Test for Singapore Primary Mathematics 5A,

This test covers material taught in Primary Mathematics 5A

(<http://www.singaporemath.com/>)

1.	Consider the number 49,752,003,096.	
(a)	Write the number in words.	[1]
(b)	What is the place value of the digit 4 in this number? _____	[1]
(c)	What digit is in the ten millions place? _____	[1]
(d)	Round this number to the nearest billion. _____	[1]
(e)	Is 49,752,030,096 greater than or smaller than this number? _____ By how much? _____	[1]
2.	Round each number to the nearest hundred thousand and then estimate the value of	
(a)	$899,371 + 6,790,897$	[1]
(b)	$5,296,003 - 742,851$	[1]
3.	Estimate the value of	
(a)	$492,396 \times 7$	
(b)	$3,899,465 \div 9$	[2]
(c)	8304×480	
(d)	$63,854 \div 830$	[2]

4.	Write 84 as a product of its prime factors.	[2]
5.	Find the value of	
(a)	6×10^4	[1]
(b)	101×10^3	[1]
(c)	$2^3 \times 3^2 \times 5^2 \times 1^8$	[2]
6.	Find the value of	
(a)	$6 + 2 \times 24 \div 8 - 12 = \underline{\hspace{2cm}}$	[1]
(b)	$48 \div (10 - 4) \times 100 = \underline{\hspace{2cm}}$	[1]
(c)	$12 + (10 + 2) \div (6 \times 2) - 3 = \underline{\hspace{2cm}}$	[2]
7.	Find the missing numbers.	
(a)	$(38 + 5) \times 3 = (38 \times \underline{\hspace{1cm}}) + (5 \times \underline{\hspace{1cm}})$	[1]
(b)	$35 \times 7 = (\underline{\hspace{1cm}} \times 7) + (5 \times 7)$	[1]
(c)	$(\underline{\hspace{1cm}}) \times 6 = (45 \times 6) - (3 \times 6)$	[1]
(d)	$89 \times 4 = (90 \times \underline{\hspace{1cm}}) - (1 \times \underline{\hspace{1cm}})$	[1]

8. Solve using mental calculation.

(a) $498 + 372 =$

(b) $501 + 845 =$ [2]

(c) $534 - 398 =$

(d) $700 - 82 =$ [2]

(e) $99 \times 4 =$

(f) $29 \times 80 =$ [2]

(g) $25 \times 32 =$

(h) $11 \times 12 =$ [2]

9. Solve. Give your answer as a whole number or a mixed number.

(a) 389×64

(b) $6,497 \times 83$ [2]

(c) $2,304 \div 24$

(d) $2,176 \div 68$ [4]

(e) $22 \div 8$

(f) $4,576 \div 24$ [4]

10. Sam bought 3 shirts and 2 pairs of pants for \$135. Each pair of pants costs \$15 more than each shirt. What was the cost of 1 pair of pants? [3]

11. Aaron saved twice as much money as Britney. Carlos saved \$70 more than Britney. If they saved \$1,790 altogether, how much did Carlos save? [3]

12. Express the value of each of the following in its simplest form.

(a) $3\frac{5}{6} + 2\frac{9}{10}$

(b) $5\frac{1}{9} - 2\frac{2}{3}$ [2]

(c) $6 \times \frac{3}{4}$

(d) $\frac{3}{8}$ of 20 [2]

13. Express the value of each of the following in its simplest form.

(a) $6 \times 2\frac{5}{6}$ (b) $\frac{3}{10} \times \frac{5}{6}$ [4]

(c) $2\frac{3}{4} \times 1\frac{1}{3}$ (d) $\frac{4}{5} \div 8$ [4]

(e) $\frac{9}{10} \div 6$ (f) $5 \div \frac{1}{4}$ [4]

(g) $6 \div \frac{3}{5}$ (h) $\frac{3}{4} \div \frac{5}{8}$ [4]

14. Cathy spent $\frac{4}{5}$ of her money while Josie spent $\frac{1}{2}$ of her money. Both of them had the same amount of money left. If Josie had \$35 left, how much did Cathy have at first? [3]

15. Peter spent $\frac{1}{3}$ of his money on a toy car and $\frac{2}{3}$ of the remainder on a toy boat. [3]
He had \$6 left. How much money did he spend altogether?

16. A tank is $\frac{3}{5}$ full with water. If 30 liters more water are needed to fill the tank [3]
completely, find the capacity of the tank.

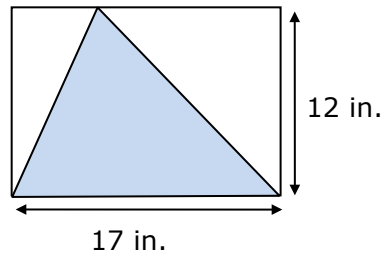
17. (a) How many pieces of string, each $\frac{1}{4}$ meters long, can be cut from a piece [2]
of string that is $\frac{7}{8}$ meters long?

(b) How many centimeters of string will be left over? [1]

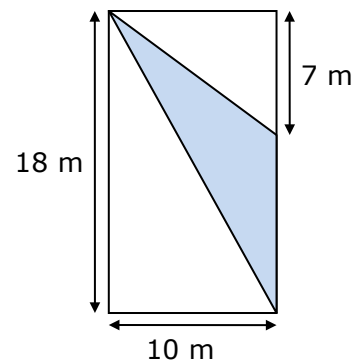
18. Find the area of a rectangle measuring 6 cm by $4\frac{2}{3}$ cm. [3]

19. Find the shaded area of each rectangle.

(a)

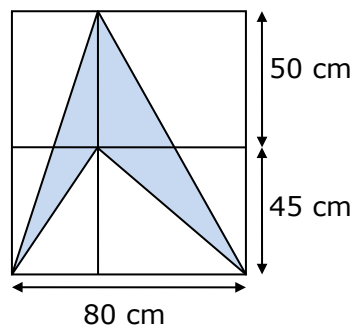


(b)

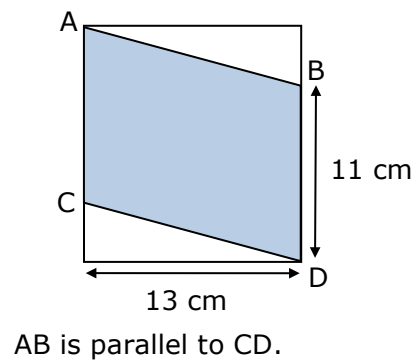


[4]

(c)

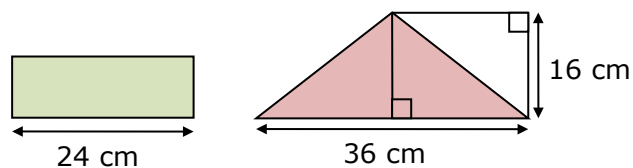


(d)



[4]

20. The area of the shaded rectangle is the same as the area of the shaded triangle. Find the perimeter of the rectangle. (Drawings are not to scale.) [2]



21.	Express the ratio 16 : 20 in its simplest form.	[1]
22.	There are 24 students in class. 10 of them are boys. Find the ratio of the number of boys to the number of girls in class.	[1]
23.	A pole, 135 cm long, is painted red, white, and blue in the ratio 3 : 4 : 2. What length of the pole is painted white?	[2]
24.	Abe, Barry, and Carlos have 256 marbles altogether. The ratio of Abe's marbles to Barry's marbles is 4 : 3. Barry has 14 more marbles than Carlos. How many marbles does Abe have?	[2]

Answer Key

1. (a) forty-nine billion, seven hundred fifty-two million, 3 thousand, ninety-six
(b) ten billion
(c) 5
(d) 50,000,000,000
(e) greater than, by 27,000
2. (a) 7,700,000
(b) 4,600,000
3. Accept reasonable estimates.
(a) 3,500,000 (b) 400,000
(c) 4,000,000 (d) 80
4. $2 \times 2 \times 3 \times 7$
5. (a) 60,000
(b) 101,000
(c) 1,800
6. (a) 0
(b) 800
(c) 10
7. (a) 3; 3
(b) 30
(c) 42
(d) 4; 4
8. (a) 870 (b) 1,346
(c) 136 (d) 618
(e) 396 (f) 2,320
(g) 800 (h) 132
9. (a) 24,896 (b) 539,251
(c) 96 (d) 32
(e) $2\frac{3}{4}$ (f) $190\frac{2}{3}$
10. \$36
11. \$500
12. (a) $6\frac{11}{15}$ (b) $2\frac{4}{9}$
(c) $4\frac{1}{2}$ (d) $7\frac{1}{2}$
13. (a) 17 (b) $\frac{1}{4}$
(c) $3\frac{2}{3}$ (d) $\frac{1}{10}$
(e) $\frac{3}{20}$ (f) 20
(g) 10 (h) $1\frac{1}{5}$
14. \$175
15. \$21
16. 75 liters
17. (a) 3 (b) 12.5 cm
18. 28 cm²
19. (a) 102 in.² (b) 55 m²
(c) 2000 cm² (d) 143 cm²
20. 72 cm
21. 4 : 5
22. 5 : 7
23. 60 cm
24. 108