



(National Council for Vocational Awards)



Database Methods B20028

Practical Examination 2005

Duration: Two Hours

INSTRUCTIONS TO CANDIDATES

1. Attempt **all** tasks **in order**.
2. Read the paper throughout before you carry out any of the tasks.
3. Enter your name and examination number clearly on all printouts.
4. Printing may be carried out, under supervision, after the time allowed for the practical examination but no alteration may be made to saved files.
5. Files must be saved on your allocated network drive.
6. At the end of the examination, return all printouts and this examination paper to the supervisor.

Candidate Name: _____

Date: _____

James Reilly runs a retail outlet in Castlebar, Co. Mayo. He specialises in hardware items. Recently he has started to record details of the various products which he stocks. James Reilly wishes to set up a database to record these details and to enable him to retrieve information easily from the data stored.

1. Create a database/table with the name **REILLY1** to hold the following data extracted from the records of James Reilly.

Code	Product	Agent	Stock (Kg)	Price	Location	Carton
3201	Hammer	Doyle Bros	17	€16.50	Stores	12
3202	Mallet	Doyle Bros	21	€25.75	Shop	12
4215	Small Screwdriver	JJ Williams	49	€9.95	Stores	48
5247	Medium Screwdriver	Geo Ryan	57	€11.50	Stores	36
5248	Large Screwdriver	Geo Ryan	13	€12.90	Shop	36
6480	Hacksaw	Geo Ryan	10	€14.70	Warehouse	12
6481	Lump Hammer	Geo Ryan	5	€25.00	Stores	6
6482	Electric Nail-gun	Geo Ryan	25	€75.50	Shop	1
7246	Electric Drill	PJ Williams	51	€115.05	Warehouse	5
7247	Manual Drill	PJ Williams	7	€54.00	Stores	12
7248	Electric Saw	PJ Williams	6	€67.59	Stores	5

2. Complete the Database Structure Form provided to show field names, data types and field sizes/widths as appropriate.
3. Design and create a screen form to allow an operator to enter the data shown above into the database/table. The format of the form should be as follows:
 - Insert the title **Product Entry Form** centrally on the form.
 - Display two fields on each line (except the last line).
 - Place a label or title beside each field.
4. Print this screen form.
5. Input the data shown in the table above into the database/table which you have created.
6. Save the database/table as **REILLY1**
7. Print the whole database, **REILLY1** (either now or later) with the data organised on the **Product** field in ascending order (primary sort) and on the **Carton** quantity field in descending order (secondary sort).

8. For each of the queries listed below, create the query in the manner appropriate to the application program you are using and then print (either now or later) the resulting output:
- (a) Select and Print all the records for products which are located in the **Shop**. Save this query as **QUERY1**.
 - (b) Select and Print all the records for **Screwdriver** products. Use a wild card to select the required records. Save this query as **QUERY2**.
 - (c) Select and Print all records which are located in the **Stores** and where the **Stock** is less than 12. Save this query as **QUERY3**.
 - (d) Select and Print all the records for products where the **Agent** is PJ Williams, where the **Price** is between €25 and €90 and the **Carton** quantity is less than 12. Save this query as **QUERY4**.
9. Add a new field to the database/table as follows:
field name - **Exchangeable**,
field type – **Logical** (Yes/No)
- Save this modified table as **REILLY2**.
10. Input data into the new field, **Exchangeable**, as follows:
All the non-electrical products are non-exchangeable.
All electrical products are exchangeable.
11. Delete the record with **Code** 7248
12. Add the following records to the database/table **REILLY2**

Code No	Product	Agent	Stock (Kg)	Price	Location	Carton	Exchangeable
8324	Manual Bore	Doyle Bros	5	€16.40	Shop	11	No
8325	Electric Lamp	PJ Williams	32	€59.95	Stores	9	Yes

13. Generate a report from the database/table, **REILLY2**, to include all the following:
- Show all fields, except Agent and **Carton** quantity.
 - Display the appropriate field heading centrally over each column of data.
 - Display the title **Product Listing**, centrally over the report.
 - Organise/Sort the report in descending order on the **Price** field.
 - Show the average for the **Stock** field at the bottom of the report.

Save this report as **REPORT**

14. Print **REPORT** (either now or later).
15. Produce a set of box labels, from the database/table, **REILLY2**, for all products except those located in the warehouse. The labels should have the following format:
 - Layout as shown below
 - Have more than one label across the sheet

Code	Product
Agent	
Price	
Location	

Save these labels as **BOXLABELS**

16. Print the labels, **BOXLABELS** (either now or later).

DATABASE STRUCTURE ENTRY FORM

Field Name	Data Type	Size/Width

Name: _____ **Date:** _____

CHECK LIST OF REQUIREMENTS

At the end of the examination you should have the following items:

1. The following tables, saved:
 - (a) The database/table **REILLY1** ☐
 - (b) The database/table **REILLY2** ☐
 - (c) The query **QUERY1** ☐
 - (d) The query **QUERY2** ☐
 - (e) The query **QUERY3** ☐
 - (f) The query **QUERY4** ☐
 - (g) The report **REPORT** ☐
 - (h) The labels **BOXLABELS** ☐
2. The following printouts:
 - (a) The input form ☐
 - (b) The database/table **REILLY1** ☐
 - (c) The Query **QUERY1** ☐
 - (d) The Query **QUERY2** ☐
 - (e) The Query **QUERY3** ☐
 - (f) The Query **QUERY4** ☐
 - (g) The Report **REPORT** ☐
 - (h) The Labels **BOXLABELS** ☐
3. The Database Structure Entry Form completed.