# The Observer as a Spatial Category

## On the Topological Inversion of World and the Ontological Structure of Observation

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**Abstract**

**The present text formulates an explicit ontological thesis that has already been implicitly contained in previous works on world-formation, the constructed observer, and ontological openness, but has so far not been articulated categorially:**

**The observer is not an entity, not a subject, and not a localizable point in space, but a space-internal operation—more precisely, a topological inversion or folding of world.**

**Observation is not understood here as the act of an inner-worldly agent, but as a structural response of space to ontological non-integrability. Where reality cannot be fully stabilized, space folds in such a way that perspective, coherence, and world can appear. In this sense, the observer is not the cause of world, but the form in which world organizes itself locally.**

**This shift withdraws the ontological ground from the classical subject–object schema, representational models of knowledge, as well as agent-based observer theories. At the same time, it allows a new reading of central problems in physics, consciousness research, and epistemology, without introducing additional entities or mental instances.**

**The text understands itself as a categorial clarification: not as a new theory of observation, but as a clarification of what observation is ontologically.**

(This paper is an interface text. The author's primary research corpus employs an autistic, non-linear, rhythmically recursive writing mode that cannot be fully preserved in academic English without structural loss of epistemic function.)

**This paper stands in relation to:**

Speed, T. (2025). The Gap as a Condition - Pre-Ontological Operatorics and the Primacy of Response (2 English). Zenodo. https://doi.org/10.5281/zenodo.18015885 2

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## 1. Problem Statement: The Implicit Observer

In nearly all scientific disciplines—from physics and cognitive science to social theory—the observer plays a central role. At the same time, the ontological status of the observer usually remains unarticulated. The observer appears as self-evidently given: as a subject, as a brain, as a measuring instance, as an information processor, or at least as a localizable standpoint within an already existing space.

This implicit assumption generates a series of well-known problems: measurement paradoxes, subject–object splits, questions of representation, perspective conflicts, and competing descriptions of reality. What is striking, however, is that these problems do not arise from empirical findings, but from a tacit presupposition concerning the location of the observer.

The present text intervenes at an earlier point. It does not ask how an observer knows, but what an observer is ontologically or pre-ontologically—and whether the observer may be understood at all as something inner-worldly.

The term “pre-ontological” does not designate a provisional state of being, but the structural conditions under which ontology can emerge in the first place.

## 2. The Categorial Error: The Observer as an Entity

The most widespread assumption is as follows:
The observer is something that is located in space.

Whether conceived as subject, brain, agent, or system, observation is consistently assumed to originate from a unit that is already part of the world and that apprehends, processes, or represents it in some form. Even non-representational approaches often retain this ontological figure, insofar as they conceive the observer as dynamic, embodied, or enactive, yet still treat it as an inner-worldly instance.

The text argues that this involves a categorial error—not because these models are empirically false, but because they rely on a false ontological placement.

Observation is not a process in space.
It is an operation of space.

## 3. The Observer as Topological Inversion

The central thesis is as follows:

**The observer is a topological inversion of world.**

This means the following: wherever reality cannot be fully integrated, stabilized, or closed, space responds to this non-identity with itself by locally folding. This folding produces a zone in which world becomes perspectival, coherent, and effective. This zone is the observer.

The observer is thus:

- not a thing,
- not a place,
- not a bearer of properties,

but a spatial operation that emerges from pre-ontological openness.

Observation does not arise through the addition of a subject, but through a structural reconfiguration of space, in which inside and outside, proximity and distance, efficacy and visibility are reorganized.

“Topological” does not designate a formalized mathematical structure here, but a categorial determination of relationality, inversion, and boundary-formation prior to any metric or dynamical description.

The emergence of an observer structure is not a localizable event, but the necessary spatial response at the point where integration structurally fails. It does not explain “why here,” but marks “where stabilization remains possible at all.”

## 4. Observation as Response, Not as Access

In this reading, observation is not a form of access to a given world. It is a response structure: a reaction of space to the impossibility of complete self-integration.

Where world can no longer be smoothly, unambiguously, or non-contradictorily stabilized, perspective emerges. Perspective is not an addition, but a symptom of ontological tension.

The observer is therefore not the origin of world, but its local solution under strain.

This shift has far-reaching consequences:

- There is no privileged observer position.
- Observers are not comparable as instances, but as different spatial foldings.
- Perception is not representation, but stabilization under conditions of openness.

**5. Delimitation: Neither Subject nor Information System**

The ontology proposed here must be explicitly distinguished from:

- subject-philosophical models,
- neurocentric explanations,
- information-based or agent-based observer theories.

Not because these are false, but because they consistently treat the observer as something that observes, rather than as that which makes observation possible.

Information, brain processes, or cognitive dynamics can be understood as secondary effects of particular spatial foldings—but not as their ontological origin.

Neuronal processes are not excluded; within this framework, they appear as local realizations of already completed spatial foldings, not as their source.

**6. Consequences**

The explicit determination of the observer as a spatial category has several consequences:

1. The subject–object schema loses its ontological status.
2. Knowledge becomes topologically, not mentally, grounded.
3. Differences in perception—such as neurodivergent forms—appear not as deviations, but as different modes of spatial stabilization.
4. The question of consciousness shifts from *What is it?* to *Which spatial operations make it possible?*

**7. Conclusion**

The concept of space used here cannot be reduced either to physical spacetime or to phenomenal experiential space; it designates the structural condition under which world can appear perspectivally at all.

The present approach is not empirically testable in the sense of individual measurement predictions. Its testability lies in the coherent reinterpretation of existing empirical findings

(measurement problem, observer-dependence, perspective inconsistencies), without introducing additional entities or ad hoc assumptions.

The text has not proposed a new theory of observation.
It has made explicit—and rejected—a tacit ontological assumption.

The observer is not in the world.
The world is where it folds.