

Year 3 Term 4 Homework

Student Name: _____	Grade: _____
Date: _____	Score: _____

Table of contents

1	Year 3 Term 1 Week 1 Homework	1
1.1	Topic 1 — Numeration	1
1.1.1	Number Patterns:	1
1.1.2	Place Value:	1
1.1.3	Roman Numerals:	2
1.2	Topic 2 — Addition 1	6
1.3	Topic 3 — Subtraction 1	7
1.4	Topic 4 — Multiplication 1	8
1.5	Problem Solving (Numeration)	9

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1 Year 3 Term 1 Week 1 Homework

1.1 Topic 1 — Numeration

1.1.1 Number Patterns:

Name of Group	Pattern
Whole numbers:	0, 1, 2, 3, 4, 5, 6, . . .
Counting Numbers:	1, 2, 3, 4, 5, 6, . . .
Odd numbers:	1, 3, 5, 7, 9, 11, . . .
Even Numbers:	2, 4, 6, 8, 10, 12, . . .
Ordinal Numbers:	1st, 2nd, 3rd, 4th, fifth, . . .
Square Numbers:	1, 4, 9, 16, 25, 36, . . .

Exercise 1.1.1

1. Find the sum of the counting numbers from 1 to 10.

2. Find the sum of the odd numbers from 1 to 11.

3. Find the sum of the even numbers from 2 to 12.

4. Find the sum of four even numbers after 12.

5. Find the sum of four odd numbers after 11.

1.1.2 Place Value:

Our number system today is based on the Hindu-Arabic system where the value of a number is determined by its place in a particular column.

Exercise 1.1.2 What is the value of 3 in the following numbers?

1. 743 _____

2. 327 _____

3. 237 _____

1.1.3 Roman Numerals:

Roman Numerals were very popular about 2000 years ago. The Roman number system are based on the idea of **addition** and **subtraction**.

- When a smaller numeral appears before a large one, it is **subtracted** from the large one:

$$\text{IV means } 5 - 1 = 4$$

$$\text{XL means } 50 - 10 = 40$$

- When a smaller numeral appears after the larger one, it is **added** to the large one.

$$\text{VI means } 5 + 1 = 6$$

$$\text{LX means } 50 + 10 = 60$$

- By repeating a numeral, its value is repeated.

$$\text{XX} = 10 + 10 = 20$$

$$\text{XXX} = 10 + 10 + 10 = 30$$

- By placing a bar over the numeral, its value is increased by 1000 times.

$$\begin{array}{l|l} \overline{\text{V}} = 5000 & \overline{\text{X}} = 10,000 \\ \overline{\text{L}} = 50,000 & \overline{\text{C}} = 100,000 \\ \overline{\text{D}} = 500,000 & \overline{\text{M}} = 1,000,000 \end{array}$$

The table below gives more details of the Roman numeral system:

I	II	III	IV	V	VI	VII	VIII	IX
1	2	3	4	5	6	7	8	9
X	XX	XXX	XL	L	LX	LXX	LXXX	XC
10	20	30	40	50	60	70	80	90
C	CC	CCC	CD	D	DC	DCC	DCCC	CM
100	200	300	400	500	600	700	800	900
M								
1000								

Example 1.1.1 Change the Roman numerals into our numerals:

1. $XXIV = 10 + 10 + 4 = 24$

2. $CCXIII = 100 + 100 + 10 + 3 = 213$

3. $CXXVIII = 100 + 10 + 10 + 5 + 3 = 128$

Exercise 1.1.3 Change the Roman numerals into our number system:

1. $XIX =$ _____

2. $XXVIII =$ _____

3. $XXXVII =$ _____

4. $CCXIII =$ _____

Example 1.1.2 Change the Hindu-Arabic numerals into Roman numerals:

1. $37 = \underline{XXXVII}$

2. $214 = \underline{CCXIV}$

3. $1453 = \underline{MCDLIII}$

Exercise 1.1.4 Change these Hindu-Arabic numerals into Roman numerals:

1. $23 =$ _____

2. $215 =$ _____

3. $259 =$ _____

4. $1234 =$ _____

Exercise 1.1.5 Change the Roman numerals into our numerals:

1. $CDLXXXVII =$ _____

2. $DXXXVIII =$ _____

3. $CCXXXVII =$ _____

4. $LXIV =$ _____

5. $CCCXCVII =$ _____

6. $CCCLXX =$ _____

7. $XL =$ _____

8. $CCCXLII =$ _____

9. $DCCCXXXIV =$ _____

10. $DCCCLVIII =$ _____

11. $CI =$ _____

12. $CLXXX =$ _____

13. $CXXII =$ _____

14. $CCLVIII =$ _____

15. $DCCLI =$ _____

16. $DCCXC =$ _____

17. $CCLXVIII =$ _____

18. $DCXXV =$ _____

19. $DCCCXCI =$ _____

20. $CCLXXXIII =$ _____

Exercise 1.1.6 Change these Hindu-Arabic numerals into Roman numerals:

1. $272 =$ _____

2. $847 =$ _____

3. $73 =$ _____

4. $545 =$ _____

5. $106 =$ _____

6. $651 =$ _____

7. $165 =$ _____

8. $289 =$ _____

9. $506 =$ _____

10. $118 =$ _____

11. $34 =$ _____

12. $168 =$ _____

13. $37 =$ _____

14. $585 =$ _____

15. $144 =$ _____

16. $803 =$ _____

17. $729 =$ _____

18. $733 =$ _____

19. $196 =$ _____

20. $382 =$ _____

1.2 Topic 2 — Addition 1

$$\begin{array}{r} \textcircled{1} \quad 369 \\ + 280 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{2} \quad 169 \\ + 203 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{3} \quad 324 \\ + 420 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{4} \quad 495 \\ + 140 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{5} \quad 236 \\ + 77 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{6} \quad 417 \\ + 14 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{7} \quad 343 \\ + 395 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{8} \quad 405 \\ + 130 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{9} \quad 428 \\ + 406 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{10} \quad 109 \\ + 276 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{11} \quad 68 \\ + 226 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{12} \quad 75 \\ + 465 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{13} \quad 349 \\ + 316 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{14} \quad 29 \\ + 193 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{15} \quad 189 \\ + 254 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{16} \quad 103 \\ + 164 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{17} \quad 15 \\ + 455 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{18} \quad 101 \\ + 75 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{19} \quad 49 \\ + 450 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{20} \quad 232 \\ + 336 \\ \hline \\ \hline \end{array}$$

1.3 Topic 3 — Subtraction 1

$$\begin{array}{r} \textcircled{1} \quad 128 \\ - 91 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{2} \quad 482 \\ - 10 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{3} \quad 393 \\ - 39 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{4} \quad 476 \\ - 26 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{5} \quad 399 \\ - 69 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{6} \quad 33 \\ - 10 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{7} \quad 326 \\ - 59 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{8} \quad 424 \\ - 17 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{9} \quad 227 \\ - 19 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{10} \quad 167 \\ - 23 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{11} \quad 483 \\ - 29 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{12} \quad 491 \\ - 45 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{13} \quad 435 \\ - 80 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{14} \quad 19 \\ - 14 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{15} \quad 119 \\ - 96 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{16} \quad 82 \\ - 78 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{17} \quad 277 \\ - 81 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{18} \quad 352 \\ - 52 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{19} \quad 362 \\ - 24 \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{20} \quad 282 \\ - 12 \\ \hline \\ \hline \end{array}$$

1.4 Topic 4 — Multiplication 1

$$\begin{array}{r} \textcircled{1} \quad 50 \\ \times 46 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{2} \quad 75 \\ \times 24 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{3} \quad 72 \\ \times 34 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{4} \quad 54 \\ \times 21 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{5} \quad 68 \\ \times 33 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{6} \quad 60 \\ \times 24 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{7} \quad 69 \\ \times 27 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{8} \quad 68 \\ \times 16 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{9} \quad 77 \\ \times 21 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{10} \quad 85 \\ \times 10 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{11} \quad 86 \\ \times 21 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{12} \quad 75 \\ \times 29 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{13} \quad 60 \\ \times 13 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{14} \quad 85 \\ \times 48 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{15} \quad 60 \\ \times 25 \\ \hline \end{array}$$

$$\begin{array}{r} \textcircled{16} \quad 68 \\ \times 50 \\ \hline \end{array}$$

1.5 Problem Solving (Numeration)

Exercise 1.5.1

- Which number is made up of 2 hundreds, 8 tens and 6 units?
(A) 280 (B) 286 (C) 268 (D) 682
- Two more than 399 is:
(A) 400 (B) 402 (C) 3992 (D) 401
- $5 \times 6 = 3 \times \square$. Find the missing number that fits in the box.
(A) 8 (B) 9 (C) 10 (D) 12
- There are 30 children in our class. 15 travel by car. 8 travel by bus, and the rest walk. How many students walk to school?
(A) 7 (B) 6 (C) 9 (D) 8
- The number of cents in 3 dollars and 5 cents is:
(A) 35 (B) 305 (C) 3005 (D) 350
- What is a comfortable room temperature?
(A) 22° (B) 15° (C) 32° (D) 7°
- What is the smallest even number more than 50?
(A) 58 (B) 52 (C) 48 (D) 51
- If tomorrow is Monday, what day was it 8 days ago?
(A) Sunday (B) Monday (C) Saturday (D) Friday
- I am twice the result of adding 6 and 9. What number am I?
(A) 21 (B) 30 (C) 25 (D) 32
- 36 bookmarks were shared equally among four children. How many bookmarks did each one of them receive?
(A) 4 (B) 6 (C) 8 (D) 9

Exercise 1.5.2

1. At Mary's birthday party 28 apples were placed in bowls containing 5 each, how many would be left over?
(A) 1 (B) 2 (C) 3 (D) 4
2. What is the smallest number that can be taken away from 23 so the answer can be divided exactly by 5?
(A) 1 (B) 2 (C) 3 (D) 4
3. What is the total of the next four even numbers after 4?
(A) 40 (B) 36 (C) 32 (D) 34
4. What number multiplied by 3 is four times 6?
(A) 6 (B) 7 (C) 8 (D) 10
5. Into how many halves can you cut 5 apples?
(A) 10 (B) 12 (C) 20 (D) 16
6. Into how many quarters can you cut 4 oranges?
(A) 12 (B) 16 (C) 20 (D) 22
7. Which number is made up of 6 hundred, 0 tens and 7 units?
(A) 607 (B) 670 (C) 706 (D) 760
8. What is the second lowest odd number that is more than 10?
(A) 11 (B) 13 (C) 9 (D) 15
9. What number comes half way between 10 and 20?
(A) 10 (B) 15 (C) 5 (D) 16
10. What is the smallest number that can be added to 23 so the answer can be divided exactly by 5?
(A) 1 (B) 2 (C) 3 (D) 4

Exercise 1.5.3

1. What number is 11 more than 49?

- (A) 60 (B) 70 (C) 50 (D) 38

2. What number is 11 less than 90?

- (A) 89 (B) 79 (C) 87 (D) 101

3. Complete the number patterns:

(a) 62, 52, 42, _____, _____, _____, ...

(b) 4, 9, 14, _____, _____, _____, ...

4. How many 10 ¢ coins in \$2.90? _____

5. \$23.50 = _____ cents.

6. How many minutes are there in $2\frac{1}{2}$ hours? _____

7. How many 50 ¢ coins are needed to make \$5.50? _____

8. Write the smallest number you can using 1, 3, 5 and 7. _____

9. Write the largest number you can using 2, 4, 6 and 8. _____

10. How many grams are there in 1.5 kg? _____

11. How many 20 ¢ coins are needed to make \$3? _____

12. How many tens are there in 190? _____

13. Are five 50 ¢ coins worth more than \$3? _____

14. Write the numeral for 5 hundreds + 42 tens. _____

15. How many hours are there from noon to 9 p.m.? _____