

Lesson 2 Homework Practice

Percent and Estimation

Estimate.

1. 39% of 80

$$\frac{2}{5} \cdot 80 = 32$$

2. 31% of 40

$$\frac{3}{10} \cdot 40 = 12$$

3. 28% of 110

$$\frac{3}{10} \cdot 110 = 33$$

4. 74% of 160

$$\frac{3}{4} \cdot 160 = 120$$

5. 87% of 19

$$\frac{9}{10} \cdot 20 = 18$$

6. 91% of 82

$$\frac{9}{10} \cdot 80 = 72$$

7. 34% of 59

$$\frac{1}{3} \cdot 60 = 20$$

8. 66% of 148

$$\frac{2}{3} \cdot 150 = 100$$

9. 9% of 71

$$\frac{1}{10} \cdot 70 = 7$$

10. 73% of 241

$$\frac{3}{4} \cdot 240 = 180$$

11. 126% of 80

$$\frac{5}{4} \cdot 80 = 100$$

12. 234% of 145

$$2\frac{1}{3} \cdot 150 = 350$$

13. $\frac{1}{3}$ % of 307

$$\frac{1}{300} \cdot 300 = 1$$

14. $\frac{1}{4}$ % of 798

$$\frac{1}{400} \cdot 800 = 2$$

15. 1.1% of 62

$$\frac{1}{100} \cdot 60 = 0.6$$

16. 4.1% of 101

$$\frac{4}{100} \cdot 100 = 4$$

17. 67% of 11.9

$$\frac{2}{3} \cdot 12 = 8$$

18. 31% of 68.7

$$\frac{3}{10} \cdot 70 = 21$$

19. 9.8% of 359

$$\frac{1}{10} \cdot 360 = 36$$

20. 97.9% of 39

$$1 \cdot 40 = 40$$

21. 52% of 57.9

$$\frac{1}{2} \cdot 60 = 30$$

22. 33% of 15.3

$$\frac{1}{3} \cdot 15 = 5$$

23. 21.1% of 151

$$\frac{1}{5} \cdot 150 = 30$$

24. 2.9% of 61.2

$$\frac{3}{100} \cdot 60 \approx 2$$

25. **ELEVATION** The highest point in Arizona is Humphreys Peak, with an elevation of 12,633 feet. Estimate the elevation of the highest point in Florida, located in Walton County, if it is about 2.7% of the highest point in Arizona. **Sample answer: 1% of 12,633 = 0.01 · 12,633 ≈ 125; 2.7 ≈ 3, so 3 · 125 = 375; The elevation of the highest point in Florida is about 375 feet.**

26. **BRAIN** The brain mass of a newborn baby is about 13% of the body mass of the newborn. If a newborn has a body mass of 2,900 grams, about how much is the mass of the brain? **Sample answer: 2,900 ≈ 3,000; 10% of 3,000 = 0.1 · 3,000 = 300; 1% of 3,000 = 0.01 · 3,000 = 30; 3 · 30 = 90; 300 + 90 = 390; The brain has a mass of about 390 grams.**

27. **STOCKS** The value of a share of stock in an electronics company increased by $\frac{2}{3}$ % during one week. If the value of a share of stock was \$141 at the beginning of the week, estimate the increase in value of a share of stock at the end of the week. **Sample answer: 141 ≈ 140; 1% of 140 = 0.01 · 140 = 1.4; 2 · 1.4 = 2.8; 2.8 ÷ 3 ≈ 0.9; The increase of a share of stock is about \$0.90.**