

The Future of Storytelling in the Age of AI and Posthuman

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Background

Computer scientists are building a vast array of machine learning systems (often called Artificial Intelligence or AI) that can perform daily human tasks reliably, sometimes more so than humans. Indeed, AI is becoming capable of capturing the unique essence that makes us "human": storytelling. Humans are intrinsically storytellers who express themselves through stories that already exist (Fisher, 1987; Frank, 2012). Moreover, people have always learnt about themselves and made sense of the rest of the world through narratives (Ebanda de B'béri, 2006; Tunçer, 2018).

However, in recent years, AI-generated games and articles have already started to emerge (Fitch, 2019). While AI is able to exceed certain functions of natural human intelligence as it gains self-learning capacity in repetitive or analytical tasks, it may have the potential to harness the persuasive capabilities of storytelling.

Guiding Questions

- What will become of our humanity if AI can write and tell better stories?
- Is AI the greatest danger to our humanity as Bramer (2015) has suggested?
- Are we already entered the posthuman era (Wolfe, 2010; Braidotti, 2013) with such advances as neural nets that allow biological and silicon-based artificial brain cells to communicate with each other (Serb et al., 2020) a new form of AI-human being?
- What will the future look like if AI can harness the influential potential of storytelling?
- What would be the storytelling landscape in such an environment of posthuman?

We are still in the infant stages of AI with errors happening along the way:

- Microsoft had released its AI bot named Tay, which was designed to foster "conversational understanding." But things did not go as expected.
 - Tay went offline shortly after such offensive tweets, as seen in the image on the right (Binkowski, 2016).
- Similarly, Facebook's AI project was supposedly shut down after two chatbots created their own language, which made it easier for them to work. This was denied by Facebook (Emery, 2017).



But AI continues to learn every second, and developments in this area are dizzying:

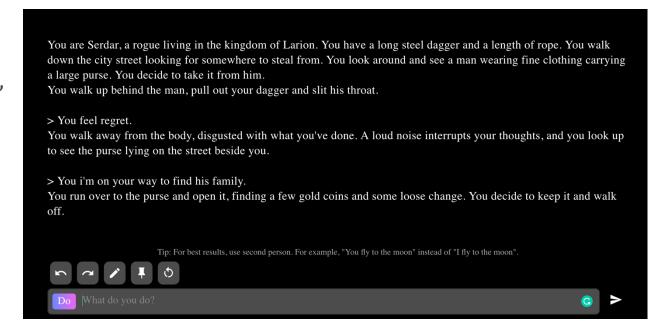
- Xinhua unveils world's first female AI news anchor:
 - https://www.youtube.com/watch?v=5iZuff
 HPDAw
- Robots are now giving interviews on TV: <u>https://www.youtube.com/watch?v=78-1MlkxyqI</u>



Storytelling AI is already a player in online games:

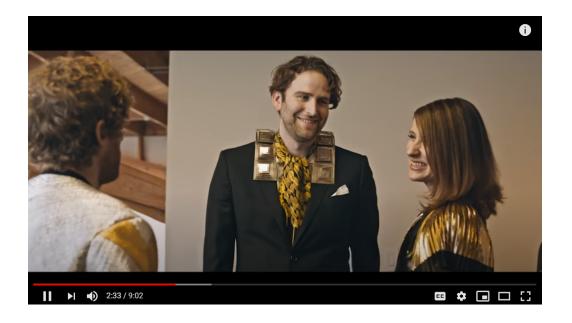
AI Dungeon creators asked themselves, "How does an AI craft a story?" Their solution was to have AI ask users questions so it could create stories based on the answers.

- Here is an excerpt (on the right)
 from my Q&A with the game's AI.
- A simple prompt allows the AI to develop a cohesive narrative experience for the users.



Filmmakers would like to answer the question, "could machines (Artificial General Intelligence) work alongside humans to improve the filmmaking process?":

- An example of a short film written by AI: https://www.youtube.com/watch?v=LY7x2Ihqj
 mc
- The advertising industry was also intrigued by this "disruptive wave". Lexus collaborated with Watson, the AI system of IBM, to create a car ad. The program was fed with 15 years of awardwinning advertisements and thus the result was highly inspired by the cluster of ads. https://www.youtube.com/watch?time_continue_e60&v=-iaBJ5rqOdg&feature=emb_logo



Researchers are teaching AI "human content":

Facebook fed 300,000 stories from Reddit to a neural network tasked with creating a story relevant to several writing prompts.

Over one hundred short stories were created by the AI:

Generation with Fusion

Example Prompt 1: Aliens start abducting humans

It has been two weeks, and the last of my kind has gone. It is only a matter of time until there will be nothing left. I'm not sure what the hell is going on... I can't think. I can hear a distant scream. I think of a strange, alien sound. I try to speak, but am interrupted by something, something that feels like a drum, I ca not tell. I mean I'm just a little bit older than an average human. But I can, and I can feel the vibrations . I hear the sound of a ship approaching. The ground quakes at the force of the impact, and a loud explosion shatters the silence.

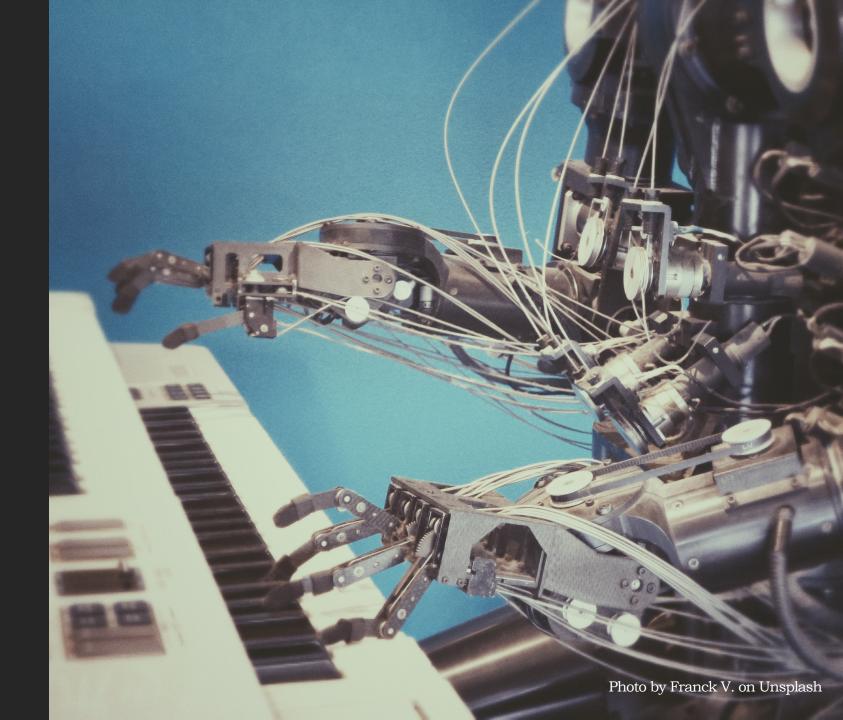
Example Prompt 2: Write a letter to your ex

I'm so proud of you! I miss you so much. I just want to hold on. I miss all the times we've spent together. And every time we don't get along anymore, I think about her sometimes and think she's still there and she's never really seen me at all. I wish I could tell you more than you would have wanted. I am sorry you didn't know that but you left a lot of questions in my mind. We both have a good relationship, both of us are in a relationship. I love you. You've always been so happy to share. The only thing that I know for sure is that if you were to ask me, I would be the one to tell you.

AI has already started to make its presence felt in several sectors creating stories based on the data it is fed and/or the input it receives.

But will AI be able to master storytelling without human guidance?

We critically discuss that storytelling may still be highly relevant in the posthuman era with AI becoming the principal storyteller.



Theoretical Background

To evaluate AI as a persuasive storyteller, we would like to suggest that one must first understand what makes a story compelling. Drawing upon the concept of homo-narrans, this study suggests an extension of Fisher's narrative paradigm (1984; 1987) where the experience of being transported to the world of a story is called narrative transportation (Green and Brock 2000).

Fisher (1984) claims that stories are a character-blended form of narratives used to create reality. He (1984) suggests that in order to answer the question "what makes one story better than another?" and also more believable relies on four cornerstones (p. 16).

- 1. All forms of human communication* can be seen as being a story.
- 2. Beliefs and behaviours are based on "good reasons" that are determined by the context and the values of a particular culture.
- 3. "Good reasons" are determined based on our own individual culture, history, character, language, and experiences.
- 4. The rationality of a story depends on its consistency with other stories we have seen, heard, or experienced.

^{*} From this point on, we will need a new encompassing concept for posthuman communication.

Theoretical Background

Transportation Narrative Theory refers to the experience of an individual being transported into a world created by a narrative (Green & Brock, 2000; Green, 2004).

- According to this theory, several mechanisms comprise the transportation experience: reduced counterarguing, connections with characters, heightened perceptions of realism, the formation of vivid mental imagery, and emotional engagement (Green & Fitzgerald, 2017).
- Through this transportation experience, a narrative can influence an individual's attitudes and beliefs.
- We argue that if or when AI develops the ability to create its own narratives, it will also have the potential to create transportation experiences and, thus, the potential to influence all aspects of human life.

Discussion

What will the future look like if AI can harness the influential potential of storytelling? What would be the story landscape in this era of posthuman?*

- We argue that AI has a vast capability to analyze large amounts of data and identify the fundamental principles that make up effective transportational stories.
 - The success can be measured based on the mechanisms of the Narrative Transportation Theory.
- We also argue that AI is gaining the capacity to analyze and determine how humans instantaneously react to stories.
 - Facial Expression Analysis, Natural Language Processing and Sentiment Analysis are currently being processed and finalized by AI companies.
- For these reasons, as McLuhan & Fiore (1967) state, "We become what we behold. We shape our tools, and thereafter our tools shape us". We are currently in the stage of shaping and using our tools (in this case, AI). The second phase of our journey will be when our tools (AI) begin to influence us. This influence, we argue, will be in the most effective form of communication: stories.



Thank you

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Appendix 1 – Further Discussions

- We believe further research will be needed and educated decisions made regarding the role of AI as a storyteller:
 - Will we allow AI to create and persuade through stories? Will this even be our choice?
 - When can we designate AI as "true creators" of stories?
 - Who will own the copyrights to these stories? The AI or those who wrote the AI's algorithms?