



DSC 180 A01 - EXPLAINABLE AI DISCUSSION 6: GRAD-CAM IN CONTEXT

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ANNOUNCEMENTS

- Instructor office hour Fridays 10-11am
- Checkpoint 2 due this Sunday at 11:59pm
- Next Participation due Nov 24th at noon

DISCUSSION OF METHODOLOGY ASSIGNMENT #6

In this assignment, you will start thinking of ideas for your Capstone project proposal. Please write a few sentences on each of the prompts below:

- The most interesting topic covered in your domain this quarter?
- Describe a potential investigation you would like to do for a project proposal?
- What is a potential change you would like to make to the approach taken in your current Q1 project?
- What other techniques/methods would you be interested in using in your project?

DONE: TASKS THIS WEEK

Reading

- Read chapters 3 and 4 of Deep Learning with Python (by François Chollet)

Participation

Answer the following questions:

- What are the key components of a neural network for deep learning?
- What are the major challenges when designing a neural network for deep learning?
- What are the main differences between supervised, unsupervised, self-supervised and reinforcement learning?

TO DO: TASKS FOR NEXT WEEK

Reading

- Read chapter 5.4 of Deep Learning with Python (by François Chollet).
- Skim chapters 5.1-5.3 as needed to be able to follow chapter 5.4.

Participation Assignment (due November 24th at noon)

Book chapter 5.4 describes three ways for visualizing what neural networks learn: intermediate activations, CNN filters, heatmaps. Summarize each of them in your own words in 2-3 sentences each.