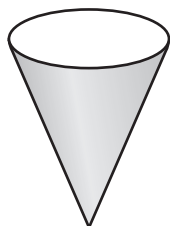


Practice C

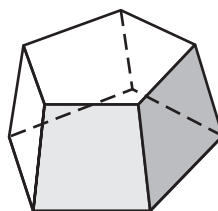
For use with pages 719–726

Tell whether the solid is a polyhedron. Explain your reasoning.

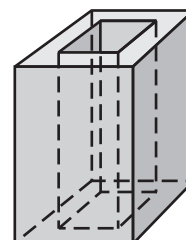
1.



2.

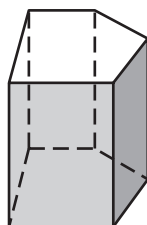


3.

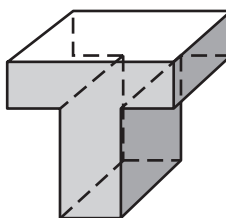


Count the number of faces, vertices, and edges of the polyhedron. Verify that the results satisfy Euler's Theorem.

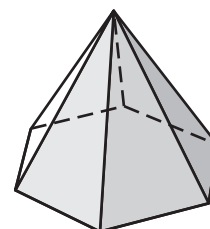
4.



5.



6.

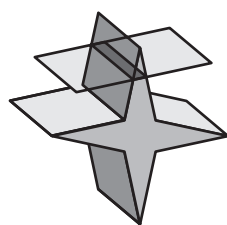


Determine whether the statement is *true* or *false*.

7. A polyhedron can have a circular face.
8. Every regular polyhedron is convex.
9. The cross section of a tetrahedron could be a square.
10. The cross section of a cube could be an equilateral triangle.
11. A polyhedron always has more edges than faces and vertices combined.
12. A polyhedron can have exactly 4 faces and exactly 4 edges.

Describe the cross section shown.

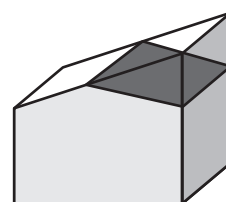
13.



14.

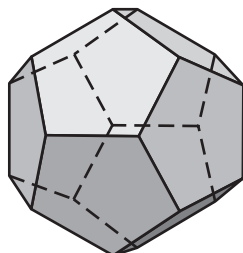


15.

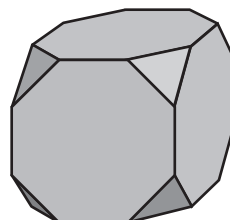


Calculate the number of vertices of the solid using the given information.

16. 12 faces;
all pentagons



17. 14 faces; 8 triangles
and 6 octagons



18. 26 faces; 18 squares
and 8 triangles

