

Latest Version: 13.0

Question: 1

HOTSPOT

To complete the sentence, select the appropriate option in the answer area.

Answer Area

A relational database is appropriate for scenarios that involve a high volume of

changes to relationships between entities.
geographically distributed writes.
transactional writes.
writes that have varying data structures.

Answer:

A relational database is appropriate for scenarios that involve a high volume of

changes to relationships between entities
geographically distributed writes
transactional writes
writes that have varying data structures

Explanation:

Disadvantages of non-relational databases include: Data Consistency — non-relational databases do not perform ACID transactions.

Note: Relational databases are optimized for writes. They are optimized for consistency and availability. Advantages of relational databases include simplicity, ease of data retrieval, data integrity, and flexibility.

Incorrect Answers:

Use a relational database when data that you work with is structured, and the structure is not subject to frequent changes.

Use Cloud storage (no relational database) for geographically distributed writes.

Reference:

<https://towardsdatascience.com/choosing-the-right-database-c45cd3a28f77>

Question: 2

HOTSPOT

To complete the sentence, select the appropriate option in the answer area.

Answer Area

An extract, load, and transform (ELT) process requires

a data pipeline that includes a transformation engine.
a separate transformation engine.
a target data store powerful enough to transform data.
data that is fully processed before being loaded to the target data store.

Answer:

Answer Area

An extract, load, and transform (ELT) process requires

Question: 3

A bar chart showing year-to-date sales by region is an example of which type of analytics?

- A. descriptive
- B. diagnostic
- C. predictive
- D. prescriptive

Answer: B

Question: 4

HOTSPOT

To complete the sentence, select the appropriate option in the answer area.

Answer Area

A visualization that shows a university's current student enrollment versus the maximum capacity is an example of analytics.

- cognitive
- descriptive
- predictive
- prescriptive

Answer:

A visualization that shows a university's current student enrollment versus the maximum capacity is an example of analytics.

- cognitive
- descriptive
- predictive
- prescriptive

Explanation:

Generally speaking, data analytics comes in four types (Figure 1):

Descriptive, to answer the

question: What's happening?

Diagnostic, to answer the question: Why's happening?

Predictive, to answer the question: What will happen?

Prescriptive, to answer the question: What actions should we take?

Reference:

<https://azure.microsoft.com/en-us/blog/answering-whats-happening-whys-happening-and-what-will-happen-with-iot-analytics/>

Question: 5

DRAG DROP

Your company plans to load data from a customer relationship management (CRM) system to a data warehouse by using an extract load, and transform (ELT) process.

Where does data processing occur for each stage of the ELT process? To answer, drag the appropriate locations to the correct. Each location may be used once, or not at all, You may need to drag the split bar between panes or scroll to view content.

NOTE: Each correct selection is worth one point.

| Locations | Answer Area |
|------------------------------------|---------------------|
| An in-memory data integration tool | Extract: Location |
| The CRM system | Load: Location |
| The data warehouse | Transform: Location |

Answer:

Extract:

The CRM system

Load:

The data warehouse

Transform:

An in-memory data integration tool

Explanation:

Box 1: The CRM system

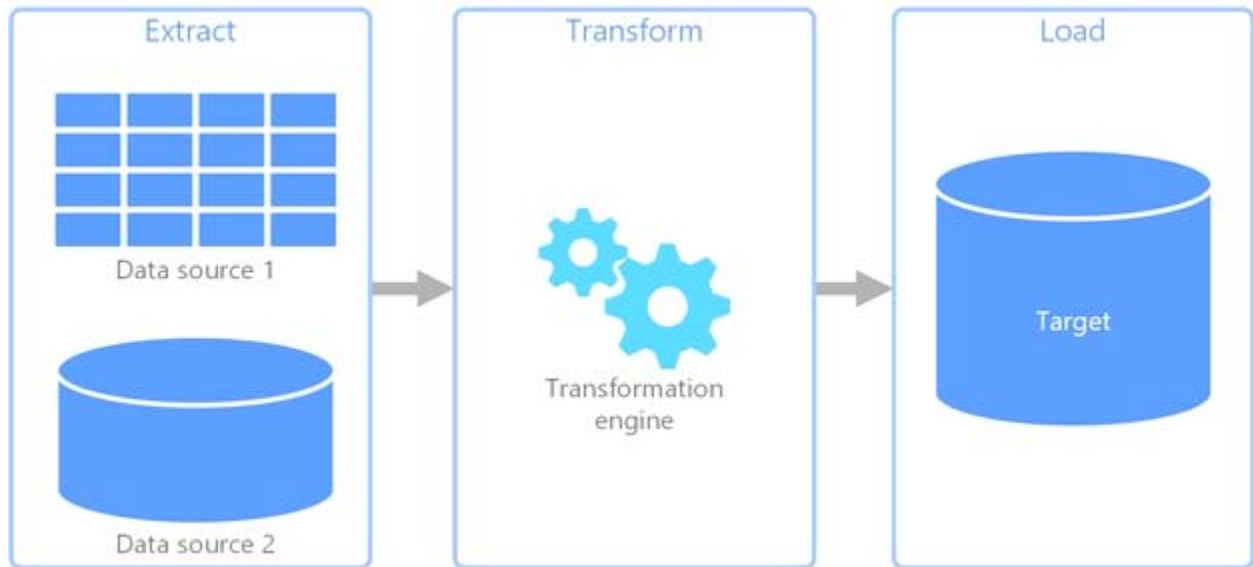
Data is extracted from the CRM system.

Box 2: The data warehouse

Data is loaded to the data warehouse.

Box 3: An in-memory data integration tool

The data transformation that takes place usually involves various operations, such as filtering, sorting, aggregating, joining data, cleaning data, deduplicating, and validating data.



Reference:

<https://docs.microsoft.com/en-us/azure/architecture/data-guide/relational-data/etl>