Your grade: 50%

Your latest: **50%** • Your highest: **50%** • To pass you need at least 70%. We keep your highest score.

Try again

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1. How does generative AI help to correct inconsistencies and missing values?   **0 / 1 point**

   ◯ By augmenting data

   ◯ By synthetic data generation

   ⦿ By visualizing data

   ◯ By anonymizing data

   ⊗ **Incorrect**
   Incorrect. Please review the Generative AI for Data Engineering video.

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2. How does generative AI address the challenge of limited data availability for testing, development, and model training?   **1 / 1 point**

   ◯ Data exploration

   ◯ Automation of repetitive tasks

   ⦿ Synthetic data generation

   ◯ Data augmentation

   ✓ **Correct**
   Correct! Synthetic data generation addresses the challenge of limited data availability for testing, development, and model training, where real data may be sensitive or restricted.

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3. Which tool automates infrastructure deployment, using generative AI to craft and optimize cloud resource configurations?   **1 / 1 point**

   ◯ Kubernetes

   ⦿ Terraform

   ◯ dbt

   ◯ Apache Airflow

   ✓ **Correct**
   Correct! Terraform automates infrastructure deployment, using generative AI to craft and optimize cloud resource configurations.

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4. Which tool provides versioned data storage and lineage for data science workflows?   **0 / 1 point**

   ◯ StreamSets

   ⦿ Snowflake's Snowpark

   ◯ Pachyderm

   ◯ Great Expectations

   ⊗ **Incorrect**
   Incorrect. Please review the Generative AI Tools for Data Engineering reading.

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5. Which tool enables real-time data pipeline management?   **0 / 1 point**

   ⦿ Apache Airflow

   ◯ Fivetran

   ◯ Prefect

   ◯ RudderStack

6. What is the difference between generative AI and discriminative models?   `1 / 1 point`

   ○ Generative AI models predict a label for given inputs, unlike discriminative models that create data that has never been seen before.

   ○ Generative AI models separate data points into classes, while discriminative models generate data that resemble training data.

   ○ Generative AI models separate data points into classes, while discriminative models focus on the distribution of data to generate new instances.

   ◉ Generative AI models generate new data instances, while discriminative models predict a label for given inputs.

   ✓ **Correct**
       Correct! Generative models focus on the distribution of data to generate new instances, unlike discriminative models, which predict a label for given inputs.

7. Which tool leverages generative AI to automate data preparation tasks like cleaning data, handling missing values, and so on?   `1 / 1 point`

   ◉ DataRobot

   ○ Tonic.ai

   ○ Databricks AutoML

   ○ SyntheticGuru

   ✓ **Correct**
       Correct! DataRobot leverages AI to automate various data preparation tasks. This task includes cleaning data, handling missing values, and feature engineering, essential steps in the data engineering pipeline.

8. Which generative AI model can be adapted to understand and generate the structure of database schemas?   `1 / 1 point`

   ◉ Transformer

   ○ TensorFlow

   ○ CNN

   ○ PyTorch

   ✓ **Correct**
       Correct! Given their success in understanding sequence and structure in natural language processing (NLP), transformer models can be adapted to understand and generate the structure of database schemas.

9. Which generative AI model did Netflix use to analyze historical streaming data patterns and generate optimized database schema designs?   `0 / 1 point`

   ○ Pytorch

   ○ Staq

   ○ GANs

   ◉ TensorFlow

   ⊗ **Incorrect**
       Incorrect. Please review the Successful Implementations of Generative AI for Data Design video.

10. Which AI-powered tool offers an "Auto Schema" feature and analyzes data types, relationships, and patterns, offering a solid starting point for your data pipelines?   `0 / 1 point`

   ○ StitchData

   ○ Pytorch

   ○ Staq

Schemawriter

Incorrect
Incorrect. Please review the Automating Schema Design with Generative AI video.