

## **TOPIC: Platonic Solids**



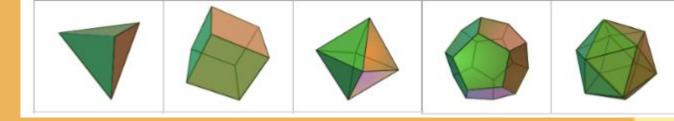
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Mathematical View

Artistic View

In geometry, Platonic Solids are regular Polyhedron whose faces are all the same kind of regular polygon, and the same number of faces meet at every vertex. There are only five such polyhedra: Tetrahedron, Cube, Octahedron, dodecahedron, icosahedron

## Researcher Aimilios Vlastos





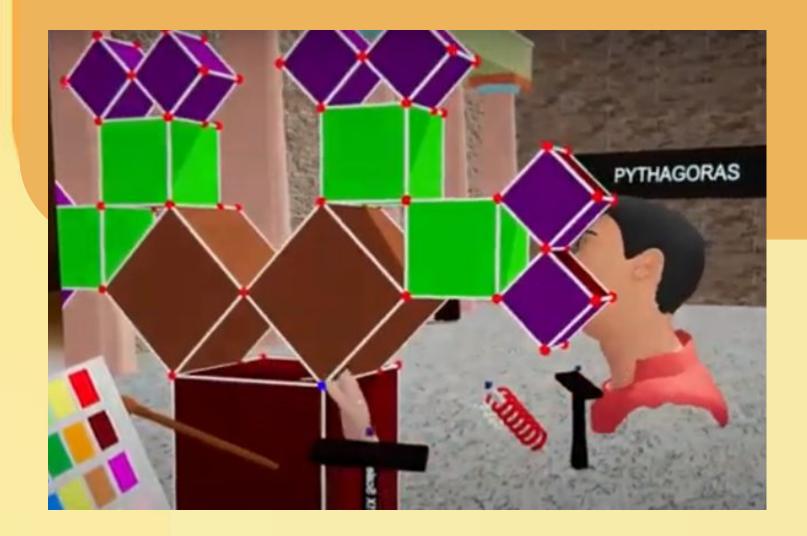
Polyhedra have served as art motifs from prehistoric times right up to the present. London. The Egyptians, knew of the tetrahedron, but also the octahedron, and cube. And there are icosahedral dice from the Ptolemaic dynasty in the British Museum,

Neotrie software has implemented tools that allow the following topics to be addressed: Construction of polyhedrons: Platonic solids, prisms, antiprisms, pyramids, Archimedean solids,

Johnson, Kepler, etc.Basic operations with polyhedrons: duality, truncation, rectification, extension,

etc.

Artist Filio Bechraki, Krinitsa Errika



## **Common View**

Platonic Solids were first mentioned by Plato around 350 BC. He believed that all matter in the universe consists of four elements: Air, Earth, Water, and Fire. He thought that every element corresponds to one of the Platonic solids, while the fifth one would represent the universe as a whole. Also, the famous German astronomer Johannes Kepler used platonic solids to describe the orbits of planets and the Sun.

