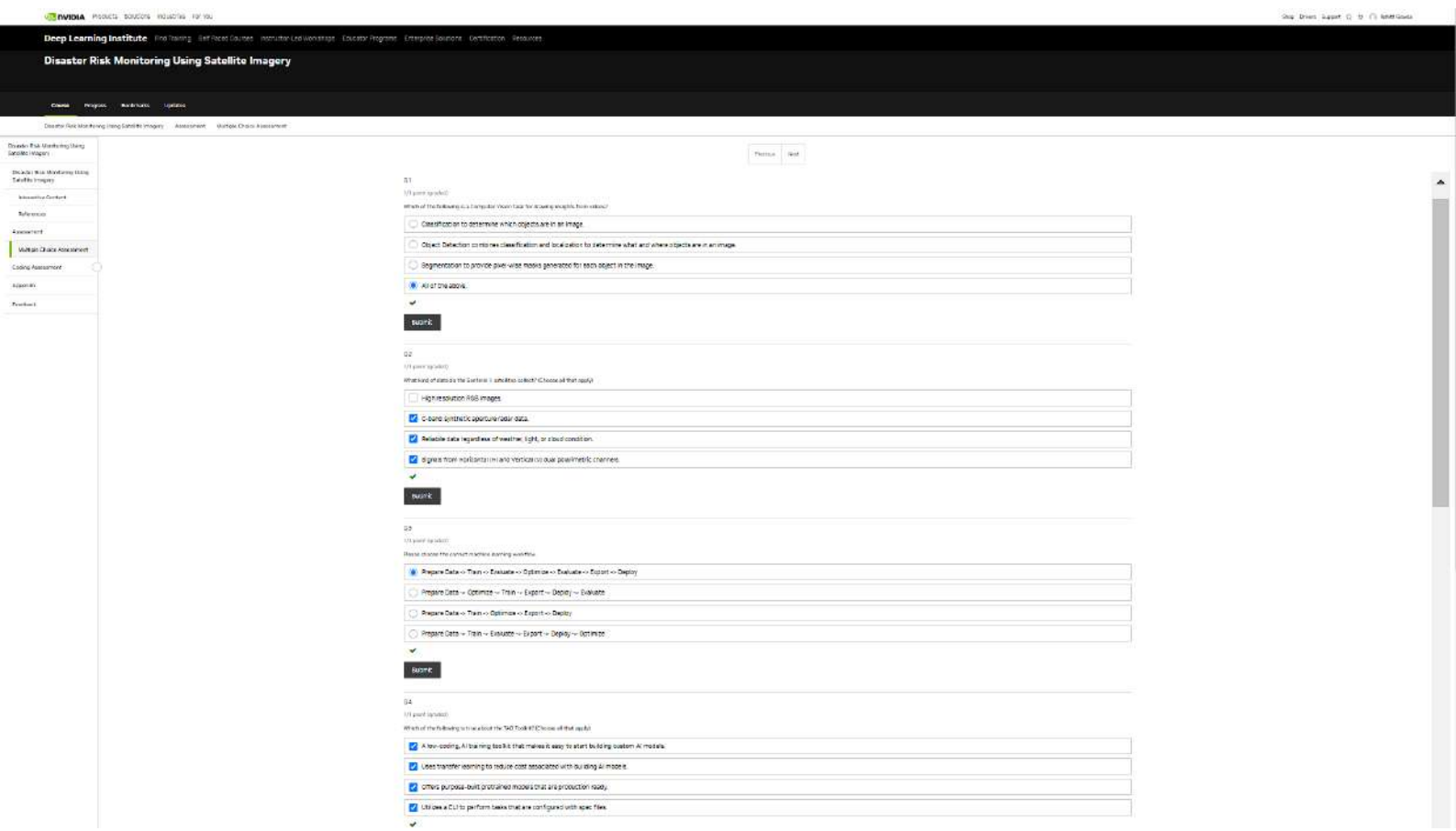
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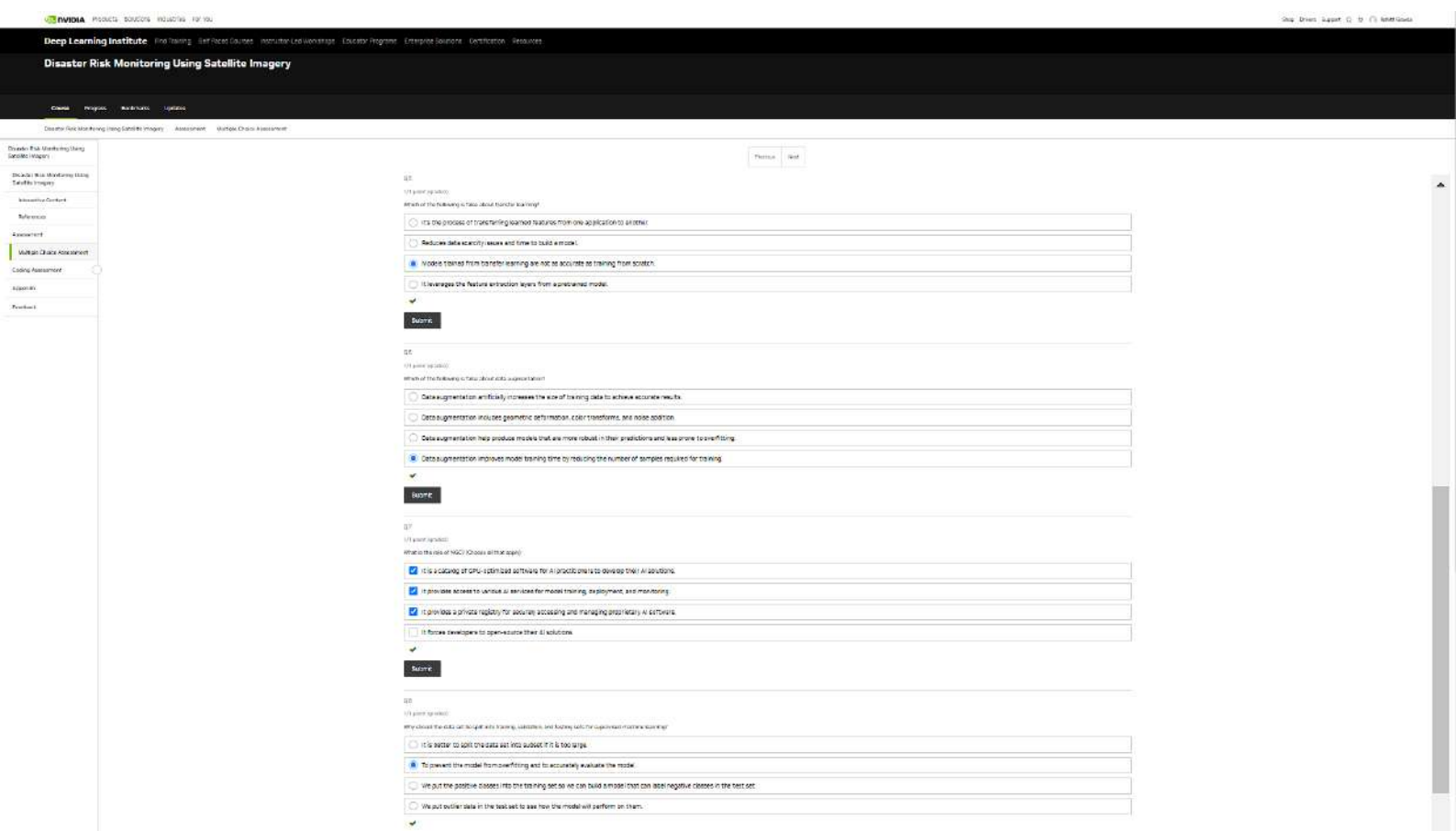
Q1
Which of the following is a Computer Vision task for drawing insights from videos?
Classification to determine which objects are in an image.
Object Detection combines classification and localization to determine what and where objects are in an image.
Segmentation to provide pixel-wise masks generated for each object in the image.
All of the above.
Submit
Q2
What kind of data is the Sentinel-1 satellites collect? (Choose all that apply)
High resolution RGB images.
C-band synthetic aperture radar data.
Reliable data regardless of weather, light, or cloud condition.
Signals from horizontal (H) and vertical (V) dual polarimetric channels.
Submit
Q3
Please choose the correct machine learning workflow.
Prepare Data -> Train -> Evaluate -> Optimize -> Evaluate -> Export -> Deploy
Prepare Data -> Optimize -> Train -> Export -> Deploy -> Evaluate
Prepare Data -> Train -> Optimize -> Export -> Deploy
Prepare Data -> Train -> Evaluate -> Export -> Deploy -> Optimize
Submit
Q4
Which of the following is true about the TAO Toolkit? (Choose all that apply)
A low-coding, AI training toolkit that makes it easy to start building custom AI models.
Uses transfer learning to reduce cost associated with building AI models.
Offers purpose-built pretrained models that are production ready.
Utilizes a CLI to perform tasks that are configured with spec files.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Q5
1/1 point (graded)
Which of the following is false about transfer learning?
It's the process of transferring learned features from one application to another.
Reduces data scarcity issues and time to build a model.
Models trained from transfer learning are not as accurate as training from scratch.
It leverages the feature extraction layers from a pretrained model.
Submit
Q6
1/1 point (graded)
Which of the following is false about data augmentation?
Data augmentation artificially increases the size of training data to achieve accurate results.
Data augmentation includes geometric deformation, color transforms, and noise addition.
Data augmentation help produce models that are more robust in their predictions and less prone to overfitting.
Data augmentation improves model training time by reducing the number of samples required for training.
Submit
Q7
1/1 point (graded)
What is the role of NGC? (Choose all that apply)
It is a catalog of GPU-optimized software for AI practitioners to develop their AI solutions.
It provides access to various AI services for model training, deployment, and monitoring.
It provides a private registry for securely accessing and managing proprietary AI software.
It forces developers to open-source their AI solutions.
Submit
Q8
1/1 point (graded)
Why should the data set be split into training, validation, and testing sets for supervised machine learning?
It is better to split the data set into subset if it is too large.
To prevent the model from overfitting and to accurately evaluate the model.
We put the positive classes into the training set so we can build a model that can label negative classes in the test set.
We put outlier data in the test set to see how the model will perform on them.

Submit

Q8

1/1 point (graded)

Why should the data set be split into training, validation, and testing sets for supervised machine learning?

- It is better to split the data set into subset if it is too large.
- To prevent the model from overfitting and to accurately evaluate the model.
- We put the positive classes into the training set so we can build a model that can detect negative classes in the test set.
- We put outlier data in the test set to see how the model will perform on them.

✔

Retake

Q9

1/1 point (graded)

What are the key factors affecting model inference? (Choose all that applies)

- ☑ Model accuracy.
- ☑ Inference throughput.
- ☑ Inference latency.
- ☑ Computational cost associated with inference.

✔

Submit

Q10

1/1 point (graded)

How does deep learning-based image segmentation for flood mapping assist disaster management? (Choose all that apply)

- ☑ Quickly generate alerts for affected populations.
- ☑ Perform accurate impact analysis and effective mitigation strategies.
- ☑ Monitor and study the evolution of disaster events over time.
- ☑ Assist with rapid response and recovery planning.

✔

Submit