“I am a temporarily coherent interference node – How consciousness arises and persists in the unitary multiverse”

Abstract
Consciousness appears to us as a continuous, subjective presence—but what is its place in a physically describable world? This essay combines two radical but compatible ideas:
1. Consciousness as an interference phenomenon of parallel ego states in a neural (or quantum informational) tensor network,
2. Unitarity as an ontological principle that enforces the preservation of all information – including subjective experience.
The result is a model in which consciousness is a locally coherent but globally preserved process: an “interference node” in the multiverse whose decoherence represents not annihilation but transformation.

Preparation

1. Consciousness as Interference – The Multiversal Thesis
The starting point is the observation that subjective experience is neither classically deterministic nor purely random. Instead, it resembles an interfering wave pattern:
- Neural tensor networks do not process information linearly, but as a superposition of possible states (cf. quantum processes in microtubules according to Penrose-Hameroff, or classical parallel processing).
- David Deutsch's multiverse provides the framework: every moment of decision splits worlds, but neighboring "ego branches" remain coherently connected.
- Thesis: Consciousness is the constructive interference of these nearby branches – a “limit value” that is continually re-stabilizing itself.

Example: When you make a decision, you do not experience “one choice,” but rather the interference of all versions that have slightly different weightings.

2. Unitarity – Saving Information
Quantum mechanics prohibits information loss (unitarity). The most well-known paradox: Black holes seemingly destroy information—but Hawking radiation, holography, and the AdS/CFT correspondence show that it is only transformed.
- Analogous problem: What happens to conscious information at death?
- Solution: If unitarity is universal, subjective experience must also be preserved – be it in other branches, as quantum information in a vacuum, or in a cosmic “memory”.

3. The Synthesis – Interference Nodes in the Web of Reality
The fusion of both ideas results in a dynamic model of consciousness:
- Local level: Our self is a coherent interference node of nearby multiverse branches, constantly rebuilding itself through decoherence.

- Global level: Decaying coherence (e.g. death) does not mean extinction, but transition to a more decoherent state – similar to how matter falling into a black hole does not disappear, but is emitted as radiation.
- Constructor Theory (German) provides the language: Consciousness is a "possible process" whose preservation is guaranteed by physical laws (quantum entanglement, unitarity).

Summary
1. Consciousness is interference – not a fixed thing, but a dynamic pattern in the neural/quantum information network.
2. It preserves unitarity – as with black holes, no information is lost, only its shape changes.
3. We are temporarily coherent – our “self” is a fluctuation maximum in the multiverse, while decohered versions continue elsewhere.

Open questions
1. Experimental testing: Can interference effects between nearby “ego branches” be demonstrated (e.g., by quantum neurosimulations)?
2. Topology of Information: Where exactly do decohered states of consciousness "live"? In other universes? As quantum vacuum fluctuations?
3. Ethics of the multiverse: If all decision variants are real – what does responsibility mean?

Ending
This model is not spiritualism, but radical physicalism: It explains consciousness without mystical additions, but with the tools of quantum theory and multiverse cosmology. The consequence is a new view of life, death, and identity—not as a rupture, but as a transformation in the infinite information network of reality.

“I think, therefore I interfere – and my decoherence shadow continues thinking elsewhere.”