



Solve each problem. Answer as a decimal (if necessary).

Answers

1) 4×10^9 is _____ $\times$ the value of 3×10^6

1. _____

2) 5×10^6 is _____ $\times$ the value of 6×10^5

2. _____

3) 3×10^3 is _____ $\times$ the value of 7×10^6

3. _____

4) 4×10^4 is _____ $\times$ the value of 3×10^6

4. _____

5) 9×10^3 is _____ $\times$ the value of 2×10^4

5. _____

6) 9×10^9 is _____ $\times$ the value of 3×10^4

6. _____

7) 8×10^9 is _____ $\times$ the value of 9×10^4

7. _____

8) 9×10^6 is _____ $\times$ the value of 4×10^2

8. _____

9) 5×10^4 is _____ $\times$ the value of 2×10^8

9. _____



Solve each problem. Answer as a decimal (if necessary).

Answers1) 4×10^9 is _____ $\times$ the value of 3×10^6

$$\frac{4 \times 10^9}{3 \times 10^6} = \frac{4}{3} \times \frac{10^9}{10^6} = \frac{4}{3} \times 10^3 = 1.333 \times 10^3$$

1. **1,333**2) 5×10^6 is _____ $\times$ the value of 6×10^5

$$\frac{5 \times 10^6}{6 \times 10^5} = \frac{5}{6} \times \frac{10^6}{10^5} = \frac{5}{6} \times 10^1 = 0.833 \times 10^1$$

2. **8.33**3) 3×10^3 is _____ $\times$ the value of 7×10^6

$$\frac{3 \times 10^3}{7 \times 10^6} = \frac{3}{7} \times \frac{10^3}{10^6} = \frac{3}{7} \times 10^{-3} = 0.429 \times 10^{-3}$$

3. **0.000429**4) 4×10^4 is _____ $\times$ the value of 3×10^6

$$\frac{4 \times 10^4}{3 \times 10^6} = \frac{4}{3} \times \frac{10^4}{10^6} = \frac{4}{3} \times 10^{-2} = 1.333 \times 10^{-2}$$

4. **0.01333**5) 9×10^3 is _____ $\times$ the value of 2×10^4

$$\frac{9 \times 10^3}{2 \times 10^4} = \frac{9}{2} \times \frac{10^3}{10^4} = \frac{9}{2} \times 10^{-1} = 4.5 \times 10^{-1}$$

5. **0.45**6) 9×10^9 is _____ $\times$ the value of 3×10^4

$$\frac{9 \times 10^9}{3 \times 10^4} = \frac{9}{3} \times \frac{10^9}{10^4} = \frac{3}{1} \times 10^5 = 3 \times 10^5$$

6. **300,000**7) 8×10^9 is _____ $\times$ the value of 9×10^4

$$\frac{8 \times 10^9}{9 \times 10^4} = \frac{8}{9} \times \frac{10^9}{10^4} = \frac{8}{9} \times 10^5 = 0.889 \times 10^5$$

7. **88,900**8) 9×10^6 is _____ $\times$ the value of 4×10^2

$$\frac{9 \times 10^6}{4 \times 10^2} = \frac{9}{4} \times \frac{10^6}{10^2} = \frac{9}{4} \times 10^4 = 2.25 \times 10^4$$

8. **22,500**9) 5×10^4 is _____ $\times$ the value of 2×10^8

$$\frac{5 \times 10^4}{2 \times 10^8} = \frac{5}{2} \times \frac{10^4}{10^8} = \frac{5}{2} \times 10^{-4} = 2.5 \times 10^{-4}$$

9. **0.00025**