

Lab 8: Data Manipulation

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Purpose:

Work with tables – Fill the tables with data, extract the data.

Deliverables:

Multiple screenshots, as described through the lab.

Scripts that you used to carry out the actions.

Steps:

1. Insert the following data into the tables you created last lab in database CSE581labs. Make sure that the data matches perfectly.
For each table provide a screenshot of script execution as well as a screenshot of running a select against the table, displaying its data.

USERS:

NTID	FirstName	MiddleI	LastName	EmailAddress	Password
01-HJPotter	Harry	J	Potter	hp@hw.edu	Hedwig
02-RBWeasley	Ron	B	Weasley	rw@hw.edu	Scabbers
03-HJGranger	Hermione	J	Granger	hg@hw.edu	Crookshanks
10-RLupin	Remus	<NULL>	Lupin	rl@hw.edu	moon
11-FFlitwick	Filius	<NULL>	Flitwick	ff@hw.edu	<NULL>
16-RHagrid	Rubeus	<NULL>	Hagrid	rh@hw.edu	BuckBeak

SCRIPT:

```
INSERT INTO nsuryapr.users(NTID,FirstName,MiddleName,LastName,Email_Address,Password)
VALUES ('01-HJPotter','Harry','J','Potter','hp@hw.edu','Hedwig')
```

```
INSERT INTO nsuryapr.users(NTID,FirstName,MiddleName,LastName,Email_Address,Password)
VALUES ('02-RBWeasley','Ron','B','Weasley','rw@hw.edu','Scabbers')
```

```
INSERT INTO nsuryapr.users(NTID,FirstName,MiddleName,LastName,Email_Address,Password)
VALUES ('03-HJGranger','Hermione','J','Granger','hg@hw.edu','Crookshanks')
```

```
INSERT INTO nsuryapr.users(NTID,FirstName,MiddleName,LastName,Email_Address,Password)
```

```

VALUES ('10-RLupin', 'Remus', NULL, 'Lupin', 'rl@hw.edu', 'moon')

INSERT INTO nsuryapr.users(NTID, FirstName, MiddleName, LastName, Email_Address, Password)
VALUES ('11-Fflitwick', 'Filius', NULL, 'Flitwick', 'ff@hw.edu', NULL)

INSERT INTO nsuryapr.users(NTID, FirstName, MiddleName, LastName, Email_Address, Password)
VALUES ('16-RHagrid', 'Rubeus', NULL, 'Hagrid', 'rh@hw.edu', 'BuckBeak')

SELECT * FROM nsuryapr.users

```

SQLQuery1.sql - LCS-VC-MSSQL.ad.syr.edu.CSE581labs (nsuryapr (57)) - Microsoft SQL Server Management Studio

File Edit View Query Project Debug Tools Window Help

Object Explorer

Connect CSE581labs Execute Debug ✓

SQLQuery1.sql - LCS-VC-MSSQL.ad.syr.edu (nsuryapr (57))

INSERT INTO nsuryapr.users(NTID, FirstName, MiddleName, LastName, Email_Address, Password)
VALUES ('01-HPotter', 'Harry', 'J', 'Potter', 'hp@hw.edu', 'Hedwig')

Messages (1 row affected)

Properties

Current connection parameters

Aggregate Status

Connection failures

Elapsed time: 00:00:00.168
Finish time: 10/17/2018 4:25:06 PM
Name: LCS-VC-MSSQL.ad.syr.edu
Rows returned: 0
Start time: 10/17/2018 4:25:06 PM
State: Open

Connection

Connection name: LCS-VC-MSSQL.ad.syr.edu (nsuryapr)

Connection Details

Azure Active Directory token i
Connection elapsed time: 00:00:00.168
Connection encryption: Not encrypted
Connection finish time: 10/17/2018 4:25:06 PM
Connection rows returned: 0
Connection start time: 10/17/2018 4:25:06 PM
Connection state: Open
Display name: LCS-VC-MSSQL.ad.syr.edu
Login name: nsuryapr
Server name: LCS-VC-MSSQL.ad.syr.edu
Server version: 10.0.6556
Session Tracing ID: 57

Name: The name of the connection.

Ready Type here to search

Ln 4 Col 1 Ch 1 INS

4:25 PM 10/17/2018

The screenshot shows the Microsoft SQL Server Management Studio interface. The title bar reads "SQLQuery1.sql - LCS-VC-MSSQLLad.syr.edu.CSE581labs (nsuryapr (57)) - Microsoft SQL Server Management Studio". The main window displays a query editor with the following SQL script:

```
INSERT INTO nsuryapr.users (NTID, FirstName, MiddleName, LastName, Email_Address, Password)
VALUES ('01-HPotter', 'Harry', 'J', 'Potter', 'hp@hw.edu', 'Hedwig')

INSERT INTO nsuryapr.users (NTID, FirstName, MiddleName, LastName, Email_Address, Password)
VALUES ('02-RBWeasley', 'Ron', 'B', 'Weasley', 'r@hw.edu', 'Scabbers')

INSERT INTO nsuryapr.users (NTID, FirstName, MiddleName, LastName, Email_Address, Password)
VALUES ('03-HGGranger', 'Hermione', 'J', 'Granger', 'hg@hw.edu', 'Crookshanks')

INSERT INTO nsuryapr.users (NTID, FirstName, MiddleName, LastName, Email_Address, Password)
VALUES ('10-RLupin', 'Remus', NULL, 'Lupin', 'rl@hw.edu', 'Wool')

INSERT INTO nsuryapr.users (NTID, FirstName, MiddleName, LastName, Email_Address, Password)
VALUES ('11-FFlitwick', 'Filius', NULL, 'Flitwick', 'ff@hw.edu', NULL)

INSERT INTO nsuryapr.users (NTID, FirstName, MiddleName, LastName, Email_Address, Password)
VALUES ('16-RAGrid', 'Rubeus', NULL, 'Magrid', 'rh@hw.edu', 'Buckbeak')
```

The results pane shows the message: "10 rows affected". Below the results pane, a status bar indicates "Query executed successfully." The status bar also shows the connection details: "LCS-VC-MSSQLLad.syr.edu (10...)" and "nsuryapr (57) CSE581labs 00:00:00 0 rows".

The left sidebar shows the Object Explorer with several database objects listed under "nsuryapr". A red box highlights the "Columns" node under "nsuryapr.users". Another red box highlights the "Messages" pane.

The right sidebar displays the "Properties" and "Current connection parameters" panes. The "Properties" pane includes sections for "Aggregate Status", "Connection Details", and "Connection". The "Connection Details" section shows the connection name as "LCS-VC-MSSQLLad.syr.edu (nsuryapr)". The "Current connection parameters" pane lists various connection parameters like Elapsed time, Finish time, Name, Rows returned, Start time, and State.

The screenshot shows the Microsoft SQL Server Management Studio interface. The title bar reads "SQLQuery1.sql - LCS-VC-MSSQL.Lad.syr.edu.CSE581labs (nsuryapr (57)) - Microsoft SQL Server Management Studio". The left pane is "Object Explorer" showing database objects like tables and stored procedures. The center pane is "SQLQuery1.sql - LCS-VC-MSSQL.Lad.syr.edu (nsuryapr (57))" containing the query "SELECT * FROM nsuryapr.users". The right pane is "Properties" showing connection parameters and aggregate status. The results pane displays the query results:

NTID	FirstName	MiddleName	LastName	Email_Address	Password
1 01-HUPotter	Harry	J	Potter	hp@fhw.edu	Hedwig
2 02-RWBWeasley	Ron	B	Weasley	rw@fhw.edu	Scabbers
3 03-HUGranger	Hermione	J	Granger	hg@fhw.edu	Crookshanks
4 10-RLupin	Remus	NULL	Lupin	rl@fhw.edu	moon
5 11-FRitwick	Filius	NULL	Ritwick	#@fhw.edu	NULL
6 16-RRhagrid	Rubeus	NULL	Hagrid	rh@fhw.edu	BuckBeak

Below the results, a message says "Query executed successfully." The status bar at the bottom shows "LCS-VC-MSSQL.Lad.syr.edu (10... nsuryapr (57) CSE581labs 00:00:00 6 rows".

COURSES:

CourseID	CourseCode	CourseTitle	Faculty	OpenSeats
1	DADA101	Defence Against the Dark Arts BASIC	10-Rlupin	3
2	DADA201	Defence Against the Dark Arts INTERMEDIATE	10-Rlupin	2
3	DADA301	Defence Against the Dark Arts ADVANCED	10-Rlupin	1
4	CHMS101	Charms BASIC	11-Fflitwick	2
5	CHMS201	Charms INTERMEDIATE	11-Fflitwick	0
6	CHMS301	Charms ADVANCED	11-Fflitwick	4
7	HOM101	History of Magic BASIC	<NULL>	10

SCRIPT:

```
INSERT INTO nsuryapr.Courses(CourseCode,CourseTitle,Faculty,OpenSeats)
VALUES ('DADA101','Defence Against the Dark Arts BASIC','10-Rlupin',3)

INSERT INTO nsuryapr.Courses(CourseCode,CourseTitle,Faculty,OpenSeats)
VALUES ('DADA201','Defence Against the Dark Arts INTERMEDIATE','10-Rlupin',2)

INSERT INTO nsuryapr.Courses(CourseCode,CourseTitle,Faculty,OpenSeats)
VALUES ('DADA301','Defence Against the Dark Arts ADVANCED','10-Rlupin',1)

INSERT INTO nsuryapr.Courses(CourseCode,CourseTitle,Faculty,OpenSeats)
VALUES ('CHMS101','Charms BASIC','11-Fflitwick',2)

INSERT INTO nsuryapr.Courses(CourseCode,CourseTitle,Faculty,OpenSeats)
VALUES ('CHMS201','Charms INTERMEDIATE','11-Fflitwick',0)

INSERT INTO nsuryapr.Courses(CourseCode,CourseTitle,Faculty,OpenSeats)
VALUES ('CHMS301','Charms ADVANCED','11-Fflitwick',4)

INSERT INTO nsuryapr.Courses(CourseCode,CourseTitle,Faculty,OpenSeats)
VALUES ('HOM101','History of Magic BASIC',NULL,10)

SELECT * FROM nsuryapr.Courses
```

SQLQuery1.sql - LCS-VC-MSSQL.ad.syr.edu.CSE581labs (nsuryapr (57)* - Microsoft SQL Server Management Studio

File Edit View Query Project Debug Tools Window Help

Object Explorer

SQLQuery1.sql - LCS...abs(nsuryapr (57)* - Microsoft SQL Server Management Studio

nsingh02.CourseEnrollment
nsingh02.CourseGrade
nsingh02.Courses
nsingh02.LetterGrades
nsingh02.Users
nsuryapr.CourseEnrollment
nsuryapr.CourseGrade
nsuryapr.Courses
nsuryapr.LetterGrades
nsuryapr.Users
pmjaradi.CourseEnrollment
pmjaradi.CourseGrade
pmjaradi.Courses
pmjaradi.LetterGrades
pmjaradi.Users
perez01.CourseEnrollment
perez01.CourseGrade
perez01.Courses
perez01.LetterGrades
perez01.Users
pxu105.CourseEnrollment
pxu105.CourseGrade
pxu105.Courses

nsuryapr.Courses
Columns
CourseId (PK, int, not null)
CourseCode (varchar(10), not null)
CourseTitle (varchar(50), not null)
Faculty (FK, varchar(20), null)
OpenSeats (int, not null)

Keys
Constraints
Triggers
Indexes
Statistics

nsuryapr.LetterGrades
nsuryapr.Users
pmjaradi.CourseEnrollment
pmjaradi.CourseGrade
pmjaradi.Courses
pmjaradi.LetterGrades
pmjaradi.Users
perez01.CourseEnrollment
perez01.CourseGrade
perez01.Courses
perez01.LetterGrades
perez01.Users
pxu105.CourseEnrollment
pxu105.CourseGrade
pxu105.Courses

SQLQuery1.sql - LCS...abs(nsuryapr (57)* - Microsoft SQL Server Management Studio

```
INSERT INTO nsuryapr.Courses(CourseCode,CourseTitle,Faculty,OpenSeats)
VALUES ('DADA101','Defence Against the Dark Arts BASIC','10-R Lupin',3)
```

Messages

(1 row affected)

Properties

Current connection parameters

Aggregate Status

Connection failures

Elapsed time 00:00:00.037
Finish time 10/17/2018 4:48:24 PM
Name LCS-VC-MSSQL.ad.syr.edu
Rows returned 0
Start time 10/17/2018 4:48:24 PM
State Open

Connection

Connection name LCS-VC-MSSQL.ad.syr.edu (nsuryapr)

Connection Details

Azure Active Directory token i

Connection elapsed time 00:00:00.037
Connection encryption Not encrypted
Connection finish time 10/17/2018 4:48:24 PM
Connection rows returned 0
Connection start time 10/17/2018 4:48:24 PM
Connection state Open
Display name LCS-VC-MSSQL.ad.syr.edu
Login name nsuryapr
Server name LCS-VC-MSSQL.ad.syr.edu
Server version 10.0.6556
Session Tracing ID
SPID 57

Name The name of the connection.

Ready Type here to search

Ln 2 Col 1 Ch 1 INS

4:48 PM 10/17/2018

SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu.CSE581labs (nsuryapr (52)* - Microsoft SQL Server Management Studio

File Edit View Query Project Debug Tools Window Help

Object Explorer

SQLQuery3.sql - LCS...abs(nsuryapr (52)* - Microsoft SQL Server Management Studio

kchou1.LetterGrades
kchou1.Users
kchou1.CourseEnrollment
kchou1.CourseGrade
kchou1.Courses
kchou1.LetterGrades
kchou1.Users
mwang36.CourseEnrollment
mwang36.CourseGrade
mwang36.Courses
mwang36.LetterGrades
mwang36.test0
mwang36.Users
mzhang03.CourseEnrollment
mzhang03.CourseGrade
mzhang03.Courses
mzhang03.LetterGrades
mzhang03.Users
nsaei.CourseEnrollment
nsaei.CourseGrade
nsaei.Courses
nsaei.LetterGrades
nsaei.Users
nsingh02.CourseEnrollment
nsingh02.CourseGrade
nsingh02.Courses
nsingh02.LetterGrades
nsingh02.Users
nsuryapr.CourseEnrollment
nsuryapr.CourseGrade
nsuryapr.Courses
nsuryapr.LetterGrades
nsuryapr.Users
pmjaradi.CourseEnrollment
pmjaradi.CourseGrade
pmjaradi.Courses

nsuryapr.Courses
CourseCode,CourseTitle,Faculty,OpenSeats
VALUES ('DADA101','Defence Against the Dark Arts BASIC','10-R Lupin',3)

nsuryapr.Courses
CourseCode,CourseTitle,Faculty,OpenSeats
VALUES ('DADA201','Defence Against the Dark Arts INTERMEDIATE','10-R Lupin',2)

nsuryapr.Courses
CourseCode,CourseTitle,Faculty,OpenSeats
VALUES ('DADA301','Defence Against the Dark Arts ADVANCED','10-R Lupin',1)

nsuryapr.Courses
CourseCode,CourseTitle,Faculty,OpenSeats
VALUES ('CHMS101','Charms BASIC','11-F Flitwick',2)

nsuryapr.Courses
CourseCode,CourseTitle,Faculty,OpenSeats
VALUES ('CHMS201','Charms INTERMEDIATE','11-F Flitwick',0)

nsuryapr.Courses
CourseCode,CourseTitle,Faculty,OpenSeats
VALUES ('CHMS301','Charms ADVANCED','11-F Flitwick',4)

nsuryapr.Courses
CourseCode,CourseTitle,Faculty,OpenSeats
VALUES ('HOM101','History of Magic BASIC',NULL,10)

Messages

(1 row affected)

Properties

Current connection parameters

Aggregate Status

Connection failures

Elapsed time 00:00:00.075
Finish time 10/17/2018 6:00:12 PM
Name LCS-VC-MSSQL.ad.syr.edu
Rows returned 0
Start time 10/17/2018 6:00:12 PM
State Open

Connection

Connection name LCS-VC-MSSQL.ad.syr.edu (nsuryapr)

Connection Details

Azure Active Directory token i

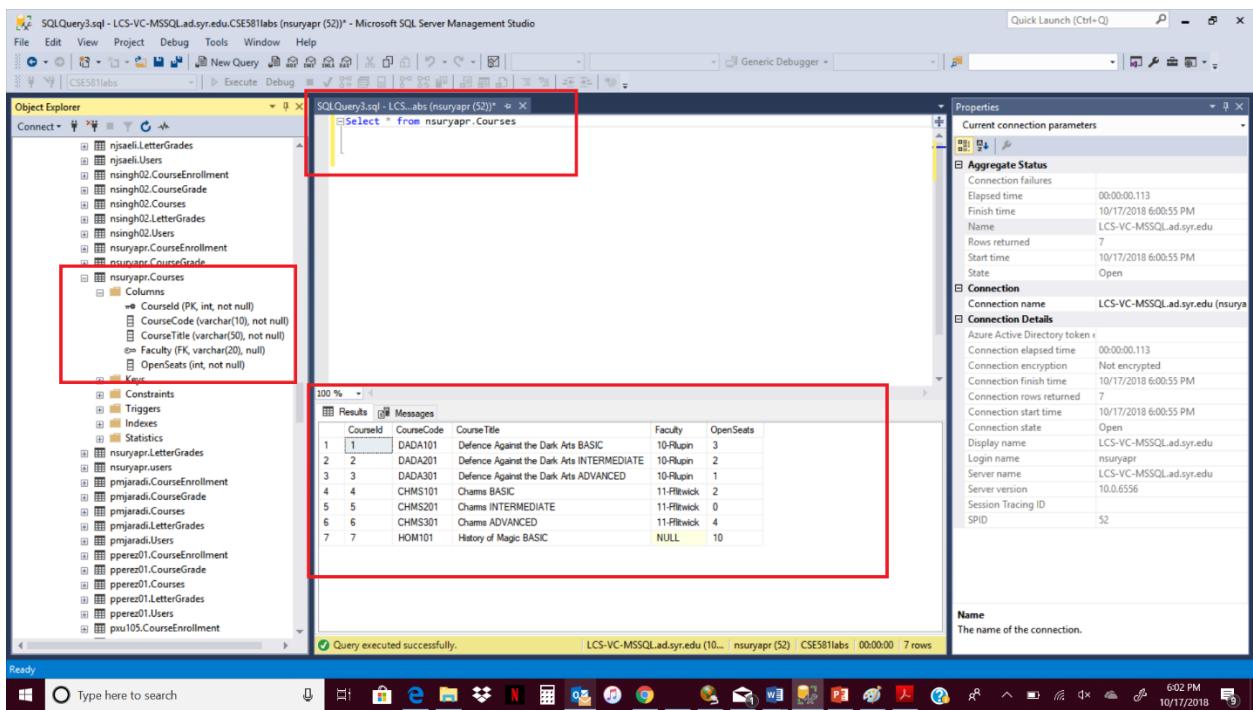
Connection elapsed time 00:00:00.075
Connection encryption Not encrypted
Connection finish time 10/17/2018 6:00:12 PM
Connection rows returned 0
Connection start time 10/17/2018 6:00:12 PM
Connection state Open
Display name LCS-VC-MSSQL.ad.syr.edu
Login name nsuryapr
Server name LCS-VC-MSSQL.ad.syr.edu
Server version 10.0.6556
Session Tracing ID
SPID 52

Name The name of the connection.

Ready Type here to search

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6:00 PM 10/17/2018



LETTER GRADES:

LetterGradeID	LetterGrade	Description
1	O	Outstanding
2	E	Exceeds Expectations
3	A	Acceptable
4	P	Poor
5	D	Dreadful
6	T	Troll

SCRIPT:

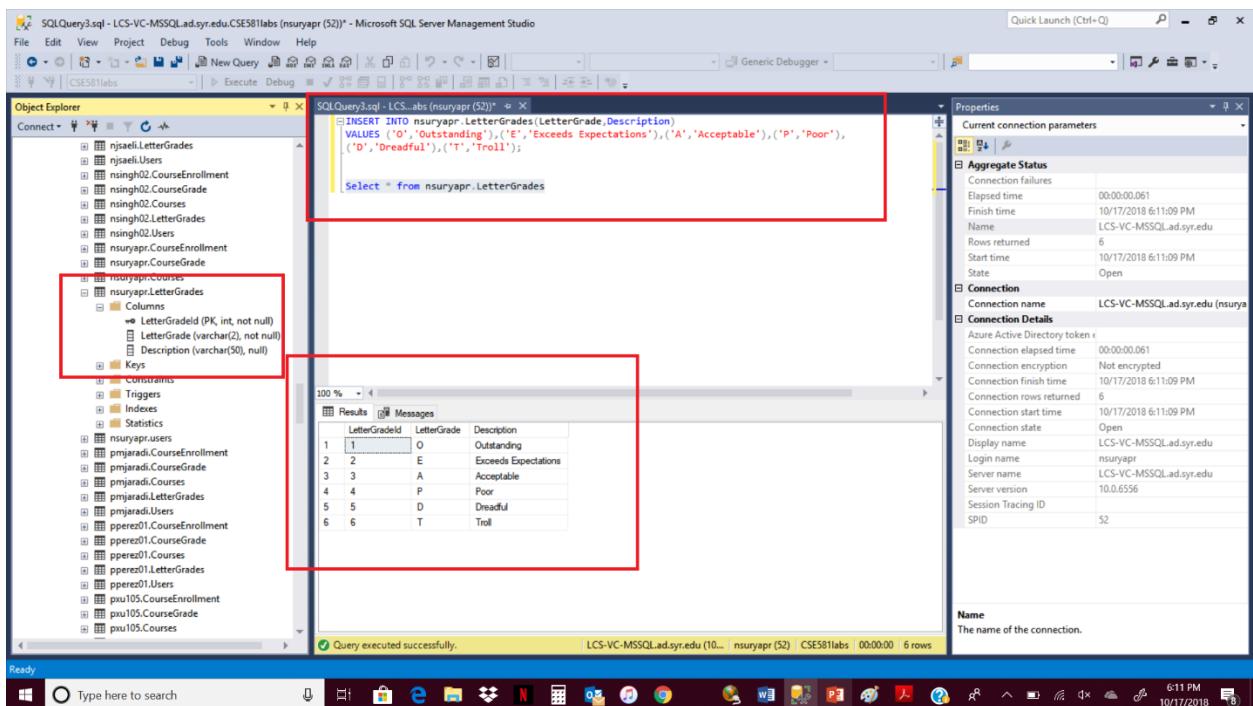
```
INSERT INTO nsuryapr.LetterGrades(LetterGrade,Description)
VALUES ('O','Outstanding'),('E','Exceeds Expectations'),('A','Acceptable'),('P','Poor'),
('D','Dreadful'),('T','Troll');
```

```
Select * from nsuryapr.LetterGrades
```

The screenshot shows the Microsoft SQL Server Management Studio interface. The left pane displays the Object Explorer with various database objects like tables, users, and courses. The central pane contains a query window titled "SQLQuery3.sql - LCS...abs (nsuryapr (52))". A red box highlights the query itself:

```
INSERT INTO nsuryapr.LetterGrades(LetterGrade,Description)
VALUES ('O','Outstanding'),('E','Exceeds Expectations'),('A','Acceptable'),('P','Poor'),
('D','Dreadful'),('T','Troll');
```

Below the query window, another red box highlights the "Messages" tab in the results pane, which shows the output: "(6 rows affected)". The status bar at the bottom indicates "Query executed successfully." The right pane shows the "Properties" for the current connection, including details like connection name, elapsed time, and session tracing ID.



COURSE GRADING:

GradingScaleID	LetterGradeID	CourseID	GradeValue
1	1	1	95
2	2	1	90
3	3	1	80
4	4	1	70
5	5	1	60
6	6	1	0
7	1	2	100
8	2	2	90
9	3	2	85
10	4	2	75
11	5	2	64
12	6	2	0

SCRIPT:

```
INSERT INTO nsuryapr.CourseGrade(LetterGradeId,CourseId,GradeValue) VALUES
(1,1,95),(2,1,90),(3,1,80),(4,1,70),(5,1,60),(6,1,0),(1,2,100),
(2,2,90),(3,2,85),(4,2,75),(5,2,64),(6,2,0);
```

```
SELECT * FROM nsuryapr.CourseGrade
```

The screenshot shows the Microsoft SQL Server Management Studio interface. In the center, a query window displays the following SQL code:

```
INSERT INTO nsuryapr.CourseGrade(LetterGradeId,CourseId,GradeValue) VALUES
(1,1,95),(2,1,90),(3,1,80),(4,1,70),(5,1,60),(6,1,0),(1,2,100),
(2,2,90),(3,2,85),(4,2,75),(5,2,64),(6,2,0);
```

The 'Messages' pane at the bottom right shows the result: '(12 rows affected)'. The 'Properties' window on the right shows connection details and aggregate status. The 'Object Explorer' on the left lists various database objects.

SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu.CSE581labs (nsuryapr (52)) - Microsoft SQL Server Management Studio

File Edit View Project Debug Tools Window Help

New Query Execute Debug Generic Debugger

Object Explorer

SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu.CSE581labs (nsuryapr (52))

```
INSERT INTO nsuryapr.CourseGrade(LetterGradeId,CourseId,GradeValue) VALUES
(1,1,95),(2,1,90),(3,1,80),(4,1,70),(5,1,60),(6,1,0),(1,2,100),
(2,2,98),(3,2,85),(4,2,75),(5,2,64),(6,2,0);
SELECT * FROM nsuryapr.CourseGrade
```

Properties

Aggregate Status

Connection

Connection Details

Results

GradingScaled	LetterGradeId	CourseId	GradeValue
1	1	1	95
2	2	1	90
3	3	1	80
4	4	1	70
5	5	1	60
6	6	1	0
7	1	2	100
8	2	2	90
9	3	2	85
10	4	2	75
11	5	2	64
12	6	2	0

Query executed successfully.

LCS-VC-MSSQL.ad.syr.edu [10... nsuryapr (52) CSE581labs 00:00:00 | 12 rows

Ready Type here to search

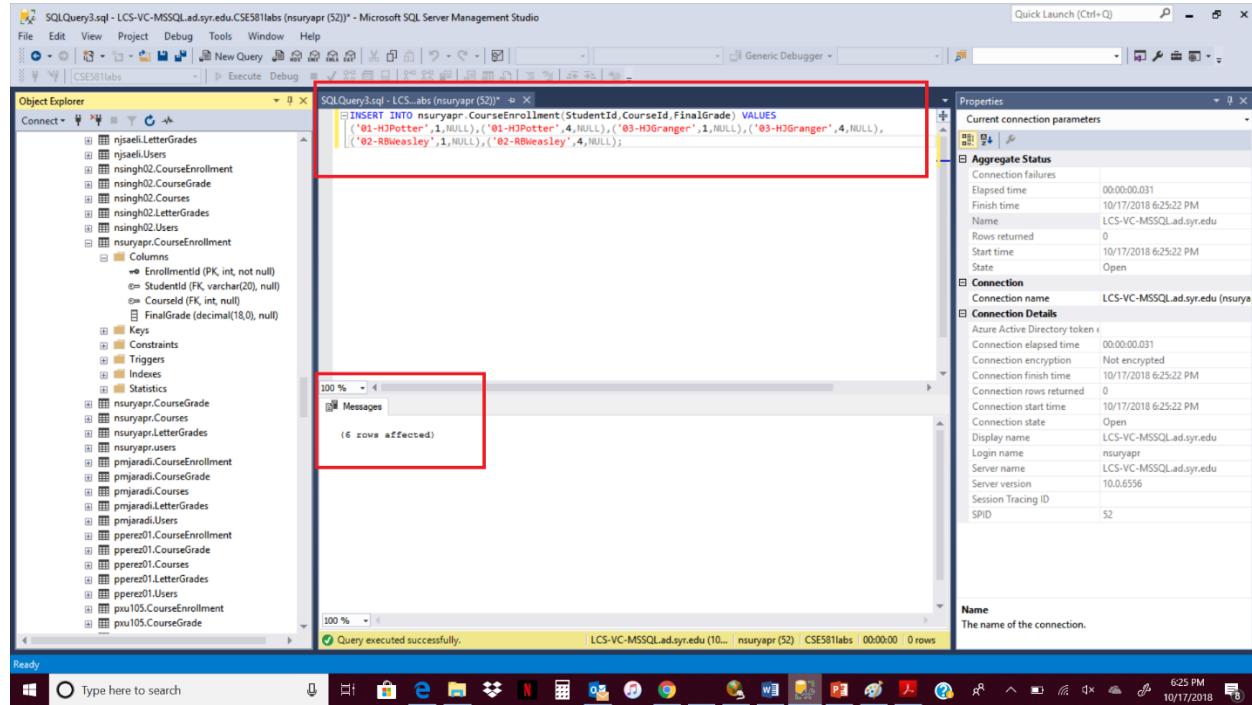
COURSE ENROLLMENT:

EnrollmentID	StudentId	CourseID	FinalGrade
1	01-HJPotter	1	<NULL>
2	01-HJPotter	4	<NULL>
3	03-HJGranger	1	<NULL>
4	03-HJGranger	4	<NULL>
5	02-RBWeasley	1	<NULL>
6	02-RBWeasley	4	<NULL>

SCRIPT:

```
INSERT INTO nsuryapr.CourseEnrollment(StudentId,CourseId,FinalGrade) VALUES  
('01-HJPotter',1,NULL),('01-HJPotter',4,NULL),('03-HJGranger',1,NULL),('03-HJGranger',4,NULL),  
('02-RBWeasley',1,NULL),('02-RBWeasley',4,NULL);
```

```
SELECT * FROM nsuryapr.CourseEnrollment
```



SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu.CSE581labs (nsuryapr (52)) - Microsoft SQL Server Management Studio

File Edit View Query Project Debug Tools Window Help

New Query Execute Debug

Object Explorer

SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu.CSE581labs (nsuryapr (52))

```

INSERT INTO nsuryapr.CourseEnrollment(StudentId,CourseId,FinalGrade) VALUES
('01-HPotter',1,NULL),('01-HPotter',4,NULL),('03-HGranger',1,NULL),('03-HGranger',4,NULL),
('02-RWeasley',1,NULL),('02-RWeasley',4,NULL)
```

SELECT * FROM nsuryapr.CourseEnrollment

Properties

Aggregate Status

Connection

Connection Details

Results

Messages

EnrollmentId	StudentId	CourseId	FinalGrade
1	01-HPotter	1	NULL
2	01-HPotter	4	NULL
3	03-HGranger	1	NULL
4	03-HGranger	4	NULL
5	02-RWeasley	1	NULL
6	02-RWeasley	4	NULL

Query executed successfully.

LCS-VC-MSSQL.ad.syr.edu (10... nsuryapr (52) CSE581labs 00:00:00 6 rows

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2. Make the following updates (use UPDATE and DELETE, as needed):

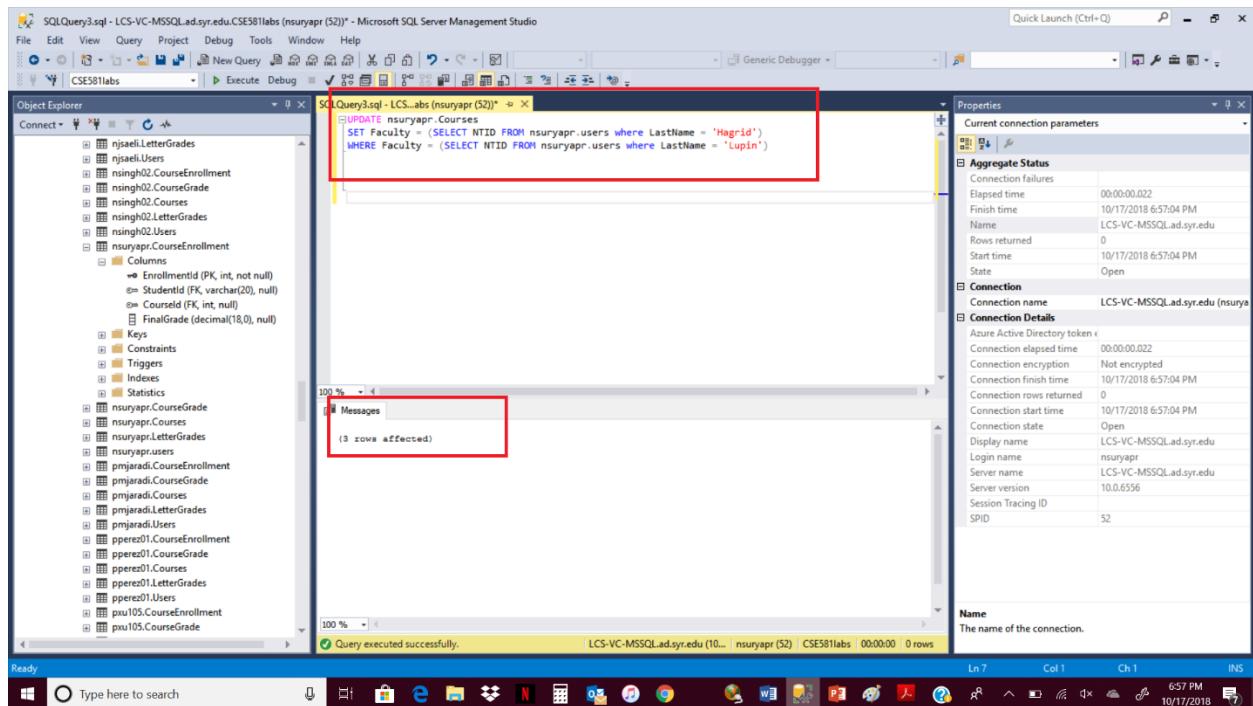
For each data modification provide a screenshot of script execution. When all of the changes were done, also provide a screenshot of all tables, displaying the new data.

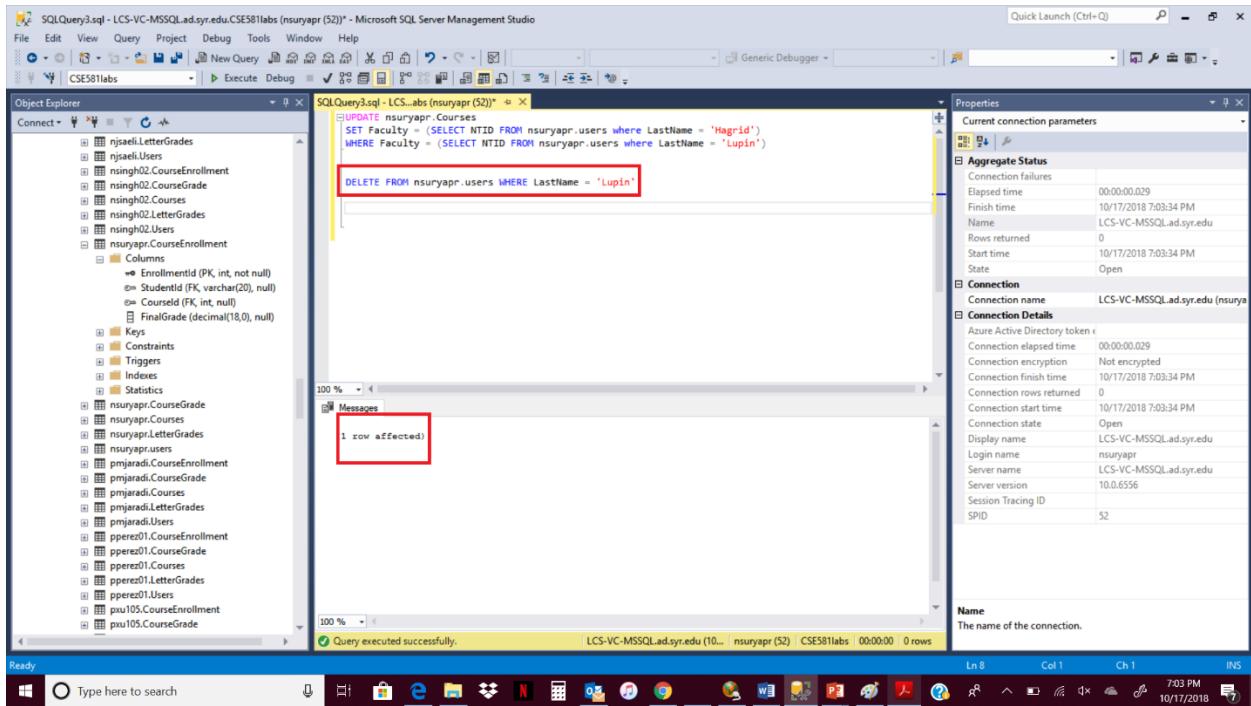
- a) Lupin has been fired. Assign his classes to Hagrid. Remove Lupin from the database.

SCRIPT:

```
UPDATE nsuryapr.Courses
SET Faculty = (SELECT NTID FROM nsuryapr.users where LastName = 'Hagrid')
WHERE Faculty = (SELECT NTID FROM nsuryapr.users where LastName = 'Lupin')

DELETE FROM nsuryapr.users WHERE LastName = 'Lupin'
```





b) Harry has received a final grade of 96 in Defence Against the Dark Arts, and 91 in Charms.

SCRIPT:

```

UPDATE nsuryapr.CourseEnrollment
SET FinalGrade = 96
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Harry')
and CourseId in ( SELECT CourseId FROM nsuryapr.Courses where CourseTitle like
'%Defence Against the Dark Arts%')

UPDATE nsuryapr.CourseEnrollment
SET FinalGrade = 91
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Harry')
and CourseId in ( SELECT CourseId FROM nsuryapr.Courses where CourseTitle like
'%Charms%' )

Select * from nsuryapr.CourseEnrollment

```

SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu (nsuryapr (52)) - Microsoft SQL Server Management Studio

File Edit View Query Project Debug Tools Window Help

Object Explorer

Connect CSE581labs Execute Debug

SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu (nsuryapr (52))

```
UPDATE nsuryapr.CourseEnrollment
SET FinalGrade = 96
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Harry')
and CourseId in (SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Defence Against the Dark Arts%')
```

Properties

Aggregate Status

Connection failures

Elapsed time 00:00:00.25

Finish time 10/17/2018 7:21:02 PM

Name LCS-VC-MSSQL.ad.syr.e

Rows returned 0

Start time 10/17/2018 7:21:02 PM

State Open

Connection

Connection name LCS-VC-MSSQL.ad.syr.e

Connection Details

Azure Active Direct

Connection elapse: 00:00:00.25

Connection encrypt: Not encrypted

Connection finish t: 10/17/2018 7:21:02 PM

Connection rows 0

Connection start t: 10/17/2018 7:21:02 PM

Connection state Open

Display name LCS-VC-MSSQL.ad.syr.e

Login name nsuryapr

Server name LCS-VC-MSSQL.ad.syr.e

Server version 10.0.6556

Session Tracing ID 52

SPID 52

Messages

(1 row affected)

Query executed successfully.

LCS-VC-MSSQL.ad.syr.edu [10... | nsuryapr (52) | CSE581labs | 00:00:00 | 0 rows

Ready Type here to search

Ln 3 Col 1 Ch 1 INS

7:21 PM 10/17/2018

SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu (nsuryapr (52)) - Microsoft SQL Server Management Studio

File Edit View Query Project Debug Tools Window Help

Object Explorer

Connect CSE581labs Execute Debug

SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu (nsuryapr (52))

```
UPDATE nsuryapr.CourseEnrollment
SET FinalGrade = 96
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Harry')
and CourseId in (SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Defence Against the Dark Arts%')
```

```
UPDATE nsuryapr.CourseEnrollment
SET FinalGrade = 91
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Harry')
and CourseId in (SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Charms%')
```

Properties

Aggregate Status

Connection failures

Elapsed time 00:00:00.36

Finish time 10/17/2018 7:22:23 PM

Name LCS-VC-MSSQL.ad.syr.e

Rows returned 0

Start time 10/17/2018 7:22:23 PM

State Open

Connection

Connection name LCS-VC-MSSQL.ad.syr.e

Connection Details

Azure Active Direct

Connection elapse: 00:00:00.36

Connection encrypt: Not encrypted

Connection finish t: 10/17/2018 7:22:23 PM

Connection rows 0

Connection start t: 10/17/2018 7:22:23 PM

Connection state Open

Display name LCS-VC-MSSQL.ad.syr.e

Login name nsuryapr

Server name LCS-VC-MSSQL.ad.syr.e

Server version 10.0.6556

Session Tracing ID 52

SPID 52

Messages

(1 row affected)

Query executed successfully.

LCS-VC-MSSQL.ad.syr.edu [10... | nsuryapr (52) | CSE581labs | 00:00:00 | 0 rows

Ready Type here to search

Ln 9 Col 94 Ch 94 INS

7:22 PM 10/17/2018

```

SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu.CSE581labs (nsuryapr [52]) - Microsoft SQL Server Management Studio
File Edit View Query Project Debug Tools Window Help
New Query Execute Debug
Object Explorer
Connect CSE581labs Properties
nsuryapr.LetterGrades Current connection parameters
nsuryapr.Users Aggregate Status
nsuryapr.CourseEnrollment Connection failures
nsuryapr.CourseGrade Elapsed time 00:00:00.047
nsuryapr2.CourseEnrollment Finish time 10/17/2018 7:23:27 PM
nsuryapr2.CourseGrade Name LCS-VC-MSSQL.ad.syr.e
nsuryapr2.Courses Rows returned 6
nsuryapr2.LetterGrades Start time 10/17/2018 7:23:27 PM
nsuryapr2.Users State Open
nsuryapr.CourseEnrollment Connection Connection name LCS-VC-MSSQL.ad.syr.e
nsuryapr.CourseGrade Connection Details
nsuryapr.Courses Azure Active Direct
nsuryapr.LetterGrades Connection elapse: 00:00:00.047
nsuryapr.Users Connection encrypt: Not encrypted
nsuryapradi.CourseEnrollment Connection finish t 10/17/2018 7:23:27 PM
nsuryapradi.CourseGrade Connection rows t 6
nsuryapradi.Courses Connection start t 10/17/2018 7:23:27 PM
nsuryapradi.LetterGrades Connection state Open
nsuryapradi.Users Display name LCS-VC-MSSQL.ad.syr.e
nsuryapr01.CourseEnrollment Login name nsuryapr
nsuryapr01.CourseGrade Server name LCS-VC-MSSQL.ad.syr.e
nsuryapr01.Courses Server version 10.0.6556
nsuryapr01.LetterGrades Session Tracing ID
nsuryapr01.Users SPID 52
nsuryapr01.CourseEnrollment
nsuryapr01.CourseGrade
nsuryapr01.Courses
nsuryapr01.LetterGrades
nsuryapr01.Users
pxu105.CourseEnrollment
pxu105.CourseGrade

```

```

UPDATE nsuryapr.CourseEnrollment
SET FinalGrade = 96
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Harry')
and CourseId in ( SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Defence Against the Dark Arts%')

UPDATE nsuryapr.CourseEnrollment
SET FinalGrade = 91
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Harry')
and CourseId in ( SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Charms%')

Select * from nsuryapr.CourseEnrollment

```

Results

EnrollmentId	StudentId	CourseId	FinalGrade
1	01-HPotter	1	96
2	01-HPotter	4	91
3	03-HGranger	1	NULL
4	03-HGranger	4	NULL
5	02-RBWeasley	1	NULL
6	02-RBWeasley	4	NULL

Query executed successfully.

c) Ron has received a final grade of 91 in Defence Against the Dark Arts, and 88 in Charms.

SCRIPT:

```

UPDATE nsuryapr.CourseEnrollment
SET FinalGrade = 91
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Ron')
and CourseId in ( SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Defence Against the Dark Arts%')

UPDATE nsuryapr.CourseEnrollment
SET FinalGrade = 88
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Ron')
and CourseId in ( SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Charms%')

Select * from nsuryapr.CourseEnrollment

```

The screenshot shows the Microsoft SQL Server Management Studio interface. The left pane displays the Object Explorer with various database objects like tables, stored procedures, and triggers. The central pane contains a query window titled 'SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu.CSE581labs (nsuryapr (52)) - Microsoft SQL Server Management Studio'. The query is:`UPDATE nsuryapr.CourseEnrollment
SET FinalGrade = 91
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Ron')
and CourseId in (SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Defence Against the Dark Arts%')

UPDATE nsuryapr.CourseEnrollment
SET FinalGrade = 88
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Ron')
and CourseId in (SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Charms%')

Select * from nsuryapr.CourseEnrollment`

The output window shows a message '(1 row affected)' in a red box. The status bar at the bottom indicates 'Query executed successfully.' The right pane shows connection details and properties.

This screenshot is identical to the one above, showing the same query execution in Microsoft SQL Server Management Studio. The query updates student course enrollment records based on their first name and course title. The output window shows '(1 row affected)' in a red box, and the status bar indicates 'Query executed successfully.' The right pane displays connection and session information.

The screenshot shows the Microsoft SQL Server Management Studio interface. The title bar reads "SQLQuery3.sql - LCS-VC-MSSQL.Lad.syr.edu.CSE581labs (nsuryapr (52)) - Microsoft SQL Server Management Studio". The left pane is the Object Explorer, displaying database objects like tables and stored procedures. The center pane is the Query Editor window, which contains the following T-SQL code:

```
SET FinalGrade = 91
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Ron')
and CourseId in (SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Defence Against the Dark Arts%')

UPDATE nsuryapr.CourseEnrollment
SET FinalGrade = 88
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Ron')
and CourseId in (SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Charm%')

Select * from nsuryapr.CourseEnrollment
```

The last line of the code, "Select * from nsuryapr.CourseEnrollment", is highlighted with a red box. Below the code, the Results pane displays the following data:

EnrollmentId	StudentId	CourseId	FinalGrade
1	01-HPotter	1	96
2	01-HPotter	4	91
3	03-HGranger	1	NULL
4	03-HGranger	4	NULL
5	02-RBWeasley	1	91
6	02-RBWeasley	4	88

The Results pane is also highlighted with a red box. At the bottom of the screen, a message bar says "Query executed successfully." The status bar at the bottom right shows "LCS-VC-MSSQL.Lad.syr.edu (10... nsuryapr (52) CSE581labs 00:00:00 6 rows". The system tray icons are visible at the bottom.

d) Hermione has received a final grade of 92 in Defence Against the Dark Arts, and 99 in Charms.

SCRIPT:

```
UPDATE nsuryapr.CourseEnrollment  
SET FinalGrade = 92  
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Hermione')  
and CourseId in ( SELECT CourseId FROM nsuryapr.Courses where CourseTitle like  
'%Defence Against the Dark Arts%')
```

```
UPDATE nsuryapr.CourseEnrollment  
SET FinalGrade = 99  
WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Hermione')  
and CourseId in ( SELECT CourseId FROM nsuryapr.Courses where CourseTitle like  
'%Charms%' )
```

```
Select * from nsuryapr.CourseEnrollment
```

SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu.CSE581labs (nsuryapr (52)) - Microsoft SQL Server Management Studio

```

File Edit View Project Debug Tools Window Help
New Query Execute Debug
Object Explorer
Connect CSE581labs
    nsjseil.LetterGrades
    nsjseil.Users
    nsingh02.CourseEnrollment
    nsingh02.CourseGrade
    nsingh02.Courses
    nsingh02.LetterGrades
    nsingh02.Users
    nsuryapr.CourseEnrollment
        Columns
            EnrollmentId (PK, int, not null)
            StudentId (FK, varchar(20), null)
            CourseId (FK, int, null)
            FinalGrade (decimal(18,0), null)
        Keys
        Constraints
        Triggers
        Indexes
        Statistics
    nsuryapr.CourseGrade
    nsuryapr.Courses
    nsuryapr.LetterGrades
    nsuryapr.Users
    pmyaradi.CourseEnrollment
    pmyaradi.CourseGrade
    pmyaradi.Courses
    pmyaradi.LetterGrades
    pmyaradi.Users
    pperez01.CourseEnrollment
    pperez01.CourseGrade
    pperez01.Courses
    pperez01.LetterGrades
    pperez01.Users
    pxu105.CourseEnrollment
    pxu105.CourseGrade
SQLQuery3.sql - LCS...abs(nsuryapr (52)) - Microsoft SQL Server Management Studio
    UPDATE nsuryapr.CourseEnrollment
    SET FinalGrade = 92
    WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Hermione')
        and CourseId in ( SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Defence Against the Dark Arts%')
    UPDATE nsuryapr.CourseEnrollment
    SET FinalGrade = 99
    WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Hermione')
        and CourseId in ( SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Charm%')
Select * from nsuryapr.CourseEnrollment

```

Messages

(1 row affected)

(1 row affected)

Query executed successfully.

Properties

Aggregate Status

Connection failures

Elapsed time 00:00:00.048

Finish time 10/17/2018 7:32:27 PM

Name LCS-VC-MSSQL.ad.syr.e

Rows returned 0

Start time 10/17/2018 7:32:27 PM

State Open

Connection

Connection name LCS-VC-MSSQL.ad.syr.e

Connection Details

Azure Active Direct

Connection elapse: 00:00:00.048

Connection encrypt: Not encrypted

Connection finish t 10/17/2018 7:32:27 PM

Connection rows 0

Connection start t 10/17/2018 7:32:27 PM

Connection state Open

Display name LCS-VC-MSSQL.ad.syr.e

Login name nsuryapr

Server name LCS-VC-MSSQL.ad.syr.e

Server version 10.0.6556

Session Tracing ID 52

SPID 52

Name

The name of the connection.

Ready Type here to search

Ln 9 Col 94 Ch 94 INS

7:32 PM 10/17/2018

SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu.CSE581labs (nsuryapr (52)) - Microsoft SQL Server Management Studio

```

File Edit View Project Debug Tools Window Help
New Query Execute Debug
Object Explorer
Connect CSE581labs
    nsjseil.LetterGrades
    nsjseil.Users
    nsingh02.CourseEnrollment
    nsingh02.CourseGrade
    nsingh02.Courses
    nsingh02.LetterGrades
    nsingh02.Users
    nsuryapr.CourseEnrollment
        Columns
            EnrollmentId (PK, int, not null)
            StudentId (FK, varchar(20), null)
            CourseId (FK, int, null)
            FinalGrade (decimal(18,0), null)
        Keys
        Constraints
        Triggers
        Indexes
        Statistics
    nsuryapr.CourseGrade
    nsuryapr.Courses
    nsuryapr.LetterGrades
    nsuryapr.Users
    pmyaradi.CourseEnrollment
    pmyaradi.CourseGrade
    pmyaradi.Courses
    pmyaradi.LetterGrades
    pmyaradi.Users
    pperez01.CourseEnrollment
    pperez01.CourseGrade
    pperez01.Courses
    pperez01.LetterGrades
    pperez01.Users
    pxu105.CourseEnrollment
    pxu105.CourseGrade
SQLQuery3.sql - LCS...abs(nsuryapr (52)) - Microsoft SQL Server Management Studio
    UPDATE nsuryapr.CourseEnrollment
    SET FinalGrade = 92
    WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Hermione')
        and CourseId in ( SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Defence Against the Dark Arts%')
    UPDATE nsuryapr.CourseEnrollment
    SET FinalGrade = 99
    WHERE StudentId = (SELECT NTID FROM nsuryapr.users where FirstName = 'Hermione')
        and CourseId in ( SELECT CourseId FROM nsuryapr.Courses where CourseTitle like '%Charm%')
Select * from nsuryapr.CourseEnrollment

```

Results

EnrollmentId	StudentId	CourseId	FinalGrade
1	01-HPotter	1	96
2	01-HPotter	4	91
3	03-HGranger	1	92
4	03-HGranger	4	99
5	02-RBWeasley	1	91
6	02-RBWeasley	4	88

Messages

Query executed successfully.

Properties

Aggregate Status

Connection failures

Elapsed time 00:00:00.113

Finish time 10/17/2018 7:33:04 PM

Name LCS-VC-MSSQL.ad.syr.e

Rows returned 6

Start time 10/17/2018 7:33:04 PM

State Open

Connection

Connection name LCS-VC-MSSQL.ad.syr.e

Connection Details

Azure Active Direct

Connection elapse: 00:00:00.113

Connection encrypt: Not encrypted

Connection finish t 10/17/2018 7:33:04 PM

Connection rows r 6

Connection start t 10/17/2018 7:33:04 PM

Connection state Open

Display name LCS-VC-MSSQL.ad.syr.e

Login name nsuryapr

Server name LCS-VC-MSSQL.ad.syr.e

Server version 10.0.6556

Session Tracing ID 52

SPID 52

Name

The name of the connection.

Ready Type here to search

Ln 11 Col 40 Ch 40 INS

7:33 PM 10/17/2018

e) Enroll Harry in Intermediate Defence Against the Dark Arts.

SCRIPT:

```
INSERT INTO nsuryapr.CourseEnrollment(StudentId,CourseId) VALUES
((SELECT NTID from nsuryapr.users where FirstName = 'Harry'),
 (SELECT CourseId from nsuryapr.Courses where CourseTitle like '%Defence Against
 the Dark Arts INTERMEDIATE%'))
```

```
select * from nsuryapr.CourseEnrollment
```

The screenshot shows the Microsoft SQL Server Management Studio interface. The query window contains the following code:

```
INSERT INTO nsuryapr.CourseEnrollment(StudentId,CourseId) VALUES
((SELECT NTID from nsuryapr.users where FirstName = 'Harry'),
 (SELECT CourseId from nsuryapr.Courses where CourseTitle like '%Defence Against
 the Dark Arts INTERMEDIATE%'))
```

Below the code, the results pane displays a table with 7 rows of data:

EnrollmentId	StudentId	CourseId	FinalGrade
1	01-HPotter	1	96
2	01-HPotter	4	91
3	03-HGranger	1	92
4	03-HGranger	4	99
5	02-RBWasley	1	91
6	02-RBWasley	4	88
7	01-HPotter	2	NULL

The status bar at the bottom of the interface indicates "Query executed successfully."

f) Enroll Hermione in Advanced Charms.

SCRIPT:

```
INSERT INTO nsuryapr.CourseEnrollment(StudentId,CourseId) VALUES
((SELECT NTID from nsuryapr.users where FirstName = 'Hermione'),
 (SELECT CourseId from nsuryapr.Courses where CourseTitle like '%Charms ADVANCED%'))
```

```
select * from nsuryapr.CourseEnrollment
```

SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu.CSE581labs (nsuryapr (52)) - Microsoft SQL Server Management Studio

File Edit View Query Project Debug Tools Window Help

Object Explorer

SQLQuery3.sql - LCS...abs(nsuryapr (52))

```
INSERT INTO nsuryapr.CourseEnrollment(StudentId,CourseId) VALUES
((SELECT NTID from nsuryapr.users where FirstName = 'Hermione'),
(SELECT CourseId from nsuryapr.Courses where CourseTitle like '%Charm's ADVANCED%'))
select * from nsuryapr.CourseEnrollment
```

Properties

Aggregate Status

Connection failures

Elapsed time 00:00:00.29

Finish time 10/17/2018 8:07:56 PM

Name LCS-VC-MSSQL.ad.syr.e

Rows returned 0

Start time 10/17/2018 8:07:56 PM

State Open

Connection

Connection name LCS-VC-MSSQL.ad.syr.e

Connection Details

Azure Active Direct

Connection elapsed: 00:00:00.29

Connection encrypt: Not encrypted

Connection finish t: 10/17/2018 8:07:56 PM

Connection rows: 0

Connection start t: 10/17/2018 8:07:56 PM

Connection state: Open

Display name LCS-VC-MSSQL.ad.syr.e

Login name nsuryapr

Server name LCS-VC-MSSQL.ad.syr.e

Server version 10.0.6556

Session Tracing ID 52

SPID 52

Messages

(1 row affected)

Query executed successfully.

LCS-VC-MSSQL.ad.syr.edu [10... | nsuryapr (52) | CSE581labs | 00:00:00 | 0 rows

Ready Type here to search

Ln 3 Col 84 Ch 84 807 PM 10/17/2018

SQLQuery3.sql - LCS-VC-MSSQL.ad.syr.edu.CSE581labs (nsuryapr (52)) - Microsoft SQL Server Management Studio

File Edit View Query Project Debug Tools Window Help

Object Explorer

SQLQuery3.sql - LCS...abs(nsuryapr (52))

```
INSERT INTO nsuryapr.CourseEnrollment(StudentId,CourseId) VALUES
((SELECT NTID from nsuryapr.users where FirstName = 'Hermione'),
(SELECT CourseId from nsuryapr.Courses where CourseTitle like '%Charm's ADVANCED%'))
select * from nsuryapr.CourseEnrollment
```

Properties

Aggregate Status

Connection failures

Elapsed time 00:00:00.122

Finish time 10/17/2018 8:08:30 PM

Name LCS-VC-MSSQL.ad.syr.e

Rows returned 8

Start time 10/17/2018 8:08:30 PM

State Open

Connection

Connection name LCS-VC-MSSQL.ad.syr.e

Connection Details

Azure Active Direct

Connection elapsed: 00:00:00.122

Connection encrypt: Not encrypted

Connection finish t: 10/17/2018 8:08:30 PM

Connection rows: 8

Connection start t: 10/17/2018 8:08:30 PM

Connection state: Open

Display name LCS-VC-MSSQL.ad.syr.e

Login name nsuryapr

Server name LCS-VC-MSSQL.ad.syr.e

Server version 10.0.6556

Session Tracing ID 52

SPID 52

Results

EnrollmentId	StudentId	CourseId	FinalGrade
1	1	01-HJPotter	96
2	2	01-HJPotter	91
3	3	03-HJGranger	92
4	4	03-HJGranger	99
5	5	02-RBWasley	91
6	6	02-RBWasley	88
7	7	01-HJPotter	2
8	8	03-HJGranger	6

Messages

Query executed successfully.

LCS-VC-MSSQL.ad.syr.edu [10... | nsuryapr (52) | CSE581labs | 00:00:00 | 8 rows

Ready Type here to search

Ln 5 Col 40 Ch 40 808 PM 10/17/2018

After all the changes – Screenshots of all tables:

USERS

The screenshot shows the Microsoft SQL Server Management Studio interface. The Object Explorer on the left lists various database objects, including tables like nsjadei.LetterGrades, nsjadei.Users, nsingh02.CourseEnrollment, nsingh02.CourseGrade, nsingh02.Courses, nsingh02.LetterGrades, nsingh02.Users, nsuryapr.CourseEnrollment, and nsuryapr.CourseGrade. The central pane displays a query window with the following SQL code:

```
SELECT * FROM nsuryapr.usuarios
```

The results pane shows a table with the following data:

NTID	FirstName	MiddleName	LastName	Email_Address	Password		
1	01-HU	Potter	Harry	J	Potter	hp@hw.edu	Hedwig
2	02-RB	Weasley	Ron	B	Weasley	rw@hw.edu	Scabbers
3	03-HG	Granger	Hermione	J	Granger	hg@hw.edu	Crookshanks
4	11-RTW	Filius	Flitwick	NULL	Flitwick	ff@hw.edu	NULL
5	16-RH	Rubeus	Hagrid	NULL	Hagrid	rh@hw.edu	BuckBeak

The status bar at the bottom indicates "Query executed successfully".

Courses

The screenshot shows the Microsoft SQL Server Management Studio interface. The Object Explorer on the left lists various database objects, including tables like nsjadei.LetterGrades, nsjadei.Users, nsingh02.CourseEnrollment, nsingh02.CourseGrade, nsingh02.Courses, nsingh02.LetterGrades, nsingh02.Users, nsuryapr.CourseEnrollment, and nsuryapr.CourseGrade. The central pane displays a query window with the following SQL code:

```
SELECT * FROM nsuryapr.Courses
```

The results pane shows a table with the following data:

CourseId	CourseCode	CourseTitle	Faculty	OpenSeats
1	DADA101	Defence Against the Dark Arts BASIC	16-Rhagrid	3
2	DADA201	Defence Against the Dark Arts INTERMEDIATE	16-Rhagrid	2
3	DADA301	Defence Against the Dark Arts ADVANCED	16-Rhagrid	1
4	CHMS101	Chams BASIC	11-Flitwick	2
5	CHMS201	Chams INTERMEDIATE	11-Flitwick	0
6	CHMS301	Chams ADVANCED	11-Flitwick	4
7	HOM101	History of Magic BASIC	NULL	10

The status bar at the bottom indicates "Query executed successfully".

Letter Grades

The screenshot shows the Microsoft SQL Server Management Studio interface. The Object Explorer on the left lists various database objects. In the center, a query window displays the following SQL code:

```
SELECT * FROM nsuryapr..LetterGrades
```

The Results tab shows the output of the query:

LetterGradeId	LetterGrade	Description
1	O	Outstanding
2	E	Exceeds Expectations
3	A	Acceptable
4	P	Poor
5	D	Dreadful
6	T	Troll

The status bar at the bottom indicates "Query executed successfully." and "LCS-VC-MSSQLad.syr.edu (10... | nsuryapr (52) | CSE581labs | 00:00:00 | 6 rows".

Course Grading

The screenshot shows the Microsoft SQL Server Management Studio interface. The Object Explorer on the left lists various database objects. In the center, a query window displays the following SQL code:

```
SELECT * FROM nsuryapr..CourseGrade
```

The Results tab shows the output of the query:

GradingScaleId	LetterGradeId	CounselId	GradeValue
1	1	1	95
2	2	1	90
3	3	1	80
4	4	1	70
5	5	1	60
6	6	1	0
7	7	2	100
8	8	2	90
9	9	2	85
10	10	4	75
11	11	5	64
12	12	6	0

The status bar at the bottom indicates "Query executed successfully." and "LCS-VC-MSSQLad.syr.edu (10... | nsuryapr (52) | CSE581labs | 00:00:00 | 12 rows".

Course enrollment

The screenshot shows the Microsoft SQL Server Management Studio interface. A query window displays the results of a SELECT statement:

```
SELECT * FROM nsuryapr.CourseEnrollment
```

The results grid shows the following data:

EnrollmentId	StudentId	CourseId	FinalGrade
1	O1HUPder	1	96
2	O1HUPder	4	91
3	O3HGanger	1	92
4	O3HGanger	4	99
5	O2RBWeady	1	91
6	O2RBWeady	4	88
7	O1HUPder	2	NULL
8	O3HGanger	6	NULL

The Properties pane on the right shows connection details:

- Aggregate Status: Connection failures 0, Elapsed time 00:00:00.044, Finish time 10/17/2018 8:14:19 PM, Name LCS-VC-MSSQL.ad.syr.e, Rows returned 8, Start time 10/17/2018 8:14:19 PM, State Open.
- Connection: Connection name LCS-VC-MSSQL.ad.syr.e.
- Connection Details: Azure Active Direct, Connection elapsed 00:00:00.044, Connection encrypt Not encrypted, Connection finish t 10/17/2018 8:14:19 PM, Connection rows re 8, Connection start t 10/17/2018 8:14:19 PM, Connection state Open, Display name LCS-VC-MSSQL.ad.syr.e, Login name nsuryapr, Server name LCS-VC-MSSQL.ad.syr.e, Server version 10.0.6556, Session Tracing ID SPID 52.

The status bar at the bottom indicates "Query executed successfully." and shows the connection information: LCS-VC-MSSQL.ad.syr.edu (10...), nsuryapr (S2), CSE581labs, 00:00:00, 8 rows.