

Technical note:

Data collection with multiple users

This technical note is designed to assist consultants when discussing with schools data entry into a database.

While some experience of data entry is advantageous to pupils, too often pupils are engaged with manual entry of data rather than with analysing the data. If pupils are to have sufficient time to analyse data and discuss their findings they need an efficient way of entering data.

This technical note provides a number of approaches that schools may wish to investigate. In each case it assumes pupils are collecting data from a common form for entry into a common database. This can be effective if pupils are working as a group on the same data collection task.

It is highly recommended that consultants familiarise themselves thoroughly with the techniques before discussing them with schools.

Importing data into a common file

Pupils enter data for a limited number of records into an individual database and the data is merged into one file to create a large dataset.

This approach avoids pupils entering a large amount of data but the format must be identical. For example, if creating a questionnaire the format of the fields and the order in which they are entered must be identical for each pupil.

The selected application must also be capable of joining a number of files together. Usually, this can be done by exporting the data in a common format and copying and pasting the data into a common file. For example, exporting data in CSV format provides the data as a text file where the fields are separated by a comma and the records by a line return. Data can be copied and pasted together using a text editor such as Microsoft Notepad or imported into a spreadsheet such as Microsoft Excel.

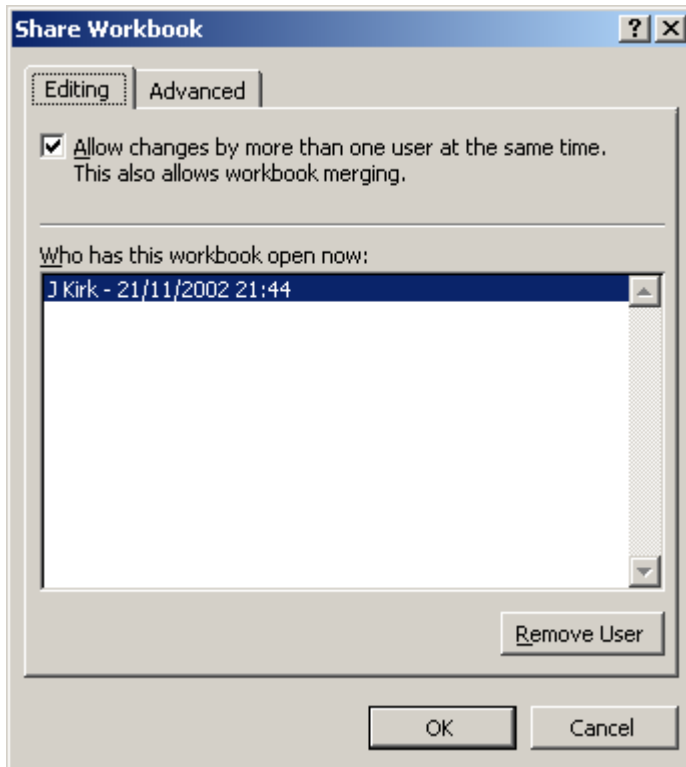
Data entry into a common file

Pupils enter data individually into a common database file to which all users have access.

The common database file must be stored on a network in a folder to which all users have read/write access.

In Microsoft Access, files are by default able to accept multiple users. Create a file and save it to a folder to which all users have read/write access. Each pupil can then load the file and add their data. When they save, their data will be added to the common file.

In Microsoft Excel, place an empty file containing the field headings onto the network in a folder to which all users have read/write access. To enable the file to accept input from multiple users, select **Share Workbook** from the **Tools** menu. Check the box marked **Allow changes by more than one user at the same time**. The Advanced tab contains options that you may wish to change but the default settings are usually correct.



Other databases offer similar facilities but their ability to accept multiple input may depend on the version purchased.

Data collection on screen

Pupils enter data into an onscreen form which collates responses in a common database.

Data collection sheets can be created that are designed to be completed on line. Some applications, such as Logotron Viewpoint, allow users to create a questionnaire which can be exported to a website to be filled in on screen. Microsoft FrontPage can also be used to create forms that are filled in on screen and the results automatically collated in a database.

Alternatively, questionnaires can be created in Microsoft Excel or Access that can be saved as a template, distributed on a network and that write the answers back to a common file. An example of this can be found in the file questionnaire.xls and detailed commentary in questionnaire.ppt.

Microsoft screen shots reprinted with permission from Microsoft Corporation

Viewpoint screen shots reprinted with permission from Logotron Ltd,
124 Cambridge Science Park, Milton Road, Cambridge, CB4 0ZS

Handling Data

Technical Note: Data collection with multiple users

DfES 0204/2003

© Crown copyright 2003

Session 5

page 2