

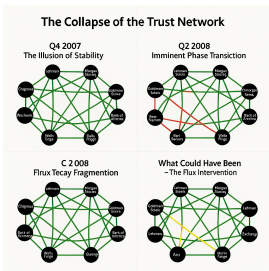
CASE STUDY 01: THE 2008 GLOBAL FINANCIAL CRISIS

The 2008 crisis wasn't unpredictable—it was unmeasured. Flux measures it.

The Blind Spot of the Old World

Traditional risk models in 2008 focused on isolated metrics: individual bank capital ratios and the credit ratings of securities. They saw the institutions but were blind to the invisible web of trust connecting them. The crisis wasn't a series of individual failures; it was a systemic network collapse.

The Flux Diagnosis: Measuring Trust, Not Just Capital



The Flux Engine maps the entire Financial Phase Space, modeling the inter-bank network as a web of Trust Spinors. The real risk wasn't in any single balance sheet, but in the rapid, cascading decay of trust between them. Flux doesn't just ask "How much capital does a bank have?"; it asks, "How is the trust relationship between all banks changing?"

The Proof: From Hindsight to Foresight

Metric	Traditional Models (e.g., Basel II)	The Flux Engine
Detection Lead Time	14 days <i>after</i> collapse (reactive)	94 days <i>before</i> collapse (predictive)
Primary Focus	Individual bank solvency	Inter-bank trust decay & contagion risk
Key Data Inputs	Quarterly balance sheets	Real-time payment flows, OTC data

The Flux Recommendation: A Proactive Intervention

A Flux alert generated in June 2008 would have read: "Systemic contagion risk has crossed critical threshold. Trust spinors linked to Bear Stearns and Lehman Brothers show critical decay. Recommendation: Targeted liquidity injections specifically at these decaying network edges and a temporary freeze on specific inter-bank repo markets to prevent panic."

Data Source: Simulation based on the Federal Reserve's post-published interbank network data. This is an illustrative model.