Microsoft Access 2010

Basics

March 2011

Files Used in this class:

Faculty.accdb (created in class)

Optional files for attachment field:

Word_Encryption_Security_Tips_1.DOCX

StudentinLibrary1.jpg

StudentinLibrary2.jpg

Sample2011.accdb

(Available, but not used: Orders2011.accdb and/or Queries1.accdb)

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Access 2010 Database Concepts

What is a database?

A database is defined as an organized collection of data (information) on people or things. In raw form, a sheet of paper divided into columns and rows or a table in Microsoft Word or Excel is considered a simple database. Single table databases are very limited in their uses and would not be considered as a business solution.

In Access this information is stored in tables. The information can be seen in tables or through forms and reports. A database will be able to store data in a structured manner across multiple tables, use queries to locate specific information according to given criteria, produce detailed (on-screen or printed) reports, perform calculations and much more.

An example of a multi-table database is a database of classes, which might consist of tables showing information on several of these: classes, instructors, students, and rooms.

NOTE: Access 2010 saves database files with an .accdb file name extension. The data in the database is saved automatically when you enter it. However, changes to an object such as a table, form or report need to be saved. When necessary, Access will prompt for objects to be saved when switching views.

What is a table?

Tables are used to store the data in a structured and organized format. As previously mentioned, tables are similar to those of Word and Excel, in that they contain rows (*records*) and columns (*fields*).

Students

Student I	First Name	Last Name	Address	City	Stat	Zip Code	Phone Numb
25	Richard	Christian	2568 Trinity Mills	Carrollton	TX	75234-2345	(972) 418-8906
26	Mackenzie	Smith	6200 Macarthur	Irving	TX	75038-3456	(972) 929-3556
27	Hugh	McGeary	100 Belt Line Rd.	Grand Prairie	TX	75051-2235	(972) 641-2333
28	Zach	Roberts	Lettermen 301	Dallas	TX	75275-0000	(214) 768-0987
29	Miguel	Gonzales	4567 Barnes Bridge	Mesquite	TX	75149-0258	(972) 279-1245
30	Kayla	Roberson	890 Camp Wisdom	Duncanville	TX	75116-1002	(972) 283-5569
(New)					TX		

Record: 1 of 30 No Filter Search

What is a record (row)?

A record applies to data entered into a **single row** of a table. All data in that row would belong to an individual or item. A record would normally include a unique ID number, name, description, plus other relevant information. With each new record, a new row is created. For example, the figure above has all the information on Peter in the row beginning with "1".

What is a field (column)?

Each column (or field) is used to define what **specific information** is to be entered into that particular column or "field". A column titled '**Class**' for example would signify this to be the place in a record to enter the Class name when creating each

new record. For example, the figure above has an email address for each row in the column headed "Email".

What is data?

- Data is the information entered into tables within the database. Databases are used in businesses and in education, often without people realizing they are using a database. Something as simple as entering contact details into the 'Contact' or 'Address Book' section of an email client, involves entering *data* into a database.
- Data entered will generally be alphabetical (names, addresses) or numerical (dates, currency), however Access is also able to store other forms of data, such as links to websites, documents created in other programs such as files & images.
- Data can be entered into the database manually, via the keyboard, imported from or linked to external sources or even collected through email or an internet form.

Data types

Data types define what type of data will be entered into each 'field' (column) in a table. If you create a table by typing in the data in new fields, Access will determine the data type for you based on what you type. If you type a name, it sets the type for that field to 'Text'. If you type a date either as "12/09/2010" or "December 9, 2010" it will set the type to 'Date/Time'. If you type a digit or digits it will set the type to 'Number'. If you also type $ as in $49.95 or a specific number of decimal places "5.00" that will be included as the format for a numeric field.

Although you can enter data without setting up the fields first, you should create the table and specify the data types for each field before entering data. You should also set defaults, limits, and use **Input Masks** as needed.

Text – holds up to 255 characters; can be numbers, letters, or symbols

Memo – holds over 255 characters; can be numbers, letters, or symbols

Number – numbers only

Date/Time – valid dates or times

Currency – numbers displayed as currency

AutoNumber – a number is automatically input; you cannot type in this field

Yes/No – only two answers: yes or no [true or false] [on or off]

OLE Object – you can attach one document to the record

Hyperlink – you can put in a hyperlink

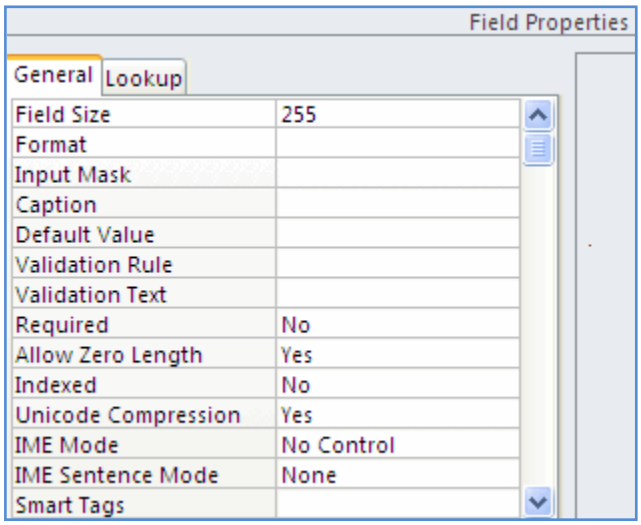
Attachment – attach multiple files to one record including digital photos

Look Up Wizard – allows you to input a list of choices for a text field

Calculated – displays a value calculated from other data in the table

Field Properties

Field Properties should be set in order to: format numbers and dates; to limit data entry to specific characters; to validate entries; to provide a mask for input; to require data in a specific field; and/or to set default data. You can see the **Field Properties** that have been set by viewing the table in **Design View**. Some of the **Field Properties** are only available for specific **Data Types**. Below is a brief description of some of the more popular **Field Properties**.



Field Size allows the setting of the maximum number of characters that can be entered.

Format allows you to specify a "format" or appearance of a date, time, or number. It has choices such as: short date, medium time, long date, currency, etc.

Input Mask uses a particular format of the data entered. Such as a phone number (xxx) xxx-xxxx or social security number xxx-xx-xxxx. The **Input Mask** puts in the parenthesis, dashes, slashes while the user just types the data.

Caption displays at the top of a column in a table. [It does not replace the field name.]

Default Value is a value that is common, for example for a database with names and addresses, the State field could have a Default Value of: TX

Validation Rule & **Validation Text** allow you to set limits, for example on a Number or a Date field you could specify the number be less than or greater than a specific number or that a Date be between specific dates.

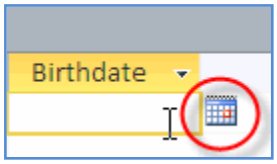
Required can either be Yes or No. Required Yes means that it will not allow the field to be empty.

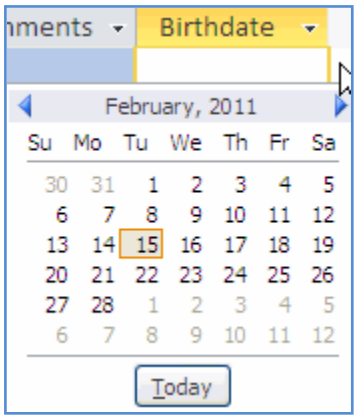
Indexed has three choices: No, Yes (Duplicates OK), and Yes (No Duplicates). Indexed Yes means that searches and sorts work faster.

Text Format (Memo fields)has two choices: Plain Text and Rich Text. (Rich Text allows the person entering data to use bold, italic, underline and a few other features.)

Text Align is used to set the alignment of text in the field.

Show Date Picker is available for **Date** fields. The **Date Picker** looks like a tiny calendar (small figure right). When you click the **Date Picker**, the current month calendar pops up (larger figure right).

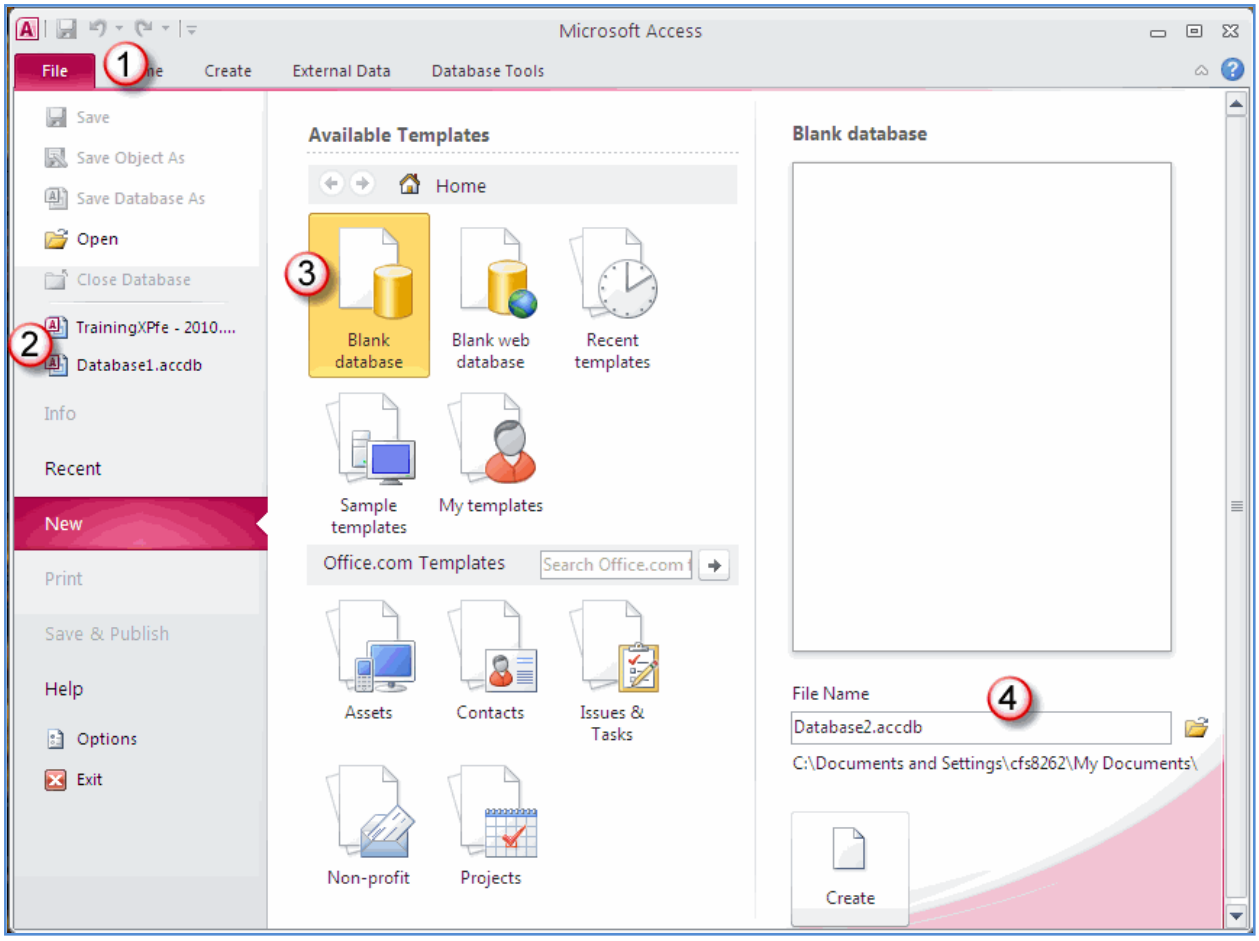




A First Look at Access 2010

Opening Access 2010

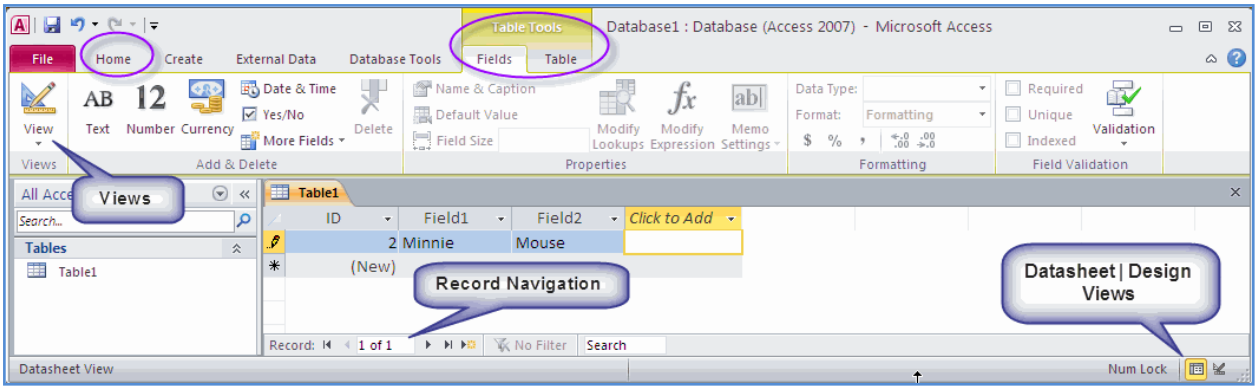
- Click the **Start** button (bottom left of screen), then select **All Programs**. Scroll up to locate the **Microsoft Office** folder button, click it. Click **Microsoft Office Access 2010**. Open the **Sample2011** database.



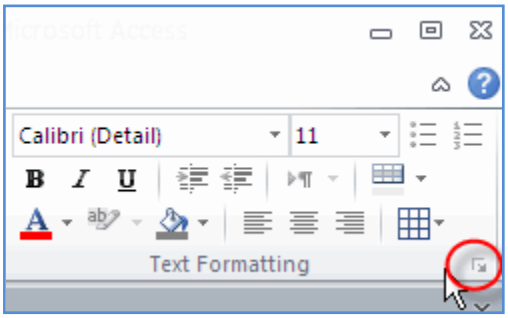
Exploring the Access 2010 window

- Similar to other Microsoft Office 2010 applications, Access 2010 uses tabs which display a ribbon. The **Ribbon** is designed to display the most appropriate tools / functions according to the task at hand. Each ribbon is divided into **Groups**.
- The "biggest" change is the new (1) **File** tab in place of the Office Button.
- The **Quick Access Toolbar** in the top left corner of the screen has not changed from Access 2010.
- (2) **Recent Documents** are listed on the **File** tab.
- (3) New **Blank database** is easy to access.
- (4) Type the **New** database name and select the folder it will be stored in.

- Under the **File** tab in the top left corner is the **Views** group. There are also two tiny **View** buttons in the bottom right corner of the screen.
- At the bottom, near the center are the Record Navigation buttons. Use the navigation buttons to display the records in a table. In the "1 of 1" box the first number represents the current record and the second number is the total number of records.

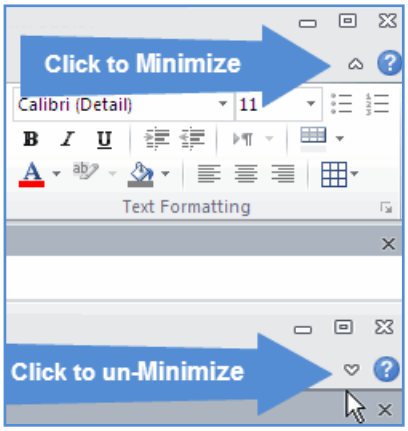


- All commands are organized into groups on the various **Ribbons**. Groups were designed to help identify tools quickly.
- A **Dialog Box Launcher** button, bottom right for the group (see figure on right) is available only on the **Clipboard** and **Text Formatting** groups on the **Home** tab ribbon. When clicked, the **Dialog Box Launcher** displays a dialog box for selecting additional features.

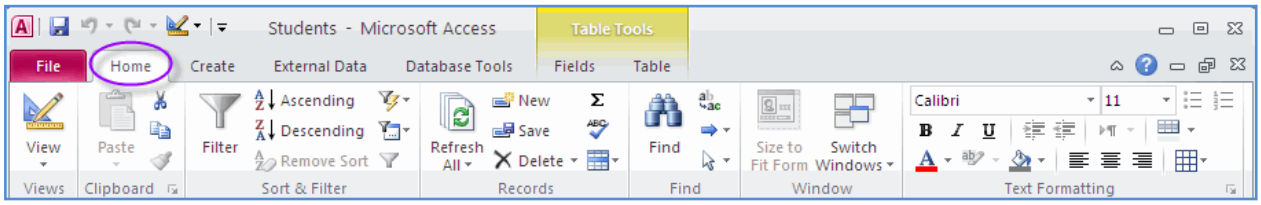


Minimizing the Ribbon

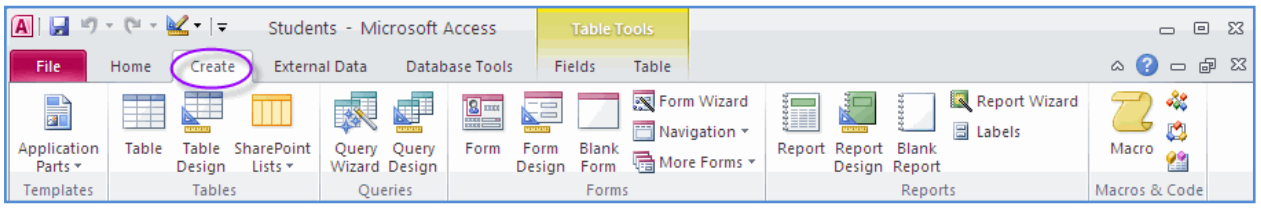
- To minimize the Ribbon, click the small arrow on the left side of the Help ? button (see figure on right).
- To make selections from a minimized ribbon, click on a ribbon tab. The ribbon expands for you to make your selection.
- When you click on a command button, the Ribbon minimizes again.
- To restore the Ribbon to a fixed state, click the small arrow again.



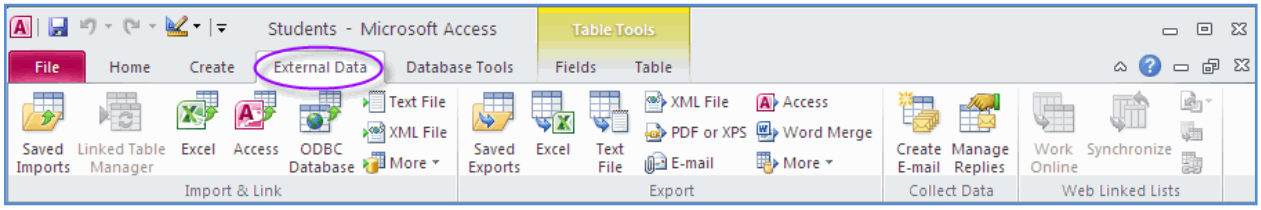
Tabs and Ribbons



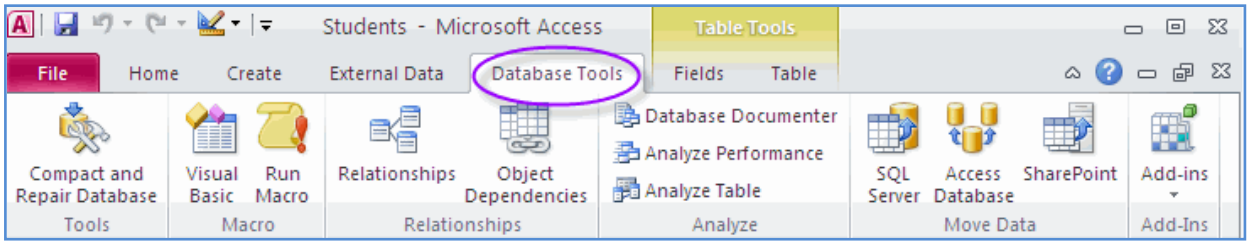
Home – font formatting, record commands, sorting, filtering, & find



Create – create tables, queries, forms, & reports



External Data – import & export records from/to Excel and various other file types



Database Tools – relationships and compact & repair database

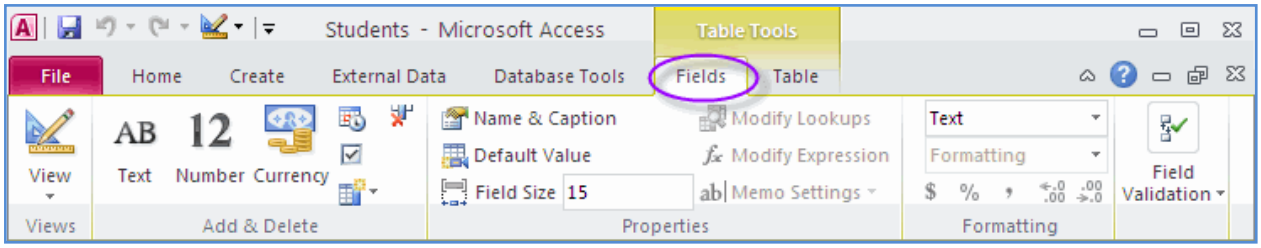
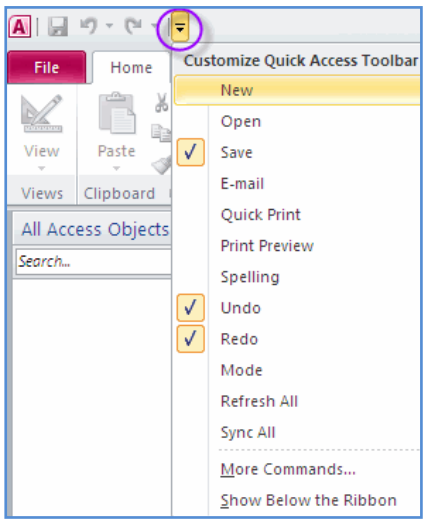


Table Tools Fields – views, insert, delete, or rename fields; set properties & data formatting

Table Tools Table – (not shown) is for working with macros and programming steps to run

Customizing Access 2010

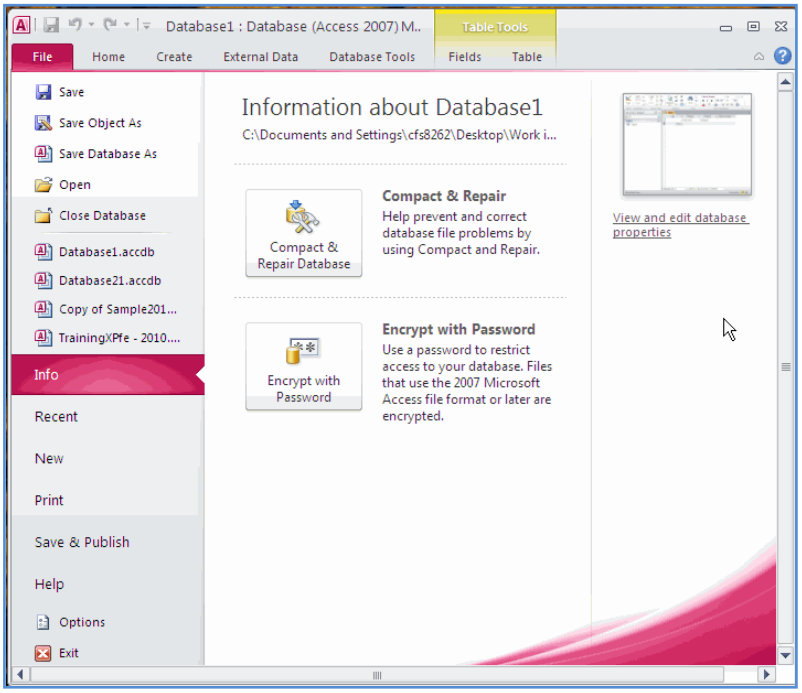
Quick Access Toolbar



- The **Quick Access Toolbar** offers an easy way to access frequently used command buttons, such as **Save, Undo** and **Redo** that are already on the **Quick Access Toolbar**. Other functions may be added to the toolbar by selecting them from the **Customize Quick Access Toolbar** drop down list.
- To customize the **Quick Access Toolbar**, click the drop-down arrow to the right of the **Toolbar**. The list has commands that you may easily turn on or off. (A checkmark means they are on.)
- You may also click **More Commands** and add additional commands to your **Quick Access Toolbar**. Any command may be added to the **Quick Access Toolbar**.

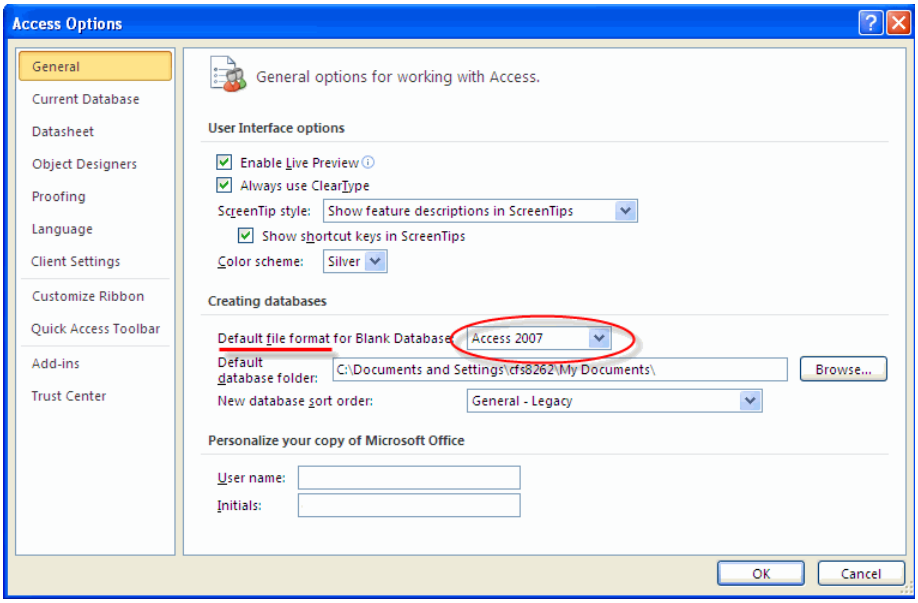
The File Tab & Access Options

- The **File** tab provides many of the options previously found under the **File** drop down menu in earlier versions of Microsoft Access: **New, Open, Save, Save As, Print**, and **Close Database**.



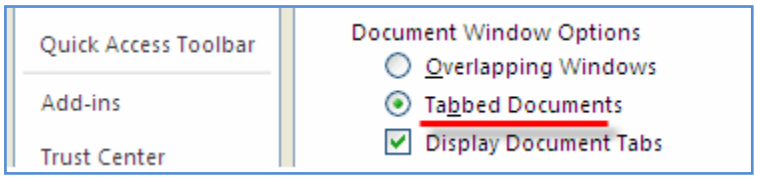
- Also, on the **File** tab is **Recent** documents, **Password** protection, **Compact & Repair Database** and Access **Options.**
- Click **Recent.** It lists the documents that have been opened recently. You can specify how many documents to display in the **Recent** list (by changing the number at the bottom of the **Recent** screen).
- You can also "pin" documents to the **Recent** list. Click on the "pushpin" to the right of the **Filename.** The document is now "pinned" to the **Recent** list. Click the "pin" again to "unpin" the file.

- Click the **File** tab, then **Options**.

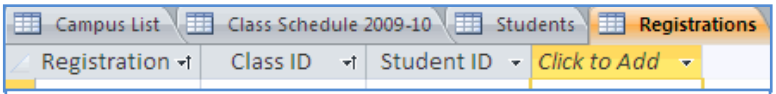


- On the **General** screen, you may want to change the **Default file format** (see the figure). If that is the only change click **OK** at the bottom of the **Options** window.

- Still on the **Options** screen, click **Current Database** on the left. Locate **Document Window Options** (across from **Quick Access Toolbar**).

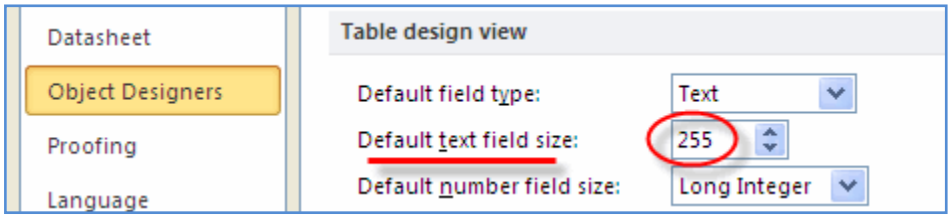


- Click **Tabbed Documents** to select it. This will enable having tabs across the top of open files within Access, as shown in the figure on the right.



An example of tabbed document windows

- Click **Object Designers**, the fourth item in the **Options** menu. If you would like to change the **Default text field size**, select **255** and type the number you want. **50** is suggested unless you think that is too low. Click **OK** if finished with **Options**.



- You can also make changes to the **Quick Access Toolbar,** select the **Quick Access Toolbar** in the menu on the left. To add buttons to your toolbar, select a command in the list on the left, click the **Add** button and the command is added to the **Toolbar** on the right side of the screen. Add as many commands as desired.
- Click **OK** to keep the changes.

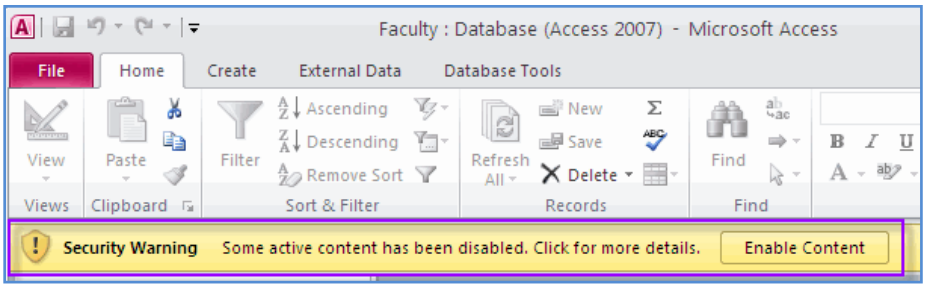
Opening a Database & Security Issues

Opening a database

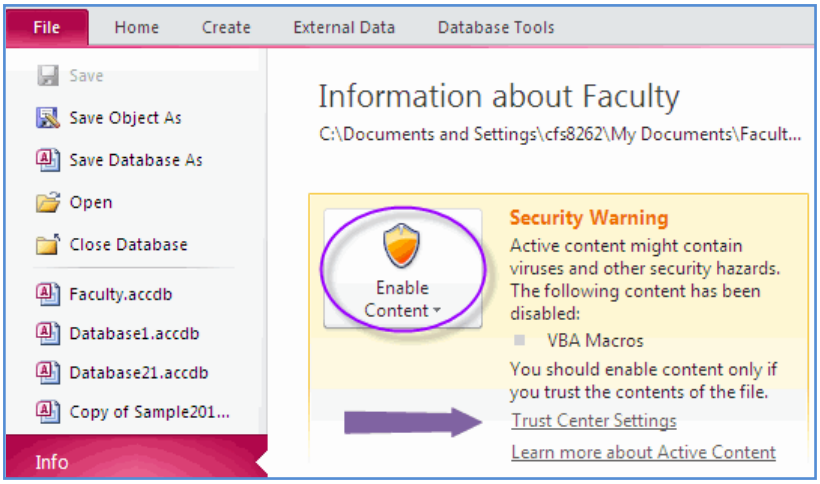
- The **Access 2010** program and the **Sample2011** database should already be open, if they are not please open them. From the menu displayed on the left, click the **Open** command. This will display the **Open** dialog box.
- By default the contents of the **My Documents** folder will be displayed. You should see a folder containing the Access data files. Double click on this folder to display the contents.
- Select a database file called **Sample2011** and double click it. The database may have a **Security Warning** like the one shown below.

Security warnings

- Similar to other Microsoft Office applications, Access 2010 warns users of potential security threats when they arise and relate to macros within the application.
- Macros contain code written to perform a task within the application and are used widely in Excel, Word as well as Access. Because macros use code designed to allow advanced users the opportunity to create their own functions to enhance the functionality of a database, others can also write malicious code intended to have the opposite effect. For this reason, Microsoft Office applications prevent macros from running and displays a warning instead, which is outlined in the figure above.



- Click the link "**Click for more details**" for additional information.
- Click "**Enable Content**" to temporarily enable the file (this time only).
- **"Click for more details**", brings up the screen shown on the right.

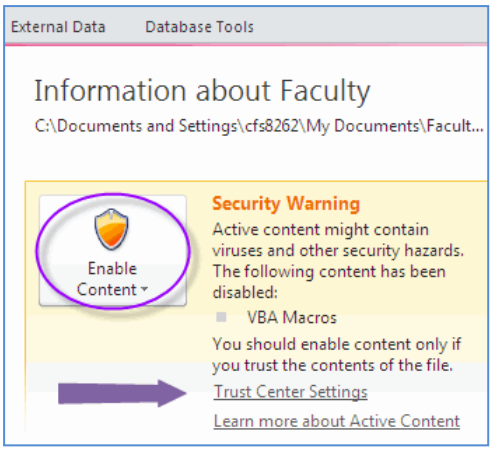


- You can also click **Enable Content** (as a temporary fix).
- Click **Trust Center Settings** to enable the contents of the file permanently.
- If you trust the source of this database file and the content, you can select **Enable content**, to allow the macro to run, then click **OK**.

NOTE: Selecting **Enable content** is a temporary enabling of macros and warnings will be displayed again the next time this database is opened.

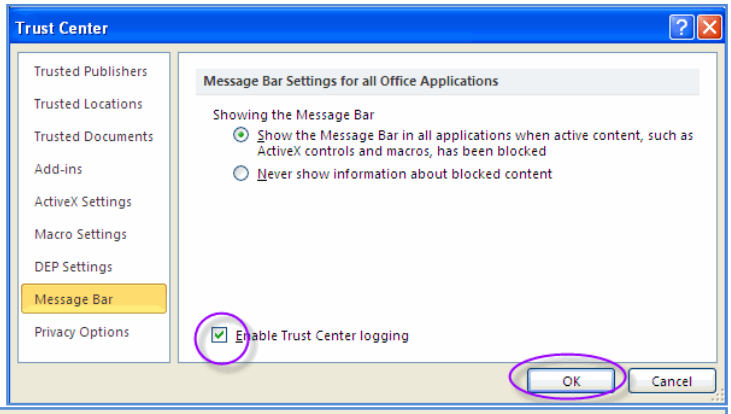
Add a Trusted Location

- You can add a trusted location so you do not get the security warning each time you open a database.

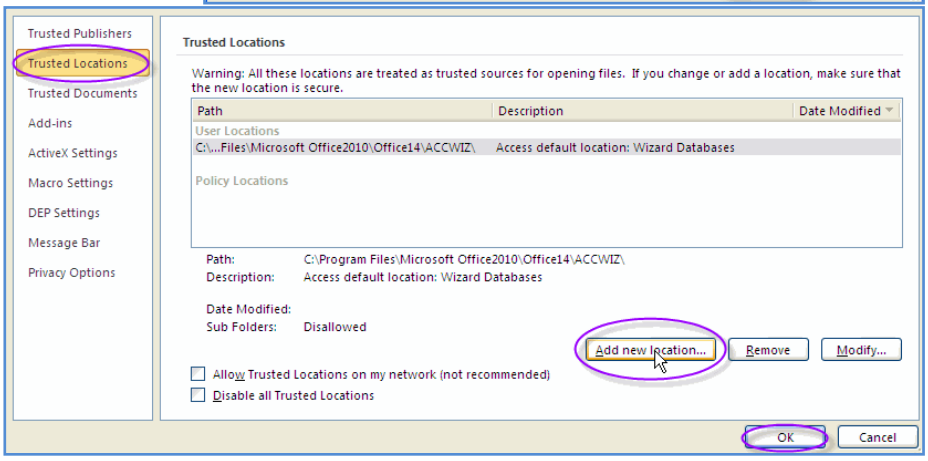


- Click **Trust Center Settings**.

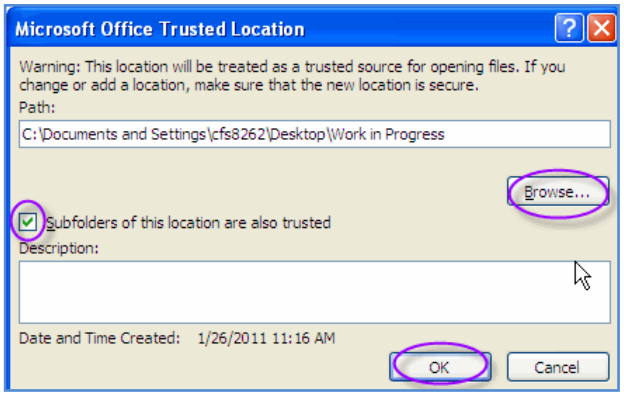
- Click the **Enable Trust Center logging** checkbox (to turn it on).



- Click **Trusted Locations**.
- Click **Add New Location**.



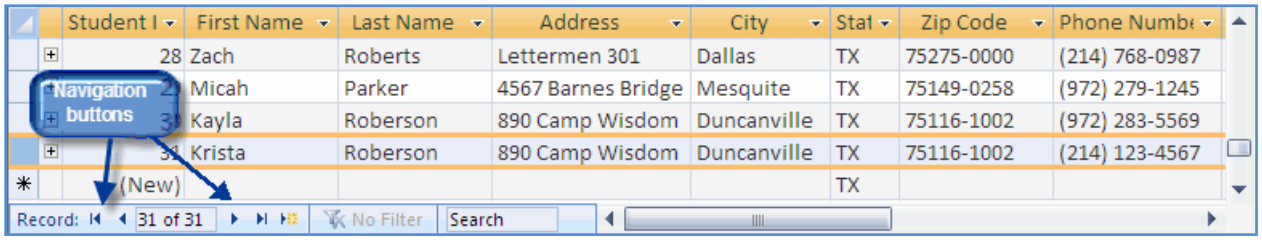
- Click the **Browse** button, locate and click on the folder that you wish to add to the **Trusted Locations**.
- Click **Subfolders of this location are also trusted**.
- Click **OK**
- The "new" location should be in the list of **Trusted Locations**.



- Next time you open the database, you should not receive the security warning.

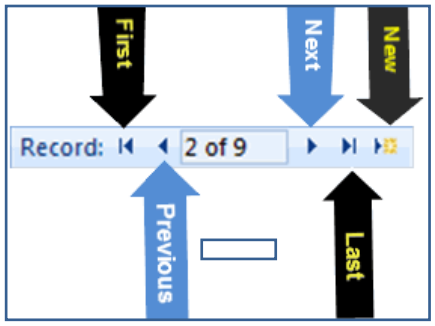
Navigating an existing database

- Still using the **Sample2011** database (it should be open).
- Open the **Students** table in the **Sample2011** database file. Scroll through the records using the record navigation buttons at the bottom of the table window. You can also scroll through fields with the **Tab** or arrow keys.



Navigating through records within a table

- The record navigation bar is located at the bottom of the object window. When a table is open, you will see these buttons. (see figure on right)
- To use the specific record option, click within the box and enter a record number, then press the **Enter** key.
- Click below the last record.



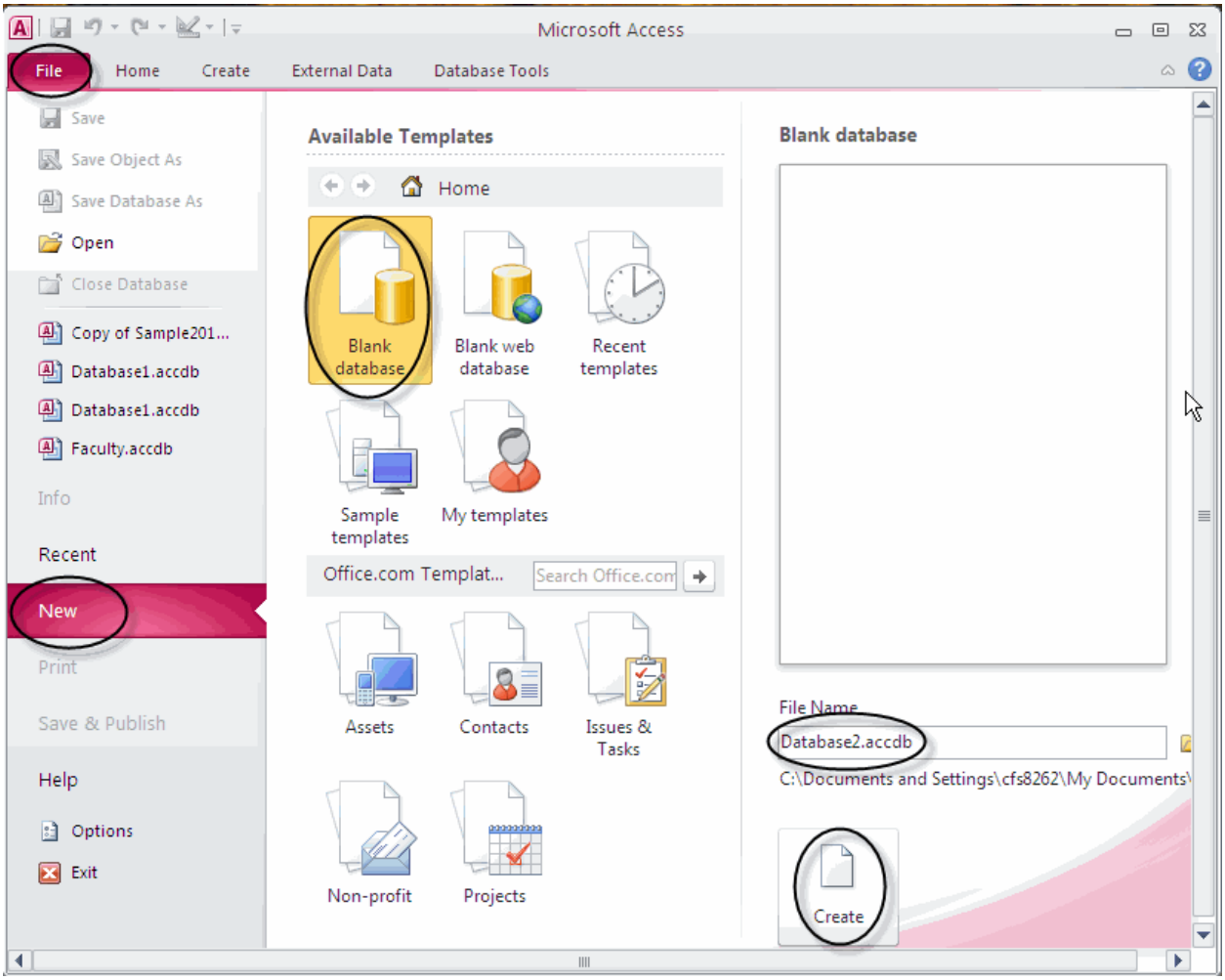
Add a New Record

- Click under Kayla at the bottom of the list. Type **Krista** in the **First name** field (once you type the name, 31 (or the next number) will show in the first (Student ID) column) press **Tab.** [Press Ctrl and Quote to copy from the record above.]
- For the **Last name** press **Ctrl** **"** press **Tab**;

- For the **Address** press **Ctrl ”** press **Tab**;
- For City press **Ctrl ”** press **Tab** twice to accept the **State** and in the Zip Code field press **Ctrl ”** then press **Tab**;
- Type the **Phone Number** shown – just type the digits **214 1234567** and the **Input Mask** (already set up) will put in the parenthesis, space, and dash in the correct places.

Closing a database

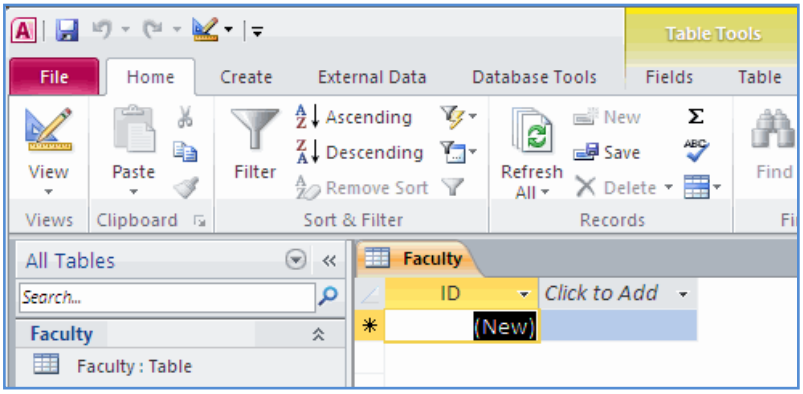
- Click the **File** tab to display the menu.
- Select the **Close Database** command. (This will close **Sample2011** the open database.)
- The database closes and returns to the Access 2010 “Available Templates” screen. The database name is listed on the left of the screen with the **Recent Databases**.



Refer to this figure for creating a new database.

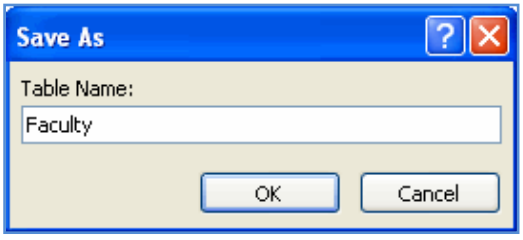
Creating a new blank database

- Start the Access 2010 program if it is not already open. (Refer to figure at bottom of previous page.)
- Select the **Blank Database** icon, or if you are in **Access**, click the **File** tab and select **New** then click the **Blank Database** button.
- Type **Faculty** in the **File Name** box (lower right). Set the folder location for storing it in **My Documents\Training** (or wherever your instructor tells you to store it).
- Click the **Create** button at the bottom of the screen.
- A screen similar (and much larger) to the one below is displayed:



Saving a table

- Before adding information to an Access database, the fields should be added to a table. The fields should be named, given the correct **Data Type** and formatted appropriately. **Field Properties** should be selected as needed. If necessary you can put validations in the fields as well as defaults.
- **Fields** are used to organize data into specific fields or columns, for example a FirstName field would store the first name for every individual record entered, as would the LastName, BirthDate, and other fields, etc.
- Click the **Save** button in the **Quick Access Toolbar**. The **Save As** dialog box is displayed. Type the name **Faculty**. Click the **OK** button. [Each object: Form, Query, Report, and Table has its own name]



Creating a Table & Setting Field Properties

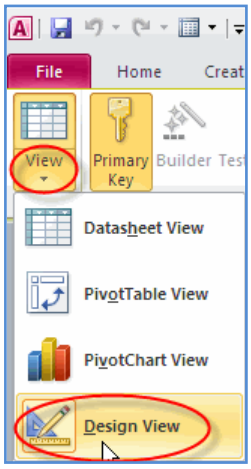
There are three main steps to creating the fields in a table.

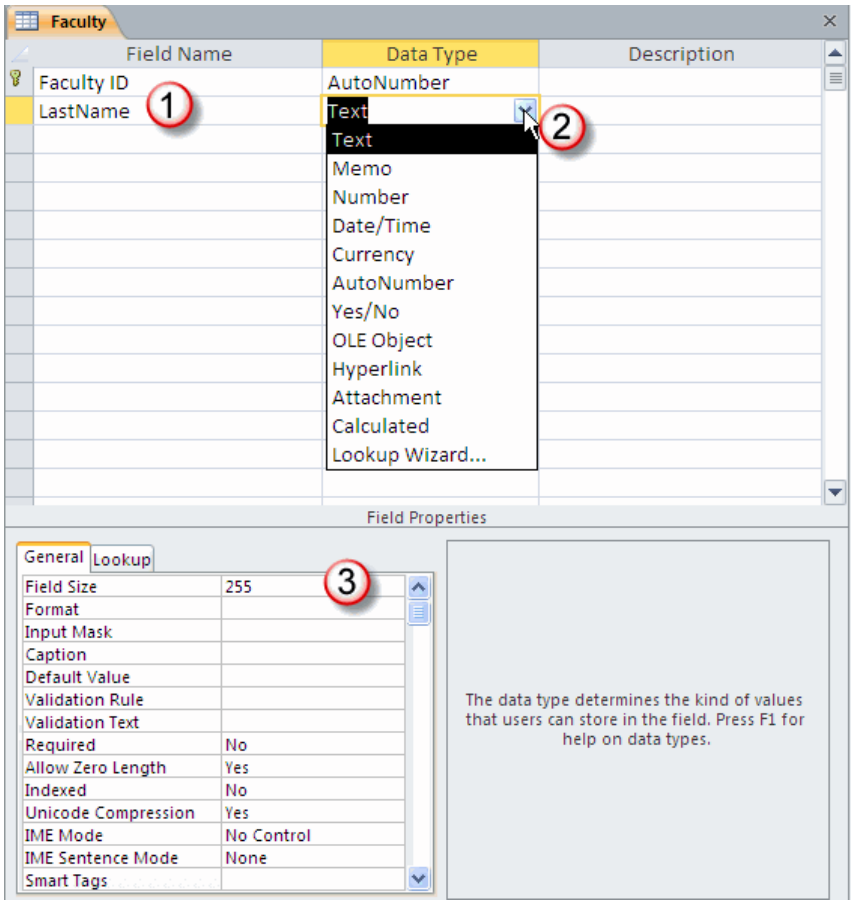
(1) Type the **Field Name** (has to be unique in the table).

(2) Select the **Field Type** from the drop-down menu or by typing the first letter. **Text** is the default **Field Type**. (see page 6 for **Field Type** descriptions)

(3) Set any **Field Properties** necessary. (see page 7 for **Field Property** info)

- Click the **Design View** button- top left to add to our table. See figure below to locate the **Design View** button.





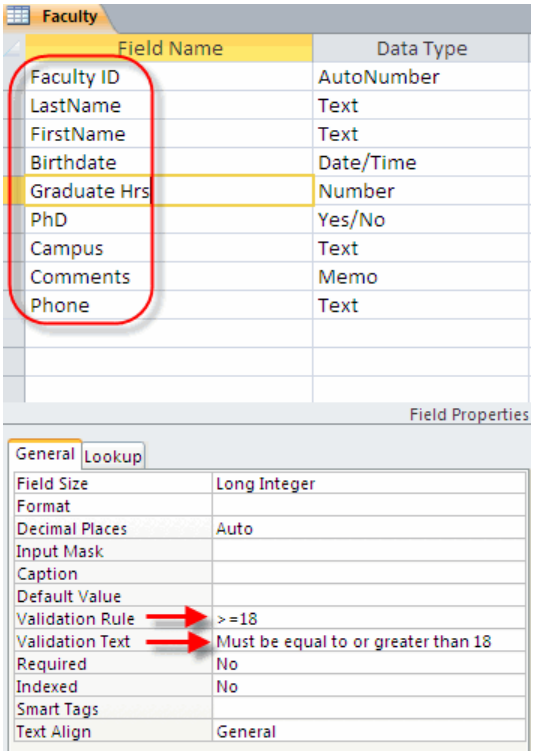
- The first field is automatically created and is called **ID** and it is an **AutoNumber Data Type**. It is the **Primary Key**. Setting the field as the Primary Key causes entries in the field to be unique. Change the Field Name to: **Faculty ID**
- Type the Field Name (1): **LastName** press the **down-arrow** key to go to the next field. The third field should be **FirstName**, press the down arrow. (It will automatically make the Data Type **Text**.)
- **Text** is the default **Data Type**. [If you want a different **Data Type**, click the drop down arrow (2) in the figure above.] Leave the Data Type as **Text** for both name fields.
- The area at the bottom of the screen is titled **Field Properties** (3). Set the **Field Size** to **30** for both name fields (FirstName & LastName); these fields will allow a maximum of 30 characters.

- Create the following fields, give **Field Properties** where specified in []. You have completed the first three.
- **Faculty ID** **AutoNumber**
- **LastName** **Text**

  [Field Size, **30**]
- **FirstName** **Text**

  [Field Size, **30**]

NOTE: Reducing the character length of a text field after data has been entered can result in loss of data in a field that had more text than the new limit.

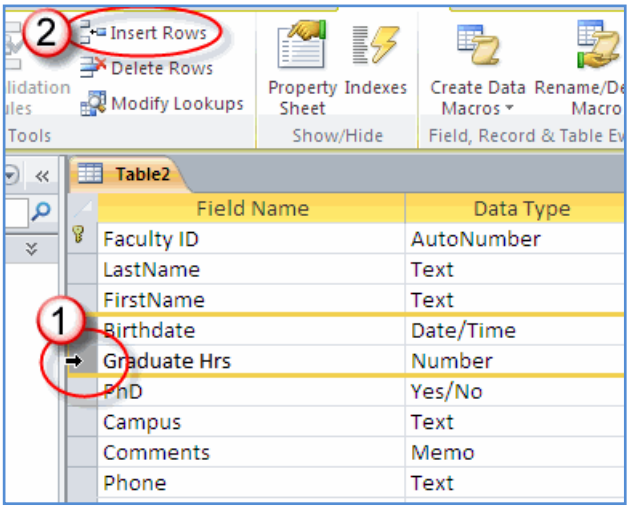


- **Birthdate** **Date/Time**
  [Format, **Short Date**]

  [Required, **Yes**] *(Required will not allow blank fields)*
- **Graduate Hrs** **Number**
  [Validation Rule, **>=18**]

  [Validation Text, **Must be equal to or greater than 18**] *(this Validation Rule says it must be 18 or more)*
- **PhD** **Yes/No**
- **Campus** **Text**
- **Comments** **Memo**

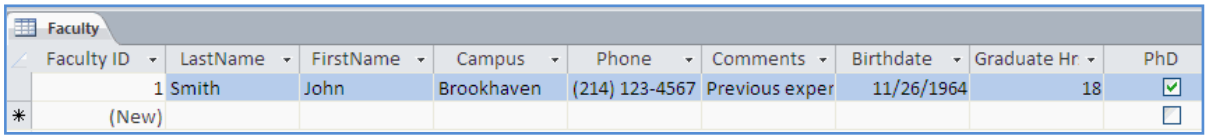
  [Text Format, **Rich Text**] (Turning on Rich Text means you can use bold, italic & underline among other features)
- **Phone** **Text**
- Insert two new rows below **FirstName**.
- Put the mouse on the left edge of Birthdate, click once and drag down to select both (1) **Birthdate** and **Graduate Hrs** (see figure right).
- Click (2) **Insert Rows** in the **Tools** group.



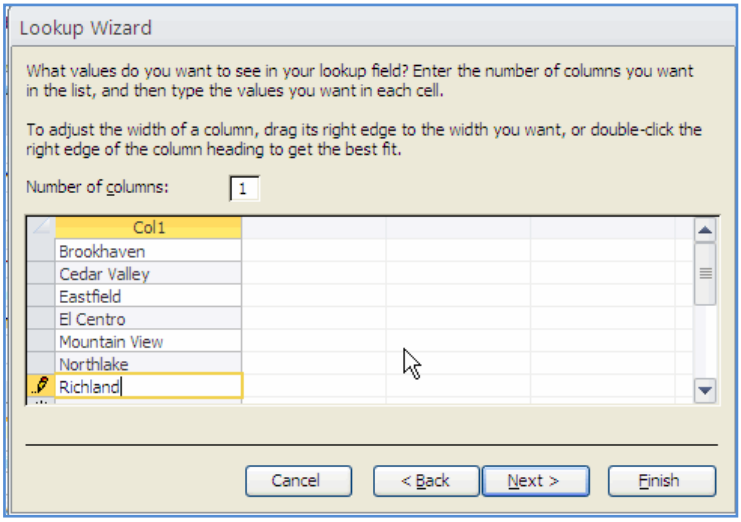
- Add the following two fields (on the new blank rows) below **FirstName:**
  County Text

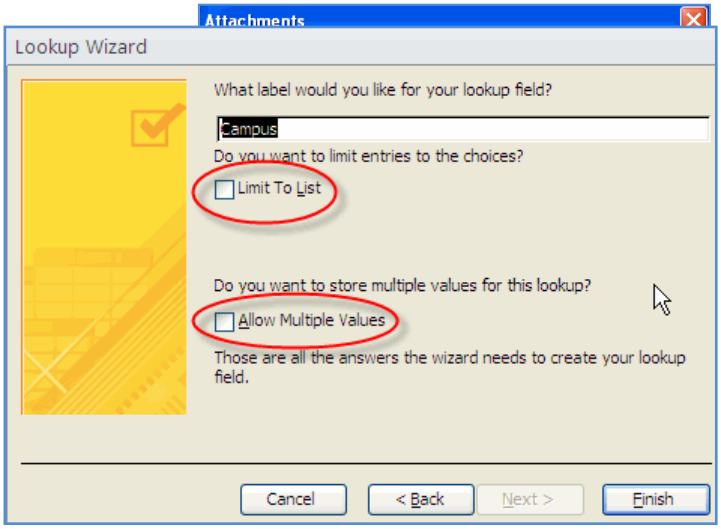
  [Default value, **Dallas**]
- State **Text**

  [Default Value, **TX**]
- **Save** the **Faculty** table again.
- Move the **Comments** field to the bottom, below **Phone**: click the selection box on the far left to select it, then drag it to the bottom of the fields and let go]
- Click the **Datasheet View** button in the **Views** group on the left edge of the **Table Tools Design** tab to view the new (empty) table.



- Input one record in the table (make up information; try leaving the **Birthdate** field blank. Also try entering a number less than 18 in the **Graduate Hrs** field), use the **Tab** key to move across from one field to another.
- Instead of having to enter the name of the Campus, change the **Data Type** for Campus to **Lookup Wizard**. The **Lookup Wizard** will begin.
- On the first screen of the **Lookup Wizard**, select "I will type in the values that I want." Click **Next.**
- On the second screen (shown right) type the names of the seven campuses, one per line: **Brookhaven, Cedar Valley, Eastfield, El Centro, Mountain View, Northlake, Richland**. (Press the down arrow to go down one line for each campus.)
- Click **Next.**

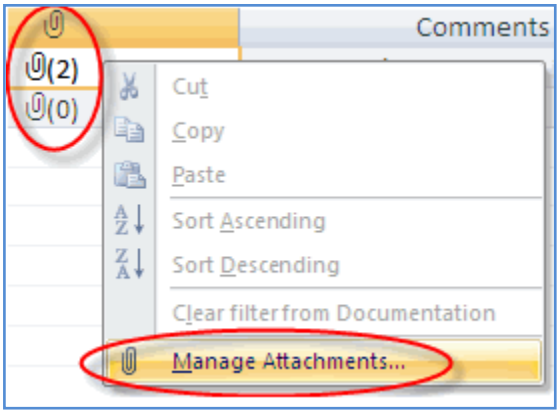




- The third and final screen has two options. See the figure (right).
- Type **Campus** for the label.
- Select either "**Limit To List**" OR "**Allow Multiple Values**".
- Click **Finish** when complete.

NOTE: If you check **"Limit To List"** then it will display a drop-down list, but it will not allow you to type an entry not in the list. If you check **"Allow Multiple Values"** then it will display the list with a checkbox in front of each value. You can check the box for more than one value. (For example if someone worked part time on two campuses.)

- In **Design View**; add a field at the bottom (below Comments) called **Documentation** and select **Attachment** as the data type. **Save** the Table again. (There are twelve fields in the table.)
- In **Datasheet View**, the **Documentation** column displays a paper clip symbol at the top instead of the field name.

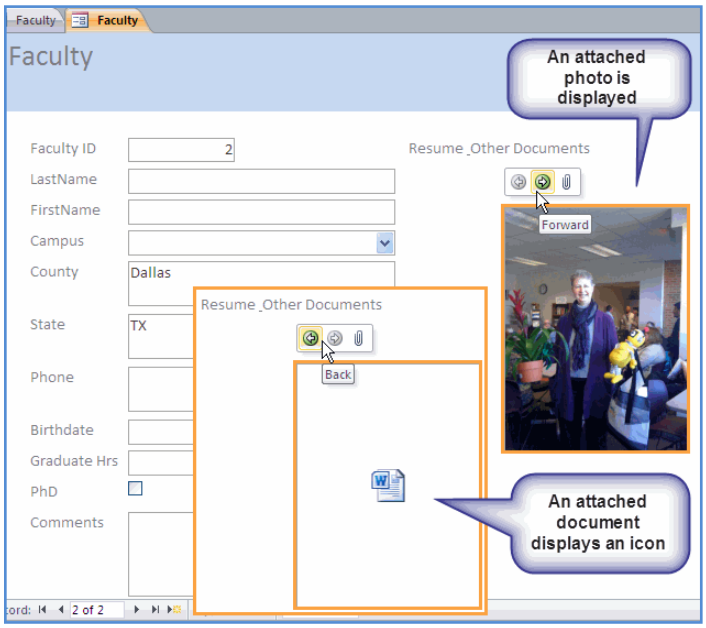


- In the figure on the right, the top paperclip is in place of a field name. The paperclip (2) means there are 2 attachments in the first record. (0) means there are no attachments in the second record.
- In **Design View**, look at the **Documentation Field Properties**. For the **Caption**, type **Resume & Other Documents**. The **Caption** displays at the top of the field (column). **Save** the **Faculty Table.**
- The **Attachment** data type is useful for attaching images, resumes, descriptions and other file types, etc.
- To attach documents and images, either double click on the cell containing the paper clip image, or with the cell active, right-click on the **Attachment** field and select **Manage Attachments** from the pop-up menu.
- In the **Manage Attachments** box, shown on the right, all the attachments for a specific field are listed. Click **Add** to attach a file.
- Click **Remove** to remove a file already attached.
- Use **Open** to see the contents of an attached file.

- Click **OK** when finished with the **Manage Attachments** window.
- **Save** and **Close** the table.

NOTE: When viewing the **Attachment** field of a record (in a form), click once on an attachment and the scroll buttons shown here, are visible.

- Click **Forward** or **Back** to scroll through the attachments. Click the paperclip to bring up the **Manage Attachments** dialog box.



- In a form, attached photos are displayed, other documents are shown as an icon.

Closing a database

- Click the **File Tab** to display the menu.
- Select the **Close Database** command.
- Save your changes. The database closes and it returns to the **Blank Database** screen. The database named **Faculty** is in the **Recent** list.

Navigation Pane

The **Navigation Pane** is located on the left side of the screen and displays all objects contained within the database, including all tables, forms, queries and reports.

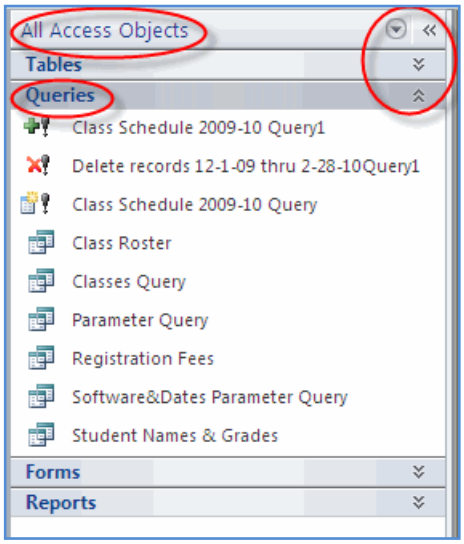
- Open the database **Sample2011**

The **Navigation Pane** can be minimized by clicking on the (left pointing) arrows button, top right of the pane.

To restore the **Pane** to normal view, click the right pointing arrows button at the top right of the pane.

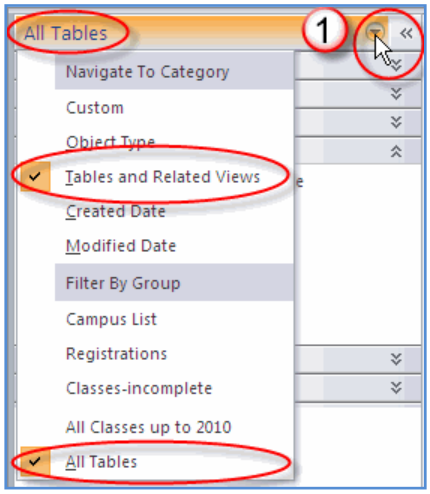
- Object categories can be minimized / maximized using the upward/downward pointing arrow buttons to the right of the object type.

- In the figure, **All Access Objects** are displayed: **Tables, Queries, Forms**, and/or **Reports**. **Queries** are also shown in the figure. It may not be evident which **Table** goes with each **Query**, because **Tables** and **Queries** can be named anything.



- A preferable way to view the **Objects** is by **All Tables** set to **Tables and Related Views.** This view shows the **Table** and its **Objects** together.

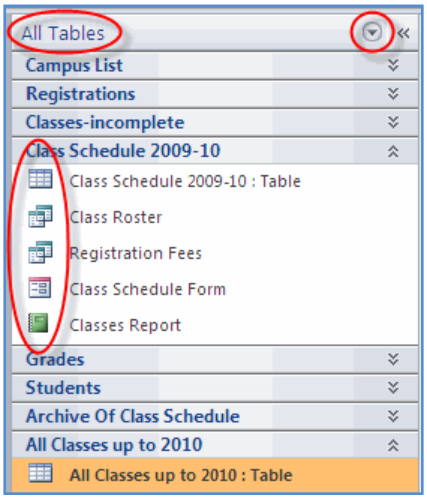
- To select the way you would like to view the objects, click the (1) **Menu** button which is the down pointing arrow in the top right corner of the **Navigation Pane** (see figure on right).



- Select **Tables** then **Tables and Related Views.** In this way tables will be listed with all their individual **Forms, Queries**, and **Reports.** [Each object type has its own icon in front of the name. See the figure lower right.]

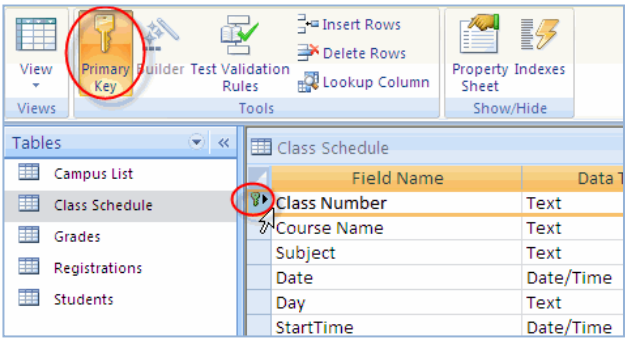
- Experiment with the views. Leave it displayed by **All Tables** and **Tables and Related views**. (See the figure on the right.)

- The objects are shown listed with the Table. In the example, the **Class Schedule 2009-10** group shows one **Table** and four related objects. The related objects include two **Queries**, one **Form**, and one **Report**. This makes it easy to know which table it is pulling information from.



Primary Key

- A **Primary Key** is used as a unique identifier for each record in a table and is essential when working with relational tables.
- To be effective, a **Primary Key** cannot have duplicate entries and must be set on a field with a unique identifier.
- When creating a new table, Access automatically adds the ID field with an **AutoNumber** data type. By default the ID field is also the **Primary Key**.
- Examples of other fields suitable to be set as a **Primary Key** are: passport, social security and driver's license numbers, military identification, tax, workplace or personal identification numbers, unique to each individual.
- The **Primary Key** will not allow duplicate entries in the **Primary Key** field for the table.



NOTE: A **Primary Key** field can never be empty.

- **Open** the **Sample2011** database.
- Open the **Class Schedule** table.
- Switch to the **Design View**, by clicking on the **View** button.
- The **Primary Key** symbol identifies the **Class Number** field as being the **Primary Key**.

NOTE: The **Primary Key** button is in the **Tools** group on the ribbon.

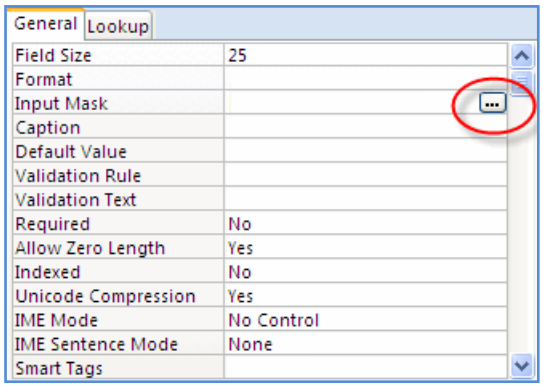
- To use another field as the primary key, select the field (**Course Name**) and then click the **Primary Key** button on the ribbon. The **Primary Key** symbol is now displayed beside the **Course Name** field.

NOTE: The **Course Name** field is NOT a suitable data type to become a primary key, as data within this field is unlikely to be unique.

- Reset the **Primary Key** to the **Class Number**, before continuing.
- **Close** the **Sample2011** database.
- **Open** the **Faculty** database again.

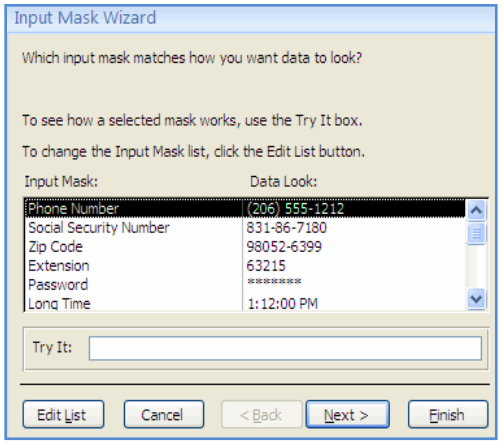
Input Mask Wizard

- Input Masks are used to restrict how data is entered. By forcing users of the database to enter data in a fixed format it greatly reduces the chances of data input errors. There is usually less typing with an **Input Mask** because parenthesis and dashes are put in for you.

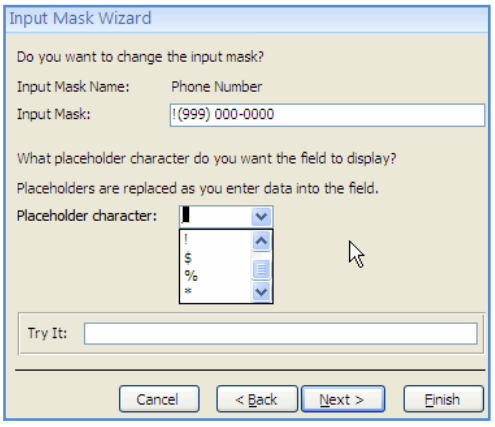


NOTE: Input Masks only work with **Text** and **Date** data types. When creating a field with information such as phone numbers, social security numbers, id numbers, etc. it needs to be a **Text** field if you want to type parenthesis, dashes, or spaces in the field. (A **Number** field will only allow digits, decimal points, or negative signs to be typed.)

- The **Faculty** database is open, open the **Faculty Table** in **Design View**.
- Click in the **Phone** field in the **Field Properties**. Notice the … button (circled in the figure above) on the right end of the line for **Input Mask**.
- Click the … button. This will start the **Input Mask Wizard**.
- [If prompted to save the table, click **Yes**.]
- The **Input Mask Wizard** dialog box is displayed. (see figure on right)

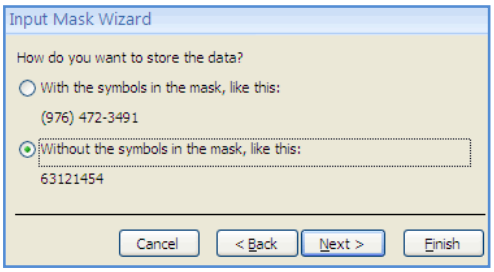


- Select **Phone Number** under **Input Mask**.
- In the **Try It:** box, type 10 digits and see how it fills in the parenthesis, space and dash.
- Click the **Next** button.
- The second screen allows you to change the **Placeholder** character. For example, you could change from using underline _ to using a pound sign #. (It is easier to see how many characters you can type with # because the _ run together as a line.)



- Change the **Placeholder** character and then click in Try It: and type 10 digits to see it work.
- Click the **Next** button.

- The last screen of the **Input Mask Wizard** asks if you wish to store the data with or without the symbols in the **Input Mask**. In other words, store a phone number like this: (972) 495-1234 or 9724951234 ? (with or without the symbols, as ten digits or fourteen characters?)



- There are two questions you should ask yourself – If I export this to a text file will it matter whether the parenthesis, space, & dash are there or not? And/or Does four more characters per record make that much difference in storage space?
- Select the way you want it to store, then click the **Finish** button.

NOTE: The **Input Mask** has additional codes that can be used to create an **Input Mask** without using the **Input Mask Wizard**.

- Click the **Datasheet View** button to switch to **Datasheet View**.
- When prompted, click the **Yes** button to save the changes.
- Using the mouse pointer, select the next blank cell at the bottom of the Phone column.
- Notice the new **Input Mask** appears. Type in a phone number.

NOTE: If at any stage incomplete data has been entered into the field using an input mask, you will not be able to move out of the field or select another function until the data is either removed or completed.

Input Mask Details

- An **Input Mask** can be typed instead of using the **Wizard**. It is divided into three sections separated by semi-colons (;).

!\(999”) ”000\-000; 0; #

- The first section is mandatory. The sample consists of characters with special meaning such as 9 means it is optional – you can leave it blank or type a digit, but it will only accept digits. The character 0 means it is mandatory to type a digit.
- The second section will either be a 1(to store only what is typed) or a 0 (to store all characters such as parenthesis or dash along with the typed data.
- The **#** at the end indicates the chosen placeholder. Anything in quotes or preceded by a backslash **** will appear as shown. The **!** at the beginning means if there are optional characters, it will fill from right to left.

Manipulating Records

Using the Undo command

- Like other Microsoft Office applications, the **Undo** button is located on the **Quick Access Toolbar**. The **Undo** command (**CTRL-Z**), allows the user to undo some actions. You can **Undo** deleting or editing the contents of a field. However, it will **Undo** all of the actions in the same record at one time.
- Unlike other Office applications however, when working with tables, the **Undo** function will only undo the actions on one record. You cannot UNDO the deleting of an entire record. (It warns you accordingly.)
- Open the **Faculty** table (in the **Faculty** database). Experiment with creating a new record, making changes and then try clicking the **Undo** button. Access will **Undo** sorting and some other changes.

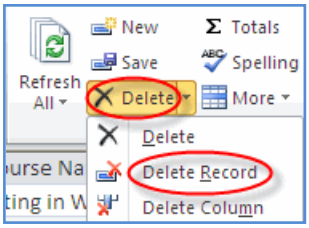
Deleting data within a record

- Deleting data in a record is similar to editing data in a record; however, there are a number of considerations to take into account.

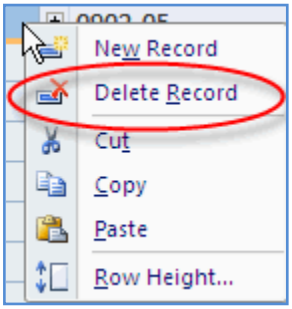
NOTE: Data cannot be deleted from fields where the **required** field property is set to **Yes**, as this prevents the field from being left blank.

- To remove data from a record, select the information in the field, press the **F2** key to activate editing mode, then use either the **Delete** or the **Backspace** key to delete the entry. Press the **Enter** key to commit the changes.
- The pointer moves to the next column, leaving the field empty.

Deleting a single record



- Occasionally you may need to remove a record from a table. There are several ways to do this.
- First select the record: move to the selection box to the left of the first field, click to select the whole row (record).
- Click the **Delete** button in the **Records** group of the **Home** ribbon, (top right figure) or click **Delete Record** in the drop-down list
- Press the **Delete** key on the keyboard, or
- Right-click the mouse, click **Delete Record** in the popup menu displayed (bottom right figure).
- A warning is displayed. Click **Yes** to confirm deletion.



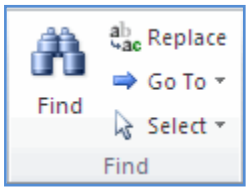
NOTE: As mentioned previously, **Undo** is not available when deleting records, therefore any record deletions will be final. When deleting records from a table, the unique number in an ID (AutoNumber) field is also deleted and will not be reused.

Deleting multiple records

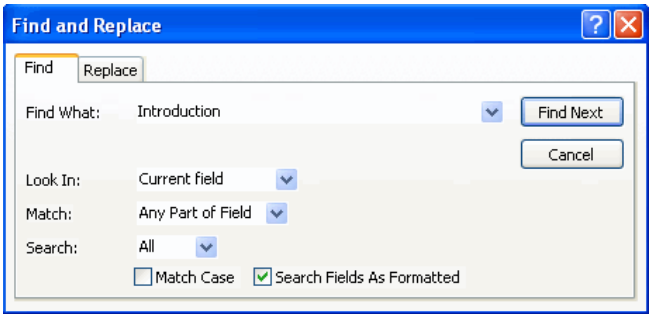
- If a group of records needs to be deleted the records must be together in the table. There are two ways to select the records:
- Move the pointer to the selection box to the left of the first record, click and drag down to highlight the block of records to be deleted, or
- Click in the selection box of the first record to delete, move the pointer down (do NOT DRAG); while pointing to the last record to select, hold the SHIFT key down and click.
- Once the records are selected, click **Delete** and respond **Yes** to the warning.

Find a Record

In a small table it is easy to find a specific record. However, if your table has hundreds or thousands of records you need help from Access.

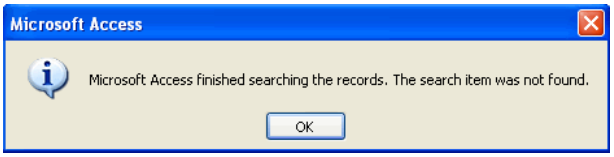


- Open the **Sample2011** database and **Open** the **Class Schedule 2009-10** table.
- Click in the field you will be searching, for example click in **Course Name** if you will be searching for a class with a specific name.
- Click in **Course Name**.
- Click the **Find** button, it is in the **Find** group in the center of the **Home** ribbon.
- A dialog box like the one shown in the figure on the right is displayed.



- **Find What:** (type the text you want to find)
- **Look In:** has **Current Field** (which means it is important to click IN the field that you are searching first). The other choice is Current Document, in a Table that means all fields are searched.
- **Match:** chose from: **Any Part of Field**, **Whole Field**, or **Start of Field;** any part of field means what you are searching for could be anywhere in the field, whole field means it can only have what you're searching for; and start of field means it will only be searching the beginning of the field for the text you typed.
- **Search:** chose from: **All**, **Down**, **Up**; **All** will search all records no matter where you start the search, **Down** will start on the current record and search Down (stopping on the last record), **Up** will search from the current record to the top and then stop searching.
- **Match Case** if checked it will only search for the exact case that you typed in the **Find What:** box. If it is unchecked it does not look at the "case" only the text typed.

- **Search Fields As Formatted** if checked will only look for data entered in the same format.
- For example, if a Time field is formatted like this: 4:30:00 PM it will NOT find 4:30 PM if **Search Fields As Formatted** is checked
- **Find What:** Introduction
- **Look In:** Current field
- **Match:** Any Part of Field
- **Search:** All
- **Click** the **Find Next** button on the right.
- When it has searched all the records, it will display the message shown on the right. Click **OK** and it will end the **Find**.



- **Close** the **Class Schedule** table.

Editing data within a record

- The **Sample2011** database should be open. **Open** the **Students** table.
- Use the **Find** command to find the student whose last name is **McGeary**
- Once you find him, click in his **Address** field, press **F2** to edit, (or click and type) change his address from 101 Belt Line Rd to **2005 Belt Line Rd** with the same city and zip code.

NOTE: By placing the pointer in any cell, then using the arrow keys to move to another cell, automatically activates edit mode. Alternatively, you can also click and drag to highlight data within a cell and replace it.

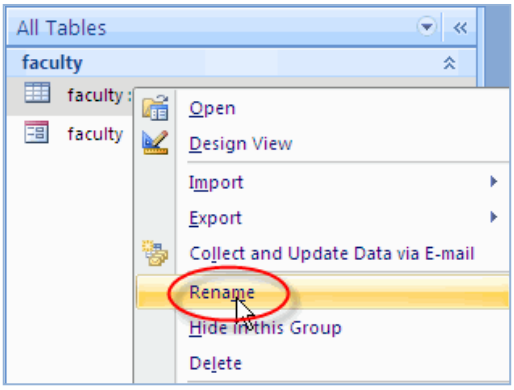
Find and Delete a Record

- Keep the **Students** table open.
- Click in the **Last Name** field, click the **Find** button
- Type the **Last Name**: **Love** in the **Find What** box
- Click **Find Next**
- It finds the only person whose last name is Love (Student ID 9). Close **Find**.
- Select the whole record by clicking the selection box at the far left edge of the table
- Press the **Delete** key on the keyboard OR click **Delete** in the **Records** group of the **Home** ribbon. Respond by clicking **Yes** to delete the record. (There is no **Undo** on deleting records.)
- Close the tables and close the **Sample2011** database.

Manipulating Tables

Rename a Table

- Open the **Faculty** database.
- Right-click on the table (**Faculty**) in the **Navigation Pane** on the left.
- Select **Rename**
- Type **Faculty 2011** as the new name, press **Enter**.



NOTE: Objects cannot be renamed while open, so if you opened the **Faculty** table, you will need to close it to continue. To close a table, click the x in the top right corner of the table window.

- Leave the **Faculty** database open.

Copy a table

- To copy an object, right-click on the name in the **Navigation Pane**, in the pop-up menu, click **Copy**.
- Right-click in the **Navigation Pane**, click **Paste**
- In the dialog box that pops up, type the name for the copy
- Three choices (for what can be copied) are given. (see the figure below)
- Copy the **Faculty 2011** table. Name the copy: **Copy of Faculty 2011**

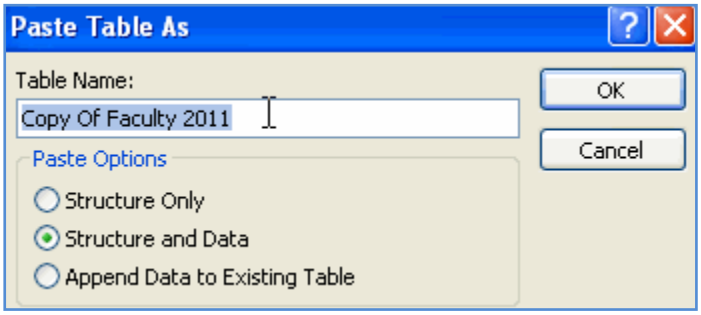
Paste Options are:

Structure Only – copies fields, including defaults, validations, input masks, etc.

Structure and Data – copies the structure and the information typed in the table.

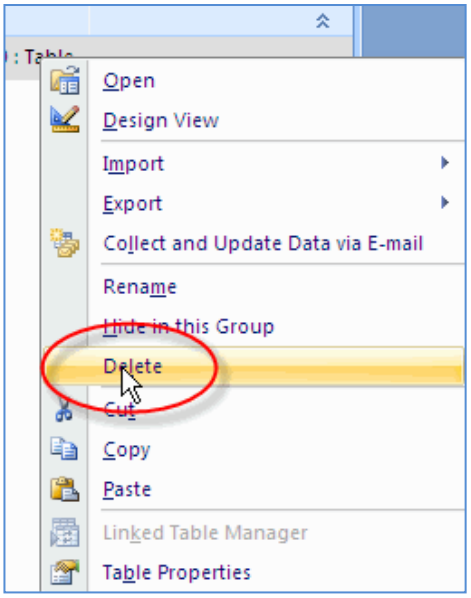
Append Data to Existing Table – will add the copied data to another, existing table.

- Select **Structure Only**
- Click **OK**
- Open the copy of the table to see what is in it.



Delete a table

- To delete an object, i.e. a table from a database, that object must be closed so first close any open tables



- In the **Navigation Pane**, right-click on the name of the table. From the popup menu select the **Delete** command (see figure on right).
- Click **Yes** to confirm deletion on the warning message. The table is deleted from the database.
- **Close** the **Copy of Faculty 2011** table.
- **Delete** the **Copy of Faculty 2011** table
- **Close** the Faculty database.

Sorting and Filtering

Sorting by a single field

- Sorting arranges the data within a table into alphabetical or numerical order, making it more effective and easier to use. Data is easier to find when we know it is sorted in some order, for example, even a simple computerized address book is sorted alphabetically from A – Z and calendars are sorted by date order.
- Open the **Sample2011** database.
- Double-click the **Students** table to open it.

NOTE: A table, query, form, or report can be sorted on one or more fields, with the exception of memo, attachment or OLE data type fields.

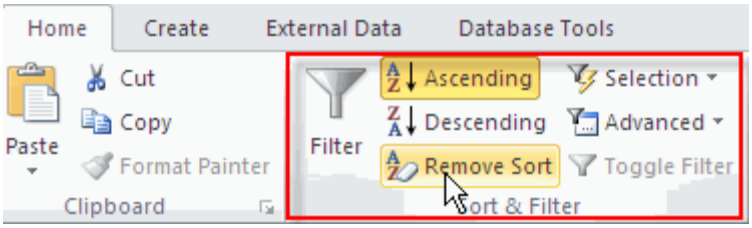
- To sort a single field, first select the field you want to sort. Click in the **Last Name** field name to highlight the column.

ent I	First Name	Last Name	Address	City	Stat	Zip Co
1	John	Smith	100 Main St.	Dallas	TX	75201-1
2	Mary	Johnson	301 Elm St.	Richardson	TX	75080-7
3	Walter	Brooks	1006 Willingham	Dallas	TX	75085-4
4	Francisco	Perez	434 Daniel	Garland	TX	75040-2
5	William	Burnett	1706 Buckingham	Garland	TX	75041-1
6	Martha	Matkin	3101 Fieldview	Richardson	TX	75081-1

- Within the **Home** tab, in the **Sort & Filter** group, click on the **AZ** (Ascending) button (top left in group)
- The table is now sorted in alphabetical order by **Last Name**. However, students with the same last name should also be sorted by their **First Name**.

NOTE: A sort will remain active until removed; even when a table is closed and reopened (if the table was saved prior to closing). There are some students with the same last name, their first names should be sorted where the last name is the same.

- To remove a sort, click the **Remove Sort** button in the **Sort & Filter** group (bottom left in group). The table returns to the default (original) sort order.



Sorting by multiple fields

- To sort on two or more fields, the fields need to be next to each other in the order that they will be sorted.
- In the table figure, the **First Name** and the **Last Name** fields are side by side, with the **First Name** field to the left of the **Last Name** field. This positioning is relevant when using a sort on multiple fields in a table, as the left most field in the selected group of fields, takes priority over the fields to the right.

ent I	First Name	Last Name	Address	City	Stat	Zip Co
1	John	Smith	100 Main St.	Dallas	TX	75201-1
2	Mary	Johnson	301 Elm St.	Richardson	TX	75080-7
3	Walter	Brooks	1006 Willingham	Dallas	TX	75085-4
4	Francisco	Perez	434 Daniel	Garland	TX	75040-2
5	William	Burnett	1706 Buckingham	Garland	TX	75041-1
6	Martha	Matkin	3101 Fieldview	Richardson	TX	75081-1
7	Elizabeth	Holmes	7416 Meadow	Dallas	TX	75243-2

- A multi-field sort is needed to organize the **Last Name** into alphabetical order first, and then sort the **First Name** field so that names within that field are alphabetical according to each different **Last Name**.
- Move the **Last Name** field (column) in front of the **First Name** field. Select the **Last Name** column, release the mouse. Point to the top of the **Last Name** column, hold down the mouse and drag in front of **First Name**. Release the mouse button when you see the black line in front of **First Name** column (as seen in the figure above).
- Place the pointer over the **First Name** field name (at the top of the column) ***without clicking***. When the pointer changes to the **down arrow** shape (circled in figure on right), click and drag (left) across the **Last Name** field in one movement, to highlight both fields. Release the mouse button to complete this task. The two columns will be highlighted.

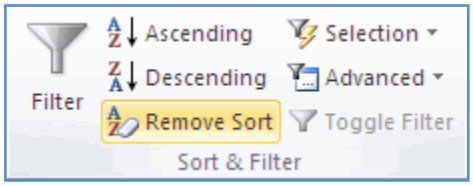
Last Name	First Name
Smith	John
Johnson	Mary
Brooks	Walter
Perez	Francisco
Burnett	William
Matkin	Martha

- Click the **Ascending** button in the **Sort & Filter** group.
- Click anywhere in the table to clear the highlighting from the two fields. If there are two or more records with the same last name, the **First names** are sorted within the **Last Name** field. [Look at your table, there are two each of Johnsons, Perrys, and Smiths, they should all be sorted by first name within the same last name.]
- Notice the tiny arrows (circled in the figure). These indicate which columns have been sorted; arrows pointing up mean **Ascending** (arrows pointing down are **Descending**).

Students

Student I	Last Name	First Name	
10	Bedford	Joseph	8
3	Brooks	Walter	1

- To put the table back in the order the records were in originally, click the **Remove Sort** button in the **Sort & Filter** group.



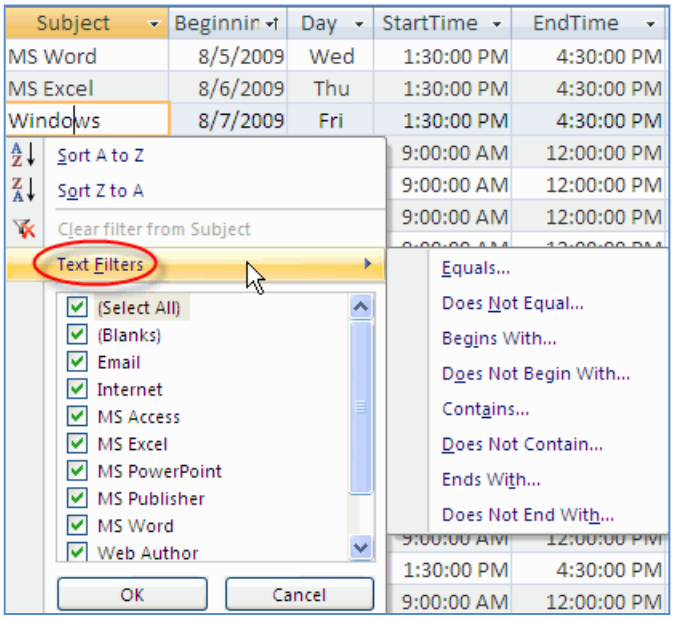
NOTE: When sorting text fields that contain null or zero-length strings, the null values are listed first (ascending order A-Z) and last (descending order Z-A).

Text Filters

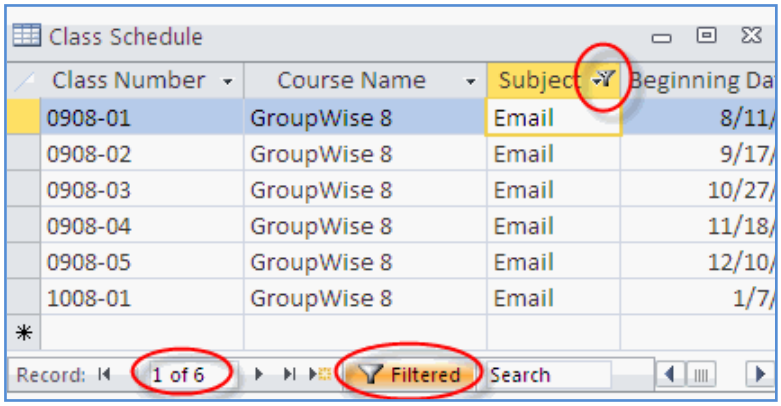
- **Text Filters** provide a means to find one or more specific records in a table or form or print specific records in a report, table, or query.
- By using criteria in a filter, you effectively display only those records matching the criteria. Records not matching the criteria disappear from view, hence the term 'filter'. For example, if you only want to display records that fall between the first day of a month and the last day of a month, you can apply a filter, specifying the oldest date and the newest date - only records matching the criteria remain visible in the table.
- Filters remain in place until they are removed or until the object is closed.
- More than one filter may be active at one time, although only one filter per field is possible. Setting a new filter on a field will effectively remove the previous filter for that field before applying the new filter.

Applying a single filter

- The **Sample2011** database is already open, open the **Class Schedule** table.
- A single filter is one that is applied to a single field, using the quick filter options made available in Access 2010.
- Click anywhere in the **Subject** field.
- Click the **Filter** button in the **Sort & Filter** group on the **Home** ribbon.
- A **Filter** popup menu is displayed.
- The menu is divided by lines, into three sections; however, only the second and third areas of the menu apply to filtering.
- For now, ignore the **A-Z sort** section as this will be covered in a subsequent section.



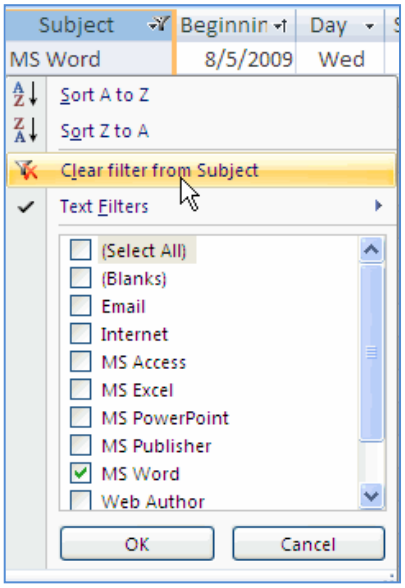
- In the lower section of the popup menu, you will notice a group of check boxes. These check boxes represent all the available (unique) subjects entered into the **Subject** field (or whatever field you clicked in).
- At the top of the check box group is one labeled **(Select All)**.
- Click the **(Select All)** check box to un-check all the boxes.
- To locate all records for those with the subject "**Email**", click the **Email** check box.
- Click the **OK** button. Six records are displayed with **Email** in the **Subject** field.
- A button is displayed to the right of the field name **Subject** or any field which has a filter applied. Click the button and select a different **Subject** to filter.
- Within the ribbon **Sort & Filter** group, the **Toggle Filter** button is now active. **Toggle Filter** effectively turns the filter on and off, switching between the filtered view and normal view (unfiltered).
- The **Filtered** button, previously grayed out is now active in the record navigation bar at the **bottom of the table** (see figure on right).



- The **Filtered** button works in exactly the same way as the **Toggle Filter** button in the **Sort & Filter** group in the ribbon. Click on the **Filtered** button once. The table is temporarily **unfiltered** and ALL records are visible.
- Click the **Unfiltered** button (or the **Toggle Filter** button) to revert back to the filtered view.

Clearing a single filter

- To clear a single filter, you will need to either place the pointer in any row of the appropriate column or click on the field name at the top of the column to highlight the whole column.
- Select and highlight the **Subject** column by clicking on the field name.
- In the **Sort & Filter** group, click the large **Filter** button.



NOTE: Only when a filter is in use, will the **Clear filter from** [Field] option be available in the list, otherwise the option will be grayed out. Click the **Clear filter from Subject** option from the list to remove the filter. The table again displays all records.

Creating other types of filters

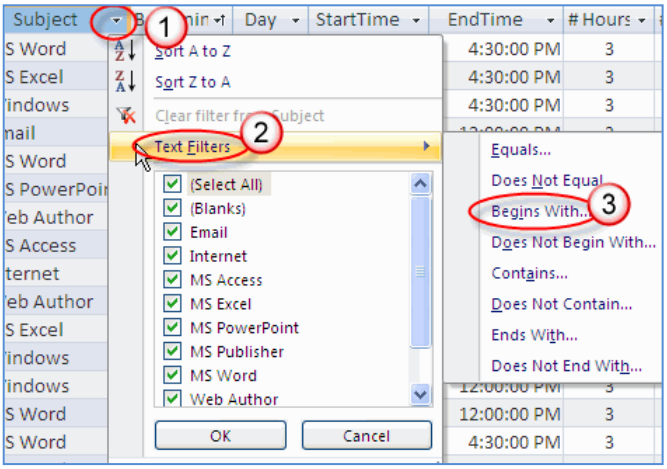
Creating Text Filters

- Using a filter on one field helps reduce the list of records to those that meet the criteria set, however there may be occasions when you want to be even more specific about the records you wish to display. This can be accomplished by setting different filters across multiple fields.

NOTE: Only one filter can be specified per field, however multiple criteria can be included in one filter.

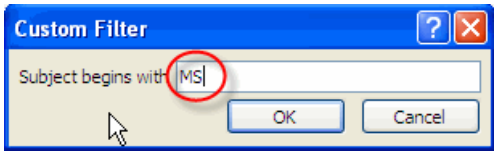
- To set filters on multiple fields, you simply follow the steps used for creating a simple filter and repeat the process across additional fields. The only subtle difference is in the process of clearing multiple field filters, covered later in this section.
- With the **Class Schedule** table open, select the **Subject** field.

- Click on the (1) **down arrow** button to the right of the **Subject** field name. (top left in the figure)
- In the popup menu click the (2) **Text Filters** command.
- From the submenu displayed, click (3) **Begins With**.



NOTE: Text Filters are custom filters that allow you to specify criteria without having to use operators such as <, >, =, etc.

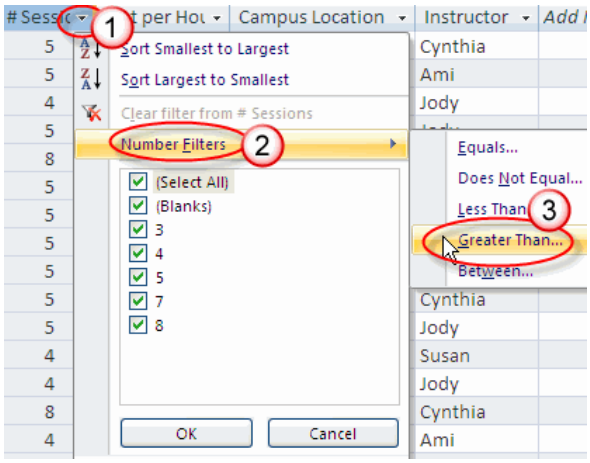
- The **Custom Filter** dialog box is displayed.
- Type **MS** into the **Subject begins with** box.
- Click the **OK** button.



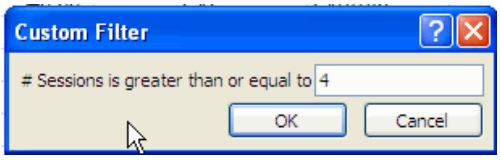
- Only records matching the criteria, "begins with **MS**" in the **Subject** field remain displayed. [76 of the 110 records match this criteria]

Date & Number Filters

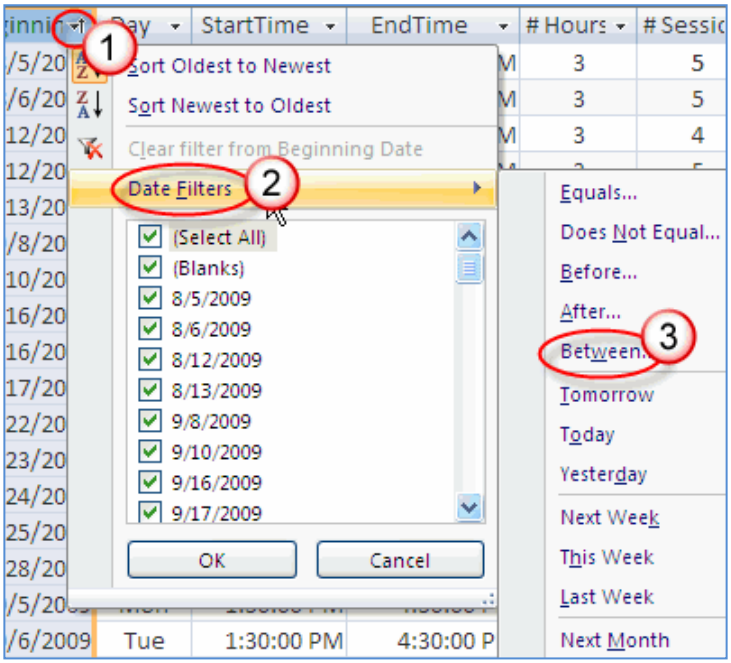
- Click within the **# Sessions** field column.
- Click the (1) down arrow button to the right of the **# Sessions** field name.
- When the **Filter** popup menu is displayed, click (2) **Number Filters** command.
- From the sub menu displayed, click (3) **Greater Than**.

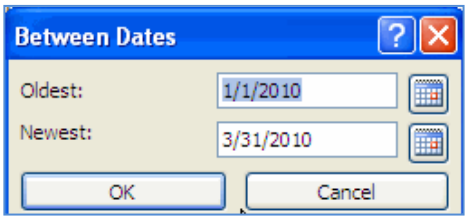


- Type **5** in the box.
- Click on the **OK** button.
- Only records matching a **Subject** beginning with '**MS**' and "**# Sessions** greater than or equal to **5"** remain displayed.



- Select and highlight the **Beginning Date** field.
- Click on the **down arrow** button to the right of the (1) **Beginning Date** field name.
- When the filter dialog box is displayed, select the (2) **Date Filters** command.
- From the submenu displayed, click (3) **Between ...**
- The **Custom Filter** dialog box is displayed.
- Into the **Oldest** section, type in **1/1/2010**.
- Into the **Newest** section type in **3/31/2010**.
- Click on the **OK** button. Now the number of records matching the three filters is reduced even further.





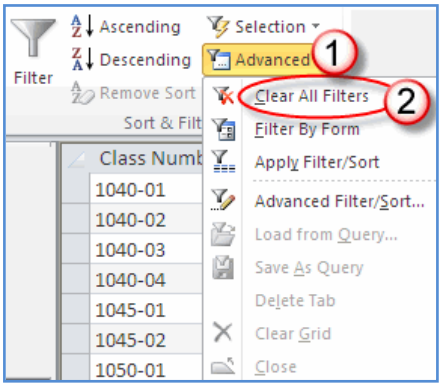
- (Only 23 records match the three filters: **Subject**, **# Sessions**, and **Beginning Date**.)

Clearing multiple filters

Subject	Beginning Date	Day	StartTime	EndTime	# Hours	# Sessions
MS Access	1/14/2010	Thu	9:00:00 AM	12:00:00 PM	3	8
MS Access	3/4/2010	Thu	1:30:00 PM	4:30:00 PM	3	8
MS Access	1/12/2010	Tue	9:00:00 AM	12:00:00 PM	3	8
MS Access	2/25/2010	Thu	1:30:00 PM	4:30:00 PM	3	8

- It is possible to clear each filter, one at a time, by clicking the filter button at the top of the column and clicking **Clear filter from <field>.**

- To clear all filters at once, click (1) **Advanced** button on the **Home** ribbon, in the **Sort & Filter** group. From the list, select the (2) **Clear All Filters** option. The filters will be removed and all records will once again be displayed.



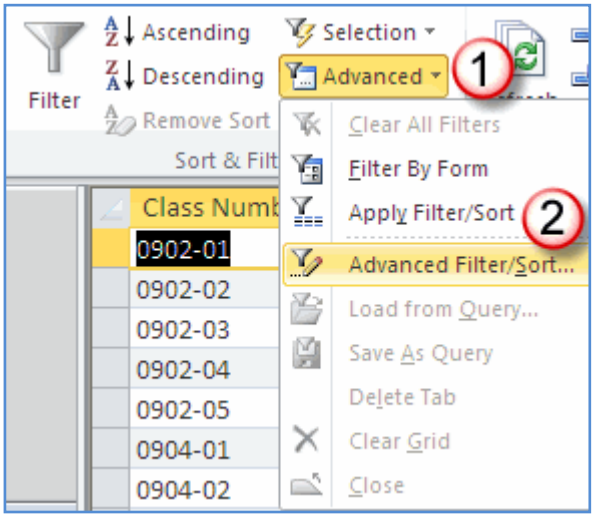
Using Advanced Filter/Sort

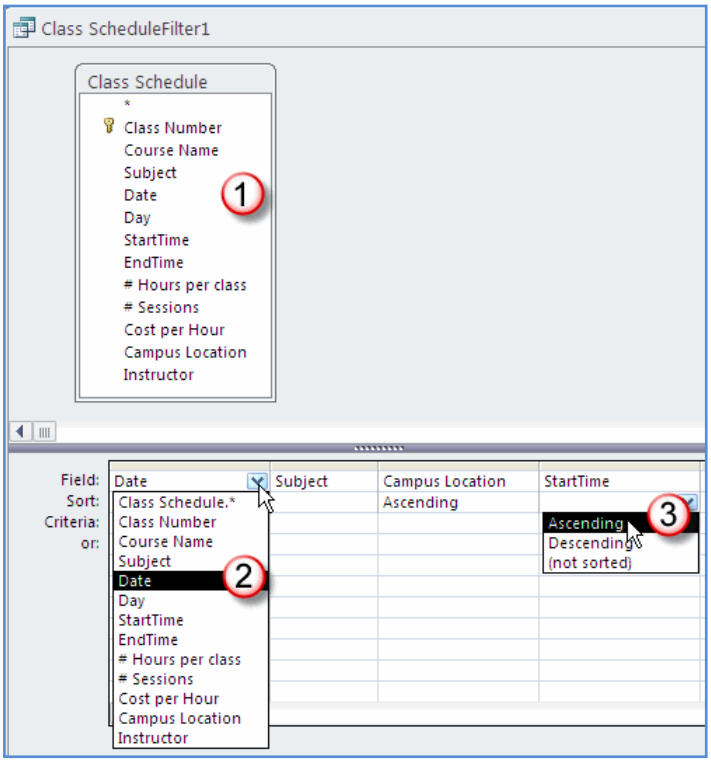
- **Advanced Filter/Sort** makes it possible to easily do multi-column sorting or advanced multi-column filtering or to combine filtering and sorting in one operation.
- The **Sample2011** database should be open. The **Class Schedule** table should also be open. All previously set filters should be cleared.

Multi-column sorting:

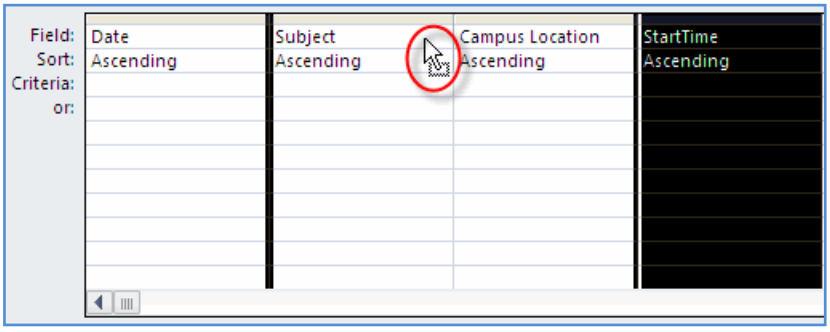
- In the **Sort & Filter** group, click (1) **Advanced**.
- Select (2) **Advanced Filter/Sort** from the pop-up menu.
- The **Advanced Filter** window opens.

- Since sorting needs to be set up so that the columns to be sorted should be in order of importance from left to right, the columns need to be added to the bottom grid in that order.





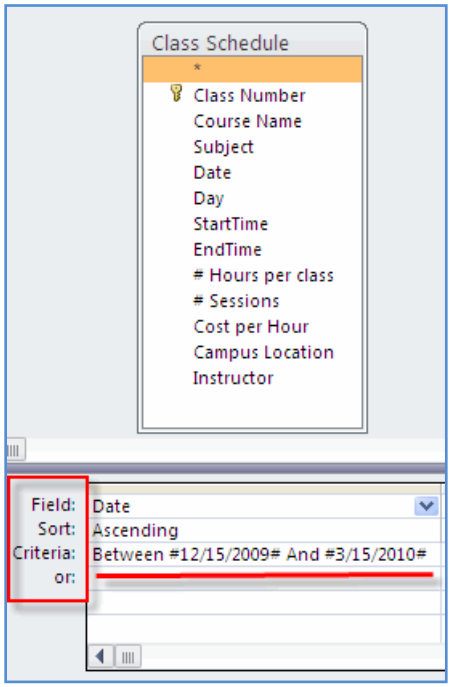
- To place a field in the grid you can (1) double click it in the field list OR (2) click the drop-down arrow in the column grid and click once on the field name in the drop-down list.
- Put the following fields in the grid in this order: **Date**, **Subject**, **Campus Location,** and **StartTime**.
- Under each field, on the **Sort**: line select (3) **Ascending** from the drop-down list.
- Select **Advanced** in the **Sort & Filter** group.
- Select **Apply Filter/Sort**.
- Look at the 8/13/2009 **Start Times**, they are not in order. Because **StartTime** is the last field to be sorted, it is not working correctly. The **StartTime** field should be between **Date and Subject**.
- Click **Advanced**.
- Select **Advanced Filter/Sort**. The grid is re-displayed.
- Select the **StartTime** field by clicking at the top of the column with the black down arrow.
- Release the mouse button, move the mouse to the top of the selected column, when you see a small white arrow, hold down the mouse button and drag the column to the left. Release the mouse button when the vertical black line is between **Date** and **Subject.**



- Click **Advanced**.
- Select **Apply Filter/Sort**. The **Dates** with two **Start Times** are in order by **Start Time** now. [Look at 8/13, 9/16, and 10/1 to verify.]
- Select **Advanced Filter/Sort** to display the grid.

Adding Criteria to the Advanced Filter/Sort:

- Click on the **Criteria** line of the **Date** column.
- Type this: **BETWEEN 12/15/2009 AND 3/15/2010** (see the figure on the right)
- Click **Advanced**. Select **Apply Filter/Sort**. Look at the table, instead of 110 records, you see **33 Filtered records**



- Click **Advanced**. Select **Advanced Filter/Sort**.
- Click on the **Criteria** line of the **Subject** column.
- Type this: **MS*** (**ms*** works the same)
- Click **Advanced**. Select **Apply Filter/Sort**.
- Look over the results of the additional **Filter**.

NOTE: The asterisk * is used as a wildcard. By putting **MS*** that means we are searching for records that start with **MS** and may or may not have text after the **MS**.

- Click **Advanced**. Select **Advanced Filter/Sort**.
- Click on the **Criteria** line of the **Campus Location** column.
- Type this: **"CVC" OR "EFC"**
- Click **Advanced**. Select **Apply Filter/Sort**.
- Look over the results of the additional **Filter**. All three filters are shown below.

Field:	Date	StartTime	Subject	Campus Location
Sort:	Ascending	Ascending	Ascending	Ascending
Criteria:	Between #12/15/2009# And #3/15/2010#		Like "MS*"	CVC or EFC
or:				

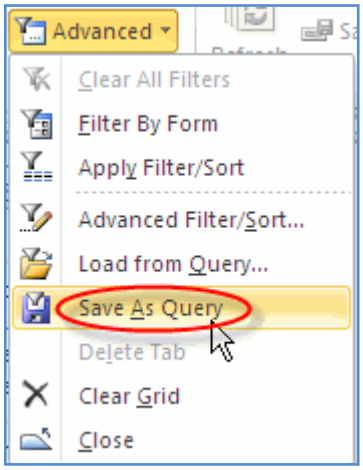
Class Schedule

Course Name	Subject	Beginning	Day	StartTime	EndTime	Campus Locat
Excel 2007 Charts	MS Excel	12/15/2009	Tue	1:30 PM	4:30 PM	CVC
Access 2007 Advanced	MS Access	12/16/2009	Wed	9:00 AM	12:00 PM	EFC
Introduction to Powerpoint 2007	MS PowerPoint	1/6/2010	Wed	9:00 AM	12:00 PM	EFC
Intro to Excel 2007	MS Excel	1/12/2010	Tue	9:00 AM	12:00 PM	CVC
Mail Merge - Word 2007	MS Word	1/21/2010	Thu	1:30 PM	4:30 PM	EFC
Excel 2007 Charts	MS Excel	1/22/2010	Fri	9:00 AM	12:00 PM	EFC
Introduction to Powerpoint 2007	MS PowerPoint	2/2/2010	Tue	1:30 PM	4:30 PM	CVC
Intro to Excel 2007	MS Excel	2/5/2010	Fri	1:30 PM	4:30 PM	EFC
Fine Tuning Powerpoint 2007	MS PowerPoint	2/9/2010	Tue	9:00 AM	12:00 PM	CVC
Word 2007 Introduction	MS Word	2/11/2010	Thu	9:00 AM	12:00 PM	CVC
Access 2007 Introduction	MS Access	2/25/2010	Thu	1:30 PM	4:30 PM	EFC
Access 2007 Advanced	MS Access	3/5/2010	Fri	9:00 AM	12:00 PM	CVC

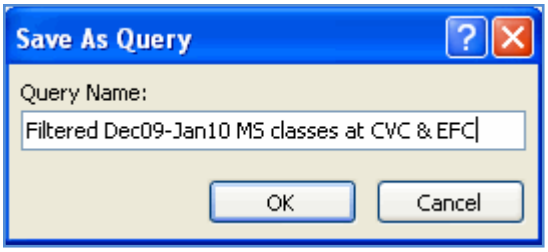
Record: 1 of 12 Filtered Search

- Above is the filtered **Class Schedule** Table. Twelve records met all the criteria.

NOTE: Unaffected fields (columns) in the above figure are hidden.



- To **Hide/Unhide** a field, right-click the selected column(s) in the table, select **Hide Field(s)** (or **Unhide Fields**).
- If you would like to use this same filter again in the future, you must save it as a query.
- First display the grid, click **Advanced** then click **Advanced Filter/Sort**.
- In the grid, click **Advanced**, **Save As Query** in the pop-up menu.
- The **Save As Query** box pops up, asking for the **Query Name**.
- Type a meaningful name that will help you remember what the filters do.
- Click **OK**.
- To use the saved Query in the future, just double click to open it and it will display the current records that meet the criteria. If new records have been added to the table, they will show in the Query if they meet all of the criteria.

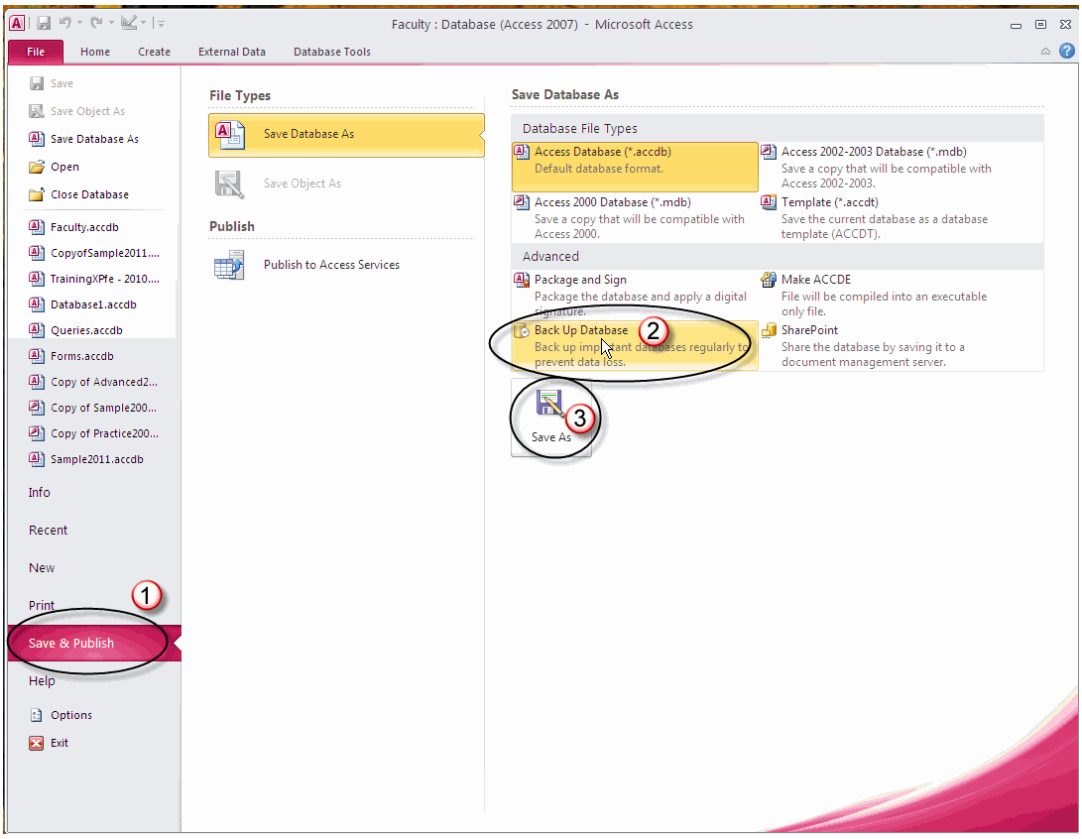


- Click **Advanced, Close** (to leave Advanced Filter/Sort grid).
- To clear the filter/sort, select **Advanced** then **Clear All Filters**.
- **Close** the table. **Close** all tables and other objects.

Backup your databases

- With your database open, be sure all tables and other objects are closed.
- Click the **File** tab.
- Click (1) **Save & Publish**.
- Click (2) **Back Up Database**.
- Click (3) **Save As**
- Select the drive and folder in which you wish to store your backups. [You might want to make a new folder called **Access Backups** to store all of your backups.]
- The backup file will be given a name with the date in the name like this:

  Classes_2011-01-28.accdb



You can change the filename and/or the location of the backup.

- Click **Save**
- Close the database
- **Close Access.**

Class registration and schedule:

http://helpdesk.dcccd.edu

or

www.dcccd.edu

Employees > Training and Development > Software Training and Support

Dallas TeleCollege at the R. Jan LeCroy Center for Educational Telecommunications

District Software Training & Support

9596 Walnut St. Dallas, TX 75243

STAFF Helpdesk Phone: 972-669-6477

STUDENT Helpdesk Phone: 972-669-6402

E-mail: softwaresupport@dcccd.edu

Web Site: http://helpdesk.dcccd.edu

Training Web Site: http://employeetraining.dcccd.edu