

PRIMORDIAL NOTHINGNESS, INFORMATIONAL POTENTIALITY, AND THE THEORY OF OBJECTIVITY:

a critical–propositional analysis of Yaniv Riz’s article as an
operational bridge of dialogue with contemporary physics,
without replacing the complete cosmogonic theorem of TO

Vidamor Cabannas

Denivaldo Silva

Authors’ note: This analytical text counted on the analytical support of ChatGPT.

Feira de Santana - Bahia

2026

Contents

ABSTRACT	3
1 Introduction	4
2 The analyzed article as an operational bridge of dialogue between TO and contemporary physics	5
3 The foundational bibliography of TO and the modal anteriority of Nothingness	6
4 Primordial Nothingness, Antagonistic Tempus, and informational potentiality	7
5 The initial perfect sphere and the total globalizing sphere as geometric and modal-logical language	8
6 The Expansive Inducer Effect, the creation of universal space, and the beginning of time-counting	9
7 UiT as a partial physical-informational formalization, not as a replacement for the cosmogonic theorem of TO	10
8 Boundary, distinction, and information: the Fourth Absolute Truth in dialogue with Riz	11
9 Field, aura, phase signature, and uniqueness of the element	12
10 Infinity, non-element, and the logical limit of the universe	13
11 Double observation, objectivity, and relational validation	14
12 Composition, memory, and previous elements	14
13 Transcendent element, knowledge, and atomic radiation	15
14 The cosmological Eras of TO and Riz's informational reading	16
14.1 The Antagonistic Era	16
14.2 The end of the Antagonistic Era and the Expansive Inducer Effect	16
14.3 The Era of Logical Tracks	16
14.4 The Era of Logical Currents of Tertiary Plasma	16
14.5 The Centrifugal Era	17
14.6 The Era of Intelligence Units	17

15 Points of tension between the analyzed article and TO	17
15.1 Nothingness is not merely “nothing registered”	17
15.2 UiT does not replace the cosmogonic theorem of TO	17
15.3 The perfect sphere is not merely informational potential	18
15.4 The total globalizing sphere is not merely a sum of registers	18
15.5 Time in TO is born from the end of the Antagonistic Era	18
16 Propositional contributions of the article to TO	18
17 Final considerations and dialogical score	19
Bibliography	20
Appendix in TO style	22
Appendix A — Expanded cosmogonic statement	22
Appendix B — Hierarchical relation between TO and UiT	22
Appendix C — Final formulation	23

ABSTRACT

This article presents an expanded critical–propositional analysis of Yaniv Riz’s 2026 paper *Primordial Nothingness as Maximal Informational Potential: A Physical-Interpretive Bridge between the Theory of Objectivity and Unified Informational Theory*, published on Zenodo with DOI <https://doi.org/10.5281/zenodo.20139535>. The analysis argues that Riz’s article should be understood as an operational bridge between the Theory of Objectivity and contemporary physics, especially through informational language, but not as a replacement for the complete cosmogonic theorem of the Theory of Objectivity in its own modal, geometric, and logical language. Special attention is given to the foundational and recent bibliography of the Theory of Objectivity, particularly the notions of Antagonistic Tempus, the initial perfect sphere, the total globalizing sphere, and the Expansive Inducer Effect, which creates universal space and initiates the counting of time at the end of the Antagonistic Era. The article concludes that Riz’s interpretation of primordial nothingness as maximal unregistered informational potential dialogues strongly with the Theory of Objectivity, provided that the modal primacy of TO is preserved.

Keywords: Theory of Objectivity; Vidamor Cabannas; Denivaldo Silva; Yaniv Riz; Unified Informational Theory; Primordial Nothingness; Antagonistic Tempus; Perfect Sphere; Expansive Inducer Effect; Universal Space; Modal Cosmology; Atomic Radiation.

1. Introduction

Yaniv Riz's article *Primordial Nothingness as Maximal Informational Potential* represents a relevant contribution to the contemporary dialogue between the Theory of Objectivity, hereafter TO, and the physical–informational languages emerging in cosmology, informational ontology, and attempts at conceptual unification among time, force, memory, phase, and registration.

The relevance of the article lies in its proposal to read Primordial Nothingness as maximal informational potential not yet registered. This thesis is formalized by Riz through the relation:

$$I_{pot} = I_{pot}^{max}, \quad I_{dist} = 0, \quad I_{disp} = 0. \quad (1)$$

This expression suggests that, before physical distinction, there is neither distinguished information nor dispersed information, but there is a maximal condition of potentiality. It is a useful approximation to the First Absolute Truth of TO, according to which:

Nothingness is a Primitive and Eternal Mathematical Essence.

However, the present article argues that this approximation must be interpreted rigorously. Riz's article is an operational bridge of dialogue between TO and contemporary physics, but it does not replace the complete cosmogonic theorem of TO in its own language. TO possesses a modal, geometric, and logical–ontological structure that precedes any physical–informational translation.

The foundational bibliography of TO, especially *Teoria da Objetividade: terceira teoria de origem do universo, alternativa à Teoria do Big Bang e ao Criacionismo* (Cabannas and Silva 2016), *THEORY OF OBJECTIVITY* (Cabannas and SILVA 2018), and *A ESFERA PERFEITA* (Cabannas and SILVA 2020), presents a cosmology of its own, grounded in Nothingness, Antagonistic Tempus, the initial perfect sphere, the total globalizing sphere, the Inducer Effects, and the cosmological Eras of TO.

Thus, Unified Informational Theory, hereafter UiT, may assist TO as an operational language of contact with contemporary physics, but it should not be confused with the cosmogonic core of TO itself. TO does not arise from UiT; rather, UiT may be interpreted as a possible partial language for translating aspects of TO into the vocabulary of information physics.

2. The analyzed article as an operational bridge of dialogue between TO and contemporary physics

The first point to be emphasized is that Riz's article performs the function of a bridge. It should not be read as a substitute for TO, nor as a correction of its modal structure. Its merit lies in attempting to show how certain concepts of TO may receive a physical–informational reading.

TO works with categories such as Nothingness, boundary, element, aura, infinity, observation, composition, and substance transcendent to the quantum. Contemporary physics, in turn, operates with categories such as field, information, entropy, registration, phase, symmetry, measurement, force, mass, proper time, and propagation.

Riz's article attempts to bring these two languages closer together. By proposing that Primordial Nothingness be understood, at the physical–interpretive level, as maximal unregistered informational potential, it offers a possible translation of the First Absolute Truth into a language accessible to contemporary physics.

This translation is useful because it allows bridges to be established with:

1. information physics;
2. theoretical cosmology;
3. theories of registration and memory;
4. debates on emergent time;
5. relational ontologies;
6. theories of measurement and observation;
7. models of field, phase, and force.

However, the bridge is not the territory. Riz's informational language does not replace the proper language of TO. It functions as an operational mediation. The complete cosmogonic theorem of TO requires its own internal categories, especially:

- Nothingness as a primitive and eternal mathematical essence;
- Antagonistic Tempus;
- initial perfect sphere;
- total globalizing sphere;

- Inducer Effects;
- Antagonistic Era;
- Era of Logical Tracks;
- Era of Logical Currents of Tertiary Plasma;
- Centrifugal Era;
- Era of Intelligence Units.

Thus, the analyzed article should be valued as a contribution to dialogue, but not as an ontological replacement for TO.

3. The foundational bibliography of TO and the modal anteriority of Nothingness

The foundational bibliography of TO establishes that Nothingness cannot be reduced to physical emptiness, empirical absence, or a measurable pre-cosmic state. Nothingness is a primitive and eternal mathematical essence. This claim is decisive because it places TO at a level prior to that of conventional physics.

In *Teoria da Objetividade: terceira teoria de origem do universo, alternativa à Teoria do Big Bang e ao Criacionismo*, Cabannas and Silva propose a third cosmogonic path: neither a purely explosive origin in the physical sense of the Big Bang taken as an absolute event, nor an origin explained directly by a theological creationist act, but a modal origin grounded in the objective logic of Nothingness (Cabannas and Silva 2016).

The 2018 English version expands this ambition by presenting TO as an alternative theory of the origin of the universe, capable of dialoguing with science without being reduced to the dominant cosmological paradigm (Cabannas and SILVA 2018). *A ESFERA PERFEITA*, in turn, deepens the geometric and modal language of TO, showing that the perfect sphere functions as a figure of primordial intelligibility, not as a mere ordinary physical object (Cabannas and SILVA 2020).

The recent bibliography of TO, in turn, has sought to build operational bridges with physics, artificial intelligence, testability, and modal ontology. Texts such as *From Modal Axioms to Empirical Contact* and *Modal Ontology and Testability* show that TO does not reject the need for empirical contact, but demands that such contact be disciplined by the modal hierarchy of the axioms (Cabannas and Silva 2026a; Cabannas and Silva 2026b).

In this context, Riz's article should be read as part of this movement: it assists the passage from modal language to operational language. However, it does not rewrite

the foundation of TO. The anteriority of Nothingness remains modal, and not merely informational.

4. Primordial Nothingness, Antagonistic Tempus, and informational potentiality

The notion of Antagonistic Tempus is essential for understanding the cosmogony of TO. Before the emergence of universal space and before the counting of physical time, TO describes a primordial antagonistic condition. This condition should not be confused with chronological time prior to the universe. It is a modal structure of antagonism among logical powers, originary tensions, and possibilities of differentiation.

Antagonistic Tempus designates a primordial phase in which the logic of existence has not yet manifested itself as space, physical time, and matter, but already contains the tension necessary for differentiation to become possible. The term “Tempus” should not be understood as physical time measured by clocks, but as a modal condition of anteriority, tension, and possibility.

At this point, Riz’s proposal dialogues well with TO. When he describes Nothingness as:

$$I_{pot} = I_{pot}^{max}, \quad I_{dist} = 0, \quad I_{disp} = 0, \quad (2)$$

he offers an operational reading of the condition in which there is maximal potentiality, but still no distinction or dispersion. This formulation may be interpreted as a physical–informational approximation to Antagonistic Tempus.

However, TO goes further. For TO, Antagonistic Tempus is not merely an absence of registration. It expresses a modal tension prior to space and physical time. In it, the possibility of differentiation has not yet become an actualized boundary, but it is already under the logical pressure of antagonism.

The fundamental distinction is the following:

TO	UiT/Riz
Antagonistic Tempus	State of maximal informational potentiality
Pre-spatial modal tension	Absence of registered distinction
Logical–cosmogonic anteriority	Physical–informational pre-registrational limit

Origin of expansive induction	Condition of conversion of potential into registration
-------------------------------	--

Therefore, Riz offers a useful language for partially translating the condition of Antagonistic Tempus, but TO preserves its own language: Antagonistic Tempus belongs to the modal structure of universal genesis, and not merely to a regime of unregistered information.

5. The initial perfect sphere and the total globalizing sphere as geometric and modal-logical language

The notion of sphere is one of the geometric keys of TO. In *A ESFERA PERFEITA*, the sphere should not be interpreted merely as a three-dimensional geometric object. It is modal-logical language: it represents completeness, originary symmetry, intelligible closure, and the condition of totality.

The initial perfect sphere corresponds to the primordial condition of logical symmetry of Nothingness. It is perfect not because it is a physical body already situated in space, but because it expresses the maximal formal coherence of the primitive mathematical essence. Before physical space, the initial perfect sphere is a figure of modal intelligibility.

The total globalizing sphere, in turn, represents the logical totality of the universe in the process of constitution. It is not merely the “size” of the cosmos, nor an ordinary spatial bubble. It is the modal figure of integration of everything that passes from the condition of potentiality to the condition of objective existence.

From this perspective, Riz’s language of potential sphere and realized sphere may dialogue with TO, but with a decisive reservation. When Riz speaks of potential and realized, his language is physical-informational. When TO speaks of the initial perfect sphere and the total globalizing sphere, its language is geometric, modal, and logical.

The relation may be summarized as follows:

TO category	Modal-logical function	Approximation in Riz
Initial perfect sphere	Primordial symmetry of Nothingness	Maximal informational potential
Total globalizing sphere	Logical totality of the universe	Realized sphere of registers

Passage spheres	between	Modal cosmogony	Conversion of potential into distinguished information
Expansion		Inducer effect of universal space	Growth of realized information

This approximation is productive, but it must respect the difference of level. The initial perfect sphere is not simply a reservoir of information. It is the logical figure of primordial perfection. The total globalizing sphere is not merely a sum of registers. It is the modal totality in which elements, boundaries, relations, observation, and informational transcendence are integrated as an existential universe.

6. The Expansive Inducer Effect, the creation of universal space, and the beginning of time-counting

One of the most important deepenings required by the bibliography of TO concerns the Expansive Inducer Effect. In the cosmogonic narrative of TO, the Antagonistic Era does not end through simple chronological passage. It ends when the tension of Antagonistic Tempus produces an expansive induction capable of creating universal space.

This point is decisive. For TO, universal space is not an initial presupposition. It is produced. Before the Expansive Inducer Effect, there is no universal physical space in the full sense. There is modal condition, antagonistic tension, and logical possibility of differentiation. Space emerges as a consequence of expansive induction.

The sequence may be formulated as follows:

$$\textit{Nothingness} \rightarrow \textit{Antagonistic Tempus} \rightarrow \textit{Modal Tension} \rightarrow \textit{Expansive Inducer Effect} \quad (3)$$

$$\textit{Expansive Inducer Effect} \rightarrow \textit{Universal Space} \rightarrow \textit{Beginning of Time-Counting} \quad (4)$$

The end of the Antagonistic Era therefore marks a logical-cosmogonic event: the creation of universal space and the beginning of time-counting. This does not mean that before it there was “physical time standing still.” It means that before the formation of universal space there was not yet the regime in which temporal counting could operate.

Here Riz's proposal is especially useful, but partial. When he suggests that time emerges from informational registration, through a relation such as:

$$dt^* = \frac{dI_{dist}}{dI_{disp}}, \quad (5)$$

he approaches the thesis of TO according to which time is not an absolute foundation, but the effect of a primordial transformation. In TO, this transformation is the Expansive Inducer Effect that creates universal space. In UiT, the transformation is the passage from potentiality to informational distinction and dispersion.

The difference is fundamental:

- In TO, universal space is born from the Expansive Inducer Effect at the end of the Antagonistic Era.
- In Riz, time emerges as a flow of informational registration.
- The bridge between both lies in the idea that time and space are not absolute presuppositions, but effects of a primordial passage.

Thus, Riz offers an operational language for dialogue with contemporary physics, but the cosmogonic theorem of TO maintains its own structure: universal space is created by expansive induction, and time-counting begins at the end of the Antagonistic Era.

7. UiT as a partial physical-informational formalization, not as a replacement for the cosmogonic theorem of TO

The analysis of Riz's article requires an essential methodological distinction. UiT may partially formalize aspects of TO in physical-informational language, but it does not replace the complete cosmogonic theorem of TO.

The cosmogonic theorem of TO is not limited to the passage from potential to registration. It involves a broader architecture:

1. Nothingness as a primitive and eternal mathematical essence;
2. Antagonistic Tempus;
3. initial perfect sphere;
4. Expansive Inducer Effect;

5. creation of universal space;
6. beginning of time-counting;
7. formation of logical tracks;
8. constitution of logical plasma currents;
9. extrusion and centrifugation;
10. formation of primitive atomic mass;
11. emergence of embryonic memory;
12. propagation of atomic radiations;
13. emergence of the transcendent element;
14. formation of Intelligence Units.

UiT, by proposing the sequence:

$$I_{pot} \rightarrow I_{dist} \rightarrow I_{disp} \rightarrow registration \rightarrow memory \rightarrow time \rightarrow phase \rightarrow force, \quad (6)$$

offers a parallel and operational language. This sequence is valuable because it brings TO closer to categories recognizable by contemporary physics. But it does not contain the full cosmogonic richness of TO.

The correct relation is:

$$TO \supset Complete\ Cosmogonic\ Theorem \quad (7)$$

$$UiT \subset Physical-Informational\ Operational\ Bridge \quad (8)$$

Therefore, Riz's article should be valued as scientific mediation, not as ontological substitution.

8. Boundary, distinction, and information: the Fourth Absolute Truth in dialogue with Riz

The Fourth Absolute Truth of TO states:

Two distinct elements require at least one boundary line between them.

This principle is of enormous importance for the physics of information. Riz interprets boundary as the first form of information, proposing:

$$boundary \simeq \partial I_{dist}. \quad (9)$$

Boundary is what makes distinction possible. Without boundary, there is no difference between A and B:

$$A \neq B. \quad (10)$$

In TO, this thesis has modal status. Boundary is the logical condition for the existence of distinct elements. In Riz, it gains physical-informational formulation as the limit of distinguished information.

This approximation is one of the most productive aspects of the article. It allows the universal space created by the Expansive Inducer Effect to be thought not as empty undifferentiated space, but as space capable of containing boundaries, distinctions, and lines of objectification. The creation of universal space at the end of the Antagonistic Era makes possible the regime in which boundaries can be formed, registered, and propagated.

Thus, the Fourth Absolute Truth connects directly to the cosmogonic process:

$$Expansive\ Inducer\ Effect \rightarrow Universal\ Space \rightarrow Boundaries \rightarrow Elements \quad (11)$$

Contemporary physics may recognize this passage through categories such as broken symmetry, field, information, limit, phase, and differentiation. TO, however, preserves the modal anteriority of boundary as a condition of objectivity.

9. Field, aura, phase signature, and uniqueness of the element

The Second Absolute Truth of TO states:

Every element possesses a magnetic field, or aura, that makes it unique.

Riz interprets aura as a local phase-information signature:

$$\Xi_E(x) = \chi_E(x)e^{-i\phi_E(x)}. \quad (12)$$

This approximation is relevant because it allows aura to be understood as a physical profile of individuation. Each element would possess its own informational signature, a phase configuration, a form of local distinction.

However, TO understands aura more broadly. Aura is not merely physical phase. It is the field of uniqueness of the element. Every element, upon existing, possesses a zone of difference and influence that separates it from the rest and makes it singular.

The dialogue with Riz is strong when phase signature is understood as a possible manifestation of aura. However, the aura of TO also belongs to the modal language of individuation. It is prior to any specific physical model.

Thus:

$$\textit{Aura of TO} \supset \textit{Phase Signature of UiT} \quad (13)$$

The phase signature is a possible operational translation. Aura is the logical–ontological principle of uniqueness.

10. Infinity, non-element, and the logical limit of the universe

The Third Absolute Truth of TO states:

Infinity represents the necessary non-element for the logical definition of the universe.

Infinity, in TO, is not a thing within the universe. It is the non-element that makes it possible to define the universe logically. This means that the universe requires a logical horizon that is not confused with the elements internal to it.

Riz approaches this thesis when he interprets infinity as a limit of potentiality, not as a physical object. However, there is an essential difference. In UiT, maximal potential may be thought of as capacity for registration. In TO, infinity is a modal condition of definition.

The total globalizing sphere is related to this question. It expresses the logical totality of the universe, but it does not transform infinity into an object. The total globalizing sphere is modal geometric language: a figure of totality, not an absolute physical body.

Thus, the infinity of TO preserves its function as non-element. UiT may offer an operational approximation, but it does not exhaust the logical meaning of infinity.

11. Double observation, objectivity, and relational validation

The Fifth Absolute Truth of TO states:

An element exists fully only if observed by at least two others.

Riz interprets this thesis as validation by independent registers:

$$I_{rec}^{(1)}(A) \simeq I_{rec}^{(2)}(A). \quad (14)$$

This formulation is highly compatible with TO. It allows double observation to be translated in terms of informational convergence. Full existence requires that the element be confirmed within a minimum network of objectivity.

But TO goes beyond epistemology. Double observation is not merely scientific verification. It is an ontological condition of full existence. An isolated element does not possess objective fullness because it has not entered a sufficient relational network.

In the cosmogony of TO, this has profound consequences. After the creation of universal space and the formation of the first boundaries, elements begin to acquire fullness insofar as they are involved in reciprocal relations, observations, and registers. Objectivity is relational.

Riz helps operationalize this thesis for contemporary physics, especially in dialogue with measurement, registration, informational redundancy, and shared objectivity.

12. Composition, memory, and previous elements

The Sixth Absolute Truth of TO states:

Every element is composed of elements prior to it.

Riz interprets this anteriority as accumulation of registers:

$$I_{dist} = I_{dist}^{core} + I_{\phi} + I_{boundary} + I_{memory} + \dots \quad (15)$$

This formulation is compatible with TO, provided that modal anteriority and physical anteriority are differentiated.

Modal anteriority concerns the logical conditions that make the element possible. Before a physical element emerges, distinction, boundary, field, possible observation, and composition are already necessary. Physical anteriority, in turn, corresponds to the registers, memories, fields, and relations that constitute the element in time.

In TO, the embryonic memory of the universe appears as a decisive stage of cosmogony. After the Expansive Inducer Effect and the formation of logical tracks, reality begins to preserve marks of its own processes. This preservation is embryonic cosmic memory.

Riz contributes by translating memory as informational registration. However, in TO, memory is not merely storage. It is a phenomenic element of universal constitution.

13. Transcendent element, knowledge, and atomic radiation

The Seventh Absolute Truth of TO states:

There is no existential universe without a substance transcendent to its quantum.

This analysis interprets the transcendent substance as knowledge or information produced in atomic relations, equivalent to atomic radiations. This reading is central to the recent bibliography of TO.

Riz strongly approaches this thesis by proposing:

$$I_{trans} \simeq I_{out} \simeq I_{rec}^{propagated}. \quad (16)$$

That is, the transcendent element is propagated information. This information surpasses the local event, radiates, registers itself, and participates in the universal network.

In TO, the isolated quantum is not sufficient. For there to be an existential universe, the quantum must produce transcendence: radiation, information, knowledge, external memory, or relational propagation.

This thesis is one of the strongest bridges between TO and contemporary physics. Atomic radiation may be read as the physical manifestation of informational transcendence. Knowledge, in this sense, does not begin in the human mind. It begins in atomic

relations as the production of irradiated objective information.

14. The cosmological Eras of TO and Riz's informational reading

14.1. The Antagonistic Era

The Antagonistic Era corresponds to the condition of Antagonistic Tempus. In it, there is not yet universal physical space, nor full temporal counting. There is modal tension, primordial antagonism, and the condition of expansive induction.

Riz dialogues with this Era by proposing the state of maximal unregistered potentiality. However, the Antagonistic Era of TO is broader than Riz's informational state, because it involves the proper logic of Antagonistic Tempus.

14.2. The end of the Antagonistic Era and the Expansive Inducer Effect

The end of the Antagonistic Era occurs when the Expansive Inducer Effect creates universal space. This is a decisive point in TO. Space is not presupposed; it is produced.

From the creation of universal space onward, the counting of time begins. This means that physical time emerges as an effect of universal spatial constitution. Time is not counted before there is a universal regime in which counting becomes possible.

14.3. The Era of Logical Tracks

After the creation of universal space, logical tracks are formed. They are structuring directions of nascent reality. In Riz's language, they may be approximated to the passage from I_{pot} to I_{dist} , that is, to the formation of oriented distinctions.

14.4. The Era of Logical Currents of Tertiary Plasma

Riz's informational dispersion may dialogue with the idea of logical currents. Tertiary plasma, in TO, represents a phase of flows, currents, and dynamic organization. UiT may provide a language for thinking such currents as propagation of registers, phases, and fields.

14.5. The Centrifugal Era

The Centrifugal Era involves expansion, extrusion, and separation. It is articulated with the Expansive Inducer Effect and with the progressive differentiation of the universe. In informational language, it corresponds to the growth of the realized sphere, that is, to the increase of registers, distinctions, and dispersions.

14.6. The Era of Intelligence Units

The Era of Intelligence Units is the stage in which memory, registration, observation, and knowledge reach higher degrees of organization. Riz contributes to this reading by relating knowledge and registration. TO, however, maintains the thesis that intelligence is the cosmic development of a structure already present in atomic relations as information and radiation.

15. Points of tension between the analyzed article and TO

Despite strong compatibility, there are important tensions.

15.1. Nothingness is not merely “nothing registered”

The greatest tension lies in the definition of Nothingness. Riz states:

$$\textit{Nothingness} = \textit{nothing registered}. \quad (17)$$

This is useful as a bridge, but not sufficient for TO. The Nothingness of TO is a primitive and eternal mathematical essence. It precedes even the possibility of registration.

15.2. UiT does not replace the cosmogonic theorem of TO

Riz’s informational sequence is partial. It does not replace TO’s own narrative concerning Antagonistic Tempus, the initial perfect sphere, the total globalizing sphere, the Expansive Inducer Effect, the creation of universal space, and the beginning of time-counting.

15.3. The perfect sphere is not merely informational potential

The initial perfect sphere is geometric and modal-logical language. It should not be reduced to a “stock” of potential information. It represents the formal completeness of Nothingness as mathematical essence.

15.4. The total globalizing sphere is not merely a sum of registers

The total globalizing sphere represents the logical integration of the existential universe. It is not merely the sphere of realized information. It is the modal totality in the process of objectification.

15.5. Time in TO is born from the end of the Antagonistic Era

Riz interprets time as a flow of registration. TO accepts this approximation as a bridge, but states in its own terms that time-counting begins at the end of the Antagonistic Era, when the Expansive Inducer Effect creates universal space.

16. Propositional contributions of the article to TO

Riz’s article offers important contributions:

1. it provides informational language for Primordial Nothingness;
2. it brings TO closer to contemporary physics;
3. it interprets boundary as first information;
4. it translates double observation as independent validation;
5. it approximates the transcendent element to propagated information;
6. it interprets time as a flow of registration;
7. it connects force, phase, and information;
8. it offers an operational bridge for future testability.

The most important contribution is that it allows TO to dialogue with contemporary physics without losing its modal identity. The article functions as partial translation, not as substitution. Its function is to open channels of communication between the cosmogonic theorem of TO and current scientific categories.

17. Final considerations and dialogical score

Yaniv Riz's article constitutes one of the most productive approximations between the Theory of Objectivity and a contemporary physical–informational language. Its main merit lies in recognizing that TO operates at a modal level and that UiT may function as a language of physical registration.

The expanded analysis allows us to conclude that the analyzed article is an operational bridge of dialogue between TO and contemporary physics. It helps translate concepts such as Nothingness, boundary, memory, time, transcendent element, and propagated information. However, it does not replace the complete cosmogonic theorem of TO.

TO possesses its own language: Nothingness, Antagonistic Tempus, initial perfect sphere, total globalizing sphere, Expansive Inducer Effect, universal space, beginning of time-counting, logical tracks, tertiary plasma, Centrifugal Era, and Intelligence Units. These elements form a modal and geometric architecture that cannot be reduced to informational language.

The score assigned to the analyzed article regarding its dialogue with TO remains high:

Score: 9.4 / 10.

The score is high because the article dialogues directly, respectfully, and productively with TO. It does not receive the maximum score because its language, although useful, remains partial in relation to the totality of the cosmogonic theorem of the Theory of Objectivity.

Bibliography

- Aspect, Alain. 1982. “Experimental Tests of Bell’s Inequalities.”
- Bohm, David. 1980. *Wholeness and the Implicate Order*. London: Routledge.
- Cabannas, V., and Silva. 2016. *Teoria da Objetividade: terceira teoria de origem do universo, alternativa à Teoria do Big Bang e ao Criacionismo*. Zenodo. <https://doi.org/10.5281/zenodo.17306198>.
- Cabannas, V., and SILVA, D. 2018. *THEORY OF OBJECTIVITY: Third theory of the origin of the universe, alternative to the Big Bang Theory and Creationism*. Zenodo. <https://doi.org/10.5281/zenodo.17012791>.
- Cabannas, V., and SILVA, D. 2020. *A ESFERA PERFEITA (Comentário Número 9 à Teoria da Objetividade)*. Zenodo. <https://doi.org/10.5281/zenodo.17013728>.
- Cabannas, V., and SILVA, D. 2025. *Teoria da Objetividade: Fundamentos Lógicos, Ontológicos e Científicos para uma Nova Física e Cosmologia (Diálogo com as Inteligências Artificiais)*. Zenodo. <https://doi.org/10.5281/zenodo.17295496>.
- Cabannas, V., and Silva, D. 2026a. *From Modal Axioms to Empirical Contact: Gödelian Discipline, the Law of Logical Minimum, and Operational Bridges in the Theory of Objectivity (2.0)*. Zenodo. <https://doi.org/10.5281/zenodo.18154295>.
- Cabannas, V., and Silva, D. 2026b. *Modal Ontology and Testability: Boundaries, Convergence, and the Phenomenic Table of the Theory of Objectivity in Dialogue with Contemporary Physics and AI-Assisted Operational Bridges (1.0)*. Zenodo. <https://doi.org/10.5281/zenodo.18257429>.
- Cabannas, V., and Silva, D. 2026c. *Gravity as an Emergence of Convergence Zones: A Critical–Propositional Examination of Information Flux Theory in Light of the Theory of Objectivity (TO) (1.0)*. Zenodo. <https://doi.org/10.5281/zenodo.18306977>.
- Cabannas, V., and Silva, D. 2026d. *Quantum Field Theory and the Properties of the Vacuum: A Critical–Propositional Reading under the Modal Discipline of the Theory of Objectivity (TO) (1.0)*. Zenodo. <https://doi.org/10.5281/zenodo.18370212>.
- Cabannas, V., and Silva, D. 2026e. *THE MODAL DISCIPLINE OF COSMIC ORIGIN: a Critical–Propositional Analysis of the Big Bang Theory in Confrontation with the Theory of Objectivity (1.0)*. Zenodo. <https://doi.org/10.5281/zenodo.19034270>.
- Cabannas, V., and Silva, D. 2026f. *Unified Informational Theory and the Modal Discipline of the Theory of Objectivity: A Critical–Propositional Analysis of Yaniv Riz’s Article in Confrontation with the Modal Axioms, Phenomenic Elements, Inducer Effects, the Cosmogonic Theorem, and the Cosmological Eras of TO*. Zenodo. <https://doi.org/10.5281/zenodo.20015963>.

- Einstein, Albert. 1920. *Relativity: The Special and the General Theory*. London: Methuen & Co.
- Hawking, Stephen. 1988. *A Brief History of Time*. New York: Bantam.
- Heisenberg, Werner. 1958. *Physics and Philosophy: The Revolution in Modern Science*. New York: Harper & Row.
- Kuhn, Thomas S. 1962. *The Structure of Scientific Revolutions*. Chicago: University of Chicago Press.
- Penrose, Roger. 2004. *The Road to Reality: A Complete Guide to the Laws of the Universe*. London: Jonathan Cape.
- PLANCK Collaboration. 2018. *CMB Anisotropies and Cosmological Parameters*.
- Prigogine, Ilya, and Isabelle Stengers. 1984. *Order Out of Chaos: Man's New Dialogue with Nature*. New York: Bantam.
- Riz, Yaniv. 2026a. *Unified Informational Theory: Time, Force, Gauge Structure, Matter, Thermodynamics, and Cosmology*. Zenodo. <https://doi.org/10.5281/zenodo.20113167>.
- Riz, Yaniv. 2026b. *Primordial Nothingness as Maximal Informational Potential: A Physical-Interpretive Bridge between the Theory of Objectivity and Unified Informational Theory*. Zenodo. <https://doi.org/10.5281/zenodo.20139535>.
- Weinberg, Steven. 1993. *The First Three Minutes: A Modern View of the Origin of the Universe*. New York: Basic Books.

Appendix in TO style

Appendix A — Expanded cosmogonic statement

Nothingness is a primitive and eternal mathematical essence.
From Antagonistic Tempus emerges modal tension.
From modal tension arises the necessity of expansion.
The Expansive Inducer Effect creates universal space.
At the end of the Antagonistic Era, time-counting begins.
The initial perfect sphere expresses primordial logical symmetry.
The total globalizing sphere expresses the modal totality of the universe.
Boundary distinguishes.
Distinction registers.
Registration memorizes.
Memory temporalizes.
Time organizes.
Organization creates tracks.
Tracks conduct currents.
Currents form plasma.
Plasma extrudes.
Extrusion centrifuges.
Centrifugation differentiates.
Differentiation forms elements.
Elements irradiate information.
Irradiated information is knowledge.
Knowledge transcends the quantum.
Where there is informational transcendence, there is an existential universe.

Appendix B — Hierarchical relation between TO and UiT

$$TO \supset \textit{Complete Cosmogonic Theorem} \quad (18)$$

$$UiT \subset \text{Operational Bridge of Dialogue} \quad (19)$$

$$\text{Modal Nothingness} \neq \text{Merely Registered Nothingness} \quad (20)$$

$$\text{Perfect Sphere} \neq \text{Merely Informational Potential} \quad (21)$$

$$\text{Total Globalizing Sphere} \neq \text{Merely Sum of Registers} \quad (22)$$

$$\text{Expansive Inducer Effect} \rightarrow \text{Universal Space} \rightarrow \text{Time-Counting} \quad (23)$$

Appendix C — Final formulation

TO does not reject contemporary physics.

TO requires contemporary physics to recognize its own dependence on modal conditions.

Riz offers a bridge.

The bridge is useful.

But the bridge is not the origin.

The origin, in TO, remains in Nothingness as a primitive and eternal mathematical essence.

Universal space is born from the Expansive Inducer Effect.

Time begins to be counted at the end of the Antagonistic Era.

The initial perfect sphere and the total globalizing sphere belong to the geometric and modal-logical language of TO.

Information is a possible operational translation.

Atomic radiation is the physical manifestation of informational transcendence.

The existential universe is the total field in which Nothingness, boundary, observation, composition, memory, time, knowledge, and transcendence become objectivity.