Fractal Complexity and Subtle Consistency

Why AI outputs start to fall apart after a while. *A comment on Cory Doctorow's article „Textured".*

Singing along songs with AI voices doesn't work as well for me as singing along songs with human voices. Even untrained human voices. My voice doesn't adjust as much to the artist. I tried, and even after months of singing a song regularly, something is missing. Especially after months of singing it. And reading AI stories becomes boring after a while.

I think the reason why AI content is hard to detect in isolation is that as humans we're very good at discovering patterns (that's what keeps us alive), and AI provides lots of patterns to detect.

But the patterns which AI outputs are global patterns of ever shifting depth, depending on the kind of training data which is dominant in the current part of the output. While humans discover local patterns and patterns within patterns.

When I read a book, I automatically search for and feel the patterns of that book. They partially match global patterns (like a three act structure), but they also have their own patterns, and in the best books, the book-specific patterns are consistent and permeate all levels of complexity, from the distribution of vowels over word-choice, sentence and chapter lengths, and illustrations, to the plot and the shifting of the mood.

The combination of all of these is the book.

And the details matter. They convey much more than a plotline.

That's why changing a single sentence can require followup changes all over the text. And why adding a character to a set of pre-generated archetypes in an RPG book can make the book worse (which is why we scrapped the idea of adding a thief to the flyer RPG, though we had great artwork for her). And why a rough, fitting sketch can work better than a full-color, highly detailed illustration. And why it sometimes feels impossible to add an argument to an already written text because it just doesn't fit into the flow. But we might do it anyway, because it matters.

So what's missing in AI output is not just surprises. One problem is that most of its patterns are global patterns that don't form a consistent and book-specific whole.

Or in AI speech: the context length of humans isn't only a chapter or a list of plot points, but the whole book (series). Even if they spread reading the book over a year (or a decade).

That's how AI content becomes more eerie over time, and it's why I wish that all the artists who currently do one part of the work themselves (the one they are proud of) and hand the rest to AI would either do those parts themselves, even if their voice is shaky and their drawings rough, or try to find like-minded artists who enjoy adding the other parts. More than three thirds of musicians don't earn money from their craft, so there is bound to be someone who'd love to join in if you open up the option.

It is said that you should talk to your kid in the language of your heart, because you can only express the full depth of your thoughts in a language you truly made your own.

And like kids learn language best from the full local complexity and subtlety of a human, art enriches our live the most when it comes from the hearts and voices and hands of humans. When it breathes their life.

Which is something that Cory Doctorow expressed wonderfully in his followup article What if we're the ones having hallucinations?.