VIRTUALICS: WHERE DID THE DIALECTIC?

Stasys Paulauskas
Strategic Self-Management Institute

Annotation

In this article author presents created and used in practice formalised development modelling theory Virtualics, which was applied for recognition of historic path of human world outlook from Physics, Metaphysics to Dialectics and Virtualics. It named on rhetoric question "Where did the dialectics?", which means the lack of existing methodological knowledge to give opportunities to forecast future of societal life. In the article are presenting Humanity's mental innovation virtual model, main trichotomies of the form and the content of World outlook change. Author shows how dialectical quality leap was transited to logical element 0-1, 1-0 of computing system, cybernetics used dialectical approach for virtualisation of World' relations in computers and internet. Developing from 1980th years Virtualics is successfully applied for recognition, modelling and innovation of large scale macro and micro transition processes. Author shows how it could be useful in recognition, positioning and sustaining of nowadays scientific, political, economic, and other challenges.

Key words: world outlook; physics, metaphysics; cybernetics, virtualics; innovation.

Introduction

Challenges of globalization, stagnation of economy, stopped development, blind virtualization, religious wars and human insecurity faces the problem of uncertainty of social being once again as it was many times in long Human history. In such historic breakthrough, as the lifebelt usually occurs a demand for new philosophical doctrines, approaches and World views pretended to explain the situation and find "a corner in a round room". In this article, we present one of them.

The main problem of such research is the blindness of Humanity, disability to provide a future of homo sapiens sapiens race at least for few decades. Achievements of science and forecasting technologies in physical world are superb – human can extrapolate physical laws to the past and to the future for billions of years. But why nobody can't to say reliably what is our nearest future of a social life?

From metaphysical point of view the answer is that humanity is too complex system, which is impacted by unlimited number of factors, to recognize and asses which the science is disable nowadays. Politicians, spirituous teachers and many irrational advisers tries to help, but unsuccessfully. At this regrettable situation, how to not remember the clever Dialectics, occurred in ancient time and purposive developed till end of Socialist system in 1990 when the Soviet Union was destroyed. Buddha, Heraclitus, Galileo Galilea, Georg Hegel, Friedrich Engels, Karl Marx and large constellation of materialist dialectics worked out not only dialectical world outlook, logic and ethics, but such theoretical approach was applied and was the main mode of life not only in Soviet Union, but in one sixth part of the World during 73 years (from 1917 till 1990).

But the try to apply dialectical approaches to societal life was unsuccessful. The Soviet Union and overall socialist community was destroyed. At the same time the dialectics was named as wrong cognition tool. And the World returned to the state of blindness with decision to not try to forecast a Future again. Dialectics left in universities as historical error and not appropriate philosophical doctrine. No body of scientists tried to still use such many thousands of years developed world outlook. Except the author of such article.

In published in 1985-year article „Dialectical world outlook "was invented, that according to Rene Descartes discovered mathematics as criteria of scientific trout, the verbal dialectics should be formalised. The profession of radio-electronics engineering was very helpful to formalise dialectical leap with use of logistical function. Dichotomic, trichotomic and virtual quality models were created as tools for modelling of natural development processes. Dialectics as methodology of dichotomic relations was synthesised to the Virtualics as methodology able to model polytomic relations.

The main aim of the article is to present the World outlook virtual model in scope of its form, content and contradiction.

Main hypothesis is that World outlook is changing permanently in fixed direction and logics from verbal towards formalised tools.

Main subject of the article is the virtual modelling of World outlook, which discovers tendencies and logics of Humanity development.

Main tasks are:
1. To discover Human World' outlook development general tendencies.
2. To discover conversion of Dialectics to Cybernetics.
3. To present some practical applications of Virtualics.

From the Physics to the Virtualics

Human ancestors – animals have mainly five senses with help of which they recognize and accepts the World: eyesight, hearing, taste, smell ant touch. The World outlook, accepted by senses is Physical World. So, basic World outlook is physical world, given to us by our senses.

Genetical invention of the Speech, as the form of homo sapiens sapiens life quality leap, gave ground for Metaphysical world outlook, in which abstract monotomic (one side relation) *thing* was started to use as universal model of particularity. Manipulating with words as names of such things humans can model the World for own existence needs. Metaphysics is the methodology of unchanging World, because in ancient times human life and its surroundings changes were unexpectable slow. Metaphysical World model looks like a picture – it consists of things, which aren't interconnected, exist separately. So, why for many years this world outlook was acceptable for everyday life. The time scale is absent and it isn't need in this World model, because here no changes, no interactions and no any development. Having no time scale metaphysics is unable to forecast the Future and the Past is conserved only in their memories.

However real World in opposite to metaphysical approach is the Change. It looks like permanent flow of changes – the video movie, which consist of metaphysical pictures – cadres. General forces of attraction and pull destines permanent interaction of particularities – of things, during which the mater, the movement and the information is transiting from one to other side. Quantitative changes accumulate in to qualitative changes. This model of changing world was named as Dialectical, consisting of dichotomic – two-side relation. Formalization of the relation gave opportunity to operate with poly-side relation models, which resulted name of virtual World and the theory was named as Virtualics.
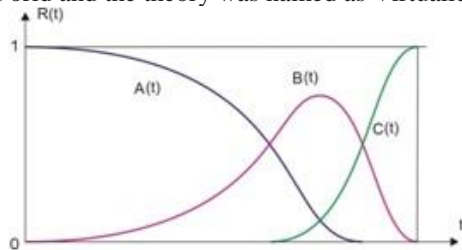

Fig. 1. Social relations' transition trichotomy (S.Paulauskas, 1985)

The virtual logics on help of trichotomic[1] virtual model (Fig.1) enables to construct the scope of essential changes of the form (Table 1.).

---

[1] Virtual trichotomy means three side relation or formalised version of triade of Jonatan Fichte/ Georg Hegel - https://en.wikipedia.org/wiki/Thesis,_antithesis,_synthesis

Table 1. World outlook form transition

Quality	Thesis	Antithesis	Synthesis	Earnings
World view	Things	Things, them conditions and relations	Virtual relations	Forecast's opportunities
Coordinates	x-y-z	x-y-z+t	K-t	See tendencies
Element	Atom	Particle	Leap	Universality
Methodology	Scholastics	Dialectics	Virtualics	Sustainable development
Logics	Formal	Dialectical	Virtual	Virtual modelling
Ethics	Loyalty	Criticism	Love	Love
Models	Verbal	Formalised	Digital	Certainty

Human history is the process of mental innovation of World outlook as dichotomy of the Form of human activity Kf(t) (Fig. 2), in which metaphysical approach is replacing by virtual.

Virtualics as quantifiable tool forms opportunities to change the content of human programming activity from verbal Politics to formalized Strategic Self-Management Kc(t). Such innovations process is going on trough virtual trichotomies (Table 2).

Table 2. World outlook content transition

Quality	Thesis	Antithesis	Synthesis	Earnings
Activity	Natural economy	Specialised economy	Virtual	No property
Social relations	Autocratic	Democratic	Liberal	No borders
Interaction	Verbal	Economical	Virtual	Internationalisation
Transfer	Things	Money	Information	Manual work reduction
Law	Leader's power	Law	Virtual self regulation	No crimes
Organisation	National	State	World	No wars

Politics as verbal form of Self-Management of a society due to lack of formalised tools can't play function of purposive programming, implementation and monitoring of common actions on basis of physical and

metaphysical methodology. Virtualics due to formalised tools is able to formalise modelling of development processes and more efficient and purposive assure sustaining and harmonisation of common activity of a society.
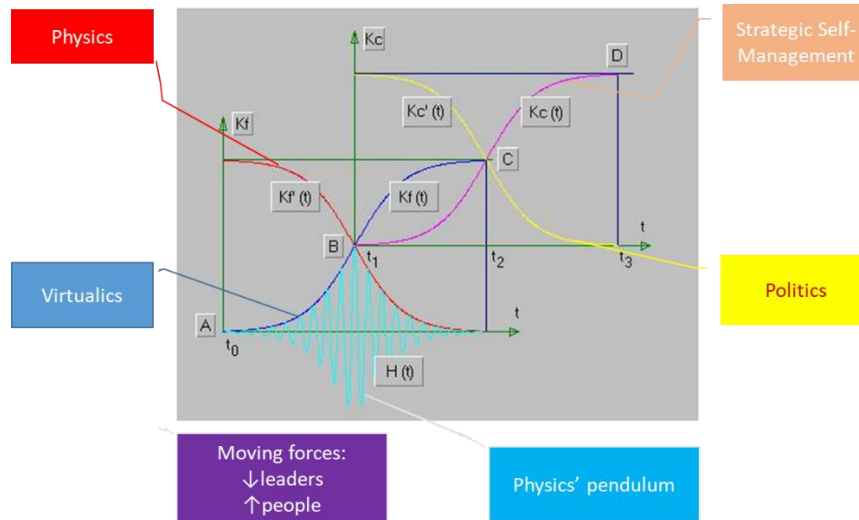

Fig. 2. Human's mental innovation virtual leap (S.Paulauskas, 1985)

The conversion of the Dialectics to the Cybernetics

Discovered verbal dialectical laws (quantity changes to quality, opposites interpenetrate, and negation of negation), dialectical relation, triade, dialectical logics, universality of quality leaps, scope of the form, the contents and contradiction of a system still as clever abstractions, which is very difficult to apply in practice except as means for political demagogy. So, verbal dialectics still without practical application till 1985.

Formalised quality of dialectical quality leap seems occurred independently from philosophical thinking in practical applications of electronic switches – logical Yes-No schemes in first electronic calculation machines.

Norbert Wiener - father of Cybernetics – created the science on management, managing systems, e.g. connections and information processes in life organisms, machines, technical systems and society in 1948. Dialectics was transformed to Virtualics – methodology of virtual modelling at 1985 by author of this article.

The work of each computer consists of 0-1, 1-0 transitions of quality leap. So, this device is the tool for modelling of transition processes by use of electronic switches. 0-1 is one **bit** of information. A virtual computer language Assembler was created, which uses symbols as combination of binary **byte** of information. Higher computer languages were created to manage modelling of changing reality. This combined by many quality leaps artificial visions named as Virtual reality.
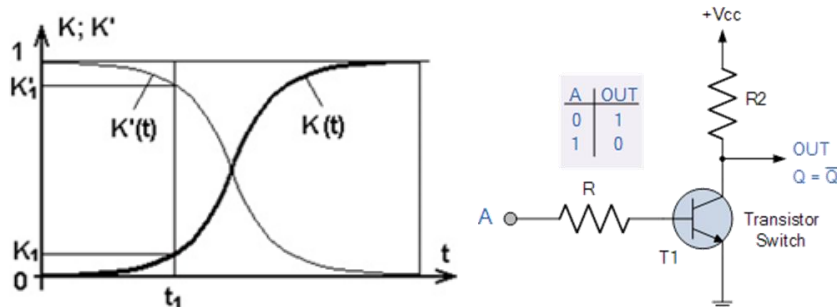

Fig. 3. Dichotomic virtual model and logical "Yes-No" Switch.

So, Virtualics discovered that dialectics was not disappeared, but it was formalised and materialised in rapidly growing computer networks and internet.

Practical applications of the Virtualics

However, the Virtualics could be used significantly larger, comparing to PC and internet applications. The Virtualics is modern Ontology, Methodology, Logics and Ethics. It discovers unlimited opportunities for right positioning of World development trends. Virtualics is the reliable key for right positioning of science, politics, management, education, technologies, social relations and each other spheres of changing reality.

The Virtualics was born during the search of means for stop destruction of Soviet Union in 1980th years. In

1985 was occurred evidence, that this big society lost attraction and eccentric forces activated. The reason of that was decelerating growth of works productivity, showed stopping of innovation processes. In 1985 year constructed by author virtual model of Soviet Union showed destruction of the State in 1991. The forecast proved correct – the Soviet Union no longer.

The more, "the dirty water was drained and the child" – the Dialectics was doomed. Was it the big gnostic catastrophe? I don't think so. Because soviet materialist dialectic and historic dialectic left verbal and not appropriate for rational practical use. Political order and public opinion was turned against everything related to former Soviet Union for many years.

Formalisation of dialectics and creation of Virtualics was my sweet long target aim. I decided to establish private institute of scientific research and consultations in 1991, which was reregistered to Strategic Self-Management institute at 2002. The aim was to construct virtual global development spiral.

With proud I can state, that this work is going on successfully. Quality leaps of our Universe, of the Life, of the Human are just modelled. My students learn virtual models of transition of Technologies, Energy, Transport, Communication, Education, Health, Culture, Politics, etc.

Such trends we use for exceeding innovation activity as advance culture of European Union and Humanity. Knowing future progressive qualities, we can forecast – to invent future and to create business prior the market will be ready for its products and services. Following Bill Gates' and Elon Musk's exceeding of the time examples, students receiving tasks to become millionaires' trough design and implementation of innovation projects.

The profession of Genius was recognised and self-assessment tool on innovation abilities was created, which could be accessed at iGenius link.

Participating in European movement DiEM25 virtualics was applied to nowadays European Community development problem, which is quite like situation in former Soviet Union in 1990. The scientific article on such matter was published and disseminated trough this movement network. Unfortunately, dominating metaphysical methodological culture doesn't give any opportunities to humans to see real picture of changing world and find right solutions of actual challenges for now. The Virtualics was created to help on that.

Conclusions

In opposition to physical World the societal life is weak forecasting due to lack of reliable methodological tools and outlooks, what result blindness of Humanity face to challenges of globalization, stagnation of economics, stopped development, blinded virtualization and religious wars.

World outlook is developing from Physics, Metaphysics to Dialectics and Virtualics according to dichotomy of form of human mental innovation.

Formalisation is not only as indicator of scientific quality, but it is necessary synthetic stage development

of each past theoretic system, which joins different spheres of human activity. Formalisation of Dialectics occurred naturally trough conversion of verbal terms into virtual tools like dichotomy, trichotomy, virtual model of quality leap, joining the form, the content and contradiction of natural system.

Dialectics as methodology grounded on two-side relations is transforming into Cybernetics as universal model of quality leap implemented as electronic switch started virtualisation of human being in nearest future. Formalisation of Dialectics lead to creation of Virtualics, as formalised World outlook, development modelling methodology, logics and ethics.

Virtualics is universal methodology for positioning and modelling large scale macro and micro quality leaps and construct overall World development spiral, what is aim and practical achievements of author of the article.

In opposition to verbal political rite Strategic Self-Management based on virtual modelling is progressive quality and tool for modelling and sustain development of human societies.

The profession of Genius was recognised and self-assessment tool on innovation abilities was created, which could be accessed at iGenius link.

References

Grant, Ted; Woods, Alan (2003), *Dialectical Philosophy and Modern Science, Reason in Revolt, Vol.2 (American ed.), Algora Publishing, ISBN 0-87586-158-X, retrieved 26 September 2010*

Grant, Ted; Woods, Alan (1995), *Reason in Revolt, Marxist Philosophy and Modern Science, London: Wellred, ISBN 978-1-900007-00-9 text replication at Marxist.com*

Ernst Schumacher and Joachim Neugroschel. *(1967-1968).* The Dialectics of "Galileo". Vol. 12, No. 2 (Winter, 1968), pp. 124-133

G.W.F. Hegel, Phenomenology of Spirit, translated by A.V. Miller with analysis of the text and foreword by J. N. Findlay (Oxford: Clarendon Press, 1977); Paragraph 179, Pg. 111.

Norbert Wiener (1948), *Cybernetics: Or Control and Communication in the Animal and the Machine.* Paris, (Hermann & Cie) & Camb. Mass. (MIT Press) ISBN 978-0-262-73009-9; 2nd revised ed. 1961.

Hollitscher, Walter (March 1953), *"Dialectical Materialism and the Physicist", Bulletin of the Atomic Scientists*, **9** (2): 54–57*, retrieved 26 September 2010*

Lefebvre, Henri; John Sturrock (translator) (2009), *Dialectical Materialism*, Minneapolis, Minnesota: *University of Minnesota Press*, *ISBN 978-0-8166-5618-9, retrieved 26 September 2010* First published 1940 by *Presses Universitaires de France*, as Le Matérialisme Dialectique. First English translation published 1968 by *Jonathan Cape Ltd.*

Makstutis, A., Paulauskas S., Smaliukiene R. (2008). Harmonous development of the State and Society, *Vadybos šiuolaikinės tendencijos. Collection of scientific works*. General Jonas Zemaitis military academey. *ISBN 978-9955-423-69-0. Vilnius, 20*08. –P.175-184.

Paulauskas S. (2016) Towards European Union Strategic Self-Management/ Management - Journal of Management. Lithuania business university of applied sciences, ISSN 1648-7974. Klaipeda, Lithuania. 2016, № 2(29). -P.51-56.

Paulauskas S. (2015) Virtual self-assesment tool iGenius. http://www.virtualika.lt/iGenius/. Strategic Self-Management Institute, Klaipeda.

Paulauskas, S., Paulauskas A. (2008). The virtualics and strategic Self-Management as tools for sustainable development, *Technological and economic development of economy*, Baltic journal on sustainability, Vilnius Gedimino Technical university. 008. 14(1): –P.76–88.

Paulauskas, S. (2008). Sustainable security: the virtual approach, *Actual management tendencies*, Collection of scientific works. General Jonas Zemaitis military academy. ISBN 978-9955-423-69-0. Vilnius, 2008. – P.275-296.

Paulauskas, S. (2000). Democratic Self-Management. How to improve the Governance of the State Lithuania/ *Collection of articles.* Joint Stock Company "Eksponente". Klaipeda.

Paulauskas, S. (1999). Self-Management Dialectics. Theory, methodology models, *Monograph.* Klaipeda University. Klaipeda.

Paulauskas S. (1991) Dialectical Model of Democratic Revolution. "Lithuanian economy", Nr.8. p.24-25.

Paulauskas, S. (1989) Politology and Self-Management. "Time and events", Nr.11, Vilnius.

Paulauskas, S. (1985) Dialectical World Outlook. "Science and Technique", Nr.11. p.24-26, Vilnius.

William, C., Mitchell, Randy T Simmons. (2011). Beyond Politics. *Markets, Welfare and the Failure of Bureaucracy,* http://www.independent.org/publications/books/summary.asp?id=34

Stasys Paulauskas, doctor of philosophy (applied sociology), professor, establisher and head of Public Institution Strategic Self-Management Institute (from 1991). Author and innovator of methodological systems Virtualics, Anthropogeny, Sociogeny, Technogeny, Strategic Self-Management, Responsible Energy, Sustainable Innovation, which are applied to fields of education, maritime, ITC, energy, business, culture, etc. trough large scientific research and innovations and participation in international programmes of UNDP GEF, Leonardo da Vinci, Erasmus, Interreg IIIa, South Baltic and Baltic Sea region. Main specialisation is introduction of Strategic Self-Management in different levels of social organisations. Baltijos pr. 123-61 LT-93224 Klaipeda, Lithuania; +370 655 39295. ssi@eksponente.lt, www.eksponente.lt