

Access 2013: An introduction to databases for researchers

Practical workbook

Aims and Learning Objectives

This course provides an introduction to databases for researchers. By the end of this course, you will be able to:

- decide what type of database tool might best suit your research needs and understand the importance of including database design and development costings in your Data Management Plan;
- manage and filter data for analysis in a pre-existing small scale research database using Microsoft Access, the University's site-licensed, small-scale, relational database software;
- explain what you should use the database for and when to use specialist analysis software;
- explain open data format requirements in relation to relational databases and output data from the database in acceptable open formats;
- explain the need for a rigorous set of metadata when sharing/archiving your data at the end of the project as well as use the database software to create some of this metadata.

Document information

Course files

This document and any associated practice files (if needed) are available on the web. To find these, go to www.bristol.ac.uk/it-services/learning/resources and in the **Keyword** box, type the document code given in brackets at the top of this page.

Related documentation

Other related documents are available from the web at:

<http://www.bristol.ac.uk/it-services/learning/resources>



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Introduction

In a relational database data is stored in tables. Each table holds data about a specific 'thing' and is related to at least one other table. Although the data is held in tables, the best way to access and edit data is not within these tables, but by using data entry forms. Queries are used to filter the data and also to do other things, some of which we will see on this course. Reports let you group the data together in printer-friendly format.

The software used on this course is Microsoft Access 2013, the University's site-licensed relational database application, which can be installed on any University-owned machine at the discretion of zonal IT staff.

Prerequisites

You should be familiar with recent versions of MS Office.

Data security

If you store or process restricted UoB data or sensitive personal information on a database, you should be aware of UoB regulations and legal requirements for protecting that data. Further information can be found on the **University Secretary's** website at <http://www.bristol.ac.uk/secretary/> and on the **Information security** website at <http://www.bris.ac.uk/infosec/>.

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Slide show: what database tool is relevant for my research needs? If using a relational database, what do I need to know about sharing my data?

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Task 1 Opening the course database

Objectives To open the course database and select the correct security setting.

Comments If you forget to choose the correct security setting, just close the database and reopen it, this time choosing the correct setting.

On opening Access, the **Getting Started with Microsoft Office Access** window is displayed. From here you can create a new database, access pre-created templates (not recommended) or, as we want to do, open a pre-existing database file.

1.1 To open the Intro database:

- Click on **Open...**, then navigate to where the training files are stored. If you are in the Training Room, you will be told where this is. If you are doing this course in your own time, see the notes on the back of the front page of this document for information on downloading the practice file.
- Double-click on **AnimalFarm.accdb** to open the database.

1.2 To select the correct response to the Security Warning:



Figure 1 – select Enable Content

- On the **Security Warning** message box, select **Enable Content**.
- (If a further **Security Warning** opens asking if you want to make the file a “Trusted Document”, select **No**.)
- Note that the database opens directly onto a data entry form – this is because the **Autoexec Macro** (circled below) tells it to do this when the database opens.

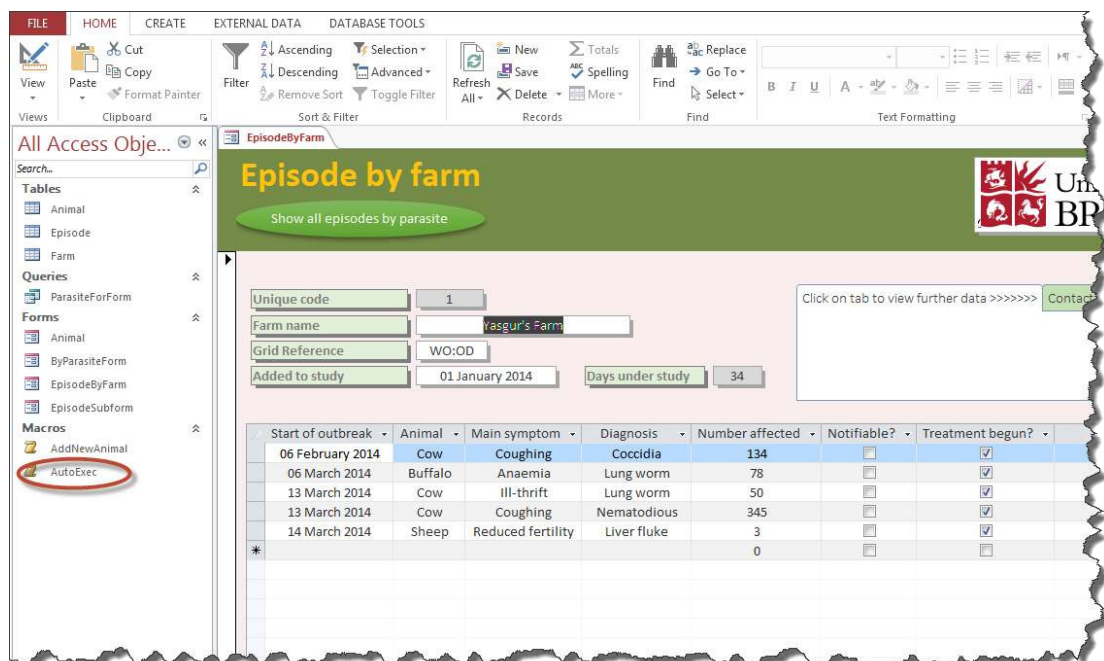


Figure 2 – the work environment showing the Ribbon (top) and Navigation Pane (left) with the Autoexec Macro circled

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