Defining and Delimiting of the Elementary Particle

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Abstract: giving a new definition and boundary of the elementary particle

Main viewpoints and conclusions:

The elementary particle is the fundamental physical constituents of the Universe; is the most basic building blocks and constituent units of matter. [1]

The elementary particle has its own ingredient; a further internal spatial structure; and the different spatial distribution of volume ingredient density. It hasn't the further and smaller basic unit component (or called basic unit module) which with unique and only ingredients, structures, behaviors or functions different from the other parts of the elementary particle (the parent particle).

Each and every elementary particle could appear and existence as a single individual; and absolutely stable even never decays; could combine with the other elementary particles as a complete and independent basic unit component and module. [2]

So, elementary particles are the absolutely stable subatomic particles that have their own ingredients, and protons even has a further internal spatial structure; both electrons and neutrinos have no further internal spatial pattern and just in a single and simple basic structure. They are the basic unit component and module of all matter in the Universe which could appear and existence as a single individual and in the state of independent and alone.

Wherefore, there be only protons, electrons and neutrinos are the elementary particle in nature. Besides, any two or more protons couldn't able close to and combined together; any two or more neutrinos could close to and polymerization into a whole-body; any two or more electrons also could close to and polymerization into a whole-body. And they constitute all the composite particles and matter. [1][2][3]

References

[1] *Particle physics*
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[2] *A. O. Barut, Stable particles as building blocks of matter,*
ICTP Preprint IC/79/40 (April, 1979)
[3] *Redefining leptons (or called mesons) and baryons*
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