

Mosaic: Generating The New Yorker Style Cartoons using Text-to-Image Diffusion Models

Mehul Sudrik, Rajesh Nagula, Utsav Oza

ECE-GY 7123 Deep Learning

Problem Statement

“Sometimes I wonder if I’m too old to be a cartoonist, but then I remember that I’m just not funny enough.”

This self-deprecating joke highlights the challenges of creating The New Yorker style cartoons, that uniquely combines a whimsical art style, witty humor, and a subtle commentary on modern life. Cartoon enthusiasts and creative professionals alike know that creating such cartoons can be a daunting task that requires both artistic talent and a knack for satire. In this project, we aim to explore techniques to simplify the cartoon creation process by using Text-to-Image Diffusion models to specifically generate high-quality The New Yorker style cartoons from natural language captions.

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Model

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References

- Bouville, M. 2008. Crime and punishment in scientific research. arXiv:0803.4058.
- Clancey, W. J. 2021. The Engineering of Qualitative Models. Forthcoming.
- NASA. 2015. Pluto: The ‘Other’ Red Planet. <https://www.nasa.gov/nh/pluto-the-other-red-planet>. Accessed: 2018-12-06.