

## Completing the SCCHC Database, Part II



Constructing queries for the Seattle Central  
Community Health Clinic

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## Review of SCCHC Operation

❖ Part II of Project 4 looks at the next set of operations: the requests for tests to be performed, as well the management of those requests as they make their way to the lab for processing and come back with results

- Enter client data
- Queue client for visit with health professional
- Health professional fills out consultation chart
- Order tests
- Label specimens
- Compare specimens to manifest
- Record results from test outcome

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## Ordering Tests

- ❖ The final act of a visit is for the health professional to “order” the tests
- ❖ You will need to set up 4-6 “visits” between your clients and health professionals in order to have records where you can order tests
- ❖ The action of ordering in the database system is to create the client’s tracking number
- ❖ This involves adding a command button control and programming the creation of the tracking number

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## Screen Shot of Sample Consult Form

Consult

Visit Number: 1 Date: 12/4/2000

Medical Professional: Joe the Hack MD

Clinic Patient: Grace Beuschane Whiteaker

Medical History: Rabid drug user

Presenting Symptoms: shakes, chills, vomit

Notes: needs help

Drug Test Request

HIV Test Request

Aids Test Request

HepB Test Request

Exceptional Test Request

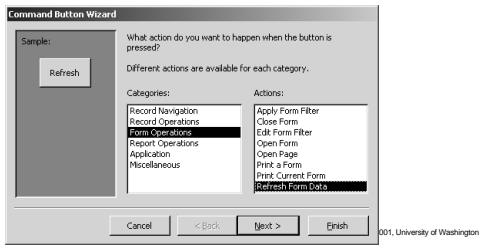
Order Tests

Test Order Number

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## **FIT 100** The Order Button

- ❖ Like any command button control, the database developer places it on the form and programs the event handler
- ❖ The difference for Access is that the handler will prepare for different operations... so selecting the right option is important



## **FIT 100** Computing the Tracking Number

- ❖ After completing the form wizard, the command button event handler has the following code:

```
Option Compare Database
Option Explicit
Private Sub cmdOrder_Click()
On Error GoTo Err_cmdOrder_click

DoCmd.DoMenuItem acFormBar, acRecordsMenu, 5, , acMenuVer70
Exit_cmdOrder_Click:
Exit Sub
Err_cmdOrder_click:
MsgBox Err.Description
Resume Exit_cmdOrder_Click
End Sub
```

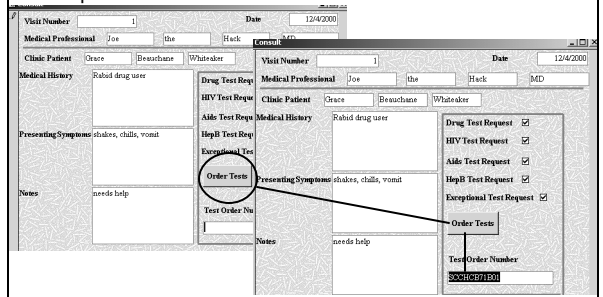
← Tracking number computation here

## **FIT 100** Enter the Tracking Number

- ❖ The tracking number field is something the user cannot enter (locked field) and cannot change...  
`TrackingNumber.SetFocus`  
`TrackingNumber.Locked = False`  
`TrackingNumber.Text = "SCCHC" & Hex((12 * (Year(Date) - Year("06/26/01"))) + Month(Date)) * 1000000 + VisitID)`  
`TrackingNumber.Locked = True`
- ❖ What is the tracking number? It is the letters "SCCHC" followed by the computer's hexadecimal encoding of the number of months since the creation of the database followed by the VisitID
- ❖ The tracking number is reversible, but not easily associated with a person or a visit

## **FIT 100** The Results ...

- ❖ Click on Order to create the tracking number IF tests are requested





## SCCHC Design Thus Far

- ❖ The SCCHC has the following components so far:
  - tblClient table with frmClient, frmReception form and linked frmSeeHealthPro form (starts rows of data in the Visit table)
  - tblHealthProtable and frmHealthClinicStaff form
  - tblVisit Table and frmConsultForm with Order button to set the tracking number
- ❖ Now all you need to do is prepare for the post-visit processing
- ❖ The main idea in "post visit" processing is to build new tables from the data in the Visit table
- ❖ These virtual tables (views) are produced through *queries*

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## Queries: Create Tables From Tables

- ❖ The queries you will use are questions to the database system asking to view the requested data in a new (virtual) table

VisitID	HealthProID	ClientID	DateOfVisit	TrackingNumber	DrugTest	Drug	HIVTest	HIVT	AidsT
	2	2	12/4/2000	SCCHC671B01	<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>
				SCCHC4C4B46	<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>
				SCCHC1312D0E	<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>
				SCCHC1312D0F	<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>
				SCCHC1312D10	<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>
				SCCHC1312D11	<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>
				SCCHC1312D12	<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>

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## A Query

- ❖ SELECT Visit.TrackingNumber, Visit.DrugTestRequired, Visit.HIVTestRequired, Visit.AidsTestRequired FROM Visit;

VisitID	HealthProID	ClientID	DateOfVisit	TrackingNumber	DrugTest	Drug	HIVTest	HIVT	AidsT
	2	2	12/4/2000	SCCHC671B01	<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>
				SCCHC4C4B46	<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>
				SCCHC1312D0E	<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>
				SCCHC1312D0F	<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>
				SCCHC1312D10	<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>
				SCCHC1312D11	<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>
				SCCHC1312D12	<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>		<input checked="" type="checkbox"/>

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## Using the QBE for Queries

Query1 : Select Query

Place the tables that will be a part of the table operations here. This is the **FROM** clause of an SQL statement. You may have one or many tables included.

ClientID  
DateOfVisit  
TrackingNum  
DrugTestRea  
DrugTestOut

Use the Sort row to arrange the data in that field in ascending or descending order. This is the **ORDER BY** clause in SQL.

Uncheck the Shows box if you don't want the attribute to display.

Field: TrackingNumber DrugTestRequired HIVTestRequired AidsTestRequired  
Table: Visit Visit Visit Visit  
Sort:  
Show:      
Criteria:

Indicate any non-key constraints (criteria) of the table operation here. These are a part of the **WHERE** clause of the SQL.

Place the attributes (columns) of the table operation that you want to see displayed in the Field row. This is the **SELECT** clause of the SQL statement.

**FIT 100**

Queries Can Do More Than Show Columns...

- ❖ Records with specific properties can be tested

Query1 : Select Query					
DateOfVisit	TrackingNumber	DrugTes	HIVTes	AidsTe	
12/4/2000	SCCHC871801	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	
12/4/2000		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
12/4/2000		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
12/4/2000		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
5/25/2001	SCCHC4C4846	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	
8/6/2001	SCCHC1312D0E	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	
8/6/2001	SCCHC1312D0F	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	
8/6/2001	SCCHC1312D10	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	
8/6/2001	SCCHC1312D11	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
8/6/2001	SCCHC1312D12	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
8/7/2001		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	

- ❖ We can create a query that keeps only those entries where the Tracking field is not empty and a drug test was requested

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**FIT 100**

How To Specify Criteria For Testing in QBE

- ❖ After identifying the table and columns to be shown, edit the criteria

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**FIT 100**

Changes In the Query are Visible

```
SELECT Visit.DateOfVisit, Visit.TrackingNumber, Visit.DrugTestRequired,
Visit.HIVTestRequired, Visit.AidsTestRequired FROM Visit
WHERE (((Visit.TrackingNumber)<>'') AND ((Visit.DrugTestRequired)=Yes));
```

Query1 : Select Query					
DateOfVisit	TrackingNumber	DrugTes	HIVTes	AidsTe	
12/4/2000	SCCHC871801	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	
12/4/2000		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
12/4/2000		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
12/4/2000		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	

Query1 : Select Query					
DateOfVisit	TrackingNumber	DrugTes	HIVTes	AidsTe	
5/25/2001	SCCHC4C4846	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	
8/6/2001	SCCHC1312D0E	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	
8/6/2001	SCCHC1312D10	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	
8/6/2001	SCCHC1312D12	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
8/6/2001	SCCHC1312D12	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
8/6/2001	SCCHC1312D12	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
8/6/2001	12/4/2000:SCCHC871801	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	

**FIT 100**

At the SCCHC, Starting the Manifest

- ❖ Save any test requests for nonempty tracking numbers created today

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## Making the Manifest Report

- ❖ Once you have a series of queries forming the Manifest and individual test lists, a report and labels can be printed

<i>HIV Tests</i>		
<i>HIVTestRequired</i>	<i>DateOfVisit</i>	<i>TrackingNumber</i>
<i>Yes</i>		
	8/7/2001	SCCHC1312D16
	8/7/2001	SCCHC1312D15
	8/7/2001	SCCHC1312D14
	8/7/2001	SCCHC1312D13

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## Wrapping Up the SCCHC Database

- ❖ There should be a query (virtual table) built for each test offered
- ❖ Labels and Reports can be built from the same queries
- ❖ You will have to take what you have learned today (and read the project description) to figure out how to build additional queries that will prompt a user for the date and then recreate the virtual tables to allow them to enter results back from the labs

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