

## ***Finding Things Out***

### ***QCA Unit: 3C***

#### ***Lesson 4 of 6 - Can you find...?***

**Learning objective:** I can.....Search a database to find answers to questions

**Resources:** Print out of record cards from Cards.pdf.

Copies of Simple questions.pdf

**Support files:** Survey, Simple questions.pdf. and Simple answers.pdf

**Setting the scene:** (5 mins)

Share the learning objective with the class.

Explain that today they are going to look at a different file of record cards – both on paper and the computer, and that they are going to use the information on the cards to find answers to simple questions.

**Main Input** (30 mins)

**Away from the computer:** Show the class a record from the 'Cards.pdf'. Ask them to identify the fieldnames on this record. How many fieldnames are there? Which fields require numeric information? Text information? Which fields do they think might give an option of words?

Distribute the record sheets from the file to the children and ask them to look carefully at their particular record. Choose a few volunteers to describe their person.

Ask the class a couple of simple questions:

Who has Sam's record?

Who has Kate's record?


Hold up all of the records for children with brown eyes. Now ask the class who would like to try and beat the clock. Choose one volunteer who is given all the record cards. Explain that they have 30 seconds to try and find all the records of children with blue eyes. Get the rest of the class to count down the time and encourage the volunteer to look through the record cards as quickly as they can. Once the time is up, discuss with the class how easy, effective and organised this was. Was it easier when we were working together or when one person was trying to find the answer on their own? Explain that you are now going to show them how to do the same thing using a computer database.

**At the computer:** Turn on the monitor and remind the class how to open up **Mydatabase** and find the database they want to use, This time it is 'Survey'. When the information about the datafile shows on the screen highlight to the children how this database actually contains more

records than they were using on paper – but it would not have been manageable to have a larger number.

Ask the children how the method they currently know of looking through records on a database. Using the View all records 'one by one' option is quite effective for some of the questions we were asking, for example finding Sam's record. We can just stop when we get to the right one. However it is not so good when we are trying to find all the children with brown eyes – as there is more than one of them.

Demonstrate to the children how we can perform a Search of a database to quickly find answers to our questions. For which children have brown hair the procedure is as follows:

- 1) Select **Search & Sort the database table**  . Explain to the class that this is where you select the fields you want to see.
- 2) Select 'hair' and **Searching** to the right of the box.
- 3) Make sure the option 'the same as' is selected.
- 4) Click on the field arrow and select brown.
- 5) Click on **Search**.
- 6) The computer will now tell us how many records it has found and brings all the appropriate records to the front so that when we navigate through we see all the records which answer our question first.
- 7) Demonstrate this a second time but for children taller than 130cm. Highlight to the class how this time they must select 'greater than' instead of 'the same as'. Explain to them why this is the case.

Ask 1 or 2 children to come to the front and go through the process. Ensure one of these searches returns a value of Zero and explain that this is not a mistake, but that there were no records that matched the given criteria.

### **Activity – short focused task (5-10 mins)**

Each child is given the opportunity to perform simple searches to find the as many answers to the questions given on the 'Simple questions.pdf' file within the time limit set.

### **Plenary (10 mins)**

Bring the class together and review the learning objective. Call up some children to perform some of the simple searches required to answer the questions, any misconceptions can be addressed at this point. Ask similar questions to those below. Reiterate the key vocabulary listed below. Explain that in the next lesson they are going to use the same database to help them create simple bar charts.

**Key questions to ask and to display:** Which icon helps us perform a search of a database? (Binoculars) Is it easier/ quicker to find the answers to questions using a computer? What is it important to remember to do before starting the next search?

**Vocabulary:** Search, Clear all

**Teaching Points:**

**Differentiation:** Some children may find it difficult to access the text on the 'Simple questions.pdf' and may require additional adult support.

**Assessment Opportunities:** Can the children search a database to find answers to simple questions?

**What comes next:** Creating bar charts – Lesson 5 'What's in the Charts?'