

Spring2017 : Database- E:\Spring2017.accdb (Access 2007 - 2016 file format) - Access

File Home Create External Data Database Tools Design Tell me what you want to do... Sign in

View Run Select Make Table Append Update Crosstab Delete Union Pass-Through Data Definition Show Table Builder Insert Rows Delete Rows Insert Columns Delete Columns Totals Parameters Property Sheet Table Names

Results Query Type Query Setup Show/Hide

All Access Obj... << Search... Tables student Queries Cimajor

Query1

student

- *
- stuid
- namz
- major
- gpa
- numCr

The logic flowchart shows the logic that I am using in the query. Major and numCr are both on the criteria line which means they are in an AND relationship where both have to be true to display.

AND relationship

Field:	stuid	namz	major	gpa	numCr				
Table:	student	student	student	student	student				
Sort:									
Show:	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Criteria:			"CI"		> 20				
or:									

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All Access Objects

Search...

Tables

- student

Queries

- Clmajor

Query1

stuid	namz	major	gpa	numCr
11111	Susan Ash	CI	4	45
22222	Linda French	CI	3.2	30
21212	Donald Rivers	CI	3.8	25
55555	Ann Costa	CI	3	34
*			0	0

CI AND 720

Record: 1 of 4 No Filter Search

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All Access Obj... Query1

stuid	namz	major	gpa	numCr
11111	Susan Ash	CI	4	45
22222	Linda French	CI	3.2	30
21212	Donald Rivers	CI	3.8	25
55555	Ann Costa	CI	3	34
*			0	0

Microsoft Access

Do you want to save changes to the design of query 'Query1'?

Yes No Cancel

Click here and you will get prompted for a name.

Record: 1 of 4 No Filter Search

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All Access Objects

Search...

Tables

- student

Queries

- Clmajor

stuid	namz	major	gpa	numCr
11111	Susan Ash	CI		
22222	Linda French	CI		
21212	Donald Rivers	CI		
55555	Ann Costa	CI		
*				

Save As

Query Name:
CIandnumCrgr20

OK Cancel

I am now naming the query.

Record: 14 1 of 4 No Filter Search

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Results Query Type Query Setup Show/Hide

All Access Obj... Query1

student

- * stuid
- namz
- major
- gpa
- numCr

Tables student

Queries ClandnumCrgr20 Clmajor

OR Relationship

The logic is for two conditions in an OR relationship. Note that I put the CI on the criteria line and the > 20 on the or line.

Field:	stuid	namz	major	gpa	numCr				
Table:	student	student	student	student	student				
Sort:									
Show:	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Criteria:			"CI"						
or:					>20				

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All Access Objects

Tables: student

Queries: ClandnumCrgr20, CImajor

stuid	namz	major	gpa	numCr
11111	Susan Ash	CI	4	45
22222	Linda French	CI	3.2	30
21212	Donald Rivers	CI	3.8	25
33333	Jane Richards	BU	3	34
44444	Richard Souza	CI	2.9	15
55555	Ann Costa	CI	3	34
*			0	0

Handwritten notes: CI OR > 20

Record: 1 of 6 No Filter Search

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View Run Select Make Table Append Update Crosstab Delete Union Pass-Through Data Definition Show Table Builder Insert Rows Delete Rows Insert Columns Delete Columns Totals Parameters Property Sheet Table Names

Results Query Type Query Setup Show/Hide

All Access Objects Query1

Search... Tables student Queries ClandnumCrgr20 Clmajor ClornumCrgr20

student

- * stuid
- namz
- major
- gpa
- numCr

Handwritten diagram showing relationships between tables and criteria:

- Table **student** is connected to criteria **CI** (N:1), **BU** (N:1), and **gpa > 3** (N:1).
- Criteria **CI** is connected to criteria **gpa > 2** (N:1).
- Criteria **BU** is connected to criteria **gpa > 2** (N:1).
- Criteria **gpa > 2** and **gpa > 3** are connected to a **Display** table via an **AND** relationship.
- Criteria **gpa > 2** and **gpa > 3** are also connected to a **Display** table via an **OR** relationship.

When I make the query CI and gpa > 3 will go on the Criteria line and BU and gpa > 2 will go on the or line.

Field:	stuid	namz	major	gpa	numCr				
Table:	student	student	student	student	student				
Sort:									
Show:	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Criteria:									
or:									

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Results Query Type Query Setup Show/Hide

All Access Obj... << Query1

Search...

Tables

- student

Queries

- ClandnumCrgr20
- Clmajor
- ClornumCrgr20

student

- *
 - stuid
 - namz
 - major
 - gpa
 - numCr

Field:	stuid	namz	major	gpa	numCr				
Table:	student	student	student	student	student				
Sort:									
Show:	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Criteria:			"CI"	> 3					
or:			"BU"	> 2					

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All Access Objects

Search...

Tables

- student

Queries

- ClandnumCrgr20
- Clmajor
- ClornumCrgr20

Query1

stuid	namz	major	gpa	numCr
11111	Susan Ash	CI	4	45
12121	John Doe	BU	2.5	20
22222	Linda French	CI	3.2	30
21212	Donald Rivers	CI	3.8	25
33333	Jane Richards	BU	3	34
*			0	0

Record: 1 of 5 No Filter Search

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Results Query Type Query Setup Show/Hide

All Access Obj... Query1

Search... Tables student Queries ClandnumCrgr20 Clgr3orBUgr2 Clmajor ClornumCrgr20

student

- * stuid
- namz
- major
- gpa
- numCr

MAJOR has to be CI
AND either gpa > 3 or numCr > 20 has to be true.
Note that major has to be CI.

Field:	stuid	namz	major	gpa	numCr
Table:	student	student	student	student	student
Sort:					
Show:	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
Criteria:					
or:					

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Results Query Type Query Setup Show/Hide

All Access Obj... << Query1

Search...

Tables

- student

Queries

- ClandnumCrgr20
- Cigr3orBUgr2
- Cimajor
- ClornumCrgr20

student

- *
 - stuid
 - namz
 - major
 - gpa
 - numCr

Major has to be true so it appears on the criteria line and on the or line.
On the criteria line we need to also test for $gpa > 3$ and on the or line we need to also test for $numCr > 20$.

has to be true

Field:	stuid	namz	major	gpa	numCr				
Table:	student	student	student	student	student				
Sort:									
Show:	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Criteria:			"C"	> 3					
or:			"C"		> 20				

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All Access Objects

Search...

Tables

- student

Queries

- ClandnumCrgr20
- Clgr3orBUgr2
- Clmajor
- ClornumCrgr20

Query1

stuid	namz	major	gpa	numCr
11111	Susan Ash	CI	4	45
22222	Linda French	CI	3.2	30
21212	Donald Rivers	CI	3.8	25
55555	Ann Costa	CI	3	34
*			0	0

CI had to be true

3

→ 20

Record: 1 of 4 No Filter Search

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Results Query Type Query Setup Show/Hide

All Access Objects

Search...

Tables

- student

Queries

- ClandnumCrgr20
- Cigr3orBUgr2
- CImajor
- ClornumCrgr20

Query1

Field:	stuid	namz	major	gpa	numCr			
Table:	student	student	student	student	student			
Sort:								
Show:	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Criteria:			"CI"	>3				
or:					>20			

student

- * stuid
- namz
- major
- gpa
- numCr

CI & > 3
or
> 20

If we take the CI off the or line then it resolves as
major = CI and gpa > 3
or just numCr > 20 so with the or line there is no major check.

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All Access Objects

Tables: student

Queries: ClandnumCrgr20, Clgr3orBUgr2, Clmajor, ClornumCrgr20

stuid	namz	major	gpa	numCr
11111	Susan Ash	CI	4	45
22222	Linda French	CI	3.2	30
21212	Donald Rivers	CI	3.8	25
33333	Jane Richards	BU	3	34
55555	Ann Costa	CI	3	34
*			0	0

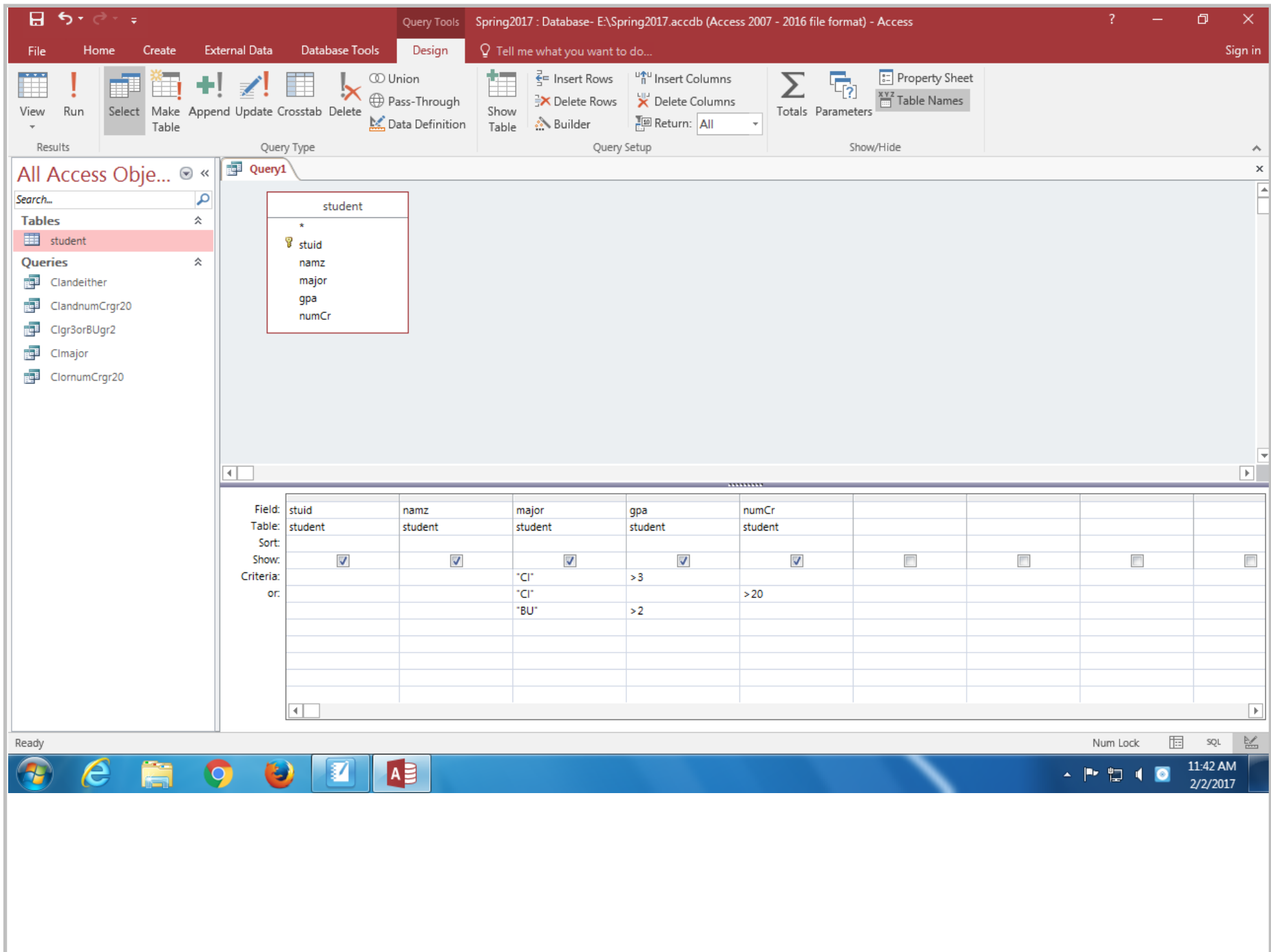
Handwritten note: $\rightarrow 20$

Record: 1 of 5 No Filter Search

Ready Num Lock SQL

Microsoft Access Query Design View for 'Query1' in the 'Spring2017' database. The design grid shows fields from the 'student' table: stuid, namz, major, gpa, and numCr. Handwritten blue notes specify criteria: 'CI > 3' (with 'gpa' written above), 'CI or numCr > 20', and 'BU or > 2'. A blue arrow points to the 'or' label in the criteria row of the design grid.

Field:	stuid	namz	major	gpa	numCr				
Table:	student	student	student	student	student				
Sort:									
Show:	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Criteria:									
or:									



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All Access Objects

Tables: student

Queries: Clandeither, ClandnumCrgr20, Clgr3orBUgr2, Clmajor, ClornumCrgr20

stuid	namz	major	gpa	numCr
11111	Susan Ash	CI	4	45
12121	John Doe	BU	2.5	20
22222	Linda French	CI	3.2	30
21212	Donald Rivers	CI	3.8	25
33333	Jane Richards	BU	3	34
55555	Ann Costa	CI	3	34
*			0	0

Handwritten notes:

- CI and > 3
- BU > 2
- CI and > 20

Record: 1 of 6 No Filter Search

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All Access Objects

Search...

Tables

- student

Queries

- Clandeithier
- ClandnumCrgr20
- Clgr3orBUgr2
- Clmajor
- ClornumCrgr20

Query1

student

- *
- stuid
- namz
- major
- gpa
- numCr

BU or CI stuid gpa >2222 >2.5

Field:	stuid	namz	major	gpa	numCr				
Table:	student	student	student	student	student				
Sort:									
Show:	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Criteria:									
or:									

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View Run Select Make Table Append Update Crosstab Delete Union Pass-Through Data Definition Show Table Builder Return: All Totals Parameters Property Sheet Table Names

All Access Objects

Tables: student

Queries: Clandeither, ClandnumCrgr20, Clgr3orBUgr2, Clmajor, ClornumCrgr20

Query1

student

- *
- stuid
- namz
- major
- gpa
- numCr

Short text

number

Field:	stuid	namz	major	gpa	numCr				
Table:	student	student	student	student	student				
Sort:									
Show:	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Criteria:			"BU"						
or:	>"22222"		"CI"	> 2.5					

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All Access Objects

Tables: student

Queries: Clandeither, ClandnumCrgr20, Clgr3orBUgr2, Clmajor, ClornumCrgr20

Query1

stuid	namz	major	gpa	numCr
12121	John Doe	BU	2.5	20
33333	Jane Richards	BU	3	34
44444	Richard Souza	CI	2.9	15
55555	Ann Costa	CI	3	34
*			0	0

Short text

number

Record: 1 of 4 No Filter Search

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Programming

Comments on chapter #1 in the textbox

Understand the problem

Plan logic — flowchart
pseudocode

Code the program — SOURCE CODE

Compile or interpreter
to translate — OBJECT CODE

Test — with data

Put into production

Maintain

