

Comparative study of two chemically isostructural polymers: $[\text{Cu}_2(\text{VO}_2)(\text{HPO}_4)_2(\text{NO}_3)(\text{bpy})_2] \cdot 2\text{H}_2\text{O} / \text{H}_3\text{PO}_4$ (bpy is 2,2'-bipyridine)

Moreno, Yanko

Vega, Andrés

Spodine, Evgenia

Ushak, Esvetlana

Baggio, Ricardo

The crystal structure of copper compound, $[\text{Cu}_2(\text{VO}_2)(\text{HPO}_4)_2(\text{NO}_3)(\text{bpy})_2] \cdot \text{X}$ was studied. These chemically isostructural systems were obtained by hydrothermal methods, which differ in the solvate molecules stabilizing the structures. The compounds were stabilized by different solvates, two crystallization water molecules in (I) and a phosphoric acid molecule in (II). This provides the main structural differences through the diversity of interchain in which they serve as bridges.