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| **Determining the Volume of Rectangular Prisms and Cylinders**  |
| Understands that *volume* is a measure of the space filled by an objectThe volume of the prism is 24 unit cubes.  | Understands that the volume of a rectangular prism is the product of the area of its base and its heightarea of the base: 9 × 8 = 72 The area of the base is 72 m2.area of base × height: 72 × 2 = 144The volume of the box is 144 m3. | Determines the volume of a cylinderarea of base: π × *r*2 ≈ 3.14 × 52 = 78.5The area of the base is about 78.5 cm2.Volume: *A* × *h* ≈ 78.5 × 8  = 628The volume is about 628 cm3. | Determines a missing measurement when given the other measurementsWhat is the approximate height of the cylinder?Volume:  *V* = *πr*2*h* 452 ≈ 3.14 × 62 × *h* 452 = 113.04 × *h*  *h* = 452 ÷ 113.04 *h* ≈ 4 The height is about 4 cm. |
| **Observations/Documentation** |
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