

Math Virtual Learning

Geometry/Honors Geometry

May 1, 2020



Geometry/Honors Geometry Lesson: May 1, 2020

Objective/Learning Target: Find the volume of cones



Bell Ringer: Find the volume of the cylinder.





Bell Ringer Answer: 2500 π cubic centimeters

Let's Get Started: Go through the following slides and try the example problems.



DEFINITIONS:

Cone: Solid with one circular base.

Volume: Number of cubic units that can fit in a solid.



Volume of a Cone:

$$V = \frac{1}{3}\pi r^2 H$$

π = pi

r = radius of the base

H = height of the cone





Example Problem: Find the volume of the cone.

 $V = \frac{1}{3}\pi r^2 H$

 $V = \frac{1}{3}\pi(4)^2(7)$

 $V = \frac{1}{3}\pi(16)(7)$

 $V = \frac{1}{3}\pi(112)$

V = 37.3π cubic yards

r = radius of the base

r = 4 yards

H = height of the cone

H = 7 yards





Try the next practice problems on your own! Find the volume of each cone.





Answer Key: Here you will find the answers to the previous four questions. Check your answers below.

- 1) 392π cubic meters
- 2) 294 π cubic units
- 3) 10.6 π cubic inches
- 4) 324 π cubic feet



Additional Resources:

Click on the link below to get additional practice and to check your understanding!

Volume of Cones Practice