Fatima Jinnah Women University
Department of Software Engineering

LAB EXERCISE 1

Name: Raifa Khalid

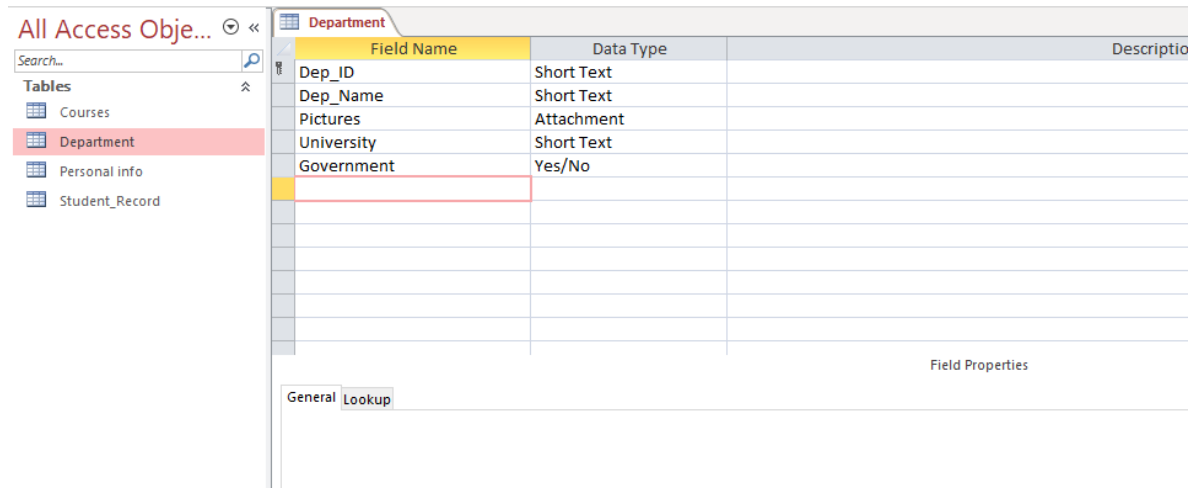**Reg. no:** 2020-BSE-024

Section: A

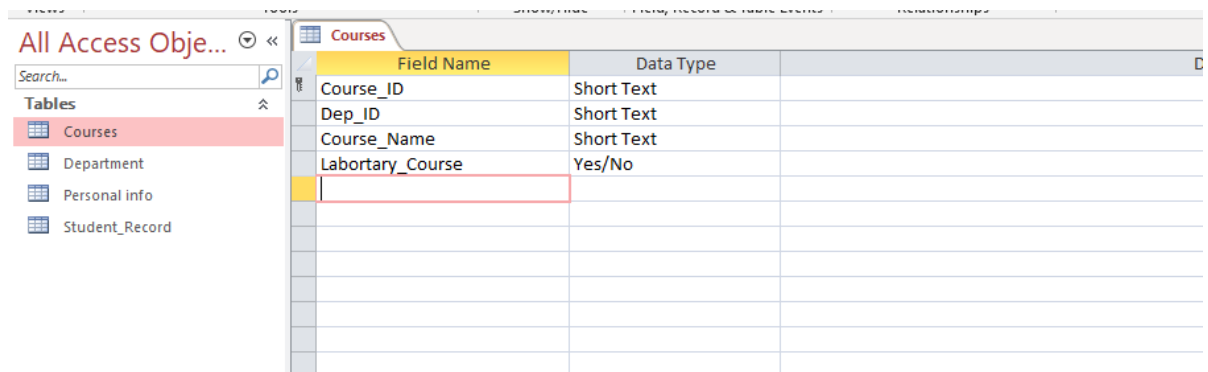**Semester:** Fourth

Course: Data Base (LAB)

TASK 01

Create a database having following tables.

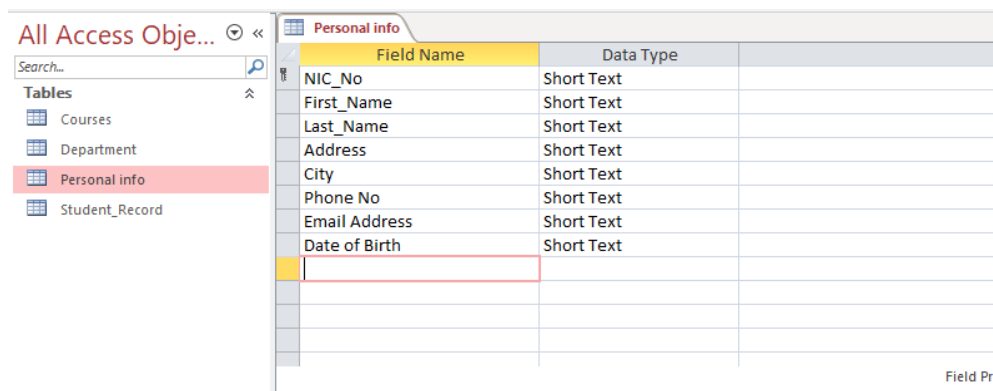- Department (Representing different departments of university)

- Courses (Representing courses for different departments)

- Personal Info (Representing personal info of student)

- Student Record (Representing course GPA of specific student)

Field Name	Data Type
Serial_No	AutoNumber
Reg_No	Short Text
NIC_No	Short Text
Course_ID	Short Text
Course_GPA	Number

TASK 02

Assign the following dep_Id to the following departments and insert the data for other related fields.

Dep_ID	Dep_Name	🔗	University	Governmen	Click to Add
⊞ C1000	DDS	🔗(1)	FJWU	☑	
⊞ C1001	EDU	🔗(1)	FJWU	☑	
⊞ C1010	BHS	🔗(1)	FJWU	☑	
⊞ E1005	BCA	🔗(1)	FJWU	☑	
⊞ E1006	BPA	🔗(1)	FJWU	☑	
⊞ E1007	BFA	🔗(1)	FJWU	☑	
⊞ S1001	BSE	🔗(1)	FJWU	☑	
⊞ S1002	BCS	🔗(1)	FJWU	☑	
⊞ S1003	BBA	🔗(1)	FJWU	☑	
⊞ S1004	BEE	🔗(1)	FJWU	☑	
*		🔗(0)		☐	

TASK 03

Assign six courses to each department representing the courses for each department (first semester) and insert the data for other related fields.

All Access Obje... « | **Courses**

Search...

Tables ❖

- Courses
- Department
- Personal info
- Student_Record

Course_ID	Dep_ID	Course_Name	Labortary_C	Click to Add
⊞ ADR204	E1005	Basic Drafting	☐	
⊞ ADR302	E1005	Basic Drawing	☐	
⊞ ALG001	S1002	Algebra	☐	
⊞ BBA104	S1003	Principle of Management	☐	
⊞ BBA213	S1003	Gender and youth developm	☐	
⊞ BBA302	S1003	Bussiness and IT	☐	
⊞ BBH100	S1004	English Composition and Cor	☐	
⊞ BBH120	S1004	Applied Physics	☑	
⊞ BCA103	E1005	Fundametal of computers	☐	
⊞ BCA104	E1005	Computer Graphics	☑	
⊞ BCA202	E1005	Intro to psychology	☑	
⊞ BCS101	S1002	Intro to c++	☑	
⊞ BCS102	S1002	Discrete Structure	☐	
⊞ BCS200	S1004	Into to Computer	☑	
⊞ BCS234	S1002	Intro to computer science	☑	
⊞ BDA201	C1000	Physiology	☑	
⊞ BDA234	C1000	Biochemistry	☐	
⊞ BDA322	C1000	Dental Technology	☑	
⊞ BEE100	S1004	Basic Electronic Engineering	☑	
⊞ BEE201	S1004	Circuits	☐	
⊞ BFA001	E1007	Maths for Art and Design	☐	
⊞ BFA101	E1007	General Education	☐	
⊞ BFA102	E1007	Sculpture	☐	
⊞ BFA200	E1007	Drawing	☐	

Tables ❖

- Courses
- Department
- Personal info
- Student_Record

Course_ID	Dep_ID	Course_Name		
⊞ BHH110	S1004	Analytical Geo	☐	
⊞ BHS102	C1010	Food Production	☐	
⊞ BHS111	C1010	Food and Beverange Service	☐	
⊞ BHS301	C1010	House Keeping	☐	
⊞ BHS302	C1010	Nutrition	☐	
⊞ BPA101	E1006	Research Methods	☐	
⊞ BPA102	E1006	Intro to statistics	☐	
⊞ BPA103	E1006	Principles of Accounting	☐	
⊞ BPA201	E1006	Finance and Ecnomics	☐	
⊞ BSE201	S1001	Intro_to_computing	☑	
⊞ BSE203	S1001	Intro_to_programming	☑	
⊞ CAL101	S1001	Calculus	☐	
⊞ CAL103	S1003	Calculus 1	☐	
⊞ CCS201	C1010	Communication Skills	☐	
⊞ DDS283	C1000	Anatomy	☑	
⊞ EDU101	C1001	Child Development	☐	
⊞ EDU107	C1001	General Science	☐	
⊞ EDU222	C1001	Regional Language	☐	
⊞ EDU248	C1001	General Methods of Teachin	☐	
⊞ ENG101	E1007	English	☐	
⊞ ENG102	C1001	Functional English	☐	
⊞ HUM101	S1001	Islamiyat	☐	
⊞ HUM102	S1001	Pak studies	☐	

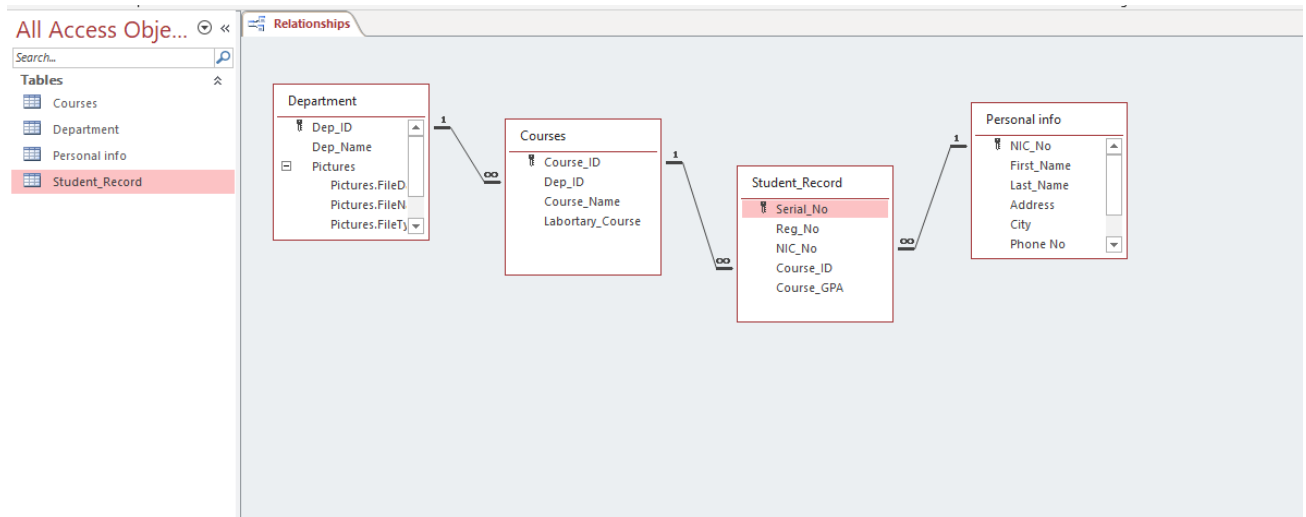|			
Courses	⊞ HUM103	S1001	English	☐
Department	⊞ HUM123	S1003	English 1	☐
Personal info	⊞ HUM202	S1002	Creative Writting	☐
Student_Record	⊞ HUM212	E1005	Communication skills	☐
	⊞ HUM220	E1006	Communication and Report	☐
	⊞ HUM222	S1003	History of Pakistan	☐
	⊞ ISL102	E1007	Ethics	☐
	⊞ ISL200	C1000	Islamic Studies	☐
	⊞ ISL207	C1001	Islamiyat	☐
	⊞ IT0001	C1010	Information Technology	☑
	⊞ MAT101	E1006	Mathematics	☐
	⊞ PHY010	S1002	Physics	☐
	⊞ STD111	C1000	Pak Studies	☐

TASK 04

Insert data for 30 students in personal info and student record table, 3 students of each department.

Personal info

NIC_No	First_Name	Last_Name	Address	City	Phone No	Email Addre	Date of Birtl	Click to Add
⊞ 23536-5265346	Maryam	Maqsood	658-A Bahria T	LHR	0375-6487567	user@gmail.cc	04/11/2002	
⊞ 30984-0975657	Nayab	Shahbaz	278-A Bahria T	LHR	0338-7678465	user@gmail.cc	30/05/2001	
⊞ 34254-6743874	Laiba	Kanwal	909-A Bahria T	LHR	0376-3565673	user@gmail.cc	05/06/2002	
⊞ 34436-8758450	Maryam	Bibi	758-A Bahria T	LHR	0326-7253657	user@gmail.cc	29/08/2001	
⊞ 34675-6455746	Mahnoor	Munir	458-A Bahria T	LHR	0365-8745787	user@gmail.cc	07/12/2002	
⊞ 34890-6348576	Ayesha	Elahi	348-A Bahria T	RWP	0435-6566556	user@gmail.cc	20/02/2001	
⊞ 34890-6756645	Sajal	Faheem	34-A Bahria To	RWP	0385-7576764	user@gmail.cc	18/03/2002	
⊞ 34890-7467657	Ayesha	Maryam	898-A Bahria T	RWP	0324-5455666	user@gmail.cc	23/01/2002	
⊞ 34890-7894515	Hina	Khan	65-A Bahria To	RWP	0374-5676476	user@gmail.cc	22/12/2001	
⊞ 34890-7895455	Rida	Batool	20-c Bahria Tov	RWP	0563-4234324	user@gmail.cc	13/05/2002	
⊞ 34890-8640924	Mahnoor	Balooch	788-A Bahria T	RWP	0387-5845665	user@gmail.cc	24/05/2002	
⊞ 34890-9298478	Amina	Sultan	78-A Bahria To	RWP	0648-8445665	user@gmail.cc	12/02/2001	
⊞ 36457-3894734	Alina	Hassan	768-A Bahria T	LHR	0456-7354635	user@gmail.cc	05/05/2000	
⊞ 36457-8394887	Laiba	Tariq	568-A Bahria T	LHR	0743-5685463	user@gmail.cc	10/10/2001	
⊞ 36457-9593087	Fatima	Shah	23-A Bahria To	LHR	0556-8908980	user@gmail.cc	23/05/2002	
⊞ 36457-9839675	Muneeba	Mehmood	558-A Bahria T	LHR	0348-7565365	user@gmail.cc	01/12/2002	
⊞ 36473-5674658	Amina	Tariq	568-A Bahria T	RWP	0345-8976875	user@gmail.cc	03/06/2001	
⊞ 36756-4553474	Hiba	Khan	765-A Bahria T	RWP	0384-7756765	user@gmail.cc	28/03/2001	
⊞ 37854-6565435	Huda	Ali	74-A Bahria To	RWP	0398-5786565	user@gmail.cc	15/09/2002	
⊞ 38597-4857654	Ramisha	Naseem	23-A Bahria To	RWP	0337-8567687	user@gmail.cc	24/11/2002	
⊞ 39085-6473564	Adeena	Shah	738-A Bahria T	KHI	0328-4785687	user@gmail.cc	11/01/2001	
⊞ 39085-6755453	Hania	Amir	566-A Bahria T	KHI	0376-4756465	user@gmail.cc	15/07/2001	
⊞ 39849-7856734	Hadaiqa	Lodhi	748-A Bahria T	LHR	0372-6875479	user@gmail.cc	27/06/2001	
⊞ 45753-4524252	Zahra	Batool	748-A Bahria T	RWP	0339-7546767	user@gmail.cc	04/08/2001	
⊞ 45875-8687465	Aimen	Arshad	798-A Bahria T	KHI	0375-4674675	user@gmail.cc	29/10/2002	
⊞ 47536-5362453	Hafsa	Razzaq	455-A Bahria T	KHI	0387-5867648	user@gmail.cc	18/07/2001	
⊞ 48756-5467604	Sidra	Nazeer	782-A Bahria T	RWP	0365-6767795	user@gmail.cc	20/08/2000	
⊞ 48766-5486590	Hira	Khan	753-A Bahria T	KHI	0387-8456478	user@gmail.cc	25/06/2002	
⊞ 49885-4675365	Salma	Bibi	734-A Bahria T	KHI	0387-8567875	user@gmail.cc	09/09/2002	
⊞ 76347-6567453	Jamaima	Hassan	344-A Bahria T	RWP	0338-5967867	user@gmail.cc	11/11/2001	

Student_Record

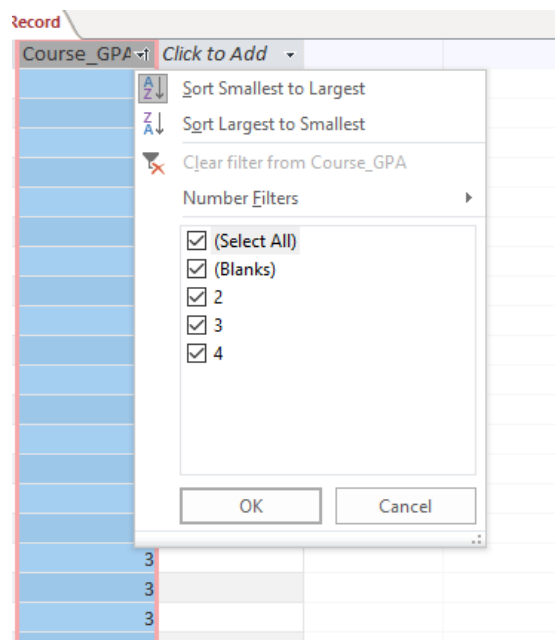| Serial_No	Reg_No	NIC_No	Course_ID	Course_GPA	Click to Add
1	2020-BSE-01	23536-5265346	ADR204	3	
2	2020-BSE-02	30984-0975657	ADR302	3	
3	2020-BSE-03	34254-6743874	BCA103	3	
4	2020-BSE-04	34436-8758450	ALG001	3	
5	2020-BSE-05	34675-6455746	BCS101	3	
6	2020-BSE-06	34890-6348576	BCS234	4	
7	2020-BSE-07	34890-6756645	BBA104	3	
8	2020-BSE-08	34890-7467657	BBA302	3	
9	2020-BSE-09	34890-7894515	CAL103	2	
10	2020-BSE-10	34890-7895455	BBH100	3	
11	2020-BSE-11	34890-8640924	BBH120	3	
12	2020-BSE-12	34890-9298478	BCS200	3	
13	2020-BSE-13	36457-3894734	BCA103	3	
14	2020-BSE-14	36457-8394887	BCA104	4	
15	2020-BSE-15	36457-9593087	BCA202	3	
16	2020-BSE-16	36457-9839675	BDA201	4	
17	2020-BSE-17	36473-5674658	BDA234	3	
18	2020-BSE-18	36756-4553474	BDA322	3	
19	2020-BSE-19	37854-6565435	BFA001	3	
20	2020-BSE-20	38597-4857654	BFA102	3	
21	2020-BSE-21	39085-6473564	BFA200	3	
22	2020-BSE-22	39085-6755453	BHS111	3	
23	2020-BSE-23	39849-7856734	BHS302	3	
24	2020-BSE-24	45753-4524252	BHS301	3	
25	2020-BSE-25	45875-8687465	BPA103	3	
26	2020-BSE-26	47536-5362453	BPA101	3	
27	2020-BSE-27	48756-5467604	BPA201	3	
28	2020-BSE-28	48766-5486590	EDU222	3	
29	2020-BSE-29	49885-4675365	EDU222	3	
30	2020-BSE-30	76347-6567453	EDU248	3	
(New)				0	

TASK 05

Create the relationship between the tables created above and also make sure "Enforcement of referential Integrity".

TASK 06

a. Sort all the students record according to GPA

Serial_No ▾	Reg_No ▾	NIC_No ▾	Course_ID ▾	Course_GPA ▾	Click to Add
9	2020-BSE-09	34890-7894515	CAL103	2	
18	2020-BSE-18	36756-4553474	BDA322	3	
5	2020-BSE-05	34675-6455746	BCS101	3	
3	2020-BSE-03	34254-6743874	BCA103	3	
7	2020-BSE-07	34890-6756645	BBA104	3	
8	2020-BSE-08	34890-7467657	BBA302	3	
10	2020-BSE-10	34890-7895455	BBH100	3	
11	2020-BSE-11	34890-8640924	BBH120	3	
12	2020-BSE-12	34890-9298478	BCS200	3	
13	2020-BSE-13	36457-3894734	BCA103	3	
1	2020-BSE-01	23536-5265346	ADR204	3	
2	2020-BSE-02	30984-0975657	ADR302	3	
4	2020-BSE-04	34436-8758450	ALG001	3	
17	2020-BSE-17	36473-5674658	BDA234	3	
15	2020-BSE-15	36457-9593087	BCA202	3	
19	2020-BSE-19	37854-6565435	BFA001	3	
20	2020-BSE-20	38597-4857654	BFA102	3	
21	2020-BSE-21	39085-6473564	BFA200	3	
22	2020-BSE-22	39085-6755453	BHS111	3	
23	2020-BSE-23	39849-7856734	BHS302	3	
24	2020-BSE-24	45753-4524252	BHS301	3	
25	2020-BSE-25	45875-8687465	BPA103	3	
26	2020-BSE-26	47536-5362453	BPA101	3	
27	2020-BSE-27	48756-5467604	BPA201	3	

b. Sort all the student Alphabetically

First_Name	Last_Name ▾	Address ▾	City
Adeena			
Aimen			
Alina			
Amina			
Amina			
Ayesha			
Ayesha			
Fatima			
Hadaiqa			
Hafsa			
Hania			
Hiba			
Hina			
Hira			
Huda			
Jamaima			
Laiba	Tariq	568-A Bahria T	LHR
Laiba	Kanwal	909-A Bahria T	LHR
Mahnoor	Balooch	788-A Bahria T	RWP
Mahnoor	Munir	458-A Bahria T	LHR
Maryam	Maqsood	658-A Bahria T	LHR
Maryam	Bibi	758-A Bahria T	LHR
Muneeba	Mehmood	558-A Bahria T	LHR
Nayab	Shahbaz	278-A Bahria T	LHR

Sort A to Z
Sort Z to A
Clear filter from First_Name
Text Filters ▸
☑ (Select All)
☑ (Blanks)
☑ Adeena
☑ Aimen
☑ Alina
☑ Amina
☑ Ayesha
☑ Fatima
☑ Hadaiqa
OK   Cancel

c. Filter all the students records for BSE only

Department	Courses	Student_Record			
Serial_No	Reg_No	NIC_No	Course_ID	Course_GPA	Click to Add
9	2020-BSE-09	34890-7894515	HUM101	2	
18	2020-BSE-18	36756-4553474	BSE203	3	
5	2020-BSE-05	34675-6455746	BSE201	3	
(New)				0	

d. Show all students records having registered course PF only

Serial_No	Reg_No	NIC_No	Course_ID	Course_GPA	Click to Add
18	2020-BSE-18	36756-4553474	BSE203	3	
5	2020-BSE-05	34675-6455746	BSE201	3	
(New)				0	