3 Schema Architecture And Data Independence

Data Independence Achieved through the use of 3 levels of abstraction

The Three Schema Architecture

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Definition:

- Data: Raw facts stored
- ANSI-SPARC Architecture (Three-Schema Architecture)
- External
- Internal level

- A major objective of ANSI-Sparc architecture is to provide data independence
- Immunity of external schemas to changes in the conceptual schema

Data independence requires that a change at any one level of data representation

The Three-
Schema Architecture of Database Design.

Refers to immunity of external schemas to changes in conceptual schema, Conceptual Data Independence and the ANSI-SPARC Three-Level Architecture.

2.1 Three Schema Architecture: Internal, Conceptual, External level.

2.2 Data Independence: Logical & Physical data independence.

2.3 Data Dictionary: Data model, Schemas and instances, Three-schema architecture, Catalog (data and functional independence, Database modeling, Managing data).


3. How to process huge amounts of data (≥ terabytes) efficiently?

4. Three layer schema architecture & data independence.

3: data model, database schema, database state, three schema architecture and data independence, relational model (basic concepts, key/entity/referential).

Three level architecture designed so that upper levels are unaffected by change to lower. Logical Data Independence.

2.2 To address the issue of data independence, the ANSI-SPARC three-level The conceptual schema should be created separately with a routine to map the.

3.2 Compare and contrast the two-tier client-server architecture for traditional.

Achieved through the use of three levels of data abstraction. (also called three-level schema architecture). – Logical Data Independence: Ability to modify logical.
The main advantage of three-schema architecture is that it provides data independence. Data independence is the ability to change the schema at one level of the database that a particular user group is interested in.

Three-Schema Architecture and Data Independence

Data Independence: Capacity to change. Brief history of database applications, when not to use a DBMS.

Data models, schemas and instances, three-schema architecture and data independence.

An architecture for compartmentalizing database descriptions. The three-schema architecture was proposed as a way to achieve data independence.

Some IT experts talk about the three-schema architecture in the context of changing levels without affecting other levels or in terms of data independence. Tables (rows and columns) and data is extracted from them by selecting columns and rows. DBMS architecture and data independence: The three-schema architecture.

GTU Code: 3330703, Semester: 3, Year: 2

Database System Architecture: Define schemas, subschemas and instances, explain three-level ANSI SPARC architecture, differentiate between physical and logical data independence.
Data Models, Schemas, and Instances, Types of Data Models, Three Schema Architecture and Data Independence, Database Languages and Interfaces.