

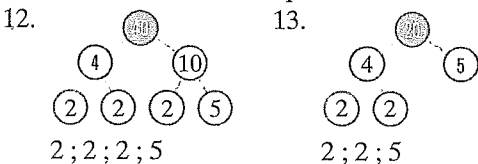
10. 52, 64, 76, 84 11. 72, 80, 96
 12. 10; 5; 1, 2, 5, 10 13. 15; 5; 1, 3, 5, 15
 14. 18; 9; 6; 1, 2, 3, 6, 9, 18
 15. 24; 12; 8; 6; 1, 2, 3, 4, 6, 8, 12, 24
 16. 20; 10; 5; 1, 2, 4, 5, 10, 20
 17. 27; 9; 1, 3, 9, 27
 18. $9 = 1 \times 9; = 3 \times 3$
 $16 = 1 \times 16; = 2 \times 8; = 4 \times 4$
 $17 = 1 \times 17$
 $28 = 1 \times 28; = 2 \times 14; = 4 \times 7$
 $30 = 1 \times 30; = 2 \times 15; = 3 \times 10; = 5 \times 6$
 9: 1, 3, 9
 16: 1, 2, 4, 8, 16
 17: 1, 17
 28: 1, 2, 4, 7, 14, 28
 30: 1, 2, 3, 5, 6, 10, 15, 30
 19. ✗; factors 20. ✓
 21. ✗; 9 22. ✗; 12, 24, 36, and 48

4 Prime Numbers and Composite Numbers

1. Composite; 20
 Prime; 5
 1
 2. 1, 2, 4, 8, 16; composite
 3. 1, 7; prime
 4. 1, 2, 3, 4, 6, 12; composite
 5. 1, 2, 3, 6, 9, 18; composite

✗	2	3	4	5	6	7	8	9	10
11	12	13	14	15	16	17	18	19	20
21	22	23	24	25	26	27	28	29	30
31	32	33	34	35	36	37	38	39	40
41	42	43	44	45	46	47	48	49	50
51	52	53	54	55	56	57	58	59	60
61	62	63	64	65	66	67	68	69	70
71	72	73	74	75	76	77	78	79	80
81	82	83	84	85	86	87	88	89	90
91	92	93	94	95	96	97	98	99	100

7. There are 25 prime numbers. They are 2, 3, 5, 7, 11, 13, 17, 19, 23, 29, 31, 37, 41, 43, 47, 53, 59, 61, 67, 71, 73, 79, 83, 89, and 97.
 8. There are 36 composite numbers. They are 4, 6, 8, 9, 10, 12, 14, 15, 16, 18, 20, 21, 22, 24, 25, 26, 27, 28, 30, 32, 33, 34, 35, 36, 38, 39, 40, 42, 44, 45, 46, 48, 49, 50, 51, and 52.
 9. 2 10. composite 11. 2



14. 15.
 2; 2; 3; 3 2; 2; 5; 5
 16. 17.
 2; 2; 2; 3 2; 3; 3; 3
 18.
 19. 2; 19 20. 2; 5; 5 21. 2; 2; 7
 22. 3; 3; 5 23. 2; 2; 13 24. 2; 2; 3; 5
 25. 2 x 5 26. 3 x 3 x 3 x 3
 27. 2 x 2 x 2 x 7 28. 2 x 3 x 3 x 5
 29. 7 x 13 30. 2 x 7
 31. Yes 32. No

5 Addition and Subtraction of Whole Numbers

1. Mrs. Smith's class: 42 645
 Mrs. Winter's class: 42 604
 Mrs. Gault's class: 46 003
 Ms. LeBlanc's class: 34 455
 Ms. Dottori's class: 43 425
 Ms. Wood's class: 35 717
 Mrs. McLellan's class: 36 235
 Ms. Carter's class: 58 495
 Mrs. Goldberger's class: 17 127
 2. \$584.95 3. Ms. Carter's class
 4. 5 classes
 5. 128 000; 128 528;

Estimate	Exact
46000	46382
+ 82000	+ 82146
128000	128528

 6. 36 000; 35 764;

Estimate	Exact
82000	82146
- 46000	- 46382
36000	35764

 7. 90 000; 89 760;

Estimate	Exact
47000	46583
+ 43000	+ 43177
90000	89760

 8. 4000; 3406;

Estimate	Exact
47000	46583
- 43000	- 43177
4000	3406

 9. 865 - 254; 611 10. 338 + 182; 520

Name

Date



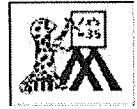
PRIME FACTOR TREES SHEET 1 ANSWERS

Please note – the factor trees can be completed in different ways, with the prime factors in a different order.

<p>1)</p> <pre>graph TD; 15[15] --- 3((3)); 15 --- 5((5));</pre> <p>$15 = 3 \times 5$</p>	<p>2)</p> <pre>graph TD; 14[14] --- 2((2)); 14 --- 7((7));</pre> <p>$14 = 2 \times 7$</p>	<p>3)</p> <pre>graph TD; 33[33] --- 3((3)); 33 --- 11((11));</pre> <p>$33 = 3 \times 11$</p>
<p>4)</p> <pre>graph TD; 12[12] --- 2((2)); 12 --- 6[6]; 6 --- 2((2)); 6 --- 3((3));</pre> <p>$12 = 2 \times 2 \times 3$</p>	<p>5)</p> <pre>graph TD; 30[30] --- 2((2)); 30 --- 15[15]; 15 --- 3((3)); 15 --- 5((5));</pre> <p>$30 = 2 \times 3 \times 5$</p>	<p>6)</p> <pre>graph TD; 27[27] --- 3((3)); 27 --- 9[9]; 9 --- 3((3)); 9 --- 3((3));</pre> <p>$27 = 3 \times 3 \times 3$</p>
<p>7)</p> <pre>graph TD; 20[20] --- 2((2)); 20 --- 10[10]; 10 --- 2((2)); 10 --- 5((5));</pre> <p>$20 = 2 \times 2 \times 5$</p>	<p>8)</p> <pre>graph TD; 28[28] --- 2((2)); 28 --- 14[14]; 14 --- 2((2)); 14 --- 7((7));</pre> <p>$28 = 2 \times 2 \times 7$</p>	<p>9)</p> <pre>graph TD; 45[45] --- 3((3)); 45 --- 15[15]; 15 --- 3((3)); 15 --- 5((5));</pre> <p>$45 = 3 \times 3 \times 5$</p>

Name

Date



FACTOR TREE WORKSHEET 6 ANSWERS

Please note – the factor trees can be completed in different ways, with the prime factors in a different order.

<p>1)</p> <pre>graph TD; 68[68] --- 2((2)); 68 --- 34[34]; 34 --- 2((2)); 34 --- 17((17));</pre> <p>$68 = 2 \times 2 \times 17 = 2^2 \times 17$</p>	<p>2)</p> <pre>graph TD; 104[104] --- 4[4]; 104 --- 26[26]; 4 --- 2((2)); 4 --- 2((2)); 26 --- 2((2)); 26 --- 13((13));</pre> <p>$104 = 2 \times 2 \times 2 \times 13 = 2^3 \times 13$</p>
<p>3)</p> <pre>graph TD; 78[78] --- 2((2)); 78 --- 39[39]; 39 --- 3((3)); 39 --- 13((13));</pre> <p>$78 = 2 \times 3 \times 13$</p>	<p>4)</p> <pre>graph TD; 225[225] --- 9[9]; 225 --- 25[25]; 9 --- 3((3)); 9 --- 3((3)); 25 --- 5((5)); 25 --- 5((5));</pre> <p>$225 = 3 \times 3 \times 5 \times 5 = 3^2 \times 5^2$</p>