How to use Theory of Everything for saving earth?

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Abstract.

The story is a mix of science fiction, futurology, new technical ideas, science, science ideas of the author [1, 2, 3, 4], and philosophy. On an example of crisis of overpopulated human species in future, it is described how to develop a theory of everything, how to give more sense to amateur science, and how reactions of professional science regarding amateur science are too much inexact. Some ideas in the story are predictions of the author or are supported by him, and some are only for the course of story or for setting of special situations for thought experiments. Names in the story are taken from science, but they are not or almost not connected with their thoughts and descriptions in the story.

1. Momentary situation

It is a year 2049.

The problem of the earth pollution is essentially reduced, because people have realized that the problems of ecology are urgent to be solved. Energy is got from the sun, from thunderbolts, from all possible sources which are not very ecologically disturbing. For instance, most of the heat differences are transformed into electricity. They use electrical vehicles, which are also much more silent. Suddenly, the towns have become much more pleasant places for living. Economy is subordinate to ecology. Thus "to spend money" for what is necessary for the common good, not only "to spend money".

All food and water are much cleaner and healthier. Food is produced much closer to users. The "chess" method of food producing is developed - this means that many of harvests is planted on a small area. From the air, the field is visible as a chess board. This reduces multiplication of pests, because every plant has distinct pests, and thus they are more dislocated.

The needed quantity of pesticides is thus reduced. Every producer gives a lot of databases of plant growing process and national institutes search for correlations which inflict on a quality of plants and food. Search for correlations and then optimizations are part of every activity of life.

Almost every device which is bought has also its sensors and its analysis of its signals. Every producer knows that every device should be on biological principles. Namely, biology has shown us that successful organisms have not only motive functions, but also sensors (eyes, smell..), and brains.

A lot of devices exist at home which measure health of people and are also partially capable to analyze these data. Those data are given to physician and many times it is not necessary to go to physicians to find diagnosis. A lot of measuring devices exist in every home, because it was found that they are useful, so they are built in large numbers and cheaply. Thermo-scanners and measurers of weight are such devices. A person can lay down and measurer can measure distribution of mass over the body. DNA is analyzed in every moment together with other data enable to find a lot of correlations of diseases, although causes are not only genetical.

Easy accessible data of human health are on WC, what was mentioned already by Paracelsus. Thus, every WC is a biochemical laboratory and a processor of those data [5]. Data are used in the case of illness, for every day use, for reduction of epidemics, and for reduction of remedies.

One fear of people is to go to forest because of infected ticks. But when one comes from forest, s/he shows her/his body to a camera, and the camera recognizes ticks. Image analysis is a promising and very used topic. The problems of big animals are also reduced. When someone go to forest, a camera and other sensors soon recognize animals in closeness, including dangerous ones. Thus it is not necessary to reduce their number for safety.

They follow the number and movements of various big and small animals. Sensors are used in forests, in sea, and on animals. This also gives information about state of health of earth. Because they found that many animals have super-senses, this also help at weather forecasts, at earth-quake forecasts, at earth pollutions, etc, etc.

These are only some examples where high science and data analyzes are used every day.

But a new problem for humanity is appearing more and more. Number of people on earth will soon grow so much that there will be shortage of living space for all. The wars for living space will appear in not so distant future. Maybe it will be similarly as on the Australian island Fraser, where

dingoes kill cubs of other dingoes. Or even as in one lake where only one species of fishes live. They are cannibalistic and on that way preserve space for them.

A far solution is offered, of course, this is to built new planets and to colonize the moon and known planets. The problems are logistic, a huge quantity of materials and energy for such project, and how to provide that people will survive in non-natural conditions. The science of this time and of the next century is probably too weak to solve such problems.

2. The conference

Jarmo Makela is a science adviser in Finland's government. Now he is situated in science conference with the title "Will we save earth?". It was organized in honour of 150 years after the first contribution to quantum gravity theory, these were Planck's mass, distance and time. They discuss how the Theory of Everything (TOE) will help at solution for overpopulated earth. TOE covers quantum gravity theory and explanation of consciousness.

The topic in this moment is how to persuade people to invest in finalization of TOE. " It is interesting how a human life can be pretty independent from the knowledge of physical and philosophical background of this life. On the other side, because of their curiosity they spread all over the earth. Should we persuade them that this knowledge is important for saving earth?" is a question given by a presenter Mark Hadley. "No" he answers and continues: "I think that it is necessary to wake up genuine interest in TOE without argumentation why it is necessary to save the earth. I also cannot explain clearly how TOE should help to save earth, but my intuition tells me that it will help. But my intuition cannot persuade governments and electors. Thus I try to persuade people that it is well to fulfill their genuine curiosity for TOE. We know that brains of alive beings have the four main motivators for surviving:

- (i) To get a food and space,
- (ii) not to be a food,
- (iii) to be healthy, and
- (iv) to reproduce itself.

But, why so many people are interested in football, which is "the most important unimportant thing on earth"? Because it means symbolism for the first two points. So why I and the all audience here have so a big desire to discover a TOE, but a common person is not prepared to pay anything for it? In the meantime he wastes a lot of time and money for football, although it is only a symbolism. The answer is, because we cannot awake this curiosity for TOE. It is interesting that the religions and astrology awake a similar genuine curiosity, but enough curiosity has not been awakened by physics. Maybe the reason is because physics encloses from everything what seems charlatanic. But, let us think how many wars were induced by religions, so if we can find TOE, or the final truth of the universe, these disagreements which cause the wars would not happen again."

"But wars arise also because of atheism, because of fight for space, because of some ideas, because of lack of sense" one replica appears from audience.

"Yes, this is also true. It is also not yet confirmed whether atheism is in accordance with science. We need to explain consciousness to confirm this.

Thus, those four points maybe need also

- (v) How to live for survival of community and
- (vi) to live after death.

It will also be a big clarification, how it is with life after dead. If it exists, it will give hope and meaning for life, if it does not, we will not use time for religions any more. But all sense of physical world is information [6]. In principle, we are inclined and addicted with information and those six points are also crisscrossed with information. Maybe information is more primal than survival? It is not absolutely forbidden.

However, if a person is motivated, s/he has also the will. This will contains also inertia, for instance, if one found out that her/his motivation is wrong, s/he does not stop immediately. Therefore, for instance, the will for football can be the most important thing on earth for some people. Maybe the cause for alternative science is also in this inertia. Maybe this inertia is also in genes. An example of such inertia is also the *Superstring theory*. The opposite force can be given by some experiment, but experiments in the area of quantum gravity almost do not exist. Thus everything is dependent from logic, but will and motivation are also parts of logic. (It is said that no phenomena exist without measurer. But I speculate that the universe without emotions (consciousness) does not exist.)

Art is also a topic which is caused with wish and with will. (It is necessary to ignore art because of money, and to discuss art because of wish.) It seems that TOE is also similar as art, because many of us are occupied with it without an expectation being paid for it. We even spend our time and money for it. Also persons, named charlatans, mostly do the same free of earning business. This is also a proof that this wish arises when the first three points are fulfilled.

A question can arise, if a wish to find deeper reasons for explanation of everything around us is very deep. Is it possible to live without this wish?"

The next presenter is Phil Gibbs. Many years ago he established his electronic preprint archive viXra [7]. "I was attacked many times that no one paper appears on my portal which can be useful for science." he begins. "They claim that useful ideas can be given only by professionals, which can publish in arXiv [8], but not by amateurs, which are doing research in free time and they can publish only in viXra. Therefore I counted those useful papers and I made statistics. Yes, such papers exist which brought benefit to science. Still more, it is possible to calculate probability that a professional or amateur paper will be beneficial for science in dependence of time, money, intelligence of a researcher, help at research, and largeness of research group. It is even possible to estimate impact of gender part in the group [9]. Admittedly, amateurs are less intelligent in average than professionals, because professionals go through a larger number of selections. Amateurs have less time and no money for research, except their own money. But probability for correctness of their theories is not zero. On the other side, amateur's theories come across too little arguments for their rejections than professional's ones. Thus their (un)correctness is much less checked. We should know that influential statistical parameters are mainly distributed by Gaussian curves, or at least, probability never falls toward zero. Finally, because this is only probability, it is never sure that someone will not or will find TOE or anything other.

Now, there are too many over-reactions against alternative theories, too rigorous limitations who can publish, what s/he can publish, how s/he should to write, etc. Limitations are necessary, but they should be more precisely set, according to mathematical and statistical laws. For instance, natural selection respects that distributions of aptitudes are more Gaussian ones than rectangular

ones, but selection of physical theories does not respect this.

Thus, if we have enough large number of papers from amateurs, someone will give scientifically useful ideas. Thus, I predict that after discovery of a TOE it will appear that also some theories of amateurs are correct. Thus, maybe alternative approaches need to be respected with less prejudices.

Thus, it is useful to have such electronic preprint archive. Other sources for presentation of amateur science are FQXi [10], and Philica [11]. I propose that someone will search beneficial papers also in them."

The next presenter was Brian Josephson. "In the last years James Randi invited all parapsychologically talented person to prove statistically that they have these abilities. No-one has proven this. I have not come to him, because I should have an endorser from a university and I have not got him. But I got an endorser Phil Gibbs and so I am here to present my idea. Namely, parapsychological abilities are dependent from momentary inspiration and from relaxation of the mind. Those two things cannot be ordered. So I suggest that Randi should measure also relaxation, for instance with EEG. I suppose that so the correlation between relaxation and para-achievements will be shown. I even suppose that such inclusion in para-tests will show statistical significance more than five sigma. In the opposite case this can be maybe used as rejection of parapsychology, because relaxation is claimed as one the main parameters at parapsychological phenomena.

I propose also analysis of dreams. It is claimed that they are full of para-events. I propose also analysis of thoughts of schizophrenics. Their thoughts are similar phenomena as dreams. We need also a tool, how to systematize every day events and thoughts and then to analyze them statistically.

I propose also better reading of thoughts of animals, for instance of cats, and then observing para-phenomena. Simply, we need more money that para-phenomena will be proved. I have also not enough time and money to prepare such experiments. But, I am really surprised that no one succeeded to get the prize of Randi. " he ended.

"Charlatan, Charlatan" is heard when he leaves the tribune. The next presenter is Luca Turin. He was one of pioneers of quantum biology [12], and after his experiments, an experiment came which confirmed quantum biology [13]. Now he claims that he solved the problem of quantum consciousness. "All biology is quantum one, and consciousness is part of biology". Besides, he claims that he indicated a hint of life after death, because the same mechanism which explains quantum consciousness, maybe explains also life after death [14]. He mentions that our feeling of matter is from Newtonian physics [15], what we learned from experiences in childhood. "But real matter is quantum one, what is in principle much more strange and elusive than Newtonian matter. It is strange, how to have feeling for quantum matter, but I propose that this does not disagree that it is built up from primitive elements of consciousness."

Dissatisfaction in the crowd is increasing. Some are leaving the hall.

The new presenter is Jarmo Makela. "If we are more open to new ideas, and considering Gibbs calculations, we can predict how much we should to pay for science that we can obtain a TOE. What is more, it can be expected that TOE will give numerous other options to solve the planet:

- (i) Our experiences show that it is necessarily to understand physics to develop new technical innovations. Better understanding of physics gives better innovations.
- (ii) Let us say that computers will be developed which will tell us what to do, and how to answer philosophical problems.
- (iii) Maybe we can change our genetic code to be adapted to other planets.

- (iv) Maybe we can begin to live in virtual reality.
- (v) Maybe we can communicate with souls of dead peoples.
- (vi) Let us say that we can develop superluminal traveling through wormholes."

A mockery is heard from the audience as first, then loud laughter, and then someone shouts that "I will provide that you will lose your job of adviser, and you will lose every place in science." Then a shoe hits him in the head and then he should be driven with the ambulance.

In the next days an article appeared in a newspaper, where Debi Roberson tried to answer the question of where such explicit aggression come when orthodox science is defended. Debi found an answer in membership of the group, causing, for instance, squabbles between left and right in politics, or between two neighbouring nations. These squabbles can even cause wars. "Alternative healers really exploit patients many times. But scientists are so sure in nonexistence of benefits of alternative medicine that they want to be givers of justice. All ideas not connected with the orthodox science are subconsciously connected with earnings of alternative healers. Their fear against alternative healers is similar as fear of Hitler against Jews. Therefore such assault in a hall originated. The second cause for incident is that people have a brain mechanism that they preferably choose an option which other people chose. This happens many times even in the case when this option is illogical. People in big crowd are more asking "How (to follow this derivation)?" and lesser asking "Why (this is true)?". Chimpanzees, for instance, preferably choose a better option, not a more popular option. For instance, it is known that consciousness is unexplained, but this fact is not stressed in books for students. This is an example of subconscious avoiding of contrary arguments. Thus, arguments are less important than mainstream thinking." And she continues: "But, our decision-making based by emotions is inherited just from chimpanzees. Admittedly, this emotional component of decisions helps for fast decisions very well, but it is not the most proper for slow and more finely analyzed decisions. One example of it is overestimated authority according to logical arguments. Admittedly, all logical arguments cannot be analysed, but scientists do not see necessity to analyse any argument of amateur researchers. Thus, although they perfectly know statistical laws, they do not know that abilities are distributed by Gaussian curve and not by finite interval distributions. Thus, scientists incorrectly estimate probabilities for successful ideas and thus they do not read precisely theories where probability for correctness is not zero."

3. A decision for TOE and development of it

Afterwards, passions were calmed down in the course of time. Although main scientists and science advisers had not believed in various alternative usages of TOE for saving earth, they decided that they will support money for searching of TOE, and anyway they hoped that it will help to save earth and human race. Regarding maximal disposable money and according to Gibbs' calculations, they estimated that TOE will arise in the next ten years.

The first step was to increase a number of researcher, professional and amateur ones. They concluded that in the same way, as computer science had become common to a large number of people after launching of PC, the similarly will happen with the physics and neurology, which are pre-sciences of TOE. Additionally, the examples are known where some science research was done with help of volunteers on internet. In principle, differences in intelligence among people are not big, what means that science of large number of people is better than science of only an elite.

Thus, they made an effort to present pre-theories of TOE more clearly and they found out that here is still a big potential [15, 16, 17]. When those presentations were developed, the number of people who understood those theories was increased by factor 10. And some of those people also wrote their own theories. Admittedly, there was a larger number of theories which should be read, and number of poor theories also increased. But, some volunteers helped at this, and they also used some software for analysis and so they made some rough selection. All papers were in mp4 format, so it was possible to read and to evaluate them anywhere, also at recreation and at ride with a plane or a bus.

Later, United Nations began to pay this evaluation and some even became rich. They found out that such evaluation is worth to be paid, because they will develop universal system for other projects, not only for TOE. Otherwise, a big number of unemployed people is not suitable - we simply do not know to give them appropriate employments. But even unemployed people strongly on a left side of Gaussian curve could work something useful if ideas for work will be better and more systematic. This is good also for ecology and economy, because United Nations will find new needs. Thus a fear will be reduced that some companies will be without work when market will be saturated, thus they will produce products with long durability, although this will mean saturated market for this product.

They started to think, how to increase intelligence of researchers. Regarding the fact that internet has increased knowledge and also intelligence, they speculated that wiring of physical senses and inner memories will help at enlargement of intelligence. They found an idea how to do this, and one couple in love offered themselves for this experiment. They assigned and the researchers linked them up. Whenever she felt pain, he also felt pain, but it was less intensive. Whenever he was hungry, she was also hungry. This was happening for all senses. Her memories became his memories and vice versa. But the final results surprised them, although this was already predicted before - it was interesting that they began to behave as one personality. They also had become similar as a hermaphrodites, or something similar to this. He began to talk like a woman, she began to follow sport results and to write software code. Additionally, his body got also some woman's characteristics and her body got some man's characteristics.

But they did not suffer this wiring any more. So researchers disconnected their wiring. They were separated also physically, because they had no more withstood each other. Only memories remained, which were nice, but also unbearable. They hoped that these memories will become weaker that they will be free of this experiment.

Researchers repeated their experiment with siamese twins Krista and Tatiana. They also had shown signs of strange wiring before experiment, because they knew a lot of thoughts of each other and their mutual language was short, very specific, like with a lot of abbreviations. This experiment run with less problems than before, and it gave more useful results than before. Still siamese twins Abigail and Brittany Hensel gave very useful contribution to studying consciousness, and studying of impact of soul on body and vice versa.

Researcher thought over these experiments and they started to searching what at all consciousness is. Similarly, as quantum theory is a cause for matter it is maybe a cause for consciousness. This unexplained thing in quantum mechanics is quantum randomness, maybe here is a place for consciousness and free will. Namely, if consciousness is a quantum phenomenon, it is ubiquitous [14]. Thus, TOE includes consciousness and quantum gravity theory. Thus, they hoped

that those two things have the same source and that solution of the problem of consciousness will help to solve quantum gravity theory. Besides, experiments with consciousness are much cheaper and much more accessible. They hoped that they will not need to perform very expensive quantum gravity experiments.

They began to investigate thoughts and consciousness of animals. They were troubled that a sure indicator for consciousness of a person is only her/his assertion that s/he is conscious, thus only her/his memories are indicators. Indirect indicators are also correlations of behaviour and thoughts, predictability of behaviour, and similarity - if someone is similar to me, is conscious. Location of consciousness was also a challenge, because it is like a quantum phenomenon, and also a philosophical phenomenon [14, End of section 4].

But they succeeded to improve perception of consciousness essentially, they succeeded with reading of thoughts with EEG and fast MRI, with study of correlations and with the others.

Results of reading of consciousness surprised them. They noticed consciousness in the last phases of dementia, when they thought that people are in coma. Of course, they expected consciousness at all animals with brains, but they found consciousness at unicellular organisms [18] and even at plants. Admittedly, memories of this consciousness are weak and short, but they exist.

Now they started to test that consciousness lives everywhere also in inanimate matter, like Buddhism learns [14, 19]. They already had instruments for testing of such hypothesis - these were quantum computers, although not yet powerful enough. Someone approached his measuring device for consciousness close to quantum computer - and the device showed consciousness.

They developed an improved quantum computer and asked him, what is a foundation of TOE, and the computer answered "42" [20]. They looked into the skeleton of the computer, in the circuits, and they found a malfunction. They also found a mistake in software. They started the computer once again and it gave an answer:

$$\frac{3\mu_p^2}{2} = 42\exp(-\frac{2}{3\alpha})\tag{1}$$

The quantum computer gave also other answers which are written in [3].

Fotini Markopoulou interpreted those equations and thus she obtained quantum gravity theory. Then she connected this with theories of quantum consciousness and obtained TOE. It was shown that space is only an illusion, a similar illusion as space which is created by virtual reality. Similarly it was shown in the movie Matrix [21].

When they looked skeleton of this solution of TOE, they were asthonished when realized that Feynman already gave correct foundations for quantum gravity theory [22]. Because of non-renormalizability, no one has finalized his theory, but those problems were solved by grained spacetime.

They were also surprised that the purpose of the Higgs boson was a little changed, thus that a germ for particle masses was given before acting of the Higgs boson.

They also noticed that they had not taken advantage of some cheap experiments for progress of TOE, these are some measurements of black matter, such as measurements of big G at different times [23], variable alpha at distant galaxies [24, 25], and measurements of gravitational acceleration from satellites [26].

4. After TOE

Phil Gibbs searched old theories published in arXiv, viXra, FQXi, Philica, and in other amateur and professional archives and found that some theories were already published piece by piece, and some of them also by amateurs.

For instance, it was noticed Hawking's claim that black holes do not exist [27], but it was not noticed an amateur paper that the interior of a black hole does not exist [28, end of sec 3].

When the TOE was developed, it became clear about religions and it became clear that life after dead exists. This relieved life of humans, because it gave more sense to their lives. This also importantly reduced conflicts in the world. As more, they proved the existence of para-phenomena.

Thus they developed TOE, but they needed to apply it for salvation of humanity and the planet earth. Ideas and devices for the salvation began to taking shape. A new world was originating. This was a world where thoughts were more important than matter, and more and more they had realized that foundations of everything are thoughts. Some years before they found that the essence of quantum theory is in information and that information is quantized [6]. The next level of new world began. The whole earth became one new quantum computer, and border between people and other animals had become more and more blurring. Because space is only a secondary product of matter, they developed momentary trips in any location of universe, because where thoughts are there a person is.

Now, the matter was more and more alive. Dying has not been a painful experience any more, but it meant only a transition from one state of matter into another. And those two states were more similar than before.

But everything was not so well. If pressure on people is too low, if they only have more and more, but they do not do anything, they become spoiled and lazy, their abilities fall, and they become criminals. So they had to begin to perform selection. But after of performing the selection it always also showed their negative effects. Something was wrong. They remembered natural selection to which they were exposed in old times. They studied mathematical rules of this selection, which they started to practice. Similarly, as they incorrectly selected physical papers and so 150 years after the first contribution to the quantum gravity theory, it was not yet found. More precisely said, quantum gravity theory was a specific example, when measurements of it was not possible to execute, and everything was dependent from logic. Part of logic is also selection and this was not good. They had not learned their lesson and thus they had performed wrong selection in a new world until experiments in vivo were not warned them.

By the law [29, 30], living beings increase the entropy of the rest of the universe. More advanced beings are increasing entropy still more. For example, the most developed living creatures, mammals, need more food than reptiles, because they must maintain body temperature. People are demanding more energy than other mammals, and the most developed civilization need still more energy. Soon, humans filled all universe, and free space disappeared. But, all of them were so connected that all the universe became as one person. Therefore this "person" decided to make a new Big Bang.

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