**Volume of Cones Notes** Name\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

|  |  |  |  |
| --- | --- | --- | --- |
|  | Cylinder | Cone | Ratio of Volumes  Cone : Cylinder |
|  |  |  |  |
| 1 | Length of Radius: 6 cm  Height of Cylinder: 10 cm  Volume: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | Length of Radius: 6 cm  Height of Cone: 10 cm  Volume: 376.8 cm3 |  |
| 2 | Length of Radius: 9 in  Height of Cylinder: 15 in  Volume: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | Length of Radius: 9 in  Height of Cone: 15 in  Volume: 1271.7 in3 |  |
| 3 | Length of Radius: 18 ft  Height of Cylinder: 7 ft  Volume: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | Length of Radius: 18 ft  Height of Cone: 7 ft  Volume: 2373.84 ft3 |  |

Looking at the ratios you wrote for the volume of the cone to the volume of the cylinder, what conclusions can you make?

|  |  |
| --- | --- |
| **Volume of a Cylinder** | **Volume of a Cone** |
|  |  |

**Using the formula, find the volume of the cones from above. Use 3.14 for**

|  |  |  |
| --- | --- | --- |
| 1) | 2) | 3) |

**Pause the video and try the problems on your own! Round to the nearest tenth if necessary.**

**Then press play and check your answers with a color pen.**

|  |  |  |
| --- | --- | --- |
| 1) | 2) | 3) |