

## CS230 Hands-on session 2: “How to get started with projects?”

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Today, you will learn how to get started with a project. We will use mentimeter during this section. Please connect on [www.menti.com](http://www.menti.com) and enter the access code provided by the TA.

1. You are working on a project entitled “Improving Neural Style Transfer”. If you were to plan your work, what would be the steps to carry-out? ([Answer on menti.com](#))
2. As first step in your project’s implementation, you’d like to learn about existing implementations. Search online and choose a github repository that you think would be good to study. ([Post the link on www.menti.com](#))
3. What made you choose this github repository? ([Answer on menti.com](#))
4. The github repository “[neural-style](#)” seems to satisfy our criteria, let’s focus on it. Take 5 minutes to read and run the github repository on its inherent data. You should see the message “Iteration .../100”. What challenges did you encounter?
5. It seems that a few minutes is not enough to reproduce good results locally, what can you tweak to overcome this challenge? ([Answer on menti.com](#))
6. Run this code on your chosen content and style images. Use 100 iterations.

This section was designed to help you get started with the existing code bases related to your project. Note that we only tested the model here, and did not train it. At home, find a github repository that is relevant to your project and try to reproduce the results.

If you’re interested in the style transfer problem, here are some interesting papers for you to read through:

- [A Neural Algorithm of Artistic Style](#), Gatys et al. (2015)
- [Perceptual Losses for Real-Time Style Transfer and Super-Resolution](#), Johnson et al. (2016)
- [A learned representation for artistic style](#), Dumoulin et al. (2016)
- [Exploring the structure of a real-time, arbitrary neural artistic stylization network](#), Ghiasi et al. (2017)
- [Neural Artistic Style: a Comprehensive Look](#), Desai (2017)
- <https://arxiv.org/abs/1701.01036>