

that the codebase was not just putrid, it was a pungent landfill site on a hot summer's day. A clear warning sign. The data was rarely kept near where it was used. Often extra baroque caching layers were introduced to try to persuade it to hang around in more convenient places. Again, a warning sign.

As I tried to build a mental picture of the Metropolis, no one was able to explain the structure; no one knew all of its layers, tendrils, and dark, secluded corners. In fact, no one actually knew how any of it really worked (it was actually by a combination of luck and heroic maintenance programmers). People knew the small areas they had worked on, but no one had an overall comprehension of the system. And, naturally, there was no documentation. That was a warning sign. What I needed was a map.

This was the sad story I had become a part of: the Metropolis was a town planning disaster. Before you can improve a mess, you need to understand that mess, so with much effort and perseverance we pulled together a map of the “architecture.” We charted every highway, all the arterial roads, the uncharted back roads, and all of the dimly lit side passages, and placed them on one master diagram. For the first time we could see what the software looked like. Not a pretty sight. It was a tangle of blobs and lines. In an effort to make it more comprehensible, we color-coded the control paths to signify their type. Then we stood back.

It was stunning. It was psychedelic. It was as if a drunk spider had stumbled into a few pots of poster paint and then spun a chromatic web across a piece of paper. It looked something like Figure 2-1 (it's a simplified version, with details changed to protect the guilty). Then it became clear. We had all but drawn a map of the London Underground. It even had the circle line.

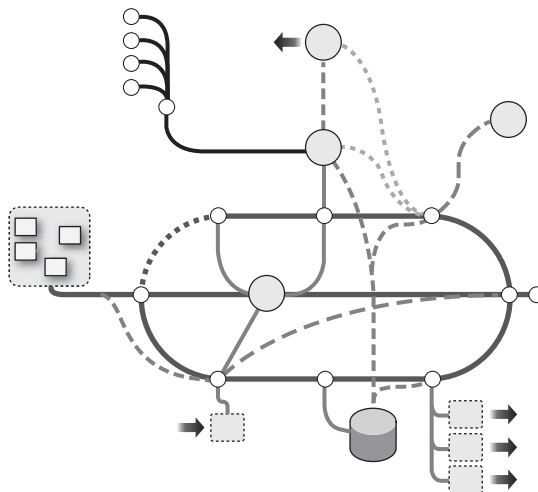


FIGURE 2-1. *The Messy Metropolis “architecture”*