

**New Materials by Inorganic Chemistry Theory****Elham Khalesi\***

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**Citation:** Khalesi, E. (2024). New Materials by Inorganic Chemistry Theory. *J Chem Edu Res Prac*, 8(1), 01.**Abstract***In this paper, it will be tried to briefly talk about new materials by help orbitals theory in chemistry.***Keywords:** Inorganic Chemistry, Orbitals, Quantum Theory, Energy Level**1. Material and Methods**

In inorganic chemistry books has talked about orbitals and atoms to make and combine a chemical material. I will try to prove by combine and form different atoms and various compounds orbitals, we will have different materials. In inorganic chemistry books has illustrated how each material combine a new form of atoms and orbitals and in my opinion by change in formation of orbitals we able to construct new objects. Every materials in nature has own combination of orbitals that differ other materials. In my opinion, every combination of orbitals in materials is unique, thus by construct a new combination, a new material will be constructed. We can rationalize and interpret the properties of most inorganic compounds by using qualitative models that are based on quantum mechanics, such as atomic orbitals and their use to form molecular orbitals. The wavefunction of an electron in an atom is called an atomic orbitals.

New areas of inorganic chemistry are constantly being explored and new and often unusual inorganic compounds are constantly being synthesized and identified. These new inorganic syntheses continue to enrich the field with compounds that give us new perspective on structure, bonding, and reactivity.

The energy bound electron is determined by  $n$ , the principal quantum number, in addition,  $l$  specifies the magnitude of the orbitals

angular momentum and  $m_l$  specifies the orientation of that angular momentum.

The orbitals belonging to each shell are classified into subshell distinguished by a quantum number  $l$ . It is common practice to refer to each subshell by a letter:

Value of $l$	0	1	2	3	4	...
Subshell designation	s	p	d	f	g	...

As a result if the combined effects of penetration and shielding, the order of energy levels in a shell of a many electron atoms is  $s < p < d < f$ .

**2. Result**

As a result for future, by different combination of energy level or orbitals, we can produce many materials [1-3].

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**References**

1. James, E. House. (2020). Inorganic Chemistry.
2. Atkins, P.W., Overton, T. L., Rourke, J. P., Weller, M. T. (2010). Shriver and Atkins' Inorganic Chemistry.
3. Agabozorg, H. Mohammadreza Malardi, Inorganic Chemistry, 1369.

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