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ABOUT ALLAIS EFFECT AND EARTH'S ELECTROCONVERGENCE

BY

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Abstract. The matter I have to deal with and over come is to build a relational theory of interaction as the one according to which "Allais effect" is a natural result of relations among natural bodies/Earth's electromagnetic fields variation and anomalies Allais pendulum movement. I assume the definitions of the natural body, the (ge)entropic matrix of natural body, the natural body matrix of predominant influence, the electroconvergence of the natural body and the interposition between natural bodies in terms of the well-known previous notions. The Earth and itsen tropic matrix interaction (especially, Ps, Pv, Po and Pvvortex) depending on the impact of environmental flows (Sun, Moon, planets). It reveals the connection between "anomalies" pendulum movements and systematic and sudden variation energy of the location of the block, due to interaction between Earth's matrix and Sun, respectively, Moon matrix (eclipse phenomenon, alignment/conjunction of celestial corps, etc.).

Keywords: effect Allais; paraconical pendulum, Earth's matrixelectro-convergence, *Pv*, *Po*, *Pv*, *Pv*\vortexes/EM fields.

1. Introduction

Natural body was considered either as the primary object of the world (Thales, Heraclitus Parmenides, Empedocles) or an abstract concept (Anaximander, Antiphon, Zenoof Citium, Zenoof Elea) be used as the basic

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element for the development of the atomic theory of matter (Leucipiuus, Democritus, Epicurus). The philosophy separates the real world in her existence (ontic) and "the world" of constructs (ontological) (Aristotel, 1995; Crivoi, 2012). Science operates according to the scheme: hypothesis- prediction-denial- rejection of the hypothesis Fig. 1.

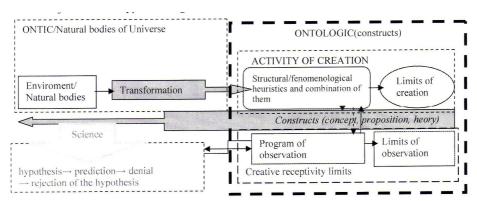


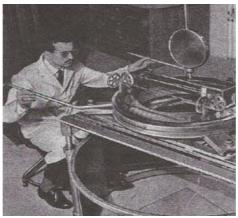
Fig. 1 – Scheme relationship between ontic and ontological (electroconvergence's of natural bodies in the Universe paradigm).

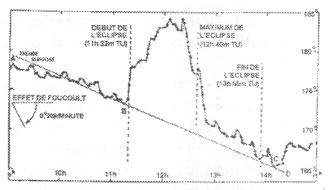
The present work discusses Allaisexperiment (experimentum rucis) who confirm the veracity of the theory of (electro) convergence of natural bodies (Aristotel, 1995; Eberhard, http://www.goede-stiftung.org/...). Maurice Allais started the fuss by conducting an experiment at his Paris laboratory in which he released a Foucault pendulum every 14 minutes - for 30 days and nights recording the direction of rotation in degrees. It just so happened that the experiment coincided with the 1954 eclipse, and it was during the solar phenomenon that the pendulum took an unexpected turn, changing its angle of rotation by 13.5 degrees. Allais said the rotation of the pendulum was normal both before and after the eclipse. The angle φ between an arbitrary orientated linethrough the origin and the Y-axis is the nautical-azimuth. For a "normal" pendulum the bob's angular velocity in the X-Y-plane was first calculated in 1851 by G.B. Airy as: $\omega_0 = \pm p(1-a^2/16l^2) \times 3/8 \times A/l \times a/8$ (Allais, 1959), Fig. 6 b (Heck, http://www.goede-stiftung.org/...). The effect Coriolis causes rotations of A in dependence of the observation place's latitude L: $\omega_{Cor} = \omega_{Earth} \sin L$. In M. Allais' think, near-isotropic paraconical pendulums did not show the Airy effect (for local perturbations) in any measurable way, making their angular velocity equal to: $\omega = \omega_{\text{Cor}} + \omega_{\text{Allais}} = -\omega_{\text{Earth}} \sin(L) \pm \sin[2(x - \varphi)]$. The last term:

$$\omega_{\text{Allais}} = \pm \sin[2(x - \varphi)], \tag{1}$$

is referred to as Allais effect term in this text. M.Allais does not define parameter k. Parameter x in the Sinus, following M.Allais, is the azimuth of his

effect on Earth's surface (Allais, 1999). He later repeated the experiment and got similar results. But his work has polarised scientific opinion. Some had said there were flaws in the Frenchman's methods, whilst others claimed to have witnessed the unusual effect as well (Eberhard, http://www.goedestiftung.org/...; Răzlescu, 1984; Russell Bagdoo, http://www.iasoberg.com/...). Explanations have included the anisotropy of space – the condition of having different properties in different directions – gravitational waves and solar radiation. The 1999 total eclipse will help to settle the arguments. Laboratories on four continents have set up pendulums and gravity meters to test the effect. The high number of participants will help to eliminate any systematic errors from skewing the results. He later repeated the experiment and got similar results.





Effects of a solar eclipse upon a paraconical pendulum. (After M.F.C. Allais).

Fig. 2 – Effect of solar eclipse upon a paraconical pendulum (The Allais effect) (Allais, 1959).

Eclipse effect were studied by Javerdan, Rusu, Antonescu, Olenici, Mihaila, Saxl and Allen, Tomaschek, Mishra and Rao, Kamerlingh

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Onnes, Wanand Yang, Leo Savrov, and other. The results were mixed and debatable. The construct (paradigm/theory/proposition/concept) is born and dies but observation dates remain for new interpretations.

2. About (Electro) Convergence's Natural Bodyparadigm

Theoryof (electro) convergence of natural body is based on two assumptions: a) natural body defining "Aristotle place"/space/universe; b) movement ("fall" of Aristotle "place") personalizes local time /space by inducing elicoidal/curviliniar movement that initiates, maintains and transformes natural bodies (electro) convergence of the structural-phenomenological universe, Fig. 3.

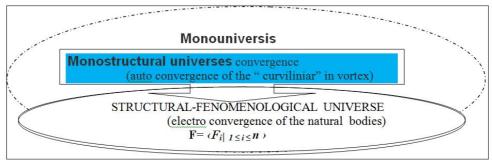


Fig. 3 – **Structural-**phenomenological **Universe** (natural bodie s electroconvergence).

"Small infinity" is characterized by uniformity. "Potential" and "local update" is due to the heterogeneousand further, the appearance of systems. The electroconvergence's paradigm allows building a relational theory of space whereas it is based on ontological concepts "natural body" (Aristotel, 1995; Crivoi, 2014). Time T and space, S (sizes/global properties of the material world) are linked in the process of formation/transformation of natural bodies. "Natural Body" (P) constitute the factual "item"/"thing"/effect that personalises (meta) physicalany pair (σ) , [space, time] of natural bodies multitude, Σ , from the universe. Each property, p_n, of a natural body, P, can be represented through a specific function: $\mathbf{F} = \langle F_i | 1 \le i \le n \rangle$. Theforms of motion (electric, magnetic, termic, mecanic,...,) ensure the matrix natural bodie's/corps interactionwith the environment/ Natural body/corps of preponderant influence. Each interaction categorie between the natural body and environment can be associeted with a transpher of generalised charges between matrix of the natural bodies. The charge can be effective (electrical charge) or conventional charge in another situation. The variation of the internal system energy is the consequence of "generalized infinite small deformation" dX (X:F – mechanical strength, a – liniar acceleration, p – pressure, V – electrical potention ...) under the action of generalized force, $\hat{Y}(\hat{x/\phi} - \text{linear/angular displacement}, m - \text{mass}, H - \text{liniar})$ momentum), according the relation:

$$dU = \sum \delta L_{\text{def}} = \sum_{i=1}^{n} X_{i} dX_{j},$$

analysis of the body naturallyon different levels of the (Ortho)existence is possibleusing the relation: $\Sigma xS \to R$, where S, is themultitude of the conceivaible unit systems(size/quantity). Each value of the function F, is anatural bodie'staterelative to the environment/context. Every natural body has its own state space. The sum of all the same states is called the concevaible state space. Property low-likespace of a natural body constitute a subset S_{Lx} , of concevaible property space, Figs. 3 and 4.

According to the associated sizes the natural bodycan be imaginary, virtual (nonmass), real (mass). "Natural nonmass body"/("aristlle place") is the factual item of thestructural organisational and functional nonobservable Universe emergence where the phenomena and the conversion does not prevail (orthoexistence). "Natural mass body" defines structural and phenomenological Universe. Each naturalbody/corp has a "matrix". The matrix represent the space of causal and random potentiallymanifestation. "Entropic body mass matrix" represents the space of manifestation of potentialityspace and potential causal random natural body".

Natural body/corps of preponderantinfluence" represents the natural body/corps of interaction whose (entropic) matrixmaterializes the causal potential and the random potential of the natural body/corps, Figs. 3 and 4. Matter's conjugated movement form assures the interaction.

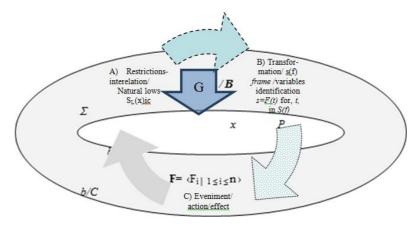


Fig. 4 – Concevaible state space (a), respectively, law-like space of a natural body, (b) (Crivoi, 2012) *G* – gravitational interaction.

The local natural corpstransformation (effect)is directly related with the structure, the organization and the functions according to the scheme:

Effect = Stucture + Organisation + Functions.

According this scheme can be interpretates Universe's natural bodies and experiment's dates of observation. The structural-fenomenological

Universe is the result of natural (non)massbodie's electroconvergence (neutrin, foton,...,) and natural mass bodie's/corps electroconvergence (..., neutrin/foton, neutron/electron proton, ...,comet, satellit, planet, star, galaxie,...,) (Crivoi, 2005).

2.1. About Earth's Electroconvergence and Effect Allais

Earth's/planet's electroconvergence is a level of natural bodies electroconvergence in the Universe. The Earth (multistratum spherical screen) with her entropic matrix (cylindrical shape plasmatic layer) generates its structure, organization and functions at the micro level and macro level according with the parameters of the influenced matrix corps of Universe. The Sun is the natural body/corps of preponderant influence for Earth's environment interaction. Them esurements (Fourbush) demonstrated the priority of the

corpuscular Sun radiation on the Earth. "The solar wind" (i = q = dq/dt

electrical flux, $m = \mathrm{d}m/\mathrm{d}t$ – mass flux, $S = \mathrm{d}s/\mathrm{d}t$ – entropical flux, H = ma – boost mechanical flux) impact the Earth and interactes with her matrix in terms of conjugated motion matter forms (Earth matrix, Sun matrix). Earth embedded within entropic matrix, P, and placed in the entropic matrix of the Sun, S, (especially influenced the natural body/corp of Earth's) is structured, organized and interaction functions as power/energy, w, given by:

$$\rho w_{P} = \rho u_{P} + \rho \frac{v_{P}^{2}}{2} + \rho \varphi_{P} + \left(\frac{1}{2} \varepsilon_{P} E_{P}^{2} + \frac{1}{2} \mu_{P} H_{P}^{2}\right) + \rho g_{E} r_{S} + \rho g_{E} r_{L}$$
 (2)

where: ρ is the density of volume, u – specific internal energy [J/kg], v_P – velocity of the earth [m/s], φ – chemical potential (mass), E – electrostaticfield strength [V/m], H – magnetic field and the amount of energy characterizing the electromagnetic field which propagates with [Oe], c – the speed of light [m/s], g – gravitational/electrostatic [m/s 2], r – the distance between the Earth and the body electrostatic influence [m], (E) predominant (Sun-S, respectively, Moon-L. with the electrical charges, q_S/q_L), Fig. 4 (Aristotel, 1995; Bunge,1984; Crivoi, 2005; Crivoi, 2014; Crivoi, 1994; Crivoi & Bursuc,1994; Crivoi, 2012). The energy is a physical size that depends on the instant physical condition of the system".

2.1.1. Earth's Electroconvergence

According to "(electro)convergence effect" (Crivoi & Bursuc,1994) the solar wind plasma current strongly ionized constantly emitted by the Sun, formed of protons and electrons-having the density of 200-800 kilometers per sec,.- due to the impact with the Earth, the wind laminates kinetic parameters and electrical one of what differentiates from the fluidic medium in which penetrates. According to the (electro)convergence effect the continue cylindrical

"local" influence (Cooper neutron/electron pair decupling) converges in macroscopic area $(4a/S_{Pv})$. There is maintained in the inner area of the layer (3a) a minimum (electrostatic/barometrical) centre (-M) and a maximum centre (+M) in (electro)convergence area $(4a/S_{Pv})$ which determines a transit movement of plastic mass between these two point/zones (-M, +M). The cylindrical layer (3a) continually eliminates the charged mass particles $(m^-,$ m^{+}) from inner area (-M) by through mechanical inductance and interactions of electrostatic origin; so, this movement of electrostatic charge (6a) took place continually between M(-) and (M+). This "printed field" (6a) has as "source" environment and "the transport phenomena" triggered in the (electro)convergence area (4a). This "transport phenomena"in electrostatic frame maintains and generates the coaxial movement of the plasmatic penetration current (6a), coaxial and opposite cylindrical layer (3a). This coaxial movement of the "printed field" (6a) determines an electromotive tension whose consequence is the appearance of a rotate moment (Mr) which simultaneously actions on the two plasmatic currents (3a, 6a,), Fig. 5 a. Having both the mass and the speed smaller than of the layer (3a) the penetration current (6a) is strongly submitted to on action of twisting so that additionally to the movement of transition there is a rotation one. This penetration plasmatic current (6a) becomes vortex, with a continuous accelerated rotate movement, as the departure appears from the (auto) convergence area (4a), during is movement towards the Earth. The vortex movement unleashes the separation an electrical charge (m+, m-) on radial peripherical circuits according to their mass (m_{ion} , m_{electron}), Fig. 5 a (Crivoi & Bursuc, 1994). Plasmatic particles will have an spiral trajectory function your mass and charge. There are preponderant "linked" smallerparticles mass ($m_{\text{electron/positron/neutrino/...}}$) in the penetration current (6a). The amount of the particles that executes spiral movement determines a fluidoelectrical (self), 6a, which generates an electromagnetic field, Pv. The phenomenom is caracterised by the fact that it "link" the movement of lectrostatic particles (m+, m-) so the lines of growing electromagnetic field, as it getting done to the Earth. The electromagnetic field generated by plasmatic masses from the penetration vortex (6a) by the vector (magnetic moment), Pv has the North Pole on the Earth-Sun axe in the elliptical plan at the distance between 50,...,150 kilometers from the Earth, and the South Pole in the area of (electro)convergence, $(4a/S_{Pv})$. The electromagnetic field of the vortex, Pv, close themselves penetrating the Earth's atmosphere. The parameters of vectors, \overrightarrow{Pv} , (and, environmental/local, \overrightarrow{Pv} prim, generated by protonic/plasmatic layer, 3a) are function by the variation of the Sun matrix (environment parameters/solar "wind", relative position between the Earth and Sun/Moon, and other). The (electro)convergence realized by the interaction between Sun matrix /"solar wind" and the Earth entropic matrix is characterized by the presence of the two specific circuits for the electrostatic charged particles: a) the (preponderant) spiral ionic circuit (m⁺, e⁺) on the route: current/vortex, (6/6a) – the connection spiral cone (8a) – the cylindrical layer, (3a) – (electro)convergence area (4a) – environement, and b) the (preponderant) spiral electronic circuit (m^-, e^-) on the penetration vortex route (6a) between the mirror of electromagnetic belonging to the effect (Np_v, S_{pv}) .

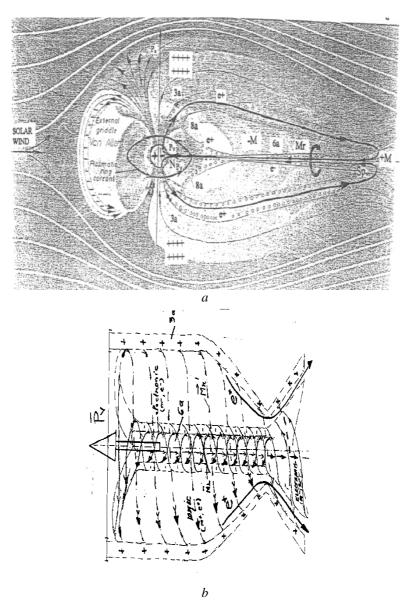


Fig. 5 – The (electro)convergence Earth's effect: a – Earth'/planetar's electroconvergence; b – Pv vortex (m^+ , m^- circuit) (Crivoi, 2005).

3a – the continue proton cylindrical layer; $4a/(S_{Pv},+M)$ – the electroconvergence area where aredecoupled/excited "pair electrons/neutrons Cooper"; (-M) – the (inner 3a)/minimum (electrostatic/barometrical) point/center; (+M) – extremum point in (electro)convergence area (4a); (6a) – the penetration current (coaxial vortex) has as "source" the environment /" the transport phenomena" triggered" in the (electro)convergence area $4a/(S_{Pv})$; (8a) – the connection spiral cone; Mr- rotation moment, \overrightarrow{Pv} , \overrightarrow{Po} , \overrightarrow{Ps} , (-) – the magnetic moment of the vortex, Pv, Po, Ps; e^+ – proton in (3a); e^- – electron /neutron (6a); (+)/(-) – positive/negative polarization of the Earth/Van Alenn griddle; N_{Pv}/S_{Pv} – North/South pole of the vortex (field electromagnetic), \overrightarrow{Pv} .

NASA articles demonstraites the fact that "the magnetotail [...] and Earth's magnetic tail extends at least 200 Earth radii in the anti-sunward direction well beyond the orbit of the Moon at about 60 Earth radii, while Jupiter's magnetic tail extends beyond the orbit of Saturn. On occasion Saturn is immersed inside the Jovian magnetosphere" (https://www.sott.net/article/ 229308-Planetary-Alignments-and-the-Solar-Capacitor-Things-are-heatin-up). The inner griddle "Van Allen" appears as a consequence of some possible nuclear reactions between the cosmic particles of high energy. This inner griddle "Vann Allen" (Po and Ps vortex) realizes the energetic exchange between external griddle "Vann Allen" and the Earth. The differentiated polarity of the Earth (body) ("+", for the terrestrial area faced to the Sun and ,"-, for the darkened terrestrial area) made by the Sun matrix, determines the polarization and differentiated of the electrostatic particle from external griddle "Van Allen"/all griddle (- , +). According this different polarized area combined with Earth's/microbodie 's electroconvergence can be defined local intra/peri/terrestrial paraconicall pendulum interaction/effect 14). permanent Earth"s electrostatic dis-equilibrium generated by the (electro)convergence effect combined with differentiated polarisation of the external griddle "Van Allen" (-, +) by the Earth (+, -), determines a massive continuous ring shaped movement of the electrical charges in the internal griddle (ring shaped current/ring vortex) together with the appearance of a field electromagnetic vector, Po, perpendicular on plane of the ecliptic, figure 6a. This conclusion contradicts the actual theory according to which a magnetism of the body from the cosmic space is given by the rotation of that body. The giromagnetism theory cannot explain the periodical changing of the magnetic field polarity of the body from the cosmic space. The penetration of the electromagnetic field line, \overline{Po} , in plasmatic medium property (of) the Earth (atmosphere, crust) generates a electronic circuit/(spiral vortex), e, and inner ionic ring circuit, e+, shaped on induced by the first current (e⁻), Figs. 5 and 6 a. This conclusion contradicts the actual theory according to which a magnetism of the body from the cosmic space is given by the rotation of that body. The giromagnetism theory cannot explain the periodical changing of the magnetic field polarity of the body from the cosmic space. The penetration of

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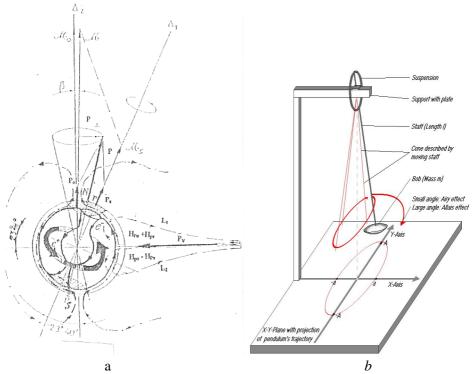


Fig. 6 – The magnetic moment of the electromagnetic field, Po, Ps, Pv and paraconical pendulum: a – earth's vortex (EM fields) Pv, Po, Ps (Crivoi, 2005); b – Paraconical pendulum (http://www.flyingkettle.com/allais/eclipses.htm).

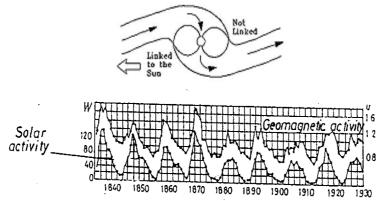


Fig. 7 – The empirical correlation on long term between non gravitational activity of the Sun and geomagnetic activity (Popescu, 1981).

The electromagnetic fields lines L_1 , L_2 of the penetration vortex, Pv, following the route with greatest magnetic permeability (the contact area of the inner plasma of the Earth with the terrestrial surface what has lower temperature than Curie temperature, $T^{\circ} < T^{\circ}_{\text{Curie}}$) cross with the electromagnetic field lines given by the vortex/electromagnetic field, \overrightarrow{Po} , shaping both the electronic, e-, and ionic, e+, circuit to the or donated and ring shaped movement of ionic mass, inner Earth decentred with 400 km from the centre of the Earth in plane which makes an interaction electromagnetic fields Po, Pv, it is its own electromagnetic field of the vector, Ps angle 23°40' with, \overrightarrow{Po} . Finally this electromagnetic field, Po, determined the telluric currents that engage the tough of the earth in the rotation movement. According planet's electroconvergence, the transfer mechanism of the energy from theSun matrix (the preponderant influence body) to the Earth's (Earth-Moon dipole) entropic matrix suppose gravitational and nongravitational (electric, magnetic, electromagnetic,..., entropic) interaction. There is a empirical confirmation of this mechanism (theory), Figs. 6,...,7) (Crivoi, 2005; Crivoi, 2014; Crivoi & Bursuc,1994; Crivoi, 2012; Popescu,1981). Any variation of the environment (Sun matrix, local matrix) parameters is felt by the (electro)convergence effectof the planet (Earth) and materialized in local variation of natural bodies parameter of the vortexes/ electromagnetic fields, Pv, Po, Ps (structure, organization, function) who interactions with paraconical pendulum.

2.1.2. The Allais Effect in Electroconvergence's Natural Bodies Paradigm

According actual theories the rotation of the semi-major axis A with an (azimuth) angle φ relative to Y caused by Airy Effect and Coriolis Effect. Together has the angular velocity:

$$\omega_{\text{Airy}} = \frac{d\varphi_{\text{Airy}}}{dt} + \frac{d\varphi_{\text{Cor}}}{dt} - \mp p \left(1 - \frac{a^2}{16l^2}\right) \cdot \frac{3}{8} \cdot \frac{A}{l} \cdot \frac{a}{8} - \omega_{\text{Earth}} \sin L.$$
 (3)

But ω_{Airy} is small: a pendulum with l=1 m, A=0.08 m and $a\leq 0.001$ m will take at least up to 66663 s or 18 h 31 min. for a full rotation of the large A around Z. In Europe –latitude $L=50^\circ$ N- a full Coriolis rotation takes 112787 s or 31 h 20 min (Heck, 2012). M. Allais modified pendulums during the years from 1954 to 1960. For Maurice Allais's paraconical pendulums (with nearisotropic suspensions by using a very hard material for the plates the pendulum staffs' pins or balls rest on, $\omega_{Airy}=0$), the rotations of their semimajor axis' A should only be subjected to the Coriolis effect, making their angular velocity equal to: $\omega=\mathrm{d}\varphi/\mathrm{d}t\approx\omega_{Cor}\approx-\omega_{Earth}\mathrm{sin}\ L$. Maurice Allais's paraconical pendulums bob rotations showed, that sometimes and especially in times of solar eclipses, a much higher angular velocity ω than M. Allais had anticipated, namely:

$$\omega = \omega_{\text{Cor}} + \omega_{\text{Allais}} = -\omega_{\text{Earth}} \sin L \pm k \sin[2(x - \varphi)].$$

In his Nobel Prize autobiographical speech, Allais stated, "My main idea at the start was that a link could be established between magnetism and gravitation by observing the movements of a pendulum [...]. I obtained positive effects, but with other devices I obtained no effect whatsoever....all these phenomena are quite inexplicable within the framework of the currently accepted theories". Acording natural bodies electroconvergence paradigm natural landing mass natural bodies emergences is fundamental matrix of the structural-functional Universe Figs. 4 and 8. Neutrinoflux, JdV, unbalanced spatial neutron matrix, N, (1) and maintains atransport phenomenon and displacement(in counterflow) of entities(pre) mass, m_i . For reasons of logic presentation, we associate pulsating neutrino mass rotating blade/spine, m_i , respectively, neutrino mass, $m_N = \rho dV$, an electric charge, q = Dm, where D is the universal magnetic constant.

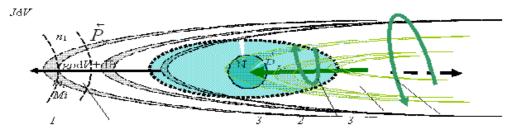


Fig. 8 – Electroconvergence of the micro natural corp, N, (...,neutron/proton/atom,,...,) (Bunge,1984): I – clothneutrinos Mi, penetrates the transverse plane of neutrinos, n_I ; 2 –substantial body wave induced environmental, m_i ; 3 – moment of rotation of the blade, Irespectively mass, m_i ; Pv, IPv – autoconvergence vortex magnetic moments (coupling) of underground neutrino, Mi, respectively, m_i .

To describe the dynamics of micro natural body, N, with mass, $m_N = \rho dV$, is associated with the force of gravity, $dV \rho g$, and neutrino flux, JdV, (mass moving entities induced environmental) magnetic force, $J \times BdV$, so that it follows the equation for mass magnetic interaction between natural bodies: F = pdV + JB. In the event that all neutrino substances, Mi, of the moving with the same spee Dv, the resultant current of matter, $J = \rho Dv$, so that equation (2) can be written as:

$$F = \rho (g + Dv + B). \tag{4}$$

Formula (3) represents the equation of gravity for the mass unit of the substance [6]. From the content of formula (3) result joint mass interaction (falling corps) owed the interaction of magneto-mass primary neutrino spenetrating cavities/interstices in the impact area with standing wave sassociated with a natural mass corps, generally, Fig. 8, bob (mass), specially,

Fig. 6. Magnetic component of the electromagnetic field, \overrightarrow{P}_{a} , is detected on

Earth, while the magnetic component of the electromagnetic field, $\overrightarrow{P_s}$, is detectable referential not involved in the rotation of our planet. The geographic coordinate system resulting magnetic moment vector of the Earth

 $\overrightarrow{P} = \overrightarrow{P}s + \overrightarrow{P}_o$ is on average $\overrightarrow{P} = \overrightarrow{P}_o = 7.9 \times 10^{25}$ gauss cm³ from Blackett. The natural Microsystems (,..., neutrons, ...,) electroconvergence of the bob (mass M), Fig. 6 b, "weighted" and move this function Earth'systematic energy variation (diurnal, monthly,...,) and sudden energy variation at Meridian place's paraconicall pendulum (eclipses, occultation, earthquakes, tsunami, magnetic storm, local terrestrial/ocean/periterrestrial conductor operator descharged). According natural bodies electroconvergence paradigm, the gravitational local variation (effect Allais) is linked with the variation of the Ps, Po and Pv vortex ex (and local conductor operator discharged) parameters (Crivoi, 2005; Crivoi, 2016; Crivoi & Bursuc,1994; Crivoi, 2012). The Earth is nuclei of the vortexes Po/Ps. The interaction between Earth's Pv, Po, Ps vortexes with Earth's periterrestrial zone generates Coriolis effect, $\omega = d\varphi/dt \approx \omega_{Cor} \approx -\omega_{Earth} \sin L$. Intime (diurnal, monthly, ...) the systematic "anomalies" movement of the paraconicall pendulum are function Earth's vortexes/magnetic field sparameters variation who interactes with bob (mass), thus:

 $\overrightarrow{P} = (\overrightarrow{P}S + \overrightarrow{P}_{v})$ - for Earth's periterrestrial day zone; $\overrightarrow{P} = \overrightarrow{P}_{o}$ - for Earth's

terrestrial/oceanic day zone, $\overrightarrow{P} = (\overrightarrow{P}s + \overrightarrow{P}_v + \overrightarrow{P}_o)$ - for Earth's periterrestrial

night zone ($h \ge 150$ km), 40° north latitude, $\overrightarrow{P} = (\overrightarrow{P}s - \overrightarrow{P}_v + \overrightarrow{P}_o)$ – for Earth's

periterrestrial zone ($h \ge 150$ km), south latitude = 0,...,40°, $\overrightarrow{P} = \overrightarrow{P}s + \overrightarrow{P}_v$ – for Earth's terrestrial night zone, Fig. 6 a, b (Crivoi, 2005; Crivoi, 2016; Crivoi, 2012). Coriolis effect largely depends on disturbances in the surroundings of a paraconical pendulum, mainly of smaller or bigger vibrations of the soil. The large angle of bob (mass) φ_{place} respectively ω_{place} can produce by the natural (terrestrial, ocean, periterrestrial circuit/current, eclipses, transit, occultation,...)conductors operator discharged, ω_{COD} , or/and artificial disturbances, ω_{AD} , whose add with ω_{cor} , namely:

$$\omega_{\text{place}} \approx \omega_{\text{cor}} \pm \omega_{\text{COD}} \pm \omega_{\text{AD}} \approx \omega_{\text{cor}} \pm \omega_{\text{Aiery}} = -\omega_{\text{Earth}} \sin L \pm p \left(\frac{1 - a^2}{16l^2} \right) \cdot \frac{3}{8} \cdot \frac{A}{l} \cdot \frac{a}{8Po}.$$
 (5)

The measurement showed that relative position between Earth's matrix and natural body/corps matrix of preponderant influence (eclipses, transit, conjunction,...,) can sudden changes of $\Delta\omega$ or $\Delta\varphi$. For example, a measurement cycle of about 50 days showed these coincidences (48%) of sudden changes of $\Delta\omega$ or $\Delta\varphi$ per time t with zenith passages of Sun, Jupiter, and Moon (Heck, 2012).

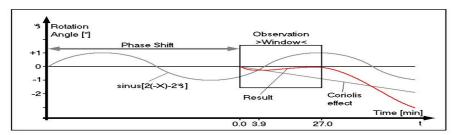


Fig. 9 – Sketch of a measurement of φ *versus t* with the IGF paraconical pendulum (Heck, 2012).

Acording Earth' electroconvergence the Allais effect is in fact Airy effect with a large angle, $\varphi = \varphi_{place}$. The large angle of the bob (mass) is caused by Coriolis effect modified by Aiery Effect an isotropic vortex ex Po, Ps, Pv caused by anisotropic environment (terrestrial, periterestrial, ocean,...) and anisotropic lunar and solar gravity.

3. Conclusion

Acording bodies natural electroconvergence paradigm Allais effect is connection with disturbances in the surrounding of the pendulum.

REFERENCES

Allais M., Should the Law of Gravitation be Reconsideration? Aero/Space Engineering, 1959.

Allais M., The Allais Effect and my experiments with the Par. Pen. 1954-60, Memorandum for NASA, 1999.

Aristotel, Fizica, Edit. Moldova, Iași, 1995.

Bunge M., Stiință și filosofie, Edit. Politică, București, 1984.

Cone G., Optica electromagnetică a mediilor anizotrope, Edit. Tehnică, București, 1990.

Crivoi D., About Natural Bodies Movement of Universe, Anuarul UPA, 1, 9-27 (2014).

Crivoi D., Allais Experiment - A Crucial Experiment Regarding the Electro Congruence of Natural Bodies Out of Universe, Anuarul UPA, I, 23-45 (2012).

Crivoi D., Bursuc C., *Propulsor Fluido Electric*, Lucrările sesiunii cu tema "Conceperea și realizarea navelor, armamentului și tehnicii de luptă pentru dotarea marinei militare"., **1**, 105-120, Institutul de cercetări al Marinei Militare, Constanta, 1994.

Crivoi D., *Electroconvergența Pământului*, Edit. Performantica, Iași, 2005.

Eberhard Zentgraf, *Measuring-Results with a Paraconical Pendulum Apparatus*, Source: http://www.goede-stiftung.org/en/images/IGF/Experiments/Allais/allais-effect-paraconical-pendulum-measuring-results-part-.pdf.

Erde Marinescu A., Staicu Șt., *Elemente de mecanica zborului spațial*, Edit. Tehnicã, 1997.

Goodey T., The Shearing Hypothesis and Allais Eclipse Effect. Source: http://www.flyingkettle.com/allais/eclipses.htm.

- Heck A., *The Paraconical Pendulum (Allais-Effect) Reconsidered*, Source: http://www.goede-stiftung.org/en/images/IGF/Experiments/Allais/E-Allais-Pendel-homepage-1.pdf.
- Popescu N.I., Gravitația, Edit. Științifică și Enciclopedică, București, 1981.
- Radcenco Vs., Termodinamica generalizată, Edit. Tehnică, București, 1994.
- Răzlescu. N. et al., *Pricipiile separării magnetice a materialelor*, Edit. Academiei R.S.R., București, 1984.
- Robert N., Pfeifer C., *Momentum of an Electromagnetic Wave in Dielectric Media*, Reviews of Modern Physics, **79**, 4, 1197-1216 (2007), source: espace.library.uq.edu.au/view/UQ:134757/UQ134757_OA.pdf.
- Russell Bagdoo, Link Between Allais Effect and General Relativity's Residual Arc During Solar Eclipse, source; http://www.iasoberg.com/Allais_Effect_and General Relativity.pdf.
- Ștefănescu Eliade, Sisteme disipative, Edit. Academiei, București, 2000.
- van Flandern T., Allais Gravity and Pendulum Effects During Solar Eclipses Explained, source: www.eclipse2006.boun.edu.tr/sss/paper01.pdf.
- * * Space; Planetary-Alignments-and-the-Solar-Capacitor, sourse: https://www.sott.net/article/229308-Planetary-Alignments-and-the-Solar-Capacitor-Things-are-heatin-up.

DESPRE EFECTUL ALLAIS ȘI ELECTROCONVERGENȚA PĂMÂNTULUI

(Rezumat)

Problema pe care ne propunem să o rezolvăm este să construim o teorie relațională a interacțiunii, ca fiind cea în care "efectul Allais" este un rezultat natural al relațiilor dintre corpurile naturale și variațiile câmpurilor electromagnetice ale pământului și anomaliile mișcării pendulului Allais. Presupun definițiile corpului natural, matricea (ge) entropică a corpului natural, matricea naturală a corpului influenței predominante, electroconvertarea corpului natural și interpunerea între corpurile naturale în termenii noțiunilor anterioare binecunoscute. Pământul și interacțiunea cu matricea tropicală (în special, Ps, Pv, Po și Pv \ vortex) în funcție de impactul fluxurilor de mediu (Soare, Lună, planete). Acesta dezvăluie legătura dintre mișcările pendulului "anomalii" și energia sistematică și de variație bruscă a locului obiectului, datorită interacțiunii dintre matricea Pământului și Soare, respectiv matricea Lunii (fenomenul eclipsei, alinierea / combinarea corpurilor celeste etc.).