

Scientific notation

Write the number in scientific notation.

1. 800,000 = 8×10^5

2. 0.00071 = 7.1×10^{-4}

3. 8,000 = 8×10^3

4. 920,000 = 9.2×10^5

5. 0.00077 = 7.7×10^{-4}

6. 1,900 = 1.9×10^3

7. 100,000 = 1×10^5

8. 0.0065 = 6.5×10^{-3}

9. 300,000 = 3×10^5

10. 0.0008 = 8×10^{-4}

11. 500,000 = 5×10^5

12. 79,000 = 7.9×10^4

Standard form

Write the number in standard form.

1. $6 \times 10^{-2} =$ 0.06

2. $8.8 \times 10^{-4} =$ 0.00088

3. $5.2 \times 10^{-4} =$ 0.00052

4. $9.4 \times 10^{-2} =$ 0.094

5. $2 \times 10^5 =$ 200,000

6. $2.2 \times 10^5 =$ 220,000

7. $3 \times 10^3 =$ 3,000

8. $2.6 \times 10^4 =$ 26,000

9. $5.9 \times 10^5 =$ 590,000

10. $4.6 \times 10^{-3} =$ 0.0046

11. $2 \times 10^3 =$ 2,000

12. $4 \times 10^5 =$ 400,000

Multiply

Multiply. Write the product in scientific notation.

1. $(2 \times 10^1) \times (7 \times 10^1) = \underline{1.4 \times 10^3}$

2. $(4 \times 10^2) \times (8 \times 10^3) = \underline{3.2 \times 10^6}$

3. $(6 \times 10^4) \times (6 \times 10^1) = \underline{3.6 \times 10^6}$

4. $(2 \times 10^1) \times (8 \times 10^{-4}) = \underline{1.6 \times 10^{-2}}$

5. $(8 \times 10^{-4}) \times (4 \times 10^1) = \underline{3.2 \times 10^{-2}}$

6. $(9 \times 10^{-4}) \times (2 \times 10^{-4}) = \underline{1.8 \times 10^{-7}}$

7. $(8 \times 10^{-4}) \times (3 \times 10^{-2}) = \underline{2.4 \times 10^{-5}}$

8. $(3 \times 10^1) \times (7 \times 10^{-1}) = \underline{2.1 \times 10^1}$

9. $(9 \times 10^{-3}) \times (4 \times 10^1) = \underline{3.6 \times 10^{-1}}$

10. $(3 \times 10^4) \times (2 \times 10^{-1}) = \underline{6 \times 10^3}$

11. $(3 \times 10^{-2}) \times (7 \times 10^2) = \underline{2.1 \times 10^1}$

12. $(6 \times 10^3) \times (6 \times 10^1) = \underline{3.6 \times 10^5}$

Divide

Divide. Write the quotient in scientific notation.

1. $(2 \times 10^{-2}) \div (8 \times 10^{-1}) = \underline{2.5 \times 10^{-2}}$

2. $(5 \times 10^3) \div (2 \times 10^4) = \underline{2.5 \times 10^{-1}}$

3. $(6 \times 10^{-1}) \div (3 \times 10^{-4}) = \underline{2 \times 10^3}$

4. $(2 \times 10^2) \div (5 \times 10^{-4}) = \underline{4 \times 10^5}$

5. $(6 \times 10^{-4}) \div (5 \times 10^4) = \underline{1.2 \times 10^{-8}}$

6. $(8 \times 10^{-3}) \div (2 \times 10^1) = \underline{4 \times 10^{-4}}$

7. $(3 \times 10^{-2}) \div (3 \times 10^{-1}) = \underline{1 \times 10^{-1}}$

8. $(6 \times 10^{-4}) \div (4 \times 10^3) = \underline{1.5 \times 10^{-7}}$

9. $(6 \times 10^{-4}) \div (8 \times 10^3) = \underline{7.5 \times 10^{-8}}$

10. $(7 \times 10^{-4}) \div (2 \times 10^{-2}) = \underline{3.5 \times 10^{-2}}$

11. $(9 \times 10^{-3}) \div (2 \times 10^4) = \underline{4.5 \times 10^{-7}}$

12. $(2 \times 10^{-3}) \div (8 \times 10^{-2}) = \underline{2.5 \times 10^{-2}}$