

SVQ for IT Users (ITQ) — level 3 (SCQF level 6)

F9C3 04: Data Management Software 3

4 SCQF credit points at SCQF level 6

Description: This is the ability to use a software application designed to store and retrieve data needed for a variety of business functions. It also includes an understanding of the features and facilities of the software and the purpose for which the data is stored.

Outcome	Skills and Techniques	Knowledge and Understanding
On completion of this Unit the candidate should be able to:		
1 Enter, edit and maintain data records in a data management system.	<ol style="list-style-type: none">1 Enter data accurately into records to meet requirements.2 Configure characteristics of groups of records.3 Check data records meet needs, using IT tools and making corrections as necessary.4 Interpret and respond appropriately to a range of data and application error messages.5 Manage data files effectively, in line with local and/or legal guidelines for the storage and use of data where available.	<ol style="list-style-type: none">1 Discuss when and how to change or create a new data entry form.2 Discuss and explain how to locate and amend data records.3 Evaluate and explain the risks to data security and procedures used for data protection.
2 Retrieve and display data records to meet requirements.	<ol style="list-style-type: none">1 Create and use queries to search for and retrieve information from the system.2 Create, define and set up reports to output information to meet requirements.3 Use the file handling techniques of the software to import and export data.4 Use available techniques to combine and link data.	<ol style="list-style-type: none">1 Determine and explain what queries and reports need to be run to output the required information.

Note: The **emboldened** items are exemplified in the Support Notes.

Evidence Requirements

Completion of a portfolio (manual, electronic or combination) to cover all of the Skills and Techniques and Knowledge and Understanding points stated above. The evidence generated should adhere to the Assessment Strategy for this award and encompass a range of evidence types.

NB: It is possible to achieve this Unit by Accreditation of Prior Achievement (APA), however, the relevant evidence must be referenced within the portfolio.

General information

This Unit equates to NOS (National Occupational Standards for IT Users 2009) code DMS: Data Management Software level 3. It has a stated number of SCQF credit points = 4 at SCQF level 6.

Support Notes

Summary

A SCQF level 6 (ITQ level 3) user can select and use advanced data management software tools and techniques efficiently to:

- ◆ enter complex information
- ◆ retrieve information using complex selection criteria
- ◆ produce customised reports from the system
- ◆ set up menus or short cuts

The data management system tools, functions and techniques will be described as 'advanced' because:

- ◆ the software tools and functions involved will be complex and at times involve having the idea that there may be a tool or function to do something (eg improve efficiency or create an effect), exploring technical support, self-teaching and applying
- ◆ the input, manipulation and output techniques involved will be complex, which will involve research, identification and application

Data management software is often implemented on relational database systems by providing predefined file and record structures, processes, reports and data-entry screens. This is about the use of these predefined objects.

Examples of data management software include proprietary systems for:

- ◆ Customer Relationship Management (CRM)
- ◆ Management Information System (MIS)
- ◆ Payroll
- ◆ Enterprise Resource Planning (ERP)

The user may also work with bespoke databases such as:

- ◆ membership records
- ◆ hire/rental records
- ◆ insurance quotes

Examples of context: Working with the software manufacturer or IT professional to develop and implement new data handling techniques; examples of customisation includes additional product training; creation of process triggers and workflow; assistance writing reports, complex data extracts or implementing Business Intelligence

Examples of content are given separately for highlighted text, where explanatory notes are required on terminology in the Outcomes, and do not form part of the standards. Such examples are not meant to form a prescriptive list for the purposes of assessment but rather to amplify and interpret the generic terms used in the Performance Criteria in the light of current usage of ICT systems and software. These examples are subject to change as new tools and techniques become commonplace and older ones drift out of use.

The examples given below are indicative of the learning content and are not intended to form a prescriptive list for the purpose of assessment.

Outcome 1

Benefits of data management system: Accessible, reliable, rapid access, shared view, up-to-date, accurate, secure; simplifies data handling; *constraints of using system, audit trail.*

Enter data: Use of data entry form, create new record, add record to table, create new record, add record to table, select and update fields; groups of records.

Record characteristics: Attributes, categories, teams, flags, keys.

Check data: Spell check, format, consistency, remove duplication, verify data; data validation techniques, record housekeeping.

Error messages: Data entry; using help; troubleshooting; logging, reporting and dealing with application errors.

Security risks and procedures: Access control; authorised use, password protection and management, user authentication.

Manage data files: File storage, data import and export, restore lost data; identify ineffective backup storage.

Guidelines for the storage and use of data: Set by employer or organisation. Policies relating to security, backup and data protection; guidelines for data format; compliance, audit and reporting requirements. File management will vary according to the application.

Outcome 2

Reports: Customised reports; *define report parameters; for others; system reports; errors in reports.*

Import and export data: To other systems or software; file formats; mail merge; data migration; data archiving.

Guidance on examples of evidence

Typical examples of evidence for Outcomes 1–3

Work such as liaising with the software manufacturer or IT professional to develop and implement new data handling techniques; examples of customisation include additional product training, creation of process triggers and workflow, assistance writing reports, complex data extracts or implementing Business Intelligence.

To assess competence in the Knowledge and Understanding sections for all of the Outcomes a knowledge test in the form of multiple-choice questions (say 16–20 questions) or candidate statement or expert witness testimonial statements or a semi structured interview could be employed. Either one or a combination of these methods would be appropriate. If oral questioning techniques are employed it is essential to keep a record of the questions asked, together with a record in a suitable format of the candidate's responses to these for evidence purposes.

Disabled candidates and/or those with additional support needs

The additional support needs of individual candidates should be taken into account when planning learning experiences, selecting assessment instruments, or considering whether any reasonable adjustments may be required. Further advice can be found on our website www.sqa.org.uk/assessmentarrangements