A3.1

Database fundamentals

CHAPTER ASSIGNMENT · 12 MARKS

Name _____ Class _____ No. _____ Date _____

Answer every question in the space given. Show your working. You may use the chapter page to help you.

Questions from the Guru Jazzy chapter page, for classroom use.

Exam-style questions

1. Define the term “database”. [1]

2. Define “primary key” and “foreign key”. [2]

3. Explain what is meant by referential integrity. [2]

4. A school stores which students take which subjects. Explain how to represent this. [3]

5. A music streaming firm is deciding whether to use a relational database for user accounts and billing. Discuss. [4]

Chapter quiz

Q1 What is a row in a table also called?

A	B	C	D
A tuple or record	An attribute	A schema	A key

Q2 What is a column also called?

A	B	C	D
An attribute or field	A tuple	A record	An entity

Q3 What must a primary key be?

A	B	C	D
Unique for each record	A number	Repeated	Always the first column

Q4 A foreign key...

A	B	C	D
Refers to a primary key in another table	Must be unique in its table	Encrypts a table	Is always a name

Q5 When do you need a composite key?

A	B	C	D
When no single attribute is unique	When a table is large	When there is only one column	Never

Q6 What does referential integrity prevent?

A	B	C	D
A foreign key with no matching primary key	Long names	Using SQL	Multiple users

Q7 How is many-to-many built in a database?

A	B	C	D
With a linking table	With one foreign key	It is automatic	It cannot be represented at all

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Q8 Why are relational databases poor at unstructured data?

A	B	C	D
Records share no common fields for a schema	They cannot store text	They run out of keys	SQL is banned

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End of assignment · Check your answers against the chapter at gurujazzy.com/subjects/ib-computer-science/a3-1-database-fundamentals/