

Investigation 1

All 3D shapes have the same number of vertices as they do faces.



| Shape Number | Shape Name | Number of Vertices | Number of Faces | Yes or No? |
|--------------|--------------------------|--------------------|-----------------|------------|
| 1. | Cube | | | |
| 2. | Cuboid | | | |
| 3. | Triangular-based pyramid | | | |
| 4. | Square-based pyramid | | | |
| 5. | Pentagona- based pyramid | | | |
| 6. | Hexagonal-based pyramid | | | |

Do you agree with the statement?

Now write your conclusion here (remember to explain WHY):

Investigation 2 - Pyramids



triangular
pyramid



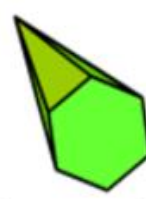
square
pyramid



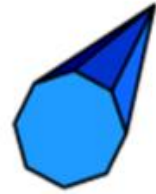
rectangular
pyramid



pentagonal
pyramid



hexagonal
pyramid



octagonal
pyramid

All the faces of a
pyramid are
triangles.



Do you agree with this statement? Why?

Is there a link between the shape used for the base of the pyramid and the number of edges the pyramid has?

Tell me something else you have found out about pyramids today.