Introduction
to
Access 2007

Tutorial

Access 2007 Video Overview: Up to Speed with Access 2007.

Access 2007 brings you a new look and new features designed to help you get your work done more easily than ever. In this video, you'll learn about new file formats, and you'll also see how to work with files from previous versions of Access.

Video Overview

Interactive reference guide to help you quickly learn where things are.

When you click the link below, the interactive guide will start. Once you're there, rest the pointer over an Access 2003 menu or button to learn its new location in Access 2007. To see an animation showing the location of the command or button in Access 2007, just click it.

Interactive 2003 to 2007 Command Reference

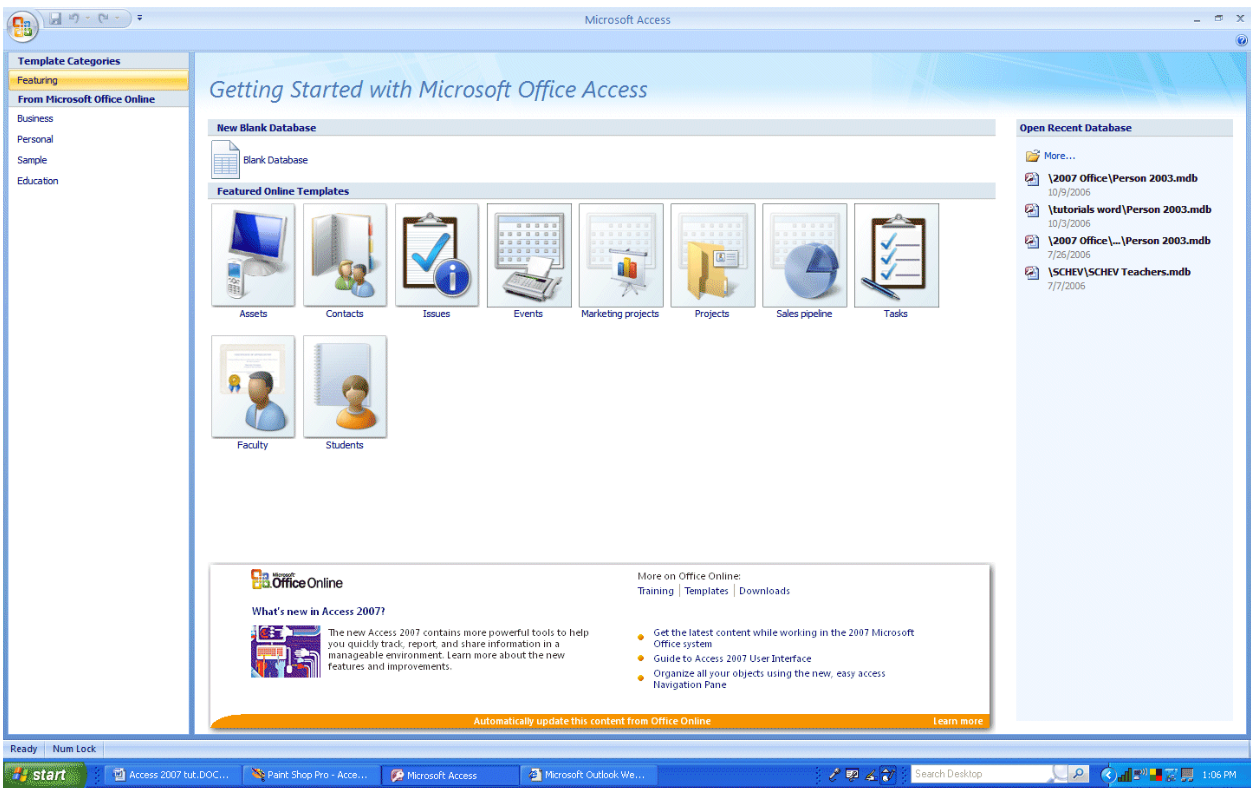
Creating a Database using Access 2007

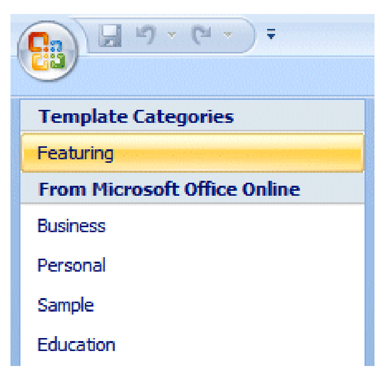
Created: 12 December 2006

Starting Access 2007

Double click on the **Access 2007** icon on the **Windows** desktop (**see right**), or **click**-on the **Start** button in the **lower left corner** of the screen, then **click**-on **Programs,** and then **click**-on **Microsoft Access 2007**.

The **Getting Started with Microsoft Office Access** screen will **appear (image below**).





For previous Access users: The above menu screen is **new** in **Access 2007**. Take a few minutes to peruse this screen. You will notice that (on the top left of the screen) that the “old” Access Templates (already created databases) are still available.

As we move through this tutorial, many features of “old” Access will be familiar to you.

Left Mouse Button

In this tutorial, whenever we indicate that you need to click the mouse, it will mean to click the left mouse button – unless we indicate that you should click the RIGHT mouse button. So, always "click left" unless we tell you otherwise.

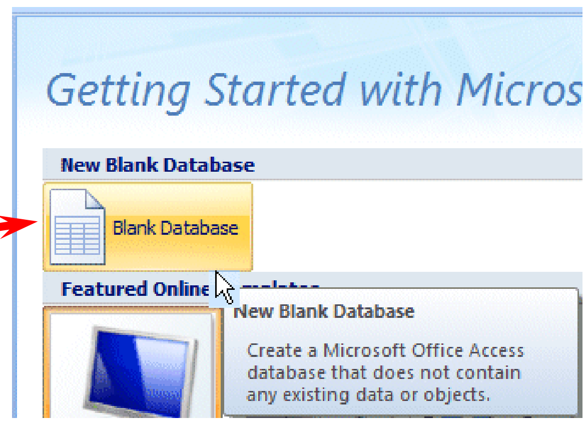
Creating an Access 2007 Database

This tutorial will assist you in creating a database that includes the features most often used in databases. Once you gain skill with the database you create, you will be able to use and understand the already created Microsoft Access databases mentioned on the last page.

We'll begin with a Blank Database and increase our database knowledge with each step.

Look at the **center** of your Access screen. You will see – **Getting Started with Microsoft Office Access**. Below the title you will see a Blank Database button.

Click the **Blank Database button**.



As soon as you click the **Blank Database button**, the **right side of your Access screen will change and look like the image on the left.**

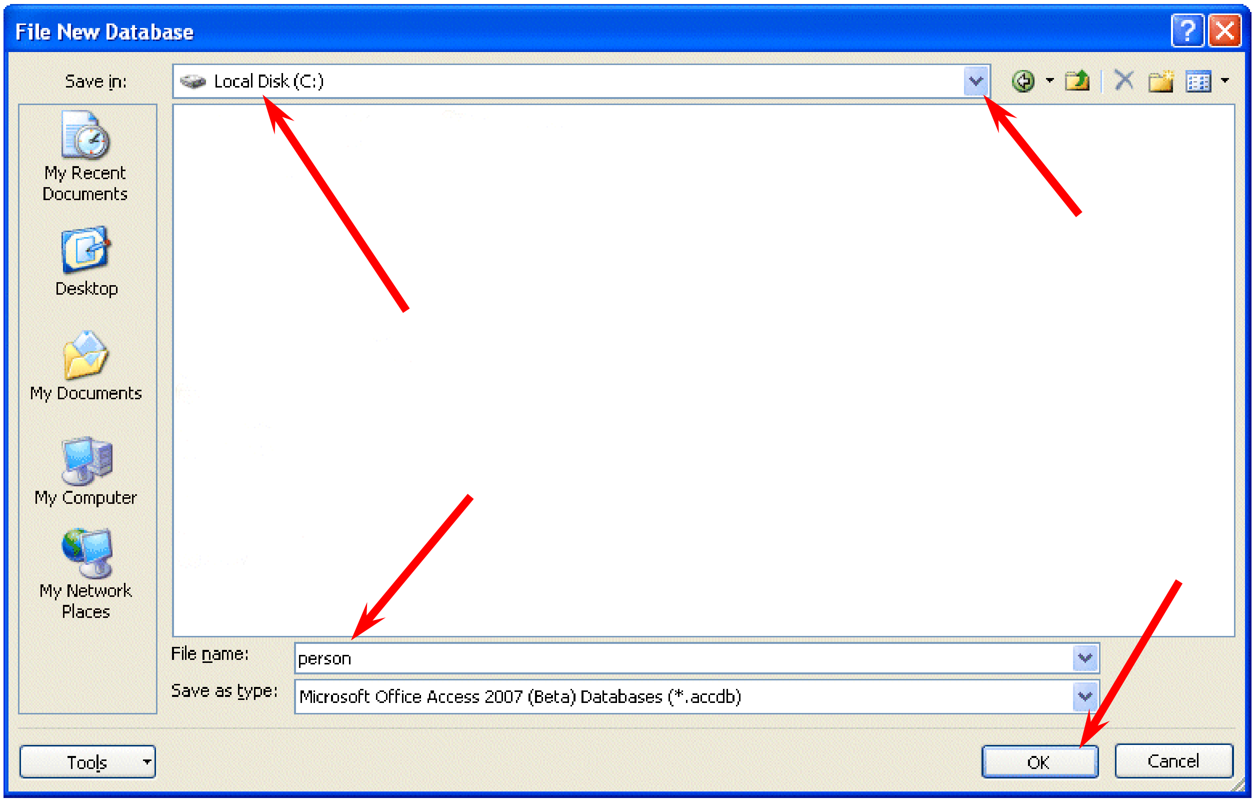
Saving your work

One of the **unique** things about **Access** database is that it **requires** you to **save** your **database as soon as you enter the program**.

You can **save** your work on a **floppy diskette** in the **A: Drive,** on a **USB key/Flash Drive** or on your **C: Hard Disk**, or in some other drive. Please save to one of these areas and substitute your Drive in the instructions.

To **choose** the **Drive**, on which you will save your Access database, **click** the **small folder** to the **right** of **File Name:**

A **New File Database** menu screen similar to the one below will appear when you click the folder.



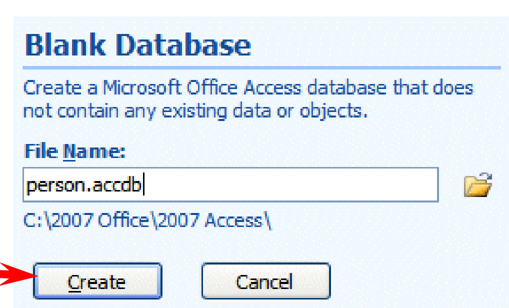
In the **upper left corner** of the **File New Database** menu screen that appears, you will **see** a **Save in**: area (**see upper left arrow above**). **Click**-on the **small down arrow** on the **right** and it will show you the various **disk drives available** on which you can save (**see right upper arrow above**). Point to the **drive on which you want to save your database,** and **click-on it**. If you choose the **3½ Floppy** (**A:**), make sure you have a **formatted disk in the A drive**. If you choose the C: drive, choose the folder in which you want to save by double clicking on the folder. Your **selection** should now **appear** in the **Save in**: area

Next **click-in** the **area** to the **right** of **File Name:**. **Delete** any **text** that is entered in the area and then **type-in** the word **PERSON** as **shown** at the **bottom of the above image** (**see lower left arrow**).

Now **click**-on the **OK button** or tap the **Enter** key (**see lower right arrow on last page**).

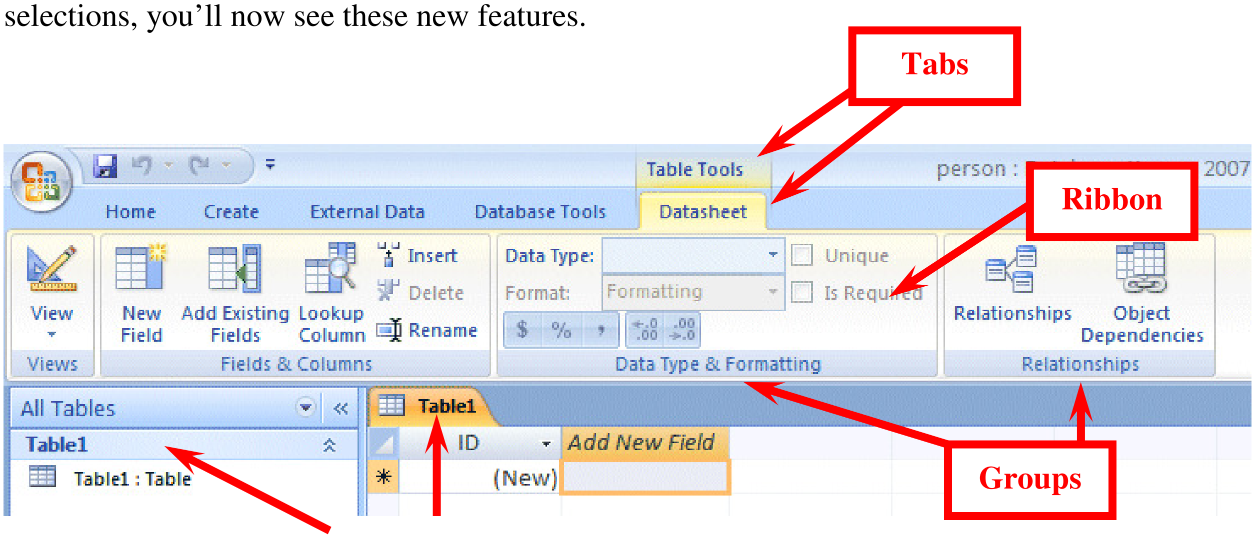
You will now **return** to the **Getting Started with Microsoft Office Access screen**. On the **right side** of the screen you will **see your database File Name** and **below** it, the **Drive on which you will create your database.**

Click the **Create button**.



Creating a Table

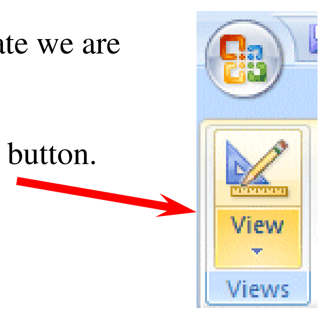
When you **click** the **Create button** your Access 2007 screen will change to the **image below**. This is the "**new look**" in **2007 Office**. You will now see **Tabs** and **Ribbons** that automatically appear **for the area in Access on which you're working**. Instead of a Menu Bar and drop down selections, you'll now see these new features.

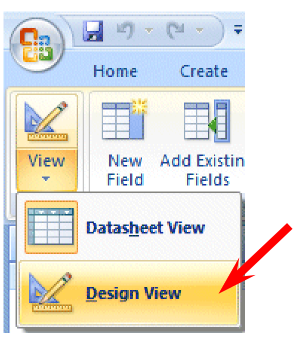


When we clicked the Create button Access assumed we desired to create – within our Person database – another database – which is called a Table. You'll notice that at the top of the above image that the Table Tools and Datasheet Tabs appeared to assist you. The Ribbon below these Tabs is composed of Groups of selections you'll use to assist you as you create your Table. We'll be working with these Tabs/Ribbons throughout this tutorial.

In the lower portion of the above image you'll see selections that indicate we are creating a new Table.

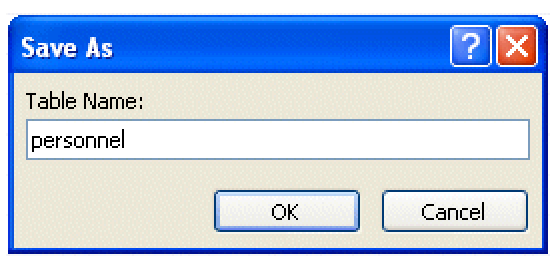
On the left of the Table Tools-Datasheet Tab/Ribbon you'll see a View button. Click the View button.



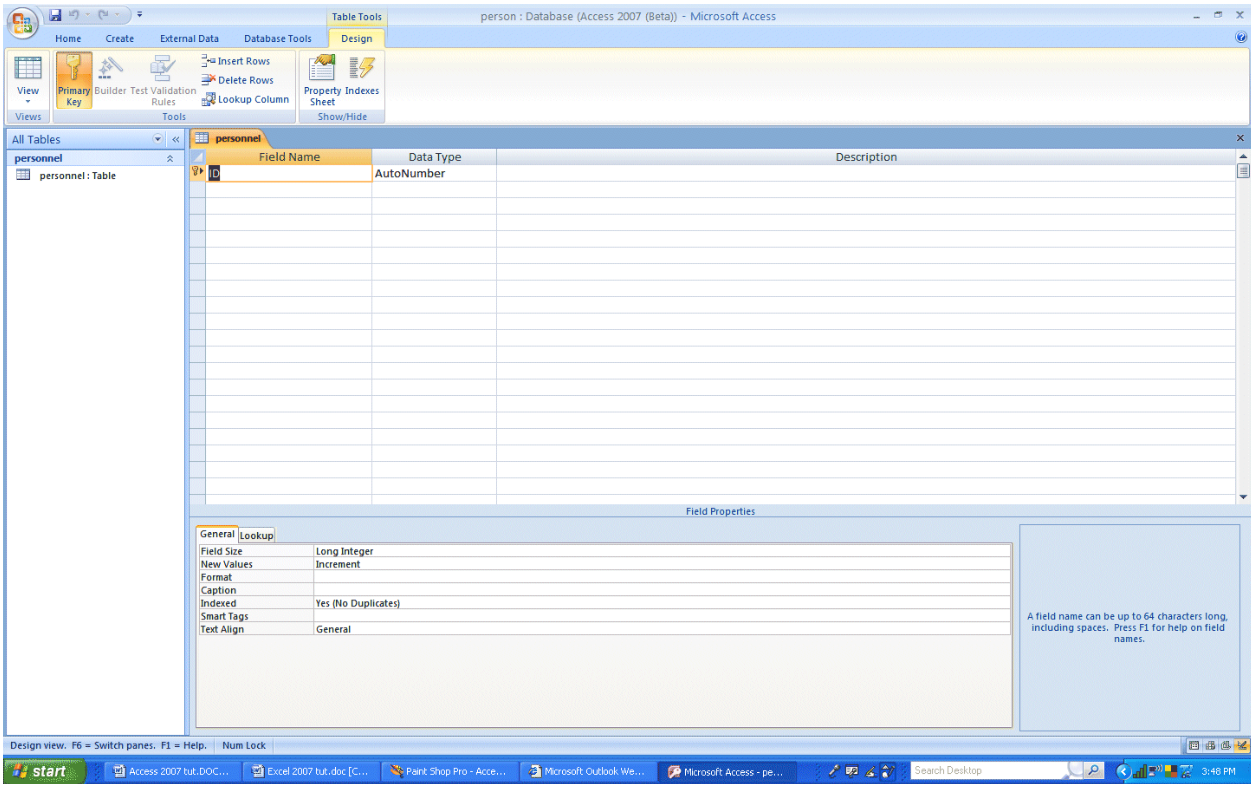


When you click the View button the image on the left will appear. Since we want to create or design a new Table, we'll click the Design View selection.

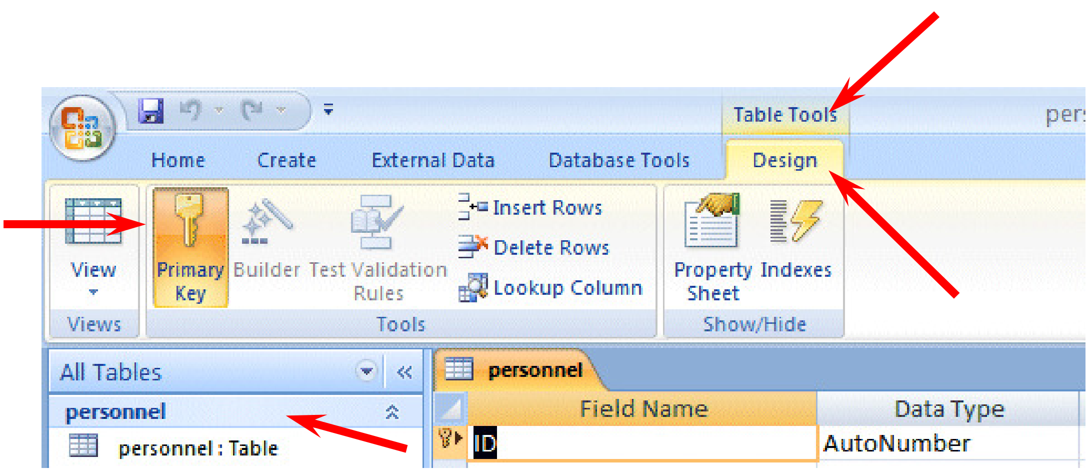
A Save As menu screen will appear similar to the image on the right. Type personnel in the Table Name: area and then click the OK button.



Your Access 2007 screen will now change again – to the image below.



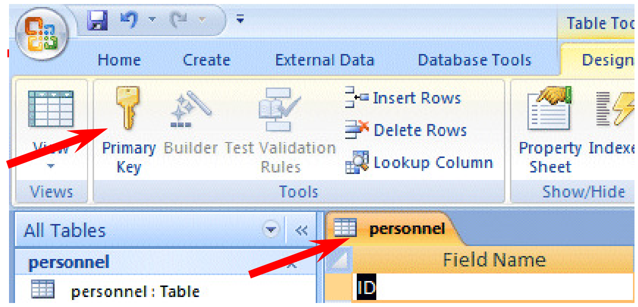
We've enlarged the upper left corner of this image below.



Notice (in the **image above**) that our **Table Tools Tab** still appears. However, because we are now in the Design process, the **lower Tab/Ribbon has changed** to **Design** – to assist us with designing our Table.

In the image on the last page you will notice that the Primary Key button is “orange” and, in our Personnel Table, that it is also “orange” – with a little key to the left of ID.

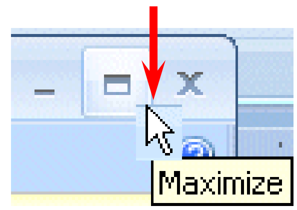
In database language this is called “keying.”



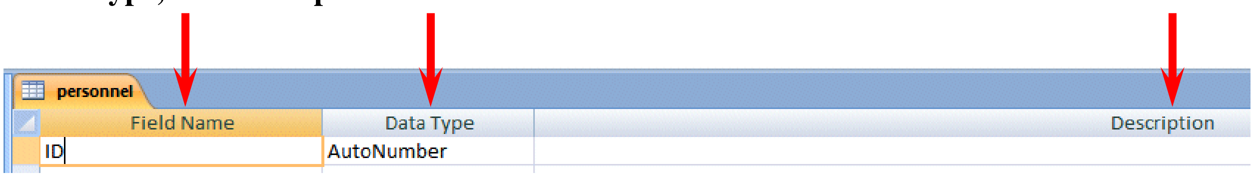
Keying, or indexing, is somewhat advanced. You can get a good description by searching in Help for Keying or Primary Key.

To “turn off” the Primary Key, click the Primary Key button. You’ll notice that they Primary Key button is no longer “orange” and the little key is gone from the left of ID.

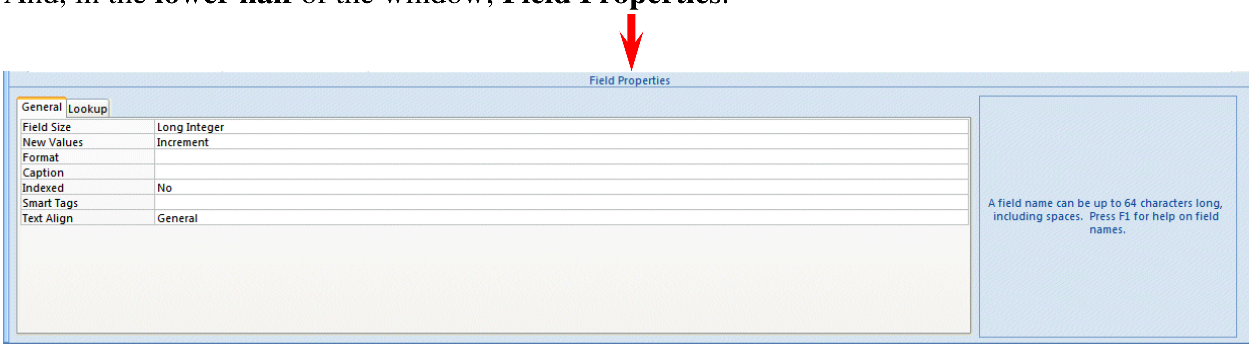
If the **Personnel Table** image **does not “fill” the screen**, **click**-on the **small square** between the “**minus and the X**” in the **upper right hand corner** of the screen (**see arrow** and **image** on **right**). This will Maximize the screen.



Notice, **under** the **Blue Bar** at the **top** of the **Design screen** there are (**3**) things: **Field name, Data Type,** and **Description**



And, in the **lower half** of the window; **Field Properties**.

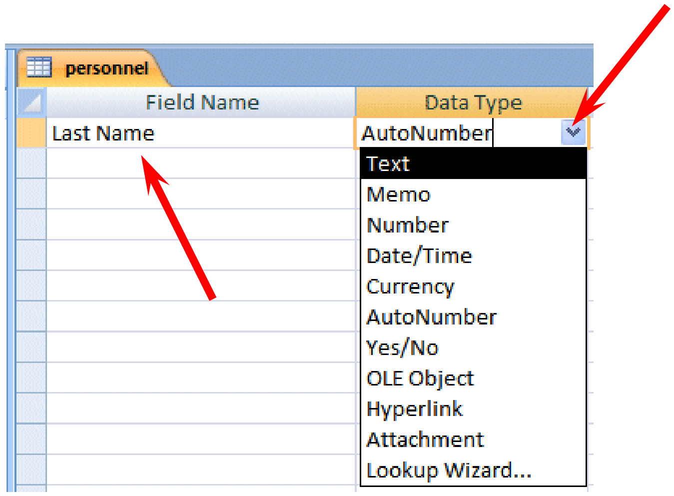


We’ll be **creating** the **Field Names** that make up a **database**. This is similar to creating a **blank personnel form (on paper)** that will be "**filled-in**" for each employee (Name, Address, Phone Number, etc.). The **areas that will be filled in** are called **Fields** in a database. When you fill in all of the fields for a person, the individual "**forms**" are called **records** in a database. There will be a record, or form, for each employee. All the forms, together, make up a Table (database).

So let's create a personnel database.

Significant Note: When **creating** a **database** it is always best to "**break down**" a **field** into its "**smallest parts**." For example – Name would break down into First Name, and Last Name (you could also have Middle Initial, Title, etc.) Address would break down into Street Address, City, State, and Zip (you could also have Apartment Number, etc). Because we are working in Access 2007 it will be very simple to "put the fields back together" with a few mouse clicks when we need to do this. **Trust us. This will save you a lot of time later on.**

Look at the **image** on the **right**. **Click-in** the **area** or **space under Field Name** and **type-in Last Name (to replace ID). Tap Enter** or **click-in** the **area** to the **right** under **Data Type**. The **cursor** now **moves** to the right under **Data Type**. **Click** the **down arrow** under **Data Type** on **right** (see arrow on right). Your design screen should **look like** the one on the **right**.



Now we'll talk about Data Types.

Data Type

Text You may type in any alphabetical/numerical data that you desire - up to a maximum of 255 characters. As indicated, this is a text field, so you can't do mathematical calculations. Examples of Text data are: names, addresses, stock numbers, room numbers, zip codes, etc.

Memo This field is for lots of text. You can have up to 32,000 characters.

Number This field is for numbers where you want to add, subtract, multiply, divide, average, and do numerical calculations. This field can be a very large size, so when we get to Field Properties, we'll talk about "sizing" this field so it doesn't take up to much "space" in storage.

Date/Time Dates and Times. You may format these later, as you may desire.

Currency Dollars ($). You may format these later, as you may desire.

AutoNumber This field is an "automatic" counter that assigns a number each time you put data into a new field.

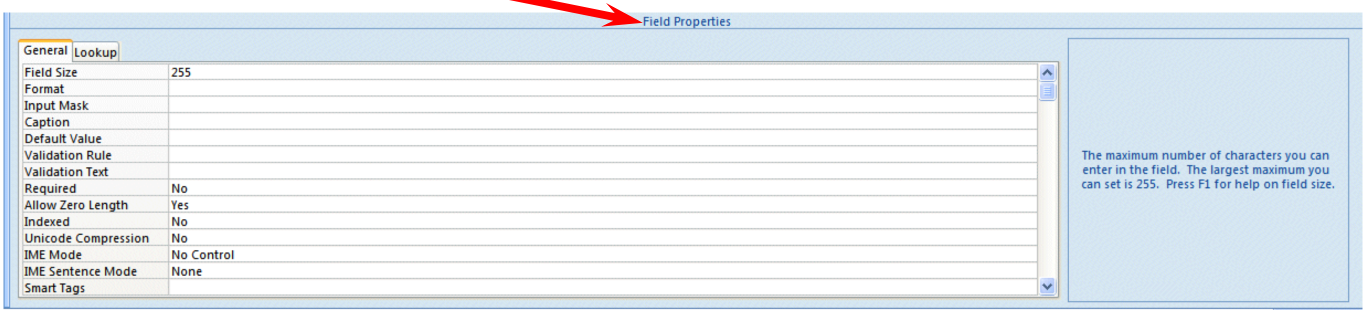
Yes/No This is a "True/False" or "Yes/No" type of field.

OLE Object This means "Object Link Embedding" which indicates you can insert a graphic, picture, sound, etc. Pretty neat to put a photograph in a personnel record or a picture of an inventory item in the stock record (advanced stuff).

Since this is a simple, introductory Access tutorial, we won't work with Hyperlinks, Attachments, or Lookup Wizards.

We'll leave **Last Name** as a **Text** Data Type. To the right under **Description** you may make any remarks you feel are appropriate to someone who may want to know how/why you designed the field as you did.

Now **notice** in the **lower** part of the screen, under **Field Properties,** that a **box appeared** when you **selected** the **Text Data Type**. This box is "**tailored**" **to** the **Text** Data Type that you selected above. Your **Field Properties should look like the one below** when you **finish** doing the **steps** indicated **below**.



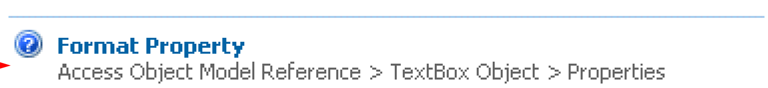
Field Properties

Click-in each area (to the right of the words) as you read about it below

Field Size Is **currently set** to **255** characters. That's pretty large for a name. So, **click-in** this **area** and **change** the number to **25** (you can make this larger or smaller later if you have to).

Format Now **click**-in the **Format Area**. Next **tap** the **F1 function key** to activate **Help**.

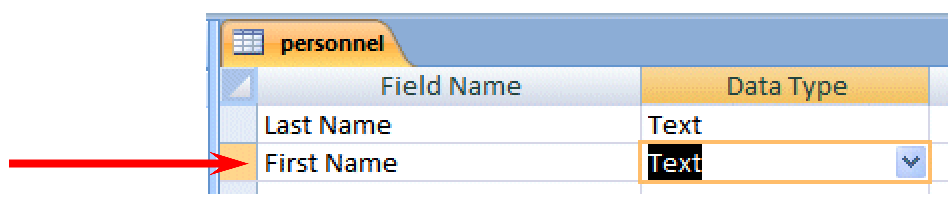
Since you are in the **Format** area, **Help** will be "**tailored to**" this area. When the **Help Window appears**, **click Format Property**.



Now **click Text and Memo Data Types**. Notice that there are several choices to make your characters upper or lower case. This gives you an idea of some formats. We'll use one later. Now **click**-on the "**X**" in the **upper right corner** of the **Microsoft Access Help – Format Property** Window to **close** it.

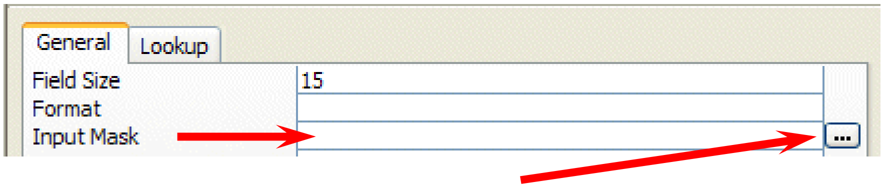
Input Mask	We'll come back to this feature later.
Caption	Look at the Light Blue Help area to the right. It explains about Caption.
Default Value	We'll come back to this feature later.
Validation Rule	We'll come back to this feature later.
Validation Text	We'll come back to this feature later.
Required	Look at the Light Blue Help area to the right.
Allow Zero Length	Look at the Light Blue Help area to the right.
Indexed	Look at the Light Blue Help area to the right.
Unicode Compression	Look at the Light Blue Help area to the right.
IME Mode	Look at the Light Blue Help area to the right.
IME Sentence Mode	Look at the Light Blue Help area to the right.
Smart Tags	Look at the Light Blue Help area to the right.

Now we'll **repeat** this **process** and **create different Field Names** and **Data Types**. **Type-in** the **Field Names** as indicated **below** and **set them** to the **Data Types** and **Sizes indicated**. Start each new Field Name and Data Type - below the previous field (see example below)



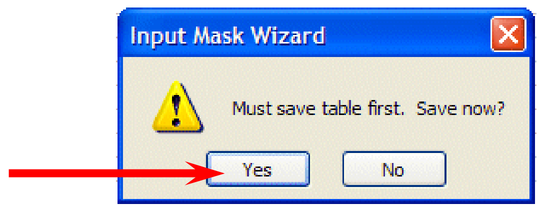
Field Name	**Data Type**	**Size**	
Last name	**Text**	**25**	**(Already Completed)**
First name	**Text**	**20**	
Social Security #	**Text**	**15**	

We'll use an **Input Mask** for our **Social Security Number**. **Click-in** the **Input Mask area** in the **Field Properties** area at the **bottom** of the **screen** (see **left arrow below**).



Notice the **three "dots" (...)** in a box on the **right**. **Click**-on the **three** dots (see **right arrow above**). An **Input Mask Wizard** will appear: "**Must Save Table First**. **Save Now?**".

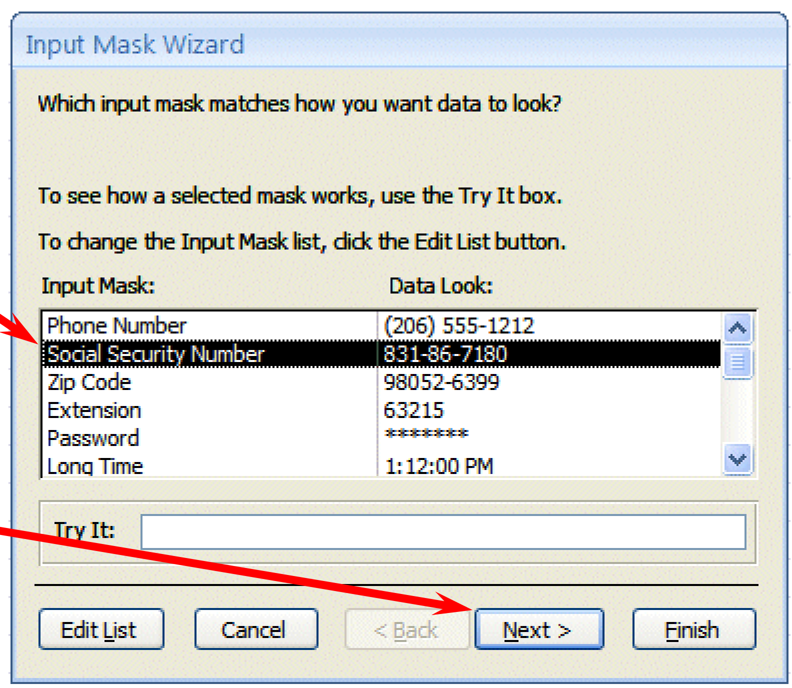
Click-on **Yes**.

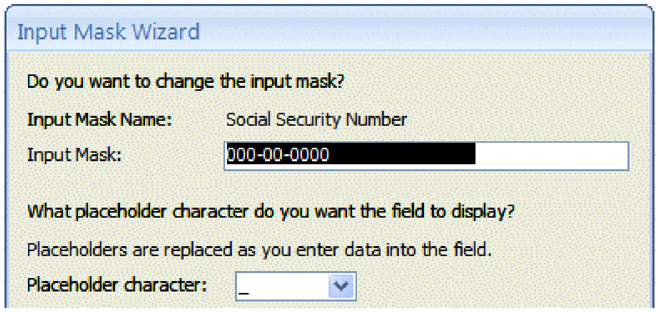


A **Save As** Window **may** now appear. If it does, **type-in Personnel** in the area under **Table Name**:, and **click**-on **OK**.

The **Input Mask Wizard** will **show** you some **Sample Masks** (you may scroll up/down to view them). We'll use **Social Security Number**, so **click-on it**. Your **screen** should **look like** the one **below**.

Now **click**-on **Next** at the **bottom** of the **Input Mask Wizard screen**.
You will now **see** a **default number** of **000-00-0000** using **dashes (-) between the numbers**. You can use anything you want.

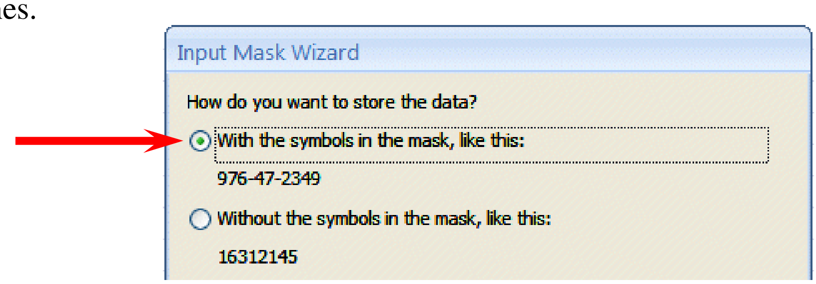




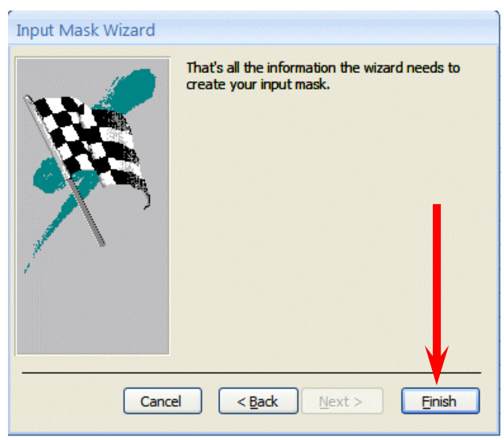
We'll leave it as is, so **click**-on **Next> again** (at the bottom of the Input Mask Wizard screen).

On this Input Mask Wizard screen you'll **see two choices**. **Click-in** the **little circle** to the **left** of **With symbols in the mask, like this**:. Sometimes, when we use Access data as a part of mail merges or in labels, if we don't save the dashes, they won't appear in our document. So, it always a good idea to save dashes.

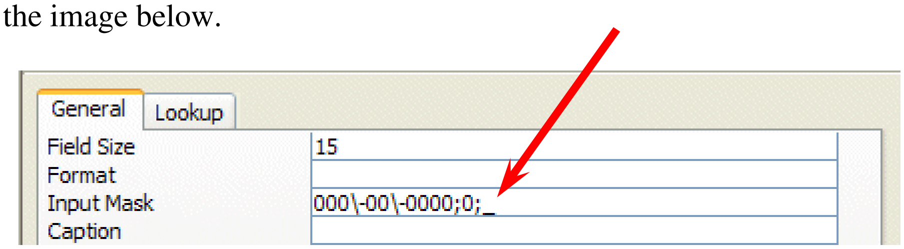
Click-on **Next> again**.



Now **click**-on **Finish**.



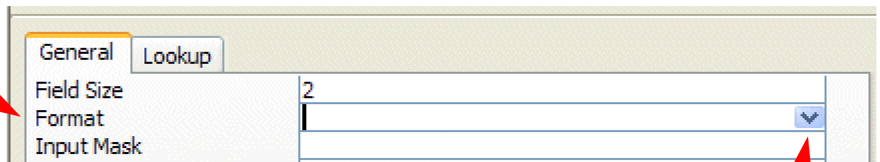
You will **see** some "**special**" numbers **written** in the **Input Mask area** for **Social Security #**. When you begin to enter data in this field, you'll see how this works. Your Field Properties area should look like the image below.



Now continue entering the following information in the Field Name and Data Type areas as we did above.

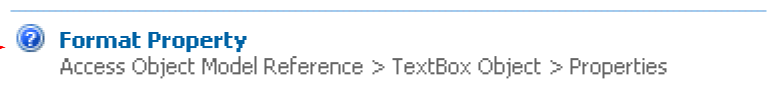
Street address	**Text**	**25**
City	**Text**	**20**
State	**Text**	**2**

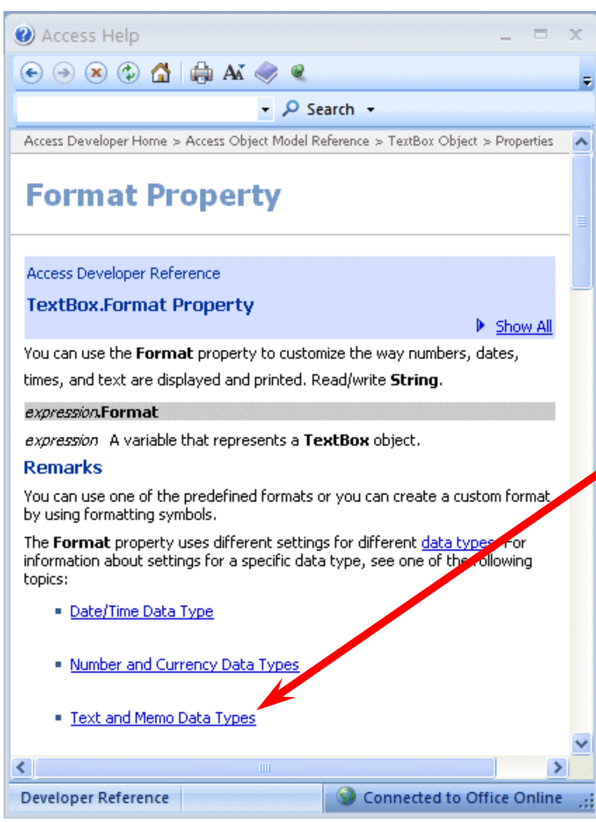
Here we'll use a **Format**. First make the Field Size **2** then click-in the area to the **right of Format**.



A **down pointing arrow**, **like** the one **above** (**see arrow),** will **appear** on the **right** side of the **Format area**. If you **click**-on the arrow, the area will appear blank (that's because we haven't entered a Format). **Tap** the **F1 key** in the row of **Function Keys** at the **top** of the **keyboard.** A **Help menu screen "tailored"** to **Format** will **appear**)like the one **below).**

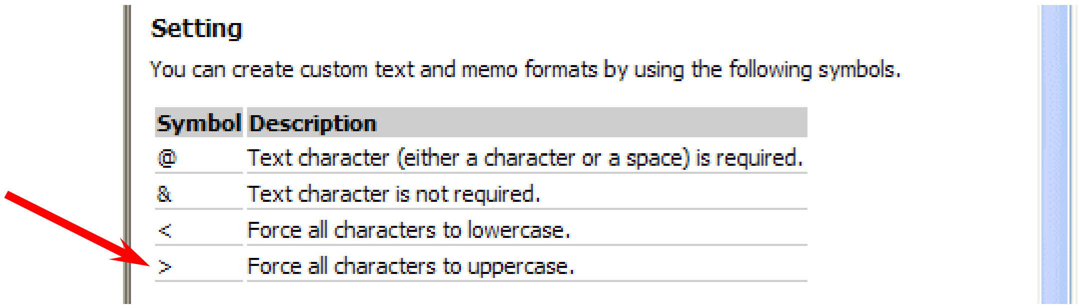
Since you are in the **Format** area, **Help** will be "**tailored to**" this area. When the **Help Window appears**, **click Format Property**.





Since we are **working with** a **Text Data Type**, **click**-on **Text and Memo Data Types** (see **arrow below**).

Notice that a **>** will change **<u>any alphabetic character</u>** you type into **all upper case letters**. Now **point** and **click** the "**X**" in the **upper right hand corner of the Format Help Screen** (notice that the Help Window closes "automatically").

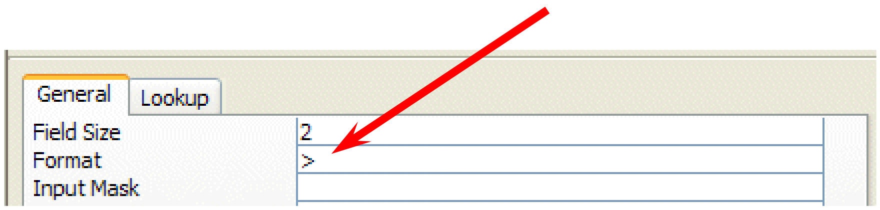


Setting

You can create custom text and memo formats by using the following symbols.

Symbol	Description
@	Text character (either a character or a space) is required.
&	Text character is not required.
<	Force all characters to lowercase.
>	Force all characters to uppercase.

Now **type** a **>** in the **Format** area. Your **Field Properties** area should **look like** the one **below**.



Continue entering the following information in the Field Name and Data Type areas as we did above.

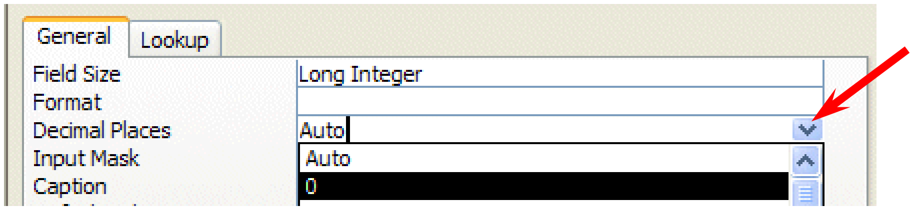
Zip	**Text**	**5**
Gender	**Text**	**1**

Insert a > in the **Format** area to make **all gender** entries become **upper case (capitals -** like you just did for **State**).

Favorite Number **Number** (Note: this is the first Number field)

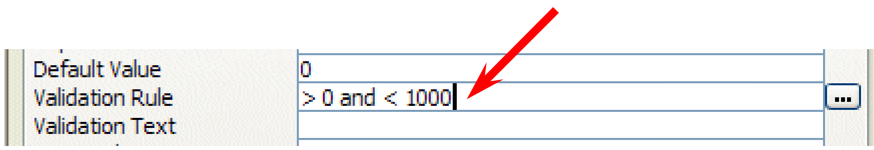
Here we'll learn about **Numbers,** the **Validation Rule** and **Validation Text**. We'll limit the person's favorite number to a number between **1 and 999**. Leave the **Field Size** set to **Long Integer**.

Now **click**-in the **area** to the **right** of **Decimal Places**. It currently indicates **Auto**. When you click, you will see a little **down arrow** on the **right** side of the area. **Click**-on the little **arrow**. Select "**0**." This indicates that decimal places are not allowed in the Favorite Number.



Next, **click**-in the **Validation Rule** area. We'll "**build**" a **mathematical expression** that will **only allow numbers from 1 to 999. Type** in the **following expression** (in the area to the right of Validation Rule):

> 0 and < 1000

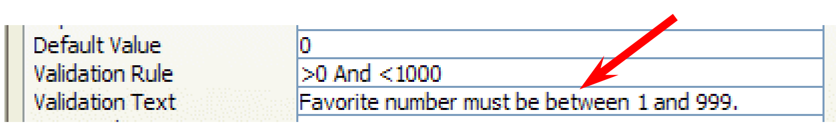


This tells Access that the number entered must be between 1 and 999.

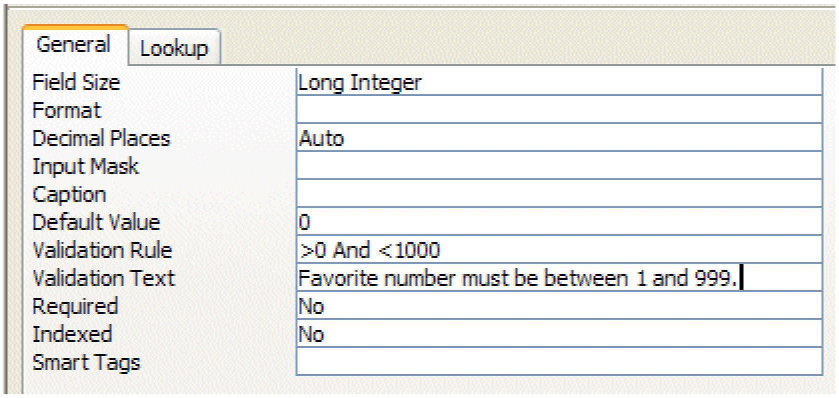
You'll **notice** that when you **click**-in the **Validation Rule area** that **three periods (…) appear** just like they did in Input Mask. If you want to click-on the three periods they will bring up an Expression Builder which you can use to create the mathematical formula above. **Please note** that frequently, if you are really not great at math, the **Expression Builder can cause problems**. Sometimes, the Expression Builder will "insert" an **<<expr>>** in the formula. If it does this, delete the **<<expr>>**. This will confuse Access, and will frequently cause the program to "stop" until you remove **<<expr>>.** So, if you want to look at Expression Builder, please do so. But – be careful.

If someone **<u>does not</u>** enter a **number correctly**, an error message will appear. Now **we'll create** an appropriate **error message**. **Click**-in the **Validation Text** area and **type-in**:

Favorite Number must be between 1 and 999.



When you finish all of the above, your Field Properties should look like the one below.

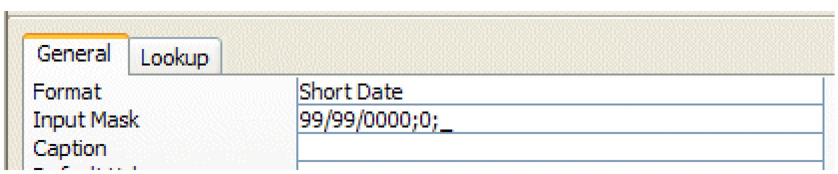


Continue entering the following information in the Field Name and Data Type areas as we did above.

Date hired Date/Time

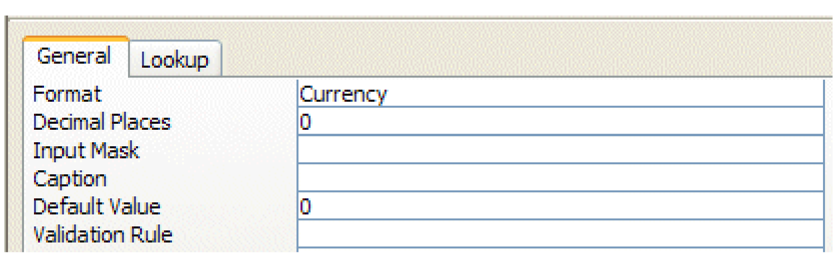
In **Format area click** the **small down arrow** on the **right side** of the Format area and choose **Short Date**. In the **Input Mask** area **click** the **three dots (...)**, **Save the table**, and choose **Short Date** again, **click Next>**, **click Next> again**, then **click Finish**. (This will insert a **/** between the day, month, year).

Your Field Properties should look like the image below.



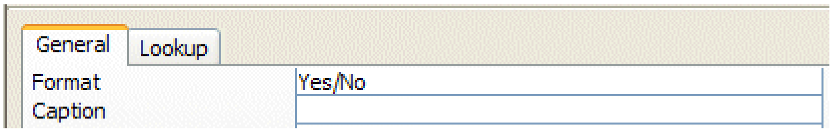
Salary Currency

In the **Decimal Places** Field Properties area **click**-on the **small down arrow** on the **right side** and select **0** – this indicates "no cents." Type a **0 (zero)** in the area to the **right** of **Default Value.** This will indicate **0** income if no Salary figure is entered. Your Field Properties screen should look like the image below.



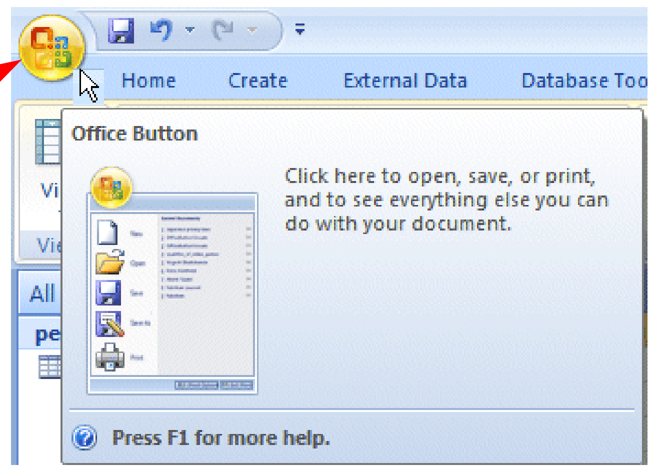
Application Received Yes/No

We'll make this a "**Yes/No**" or "check box" field. When we begin entering data in the database, you'll see how this "box" works.



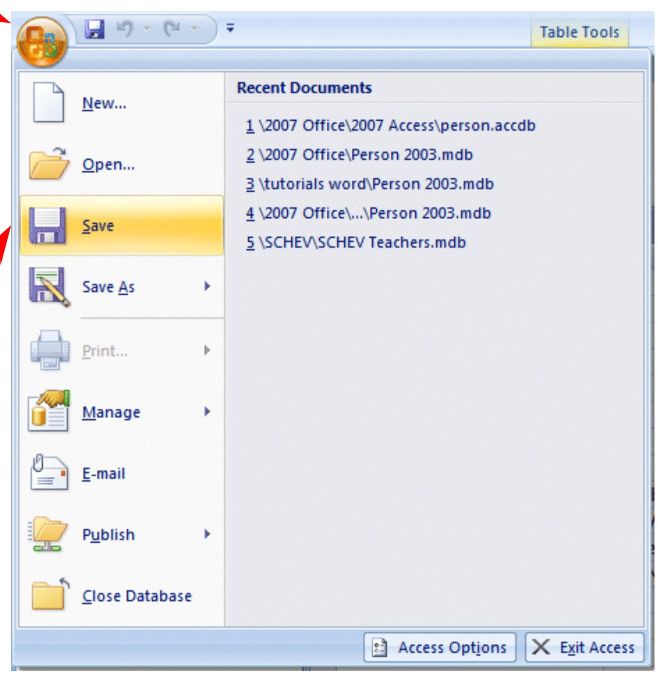
Now that we have created our Person Database and Personnel Table it would be a **good time to Save the last few changes**.

Microsoft Office Button



The **Microsoft Office Button** has **replaced File** in the Menu Bar. In the **upper left corner** of your Access 2007 screen you will **see** a button similar to the **image** on the **right**. This is the **Microsoft Office Button**.

Click the **Microsoft Office Button**.



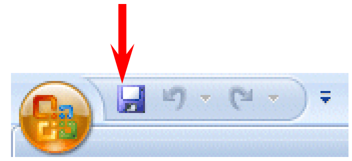
You will now see the Access 2007 Microsoft Office Button selections.

First, **notice** that **many of the "old" File-Menu Bar choices** are **included in this menu** (they are all here – we'll show you).

Since we **Saved** our **database** at the **beginning** of the tutorial, we only have to **click** the **Save** choice.

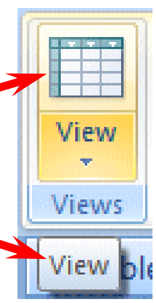
Quick Access Toolbar

You could **also click** the **small diskette** in the **Quick Access Toolbar** in the upper left corner of your Access screen.

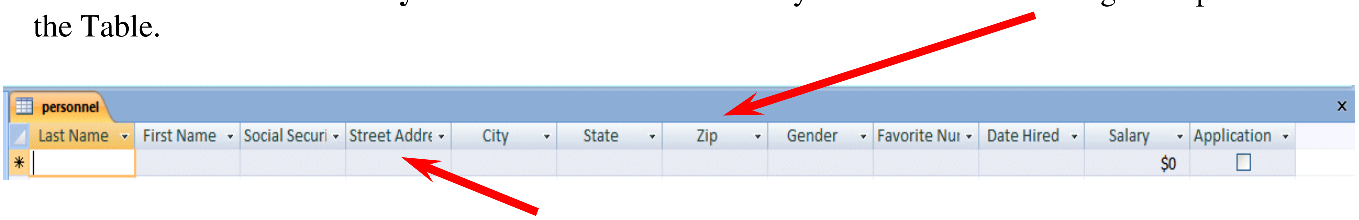


Entering data in the database

At this point **you will still be in the Design view**. To enter data into your Table you will need to be in a Datasheet View. In the upper left corner of your screen (under the Home Tab) you will see that the **first button on the left that has a small sheet of paper** (see **arrow** on the **right**) – the **View** button. **Point** to this **button** with the mouse and **pause**, you will see a "**Tool Tip**" that **indicates** that this **button is** the **View Button**. This is logical because you have been designing your table and now want to view the data that you will enter in your Table (database). If you are familiar with spreadsheets it looks like a tiny version spreadsheet. **Click** the **View** button.



When you **click** the **View** button, the top of your Access screen will look like the image below. Notice that **all of the Fields you created** are – in the order you created them – along the top of the Table.



Some of the **Field Names** may be "**cut off**" a bit. We'll widen our fields in a moment.

You can **enter data in each Field**. But let's widen some of our columns a bit so we can see the titles.

Widening Columns in Datasheet View

To **widen columns** so you can **see** the **Field Names** in the Datasheet View you will need to **move your cursor over the "line" between two Field Names** (like we did in the **image above**). When our **cursor was over the line between** Street Address and City, it turned to a **line with two arrows pointing left and right**. When you **see this line** with the arrows, **click** and **hold down the left mouse button** and **move your cursor to the right a bit**. You will see the **column** get **larger** as you move your cursor. When you have the column as wide as you desire, **take your finger off the mouse button**. You may desire to widen other columns so you can see all of your data – like First Name, Last Name, Street Address, etc. You widen as you desire.

One note – since we have a **Validation Rule** in one of our Fields, **if we try to widen a column we will get the Validation Rule error message. So, it's best to only widen columns when you are not entering data.**

Entering Data

Under **Last Name** you will **see** a **flashing cursor**; this means **that you are ready to begin entering data**. You may **type the data** and **tap Enter,** or **click with the mouse in each field**. If you make a mistake you may **retype** the data. If you see a mistake later you can come back at any time and correct it.

Under each field, **type the following in the area below the Field Name**:

Field Name	To be typed
1. Last Name	**Smith**
2. First Name	**Fred**
3. Social Security #	**123-45-6789**
4. Street address	**100 Main Street**
5. City	**Lynchburg**
6. State	**va**
7. Zip	**24501**
8. Gender	**m** or **f** (your choice)
9. Favorite Number	**2007**
10. Date Hired	**07/01/1993**
11. Salary	**40000**
12. Application Received	**Point** the mouse to the **little square** and **click** the **left** mouse button. You will **see** a **check mark** appear in the square. A click in the square indicates that the application has been received. If you do not click, then that will mean the application has not been received.

As you are entering this data you will **notice** several things.

Social Security Number and **Date Hired** – You'll "**see**" your **Input Mask work**.

State and **Gender** – you typed in small letters – **notice** how the **Format** (**>**) **forced** the **letter(s)** to be **capitals**.

Favorite Number – since the **Favorite Number** is "**too big**" you **will** see your **error message** appear. **Click**-on **OK** in the message screen and then **create** a Favorite number that **will work**.

Salary - notice how your **Currency** formatting created a **$**, **commas** and **periods**.

When you have **completed typing** the information, tap **Enter** so the cursor will move down to the next record. You are now ready to insert your second entry.
Note: When you tapped Enter, Access **automatically saved** your first record. This can be confirmed by the display of the hourglass.

Also note: As you began typing your first record a small pencil appeared in the left margin. This indicates that you are "writing to" this record (editing). Below the pencil an * (asterisk) also appeared. This indicates that your next record will go below the first.

There are (**2**) **methods** for **entering data into the database**:

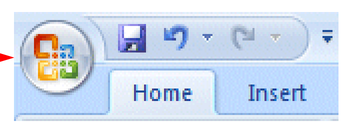
1. The method you just used is called **Datasheet View** method.

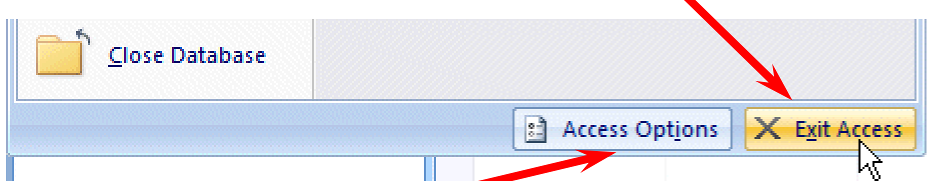
   or

2. You can use the **Form View** method (we'll create a Form in a bit later in the tutorial).

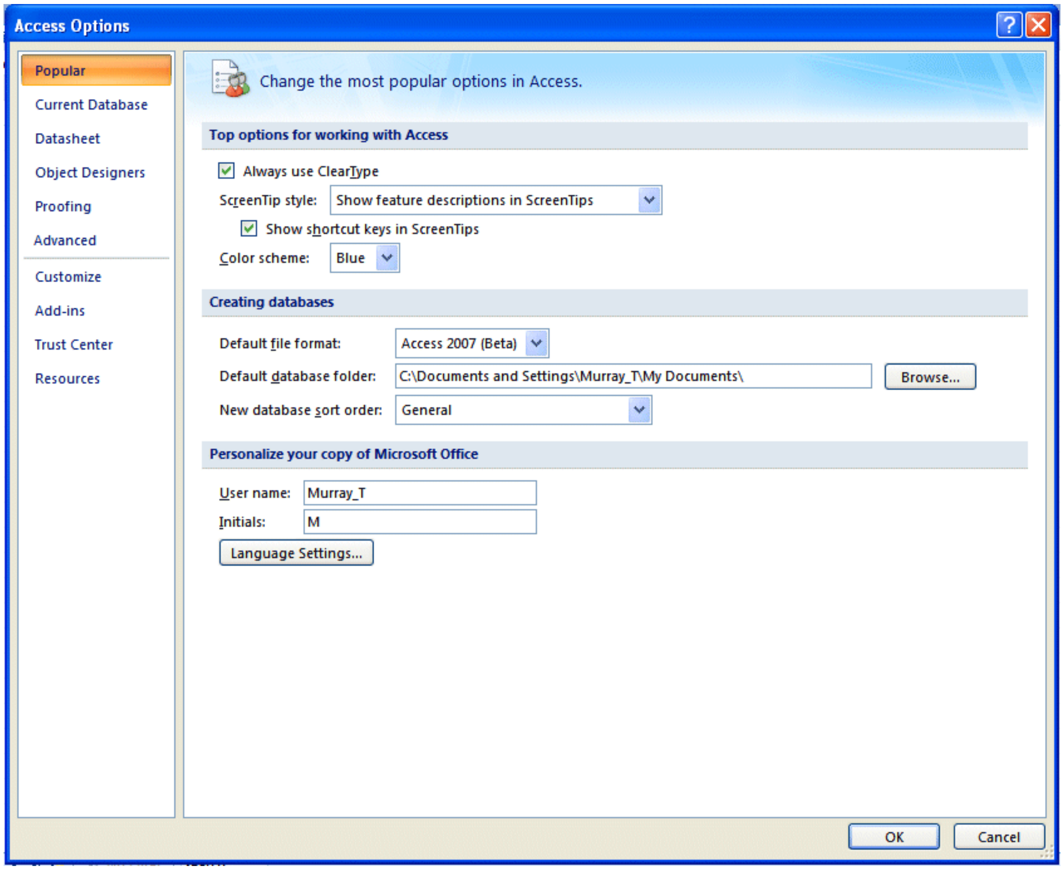
Exiting and Saving

Anytime you need to leave your database, **click** the **Microsoft Office Button** in the **upper left corner** of your **Access screen,** then **click Exit Access –** in the **lower right corner** of the **menu screen**. If you **have not saved** your spreadsheet, a reminder box will appear **asking you to do so**.



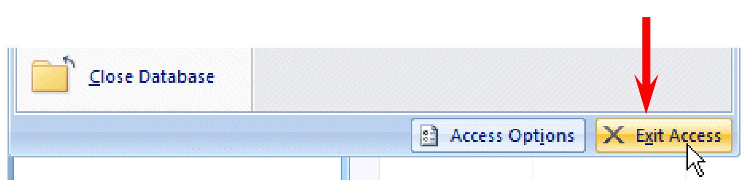


Notice the **Access Options button** to the **left** of **Exit Access**. Earlier, we indicated that all of the choices under File in the Menu Bar are still available using the Microsoft Office Button. **Click** the **Access Options button.** The **Access Options menu screen (top of next page)** will **appear**. As you can see, all of the choices available under File in the menu bar are here – as well as many more.



If you **click** the **Resources** selection in the Access Options menu, you will see some great on-line resources available to assist you with Access.

After you have reviewed the Access Microsoft Office button choices, **click** the **Exit Access button.**



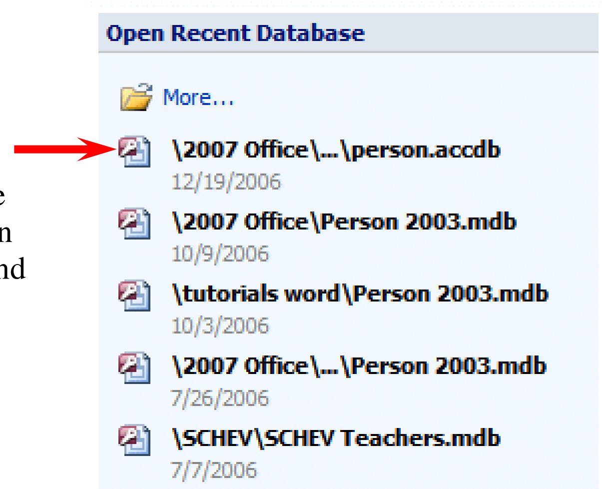
If Access asks: "**Do you want to save?**," **click**. If Access shows you a **Save file screen**, give it a name of your choice and **click** on **OK**. You should then exit to the Windows Screen with no problems.

Since you have already named everything for this exercise, you should not have to name any files as you exit.

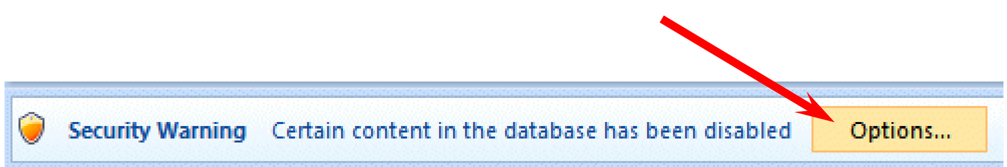
Opening Access Database - again

If you decide to Exit Access 2007, and then return to continue the tutorial, refer to the instructions at the beginning of this tutorial (Page 1) to open Access again.

A **neat thing** about Access 2007 is the **Open Recent Database area on the right side of the screen**. Once you have created a database, you will **see** your **database** in the **Open** portion of the area (see **arrow** and **image** to the **right**). You can simply **click**-on the **file**, in this tutorial **Person**, and it will open.

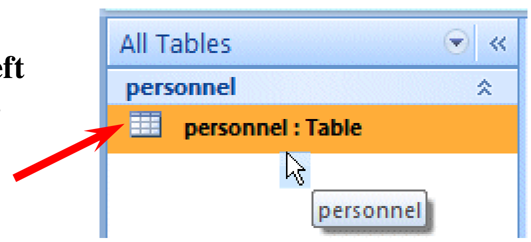


When Access 2007 opens, you will see that the bottom portion of your screen is blue and that the below message appears above the blue area. Access has long been a source for worms and viruses when e-mailed to other people, so Access 2007 has this additional feature to protect you. **Click** the **Options** button to the right of the Security Warning.



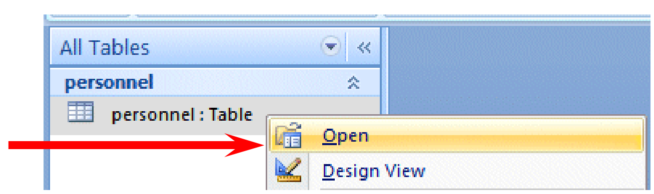
When you **Click** the **Options** button to the right of the Security Warning, the Microsoft Office Security Options menu screen will appear. Take a few minutes to read this information. If you receive an Access database from someone who you do not know, you can use the features in this screen to assist in protecting you. Since you are opening your own database, click the small circle to the left of Enable this content (see arrow below). Then click the OK button.

When you **click** the **OK** button you will **see**, on the **left** side of your screen, that your **Personnel:Table turns orange**. This **means that it is OK** and that you now can open it again to enter more data. You have **two choices** to open your Table.



1. You can **move** your **cursor over** the **orange area** and **click the LEFT mouse button twice quickly** – and your Table will open in the Datasheet View.

2. You can **move** your **cursor over** the **orange area** and **click the RIGHT mouse button.** You will see a **drop down menu** appear. You can **click** on **Open**



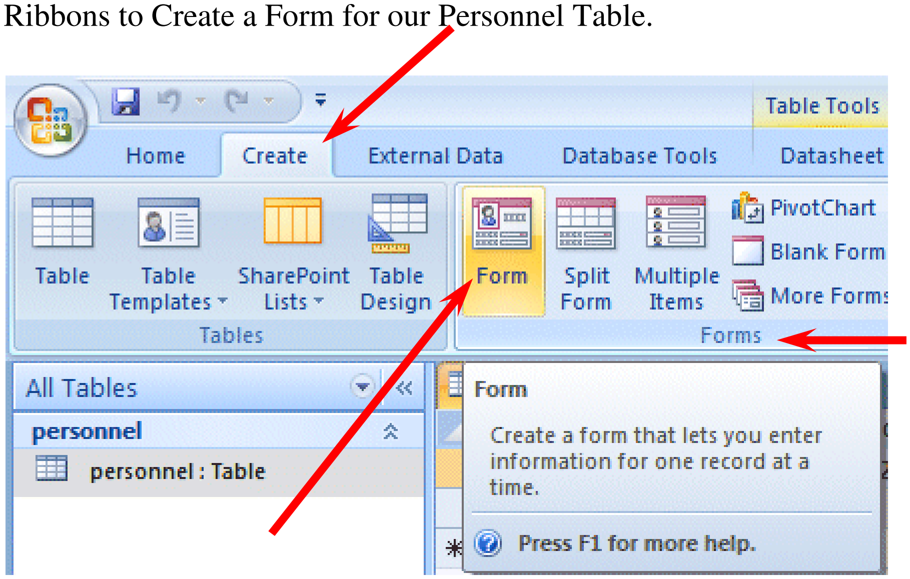
You are now ready to **continue entering** the **data** in the **Datasheet View**.

Form View and Datasheet View

As indicated previously, you have a choice to enter your data. You can use the Datasheet View, like we have done so far, or you can use a Form. Both methods work well.

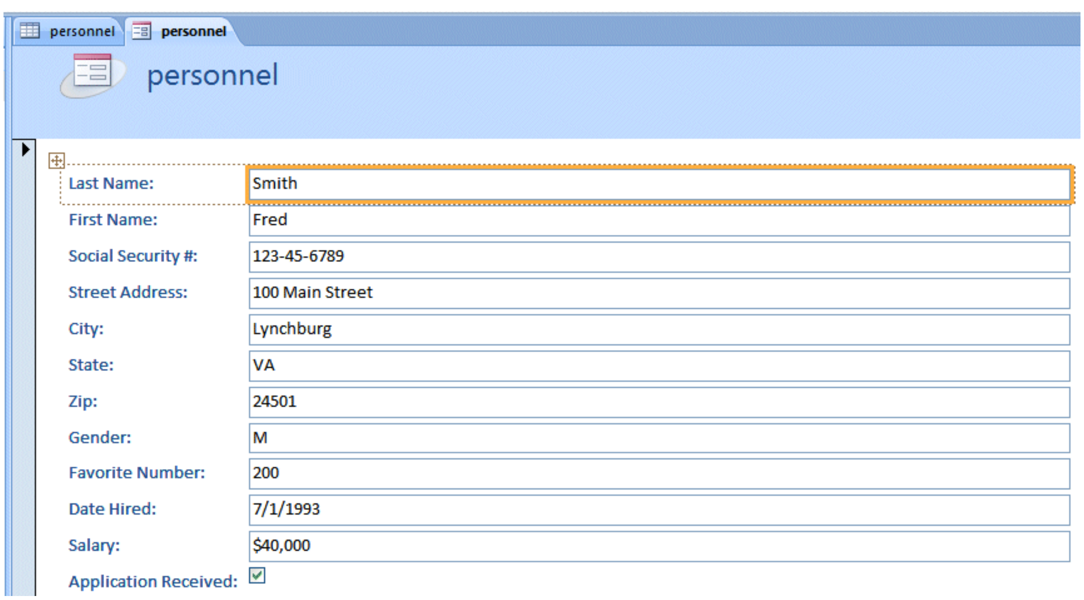
Creating a Form in Access 2007 is **really different than in previous versions** of Access. We'll now use the new Tabs and Ribbons to Create a Form for our Personnel Table.

First, **look at the top** of your **Access screen** and **click** the **Create Tab** (we want to Create a Form). Look in the **Create Ribbon** in the **forms Group** and you'll see the Form button. **Click** the **Form button**.

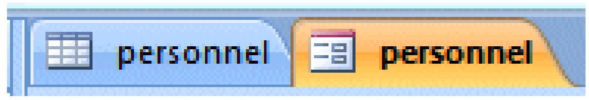


You'll see your **screen change significantly** in many ways. The first thing you'll notice is that Access 2007 – **knowing you were entering data from the Personnel Table – created a Form with all of the Fields in your Table!** You're all ready to enter data in this form.

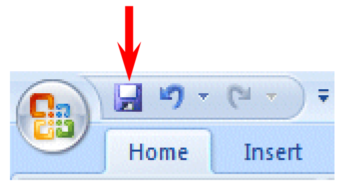
Your **Personnel Form** should **look** something like the image **below**.



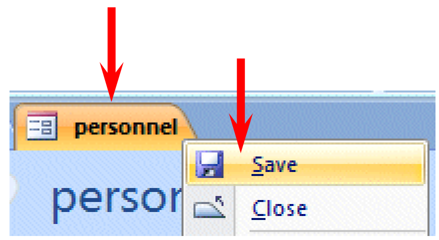
Another **new feature** of Access 2007 is the **Tab layout** for what you're working with. Look just **above** the **Form** and you will **see two Tabs**. **Notice the small image on the left of each Tab**. The **left Tab** is your Personnel **Datasheet** and the **right Tab** is your Personnel **Form**. You can **click** on **whichever Tab** you want to enter Data in your Table.



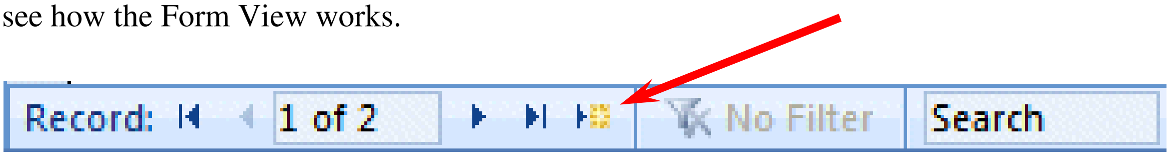
You may **enter data** in **Form View** the **same** as in **Datasheet View**. To **Save** your new **Form** you can **click** on the **Small Save Diskette** in the **Quick Access Toolbar**. Since your **form** will be a **part of your Person Database**, it will **automatically save** as the **Tab Name**.



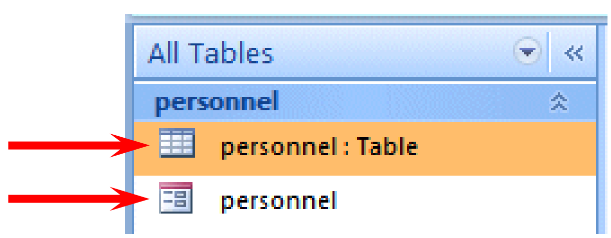
Or, you can **move your cursor over the Personnel Form Tab** and **click** the **RIGHT mouse button**. When the drop down menu appears, **click** the **Save** selection.



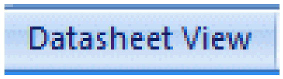
The data entry **form** is now saved as **Personnel**, just like the Table. Notice, at the **bottom** of the **Form screen**, that there is **a status area (see below)** that tells you what record you are on. You can use the arrows to "move" from one record to another, or select a new record in which to enter data. Click-on each of the arrows to see how they work. Some will take you forward or back to the next or previous record, and some will take you to the beginning or end of your records. The **arrow with an asterisk** will take you to a **new blank record**. Enter a few records to see how the Form View works.



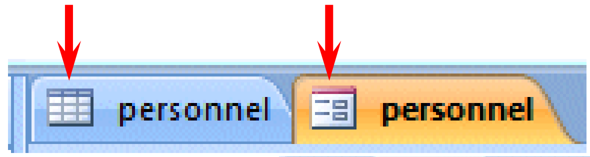
When you **first "open"** your **Person Database**, you may **choose your favorite** method to enter data: The data **Form** or **Datasheet**. **Look** on the **left side** of your screen and you will see **All Tables**. Under All Tables, you will see your **Personnel Table** with **two selections** below it: **Personnel: Table** and **Personnel. Notice** the **image on the left of each selection** (like at the bottom of Page 23). You can **switch back and forth** from the **Datasheet entry** to the **Form entry** by **clicking** on **your choice** (as outlined on Page 22).

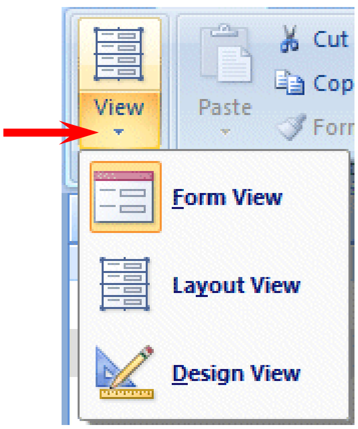


At the **lower left corner of the menu screen**, you will **see some text that indicates that you are either using Form or Datasheet View to enter your data**.

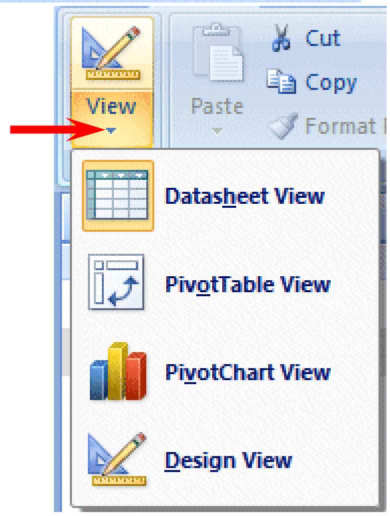


When you have opened your Datasheet View and Form View you can switch back and forth by clicking on the Tabs.





The **View buttons** on the **upper left indicate** what "**view**" you are using: **Design View, Form View,** or **Datasheet View**. You can **move back-and-forth between views** by **clicking**-on the **down triangle** (**see arrows and images**) and then choose the View you desire.



Note: When you are finished entering data and preparing to exit Microsoft Access, or Close the form, if you did not save before exiting, the program will ask if you want to **Save** the **Form**. This is up to you. You may save it with your choice of names and it will then show-up as a form when the Person Database Main Window appears. Or, you can indicate No, and re-create the form again with the Wizard.

Important

To record enough information so that you can see the power of Access database does enter 24 or more records now. You may use either **Form View** or **Datasheet View**.

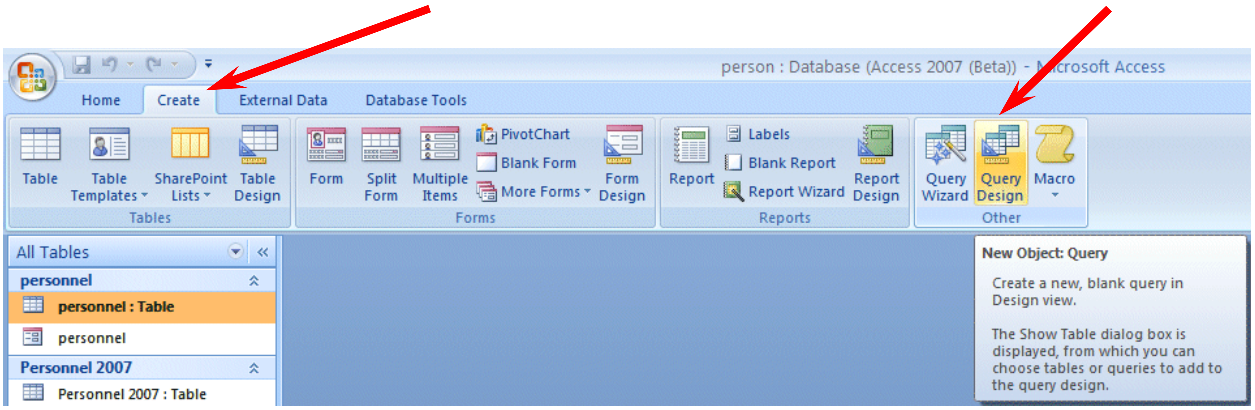
Querying the Database

This is what a database is designed for: finding specific information about some of the **data** in the **table**(s) **very quickly**. A query is a **search for general** or **specific data in a field** or **fields** in your database (e.g. the first and last names and birth dates of all employees, just the Jones's, the people from CA, salaries > $10,000, etc.). In order to do this, we need to **click on the fields we want to query**. So, let's start by **finding just Last Names** in our **table**.

If you **are not in** the **Database: PERSON screen** which **shows** the **Tables, Queries, etc**., go there by **following the instructions on Pages 21-24 .**

If you have the Personnel Datasheet or **Personnel Form** **open** (to add data), **close them** before you begin your queries. The **Access** program sometimes becomes logically **confused** when you try to do queries when it "thinks" you also want to add data. You may see "error" messages if you leave the Form or Datasheet open.

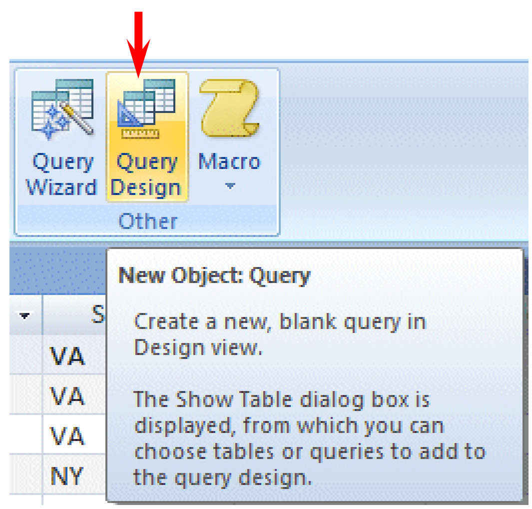
You can **RIGHT click** on the **Datasheet** and **Form Tabs** and then **select Close** – if you have them open. Your Access screen should look similar to the image below.



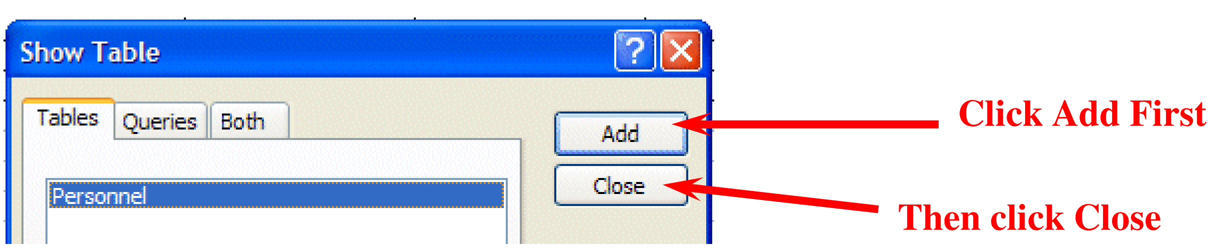
Click the **Create Tab** at the **top** of the Access screen (**left arrow above**). Then **move** your **cursor over** the **Query Design Button** in the **Create Tab/Ribbon (right arrow above).**

When you move your cursor over Query Design in the Other Group you will see an **image** similar to the one on the **right**.

Click the **Query Design button**.

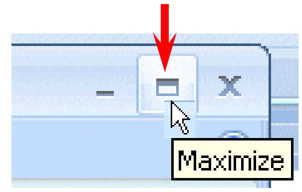


Two new windows will appear: **Query 1: Tab** and **Show Table**. You will **first** have to **select the table(s) you desire to query**. The **Show Table screen** should **look like** the one **below**.

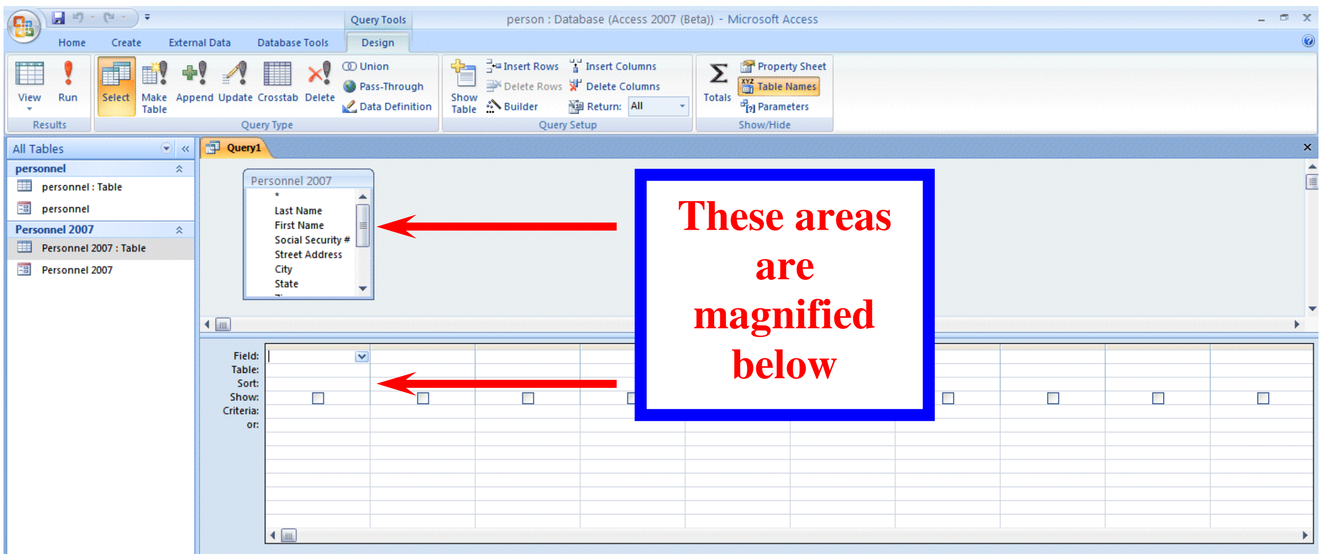


The **Show Table** window will disappear, and the **Query 1: Query** window, will **appear**.

Click-on the **expansion square** in the **upper right corner** to **enlarge the Query 1: Select Query** window.

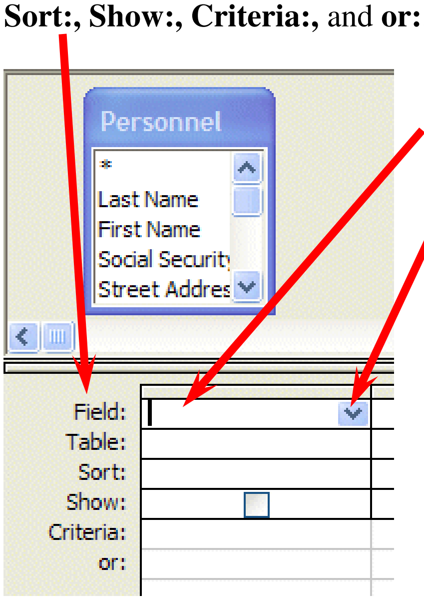


Your screen should now look similar to the one below.



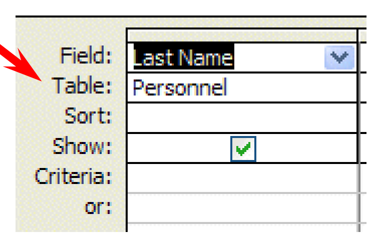
Notice, in the **upper half of the window,** a **small box** on the left indicates: **Personnel**. At the top is an **asterisk (*)** and **below**, in an **elevator** box, are the **fields** from the **Personnel Table** (you can move up-and-down the list as you desire).

What we need to do next is place the **Fields we want to query** in the **lower area** of the screen. **Notice** the **lower area on the left border**. The first row indicates **Field:,** followed by **Table, Sort:, Show:, Criteria:,** and **or:**.

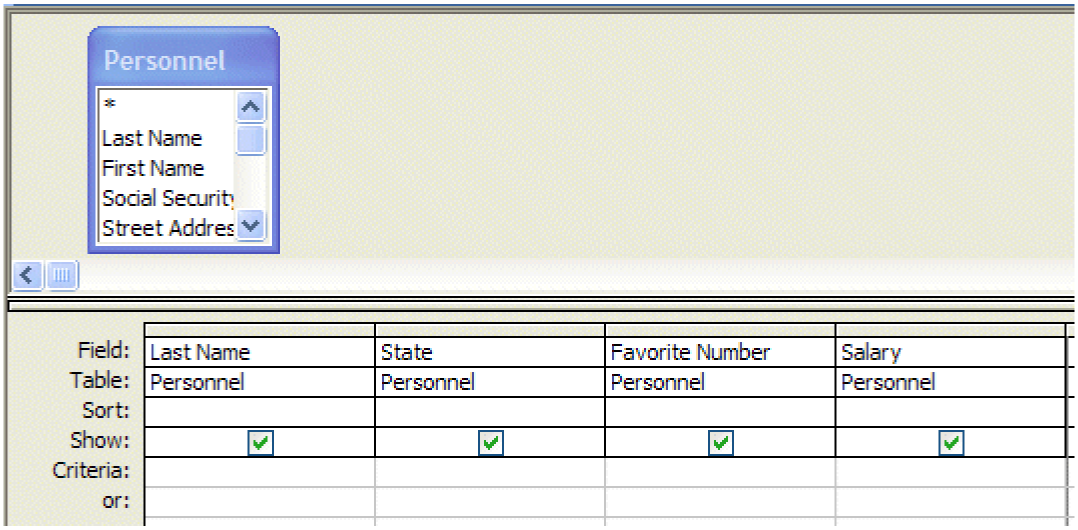


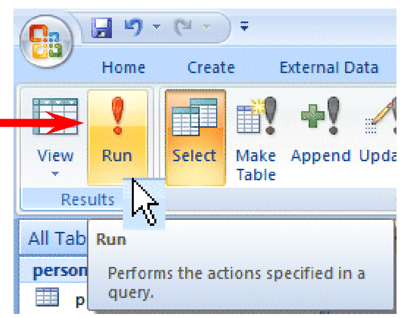
In the lower half of the screen **click-in** the **first cell to the right of Field:**. We'll start with a query on **Last Name, State, Favorite Number** and **Salary**. Now **click**-on the **down arrow** and then **click-on Last Name**. **Notice** how **Last Name** now **appears** to the **right** of **Field**: and a ✔ (**check**) is **seen** in the **Show**: cell (The ✔ **means** that you will **see Last Names** in your query.). **Notice,** also, to the **right** of **Table**:, that **Personnel** (the Table from which we queried) is showing.

Your **query screen** should now **look like** the **one on the right**.

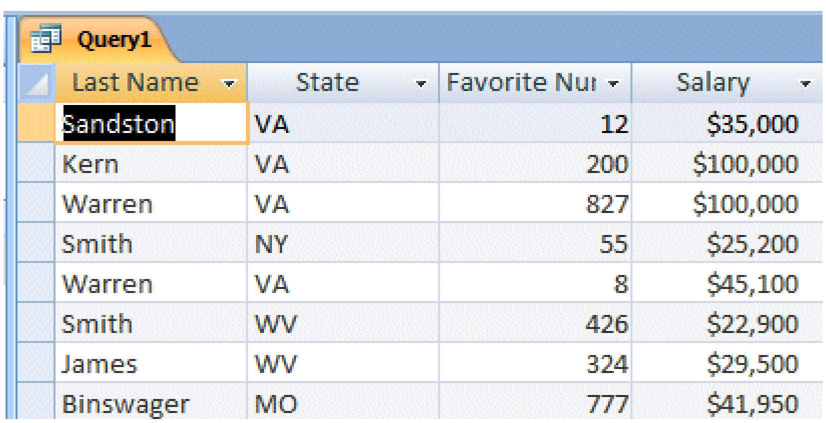


Now **move** to the **next Field cell on the right** and, using the **down arrow click**-on **State**. In the **next two fields to the right**, insert **Favorite Number** and **Salary**. Your Query1: Select Query screen should look like this:





Now, **look** in the **Button Bar** at the **top left** of the **screen**. In the **middle** of the bar you will **see** an **exclamation mark** (!) like the one on the **right**. If you move the cursor over it, the help text box will indicate "**Run**." **Click-on the** (!). This **click executes your query**.


Query1

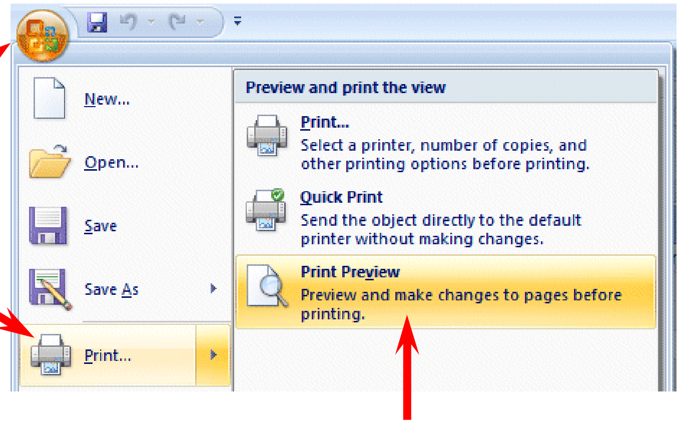
Last Name	State	Favorite Nu	Salary
Sandston	VA	12	$35,000
Kern	VA	200	$100,000
Warren	VA	827	$100,000
Smith	NY	55	$25,200
Warren	VA	8	$45,100
Smith	WV	426	$22,900
James	WV	324	$29,500
Binswager	MO	777	$41,950

Your query screen should look similar to the one on the left.

Notice, the screen **ONLY** shows the **four fields** that you queried.

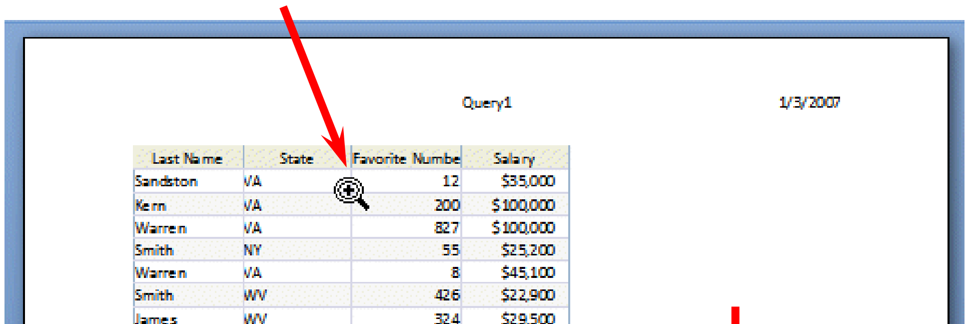
You can **add** or **remove fields,** as you desire. To do this we need to **return** to the **Design View** where we created this query. To **return** to **Design View click**-on the **small button** in the **upper left corner** of the **screen** that has the **blue triangle, pencil, and ruler** (like the **one** on the **right**). Then, simply **click**-in the **Field area** and **select a new field** and it will **replace** the old one. Or, click-on the **field you want to remove** and **tap** the **Delete key**. Sometimes you may have a lot of fields and it will be too large for a single sheet of paper.

To **see** how your **query will look,** if you **print** it, we'll show you **how to open** a **Print Preview**

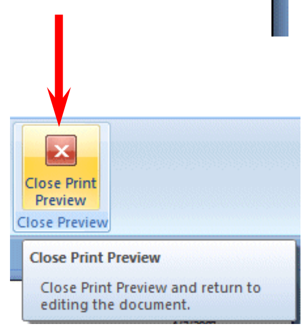


First, **click** the **Microsoft Office Button** on the **upper left** of your Access Screen. Then **move** your **cursor** over the **Print selection**. A **Preview and print the view** area will **appear** on the right. **Move** your **cursor over Print Preview** and **click** on this selection.

While you're in the Print Preview you'll see a little magnifying glass that you can move over your query. If you **click** the **left mouse button once** the magnifying glass will **"zoom" in** and **enlarge** the view. If you **click** the left mouse button **again** it will **zoom out**.



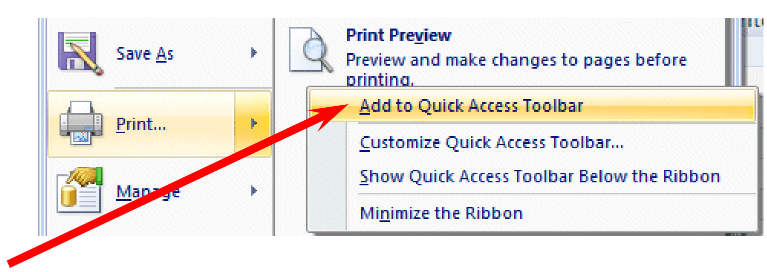
To **return** to your query, **click-on** the **Close Print Preview button on the right side of the Print Preview Tab/Ribbon.** This will take you back to the Normal **View** of your query.



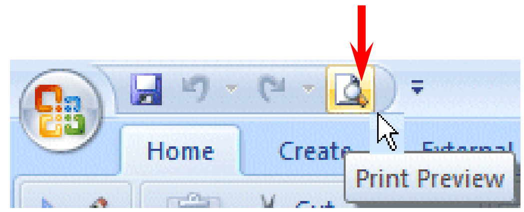
Adding a Print Preview Button to the Quick Access Toolbar.

It took a lot of "clicks" to get to Print Preview. So, let's **add** the **Print Preview button** to our **Quick Access Toolbar** at the top of the screen. Then all we'll have to do is click this button for a Print Preview!

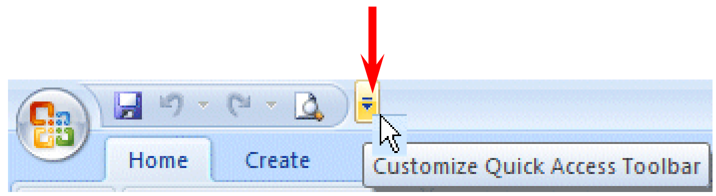
Repeat the **steps at the top of this page** to "get to" the **Print Preview** selection. When you "see" the Print Preview selection – **click** the **RIGHT mouse button**. When the **drop down menu** appears, **click** the **Add to Quick Access Toolbar** selection.



After you add the Print Preview button to your Quick Access Toolbar, the toolbar will look like the image on the right. Notice that Print Preview may now be accessed by clicking this button.

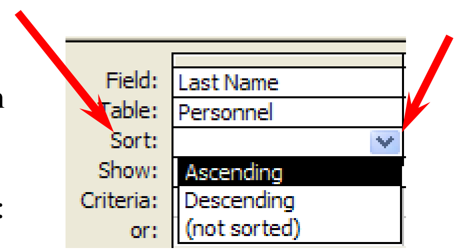


You can use this "method" to **add any button you desire** to your Quick Access Toolbar. There is a **small arrow on the right side of the Quick Access Toolbar** (image on **right**). If you **move** your **cursor over** the **arrow**, you will see that it indicates **Customize Quick Access Toolbar**. You can work with this as you desire.



You can customize the Quick Access Toolbar in each 2007 Office application as you wish.

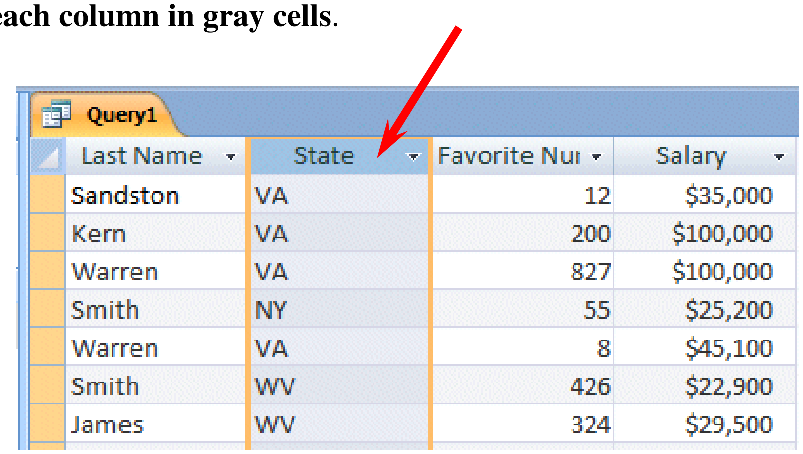
Sorting the Database



If you are not in the **Query Design Screen**, you'll need to be in that view. So, **go** to the **Design Screen** (bottom Page 28). **Notice** that the **<u>third row,</u>** in the **lower half** of the screen, indicates **Sort:** (like the **image** at the **right**). **Click**-in the **Sort**: area under **Last Name**. A **down arrow** box **appears**; **click-on the down arrow**. Let's sort the **Last Names** in **Ascending** order. **Click**-on **Ascending**. Notice that **Ascending** now appears in the Sort: area. **Click-on the** (**!**) to see the **new query**. Notice that the names you entered are alphabetized. **Click-on the Design View button (triangle-ruler-pencil)**. Now **change** the **Ascending** under Last Name to **(not sorted)**. On your own, try sorting some of the other fields. When you are finished remember to **set the fields to (not sorted)** unless you do want to sort on those fields.

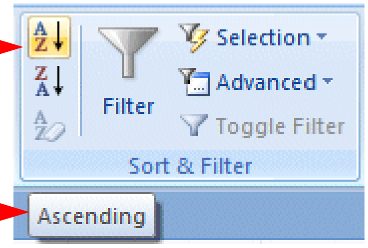
You **may also sort** various **fields** in your database whenever you are in the **Datasheet View**, whether you are viewing the entire **Table**, or a **Query** from the Table. Notice that **the Field Names** are shown at the **top of each column in gray cells**.

If you **click-on one** of the **blue area field names** (like **State**), the **entire column** (Field) turns "**blue**" (like the **image** on the **right**). This indicates that you have "**marked**" the entire column (Field).

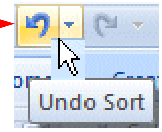


Last Name	State	Favorite Nu	Salary
Sandston	VA	12	$35,000
Kern	VA	200	$100,000
Warren	VA	827	$100,000
Smith	NY	55	$25,200
Warren	VA	8	$45,100
Smith	WV	426	$22,900
James	WV	324	$29,500

On the **Home Tab/Ribbon**, on the **right side**, in the **Sort & Filter Group**, you will **see two buttons with "down" arrows** (like the **image** on the **right**). When you **move** the **cursor over these two buttons** a **text help** box will **indicate**: **Sort Ascending** or **Sort Descending**. If you **click-on one** of the buttons, the **Field** which you **selected** (highlighted) will be **sorted in the order selected**. Give this a try and see how it works.

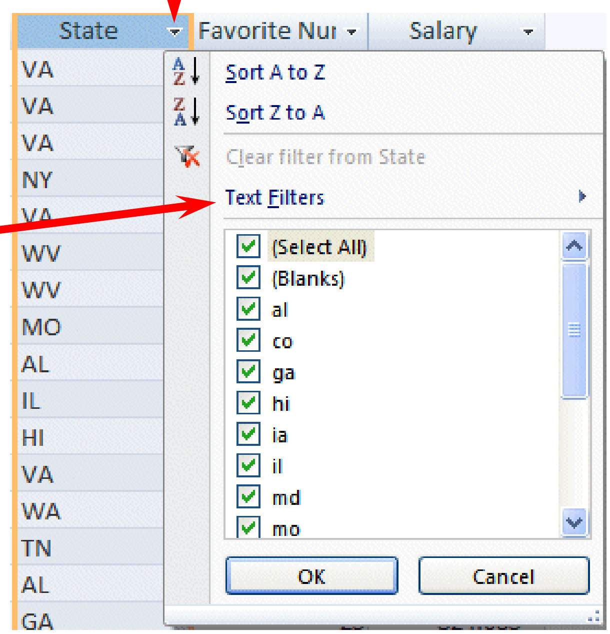


You can **always click the Undo Arrow** in your **Quick Access Toolbar** if you desire to go back to the original order.



New to Access 2007 – A Filter/Sort Arrow for each Field!

In the **image** on the **right** we **clicked** the **small down arrow** to the **right** of **State**. A **drop down Filter/Sort menu appeared**! This is new in Access 2007. You also use this menu to enhance your sorts. **Notice** that the A to Z and Z to A are in this menu, as well as text Filters. You can experiment with these filters as you desire. This is a neat new feature that will assist you greatly in doing your queries.

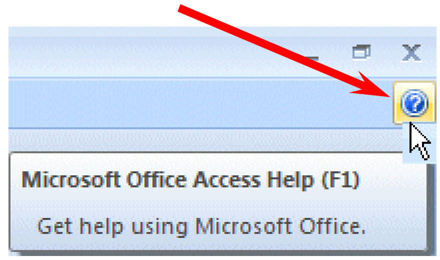


So, there are several "ways" you can sort your Tables and Queries.

Specific Queries

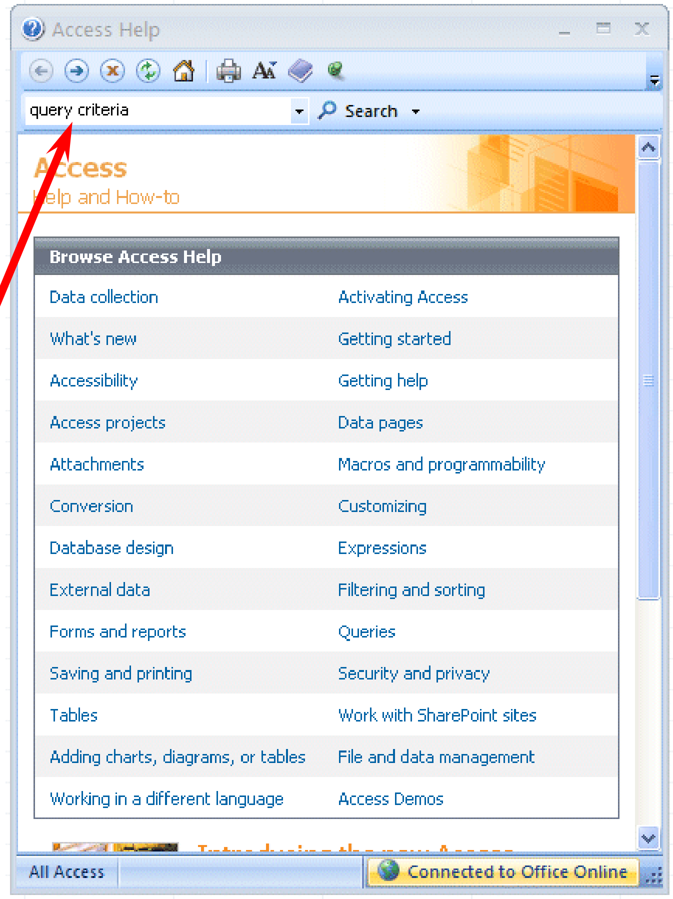
So far we have listed **everything** under **each Field Name** that we selected. However, many times you will probably want to **find something specific** in your Table (database - e.g. **people from a certain state or city, people whose favorite number is 7 or salaries between $ 20,000 and $ 50,000**). This is fairly common sense, but it can get **tricky**.

To get an **idea of various criteria** (you might want to use), **click**-on the **Help Question Mark** in the **upper right corner** of the **Access Screen**.



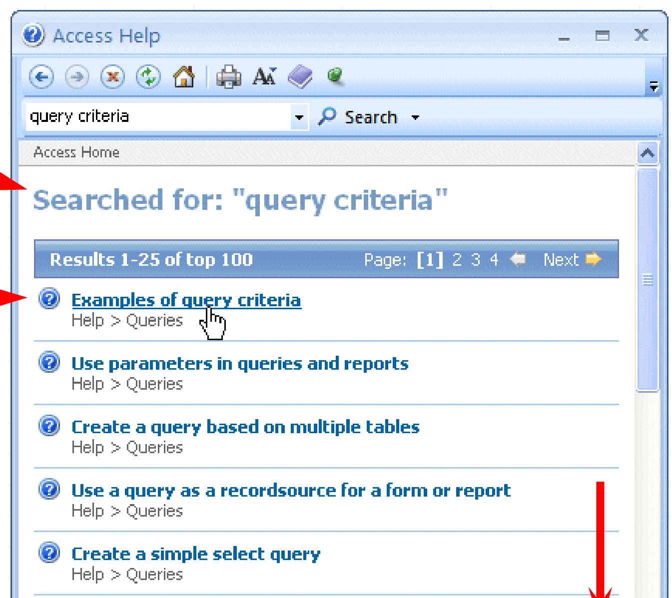
The **Access Help Task Pane** will **appear** on the **right** side of your screen. **Notice** that there are already a **number of Help topics** already included in this Task Pane.

When your screen appears, **click**-in the **Search** area in the Task Pane. **Type-in** "**query criteria**" and then **tap** the **Enter key**.

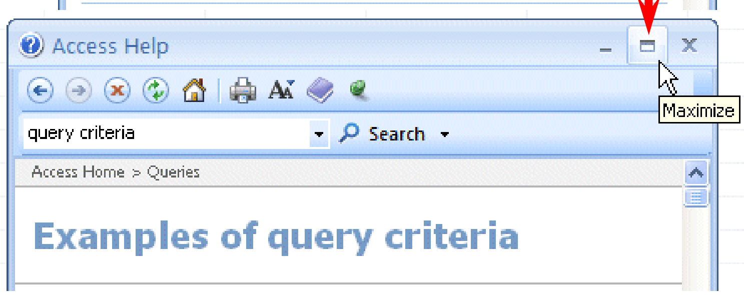


A **Search for:** Task Pane will now appear (like the one on the **right**).

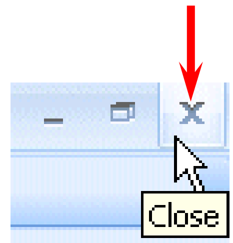
Click-on the **Examples of query criteria** selection.



Another **Access Help** Screen will **appear** similar to the one on the right. **Click** the **Maximize square** in the **upper right corner** of this screen so that you can see all of the criteria examples more easily.

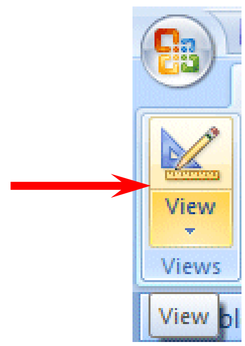


Use the **Elevator Bar** on the **right** side of this **Help screen** to **view** all of the various **criteria** for queries. This is a wonderfully updated feature in Access 2007 that really gives you an Access Manual for criteria.



When you are **finished**, **click**-on the "**X**" in the **upper right corner** of the **Microsoft Access Help Topics menu** screen to **close** the screen.

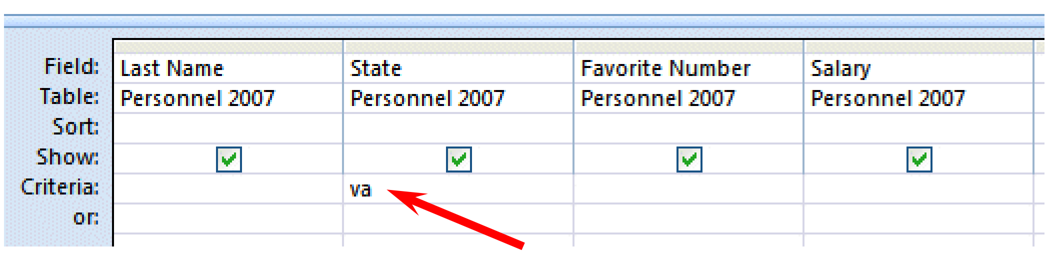
You may return and explore additional help screens as you become more accomplished with Access 2007 database. These help screens are like having a complete Access 2007 manual on your computer.



Now we'll try a few specific queries. First let's **find** a **specific state**.

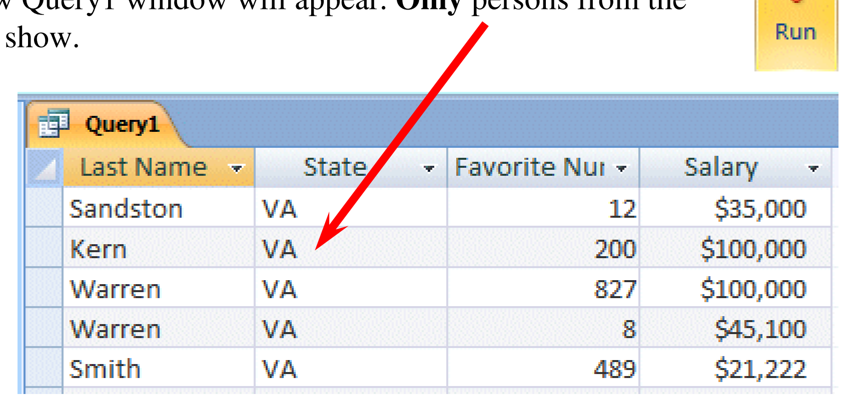
You should be back in the **Query1: Select Query** menu **Design** window. It should **look like** the image below. **If you're not** then **click** the **Design button** in the **upper left corner** of the **screen** (like the one on the **right**).

Click-in the **cell** to the **right of Criteria:** in the **State** column. You will see a flashing cursor (**Make sure you are in the State column.**). **Type-in** the **abbreviation for one of the states you entered** in your Personnel Table. Your Query should **look like** the **image below**.

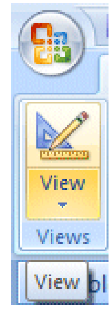


Now **click-on** (**!**). A new Query1 window will appear. **Only** persons from the **state you selected** should show.

This is a **SPECIFIC** query for that **state**.



Click-on **Design View Button (triangle-ruler-pencil)** to return to Design View.



<u>Delete</u> the **<u>state</u>** you entered.

Now we'll look for **Favorite Numbers larger than 600**. **Type-in >600** in the **Criteria cell** under the **Favorite Number Column.**

Field:	Last Name	State	Favorite Number	Salary
Table:	Personnel 2007	Personnel 2007	Personnel 2007	Personnel 2007
Sort:				
Show:	✓	✓	✓	✓
Criteria:			>600	

Click-on (**!**). Everyone with a favorite number larger than 600 should show. If **no one is indicated** you **don't have** a person with a **number larger than 600**, or you might have typed the >600 incorrectly.

Query1

	Last Name	State	Favorite Nur	Salary
	Warren	VA	827	$100,000
	Binswager	MO	777	$41,950
	Karpowski	IL	617	$64,500
	Hapgood	AL	984	$52,145
	Lovelorn	RI	984	$78,000
*			0	$0

Return to the **Design View**. **Delete** the **>600** and **run the query with no criteria**. You should "**see**" all **the fields** again. **Return to** the **Design View** again.

Make sure all the Criteria: cells are empty.

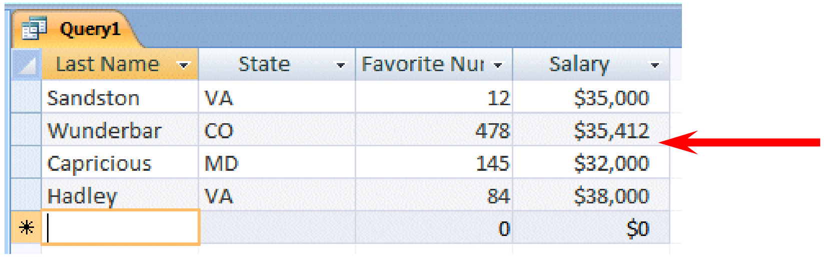
Next we'll look for persons with **salaries equal to or larger than $ 20,000 and equal to or less than $ 50,000**. In the **Salary** field column, in the Criteria**:** cell **type-in**:

>= 30000 and <= 40000

Field:	Last Name	State	Favorite Number	Salary
Table:	Personnel 2007	Personnel 2007	Personnel 2007	Personnel 2007
Sort:				
Show:	✓	✓	✓	✓
Criteria:				>=30000 And <=40000

Click-on the (**!**).

You should now see a specific query that indicates those persons in the range you chose.



Last Name	State	Favorite Nu	Salary
Sandston	VA	12	$35,000
Wunderbar	CO	478	$35,412
Capricious	MD	145	$32,000
Hadley	VA	84	$38,000
		0	$0

Go back to Design View. **Delete** the **criteria** you entered under **Salary**.

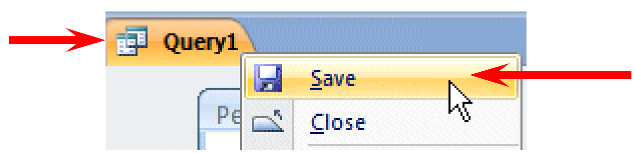
Now, **on your own**, if you desire, add or delete some fields to your query and experiment with some combinations.

Don't get frustrated if no specific items appear. Frequently you might query for something that **can't exist** (e.g. states of VA **and** CA – a person can't be from both states at the same time) or there just isn't anything that matches. For fun, notice the **or:** just below Criteria to the left of the Design View. **Try one state in the Criteria: cell under State and another in the or: cell.** Go back to your Query Help (Page 32) and try some of the criteria you see.

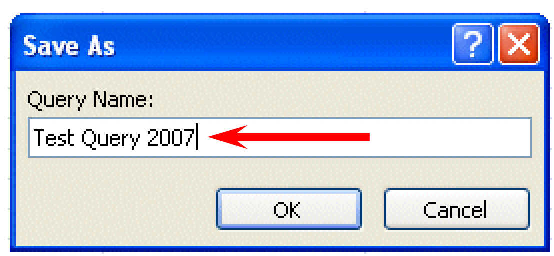
When you have a good feel for queries you're ready to **end** your query session.

Make sure that your query is completely clear of criteria – we'll use this query later for a report!

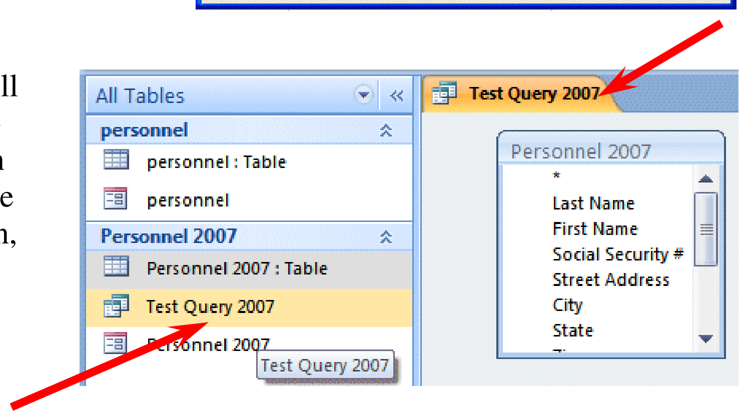
RIGHT click on the **Query1 Tab.** A Drop down menu will appear. **Move** your **cursor over Save** and **click** on **Save**.



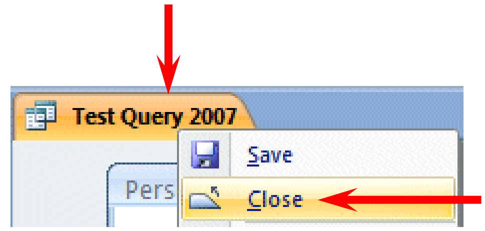
A **Save As** window will appear. **Name the Query anything you like**, we're going to name **our query "Test Query 2007."** **Click**-on **OK**.



When you **click** the **OK** button you will **notice** several things - the Query1 Tab changes to the name you chose, and on the left side of your screen you now see you new query is available to use again, as you desire. You can activate this query and change things just like you did above.



You can **close** your **Query** by **RIGHT** clicking on the **Tab** and then **clicking Close**.



Any time you desire to **open** this **query again**, you simply **click twice quickly on the query** selection on the left side of your Access screen. Or, you can **RIGHT click** the **query** and **choose Open**.

Reports

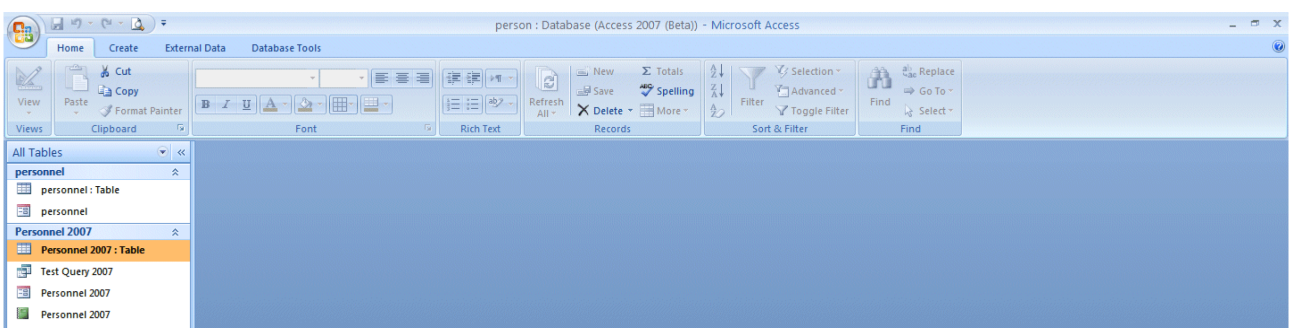
Reports can be very complex. In this tutorial we'll cover the **<u>very basic steps</u>** of creating Reports. **A good manual or some knowledgeable assistance will be essential to mastering reports.**

There are several types of reports. We'll use Access **Wizards** and **Tabs/Ribbons** to design several simple reports.

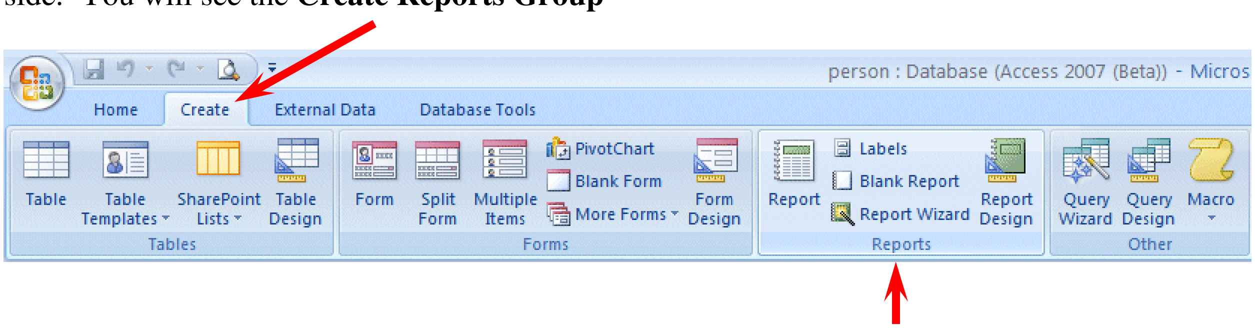
For those who are accomplished with Access reports – from earlier versions of Access – this will be a whole new adventure with the Tab/Ribbons of 2007 Office.

First, make sure that you have closed any Tables, Forms, or Queries on which you are open.

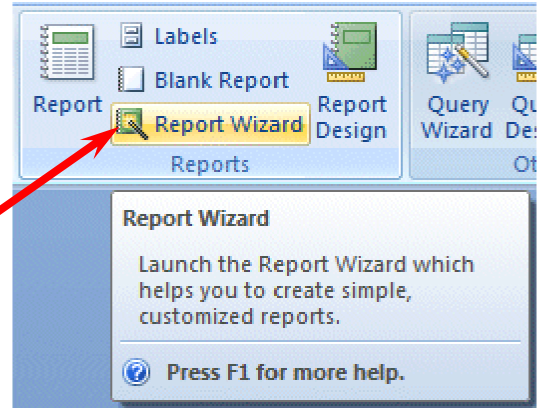
Your **Access** screen **should look similar** to the **image below**.



Click the **Create Tab** and the **Create Ribbon will appear**. **Look** at the Ribbon on the **right** side. You will see the **Create Reports Group**

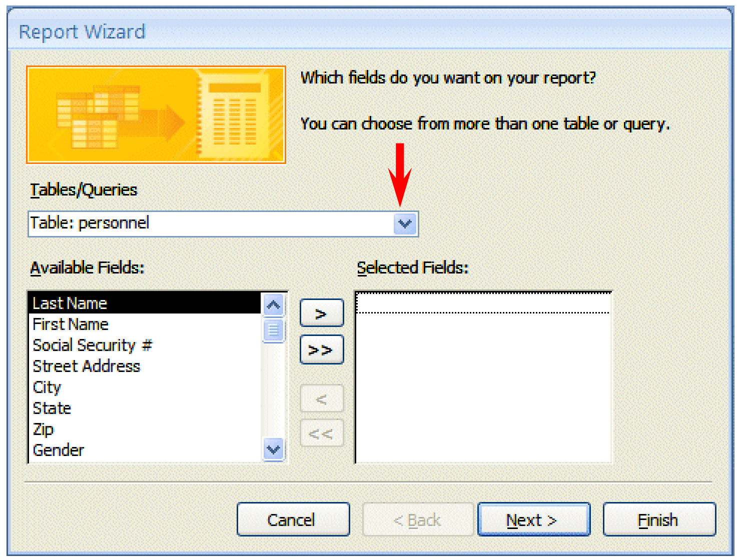


The **Create Reports Group** is enlarged on the **right**. We'll begin our Report lesson using the **Report Wizard**. Once you've created a Report with the Wizard, you'll be somewhat familiar with Reports. We'll then use some of the other selections in this Group to create Reports.



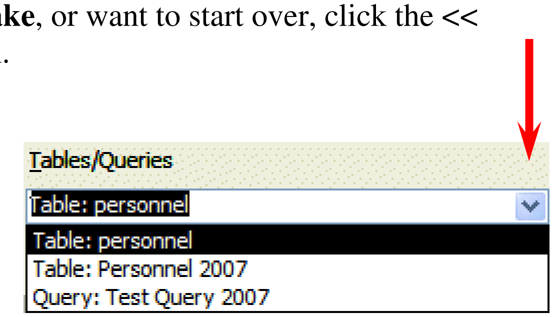
Click the **Report Wizard** selection in the **Reports Group**.

The **Report Wizard Menu** screen will **appear**:



Read all the information in the **Report Wizard menu screen**. Only the fields **<u>you</u> select** from **<u>your</u>** table **will show-in the report**. To bring fields into the report **<u>individually</u>** you **click**-on the **name** of the **field** (in the list of fields in the area under **Available Fields:**) and then **click**-on the **>**. The **<u>order</u> which you click**-on the fields **will be their order** in the report. The **>> brings over all of the fields**. The **< brings back one of the fields which you have selected** and **<< brings back all of the fields.** If you **make a mistake**, or want to start over, click the << selection to bring back all of the fields and try again.

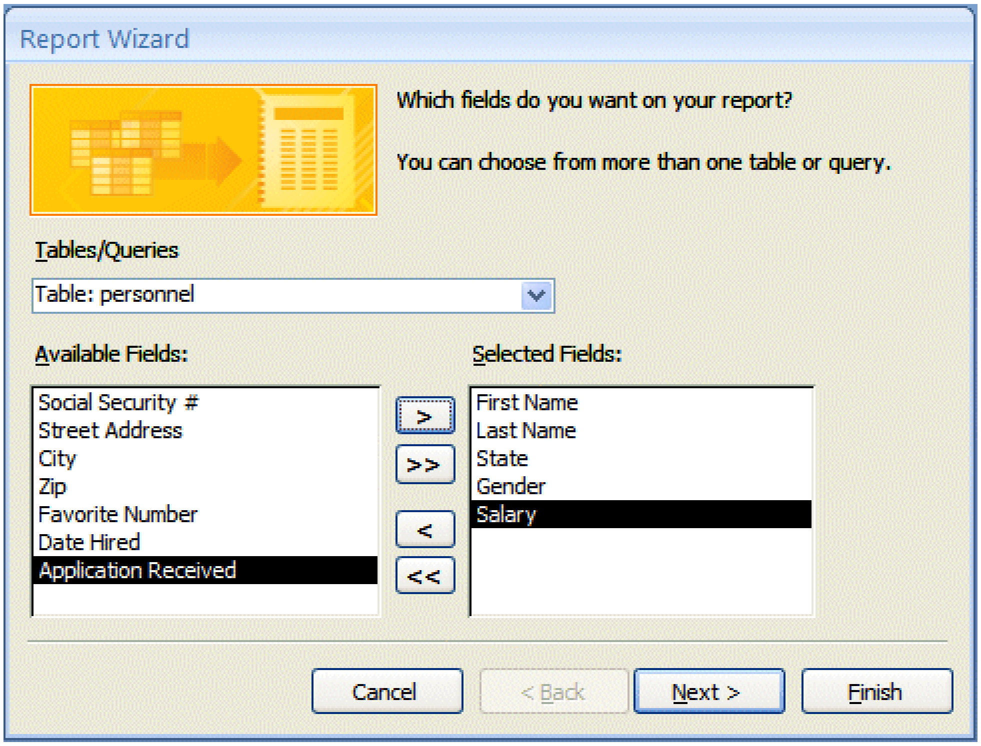
Look at the **image above**. **Notice** the **arrow pointing** to the **down arrow** on the **right side** of the **Tables/Queries area**. **Click** this **arrow** and **select** your **Table:Personnel**.



Your Report Wizard menu screen should look like the large image in the middle of this page.

Let's begin. **Click-on First Name**, then **click-on >** (**notice** how the First Name field went **from** the **Available Fields**: to **Selected Fields**:). Now do the same with the **Last Name, State, Gender** and **Salary** fields. These are the fields that will appear in our first report.

Your Report Wizard menu screen **should look like** the one **below**.

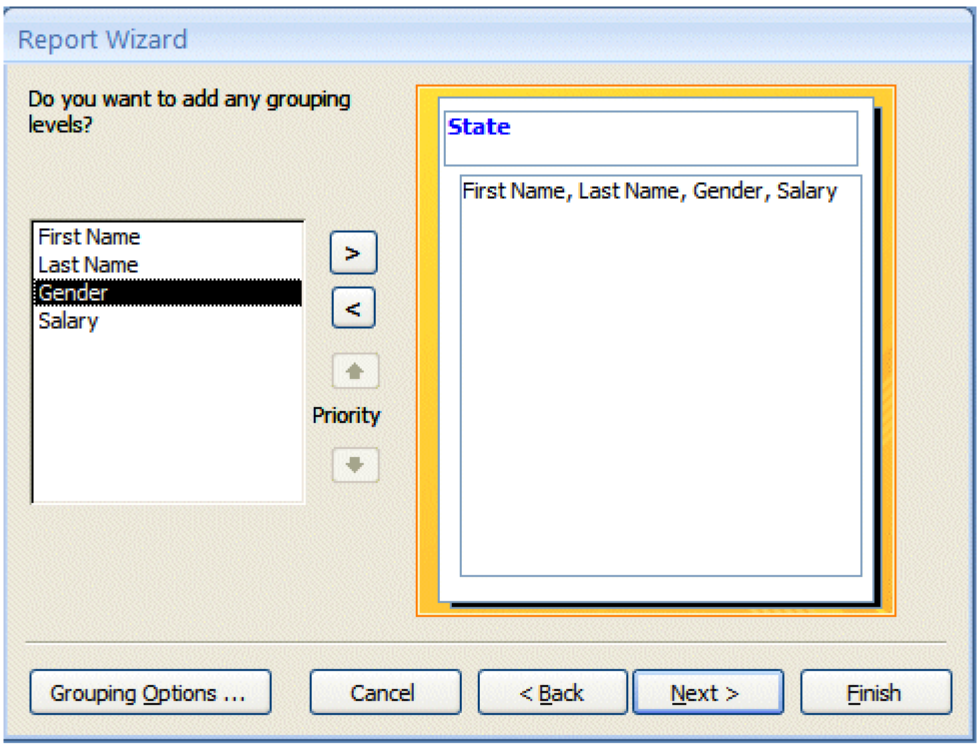


If it does, click-on the **Next>** Button. If not, use the << to bring all the fields back and try again.

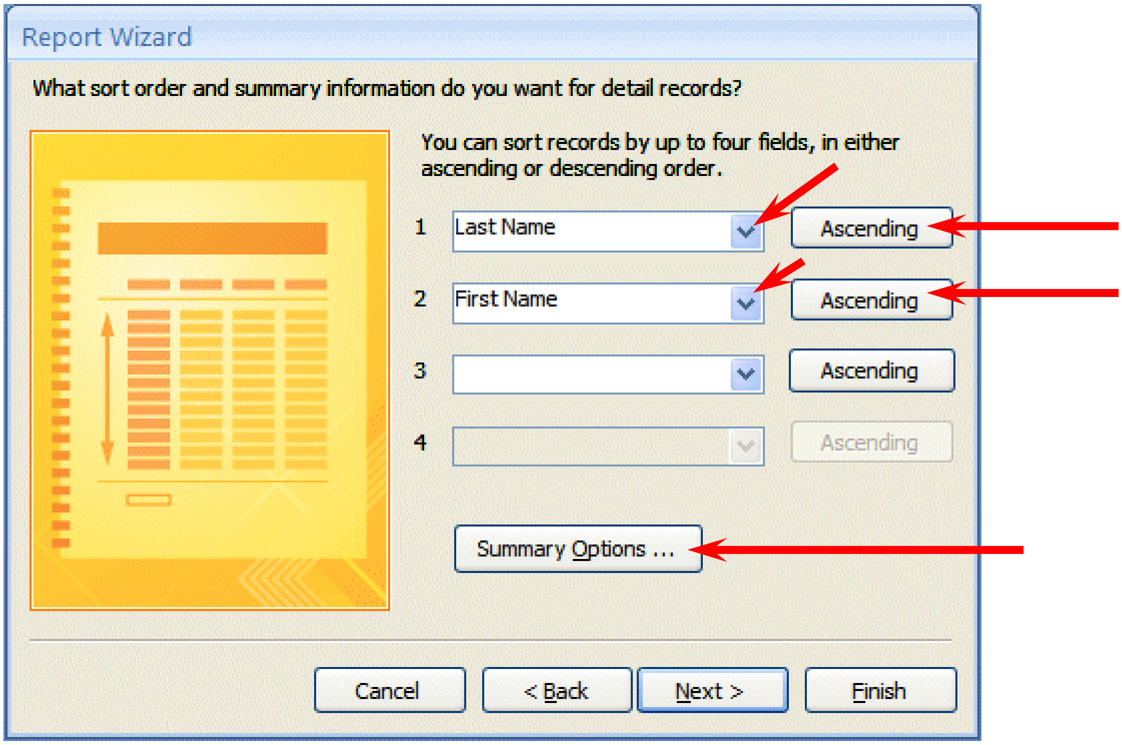
Grouping in Reports

This Report Wizard menu screen asks if you want to add **Grouping**. Grouping simply “groups” records by an item in the report you are designing. We’ll group by **state**. This means that “records” from a state will be in a “group” (e.g. people from Virginia will be in one group, the folks from Washington in another, and so on). This will be easy to see when we look at the report. So, **click**-on **State**, then click-on **>**. If you make a mistake, no problem, just use the **<**.

Your screen should now **look like** the one **below**.



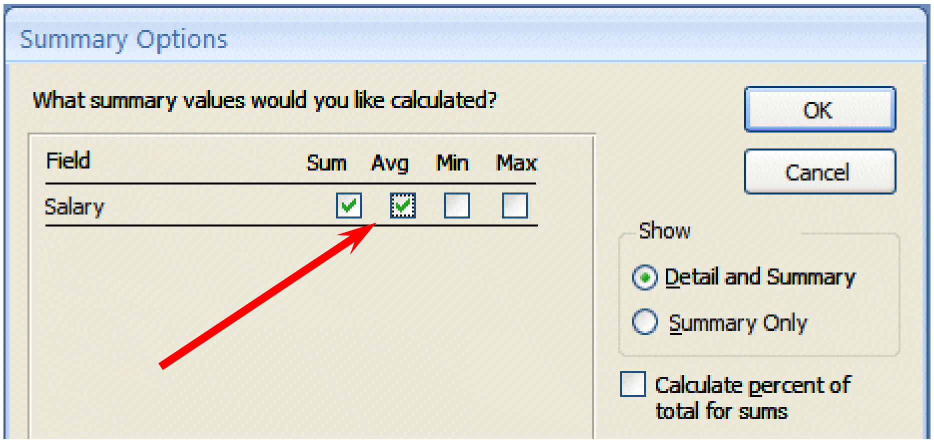
Click-on **Next>** again. Another Report Wizard menu screen will follow.



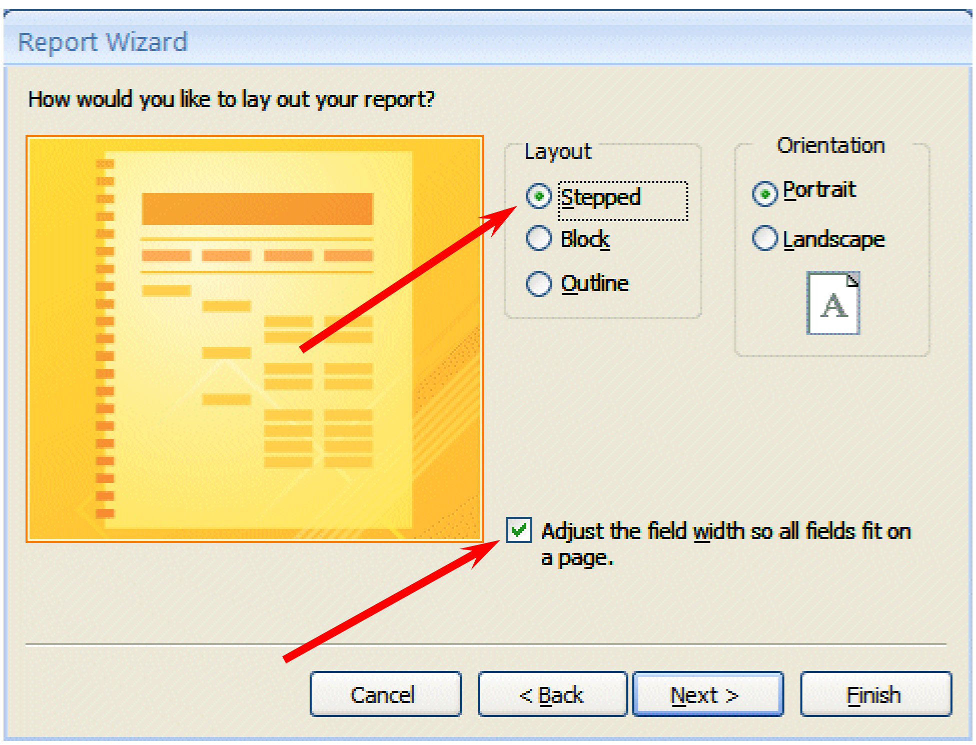
First, the **above** screen requests that you **indicate** a **Sort Order**. This simply means that within each "group, the **alphabetic order** in which you want the fields sorted. We'll sort by **Last Name** and then **First Name**. This way you'll have the names, grouped by state, in Last Name order and, where you have several people with the same Last Name, they'll be sub-sorted in First Name order. Notice the **Ascending** button to the right of the Sort boxes. This indicates that the Field that you select is in A to Z or ascending order. If you click-on this button, it will reverse the order from Z to A, or descending order. **Click-on the small down arrow to the right of the first box** and select **Last Name**. Leave the order as **Ascending**. Now, select **First Name** in the second box. When you are finished, your Report Wizard menu **screen should look like** the one **above**.

Notice a **Summary Options** button **below** the **sort fields** you have selected. Access 2007 is "really smart." Whenever you see the Summary Options box it is because Access 2007 knows that you selected a number field for your report. The Summary Options box **ONLY appears** when a **number field is selected**! **Click-**on the **Summary Options… button**.

The **Summary Options** menu box **allows** you to **enter calculations** for **numerical** and **currency** fields if you have **selected** any. It will **summarize** these calculations **by each group**, and **in total**. So, since **Salary** is a **currency** field, we can obtain calculations. **Click**-in the **boxes** under **Sum** and **Avg**; this will furnish these calculations (as you will see in the report). If you want percentages as well, click-in the box next to Calculate percent of total for sums.



Click-on **OK.** This will return you to the previous Wizard screen. Click-on **Next>** again.

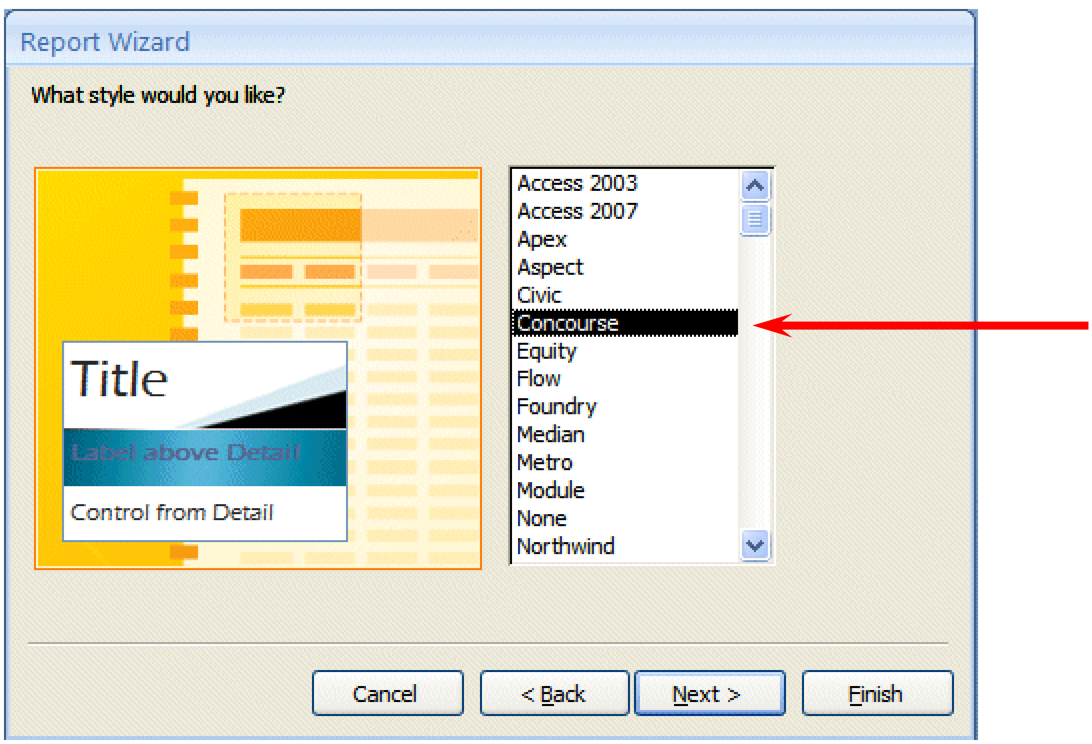


This Report Wizard screen allows you to **select a layout** for your **report**. **Click**-in the **small circles** to the **left** of **each choice** in the **Layout area** and observe the results. For the moment, **we'll stay with the default: Stepped**. So **click-again it that circle**. Leave the report in Portrait Orientation.

Note: At the **bottom** of the **last Report Wizard menu screen** (**on the last page**) there is a check in the small box to the left of **Adjust the field width so all fields fit on a page**. **This is a very important check**. This means that no matter how many fields you place in your report, they will all fit on one page. With a few fields in the report, this is no big deal. However, if you have a lot of fields, they will be all "scrunched" up and you'll notice that sometimes the Field Names and data for these fields are "cut-off" a bit. As mentioned at the beginning of the Reports section of the tutorial, **this is where an advanced course or manual are almost essential**.

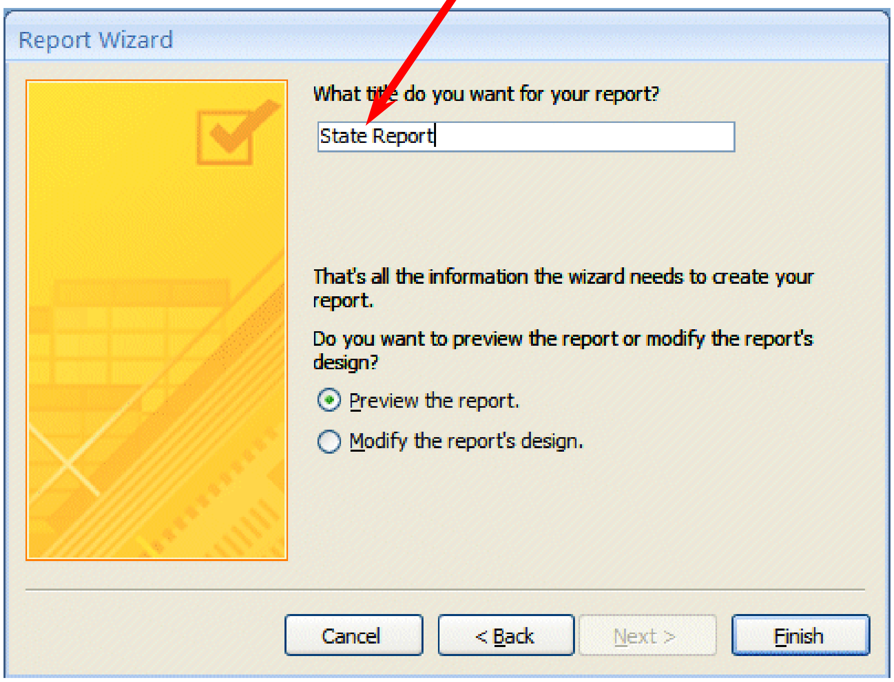
Click-on **Next>** again.

The next Report Wizard will appear.

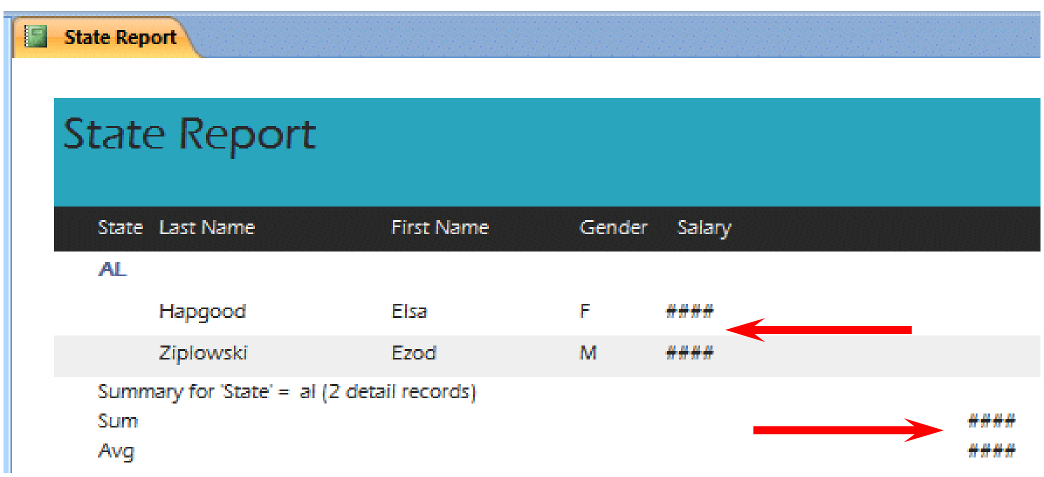


This menu screen allows you to select the **Style** that you would like for your report. **Click**-on the **choices** (Apex, Aspect, etc.) and see what each "looks like". Choose whichever style you desire and click-on **Next>** again.

The next Report Wizard screen is the **last** screen in the sequence. It allows you to select a title different from the name of your database - if you so choose. **Note** that the **small circle** in front of **Preview the Report** is "dotted". When we **click** the **Finish** button Access 2007 will go to a **preview copy** of your report. We'll **title** this report **State Report**. Use this name, or any name you desire, and click-on **Finish**.

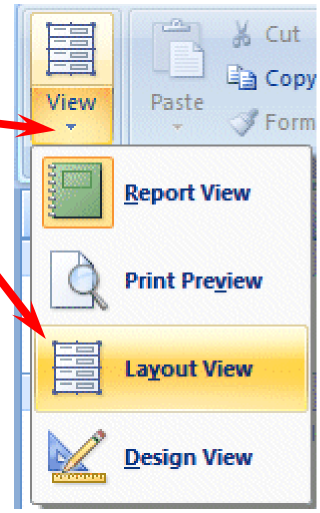


This is a report in **Tabular** (Columnar) format. Your screen should look something like the one below.

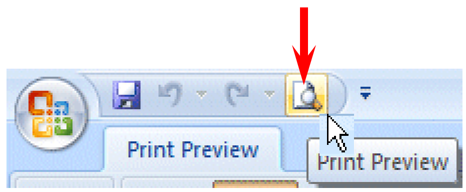


Notice the **#### symbols under Salary** and on the **right of Sum and Avg**. **The fields are not wide enough to display these numbers**. We'll show you how to adjust column widths in a moment.

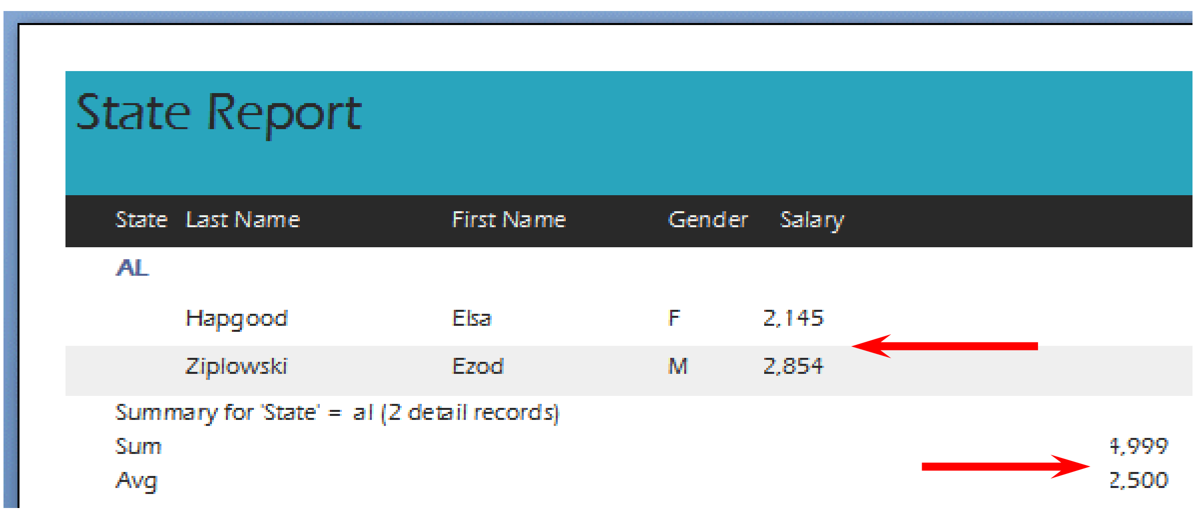
Notice in the **upper left Corner** of the Access screen that you are currently in **Layout View**. If you **click** the **small down arrow under View**, the **drop down menu** on the **right** will **appear**.



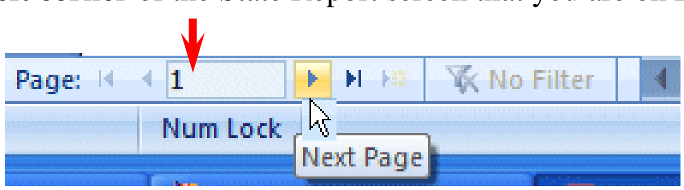
To "**really see**" what the **State Report will look like**, you'll need to go to a **Print Preview**. You can either **click** on the **Print Preview selection** in the **menu** on the **right**, or **click** the **Print Preview button** you placed in the **Quick Access Toolbar** at the **top left** of your screen.



In the **Print Preview image below** you can **see** that the **Salary, Sum** and **Average amounts** are "**cut off**." We'll **need to go to the Design View** to **enlarge these "boxes**" so that we can see all the numbers.

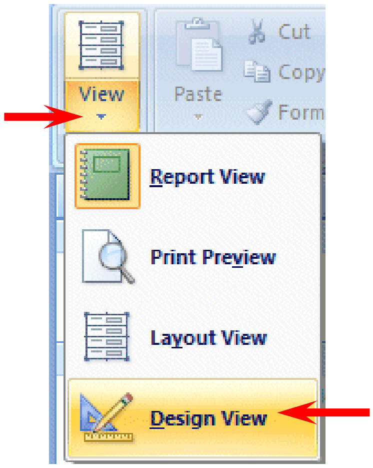


Notice in the **lower left corner** of the State Report screen that you are on Page 1 of the report.

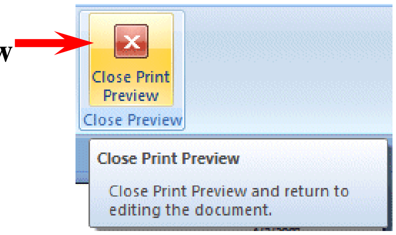


Notice the "**triangle arrow**" **buttons** to the **left** and **right** of Page 1. These take you to the first page of the report, the previous page, the next page, and the last page. Try clicking-on them.

Notice that your **cursor** – in this Preview Report screen is a **magnifying glass**. This shows you how a page of your report will appear when you print it. Each time you **click** the magnifying glass you will "**zoom in**" or "**zoom out**" making your report appear larger or smaller. You will zoom to the "place" where you place your magnifying glass – just like if you were using a real magnifying glass and a real piece of paper. You'll magnify the place where you are "holding" the magnifying glass. So, give this a try.

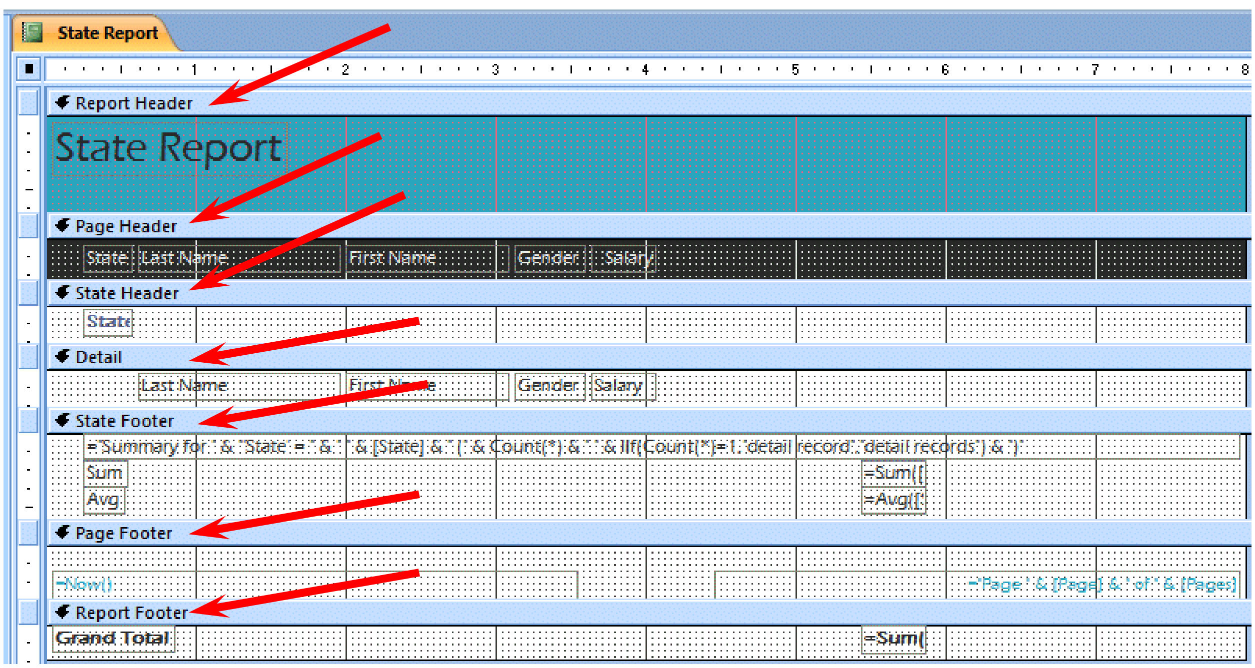


To **return** to your **State Report**, **click-on** the **Close Print Preview button** on the **right side** of the **Print Preview Tab/Ribbon.** This will take you back to the **Layout View** of your Report.



You will see your **State Report** with all of the **####** symbols.

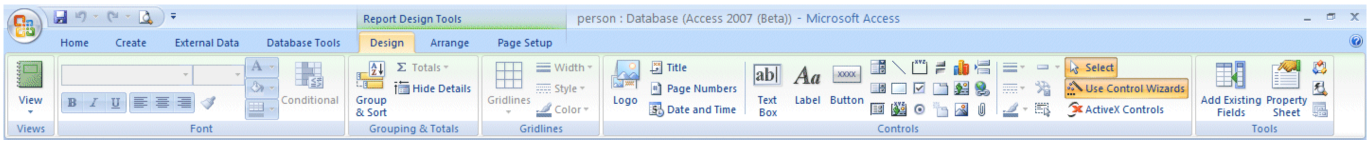
Click the **down arrow below** the **View button** in the **upper left corner** of your **Access screen** and then **click** the **Design View** selection.



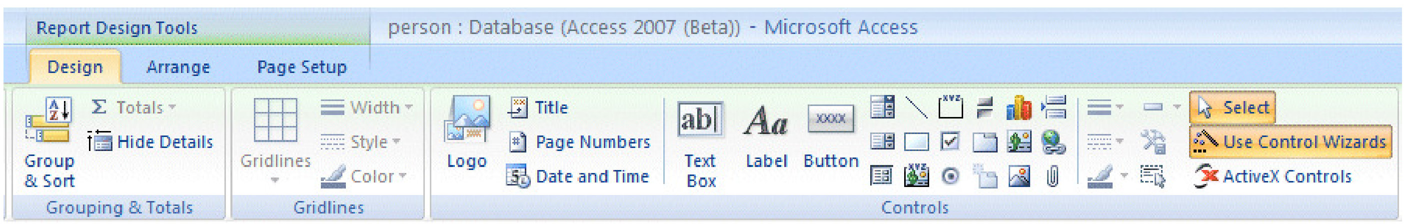
We'll explain about what you see in the image above on the next page.

New Report Design Tools Tab/Ribbon in Access 2007

In addition to the change to the Design View, you will see that the Home Tab/Ribbon is replaced by a Report Design View Tab/Ribbon. In previous versions of Access, small menu windows would open for Design View. These have now been placed in the Tab/Ribbon you see below.



We enlarged a part of this Tab/Ribbon so you can see that the Tab/Ribbon Groups – Grouping & Totals, Gridlines and Controls have replaced the "old" menu boxes.

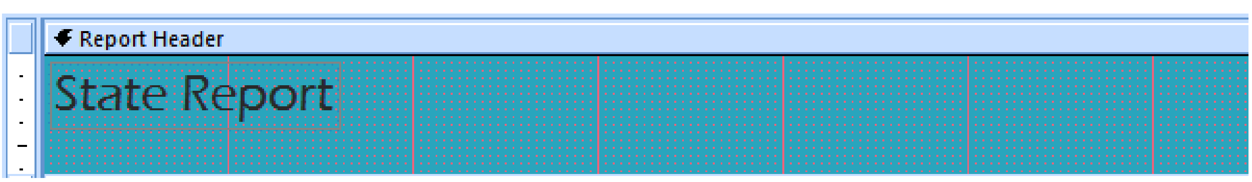


When you become more comfortable with Access Reports, you'll find that these tools come in quite handy.

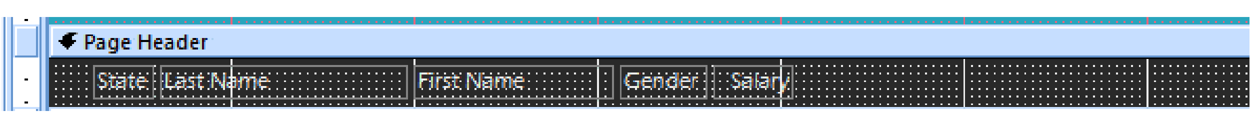
Now, about the areas you saw in the Design View on the last page……

First: Notice, to the left, in the light blue part of the screen, it indicates**: Report Header, Page Header, State Header, Detail, State Footer, Page Footer and Report Footer** (see arrows on the last page)**.**

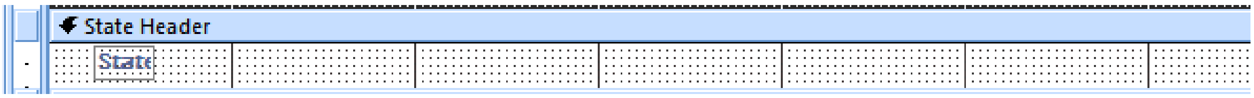
Report Header: If something shows here, it will only be shown on the **<u>first</u>** page of the report.



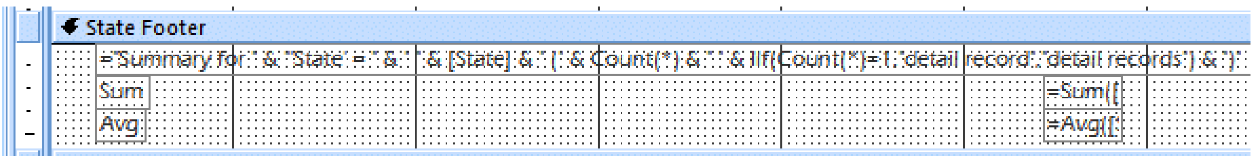
Page Header: If something shows here, it will show on **each** page of the report at the **top of each column**.



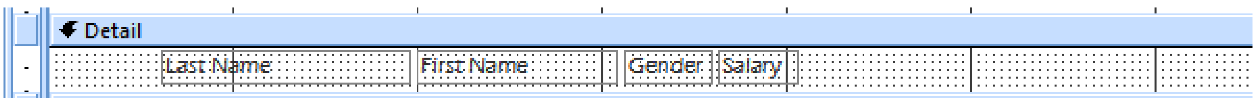
State Header This "sets-off" the State Grouping.



State Footer This "ends" the State Grouping.

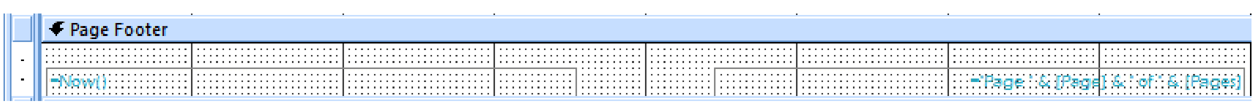


Detail: These are the **field names from our database**. Access will "**pull**" the **data** for the individual fields from our database records.

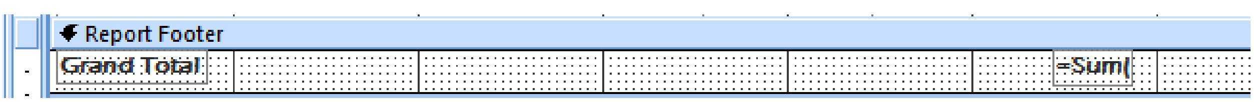


These are the database fields themselves. The fields **print each time** there is a person in the database. This field information **is drawn** from the database. **As you enter more people in the database** and run the report again, **more people will be shown**. The "size" of the box you see on the screen was created when we created the field sizes.

Page Footer: This is what shows at the bottom of each page.



Report Footer: This is what shows <u>only</u> on the last page of the report.



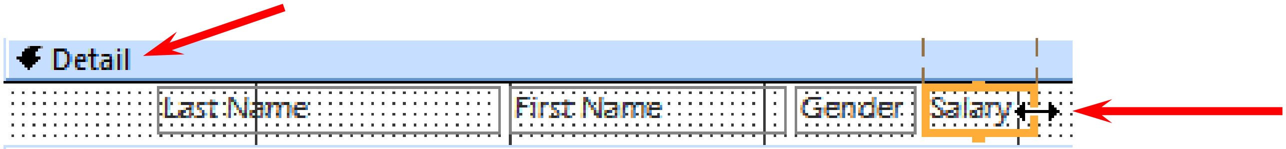
Also note, the **lower right corners** of the **State** and **Report Footer** area boxes indicate:

= SUM([Salary]). This is a calculation box the Wizard created. This is what gave you the calculations for your average and the sum of the salaries in the State area and the grand total of all salaries in the Footer area.

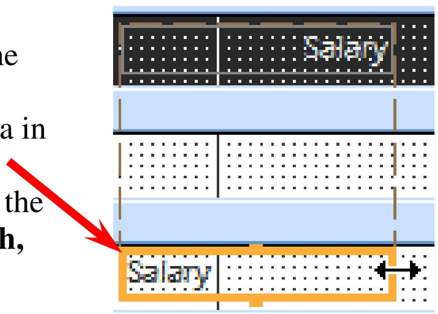
Enlarging the Salary, Sum and Average "boxes"

On Pages 43 and 44 we saw that the **Salary, Sum** and **Average** numbers were "**cut off**." We'll now show you **how to widen the boxes** so you can see "all the numbers."

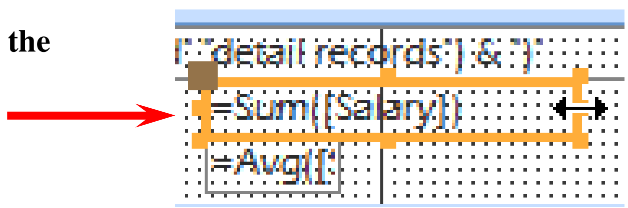
In **Design View**, **click** on the **Salary box** in the **Detail area**. The **border around the box will turn orange**. Carefully **move** your **cursor** over the **right side of the box** – you will **see** a **two-headed arrow** – your **Detail** area should now look like the **image below**.



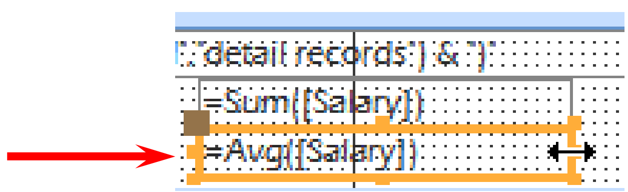
When you see the two-headed arrow, **click** and **HOLD DOWN** the **LEFT mouse button** and **move your cursor slowly to the right**. You will see the **Salary box get larger** – as well as the Salary area in the Report Header. **Take your finger off the left mouse button**. Your **Salary box** and **Salary Header** should now **look similar** to the **image** on the **right**. **If you have not made the area large enough, or too large, you can return to the Design View and adjust as need be**.



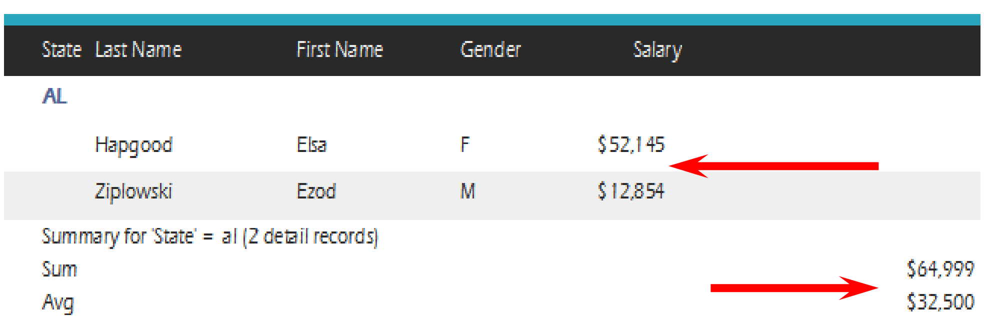
Now move to the **State Footer area** and **do the same** for the **Sum box.**



And, then the **Average box**.

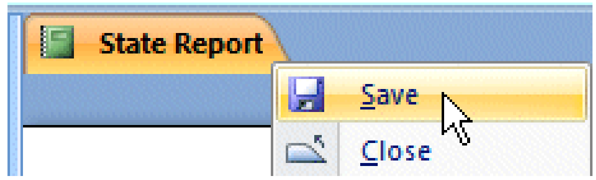


Click a **Print Preview button** (like you did at the top of **Page 44**). You should now see "all" of your numbers.



Saving Reports

Since you have already "named" your Report (State Report), **move** your **cursor over** the **State Report Tab** and **click** the **RIGHT mouse button**. When the drop down menu appears, **click Save**. You will see your State Report in the area on the left of your screens with you Table, Form and Query.

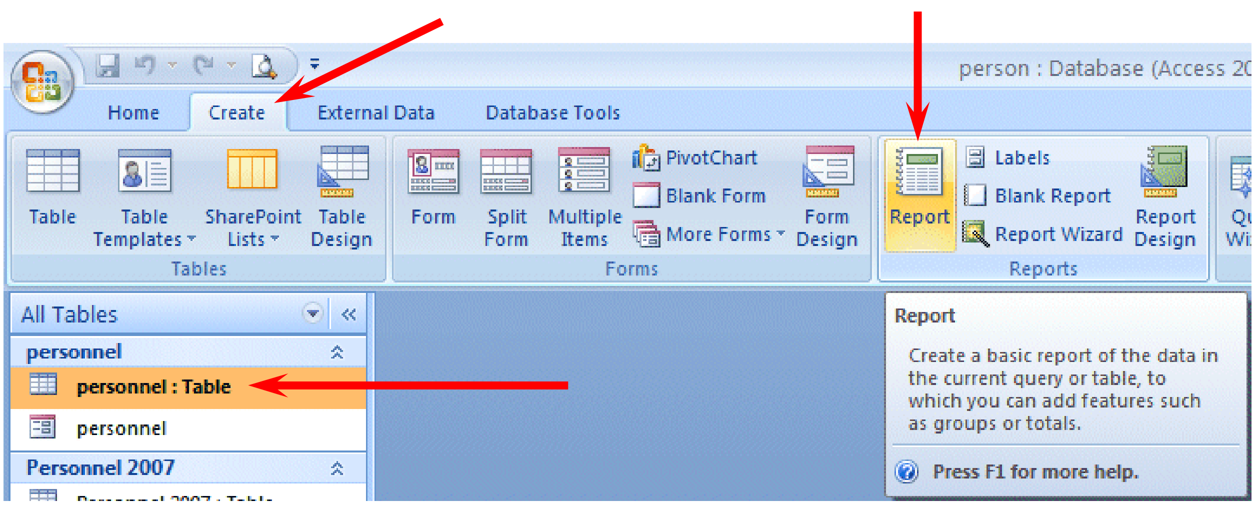


Close this report again as you did previously (by RIGHT clicking on the State Report Tab and selecting Close).

Quick Reports

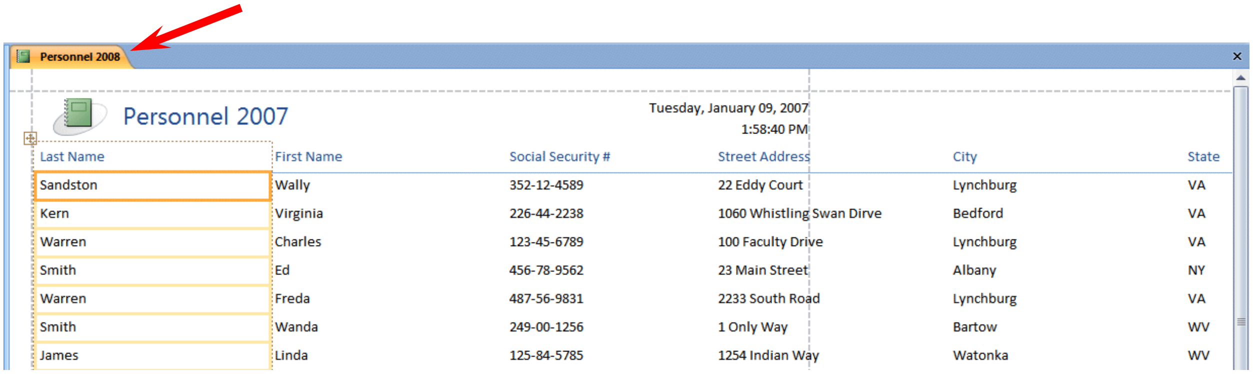
On Pages 36 and 37 we showed you how to create a report using a Report Wizard – to give you a "feel" for how Reports are produced. A really neat new feature of Access 2007 is what we'll call "Quick Reports." Now that you know how to use the Wizard and understand basic reports, you can create similar – simple reports – with a couple of "clicks."

Click the Create Tab. Then, click your Personnel selection under All Tables. Move your cursor over the Report selection in the Reports group. Read the pop-up Help box and then click Report.

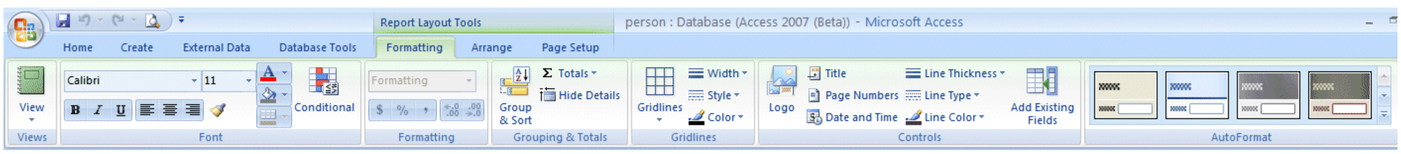


You will see several things occur at the same time. On the lower right side of your Access screen you will see the Quick Report (image at the top of the next page).

Notice that Access has chosen a name for the Report based on the name of your Table.



Also notice that a new Report Layout Tools Tab – with a Formatting Tab/Ribbon – appears to assist you.



You can experiment with this Report and the Formatting Tab/Ribbon as you desire. Don't worry if you really create a Report that you don't want. You can use the Undo Arrow to go back a step or two or you can RIGHT click on the new Report Tab and select Delete.

As you create reports you may save or not save, as you desire.

Reports can become **very complex, very quickly**. This is only an introductory tutorial, which furnishes a simple guide to report design. You might want to purchase a book on Access or try a separate tutorial on reports. Our favorite book is **Microsoft Press Access 2007 – Inside Out** from Microsoft Press

When you are **finished** simply **exit Access** as you did on **Page 19**.

Now that you have the basics, you might want to try some things on your own. Try using the Wizards in Table, Query and Reports.

We'll, that about does it for now. If you have comments on this tutorial, simply send e-mail to the Internet address below.