calculatoratoz.com

unitsconverters.com

Oblique Prism Formulas

Calculators! Examples! Conversions!

Bookmark **calculatoratoz.com**, **unitsconverters.com**

Widest Coverage of Calculators and Growing - **30,000+ Calculators!**
Calculate With a Different Unit for Each Variable - **In built Unit Conversion!**
Widest Collection of Measurements and Units - **250+ Measurements!**

Feel free to SHARE this document with your friends!

Please leave your feedback here...

List of 10 Oblique Prism Formulas

Oblique Prism

Angle of Slope of Oblique Prism

1) Angle of Slope of Oblique Prism

Open Calculator

fx $$\angle_{\text{Slope}} = a\sin\left(\frac{\text{h}}{\text{l}_{\text{e(Lateral)}}}\right)$$

ex $$30^\circ = a\sin\left(\frac{5\text{m}}{10\text{m}}\right)$$

2) Angle of Slope of Oblique Prism given Volume

Open Calculator

fx $$\angle_{\text{Slope}} = a\sin\left(\frac{\frac{\text{V}}{\text{A}_{\text{Base}}}}{\text{l}_{\text{e(Lateral)}}}\right)$$

ex $$30^\circ = a\sin\left(\frac{\frac{100\text{m}^3}{20\text{m}^2}}{10\text{m}}\right)$$

Base Area of Oblique Prism

3) Base Area of Oblique Prism given Lateral Edge Length

Open Calculator

fx $$A_{Base} = \frac{V}{l_{e(Lateral)} \cdot \sin(\angle_{Slope})}$$

ex $$20\text{m}^2 = \frac{100\text{m}^3}{10\text{m} \cdot \sin(30^\circ)}$$

4) Base Area of Oblique Prism given Volume

Open Calculator

fx $$A_{Base} = \frac{V}{h}$$

ex $$20\text{m}^2 = \frac{100\text{m}^3}{5\text{m}}$$

Height of Oblique Prism

5) Height of Oblique Prism given Lateral Edge Length

Open Calculator

fx $$h = l_{e(Lateral)} \cdot \sin(\angle_{Slope})$$

ex $$5\text{m} = 10\text{m} \cdot \sin(30^\circ)$$

6) Height of Oblique Prism given Volume

Open Calculator

fx $$h = \frac{V}{A_{Base}}$$

ex $$5m = \frac{100m^3}{20m^2}$$

Lateral Edge Length of Oblique Prism

7) Lateral Edge Length of Oblique Prism

Open Calculator

fx $$l_{e(Lateral)} = \frac{h}{\sin(\angle_{Slope})}$$

ex $$10m = \frac{5m}{\sin(30^\circ)}$$

8) Lateral Edge Length of Oblique Prism given Volume

Open Calculator

fx $$l_{e(Lateral)} = \frac{\frac{V}{A_{Base}}}{\sin(\angle_{Slope})}$$

ex $$10m = \frac{\frac{100m^3}{20m^2}}{\sin(30^\circ)}$$

Volume of Oblique Prism

9) Volume of Oblique Prism

fx $V = A_{Base} \cdot h$

Open Calculator

ex $100\text{m}^3 = 20\text{m}^2 \cdot 5\text{m}$

10) Volume of Oblique Prism given Lateral Edge Length

fx $V = A_{Base} \cdot l_{e(Lateral)} \cdot \sin(\angle_{Slope})$

Open Calculator

ex $100\text{m}^3 = 20\text{m}^2 \cdot 10\text{m} \cdot \sin(30^\circ)$

Variables Used

- $\angle_{Slope}$ Angle of Slope of Oblique Prism *(Degree)*
- A_{Base} Base Area of Oblique Prism *(Square Meter)*
- h Height of Oblique Prism *(Meter)*
- $l_{e(Lateral)}$ Lateral Edge Length of Oblique Prism *(Meter)*
- V Volume of Oblique Prism *(Cubic Meter)*

Constants, Functions, Measurements used

- Function: **asin**, asin(Number)
  Inverse trigonometric sine function
- Function: **sin**, sin(Angle)
  Trigonometric sine function
- Measurement: **Length** in Meter (m)
  Length Unit Conversion
- Measurement: **Volume** in Cubic Meter (m^3)
  Volume Unit Conversion
- Measurement: **Area** in Square Meter (m^2)
  Area Unit Conversion
- Measurement: **Angle** in Degree (°)
  Angle Unit Conversion

Check other formula lists

- Anticube Formulas
- Antiprism Formulas
- Barrel Formulas
- Bent Cuboid Formulas
- Bicone Formulas
- Capsule Formulas
- Circular Hyperboloid Formulas
- Cuboctahedron Formulas
- Cut Cylinder Formulas
- Cut Cylindrical Shell Formulas
- Cylinder Formulas
- Cylindrical Shell Formulas
- Diagonally Halved Cylinder Formulas
- Disphenoid Formulas
- Double Calotte Formulas
- Double Point Formulas
- Ellipsoid Formulas
- Elliptic Cylinder Formulas
- Elongated Dodecahedron Formulas
- Flat End Cylinder Formulas
- Frustum of Cone Formulas
- Great Dodecahedron Formulas
- Great Icosahedron Formulas
- Great Stellated Dodecahedron Formulas
- Half Cylinder Formulas
- Half Tetrahedron Formulas
- Hemisphere Formulas
- Hollow Cuboid Formulas
- Hollow Cylinder Formulas
- Hollow Frustum Formulas
- Hollow Hemisphere Formulas
- Hollow Pyramid Formulas
- Hollow Sphere Formulas
- Ingot Formulas
- Obelisk Formulas
- Oblique Cylinder Formulas
- Oblique Prism Formulas
- Obtuse Edged Cuboid Formulas
- Oloid Formulas
- Paraboloid Formulas
- Parallelepiped Formulas
- Ramp Formulas
- Regular Bipyramid Formulas
- Rhombohedron Formulas
- Right Wedge Formulas
- Semi Ellipsoid Formulas
- Sharp Bent Cylinder Formulas
- Skewed Three Edged Prism Formulas

- Small Stellated Dodecahedron Formulas
- Solid of Revolution Formulas
- Sphere Formulas
- Spherical Cap Formulas
- Spherical Corner Formulas
- Spherical Ring Formulas
- Spherical Sector Formulas
- Spherical Segment Formulas
- Spherical Wedge Formulas
- Square Pillar Formulas
- Star Pyramid Formulas
- Stellated Octahedron Formulas
- Toroid Formulas
- Torus Formulas
- Trirectangular Tetrahedron Formulas
- Truncated Rhombohedron Formulas

Feel free to SHARE this document with your friends!

PDF Available in

English Spanish French German Russian Italian Portuguese Polish Dutch

1/23/2024 | 5:14:04 AM UTC

Please leave your feedback here...