

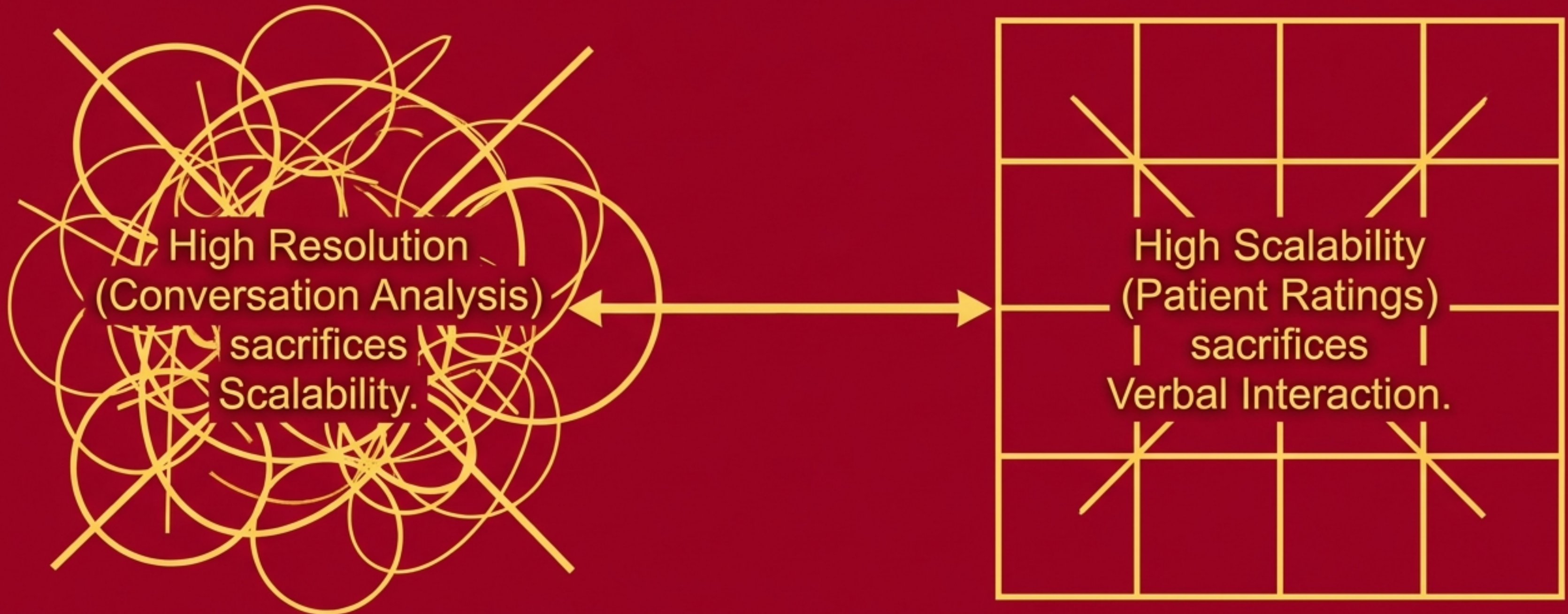
Using an AI-Based System for Dimensional Deliberate Practice in Psychodynamic Psychotherapy

Shlomo Mendlovic, MSc PhD MD MHA

BRAIN: Broad Research in Artificial Intelligence and Neuroscience, 2025

The Dynamic Core Remains Inaccessible

Methodological Trade-offs in Psychotherapy Research



The linguistic reality of the clinical encounter requires a new metric.

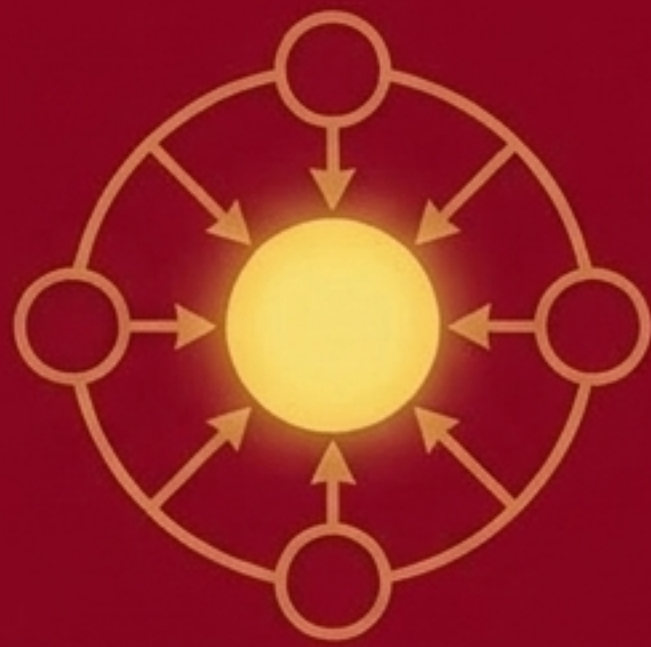
Operationalizing the MATRIX

Condensing complex psychoanalytic constructs into a measurable framework.

Translating the intersection of therapeutic Focus and Dimension into **five trackable psychological coordinates**.



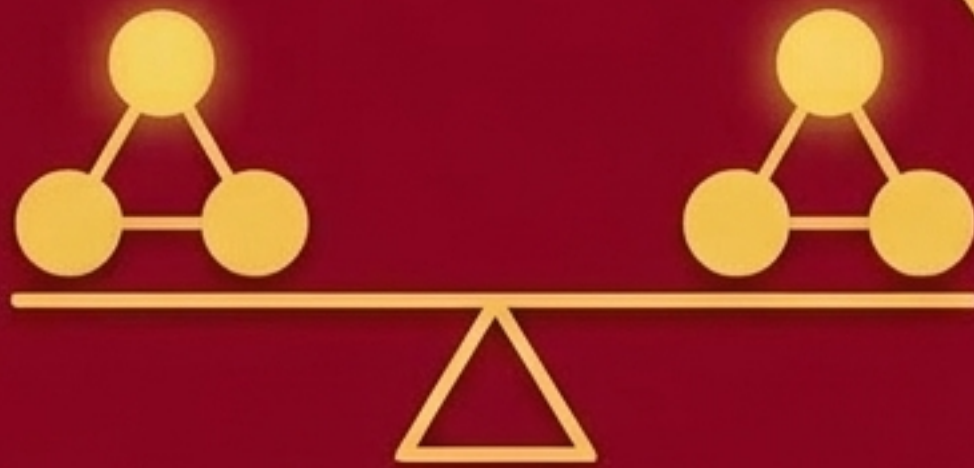




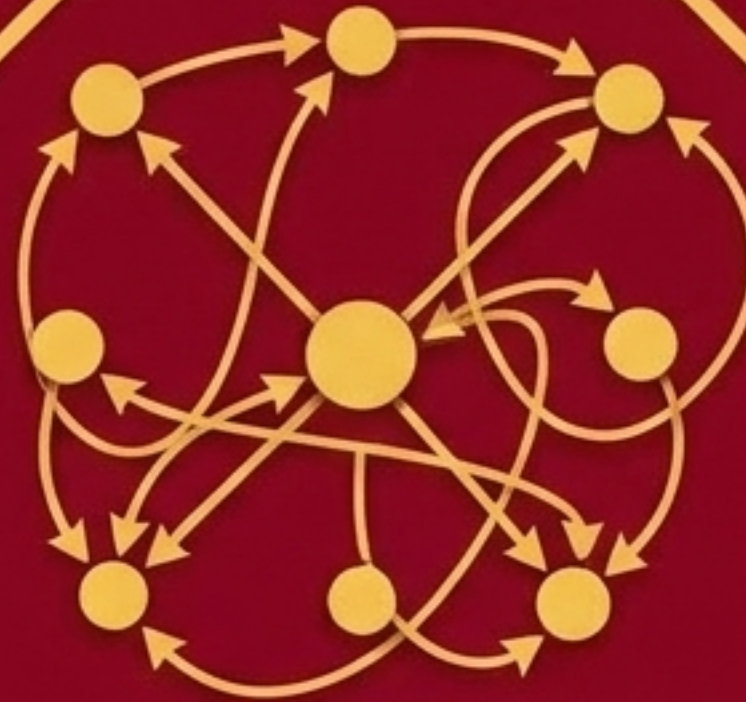
Dominance: Attention focuses on a single dimension at a time.



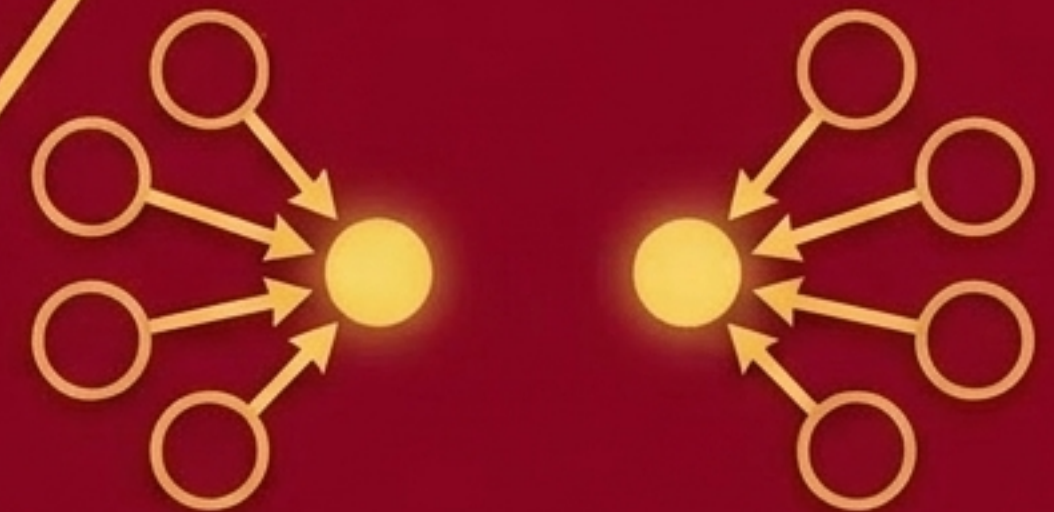
Continuity: Transition only occurs toward an adjacent dimensional layer.



Equilibrium: Dimensions maintain a balance until externally influenced.



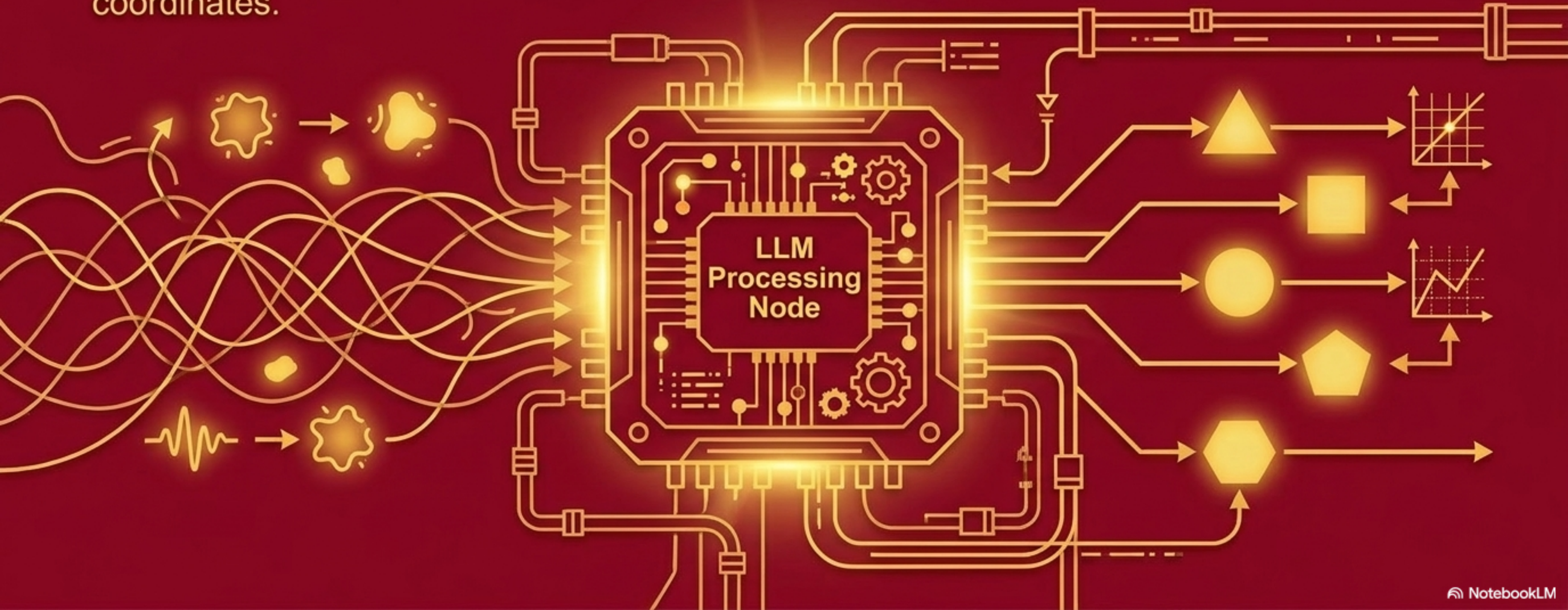
Flexibility: Spontaneous transitions reflect adaptability and health.



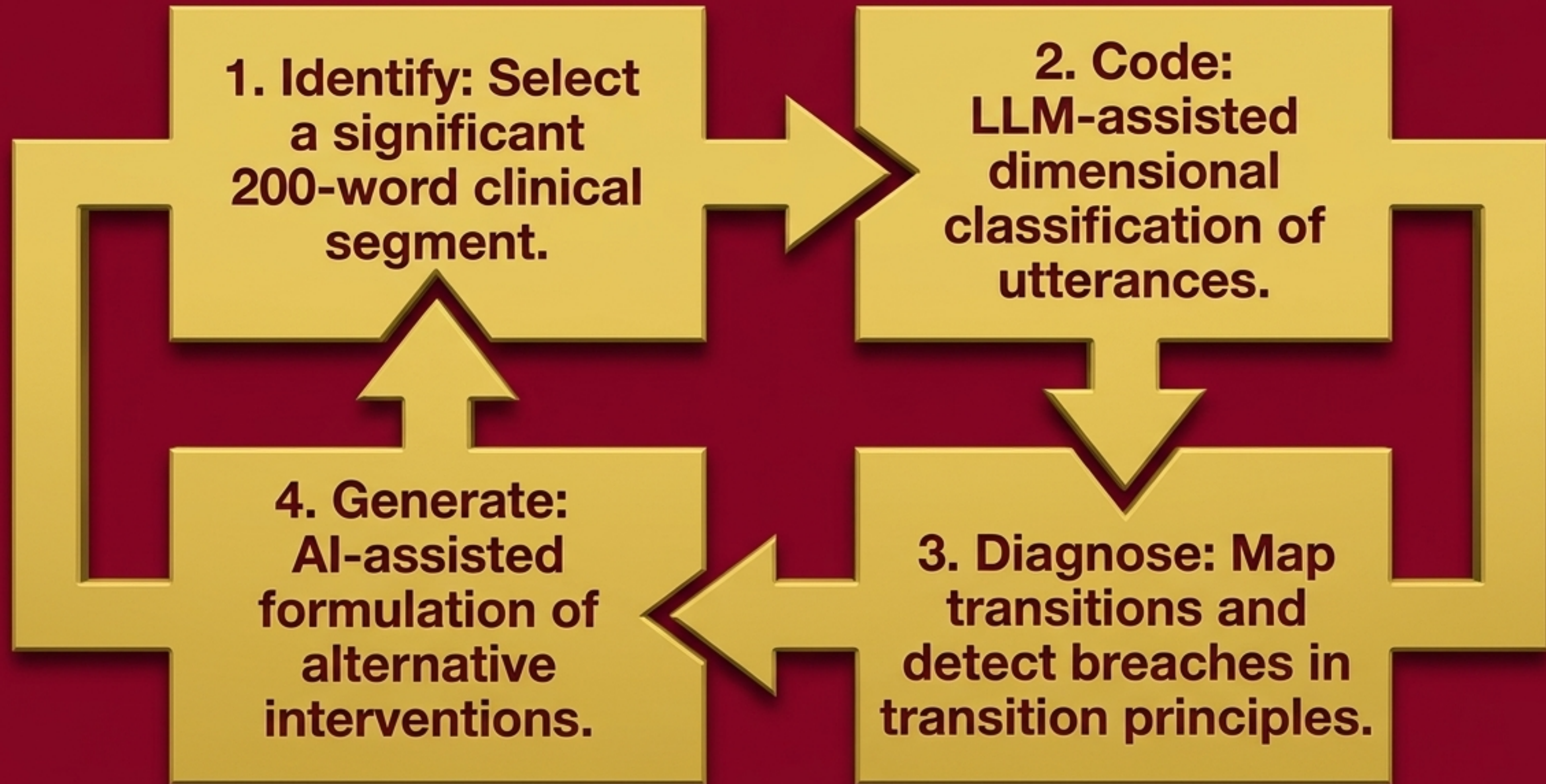
Mutual Attraction: Two individuals pull each other toward their own state.

The AI Integration: Coding the Utterance

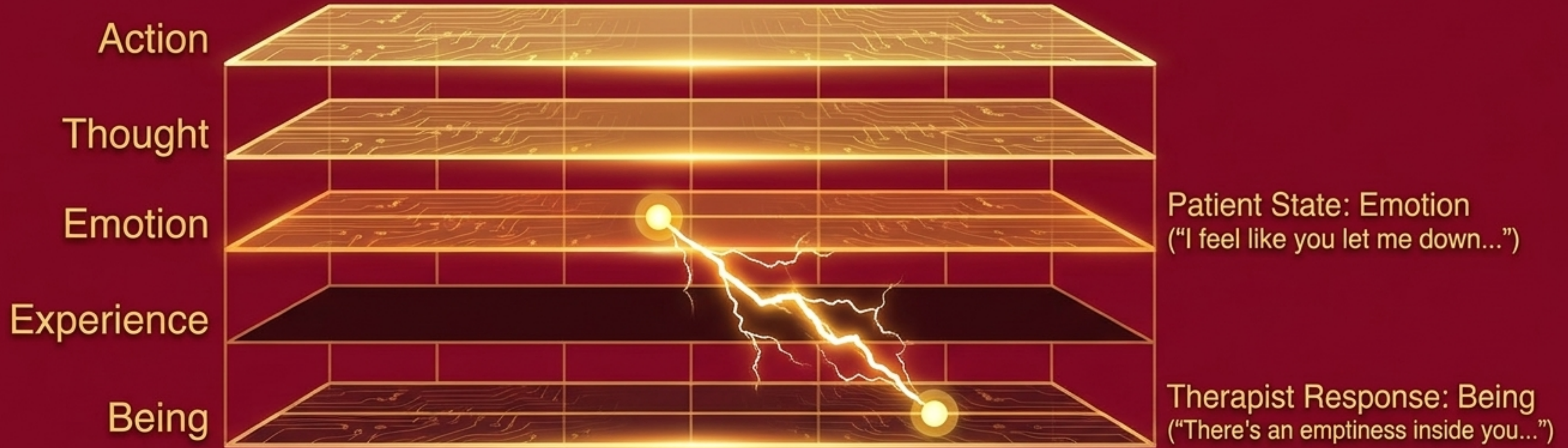
- Large Language Models (ChatGPT-4) operationalize the framework.
- Applying structured coding schemes across varied therapeutic utterances.
- High-resolution semantic analysis translates subjective speech into objective dimensional coordinates.



The Deliberate Practice Cycle



Diagnosing the Rupture: A Breach of Continuity



Diagnostic Output: Severe violation of the Principle of Continuity and Mutual Attraction. The therapist bypassed the adjacent Experience dimension.

The Intervention Shift

Original Intervention (Focus: Being)

“...I think it’s happening to you again... This is how you are in the world. There’s an emptiness inside you...”

Result: Therapeutic rupture.



AI-Generated Alternative (Focus: Experience)

“When you say that, I wonder if right now there’s a kind of emptiness you’re feeling inside... maybe like something collapsing inward...”

Result: Restoration of clinical coherence through adjacent transition.



A Scalable Pathway for Professional Growth

- Transforming reflective insights into actionable, data-driven techniques.
- Algorithmic suggestions are complementary tools, not substitutes for professional judgment.
- Bridging the gap between abstract psychoanalytic theory and high-resolution deliberate practice.

