

✔ Congratulations! You passed!

Grade received 80% Latest Submission Grade 80% To pass 80% or higher

Go to next item

1. Which of the following are some aspects in which AI has transformed business?

1 / 1 point

- ☐ Creating an AI-powered society.
- ☒ Web searching and advertisement.
- ☐ Eliminating the need for health care services.
- ☐ AI has not been able to transform businesses.

Expand

✔ Correct

Yes. AI has helped to make a fit between services or results and consumers or queries.

2. Which of the following play a major role to achieve a very high level of performance with Deep Learning algorithms?

0 / 1 point

- ☐ Deep learning has resulted in significant improvements in important applications such as online advertising, speech recognition, and image recognition.
- ☒ Large models.

✔ Correct

Yes. In most cases it is necessary for a very large neural network to make use of all the available data.

- ☐ Better designed features to use.
- ☒ Large amounts of data.

✔ Correct

Yes. Some of the most successful Deep Learning algorithms make use of very large datasets for training.

- ☐ Smaller models.

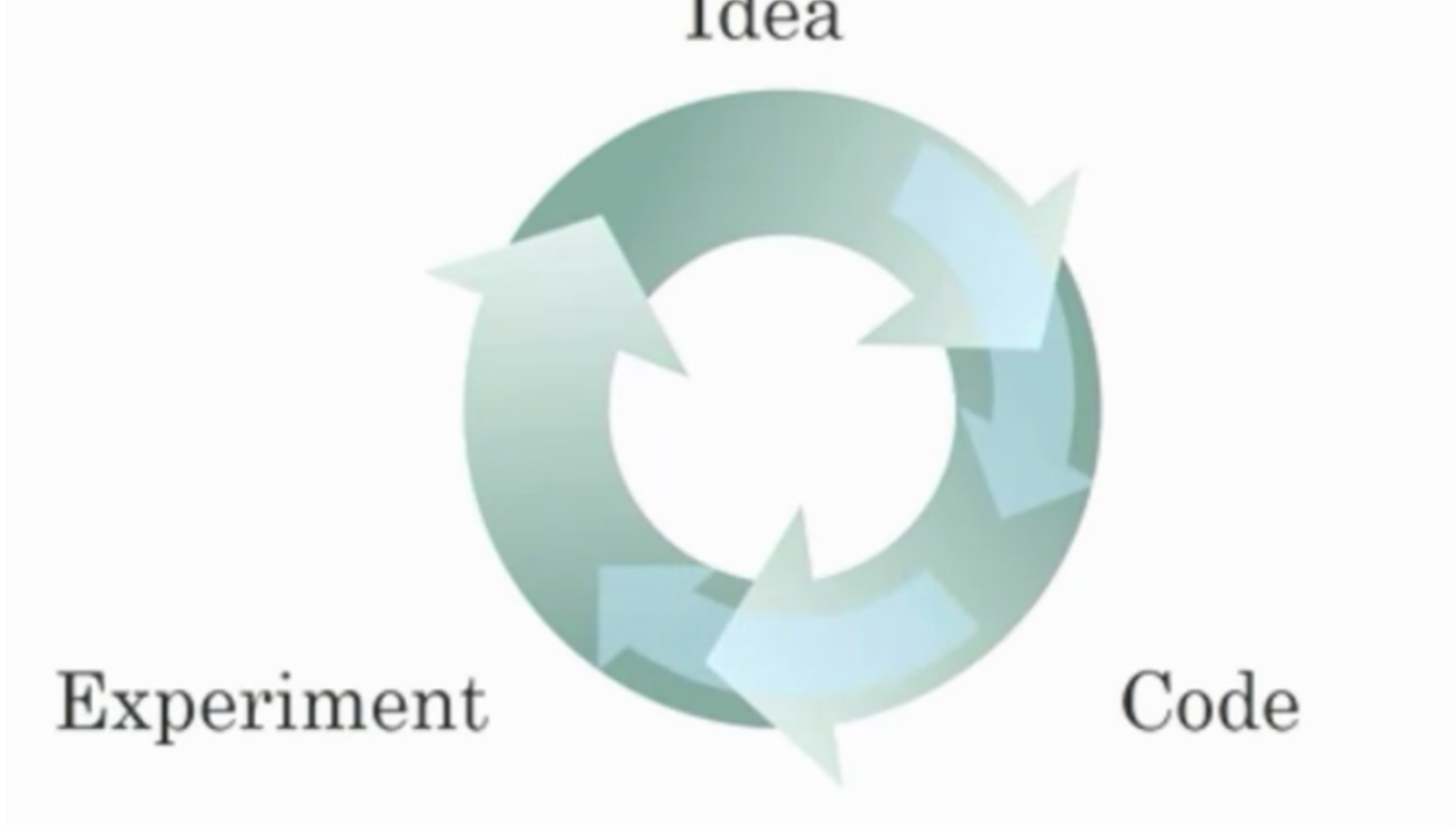
Expand

✘ Incorrect

You didn't select all the correct answers

3. Recall the diagram of iterating over different ML ideas. Which of the stages shown in the diagram was improved with the use of a better GPU/CPU?

0 / 1 point



- ☐ With larger datasets, the iteration process is faster.
- ☒ Experiments finish faster, producing better ideas through increased iteration tempo.

✔ Correct

Yes. The experiments help to test ideas, by getting the feedback from the experiments new variations can be tested and the results might indicate new directions to explore.

- ☐ Without better hardware, there is no way to train models faster.
- ☐ Some algorithms are specifically designed to run experiments faster.

Expand

✘ Incorrect

You didn't select all the correct answers

4. When experienced deep learning engineers work on a new problem, they can usually use insight from previous problems to train a good model on the first try, without needing to iterate multiple times through different models. True/False?

1 / 1 point

- ☒ False
- ☐ True

Expand

✔ Correct

Yes. Finding the characteristics of a model is key to having good performance. Although experience can help, it requires multiple iterations to build a good model.

5. ReLU stands for which of the following?

1 / 1 point

- ☒ Rectified Linear Unit
- ☐ Rectified Last Unit
- ☐ Representation Linear Unit
- ☐ Recognition Linear Unit

Expand

✔ Correct

Correct, ReLU stands for Rectified Linear Unit.

6. Images for cat recognition is an example of "structured" data, because it is represented as a structured array in a computer. True/False?

1 / 1 point

- ☐ True
- ☒ False

Expand

✔ Correct

Yes. Images for cat recognition are examples of "unstructured" data.

7. Which of the following are examples of structured data? Choose all that apply.

1 / 1 point

- ☐ A dataset with short poems.
- ☒ A dataset with zip code, income, and name of a person.

✔ Correct

Yes, this data can be presented in a table. This is an example of "structured" data.

- ☒ A dataset of weight, height, age, the sugar level in the blood, and arterial pressure.

✔ Correct

Yes, this data can be presented in a table. This is an example of "structured" data.

- ☐ A set of audio recordings of a person saying a single word.

Expand

✔ Correct

Great, you got all the right answers.

8. RNNs (Recurrent Neural Networks) are good for data with a temporal component. True/False?

1 / 1 point

- ☒ True
- ☐ False

Expand

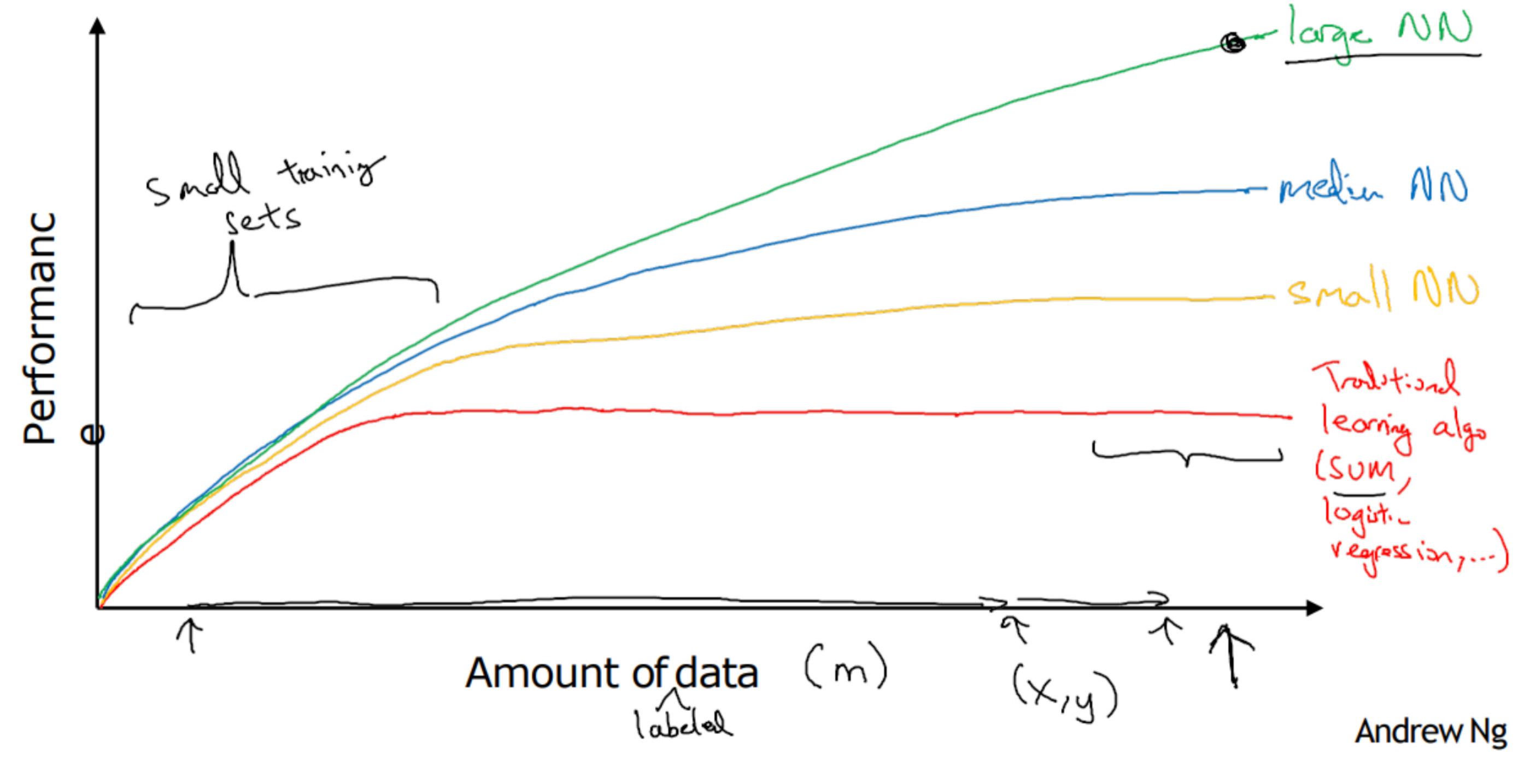
✔ Correct

Yes, RNN are designed to work with sequences; the elements of a sequence can be sorted by a temporal component.

9.

1 / 1 point

Scale drives deep learning progress



From the given diagram, we can deduce that Large NN models are always better than traditional learning algorithms. True/False?

- ☒ False
- ☐ True

Expand

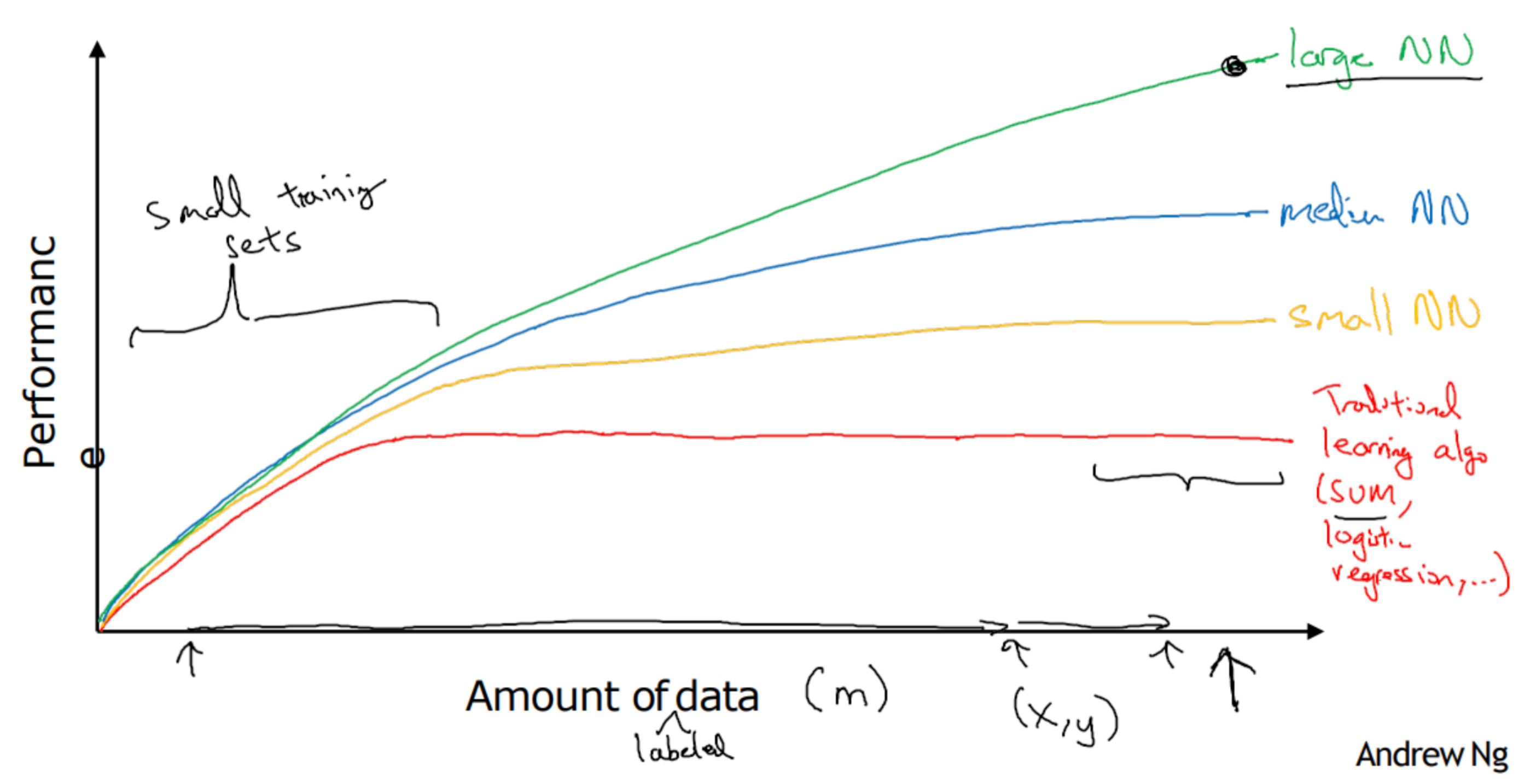
✔ Correct

Yes, when the amount of data is not large the performance of traditional learning algorithms is shown to be the same as NN.

10. Assuming the trends described in the figure are accurate. Which of the following statements are true? Choose all that apply.

1 / 1 point

Scale drives deep learning progress



- ☐ Decreasing the training set size generally does not hurt an algorithm's performance, and it may help significantly.
- ☒ Increasing the size of a neural network generally does not hurt an algorithm's performance, and it may help significantly.

✔ Correct

Yes. According to the trends in the figure above, big networks usually perform better than small networks.

- ☐ Increasing the training set size of a traditional learning algorithm always improves its performance.
- ☒ Increasing the training set size of a traditional learning algorithm stops helping to improve the performance after a certain size.

✔ Correct

Yes. After a certain size, traditional learning algorithms don't improve their performance.

Expand

✔ Correct

Great, you got all the right answers.