

Key book

Understanding Mathematics

4

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UNIT 1

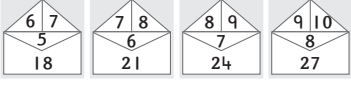
Page No. 5

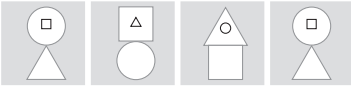
- | | | | | | | | |
|----|--------|------|------|------|------|------|------|
| 1. | 1 EFG | FGH | GHI | HIJ | | | |
| | 2 111V | 108U | 105T | 102S | | | |
| | 3 5999 | 4999 | 3999 | 2999 | | | |
| | 4 505 | 606 | 707 | 808 | | | |
| 2. | 1 AB1 | BC2 | CD3 | DE4 | EF5 | FG6 | GH7 |
| | 2 123A | 234B | 345C | 456D | 567E | 678F | 789G |

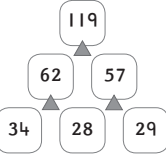
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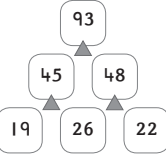
3. 1 

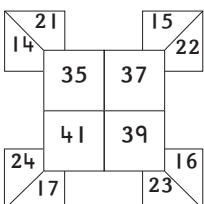
3 

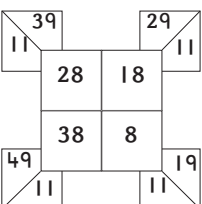
5 

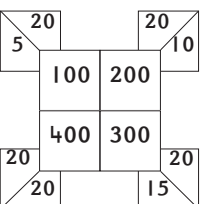
2 

4 
4. 1 

2 

5. 1 

2 

3 

Page No. 7

1. 1  2  3 

Page No. 8

1. 1 ✓ 3 ✓

Page No. 10

4. A B C D E H I M O

UNIT 2

Page No. 16

1. 1 9
10 99
100 999
1000 9999

1. 1. Ninety-nine
2. Nine hundred and nine
3. Seven thousand six hundred and twenty-one
4. Six thousand
5. Nine thousand nine hundred and ninety-nine
2. 1. 808 2. 3020 3. 9987 4. 9090 5. 4004

Page No. 17

3. 1. 2627 2628 2629 2630
2. 3530 3540 3550 3560
3. 6305 6405 6505 6605
4. 6999 7999 8999 9999
4. 1. 70 2. 8 3. 9 4. 6
5. 1. $4000 + 600 + 90 + 7$ 2. $8000 + 600 + 50 + 0$
3. $3000 + 400 + 20 + 9$ 4. $7000 + 700 + 70 + 7$
5. $9000 + 0 + 30 + 1$
6. 1. 5306 2. 3555 3. 7066 4. 9009 5. 5505
7. 1379 8. 6410

Page No. 19

1. 1. 100000 2. 10000 99999
3. 1000000 4. 999999
2. 1. Twenty one thousand nine hundred and seventy-five
2. Fifty thousand and ninety-seven
3. Forty five thousand and nine
4. Twelve thousand three hundred and forty-five
5. Ninety nine thousand nine hundred and ninety-nine
3. 1. 16549 2. 12222 3. 30540 4. 60400 5. 70707
4. 1. 1000 2. 100 3. 100000 4. 999 5. 99999
6. 9999 7. 10000 8. 999999 9. 1000000 10. 99

Page No. 22

1. 1. 5,32,651 Fivelakh thirty two thousand six hundred and fifty-one
2. 1,00,000 One lakh
3. 8,35,207 Eight lakh thirty five thousand two hundred seven
4. 9,78,032 Nine lakh seventy eight thousand and thirty-two
5. 10,00,000 Ten lakhs
2. 1. 5,60,728 2. 3,60,006 3. 5,66,090 4. 7,85,303 5. 45,33,197
3. 1. Nine million, eight hundred seventy one thousand and twenty-three

2. Four million, nine hundred ninety nine thousand and three hundred one
 3. Six million, seven hundred eighty three thousand and five hundred twelve
 4. Four hundred seventy six thousand and four hundred fifteen
 5. Seven million, nine hundred thirteen thousand and six hundred forty
4. 1. 628,491 2. 105,248 3. 7,634,425
 4. 1,000,001 5. 10,000,000
 5. 1. thousand-thousand make a million
 2. Ten lakhs make a million
 3. Hundred ten thousand make a million

Page No. 23

1. 1. 60,000 3. 8,00,000 5. 70,00,000
2. 70 4. 9,00,000 6. 0
2. 1. 6000000 2. 800000 3. 300000 4. 500000
- 200000 70000 90000 0
- 80000 5000 8000 0
- 9000 400 700 800
- 0 30 10 60
- 10 9 5 2
- 4
3. 1. 5,00,005 2. 5,050 3. 50,500 4. 5,50,000
4. 1. 300 2. 2997 3. 2700 4. 27000

Page No. 24

1. 1. 2 ten-thousands + 7 thousands + 3 hundreds + 1 tens + 5 ones
2. 9 lakhs + 7 ten-thousands + 3 thousands + 4 hundreds + 8 tens + 6 ones
3. $(7 \times 100000) + (8 \times 10000) + (3 \times 1000) + (4 \times 100) + (2 \times 10) + (9 \times 1)$
4. $60000 + 3000 + 800 + 40 + 7$
5. $90000 + 4000 + 700 + 0 + 5$
2. 1. 9,54,628 2. 7,00,777 3. 40,04,044
4. 3,56,245 5. 9,00,864

Page No. 25

1. 1. < 2. > 3. > 4. < 5. = 6. <
2. 1. 15,903 2. 6,506 3. 5,10,112
3. 1. 81,799 2. 93,709 3. 99,990

Page No. 26

1. 1. 70198 70918 71098 79018
2. 23769 26763 27639 29763
3. 90841 93208 94801 95802
4. 66057 66507 66570 66750
5. 14827 235131 413286 823141
2. 1. 68609 68608 48608 46806
2. 24606 23947 20444 17405
3. 32144 31411 14411 14144
4. 91520 91340 91232 90420
3. 1. 543210 2. 965321 4. 1. 103678 2. 102345
5. 1. 200000 + 0 + 8000 + 600 + 0 + 0
2. 500000 + 40000 + 3000 + 200 + 10 + 7
3. 100000 + 10000 + 5000 + 900 + 70 + 1
4. 300000 + 50000 + 7000 + 100 + 80 + 3
6. 1. 4995 2. 89991 3. 72 4. 199998
7. 305008

Page No. 28 MCQ - I

1. one lakh 2. one million 3. one lakh 4. 3,04,587
5. 70,70,071 6. 80,000 7. 30,903 8. 3
9. 7 10. 562003

UNIT 3**Page No. 29**

1. 1. 7600 2. 8594 3. 6948 4. 6294
2. 1. 560 2. 970 3. 180 4. 86 5. 2380
3. 1. 7947 2. 3932, 7947 3. 1565, 5195
4. 1. 5672 2. 3462 3. 89256 4. 6701

Brain Tuner

200, 10, 90, 100 160, 170, 250, 140

Page No. 30

1. 1. 748569 2. 679383 3. 998987 4. 398765
5. 748699 6. 498989

Identifying Patterns

6, 9, 12, 15, 18, 21, 24, 27
3**Page No. 31**

1. 1. 140972 2. 133766 3. 1146966 4. 812181
5. 827499 6. 672228
2. 1. 64302 2. 62424 3. 43262
- 33421 55361 53131
- + 11537 + 52732 + 22566
- 109260 170517 118959

Page No. 32

3. 1. 56,574 2. 44,290 3. 5,21,525 4. 25,155 5. 7,47,756

Identifying Patterns

355, 455, 555, 655, 755, 855, 955

1. 355, 455, 555, 655

2. 1

3. 10

4. 100

Page No. 33

1. 1. 341

2. 393

3. 6278

4. 2017

2. 1. 60

2. 300

3. 1000

3. 1. (i) $160 - 85 = 75$

(ii) $160 - 75 = 85$

2. (ii) $900 - 330 = 570$

(ii) $900 - 570 = 330$

4. 1. $222, 222 + 214 = 436$

2. $371, 371 + 369 = 740$

Page No. 34

1. 1. 257425

2. 652152

3. 880210

4. 222110

5. 813102

6. 222002

2. 1. 41324

2. 374132

3. 553113

4. 323210

5. 215711

6. 222427

Brain Tuner

879, 246, 99, 133

789, 218, 112, 432

Page No. 35

1. 1. 36253

2. 531212

3. 234673

4. 310969

5. 516707

6. 368008

2. 1. 43145

2. 287859

3. 28466

4. 410528

5. 188877

6. 641976

3. 1. **888888**

2. 593810

3. 754672

– 765342

– **162306**

– **415442**

123546

431504

339230

Page No. 36

4. 1. 35765

2. 374557

3. 660958

4. 1000

5. 474355

5. 1. 90068

2. 393019

3. 628898

4. Anand's flat is costly by Rs 184000

5. 29804

1. 201100

2. 2309648

3. 61209

Page No. 38

4. 1. 65; $40 + 25 = 65$

2. 51; $91 - 40 = 51$

3. 368; $168 + 200 = 368$

4. 657; $757 - 100 = 657$

5. 563; $200 + 363 = 563$

6. 219; $319 - 100 = 219$

Page No. 40

1. 60, 30, 10, 60, 10, 40, 20, 30

Page No. 41

- | | | | |
|------------|----------|---------|----------|
| 2. 1. 1800 | 2. 9800 | 3. 1400 | 4. 7400 |
| 5. 5200 | 6. 3600 | | |
| 3. 1. 5000 | 2. 49000 | 3. 7000 | 4. 26000 |
| 5. 15000 | 6. 21000 | | |

Page No. 43

- | | | | |
|--------------------|-------------|-------------------|---------------|
| 1. 1. 90, 85 | 2. 150, 143 | 3. 110, 107 | 4. 130, 130 |
| 5. 90, 86 | 6. 100, 103 | 7. 830, 825 | 8. 540, 543 |
| 2. 1. 1000, 1014 | | 2. 800, 792 | |
| 3. 9600, 9566 | | 4. 9600, 9566 | |
| 5. 400, 453 | | 6. 1100, 1029 | |
| 7. 6097, 6144 | | 8. 6900, 6868 | |
| 3. 1. 57000, 56982 | | 2. 49000, 48835 | |
| 3. 32000, 32423 | | 4. 79000, 79607 | |
| 5. 65000, 65806 | | 6. 106000, 106699 | |
| 1. 1. 300, 228 | 2. 400, 351 | 3. 400, 361 | 4. 3800, 3778 |
| 2. 1. 21000, 20894 | | 2. 12000, 11610 | |
| 3. 34000, 33999 | | | |

Page No. 45 MCQ - II

- | | | | |
|----------|------------------------|-----------|----------|
| 1. 1590 | 2. 404040 | 3. 106679 | 4. 1 |
| 5. 49950 | 6. 0 | 7. 16500 | 8. 44568 |
| 9. 728 | 10. $1256 + 1256 - 42$ | | |

UNIT 4**Page No. 47**

- | | | | |
|-----------|---------|---------|---------|
| 1. 1. 119 | 2. 0 | 3. 314 | 4. 0 |
| 5. 525 | 6. 0 | | |
| 2. 1. 996 | 2. 3816 | 3. 6643 | 4. 1760 |
| 5. 6369 | 6. 8534 | 7. 7770 | 8. 6110 |
| 3. 1. 25 | 2. 19 | 3. 87 | 4. 363 |
| 5. 6 | 6. 246 | 7. 893 | |

Page No. 48

- | | | | |
|-------------|------------|-------------|-------------|
| 4. 1. 470 | 2. 500 | 3. 900 | 4. 1400 |
| 5. 19400 | 6. 44800 | 7. 7350 | 8. 6360 |
| 9. 64470 | 10. 173000 | 11. 175000 | 12. 362700 |
| 13. 1002000 | 14. 852000 | 15. 1524000 | 16. 8550000 |
| 5. 1. 5904 | 2. 15010 | 3. 25126 | 4. 21315 |
| | | | 5. 10500 |

Puzzle

$87 \times 9 = 783$

$23 \times 1 = 23$

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- | | | | |
|----------|-------|-------|-------|
| 1. 1. 63 | 2. 40 | 3. 56 | 4. 54 |
|----------|-------|-------|-------|

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- | | | | |
|-----------|-----------|-----------|-----------|
| 1. 1. 296 | 2. 336 | 3. 1290 | 4. 1410 |
| 2. 1. 145 | 2. 399 | 3. 252 | 4. 352 |
| 5. 438 | 6. 2781 | 7. 1046 | 8. 3828 |
| 9. 16268 | 10. 22946 | 11. 58992 | 12. 43680 |

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- | | | | |
|-----------|-----------|-----------|-----------|
| 1. 1. 726 | 2. 943 | 3. 1596 | 4. 2613 |
| 5. 3915 | 6. 10404 | 7. 14828 | 8. 27136 |
| 9. 29700 | 10. 16506 | 11. 26228 | 12. 38269 |

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- | | | | | |
|------------|------------|------------|------------|----------|
| 13. 149332 | 14. 155376 | 15. 295355 | 16. 75012 | |
| 2. 1. 1344 | 2. 1612 | 3. 32319 | 4. 14938 | |
| 5. 67815 | 6. 2613 | 7. 5616 | 8. 45560 | |
| 9. 129382 | 10. 193585 | 11. 5628 | 12. 12075 | |
| 13. 71495 | 14. 227328 | 15. 77231 | 16. 2060 | |
| 17. 20976 | 18. 31120 | 19. 68992 | 20. 303264 | |
| 3. 1. 840 | 2. 2565 | 3. 1332 | 4. 7290 | 5. 5985 |
| 6. 31608 | 7. 10530 | 8. 135000 | 9. 625875 | 10. 6000 |

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- | | | | |
|-------------|------------|------------|------------|
| 1. 1. 15792 | 2. 37269 | 3. 38766 | 4. 72372 |
| 5. 608672 | 6. 772188 | 7. 721395 | 8. 451440 |
| 9. 121600 | 10. 424790 | 11. 355880 | 12. 178273 |

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- | | | | |
|-------------|-------------|-------------|-------------|
| 13. 289173 | 14. 1421142 | 15. 1167975 | 16. 1528800 |
| 2. 1. 2369 | 2. 489904 | 3. 316635 | 4. 1395968 |
| 5. 1328652 | 6. 2020 | 7. 55272 | 8. 140120 |
| 9. 412146 | 10. 1306335 | 11. 17171 | 12. 367200 |
| 13. 166875 | 14. 1529136 | 15. 3778440 | 16. 18308 |
| 17. 244200 | 18. 540858 | 19. 1766217 | 20. 1214748 |
| 3. 1. 54621 | 2. 1512455 | 3. 1162965 | |

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- | | | | | |
|----------|----------|-----------|-----------|---------|
| 4. 36720 | 5. 39000 | 6. 150425 | 7. 361350 | 8. 2400 |
|----------|----------|-----------|-----------|---------|

Number Patterns on Multiplication

- | | |
|----------------------------------|------------|
| 1. 123454321, 12345654321 | 2, 3, 4, 7 |
| 2. 1443, 1554, 1665, 1776, 1887 | |
| 3. 1, 11, 21, 31, 41, 51, 61; 10 | |

Page No. 58

- | | | | | |
|------------|-----------|----------|----------|-----------|
| 1. 1. 864 | 2. 2352 | 3. 748 | 4. 2250 | 5. 9912 |
| 2. 1. 2816 | 2. 1470 | 3. 1083 | 4. 2001 | 5. 1584 |
| 6. 3588 | 7. 18981 | 8. 28288 | 9. 17145 | 10. 35640 |
| 11. 19807 | 12. 18283 | | | |

Pattern Search

9999 = 49995 99999 = 499995
999999 = 4999995 9999999 = 49999995
99999999 = 499999995
Multiples of 9
49995, 499995, 4999995, 49999995, 499999995

Page No. 59

- | | | |
|--------------|-----------|-----------|
| 1. 1. 3000 | 2. 5400 | 3. 900 |
| 2. 1. 360000 | 2. 360000 | 3. 240000 |

Pattern Search

27, 297, 2997, 29997, 299997, 2999997
36, 396, 3996, 39996, 399996, 3999996

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Pattern Search

1. $6 \times 9999 = 59994 = 5 + 9 + 9 + 9 + 4 = 36 = 3 + 6 = 9$
 $6 \times 99999 = 599994 = 5 + 9 + 9 + 9 + 9 + 4 = 45 = 4 + 5 = 9$
 $6 \times 999999 = 5999994 = 5 + 9 + 9 + 9 + 9 + 9 + 4 = 54 = 5 + 4 = 9$
 $6 \times 9999999 = 59999994 = 5 + 9 + 9 + 9 + 9 + 9 + 9 + 4 = 63 = 6 + 3 = 9$
 $6 \times 99999999 = 599999994 = 5 + 9 + 9 + 9 + 9 + 9 + 9 + 9 + 4 = 72 = 7 + 2 = 9$
 $6 \times 999999999 = 5999999994 = 5 + 9 + 9 + 9 + 9 + 9 + 9 + 9 + 9 + 4 = 81 = 8 + 1 = 9$
 $6 \times 9999999999 = 59999999994 = 5 + 9 + 9 + 9 + 9 + 9 + 9 + 9 + 9 + 9 + 4 = 90 = 9 + 0 = 9$
1. 27, 36, 45, 54, 63, 72, 81, 90; 9
2. 9 3. 5 and 4
2. $7 \times 9 = 63 = 6 + 3 = 9$
 $7 \times 99 = 693 = 6 + 9 + 3 = 18 = 1 + 8 = 9$
 $7 \times 999 = 6993 = 6 + 9 + 9 + 3 = 27 = 2 + 7 = 9$
 $7 \times 9999 = 69993 = 6 + 9 + 9 + 9 + 3 = 36 = 3 + 6 = 9$
 $7 \times 99999 = 699993 = 6 + 9 + 9 + 9 + 9 + 3 = 45 = 4 + 5 = 9$
 $7 \times 999999 = 6999993 = 6 + 9 + 9 + 9 + 9 + 9 + 3 = 54 = 5 + 4 = 9$
 $7 \times 9999999 = 69999993 = 6 + 9 + 9 + 9 + 9 + 9 + 9 + 3 = 63 = 6 + 3 = 9$
 $7 \times 99999999 = 699999993 = 6 + 9 + 9 + 9 + 9 + 9 + 9 + 9 + 3 = 72 = 7 + 2 = 9$
 $7 \times 999999999 = 6999999993 = 6 + 9 + 9 + 9 + 9 + 9 + 9 + 9 + 9 + 3 = 81 = 8 + 1 = 9$
1. 63, 693, 6993, 69993, 699993, 6999993, 69999993, 699999993, 6999999993
2. 9 3. 6 and 3

Page No. 62 MCQ - III

- | | | | |
|---------------------------------------|------------------------|--------------------|------------------|
| 1. 7320 | 2. 48110 | 3. 0 | 4. Rs 12 |
| 5. 5000 | 6. 1880 | 7. 700×40 | 8. 43×9 |
| 9. $4 \times 4 \times 100 \times 100$ | 10. $A = 225, B = 300$ | | |

UNIT 5**Page No. 63**

- | | | | |
|------------|-----------|---------|----------|
| 1. 1. 145 | 2. 0 | 3. 1 | 4. 0 |
| 2. 1. 9, 1 | 2. 145, 3 | 3. 6, 2 | 4. 22, 7 |

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- | | | | |
|-------------|------------|------------|------------|
| 3. 1. 3027 | 2. 2685 | 3. 6611 | |
| 4. 1. 95 | 2. 85 | 3. 54 | 4. 66 |
| 5. 907 | 6. 848 | 7. 203 | 8. 174 |
| 9. 556 | 10. 339 | 11. 106 | 12. 103 |
| 5. 1. 14, 1 | 2. 15, 1 | 3. 14, 1 | 4. 33, 4 |
| 5. 73, 7 | 6. 46, 7 | 7. 1598, 1 | 8. 37, 5 |
| 9. 1059, 2 | 10. 243, 4 | 11. 658, 4 | 12. 78, 17 |
| 6. 1. 44 | 2. 42 | 3. 127 | |

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- | | | | |
|-------------|------------|-----------|-----------|
| 1. 1. 21157 | 2. 12344 | 3. 12656 | 4. 13547 |
| 5. 24312 | 6. 8437 | 7. 23132 | 8. 14887 |
| 9. 211743 | 10. 142324 | 11. 83567 | 12. 66278 |

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- | | | | |
|-----------|---------|---------|---------|
| 1. 1. 749 | 2. 891 | 3. 822 | 4. 782 |
| 5. 981 | 6. 976 | 7. 592 | 8. 732 |
| 9. 395 | 10. 828 | 11. 394 | 12. 488 |

Page No. 67

- | | | | |
|-----------|---------|---------|---------|
| 1. 1. 226 | 2. 192 | 3. 116 | 4. 19 |
| 5. 161 | 6. 216 | 7. 1788 | 8. 1764 |
| 9. 889 | 10. 673 | 11. 558 | 12. 789 |

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- | | | | |
|--------------|------------|-------------|--------------|
| 1. 1. 126, 0 | 2. 971, 2 | 3. 868, 4 | 4. 9514, 3 |
| 5. 26, 0 | 6. 317, 4 | 7. 215, 3 | 8. 213, 40 |
| 2. 1. 41, 3 | 2. 15, 5 | 3. 16, 3 | 4. 456, 6 |
| 5. 295, 0 | 6. 120, 23 | 7. 225, 25 | 8. 185, 17 |
| 9. 312, 15 | 10. 393, 6 | 11. 324, 20 | 12. 1007, 52 |

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- | | | | |
|--------------|------------|------------|------------|
| 1. 1. 951, 4 | 2. 848 | 3. 182, 10 | 4. 317, 4 |
| 5. 193, 29 | 6. 213, 40 | 7. 112, 8 | 8. 298, 14 |
| 2. 1. 307 | 2. 1943 | 3. 14029 | 4. 18661 |
| 5. 243525 | | | |

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- | | | | |
|--------------|------------|-------------|-------------|
| 1. 1. 9, 340 | 2. 2756, 3 | 3. 369, 40 | 4. 31900, 0 |
| 5. 4860, 0 | 6. 500, 0 | 7. 70060, 5 | 8. 9000, 42 |
| 9. 800, 75 | | | |

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- | | | | |
|-----------|---------|--------|-----------|
| 2. 1. 137 | 2. 43 | 3. 236 | 4. 25 |
| 5. 38 | 6. 23 | 7. 324 | 8. 359, 8 |
| 9. 314 | 10. 576 | | |

Identifying Patterns

1, 12, 123, 1234, 12345, 123456, 1234567, 12345678

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- | | |
|------------------|------------------|
| 2000, 200, 20, 2 | 1000, 100, 10, 1 |
| 600 | 400 |
| 60 | 40 |
| 6 | 4 |
| 2 | 3 |
| 20 | 30 |
| 200 | 300 |
| 2000 | 3000 |

Worksheet

- | | |
|----------|-------|
| 8, 48 | 817 |
| 66394, 0 | 26, 5 |
| 5, 42 | 25, 1 |
| 7168 | 6510 |

Page No. 74 MCQ - IV

- | | | |
|----------------------|-------|----------------|
| 1. last three digits | 2. 50 | 3. 43 |
| 4. 30 | 5. 15 | 6. multiplied |
| 8. 2 | 9. 2 | 10. Rs 1627.50 |
| 7. Rs 20 | | |

UNIT 6**Page No. 77**

- | | | | | |
|----------|---------|-----------|---------|-----------|
| 1. 1. ✗ | 2. ✓ | 3. ✗ | 4. ✓ | |
| 5. ✓ | 6. ✓ | | | |
| 2. 1. 16 | 2. 43 | 3. 39 | 4. 18 | 5. 24 |
| 6. 26 | 7. 47 | 8. 25 | 9. 400 | |
| 3. 1. XV | 2. XXVI | 3. XXXIII | 4. XLII | 5. XLVIII |
| 6. XVI | 7. XLV | 8. XXXIX | 9. LV | |
| 4. 1. < | 2. > | 3. = | 4. < | |
| 5. < | 6. < | | | |

UNIT 7

Page No. 80

1. Even numbers 34, 86, 90, 28, 62, 26, 18
Odd numbers 15, 19, 73, 47, 61, 45, 33
2. 19, 21, 23, 25 3. 28, 30, 32, 34, 36
4. 83, 84, 85, 86, 87, 88, 89, 90, 91, 92
5. 98 6. 10 7. 99 8. 11
2. 2. ODD - It has 5 in ones' place
3. EVEN - It has 6 in ones' place
4. ODD - It has 1 in ones' place
5. EVEN - It has 0 in ones' place

Page No. 81

1. 1. 84 even 2. 132 even 3. 139 odd 4. 91 odd
2. 1. 544 even 2. 452 even 3. 467 odd 4. 466 even

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Adding Odd Numbers

$$\begin{aligned}1 + 3 + 5 + 7 + 9 + 11 &= 36 \quad (6 \times 6) \\1 + 3 + 5 + 7 + 9 + 11 + 13 &= 49 \quad (7 \times 7) \\1 + 3 + 5 + 7 + 9 + 11 + 13 + 15 &= 64 \quad (8 \times 8) \\1 + 3 + 5 + 7 + 9 + 11 + 13 + 15 + 17 &= 81 \quad (9 \times 9) \\1 + 3 + 5 + 7 + 9 + 11 + 13 + 15 + 17 + 19 &= 100 \quad (10 \times 10)\end{aligned}$$

Adding Even Numbers

$$\begin{aligned}2 + 4 + 6 + 8 + 10 + 12 &= 42 \quad (6 \times 7) \\2 + 4 + 6 + 8 + 10 + 12 + 14 &= 56 \quad (7 \times 8) \\2 + 4 + 6 + 8 + 10 + 12 + 14 + 16 &= 72 \quad (8 \times 9) \\2 + 4 + 6 + 8 + 10 + 12 + 14 + 16 + 18 &= 90 \quad (9 \times 10)\end{aligned}$$

$$\begin{aligned}12 \times 12 &= 144 & 16 \times 16 &= 256 \\13 \times 13 &= 169 & 17 \times 17 &= 289 \\14 \times 14 &= 196 & 18 \times 18 &= 324 \\15 \times 15 &= 225 & 19 \times 19 &= 361\end{aligned}$$

UNIT 8

Page No. 85

1. 1. 470, 1340, 9000 2. 78, 159, 585, 6240, 3324
3. 625, 750, 9010, 995, 4830
4. 128, 240, 728, 954, 4232
5. 315, 477, 801, 2169, 8235
6. 5000, 6000 7. 1 and 3
8. 160, 265 yes, the sum will also be divisible by 5
2. 1. 0 2. 4 3. 0 4. 5 5. 0

Page No. 86 MCQ - V

- | | | | | |
|---------|----------------|---------|--------|---------|
| 1. 1000 | 2. subtraction | 3. XCIX | 4. 49 | 5. 1999 |
| 6. even | 7. 100 | 8. 2 | 9. odd | 10. 5 |

UNIT 9

Page No. 88

1. 3 sets ○ ○ ○ ○ ○ ○ ○ ○ ○ ○ ○
- ○ ○ ○ ○
- ○

Page No. 89

2. 2, 3, 4, 6, 8, 12, 24
3. 1. false 2. true 3. true
4. 1. false 5. true 6. false
4. 1. 2, 4, 6, 9, 12, 18, 36 2. 3, 5, 9, 15, 45
3. 2, 4, 8, 16, 32, 64 4. 2, 3, 4, 6, 8, 9, 12, 18, 24, 36, 72
5. 2, 4, 8, 11, 44, 88 6. 2, 3, 4, 6, 8, 12, 24, 32, 48, 96
5. 24 6. 1. 22 2. 30
7. 2. 18, 1; 2, 9; 3, 6 3. 12, 1; 2, 6; 3, 4
4. 14, 1; 2, 7 5. 16, 1; 2, 8; 4, 4
6. 15, 1; 3, 5

Puzzle

- 2, 3, 6, 1, 24, 12, 8
- 2, 5, 20, 10, 1, 4
- 3, 5, 1, 15
- 2, 7, 1, 14
- 9 and 16

Page No. 90

1. 1. 6, 12, 18, 24, 30 2. 11, 22, 33, 44, 55
3. 16, 32, 48, 64, 80 4. 21, 42, 63, 84, 105
5. 25, 50, 75, 100, 125
2. 25 3. 37

Page No. 92

1. 1. prime 2. composite 3. composite 4. prime 5. prime
6. composite 7. composite 8. composite 9. composite
2. 1. 1 2. 2

Page No. 93

3. 3 4. 4 5. 2, 3 6. (3, 4) (11, 13) (17, 19)
7. (2, 3) (2, 5) 8. (2, 7) (5, 7)
9. 2, 3, 5, 7, 11, 13, 17, 19, 23, 29, 31, 37, 41, 43, 47
10. 4, 6, 8, 9, 10, 12, 14, 15, 16, 18, 20, 21, 24, 26, 27, 28, 30, 32, 33, 34, 35, 36, 38, 39, 40, 42, 44, 45, 46, 48, 49
3. 1. 2 2. 1 3. 2 4. 1 5. 2

Page No. 94

1. 1. 10, 2, 5 2. 18, 2, 9, 3, 3
3. 24, 2, 12, 2, 6, 2, 2, 3
2. 1. $3 \times 3 \times 5$ 2. $2 \times 2 \times 2 \times 3 \times 3$ 3. $2 \times 5 \times 7$
4. 3×31 5. $3 \times 3 \times 7$ 6. 5×17 7. 7×7
8. $2 \times 2 \times 2 \times 3 \times 5$ 9. $3 \times 3 \times 3 \times 5$
10. $2 \times 2 \times 3 \times 3 \times 3$ 11. $2 \times 2 \times 3 \times 13$
12. $2 \times 2 \times 2 \times 13$ 13. $2 \times 2 \times 2 \times 2 \times 3 \times 3$
14. $2 \times 2 \times 3 \times 11$ 15. $2 \times 2 \times 2 \times 2 \times 2 \times 2 \times 2 \times 2$

Page No. 95

1. 1. 1, 2, 3, 6 2. 1, 3, 5 3. 1, 2, 11
1, 3, 5 1, 3, 7 1, 3, 11
1, 3 1, 3 1, 11
4. 1, 2, 13 5. 1, 2, 13 6. 1, 2, 7
1, 3, 13 1, 5, 13 1, 2, 3, 4
1, 13 1, 13 1, 2
2. 1. 1, 3, 9 2. 1, 7 3. 1, 7
4. 1, 3 5. 1, 3 6. 1, 3, 5

Page No. 96

1. 1. 4, 6, 8, 10, 12, 14, 16, 18, 20, 22
6, 9, 12, 15, 18, 21, 24, 27, 30, 33
6, 12, 18
2. 8, 12, 16, 20, 24, 28, 32, 36, 40, 44
10, 15, 20, 25, 30, 35, 40, 45, 50, 55
20, 40, 60
2. 2, 4, 6, 8, 10, 12, 14, 16, 18, 20, 22, 24, 26, 28, 30
4, 8, 12, 16, 20, 24, 28
3. 1. 10, 20 2. 24, 48 3. 18, 36
4. 30, 60 5. 10, 20 6. 8, 16

Page No. 97

1. 1. 4, 8, 16, 24, 36 2. 4, 10, 20
3. 2, 9, 29 4. 2, 4, 8, 24 5. 24, 36, 42

Puzzles

12, 10, 12, 22

Page No. 98 MCQ - VI

1. a prime number 2. a composite number
3. 2 4. 2 5. 15 6. 4
7. 2, 5 8. 3 9. 2 10. 2 and 3

Page No. 100

1. 1. $4, \frac{1}{4}, \frac{3}{4}$ 2. $3, \frac{1}{3}, \frac{1}{3}$ 3. $10, \frac{1}{10}, \frac{2}{5}$
 4. $7, \frac{1}{7}, \frac{3}{7}$ 5. $9, \frac{1}{9}, \frac{4}{9}$ 6. $12, \frac{1}{12}, \frac{1}{3}$

Page No. 101

3. $\frac{3}{7}$
 4. 1. two thirds 2. three fifths
 3. seven ninths 4. one sixths
 5. three fourths 6. two tenths
5. 1. $\frac{3}{5}$ 2. $\frac{5}{10}$ 3. $\frac{9}{11}$ 4. $\frac{8}{17}$
 5. $\frac{13}{19}$ 6. $\frac{12}{17}$
6. 1. $\frac{5}{8}$ 2. $\frac{7}{19}$ 3. $\frac{4}{10}$ 4. $\frac{6}{12}$
7. 1. $\frac{3}{10}$ 2. $\frac{3}{4}$ 3. $\frac{3}{7}$

Page No. 102

1. 1. $\frac{1}{3} = \frac{2}{6} = \frac{3}{9}$ 2. $\frac{1}{4} = \frac{2}{8} = \frac{3}{12}$
 2. 1. 2 2. 2 3. 3 4. 6
 5. 1 6. 2

Page No. 104

1. 1. $\frac{1}{4} = \frac{2}{8}$ 2. $\frac{2}{5} = \frac{4}{10}$ 3. $\frac{3}{5} = \frac{6}{10}$
2. $\frac{2}{8}, \frac{3}{12}, \frac{4}{16}, \frac{5}{20}$
3. 1. $\bullet \bigcirc = \bullet \bullet \bigcirc \bigcirc$ 2. $\bullet \bullet \bigcirc = \bullet \bullet \bullet \bullet \bigcirc \bigcirc$
4. 1. $\frac{2}{4} = \frac{3}{6} = \frac{4}{8} = \frac{5}{10} = \frac{6}{12}$ 2. $\frac{2}{4} = \frac{3}{6} = \frac{4}{8} = \frac{5}{10} = \frac{6}{12}$
 3. $\frac{4}{10} = \frac{6}{15} = \frac{8}{20} = \frac{10}{25} = \frac{12}{30}$ 2. $\frac{6}{8} = \frac{9}{12} = \frac{12}{16} = \frac{15}{20} = \frac{18}{24}$
5. 1. $\frac{1}{2}, \frac{2}{4}$ 2. $\frac{3}{9}, \frac{1}{3}$ 3. $\frac{4}{6}, \frac{2}{3}$
6. 1. 2 2. 15 3. 3 4. 24
 5. 8 6. 44 7. 9 8. 35

7. 1. 2, 9, 4, 15
3. 6, 9, 12, 15

2. 8, 6, 16, 10
4. 8, 12, 16, 20

Page No. 105

1. 1. $\frac{2}{3}$ 2. $\frac{2}{7}$

Page No. 107

1. 1. $\frac{3}{4}$ 2. $\frac{6}{7}$ 3. $\frac{8}{10}$ 4. $\frac{2}{5}$
5. $\frac{5}{9}$ 6. $\frac{2}{3}$
2. 1. $\frac{3}{5}$ 2. $\frac{3}{6}$ 3. $\frac{7}{10}$ 4. $\frac{3}{11}$
5. $\frac{6}{8}$ 6. $\frac{4}{6}$
3. 1. $\frac{1}{6}, \frac{3}{6}, \frac{4}{6}, \frac{5}{6}$ 2. $\frac{1}{8}, \frac{3}{8}, \frac{6}{8}, \frac{7}{8}$ 3. $\frac{1}{4}, \frac{2}{4}, \frac{3}{4}, \frac{4}{4}$ 4. $\frac{5}{13}, \frac{7}{13}, \frac{9}{13}, \frac{12}{13}$

Page No. 108

4. 1. $\frac{4}{5}, \frac{3}{5}, \frac{2}{5}, \frac{1}{5}$ 2. $\frac{7}{7}, \frac{5}{7}, \frac{2}{7}, \frac{1}{7}$
3. $\frac{7}{10}, \frac{4}{10}, \frac{3}{10}, \frac{1}{10}$ 4. $\frac{9}{9}, \frac{7}{9}, \frac{5}{9}, \frac{3}{9}$
5. 1. smaller 2. smaller 3. greater 4. greater 5. smaller
6. smaller 7. greater 8. greater 9. smaller 10. smaller
6. 1. between 2. greater 3. smaller

Page No. 109

1. 1. $\frac{3}{5}, \frac{2}{5}, \frac{4}{5}$ 2. $\frac{8}{11}, \frac{9}{11}, \frac{5}{11}$
3. $\frac{9}{13}, \frac{11}{13}, \frac{4}{13}$ 4. $\frac{6}{12}, \frac{9}{12}, \frac{5}{12}$
2. 1. $\frac{3}{21}, \frac{8}{17}, \frac{1}{16}$ 2. $\frac{3}{10}, \frac{6}{14}, \frac{11}{18}$
3. $\frac{2}{7}, \frac{6}{18}, \frac{21}{28}, \frac{9}{19}$ 4. $\frac{4}{6}, \frac{15}{18}, \frac{4}{20}$

Page No. 111

1. 1. $\frac{3+2}{7} = \frac{5}{7}$ 2. $\frac{4+5}{11} = \frac{9}{11}$
3. $\frac{2+1}{5} = \frac{3}{5}$ 4. $\frac{2+3+4}{11} = \frac{9}{11}$
5. $\frac{4+6+7}{17} = \frac{17}{19}$

2. 1. 1 2. $\frac{7}{9}$ 3. $\frac{6}{11}$ 4. $\frac{9}{10}$ 5. $\frac{16}{18}$
 6. $\frac{11}{13}$ 7. $\frac{15}{16}$ 8. $\frac{11}{15}$ 9. $\frac{9}{14}$
 3. 1. $\frac{5}{6}$ 2. $\frac{5}{7}$ 3. $\frac{1}{4}$ 4. $\frac{3}{5}$ 5. $\frac{3}{10}$

Brain Tuner

1. $\frac{1}{2}$ 2. $\frac{3}{4}$ 3. $\frac{2}{3}$ 4. $\frac{5}{6}$

Page No. 112

1. $\frac{5}{15} + \frac{6}{15} = \frac{11}{15}$
 2. 1. $\frac{9}{13}$ 2. $\frac{13}{14}$

Page No. 113

1. 1. $\frac{4}{12}$ 2. $\frac{9-4}{16} = \frac{5}{16}$
 3. $\frac{3}{9}$ 4. $\frac{7-5}{15} = \frac{2}{15}$
 2. 1. $\frac{1}{5}$ 2. $\frac{4}{12}$ 3. $\frac{3}{9}$ 4. $\frac{5}{9}$ 5. $\frac{2}{7}$
 6. $\frac{5}{17}$ 7. $\frac{6}{19}$ 8. $\frac{7}{15}$ 9. $\frac{5}{16}$

Page No. 114

1. 1. $\frac{1}{2}$ 2. $\frac{2}{3}$ 3. $\frac{3}{4}$ 4. $\frac{4}{5}$ 5. $\frac{6}{7}$
 6. $\frac{8}{9}$ 7. $\frac{5}{6}$ 8. $\frac{9}{10}$ 9. $\frac{1}{3}$ 10. $\frac{4}{7}$
 11. $\frac{5}{9}$ 12. $\frac{7}{13}$
 2. 1. Friend ate $\frac{1}{3}$ of cake more 2. $\frac{2}{5}$
 3. Tom read more by $\frac{1}{6}$ pages 4. elder son

Page No. 115

1. 1. $\frac{7}{11}$ 2. $\frac{4}{7}$ 3. $\frac{7}{12}$ 4. $\frac{2}{14}$

Page No. 117

1. $\frac{6}{9}, \frac{5}{15}, \frac{10}{15}, \frac{7}{8}, \frac{17}{19}, \frac{13}{16}$ 2. $\frac{8}{4}, \frac{13}{5}, \frac{10}{2}, \frac{20}{11}, \frac{42}{7}$
 3. $1\frac{2}{4}, 2\frac{3}{4}, 6\frac{1}{3}, 3\frac{1}{3}, 5\frac{1}{2}$ Brain Tuner $2\frac{3}{6}$

Page No. 118

1. $1\frac{1}{3}$ 2. $1\frac{2}{3}$ 3. $1\frac{3}{7}$ 4. $3\frac{1}{4}$ 5. $1\frac{5}{7}$
6. $2\frac{1}{5}$ 7. $1\frac{5}{9}$ 8. $1\frac{9}{10}$ 9. $4\frac{2}{3}$ 10. $3\frac{3}{5}$
11. $3\frac{1}{2}$ 12. $4\frac{7}{8}$
2. $1\frac{3}{2}$ 2. $\frac{4}{3}$ 3. $\frac{6}{5}$ 4. $\frac{10}{7}$ 5. $\frac{7}{3}$
6. $\frac{13}{4}$ 7. $\frac{50}{7}$ 8. $\frac{11}{4}$ 9. $\frac{23}{5}$ 10. $\frac{21}{4}$
11. $\frac{53}{10}$ 12. $\frac{43}{4}$

Page No. 119

1. $1. \frac{1 \times 4}{3} = \frac{4}{3}$ 2. $\frac{2 \times 3}{7} = \frac{6}{7}$ 3. $\frac{4 \times 3}{16} = \frac{12}{16}$
4. $\frac{2 \times 7}{15} = \frac{14}{15}$ 5. $\frac{2 \times 2}{7} = \frac{4}{7}$ 6. $\frac{3 \times 5}{18} = \frac{15}{18}$
7. $\frac{3 \times 6}{20} = \frac{18}{20}$ 8. $\frac{3 \times 3}{11} = \frac{9}{11}$

Page No. 120

1. $1. \frac{4}{3}$ 2. $\frac{16}{8}$ 3. $\frac{20}{3}$ 4. $\frac{20}{9}$ 5. $\frac{15}{7}$
6. $\frac{45}{5}$ 7. $\frac{21}{8}$ 8. $\frac{40}{5}$ 9. $\frac{160}{9}$
2. $1. 20p$ 2. $10p$ 3. $1p$
3. $1. \text{Rs } 40$ 2. $\text{Rs } 6$ 3. $\text{Rs } 12$

Page No. 121

1. $2. \frac{3}{12} \times 3 = \frac{9}{12}$ 3. $\frac{2}{14} \times 6 = \frac{12}{14}$
4. $\frac{4}{16} \times 2 = \frac{8}{16}$

Page No. 123 MCQ - VII

1. $\frac{3}{7} + \frac{2}{7}$ 2. $\frac{3}{5}$ 3. $\frac{4}{12}$ 4. $\frac{4}{9}$ 5. $\frac{1}{5}$
6. 3 7. $\frac{3}{9}$ 8. $\frac{1}{5}$ 9. $\frac{9}{8}$ 10. $2\frac{4}{7}$

UNIT 11**Page No. 126**

1. $1. 0.3$ 2. 0.7 3. 0.08 4. 0.72
5. 2.9 6. 1.25

2. 1. $\frac{4}{10}$; 0.4 2. $\frac{8}{10}$; 0.8 3. $1\frac{5}{10}$; 1.5 4. $\frac{26}{100}$; 0.26
 5. $\frac{44}{100}$; 0.44

3. 1. zero point five 2. three point six
 3. seventy four point two 4. zero point zero four
 5. seven point one five 6. twenty six point zero four
 4. 1. 0.9 2. 6.7 3. 89.9 4. 0.55
 5. 2.75 6. 21.92

Page No. 127

1. 1. .4 2. 116.86 3. 46.66 4. 98.79
 2. 1. 152.0cm 2. 16.6kg 3. 354.75

Page No. 128

1. 1. .3 2. .23 3. 22.2 4. 36.43
 2. 1. 1.5m 2. 15.25 3. 211.50

UNIT 12

Page No. 130

- 10 5 2 1
 1. 2000 2. 1000 3. 400 4. 200
 5. 100 6. 40 7. 20 8. 10 9. 4

Page No. 132

1. 1. 600 2. 1200 3. 5234 4. 709
 5. 3920 6. 14381
 2. 1. ₹ 4.51 2. ₹ 6.03 3. ₹ 6.03 4. ₹ 13
 5. ₹ 74.32 6. ₹ 17.40
 3. 1. 3, 4, 1, 1, 1 2. 4, 1, 2, 1, 1
 3. 4, 1, 1, 2, 3

Page No. 133

1. 1. 378.77 2. 4615.50 3. 148.60 4. 4108.50
 2. 1. 294.50 2. 90.25 3. 146.40 4. 80.25

Page No. 134

1. 1. 195 2. 411.75 3. 315.25 4. 847.5
 2. 1. 4.5 2. 8.92 3. 7.23 4. 8.92
 3. 1. 1016 2. 1800 3. 105 4. 29

Page No. 136

1. ₹ 230 2. ₹ 60

Page No. 137 MCQ - VIII

1. 100 2. ₹ 13145 3. $5 \times 95 + 80$ 4. ₹ 240
 5. ₹ 62.16 6. 2530p 7. $108 \div 12$ 8. ₹ 200
 9. ₹ 80 10. 1270

Page No. 139

1. 1. 1000 2. 100 3. 10 4. 1000 5. 10
 6. 100 7. 10 8. 1000 9. 100000 10. 1000000
 2. 1. cm 2. m 3. km 4. mm

Page No. 140

1. 1. 7135 2. 6025 3. 2600 4. 9250 5. 5300 6. 3505
 2. 1. 597 2. 701 3. 485 4. 936 5. 210 6. 333
 3. 1. 9856m 2. 2082m 3. 7145m 4. 4301m

Page No. 141

1. 1. 3km 250m 2. 6km145m
 3. 8m 209mm 4. 4m 731mm
 5. 72m 97cm 6. 296m 1dm
 2. 1. 6m 2dm 3cm 2. 8m 2dm 7cm
 3. 7m 4dm 5cm 4. 6km 5hm 4dam 3m
 5. 9km 2hm 5dam 6m 6. 3km 7hm 4dam 2m

Page No. 142

3. 1. 46m 65cm 2. 25m 35cm 3. 40m 4. 9km 12m

Page No. 143

1. 1. 12m 2. 8m 3. 20m 4. 2m

Page No. 145

1. 1. 1000 2. 5400 3. 6350 4. 7000
 5. 7050 6. 10275
 2. 1. 5kg 0g 2. 6kg 25g 3. 9kg 0g 4. 8kg 175g
 5. 2kg 500g 6. 6kg 727g 7. 9kg 5g 8. 4kg 600g
 9. 15kg 475g 10. 18kg 375g

Page No. 146

1. 1. 2574g 2. 9086g 3. 5403g 4. 3015g
 2. 1. 658cg 2. 587cg 3. 895cg 4. 215cg
 3. 1. 4g 7dg 5cg 2. 7kg 4hg 2 dag 6g 3. 4g 6dg 7cg
 4. 3kg 4hg 3 dag 2g 5. 2g 9dg 6cg 6. 9kg 0hg 7dag 5g
 7. 5g 5dg 5cg 8. 6kg 5hg 4dag 3g
 4. 1. 15kg 900g 2. 57kg 500g 3. 21kg
 4 3kg 750g 5. 150g

Page No. 148

1. 1. 1000 2. 2000 3. 10000 4. 12000
 5. 5 6. 13

Page No. 149

1. 2. 500ml, 200ml, 50ml 3. 200ml, 50ml
 4. 1l, 100ml, 50ml 5. 1l, 500ml

2. 1. 3250ml 2. 4500ml 3. 6250ml 4. 5750ml
5. 2816ml 6. 15167ml

Page No. 150

3. 1. 6l 250ml 2. 7l 500ml 3. 8l 750ml 4. 8l 3ml
5. 6l 175ml 6. 3l 50ml
4. 1. 3l 2dl 5cl 0ml 2. 7l 7dl 5cl 0ml
3. 5kl 2hl 5dal 0l 4. 6kl 7hl 5dal 0l
5. 1. 255l 7dl 2. 22l 150ml
3. 461l 500ml 4. 5l 600ml
5. 62l 500ml 6. 6l
7. 11l 8dl 4cl

Page No. 153 MCQ - IX

1. milligram 2. 10 3. 24l 4. 75dm
5. 2kg 651g 6. 152cm 7. 14l 8. 60 bottles
9. 228kg 10. 90cm

UNIT 14

Page No. 154

1. 8:10 8:12 8:16
1. Jyoti's; 2 min. 2. Divya's; 4 min.
2. 1. quarter past twelve 2. half past three
3. quarter to eleven 4. seven o'clock

Page No. 155

3. 1. 6:15 2. 25min.; 5:25 3. 15min. to 1; 12:45
4. 10min. to 8; 7:50
4. 1. 12:25 2. 5:45 3. 3:55 4. 7:35
5. 1. 9:15p.m. 2. 11:00a.m. 3. 10:30p.m. 4. 7:45a.m.

Page No. 156

1. 1. 18:00 2. 00:05 3. 12:00 4. 11:00 5. 02:00
6. 21:45 7. 16:15 8. 23:14 9. 10:20
2. 1. No 2. six hours 3. yes 4. yes

Page No. 157

1. 1. 30 min. 2. 50 min. 3. 50 min. 4. 40 min.
2. 1. 1 hr 25 min. 2. 45 min.

Page No. 158

1. 1. 7:55a.m. 2. 11:35a.m. 3. 8:55p.m.
4. 2 hrs 20 min. 5. 1 hr 20 min.

Page No. 159

1. 1. app 2hrs 2. app 2hrs 30 min. 3. app 1 hr

Page No. 160

2016 2020 2024 2028 2032

Page No. 161

1. 1. 43 days 2. 65 days 3. 15 days 4. 16 days
5. 12 months 6. 365 days

Page No. 162

1. 1. 60 years 2. 60 years 3. 40 years 4. 30 years

Page No. 163

1. 1. 214 min. 2. 315 min. 3. 385 min. 4. 512 min.
5. 465 min. 6. 130 min.
2. 1. 580 sec. 2. 377 sec. 3. 516 sec. 4. 479 sec. 5. 202 sec.
6. 130 sec. 7. 15325 sec. 8. 26550 sec. 9. 33750 sec.
3. 1. 46 2. 59 3. 33 4. 55
5. 65 6. 82

Page No. 164

1. 1. 2 weeks 6 days 2. 5 weeks 6 days
3. 9 weeks 1 day 4. 5 weeks 4 days
5. 7 weeks 3 days
2. 1. 7 hrs 30 min. 2. 11 hr 20 min.
3. 14 hrs 30 min. 4. 11 hrs 50 min.
5. 16 hrs 30 min.
3. 1. 4 min. 10 sec. 2. 8 min. 3. 14 min. 30 sec.
4. 6 min. 15 sec. 5. 10 min. 40 sec.
4. 1. 26 days 2. 62 days
3. 3 weeks 1 day 2 hrs 4. 6 hrs 40 min.

Page No. 165 Worksheet

1. 40 min. 2. 10 min. 3. 1 hr 5 min. 4. 2 hrs 50 min.
5. 1 hr 30 min. 6. 2 hrs 10 min. 7. 3 hrs 8. 25 min.

Page No. 166 MCQ - X

1. a.m. 2. 9:50 3. 10 a.m. 4. 6:45
5. 2 hrs 20 min. 6. 7:20 a.m. 7. 1 hr 20 min. 8. 30 min. past 12
9. 7:20 p.m. 10. 8 hrs 15 min.

UNIT 15**Page No. 169**

1. 1. 5 cm 2. 7.5 cm 3. 6 cm 4. 4 cm

Page No. 170

1. 2. ✓ 3. ✓
2. 1. $\angle ABC$ 2. $\angle XYZ$ 3. $\angle PQR$ 4. $\angle UVW$
3. 1. $\angle ABC$ or $\angle CBA$; B; AB and BC
2. $\angle PQR$ or $\angle RQP$; Q; PQ and QR
3. $\angle XYZ$ or $\angle ZYX$; Y; XY and YZ
4. $\angle EFG$ or $\angle GFE$; F; EF and FG
4. 1. $\angle ABD$ or $\angle DBA$; $\angle DBC$ or $\angle CBD$; $\angle ABC$ or $\angle CBA$
2. $\angle XOY$ or $\angle YOX$; $\angle XOZ$ or $\angle ZOY$; $\angle YOZ$ or $\angle ZOY$

Page No. 173

1. 1. ✓ 3. ✓ 4. ✓

Page No. 174

2. 1. ✓ 4. ✓ 5. ✓
 3. 2. ✓ 4. ✓
 4. 1. 2; 2; 2; 2; Square 2. 2; 3; 2; 3; Rectangle
 3. 3; 3; 3; 3; Square 4. 3.5; 2.5; 3.5; 2.5; Rectangle
 5. 1. same point 2. simple closed
 3. pentagon 4. opposite sides
 5. seven 6. square

Page No. 177

1. 1. centre 2. diameter 3. longest 4. same
 5. twice the length

Page No. 178

2. O; OE; CD; AB
 3. 1. OA 2. OZ 3. NM 4. EF
 4. 1. 2; 4 2. 1.25; 2.5 3. 1; 2 4. 1.5; 3
 6. AF; AE; AD; AC; FD; FC; EB; EC; CD

Page No. 179 MCQ - XI

1. one 2. 1 3. 2 4. heptagon
 5. circle 6. equilateral Δ 7. a closed curve
 8. diameter 9. 7cm 10. 5cm

UNIT 16**Page No. 180**

- | | | | | |
|------------------|--------|-----------------|------|----------|
| Cube | Sphere | Cuboid | Cone | Cylinder |
| Cube 6, 8, 12 | | Cuboid 6, 8, 12 | | |
| Sphere 1, 0, 0 | | Cone 2, 1, 1 | | |
| Cylinder 3, 0, 2 | | | | |

Page No. 181

1. 1. prism 2. 5 3. 6 4. 9
 2. 3. ✓

Page No. 182

1. 1. Yes 2. Yes 3. No 4. Yes

Page No. 184

1. 1. Cube 2. Cuboid 3. Cuboid

Page No. 185

1. 1. 
2. 2. ✓

UNIT 17

Page No. 186

1. $3 + 2 + 2 + 1 + 3 = 11\text{km}$ 2. $4+4+4+4=16$ 3. $3+3+4=10$

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4. 1. 14cm 2. 12cm 3. 12 cm
5. 1. 14cm 2. 15cm 3. 198cm 4. 322m 5. 134m 6. 20km
6. Field B 7. 6km

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1. 1. 10 sq.cm. 2. 12 sq.cm. 3. 18 sq.cm.
2. 1. 9 sq.cm. 2. 10 sq.cm. 3. 11 sq.cm.

UNIT 18

Page No. 190

1. 1. 24 2. 13 3. 108 4. 592 5. 417

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2. 1. 50 2. 95 3. 70 4. 65 5. 60 6. 340 7. Hindi 8. English

Page No. 192

3. 1. Mango 2. Orange 3. 4 4. 5
4. Garden 1 150 Garden 2 175 Garden 3 100 Garden 4 225 Garden 5 75
1. garden 3 2. garden 4 3. 175 4. 150 5. garden 5 6. 725

Page No. 194

1. 1. cat 2. 6,4,11,7 3. 5 4. 2 5. 10
2. 1. 2002 2. 450 3. 300 4. 2005 and 2006 5. 2007 and 800

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3. 1. cartoon 2. 2 3. films
4. 1. Computer Sales 2. Computer sold
3. Months 4. June 5. May

Page No. 196 Model Test Paper

1. 1. Ones, Thousands, Lakhs, Crores
2. Ones, Thousands, Millions 3. $\frac{1}{2}$ 4. tenths
2. $9430 - 3049 = 6381$ 3. $48298; 70000 - 21000 = 49000$
4. $368; 196 + 172 = 368$ 5. 3032
6. 1. 2,3,4,6,9,12,18 2. 3,5,9,15 3. 2,13,26
7. 1. 894.50 2. 765.05 3. 340.56
8. 1. 77; odd 2. 544; even 9. 315, 477, 801, 2169, 8235
10. 1. 247104 2. 1154979
11. 1. V 2. IX 3. XVIII 4. XXI 5. XXIX
6. XXXVI 7. XLIII 8. L 9. C 10. D
12. 1. 312, 15 2. 1378, 15 13. 113 days 14. 20397
15. 15 sq.cm. 16. XYZ or ZYX; Y; XY and YZ
17. 9225m 18. Rs 500
19. 1. 40 2. Friday 3. Monday and Thursday 4. $340\frac{2}{3}$
20. 1. 750days 2. 4kg 5g 3. Rs 2911 4. Pat ate more by $\frac{2}{3}$