

# 11.1 and 1.8 Geometry of Solids Homework Day 1

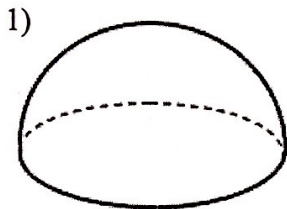
## Geometry 3313

Name Key  
Date \_\_\_\_\_ Period \_\_\_\_\_

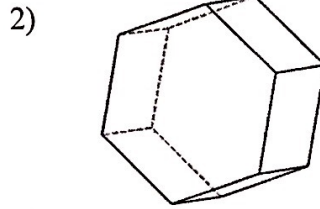
### Learning Targets:

- I can identify parts of geometric solids
- I can classify geometric solids

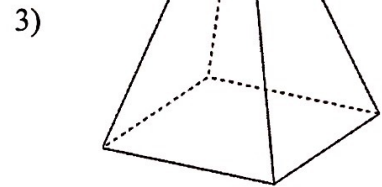
Identify the following shapes. Be as specific as possible.



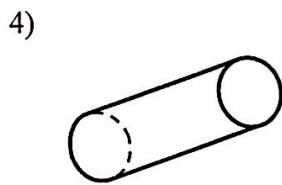
Hemisphere



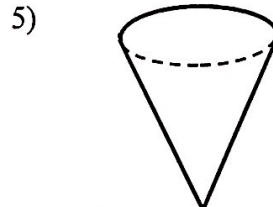
Hexagonal Prism



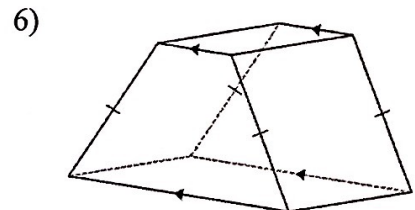
Rectangular Pyramid



Cylinder

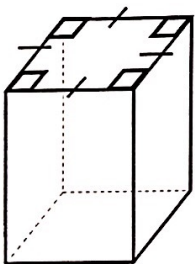


Cone



Trapezoidal Prism

7) A quiz question asks to name the following solid. Suzie responded that it was a "Square Prism." Roger responded that it was a "Rectangular Prism." Who gets full points on the quiz for that particular question?



They are both correct. Suzie provided a more complete answer by recognizing that one pair of opposite faces (top & bottom) are squares,

8) Provide three real-world examples of each of the following:

### Polyhedron

Filing Cabinet.  
cereal box.  
Dice.

### Non-polyhedron

Can of Soup.  
baseball bat.  
Funnel.

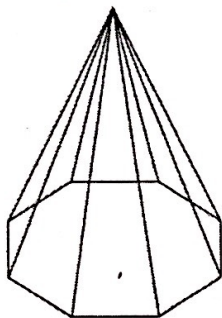
9) What is the difference between a pyramid and a prism? Be specific.

Pyramid : One base ; lateral faces are triangles .

Prism : Two congruent bases ; lateral faces are <sup>parallel</sup> parallelograms

For each polyhedron, identify the number of faces, edges and vertices.

10)



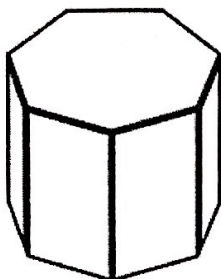
Number of Bases 1

Number of Lateral Faces 4

Number of Edges 12

Number of Vertices 5

11)



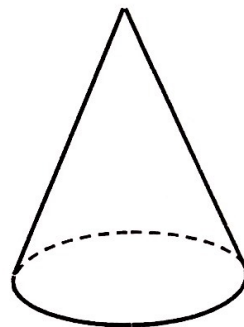
Number of Bases 2

Number of Lateral Faces 6

Number of Edges 18

Number of Vertices 12

12)



Number of Bases 1

Number of Lateral Faces 0

Number of Edges 0

Number of Vertices 0

Use Figure A to answer the questions #13-17.

13) Name the solid Triangular Prism

14) The solid has 5 total faces; it has

2 Base(s) and 3 lateral face(s).

15) Name each base  $\triangle ABC$ ,  $\triangle DEF$

16) How many edges does the solid have? 9

17) How many vertices does the solid have? 6

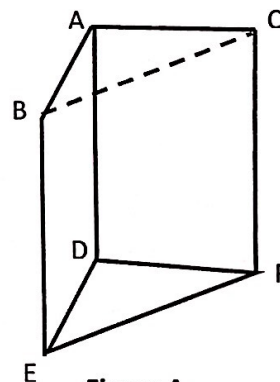
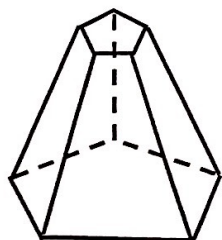


Figure A

18) Is this a prism or a pyramid or neither? Explain.



Neither. A pyramid must have all lateral faces be triangles that meet at a common point (vertex/apex). Prisms have bases that are congruent. If the figure is drawn to scale, the bases are not  $\cong$ .