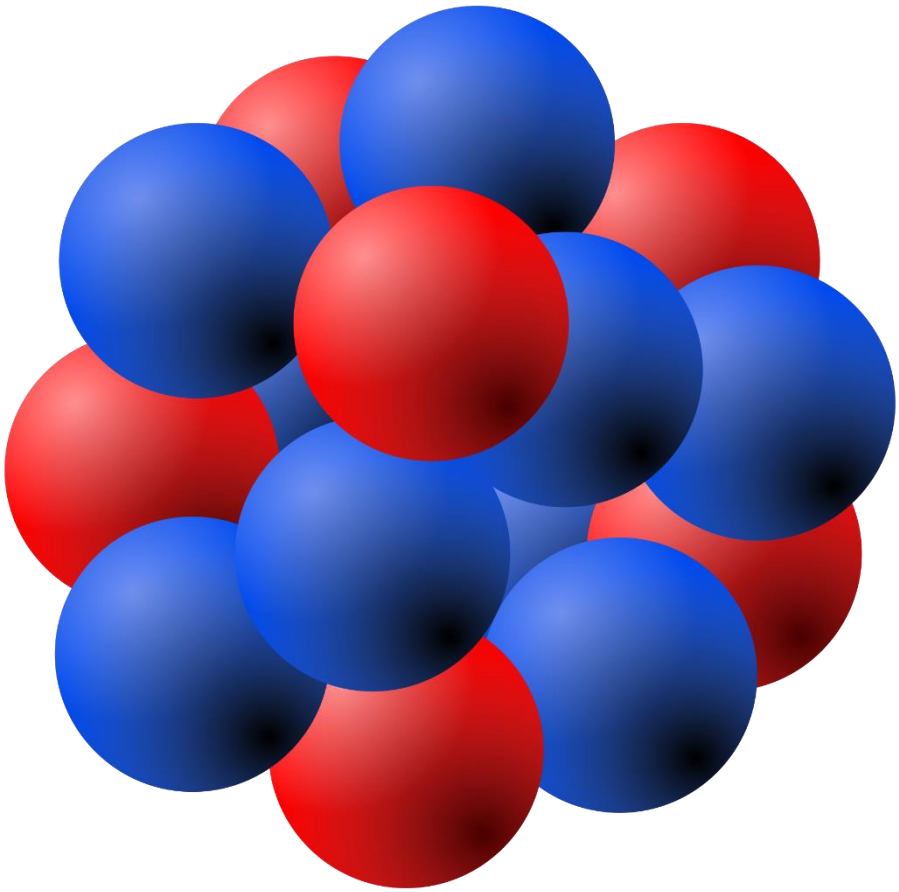
Steps towards the constitution of the materon

[MATRIX OF MATTER OR HIGGS BOSON]



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Introduction

I have been a reader of the UB for now more than fifty years. At that time, I was student at the faculty of science in my hometown in France and I was immediately attracted by the papers dealing with science and especially nuclear and atomic science. I was impressed by what I read because this looked well advanced and revealed some details that could not have been invented by human beings.
Especially, paper 42 impressed me a lot and confirmed that a theory of everything was possible. In 1968 this was a scoop; actually, this was even written in 1955 or before.

42:0.1 (467.1) "The foundation of the universe is material in the sense that energy is the basis of all existence, and pure energy is controlled by the Universal Father."

42:0.2 (467.2) "The manipulation of universe energy is ever in accordance with the personal will and the all-wise mandates of the Universal Father."

42:1.1 (467.3) "The foundation of the universe is material, but the essence of life is spirit. The Father of spirits is also the ancestor of universes; the eternal Father of the Original Son is also the eternity-source of the original pattern, the Isle of Paradise. Matter may appear to manifest inherent energy and to exhibit self-contained powers, but the lines of gravity involved in the energies concerned in all these physical phenomena are derived from, and are dependent on, Paradise. The ultimaton, the first measurable form of energy, has Paradise as its nucleus."

So, I decided to work in this frame in order to find a theory including matter, electromagnetism, weak and strong nuclear interactions in line with the UB and let me guide by my intuition (generated by my Thought Adjuster) instead of the findings of the official science. Why? Because (42:1:3) "there is innate in matter and present in universal space a form of energy not known on Urantia. When this discovery is finally made, then will the physicists feel that they have solved, almost at least, the mystery of matter."
Also (42:4:1) "light, heat, electricity, magnetism, chemism, energy, and matter are - in origin, nature and destiny-one and the same thing, together with other material realities as yet undiscovered on Urantia."

When the Higgs Boson was discovered some years ago, I noticed the similarity of that particle with the Materon I had already theorized on basis of paper 42. The Higgs Boson gives their masses to the particles, especially to the neutron/proton and the electron. So, my challenge was to determine the mass relationship between the Higgs Boson and these particles.

This is the main purpose of my presentation: the Higgs Boson once discovered by the physicists I could determine the link between the Materon and the Higgs Boson and the link between the Higgs Boson mass and the mass of neutron/proton and electron which are already known. Actually, the chain between Absoluta, Segregeta and Ultimata could be completed till the Materon/Higgs Boson and then linked to the neutron/proton structure which are explaining in turn the electromagnetism and the weak and strong nuclear interactions. So, the mystery of matter (mass and antimass, gravity and antigravity) is elucidated as well as the three other interactions (electromagnetism, weak and strong interactions), thus completing the Standard Model. Moreover, the difference of mass between the Higgs Boson/Materon and the neutron/proton elucidates the mystery of dark mass and dark energy.

So, the purpose of the present paper is to see the steps towards the constitution of Materon or Higgs Boson. This process of creation of matter occurs step by step or level after level as there is no time at that stages.

So, how to differentiate each level from the following one?
Actually, at each level the degree of interdependence of the elements is increased so as to associate the elements more closely.

Which are these elements?
There are three first elements (A, B, C) which are distributed and associated in different ways, level after level, so as to create more complex elements made of these three first ones. They are fashioned after the similitude of the three Gods embraced in one.

42:1.6(468.3) “Energy proceeds from Paradise, fashioned after the divine order.
Energy-pure energy-partakes of the nature of the divine organization; it is fashioned after the similitude of the three Gods embraced in one, as they function at the headquarters of the universe of universes.”

This is the reason why there are three first elements (A, B, C) which are distributed and associated in different ways in order to create the ultimatons, the first measurable form of energy. One knows that 100 ultimatons are forming one electron, this is said in the UB. This is also the case for the whole electronic matter. It is not said but it is obvious as the electron, the proton and the neutron are related.

The different levels correspond, as we will see, to the Absoluta, the Segregata and the Ultimata levels. After, appear the material levels, with the Materon or Higgs Boson and the neutron which splits into proton and electron. This is constituting the quantum world, the microcosm by opposition to the macrocosm.

1. The immaterial elements

42:1.6 (468.3) “Energy proceeds from Paradise, fashioned after the divine order. Energy—pure energy—partakes of the nature of the divine organization; it is fashioned after the similitude of the three Gods embraced in one, as they function at the headquarters of the universe of universes. And all force is circuited in Paradise, comes from the Paradise Presences and returns thereto, and is in essence a manifestation of the uncaused Cause—the Universal Father; and without the Father would not anything exist that does exist.”

To lessen conceptual confusion, it is advisable to adopt the following classification for cosmic force, emergent energy, and universe power—physical energy:

42:2.3 (469.3) “1. *Space potency*. This is the unquestioned free space presence of the Unqualified Absolute.”

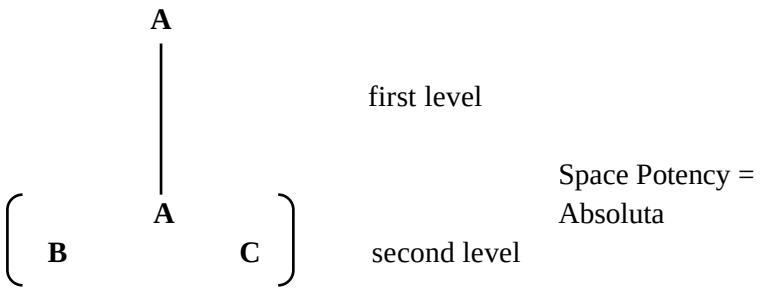
42:2.5 (469.5) “Space potency is a prereality; it is the domain of the Unqualified Absolute and is responsive only to the personal grasp of the Universal Father.”

42:2.6 (469.6) “On Uversa, space potency is spoken of as ABSOLUTA.”

1.1. Primordial element and initial process

An element A, called primordial and located on a first level, divides itself by two and multiplies itself by three, according to figure (1):

Figure (1)



These three elements A, B and C constitute the second level.
This initial process does not alter the primordial element A, which remains entirely on its own level. However, on the second level, the three elements coexist. At that stages there is no time, but different levels determining the interdependency of the elements.

1.2. Permutation of elements A, B and C

42:2.7 (469.7) "2. *Primordial force.* This represents the first basic change in space potency and may be one of the nether Paradise functions of the Unqualified Absolute."

42:2.9 (469.9) "Primordial force is sometimes spoken of as *pure energy;* on Uversa we refer to it as SEGREGATA."

Elements A, B and C permute and yield the elements of the third level, i.e.:

A B C, A C B, B C A, B A C, C A B, C B A

Indeed, the three elements A, B and C may be considered under these six angles.
There is therefore a multiplication by six of the elements of second level, simultaneously with the creation of six groups determined by three first elements (A, B and C). The elements of the second level of which these groups are issued from, are not affected by this operation. The two types of elements, A, B and C, on the one hand, and their groups, on the other, are independent, but also interdependent. There is a superposition of two levels, according to figure (2):

Figure (2)

A B C	second level	
ABC ACB BCA BAC CAB CBA	third level	Pure energy = Segregata

These groups, and also their degree of dependence between each other, characterize therefore the third level.
Why is there permutation? It is the most complete manner to return to the initial process, since the elements B and C can in this way play the role of element A. The return of the elements to the initial point is a fundamental process, corresponding to reaction after action. This is the basis of the respiration of space at quantum level.

1.3. Arrangements of the elements of the third level.

42:2.10 (470.1) "3. *Emergent energies.* The passive presence of the primary force organizers is sufficient to transform space potency into primordial force, and it is upon such an activated space field that these same force organizers begin their initial and active operations. Primordial force is destined to pass through two distinct phases of transmutation in the realms of energy manifestation before appearing as universe power. These two levels of emerging energy are:"

42:2.11 (470.2) "a. *Puissant energy.* This is the powerful-directional, mass-movemented, mighty-tensioned, and forcible-reacting energy—gigantic energy systems set in motion by the activities of the primary force organizers. This primary or puissant energy is not at first definitely responsive to the Paradise-gravity pull though probably yielding an aggregate-mass or space-directional response to the collective group of absolute influences operative from the nether side of Paradise."

"b. *Gravity energy*." (to be seen later).

The elements of each of the six groups of the third level arrange themselves one by one, then two by two and finally three by three.

1.3.1. Arrangements one by one and two by two.

The elements of each group arrange themselves one by one and two by two, in such a manner as to form six configurations each of them being characteristic of its initial group, according to figure (3):

Figure (3)

	6						
	ABC	**ACB**	**BCA**	**BAC**	**CAB**	**CBA**	
	A	**A**	**B**	**B**	**C**	**C**	
	B	**C**	**C**	**A**	**A**	**B**	
	C	**B**	**A**	**C**	**B**	**A**	
10	**AB**	**AC**	**BC**	**BA**	**CA**	**CB**	Primordial force =
	BA	**CA**	**CB**	**AB**	**AC**	**BC**	Puissant energy
	AC	**AB**	**BA**	**BC**	**CB**	**CA**	
	CA	**BA**	**AB**	**CB**	**BC**	**AC**	Fourth level
	BC	**CB**	**CA**	**AC**	**AB**	**BA**	
	CB	**BC**	**AC**	**CA**	**BA**	**AB**	

There are therefore six times ten arrangements, taking into account the initial groups.

1.3.2. Arrangements three by three

The elements of each group of the third level arrange themselves also three by three, in such a manner as to form 6 x 6, i.e. 36 arrangements, according to figure (4):

Figure (4), continuation of the figure (3)

	ABC	**ACB**	**BCA**	**BAC**	**CAB**	**CBA**	
	A	**A**	**B**	**B**	**C**	**C**	
Arrangements	**B**	**C**	**C**	**A**	**A**	**B**	
	C	**B**	**A**	**C**	**B**	**A**	
1 to 1	**AB**	**AC**	**BC**	**BA**	**CA**	**CB**	Puissant energy
and	**BA**	**CA**	**CB**	**AB**	**AC**	**BC**	
2 to 2	**AC**	**AB**	**BA**	**BC**	**CB**	**CA**	Ultimata
	CA	**BA**	**AB**	**CB**	**BC**	**AC**	
	BC	**CB**	**CA**	**AC**	**AB**	**BA**	
	CB	**BC**	**AC**	**CA**	**BA**	**AB**	
	ABC	**ACB**	**BCA**	**BAC**	**CAB**	**CBA**	
Arrangements	**ACB**	**ABC**	**BAC**	**BCA**	**CBA**	**CAB**	
3 to 3	**BCA**	**CBA**	**CAB**	**ACB**	**ABC**	**BAC**	Fourth level
	BAC	**CAB**	**CBA**	**ABC**	**ACB**	**BCA**	
	CAB	**BAC**	**ABC**	**CBA**	**BCA**	**ACB**	
	CBA	**BCA**	**ACB**	**CAB**	**BAC**	**ABC**	

There are therefore 36 arrangements 3 by 3, i.e. 36 new groups.
These six configurations shown in six columns are characteristic of the fourth level and represent the most complete manner to return to the initial groups of the third level.

1.3.3. Arrangements 1 to 1 and 2 to 2 in the 36 new groups

The 36 new groups created by arrangement 3 by 3 create in turn 9 elements by arrangement **1** by 1 and then 2 by 2. Be figure (5):

Figure (5), continuation of figure (4)

Case of ABC solely: first column of figure (4)

	ABC										
	A										
	B										
Arrangements	**C**										
1 to 1	**AB**										
and	**BA**										
2 to 2	**AC**										
	CA										
	BC										
	CB										Puissant energy
	ABC	**A**	**B**	**C**	**AB**	**BA**	**AC**	**CA**	**BC**	**CB**	
	ACB	**A**	**C**	**B**	**AC**	**CA**	**AB**	**BA**	**CB**	**BC**	
Arrangements	**BCA**	**B**	**C**	**A**	**BC**	**CB**	**BA**	**AB**	**CA**	**AC**	Fifth level
3 to 3	**BAC**	**B**	**A**	**C**	**BA**	**AB**	**BC**	**CB**	**AC**	**CA**	
	CAB	**C**	**A**	**B**	**CA**	**AC**	**CB**	**BC**	**AB**	**BA**	
	CBA	**C**	**B**	**A**	**CB**	**BC**	**CA**	**AC**	**BA**	**AB**	

Arrangements 1 to 1 and 2 to 2

There exist 5 configurations similar to the one presented in figure (5). The 6 configurations are characteristic of the fifth level.

These six configurations represent the most complete manner to return to the groups which characterize the fourth level.

2. The first material manifestations

42:2.12 (470.3) "b. *Gravity energy*. The now-appearing gravity-responding energy carries the potential of universe power and becomes the active ancestor of all universe matter."

"In response to the work of these force manipulators, space-energy rapidly passes from the puissant to the gravity stage, thus becoming directly responsive to the circular grasp of Paradise (absolute) gravity while disclosing a certain potential for sensitivity to the linear-gravity pull inherent in the soon appearing material mass of the electronic and the post electronic stages of energy and matter."

42:2.13 (470.4) "Puissant and gravity energies, when regarded collectively, are spoken of on Uversa as ULTIMATA."

42:2.14 (470.5) "4. *Universe power*. Space-force has been changed into space-energy and thence into the energy of gravity control."

42:2.15 (470.6) "On Uversa we refer to the realm of universe power as GRAVITA."

2.1. Partnering of the 6 groups and the initial group — sixth level

The 6 x 6 groups, formed by arrangement 3 by 3 (see figure 4), partner with the groups they are issued from, the purpose being always to return to the initial process, i.e. figure (6):

Figure (6)

1	**ABC + ABC (31)**	**7**	**ACB + ACB (13)**	**13**	**BCA + BCA (7)**	
2	**ABC + ACB (16)**	**8**	**ACB + ABC (34)**	**14**	**BCA + BAC (28)**	
3	**ABC + BCA (9)**	**9**	**ACB + CBA (3)**	**15**	**BCA + CAB (21)**	
4	**ABC + BAC (26)**	**10**	**ACB + CAB (20)**	**16**	**BCA + CBA (2)**	
5	**ABC + CAB (23)**	**11**	**ACB + BAC (29)**	**17**	**BCA + ABC (35)**	
6	**ABC + CBA (36)**	**12**	**ACB + BCA (18)**	**18**	**BCA + ACB (12)**	
						Gravity
19	**BAC + BAC (25)**	**25**	**CAB + CAB (19)**	**31**	**CBA + CBA (1)**	energy
20	**BAC + BCA (10)**	**26**	**CAB + CBA (4)**	**32**	**CBA + CAB (22)**	
21	**BAC + ACB (15)**	**27**	**CAB + ABC (33)**	**33**	**CBA + BAC (27)**	Ultimata
22	**BAC + ABC (32)**	**28**	**CAB + ACB (14)**	**34**	**CBA + BCA (8)**	
23	**BAC + CBA (5)**	**29**	**CAB + BCA (11)**	**35**	**CBA + ACB (17)**	
24	**BAC + CAB (30)**	**30**	**CAB + BAC (24)**	**36**	**CBA + ABC (6)**	

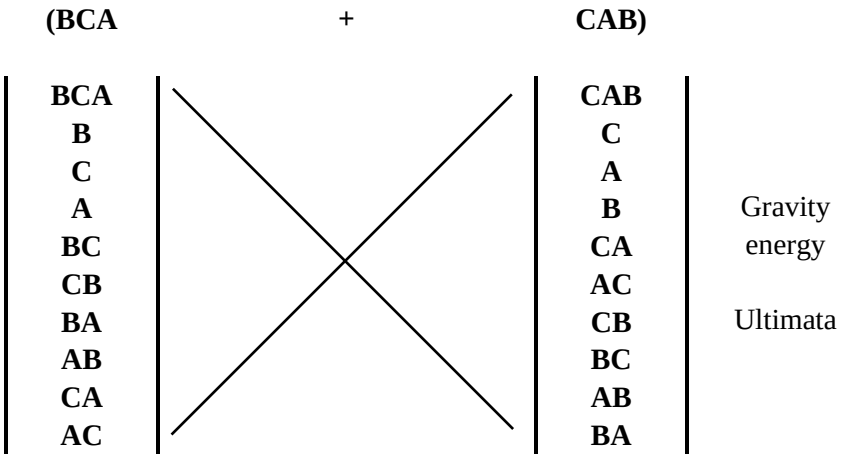
There are 36 groupings. One can distinguish 2 x 18 groupings, which form mirror-groupings (e.g. 1 and 31). The number of the mirror-grouping is in parentheses.

2.2. Partnering in the frame of each grouping

Each group contains 10 elements. These 10 elements couple themselves with the 10 elements of the corresponding group in the frame of the same grouping, figure (7):

Figure (7)

Example of grouping based on (BCA + CAB)



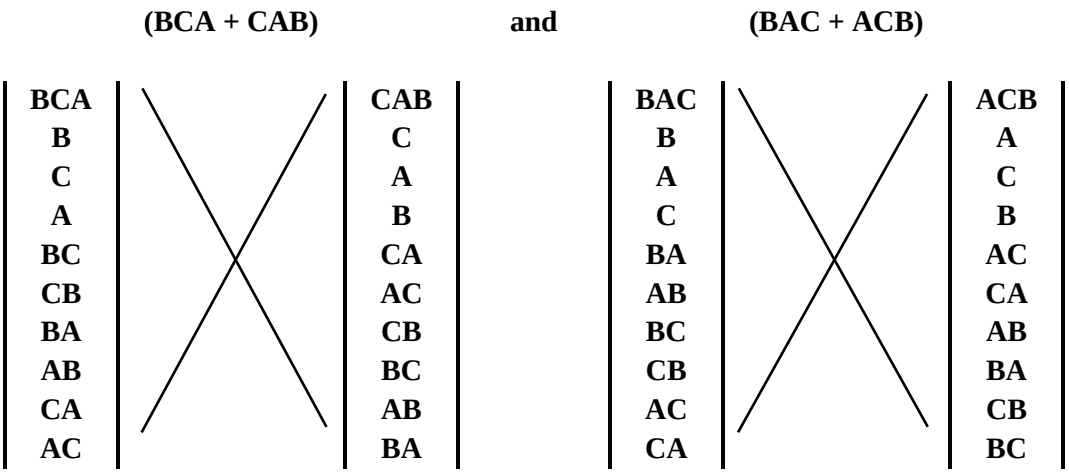
Each element of a group partners with each element of the partner group in the frame of one grouping. The operation leads to the creation of 100 units composed of two to six elements, e.g. (B, C) or (CB, AC). Since this partnering can be performed in one sense or in the other, there are therefore 200 units, 100 alternating with 100, in the sense that they cannot exist simultaneously. Example: (B, C) then (C, B).

2.3. Partnering in the frame of a mirror-grouping

The same partnering takes place in the mirror-grouping. There are therefore also 100 units alternating with 100 other units, figure (8):

Figure (8), continuation of figure (7)

Example of a mirror-groupings



Result: 100 + 100 units 100 + 100 mirror-units

2.4. The first particles/antiparticles

42:5.2 (474.6) “Wavelike energy manifestations—from the standpoint of twentieth century Urantia scientific enlightenment—may be classified into the following ten groups:”

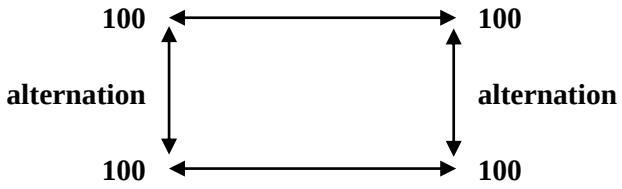
42:5.3 (474.7) “1. *Infraultimatonic rays*—the borderland revolutions of ultimatons as they begin to assume definite form. This is the first stage of emergent energy in which wavelike phenomena can be detected and measured.”

42:6.4 (476.6) “The ultimatons, unknown on Urantia, slow down through many phases of physical activity before they attain the revolutionary-energy prerequisites to electronic organization. Ultimatons have three varieties of motion: mutual resistance to cosmic force, individual revolutions of antigravity potential, and the intra-electronic positions of the one hundred mutually inter-associated ultimatons.”

The 200 units of a grouping are opposed by 200 units of their mirror-grouping, figure (9):

Figure (9)

Opposition by “mirror” effect



Opposition by “mirror” effect

There are therefore 18 x 400 units, i.e. 7200 units, which oppose themselves 100 by 100 by mirror effect and which alternate 100 by 100.

This constitution allows to obtain a "constant" material/immaterial manifestation, the opposition allowing the materialization of 18 x 100 particles (ultimatons), composed of 18 x 2 x 100 units, and their immediate dematerialization, and the alternation creating the continuity of this materialization/dematerialization: 18 x 100 antiparticles succeed this way to 18 x 100 particles, in the frame of a constant process of materialization/dematerialization. This process creates the discontinuity of matter.

These 18 x 100 particles, which alternate with the other 18 x 100 antiparticles (ultimatons), are in fact the first material/immaterial manifestation. The opposition between two groups of 100 units creates the mass phenomenon which perpetuates itself by alternation. The opposition is also creating the phenomenon of antimass, which perpetuates itself also by alternation. The phenomenon of antimass (dematerialization) presides over the dislocation of the matter, formed by the mass phenomenon (materialization). It has to be noted that the antiparticle opposed to the particle as well as the mass opposed to the antimass are notions which do not correspond to what is called commonly matter and antimatter. Actually, charged matter has not yet appeared at this stage of the materialization/dematerialization process.

2.5. Remarks

Each unit of a group of 100 is composed of elements of different character. This composition is characterized in three ways:

- Following a static composition: two to six elements compose each unit [example (B, C) and (BCA, CAB)], these compositions determine a more or less great relation with the primordial element A (actually mutual resistance to cosmic force).
- Following a dynamic composition: there is a constant alternation of each unit with another unit within each group of 200 units, which determines an "axial rotation" (spin effect) of each unit on itself (in reality alternation of each unit with another unit). The "speed" of this rotation is a function of the partnering speed, different according to the composition of each unit (composed of 2 to 6 elements).
- Following the respective position of each unit in the group of 100 units. There are privileged regroupings by 10 units, because each element creates 10 units with the help of the elements partners within a same grouping (different intraelectronic position of each ultramaton).

3. Constitution of the materon

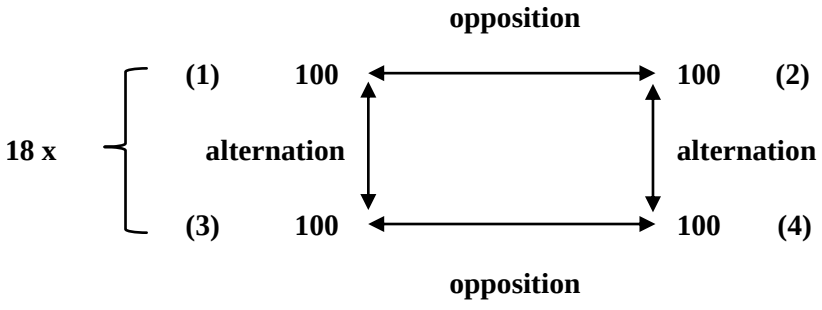
42:6.3 (476.5) "Ultimatons function by mutual attraction, responding only to the circular Paradise-gravity pull. Without linear-gravity response they are thus held in the universal space drift. Ultimatons are capable of accelerating revolutionary velocity to the point of partial antigravity behavior, but they cannot, independent of force organizers or power directors, attain the critical escape velocity of deindividuation, return to the puissant-energy stage."

42:6.5 (476.7) "Mutual attraction holds one hundred ultimatons together in the constitution of the electron; and there are never more nor less than one hundred ultimatons in a typical electron. The loss of one or more ultimatons destroys typical electronic identity, thus bringing into existence one of the ten modified forms of the electron."

42:6.6 (476.8) "Ultimatons do not describe orbits or whirl about in circuits within the electrons, but they do spread or cluster in accordance with their axial revolutionary velocities, thus determining the differential electronic dimensions. This same ultimatonic velocity of axial revolution also determines the negative or positive reactions of the several types of electronic units. The entire segregation and grouping of electronic matter, together with the electric differentiation of negative and positive bodies of energy-matter, result from these various functions of the component ultimatonic interassociation."

Let there be the 18 x 4 x 100 units interacting as follow:

Figure (10)



The 100 units (1) and the 100 units (3) cannot exist simultaneously since they alternate; the same can be said for the 100 units (2) and the 100 units (4).

The 100 units (1) and the 100 units (2) form mirror-units which melt and produce 100 material particles; the same is true for the 100 units (3) and the 100 units (4).

From their fusion on and ending up at 100 material particles (ultimatons), the 100 units (1) and the 100 units (2) separate and are again dematerialized. They are replaced by the 100 units (3) and the 100 units (4) which in turn fuse and materialize; they are afterwards dematerialized and replaced by the 100 units (1) and the 100 units (2) which fuse and rematerialize again in an alternated chain.

There are 18 identical processes, which end up at 2 x 18 x 100 material/immaterial particles/antiparticles which together, by alternation, form "in discontinuity" the materon (for “matrix of matter” or Higgs Boson) (figure 11). On figure (12) the Materon and the trunk of neutron/antineutron are shown. Their mass is equal to 2 x 180 000 electron masses (trunk) and 1800 electron masses which alternate with 1800 electron masses (2 x 18 x 100 particles).

42:3.1 (471.8) “Matter in all universes, excepting in the central universe, is identical. Matter in its physical properties depends on the revolutionary rates of its component members, the number and size of the revolving members, their distance from the nuclear body or the space content of matter, as well as on the presence of certain forces as yet undiscovered on Urantia.”

42:3.2 (471.9) “In the varied suns, planets, and space bodies there are ten grand divisions of matter:”

42:3.3 (472.1) “1. Ultimatonic matter—the prime physical units of material existence, the energy particles which go to make up electrons.”

42:5.4 (474.8) “2. *Ultimatonic rays.* The assembly of energy into the minute spheres of the ultimatons occasions vibrations in the content of space which are discernible and measurable. And long before physicists ever discover the ultimaton, they will undoubtedly detect the phenomena of these rays as they shower in upon Urantia. These short and powerful rays represent the initial activity of the ultimatons as they are slowed down to that point where they veer towards the electronic organization of matter. As the ultimatons aggregate into electrons, condensation occurs with a consequent storage of energy.”

3. etc (the other dimensions of matter are already known).

Figure (11): Materon

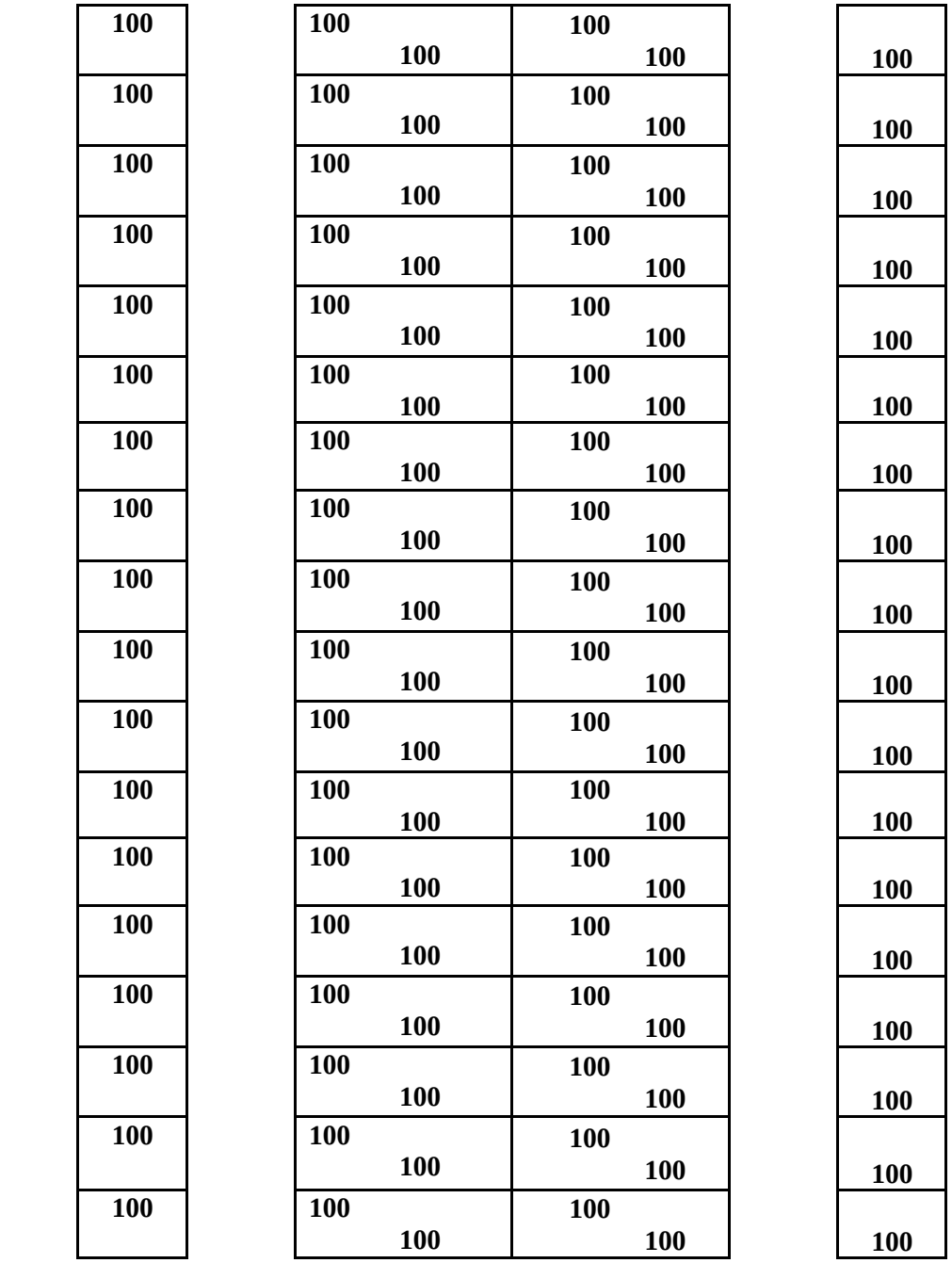
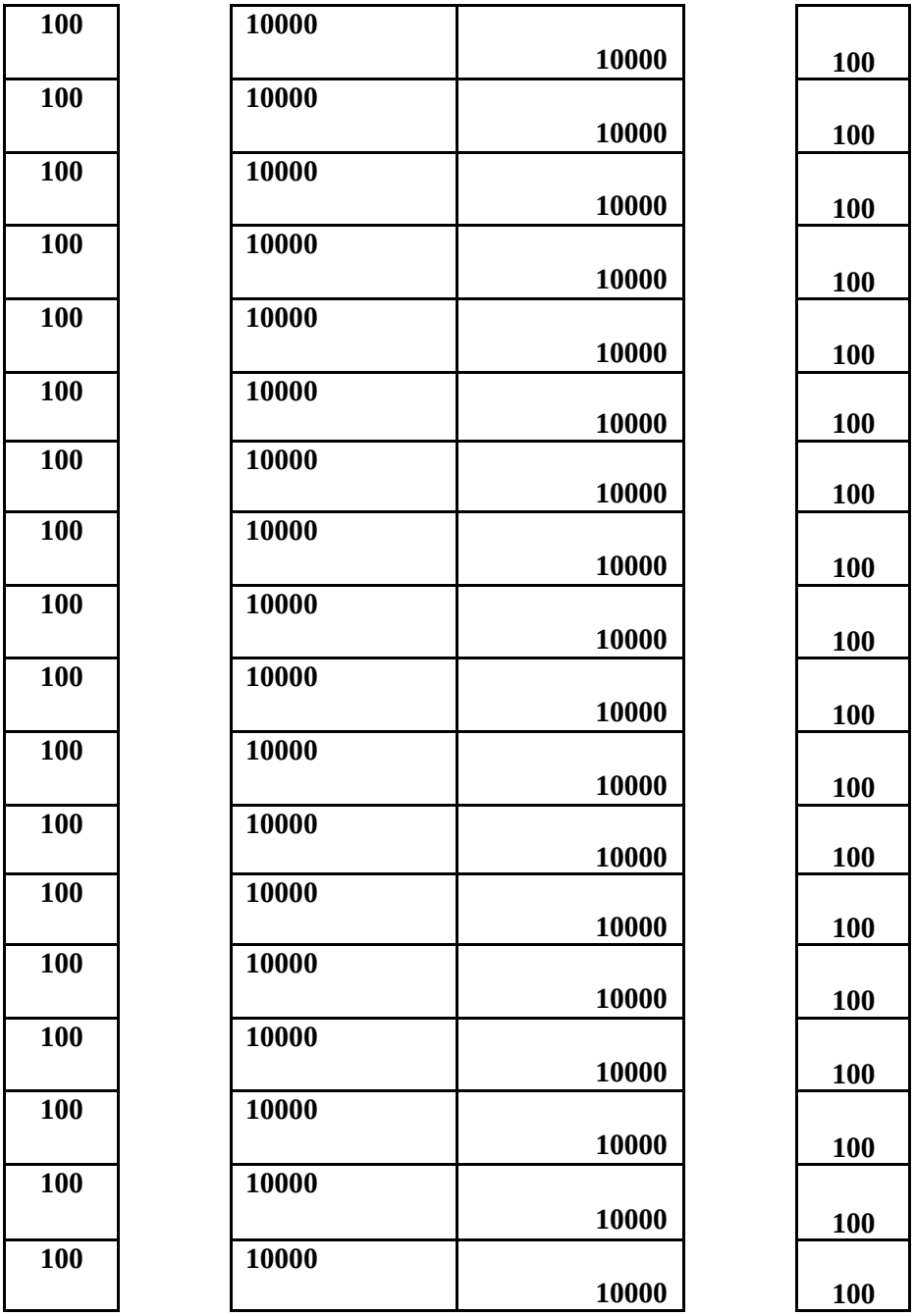


Figure (12)

Materon + trunk of neutron/antineutron



4. Energy and Matter Transmutations

42:4.1 (472.12) “Light, heat, electricity, magnetism, chemism, energy, and matter are—in origin, nature, and destiny—one and the same thing, together with other material realities as yet undiscovered on Urantia.”

42:4.3 (473.1) “The power centers and their associates are much concerned in the work of transmuting the ultimaton into the circuits and revolutions of the electron.”

“These unique beings control and compound power by their skillful manipulation of the basic units of materialized energy, the ultimatons.”

“They are masters of energy as it circulates in this primitive state. In liaison with the physical controllers, they are able to effectively control and direct energy even after it has transmuted to the electrical level, the so-called electronic stage. But their range of action is enormously curtailed when electronically organized energy swings into the whirls of the atomic systems. Upon such materialization, these energies fall under the complete grasp of the drawing power of linear gravity.”

42:4.4 (473.2) “Gravity acts positively on the power lanes and energy channels of the power centers and the physical controllers, but these beings have only a negative relation to gravity—the exercise of their antigravity endowments.”

On figure (13) the pre neutron is shown as the result of $1/100^{th}$ of Higgs Boson particle. Here 1800 electron masses are alternating with 1800 electron masses. A number of electron masses (171 + 171 + 171 + 153 in total) are surrounding this trunk. Total is equal to 2466 electron masses or 1.2601 GeV.

Figure (13)
Alternation of 2 x 1800 particles/antiparticles of the pre neutron (= 1/100th of Materon).
(Number 1 represents the materialization, number 0 the dematerialization of 100 particles/antiparticles, i.e. ultimatons, of 1 electron mass in total)

x 1	1	100			
x 1	10		100	1	x 1
x 2	101	100		01	x 1
x 2	1010		100	101	x 2
x 3	10101	100		0101	x 2
x 3	101010		100	10101	x 3
x 4	1010101	100		010101	x 3
x 4	10101010		100	1010101	x 4
x 5	101010101	100		01010101	x 4
x 5	1010101010		100	101010101	x 5
x 6	10101010101	100		0101010101	x 5
x 6	101010101010		100	10101010101	x 6
x 7	1010101010101	100		010101010101	x 6
x 7	10101010101010		100	1010101010101	x 7
x 8	101010101010101	100		01010101010101	x 7
x 8	1010101010101010		100	101010101010101	x 8
x 9	10101010101010101	100		0101010101010101	x 8
x 9	101010101010101010		100	10101010101010101	x 9
x 10	1010101010101010101	100		01010101010101010101	x 9
x 10	10101010101010101010		100	101010101010101010101	x 10
x 11	10101010101010101010101	100		01010101010101010101	x 10
x 11	101010101010101010101010		100	101010101010101010101	x 11
x 12	101010101010101010101010101	100		010101010101010101010101	x 11
x 12	1010101010101010101010101010		100	101010101010101010101010101	x 12
x 13	10101010101010101010101010101	100		010101010101010101010101010101	x 12
x 13	101010101010101010101010101010		100	101010101010101010101010101010101	x 13
x 14	1010101010101010101010101010101	100		010101010101010101010101010101	x 13
x 14	10101010101010101010101010101010		100	101010101010101010101010101010101	x 14
x 15	101010101010101010101010101010101	100		010101010101010101010101010101	x 14
x 15	1010101010101010101010101010101010		100	101010101010101010101010101010101	x 15
x 16	10101010101010101010101010101010101	100		010101010101010101010101010101	x 15
x 16	101010101010101010101010101010101010		100	101010101010101010101010101010101	x 16
x 17	1010101010101010101010101010101010101	100		010101010101010101010101010101	x 16
x 17	10101010101010101010101010101010101010		100	101010101010101010101010101010101	x 17
x 18	101010101010101010101010101010101010101	100		010101010101010101010101010101	x 17
x 18	1010101010101010101010101010101010101010		100	101010101010101010101010101010101	x 18

1800 electron masses alternating with 1800 electron masses

So, the total of pre neutron mass = 1800 electron masses + (171 + 171 + 171 + 153) =

2466 electron masses = 2466 x 0.511 MeV (mass of electron) = 1260.1 MeV or 1.2601 GeV =

1/100th of Materon or Higgs Boson (Mass is equal to 126.01 GeV)

The mass of neutron is deduced from figure (13). See tables 1 (1) and 1 (2). The mechanism is the following:

Taking the last line of figure (13), there are 18 x 1 and 18 x 0 pre-electrons aligned in the following way:

1 0 1 0 1 0 1 0 1 0 1 0 1 0 1 0 1 0 1 0 1 0 1 0 1 0 1 0 1 0 1 0 1 0

The 18 x 1 pre-electrons are converted into 1 17 136 680 2380 etc, as shown hereunder:

1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
1	17	136	680	2380	6188	12376	19448	24310	24310	19448	12376	6188	2380	680	136	17	1	

Broken down, this is:

	1	1	16	120	560	etc												
		1	15	105	455	etc												
		1	14	91	364	etc												
		1	13	78	286	etc												
		1	12	66	220	etc												
		1	11	55	165	etc												
		1	10	45	120	etc												
		1	9	36	84	etc												
		1	8	28	56	etc												
		etc	etc	etc	etc	etc												
Total	1	17	136	680	2380	etc												

The 18 x 0 pre-electrons become 18 x 1 pre-electrons once materialized, alternating with the 18 x 1 pre-electrons materialized before and becoming 18 x 0 pre-electrons once dematerialized.
(See tables 1(1) and 1(2) showing the exact numbers).
The total (for all lines) of mass of the neutron is equal to 1800
+ 3/2 x (19.614747568666486078104998681753180 1)
+ 1/2 x (18.430443137293550572381186813617 01) electron masses = 939.54 MeV.

Table 1 (1): Mechanism of acquisition of neutron mass

10^0	trunk	10^0	10^{-2}	10^{-4}	10^{-6}	10^{-8}	10^{-10}	10^{-12}	10^{-14}	10^{-16}	10^{-18}	10^{-20}	10^{-22}	10^{-24}	10^{-26}	10^{-28}	10^{-30}	10^{-32}	10^{-34}	line n°
1	100	1																		1
1	100	1	1																	2
1	100	1	2	1																3
1	100	1	3	3	1															4
1	100	1	4	6	4	1														5
1	100	1	5	10	10	5	1													6
1	100	1	6	15	20	15	6	1												7
1	100	1	7	21	35	35	21	7	1											8
1	100	1	8	28	56	70	56	28	8	1										9
1	100	1	9	36	84	126	126	84	36	9	1									10
1	100	1	10	45	120	210	252	210	120	45	10	1								11
1	100	1	11	55	165	330	462	462	330	165	55	11	1							12
1	100	1	12	66	220	495	792	924	792	495	220	66	12	1						13
1	100	1	13	78	286	715	1287	1716	1716	1287	715	286	78	13	1					14
1	100	1	14	91	364	1001	2002	3003	3432	3003	2002	1001	364	91	14	1				15
1	100	1	15	105	455	1365	3003	5005	6435	6435	5005	3003	1365	455	105	15	1			16
1	100	1	16	120	560	1820	4368	8008	11440	12870	11440	8008	4368	1820	560	120	16	1		17
1	100	1	17	136	680	2380	6188	12376	19448	24310	24310	19448	12376	6188	2380	680	136	17	1	18
18	1800	18	153	816	3060	8568	18564	31824	43758	48620	43758	31824	18564	8568	3060	816	153	18	1	

i.e. +19.614747568666486078104998681753180 1 + 1800 + 19.614747568666486078104998681753180 1

Table 1 (2): Mechanism of acquisition of neutron mass

10^0	trunk	10^0	10^{-2}	10^{-4}	10^{-6}	10^{-8}	10^{-10}	10^{-12}	10^{-14}	10^{-16}	10^{-18}	10^{-20}	10^{-22}	10^{-24}	10^{-26}	10^{-28}	10^{-30}	10^{-32}	10^{-34}	line n°
1	100																			1
1	100	1																		2
1	100	1	1																	3
1	100	1	2	1																4
1	100	1	3	3	1															5
1	100	1	4	6	4	1														6
1	100	1	5	10	10	5	1													7
1	100	1	6	15	20	15	6	1												8
1	100	1	7	21	35	35	21	7	1											9
1	100	1	8	28	56	70	56	28	8	1										10
1	100	1	9	36	84	126	126	84	36	9	1									11
1	100	1	10	45	120	210	252	210	120	45	10	1								12
1	100	1	11	55	165	330	462	462	330	165	55	11	1							13
1	100	1	12	66	220	495	792	924	792	495	220	66	12	1						14
1	100	1	13	78	286	715	1287	1716	1716	1287	715	286	78	13	1					15
1	100	1	14	91	364	1001	2002	3003	3432	3003	2002	1001	364	91	14	1				16
1	100	1	15	105	455	1365	3003	5005	6435	6435	5005	3003	1365	455	105	15	1			17
1	100	1	16	120	560	1820	4368	8008	11440	12870	11440	8008	4368	1820	560	120	16	1		18
18	1800	17	136	680	2380	6188	12376	19448	24310	24310	19448	12376	6188	2380	680	136	17	1	0	

i.e. +19.614747568666486078104 9986817531801 + 1800 + 18.430443137293550572381186813617 01

5. Electrons, and Atoms

42:6.1 (476.3) “While the space charge of universal force is homogeneous and undifferentiated, the organization of evolved energy into matter entails the concentration of energy into discrete masses of definite dimensions and established weight—precise gravity reaction.” (see tables 1(1) and 1(2))

42:6.2 (476.4) “Local or linear gravity becomes fully operative with the appearance of the atomic organization of matter. Preatomic matter becomes slightly gravity responsive when activated by X ray and other similar energies, but no measurable linear-gravity pull is exerted on free, unattached, and uncharged electronic-energy particles or on unassociated ultimatons.”

6. Atomic Matter

42:7.4 (477.6) “The local universes are of decimal construction. There are just one hundred distinguishable atomic materializations of space-energy in a dual universe; that is the maximum possible organization of matter in Nebadon. These one hundred forms of matter consist of a regular series in which from one to one hundred electrons revolve around a central and relatively compact nucleus. It is this orderly and dependable association of various energies that constitutes matter.”

42:7.6 (477.8) “Stability of the atom depends on the number of electrically inactive neutrons in the central body. Chemical behavior is wholly dependent on the activity of the freely revolving electrons.”

7. Atomic Cohesion: Weak and strong nuclear interactions.

42:8.1 (478.5) “While gravity is one of several factors concerned in holding together a tiny atomic energy system, there is also present in and among these basic physical units a powerful and unknown energy, the secret of their basic constitution and ultimate behavior, a force which remains to be discovered on Urantia. This universal influence permeates all the space embraced within this tiny energy organization.”

7.1. Weak nuclear interaction.

42:8.3 (479.1) “The charged protons and the uncharged neutrons of the nucleus of the atom are held together by the reciprocating function of the mesotron, a particle of matter 180 times as heavy as the electron. Without this arrangement the electric charge carried by the protons would be disruptive of the atomic nucleus.”

42:8.4 (479.2) “As atoms are constituted, neither electric nor gravitational forces could hold the nucleus together. The integrity of the nucleus is maintained by the reciprocal cohering function of the mesotron, which is able to hold charged and uncharged particles together because of superior force-mass power and by the further function of causing protons and neutrons constantly to change places. The mesotron causes the electric charge of the nuclear particles to be incessantly tossed back and forth between protons and neutrons. At one infinitesimal part of a second a given nuclear particle is a charged proton and the next an uncharged neutron. And these alternations of energy status are so unbelievably rapid that the electric charge is deprived of all opportunity to function as a disruptive influence. Thus does the mesotron function as an “energy-carrier” particle which mightily contributes to the nuclear stability of the atom.”

42:8.5 (479.3) “The presence and function of the mesotron also explains another atomic riddle. When atoms perform radioactively, they emit far more energy than would be expected. This excess of radiation is derived from the breaking up of the mesotron “energy carrier,” which thereby becomes a mere electron. The mesotronic disintegration is also accompanied by the emission of certain small uncharged particles.”

7.2. Strong nuclear interaction.

42:8.6 (479.4) “The mesotron explains certain cohesive properties of the atomic nucleus, but it does not account for the cohesion of proton to proton nor for the adhesion of neutron to neutron. The paradoxical and powerful force of atomic cohesive integrity is a form of energy as yet undiscovered on Urantia.”

7.3. These two interactions (weak and strong nuclear forces) have been discovered, but not fully explained.

Conclusion

On basis of the constitution of neutron as illustrated on Tables 1(1) and 1(2) it is possible to determine the value of the Mesotron as well as that one of the weak nuclear interaction and the strong nuclear interaction.
This is explained in a more detailed paper about the structure of the neutron/proton, the nature of mass and antimass, the electromagnetism, as well as the weak and strong nuclear interactions.

I would like to underline that my work in Physics is about the ultimatons, the first material manifestation of matter/energy. Our technology is presently mastering the electronic level. The ultimatonic level is in reach at the theoretical level thanks to the discovery of the Higgs Boson. Then the technological level is the normal follow-up.

Mastering the ultimatonic level will allow three main technological applications:
-the understanding and mastering of gravity,
-the quantum computer development,
-the mastering of the atomic and nuclear level of the matter enabling a clean and abundant energy.

The mastering of the ultimatonic level has also other very interesting applications. As I said in the Symposium our brain is made of cells, molecules and finally neutrons, protons, and electrons. The neutrons, protons, and electrons are linked to the ultimatons as we know from the UB. The Materon I have discovered theoretically many years ago has been discovered in the form of the Higgs Boson. The Materon or Higgs Boson is giving their mass to the particles among them the neutrons, protons, and electrons. So, the Materon/Higgs Boson is made of ultimatons nested in the nether Paradise.

This means that our brain has an ultimatonic interface in the nether Paradise and that our spirit (ultimatonic brain) has a power on our material brain as described in the very interesting presentation by Jenny Martin.

This means also that our ultimatonic brain and body have an influence on our material body, and finally on our genes, this being the basis of epigenetics.

So, all is linked to the ultimatons, and the Materon/Higgs Boson made of them.
A new science will be created soon with the discovery of the first manifestation of matter/energy, i.e. the ultimatons.

We should be ready and go on with the discussions on these very interesting issues.