Logic, Chaos, and Writing Science Fiction

Rudy Rucker

San Jose State University (emeritus), USA; rudy@rudyrucker.com

Abstract

I'm going to talk about ideas from mathematics and computer science, and how they relate to the process of writing novels, science fiction novels in particular. I have a Ph.D. in mathematical logic, I taught computer science in Silicon Valley for twenty years, and I've published more than twenty SF novels.

The key element in writing a novel is the muse, and I mean this in the classic sense of some goddess-like being that enters into your mind and sheds light on the seemingly intractable problems of finding your plot and delineating your characters. This conclusion is where I'm headed. Logic can take you only so far. The incompleteness theorem and the nature of chaotic dynamics show us why.



Figure 1: "Hailing a Ride," by Rudy Rucker