

## Answer on Question #54616 – Chemistry – Inorganic Chemistry

### Task:

Describe the structure of sulphuric acid and explain the reasons of shortening of S-O bonds in the molecule.

### Answer:

The structure of sulfuric acid molecule is tetrahedral (Figure 1).

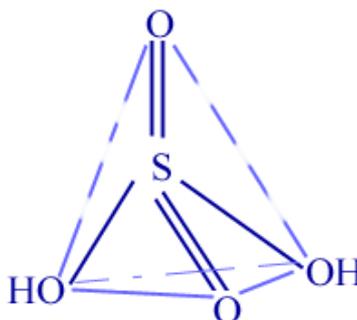


Figure 1 – Structure of sulfuric acid

The centre of this tetrahedral contains S-atom. Two its corners contain O-atom. They are bounded with S-atom by double bonds. S-O bond polarity causes shortening of S-O bonds in the molecule.

Other 2 corners contain OH-groups. Each of them bounded with S-atom with a single bond. OH-groups are bounded with each other with single bonds.