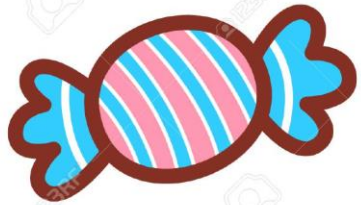
Year 2
Maths
29/06/2020

Lesson Aims

- I can name 3D shapes
- I can talk about their properties and use the words: **edge**, **face** and **vertices** correctly.

Fluency

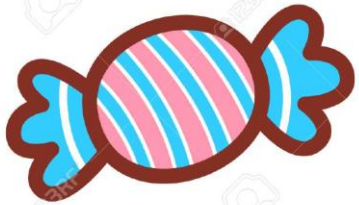
There are 30 sweets in a packet.
I eat 14 of them.
How many are left?



Fluency

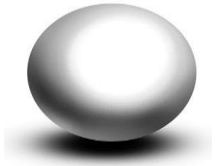
There are 30 sweets in a packet.
I eat 14 of them.
How many are left?

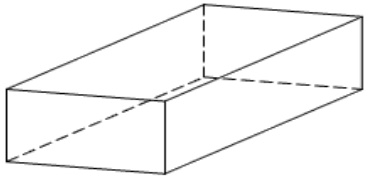
30-14=16

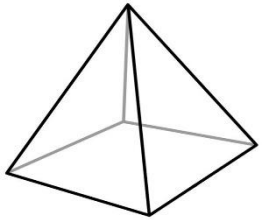


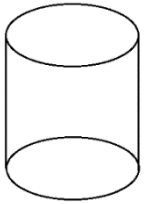
Main Teaching

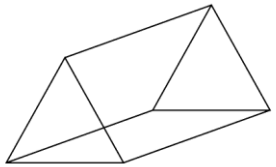
What are these 3D shapes called?

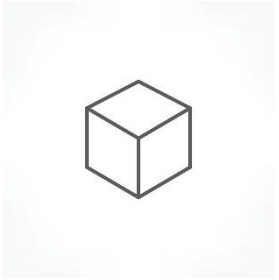






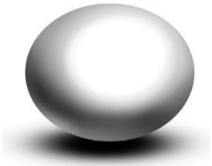




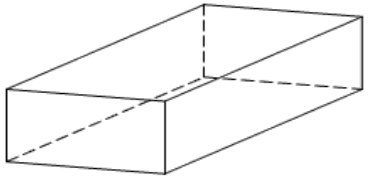


Main Teaching

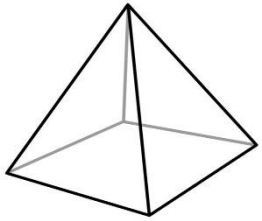
What are these 3D shapes called?



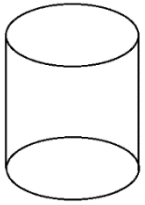
Sphere



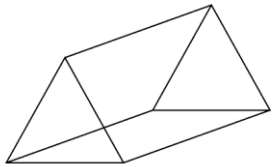
Cuboid



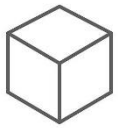
Square based pyramid



Cylinder



Triangular prism

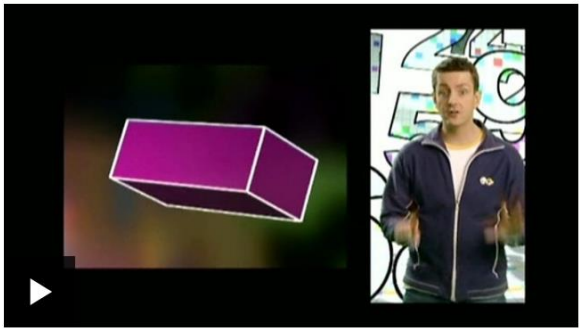


Cube

Main Teaching

Have a listen to the 3D shape song:

https://www.bbc.co.uk/bitesize/clips/zps34wx



Main Teaching

Lets have a look at properties of 3D shapes:

Vertices

Edges

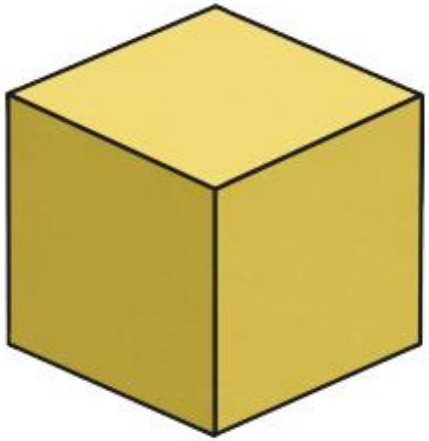
Faces

Watch this video to help:
https://www.youtube.com/watch?v=3nLpD6bE4fE

3D shapes

Lets remind ourselves of the properties of different 3D shapes.

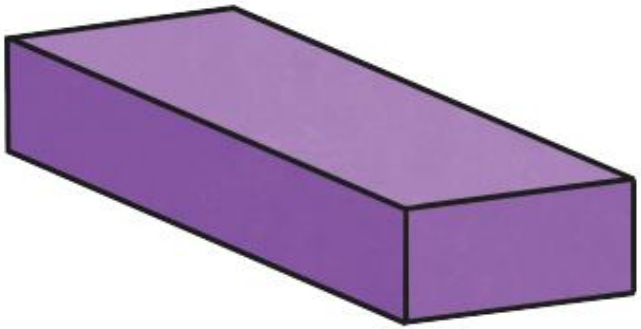
Cube



Cubes have:

- 6 square faces;
- 12 edges;
- 8 vertices;
- edges that are all the same length.

Cuboid



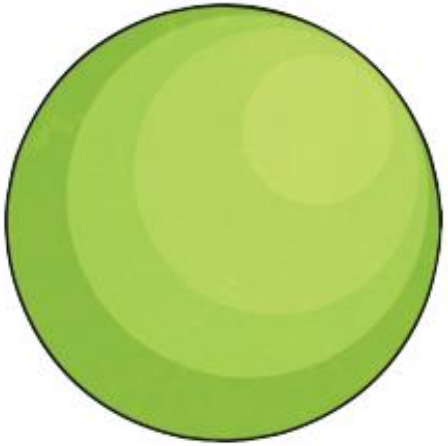
Cuboids have:

- 6 rectangular faces;
- 12 edges;
- 8 vertices;
- edges that are **not** all the same length.

3D shapes

Lets remind ourselves of the properties of different 3D shapes.

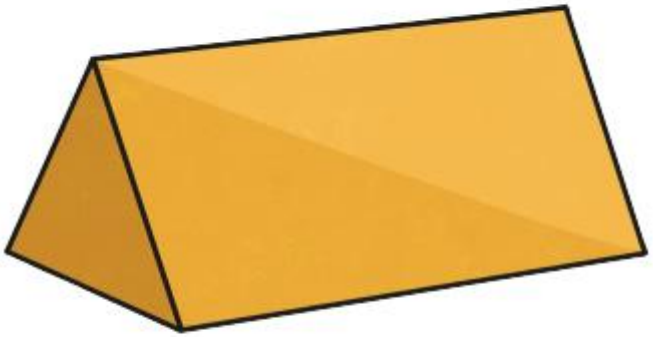
Sphere



Spheres:

- are perfectly round;
- have no edges;
- have no vertices;
- have 1 curved surface.

Triangular Prism



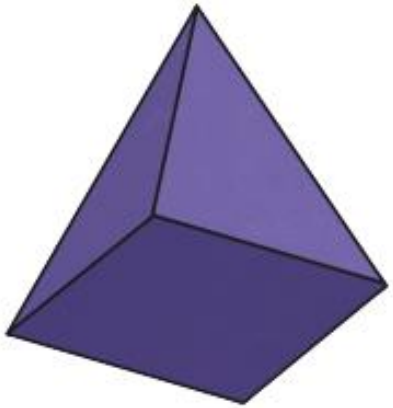
Triangular prisms have:

- 5 faces;
- 2 triangular faces;
- 3 rectangular faces;
- 6 vertices;
- 9 edges.

3D shapes

Lets remind ourselves of the properties of different 3D shapes.

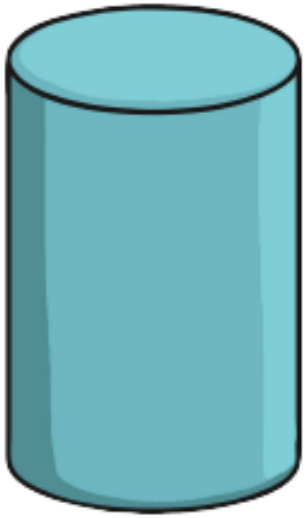
Square-Based Pyramid



Square-based pyramids have:

- a square base;
- 4 triangular faces that make a sharp point;
- 5 faces;
- 5 vertices;
- 8 edges.

Cylinder



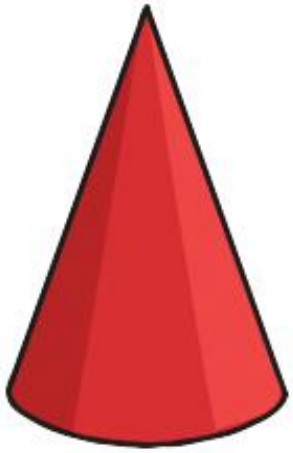
Cylinders have:

- 2 flat and circular faces;
- 1 curved surface;
- **no** vertices;
- 2 curved edges.

3D shapes

Lets remind ourselves of the properties of different 3D shapes.

Cone



Cones have:

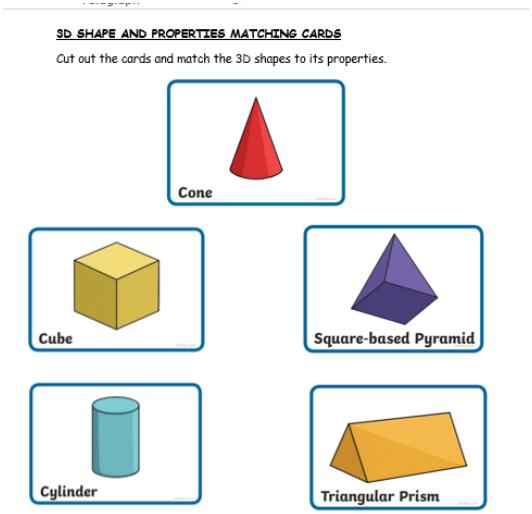
- 1 flat face which is a circle;
- 1 apex;
- 1 edge;
- 1 curved surface.

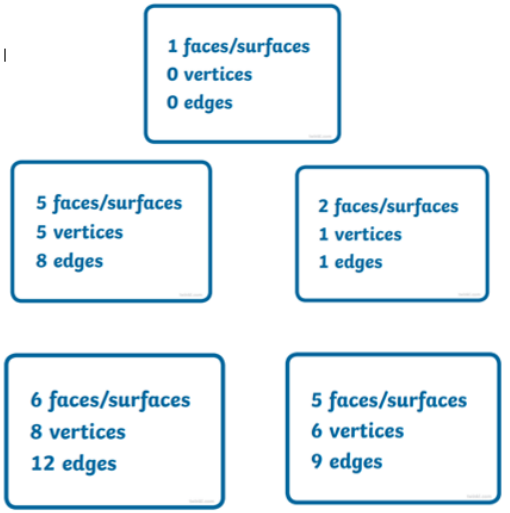
Your task…

<u>3D Shape matching game</u>

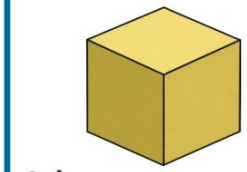
Cut out all of the cards.

Match the picture of the 3D shape to the card with the correct number of faces/edges and vertices.



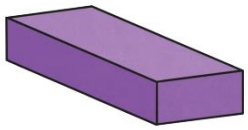


The answers…



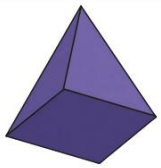
Cube

6 faces/surfaces
8 vertices
12 edges



Cuboid

6 faces/surfaces
8 vertices
12 edges

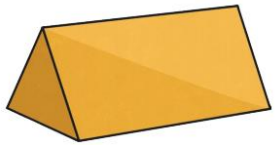


Square-based Pyramid

5 faces/surfaces
5 vertices
8 edges

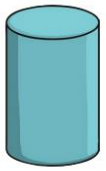
Sphere

1 faces/surfaces
0 vertices
0 edges



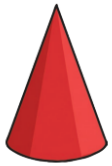
Triangular Prism

5 faces/surfaces
6 vertices
9 edges



Cylinder

3 faces/surfaces
0 vertices
2 edges



Cone

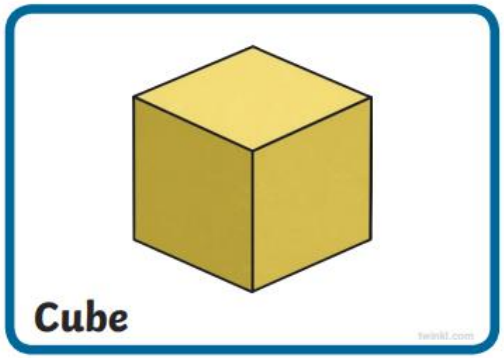
2 faces/surfaces
1 vertices
1 edges

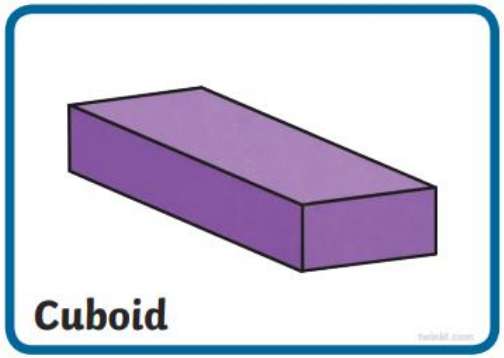
To finish things off…

Teddy says my 3-D shape has 6 faces.
Mo says he must have a cube.
Is Mo correct?
Explain your answer.

To finish things off…

Teddy says my 3-D shape has 6 faces.
Mo says he must have a cube.
Is Mo correct?
Explain your answer.





No because Teddy could have a cube or a cuboid