

1. Which of these are equivalent to 3.8×10^3 ? Choose all that apply.

- A. $3.8 \times 10 \times 3$
- B. $3.8 \times 10 \times 10 \times 10$
- C. 380
- D. 3,800

2. Knowing that $4.8 \times 10^2 = 480$, what is 4.8×10^4 ?

- A. 480
- B. 4,800
- C. 48,000
- D. 480,000

estimate

3. Ben earns \$2.75 for each crate of berries he picks. About how much would Ben earn if he picks 4 crates of berries?

about \$12

$$2.75 \times 4$$
$$\approx 3 \times 4 = 12$$

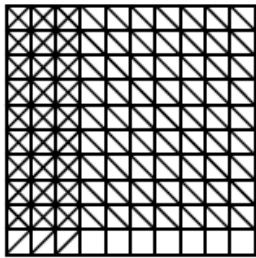
4. According to his step-counter, Jerry walked 4.5×10^4 steps during the past week. How many steps did Jerry walk last week?

- A. 45 steps
- B. 450 steps
- C. 4,500 steps
- D. 45,000 steps

5. Which sum is equivalent to 3.7×0.6 ?

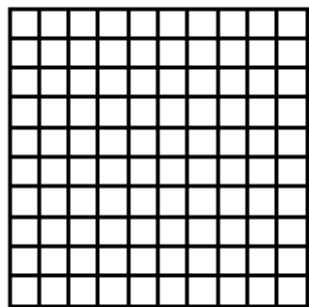
- A. $180 + 42$
- B. $18 + 4.2$
- C. $1.8 + 4.2$
- D. $1.8 + 0.42$

6. Which equation is represented by the decimal grid?



- A. $0.03 \times 0.09 = 0.27$
- B. $3 \times 0.9 = 2.7$
- C. $0.3 \times 0.9 = 2.7$
- D. $0.3 \times 0.9 = 0.27$**

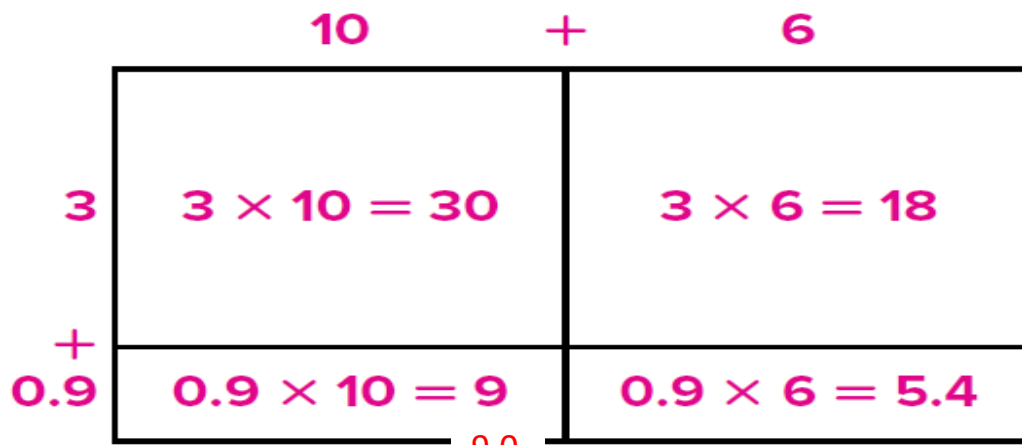
7. A sandwich shop uses 0.12 pound of bacon on each sandwich. How much tomato will the shop need to make 7 sandwiches? Use the decimal grid to help you solve.



$0.12 \times 7 = 0.84$

$\times \quad 7$

8. A dog's rectangular play area is 3.9 meters wide and 16 meters long. What is the area of the play area? Use the area model to solve.



9.0

62.4 square meters

9. Bruce knows that $5.8 \times 17 = 98.6$. Use place-value patterns to decide whether each equation is True or False.

	True	False
$5.8 \times 1.7 = 9.86$	✓	
$58 \times 17 = 98.6$		✓
$58 \times 0.17 = 9.86$	✓	
$58 \times 1.7 = 9,860$		✓

10. Jaquan knows that $47 \times 0.36 = 16.92$. What is 4.7×3.6 ?

A. 1.692

B. 16.92

C. 169.2

D. 1,692

11. A rectangular photograph measures 9.2 inches long by 3.8 inches wide. Which is the best estimate for the area of the photograph?

A. about 13 square inches

B. about 27 square inches

C. about 36 square inches

D. about 40 square inches

$$9 \times 4 = 36$$

12. What is the product? Use place-value patterns to solve the equations.

$$58 \times 71 = 4,118$$

$$58 \times 7.1 = \underline{411.8}$$

$$0.58 \times 71 = \underline{41.18}$$

13. Theodore buys mangoes for \$4.08 per pound. About how much money does Theodore need if he buys 3.7 pounds of mangoes? Explain which estimation strategy you used.

$$4.08 \times 3.7 =$$

$$\approx 4 \times 4 = 16$$

14. A baker uses 0.9 pounds of blueberries to make a pie. How many pounds of blueberries does the baker need to make 36 pies? Explain the strategy you used to solve.

32.4 pounds; : I used partial products:

$$0.9 \times 30 = 27 \text{ and } 0.9 \times 6 = 5.4; \text{ then } 27 + 5.4 = 32.4$$

15. Deirdre fills 43 bubble containers with bubble mix. Each bubble container holds 2.7 ounces. How many ounces of bubble mix does Deirdre use? Explain the strategy you used to solve.

116.1 ounces; : I used an area model and

partial products: $40 \times 2 = 80$, $40 \times 0.7 = 28$, $3 \times 2 = 6$, and $3 \times 0.7 = 2.1$; then $80 + 28 + 6 + 2.1 = 116.1$