

Practice 3-2

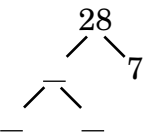
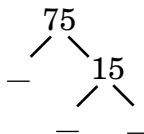
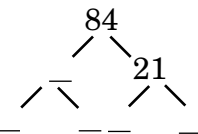
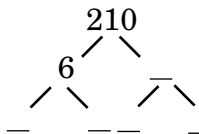
Prime Numbers and Prime Factorization

1. Make a list of all the prime numbers from 50 through 75. _____

Tell whether each number is prime or composite.

- | | | | |
|------------------|-----------------|-----------------|-----------------|
| 2. 53
_____ | 3. 86
_____ | 4. 95
_____ | 5. 17
_____ |
| 6. 24
_____ | 7. 27
_____ | 8. 31
_____ | 9. 51
_____ |
| 10. 103
_____ | 11. 47
_____ | 12. 93
_____ | 13. 56
_____ |

Complete each factor tree.

- | | | | |
|---|---|---|---|
| 14.  | 15.  | 16.  | 17.  |
|---|---|---|---|

Find the prime factorization of each number.

- | | |
|------------------|------------------|
| 18. 58
_____ | 19. 72
_____ |
| 20. 40
_____ | 21. 30
_____ |
| 22. 120
_____ | 23. 100
_____ |
| 24. 144
_____ | 25. 310
_____ |

Find the number with the given prime factorization.

- | | |
|---|---|
| 26. $2 \times 2 \times 5 \times 7 \times 11$
_____ | 27. $2 \times 3 \times 5 \times 7 \times 11$
_____ |
| 28. $2 \times 2 \times 13 \times 17$
_____ | 29. $7 \times 11 \times 13 \times 17$
_____ |
30. There are 32 students in a class. How many ways can the class be divided into groups with equal numbers of students? What are they?
