



Australian Government

Assessment Requirements for ICTDBS502

Design a database

Release: 1

Assessment Requirements for ICTDBS502 Design a database

Modification History

Release	Comments
Release 1	This version first released with ICT Information and Communications Technology Training Package Version 1.0.

Performance Evidence

Evidence of the ability to:

- identify and confirm client requirements for a database application
- design database elements including:
 - structure
 - indexes
 - queries
 - screens
 - reports
- design secure access to the database
- confirm final database design with the client.

Note: If a specific volume or frequency is not stated, then evidence must be provided at least once.

Knowledge Evidence

To complete the unit requirements safely and effectively, the individual must:

- explain the process of data analysis, particularly in determining data types and data structures, query and report design
- describe the data modelling related to developing the conceptual data model
- explain how data redundancy is identified
- describe database management system (DBMS) fundamentals, particularly during the design phase
- explain encryption and authentication as these apply to database security features
- outline the functions and features of data types, and data structures
- describe the functions, and features, of databases
- describe logical design concepts, particularly those related to designing data structures, queries screens and reports

- outline the object model design concepts, particularly those related to designing data structures, queries, screens and reports
- explain the term ‘scalability’ as it applies to databases.

Assessment Conditions

Gather evidence to demonstrate consistent performance in conditions that are safe and replicate the workplace. Noise levels, production flow, interruptions and time variances must be typical of those experienced in the database field of work, and include access to:

- equipment and materials
- current industry accepted database software
- network or other system for remote or multi-user access
- business requirements
- computer-aided software engineering (CASE) or diagramming software.

Assessors must satisfy NVR/AQTF assessor requirements.

Links

Companion Volume implementation guides are found in VETNet -

<https://vetnet.gov.au/Pages/TrainingDocs.aspx?q=a53af4e4-b400-484e-b778-71c9e9d6aff2>