

Table of Contents

Volume 4 Number 1

January 2018

Analysis of Maxwell's Equations. Cosmic Magnetism

V. S. Netchitailo.....1

Gedankenexperiment for Contributions to Cosmological Constant from Kinematic Viscosity Assuming Self Reproduction of the Universe with Non-Zero Initial Entropy

A. W. Beckwith.....8

Gedankenexperiment, Assuming Nonsingular Quantum Bounce Friedman Equations Leading to a Causal Discontinuity between Pre Planckian to Planckian Physics Space-Time Regime

A. Beckwith.....14

A Hydrodynamic Model Including Phase Transition and the Thermal Motion Induced Transverse Momentum Distributions in p - p Collisions at LHC Energies

Z. J. Jiang, D. F. Xu, Y. Zhang.....20

Analysis of the Expansion of Space and a Theory of the Big Implosion

P. Gradenwitz.....31

Showing Fjortof's Theorem Does Not Apply for Defining Instability for Early Universe Thermodynamic Potentials. Asking If Nucleated Particles Result at/before Electro-Weak Era Due to Injection of Matter-Energy at the Big Bang?

A. Beckwith.....48

Is Temperature Quenching in the Early Universe Due to Particle Production, Or Quantum Occupation States, Or the Influence of Quantum Teleportation?

A. W. Beckwith.....60

Do Physical Laws/Physics Parameter Constants Remain Invariant from a Prior Universe, to the Present Universe?

A. W. Beckwith.....68

Setting Time as Purely Imaginary in Regime of Space-Time before Causal Barrier and Planckian Space-Time

A. W. Beckwith.....92

New Procedure for Delineating the Mass of a Higgs Boson, While Interpolating Properties of the Scalar Singlet Dark Matter Model

A. W. Beckwith.....96

The Photometric Maximum in Cosmicflows-2

L. Zaninetti.....123

Thomas Precession by Uniform Acceleration and Gravity

M. Pardy.....132

Supplying Conditions for Having up to 1000 Degrees of Freedom in the Onset of Inflation, Instead of 2 to 3 Degrees of Freedom, Today, in Space-Time

A. W. Beckwith.....143

Dynamo Speed Control and Tectonics—Modeling Earth as a Shunt Wound DC Machine

G. Poole.....152

The Matter-Antimatter Asymmetry Problem

B. A. Robson.....166

Variational Principle in an Expanding Universe

G. Guido, G. Filippelli.....179