DBMS LAB MANNUAL

SUMITTED BY

SECOND SEM MCA

MIT MYSORE

2017-2018

COLLEGE DATABASE

Create the following tables with properly specifying Primary keys, Foreign keys and solve the following queries. BRANCH(Branchid,Branchname,HOD)
STUDENT(USN,Name,Address,Branchid,sem)
BOOK(Bookid,Bookname,Authorid,Publisher,Branchid)
AUTHOR(Authorid,Authorname,Country,age) BORROW(USN,Bookid,Borrowed_Date)

Queries:

1 List the details of Students who are all Studying in 2ndsem MCA.

2 List the students who are not borrowed any books.

3 Display the USN, Student name, Branch_name, Book_name, Author_name ,Books_Borrowed_Date of 2ndsem MCA Students who borrowed books.

4 Display the number of books written by each Author.

5 Display the student details who borrowed more than two books.

6 Display the student details who borrowed books of more than one Author.

7 Display the Book names in descending order of their names.

8 List the details of students who borrowed the books which are all published by the same Publisher.

1.LIST THE DETAIL OF STUDENT WHO ARE ALL STUDYING IN 2ND SEM MCA.

mysql> select * from student s,branch b where s.branchid=b.branchid and s.sem=2andbranchname="mca";

Usn	name	address	branchid	sem	branchid	branchname	hod
11	subhash	mysore	1	2	1	mca	a
12	sachin	mysore	1	2	1	mca	a

2.LIST THE STUDENT WHO ARE NOT BORROWED ANY BOOKS:

mysql> select * from student s where s.usn not in(select b.usn from borrow b);

Usn	Name	Address	Branched	Sem
12	**sachin**	**Mysore**	**1**	**2**
13	**Sadique**	**Mysore**	**2**	**3**

3.DISPLAY THE USN,STUDENT NAME ,BRANCH_NAME,BOOK_NAME,AUTHORNAME,BOOKS_BORROWED_DATE OF 2ND SEM MCA STUDENT WHO BORROWED BOOKS:

mysql> select s.usn,s.name,b.branchname,bk.bookname,br.borroweddate,a.authorname

from student s,branchb,bookbk,authora,borrowbr where s.branchid=b.branchid

ands.branchid=bk.branchid and a.authorid=bk.authorid and br.usn=s.usn and bk.bookid=br.bookid and s.sem=2 and b.branchname="mca";

Usn	Name	Branchname	Bookname	Borroweddate	Authorname
11	**Subhash**	**Mca**	**Unix**	**2017-02-02**	**Abhi**
11	**Subhash**	**Mca**	**C++**	**2017-02-02**	**Abhi**

4.DISPLAY THE NUMBER OF BOOKS WRITTEN BY EACH AUTHOR:

mysql> select a.authorid,a.authorname,count(distinct b.bookid) as cbookid from a

uthora,book b where a.authorid=b.authorid group by a.authorid;

Authored	authorname	cbookid
100	abhi	2
101	mahadev	1

5.DISPLAY THE STUDENT DETAILS WHO BORROWED MORE THAN TWO BOOKS:

mysql> select s.usn,s.name from student s,borrow b where s.usn=b.usn group by s.usn having count(distinct b.bookid)>2;

usn	name
11	subhash

6.DISPLAY THE STUDENTS DETAILS WHO BORROWED MORE THAN ONE AUTHOR:

6.1.DISPLAY THE STUDENTS DETAILS WHO BORROWED BOOKS OF SAME AUTHOR:

mysql> select s.usn,s.name,count(distinct bk.authorid) from student s,bookbk,borrowbr where s.usn=br.usn and br.bookid=bk.bookid group by s.usn;

6.2DISPLAY THE STUDENTS DETAILS WHO BORROWED MORE THAN ONE AUTHOR:

mysql> select s.usn,s.name,count(distinct bk.authorid) from student s,bookbk,bo

rrowbr where s.usn=br.usn and br.bookid=bk.bookid group by s.usn having count(distinctbk.authorid)>1;

Usn	name	count(distinct bk.authorid)
11	subhash	2

7.DISPLAY THE BOOK NAMES IN DESCENDING ORDER OF THEIR NAMES:

mysql> select b.bookname from book b order by b.booknamedesc;

bookname
Unix
Java
Java
c++

8.LIST THE DETAILS OF STUDENT WHO BORROWED THE BOOKS WHICH ARE ALL PUBLISHED BY THE SAME AUTHOR:

8.1:SELECT THE STUDENT DETAILS WHO TOOK BOOKS OF SAME PUBLISHER:

mysql> select s.usn,s.name,count(bk.publisher) from student s,book bk,borrow brwheres.usn=br.usn and br.bookid=bk.bookid group by s.usn;

8.2LIST THE DETAILS OF STUDENT WHO BORROWED THE BOOKS WHICH ARE ALL PUBLISHED BY THE SAME AUTHOR:

mysql> select s.usn,s.name,count(bk.publisher) from student s,bookbk,borrowbrwheres.usn=br.usn and br.bookid=bk.bookid group by s.usn having count(bk.publisher)>1;

Usn	name	count(bk.publisher)
11	subhash	4

2.Cricket database

Design an ER-diagram for the following scenario, Convert the same into a relational model and then solve the following queries. Consider a Cricket Tournament "ABC CUP" organized by an organization. In the tournament there are many teams are contesting each having a Teamid,Team_Name, City, a coach. Each team is uniquely identified by using Teamid. A team can have many Players and a captain. Each player is uniquely identified by Playerid, having a Name, and multiple phone numbers,age. A player represents only one team. There are many Stadiums to conduct matches. Each stadium is identified using Stadiumid, having a stadium_name,Address (involves city,area_name,pincode).A team can play many matches. Each match played between the two teams in the scheduled date and time in the predefined Stadium. Each match is identified uniquely by using Matchid. Each match won by any of the one team that also wants to record in the database. For each match man_of_the match award given to a player.

Queries:

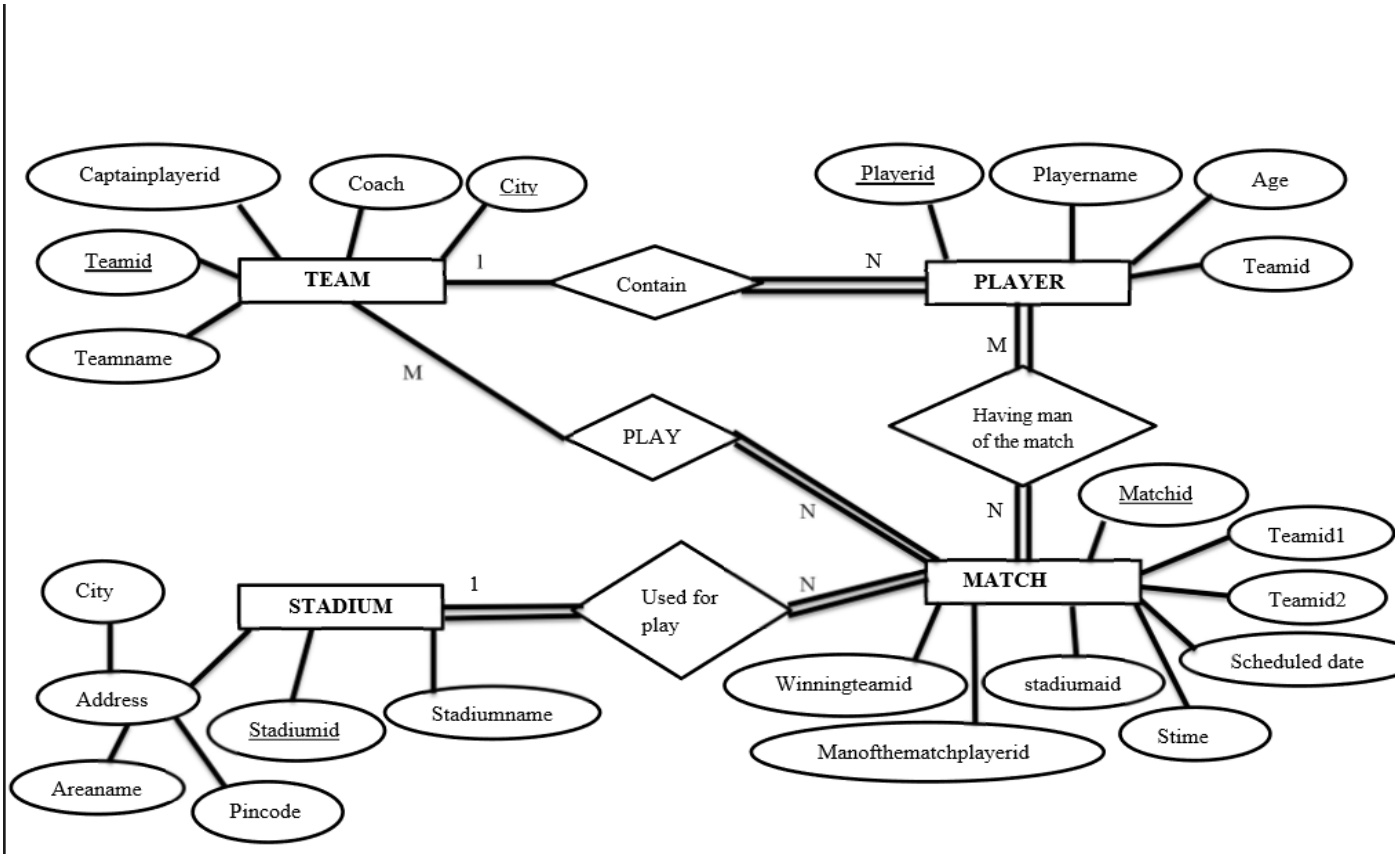
1 Display the youngest player (in terms of age) Name, Team name , age in which he belongs of the tournament.

2 List the details of the stadium where the maximum number of matches were played.

3 List the details of the player who is not a captain but got the man_of _match award at least in two matches.

4 Display the Team details who won the maximum matches.

5 Display the team name where all its won matches played in the same stadium.



LAB 2 DBMS ER-Diagram

mysql>select * from captain;

captain_pid	tid
h201	101
ha203	102
m202	103
b203	104
my201	105

mysql> select * from matches;

mid	tid1	tid2	scheduleddate	time	sid	winner	Manofthematch
401	101	105	12-04-2018	1pm	301	101	h201
402	102	104	14-04-2018	1pm	302	104	b202
403	103	102	17-04-2018	2pm	303	103	m201
404	104	103	20-04-2018	2pm	304	103	m201
405	105	101	21-04-2018	2pm	304	105	my202

mysql>select * from player;

pid	Pname	phno	age	Tid
b201	Chandu	7858911	16	104
b202	Maggi	7855011	11	104
b203	kavya	7855000	20	104
h201	vikas	123456	12	101
h202	Sunil	127856	13	101
h203	Puneeth	163856	12	101
ha201	Harry	160156	10	102
ha202	manu	789156	10	102
ha203	Nandu	789856	18	102
m201	Karthik	7801056	22	103
m202	Komal	7801085	23	103
m203	Yashu	7801000	19	103
my201	Rashmi	0000000	21	105
my202	deepu	4596300	18	105
my203	Darshu	1254966	11	105

mysql> select * from stadium;

sid	Sname	city	areaname	pincode
301	abc	hussan	k.t.nagar	956147
302	Xyz	mysore	r.t.nagar	456147
303	Mnp	bangaluru	m.n.nagar	478147
304	pqr	mangalore	o.p.nagar	4701647
305	rmn	davangere	q.r.nagar	4724597

mysql> select * from team;

tid	Tname	coach	City
101	Rockers	harsha	hubli
102	mr.cool	jeevan	hassan
103	Rangers	prithvi	mandya
104	Rcb	rocky	bangaluru
105	Mysorebulls	arjun	mysore

2.1>Display the youngest player(in terms of age) Name, Team name, age in which he belongs of the tournament.

mysql> select pname,pid,min(age) from player group by pid order by age asc;

pname	Pid	Min(age)
manu	ha202	10
harry	ha201	10
darshu	my202	11
maggi	b202	11
Puneeth	h203	12
vikas	h201	12
sunil	h202	13
chandu	b201	16
nandu	ha203	18
deepu	my202	18
yashu	m203	19
kavya	b203	20
rashmi	my201	21
karthick	m201	22
komal	m202	23

mysql> select pname,pid,min(age) from player group by pid order by age asc limit 2;

pname	pid	min(age)
manu	ha202	10
harry	ha201	10

2.2>list the details of the stadium where the maximum number of matches were played.

mysql> select m.sid,count(m.mid) from matches m group by m.sid;

sid	Count(m.mid)
301	1
302	1
303	1
304	2

mysql> select m.sid,count(m.mid) from matches m group by m.sid order by m.mid desc;

sid	Count(m.mid)
304	2
303	1
302	1
301	1

mysql> select m.sid,count(m.mid) from matches m group by m.sid order by m.mid desc limit 1;

sid	Count(m.mid)
304	2

mysql> select m.sid,count(m.mid),s.sname from matches m,stadium s where m.sid=s.sid group by m.sid order by m.mid desc limit 1;

sid	count(m.mid)	Sname
304	2	pqr

2.3>list the details of the player who is not a captain but got the man_of the match award at least in two matches.

mysql> select m.manofthematch,count(m.manofthematch) from matches m group by m.manofthematch having count(manofthematch)>1;

manofthematch	count(m.manofthematch)
m201	2

mysql> select pid from player where pid not in(select captain_pid from captain);

pid
h202
h203
ha201
ha202
m201
m203
b201
b202
my202
my203

mysql> select pid from player where pid not in(select captain_pid from captain) and pid in(select m.manofthematch from matches m group by m.manofthematch having count(m.manofthematch)>1);

pid
m201

2.4>display the team details who won the maximum matches.

mysql> select m.winner,count(m.winner) from matches m group by m.winner;

winner	Count(m.winner)
101	1
103	2
104	1
105	1

mysql> select m.winner,count(m.winner) from matches m group by m.winner order by count(m.winner) desc limit 1;

winner	Count(m.winner)
103	2

2.5> display the team name where all its won matches played in the same stadium

mysql> select m.winner,t.tname,m.sid,s.sname from matches m,team t,stadium s where m.winner=t.tid and m.sid=s.sid group by m.winner;

winner	tname	sid	Sname
101	rockers	301	abc
103	rangers	303	mnp
104	rcb	302	xyz
105	mysore	304	pqr

mysql> select m.winner,t.tname,m.sid,s.sname from matches m,teamt,stadium s where m.winner=t.tid and m.sid=s.sid group by m.winner having count(distinct m.sid)=1;

winner	tname	sid	sname
101	rockers	301	abc
104	rcb	302	xyz
105	mhysorebulls	304	pqr

COMPANY DATBASE

Consider the following Scenario and design an ER-Diagram, map the designed ER-diagram into a Relational model. Consider an organization "ABC" having many employees. An employee works for one department. Each employee identified by using Empid, having Name, address (described as House_no, city, district, state, pin code) and more than one phone numbers. Department identified by using Dno, having Dname, Dlocation. Each Department having a manager . Each department having many employees. There are many Projects , each project is controlled by the department. Each Project uniquely identified by Pno, having Project_name,Project_location. An employee works on many Projects. Number of hours per week worked on each project by an Employee also needs to be recorded in the database . A project is worked by many employees. Each employee supervised by the supervisor. Employee having many dependents. Dependents having thedependent_name, gender, age, address. Dependents are identified by Empid.

T1(Empid, Emp_Name,city, district, state, pin_code, phoneno, Dno,Dname,Dlocation, Dept_mgr_id, Pno, Project_name, Project_location, Number_of_Hours,Supervisor_Empid, Dependent_name, gender, address)

Deduce the above Relation T1 into the 3NF and then solve the following queries.

Queries:

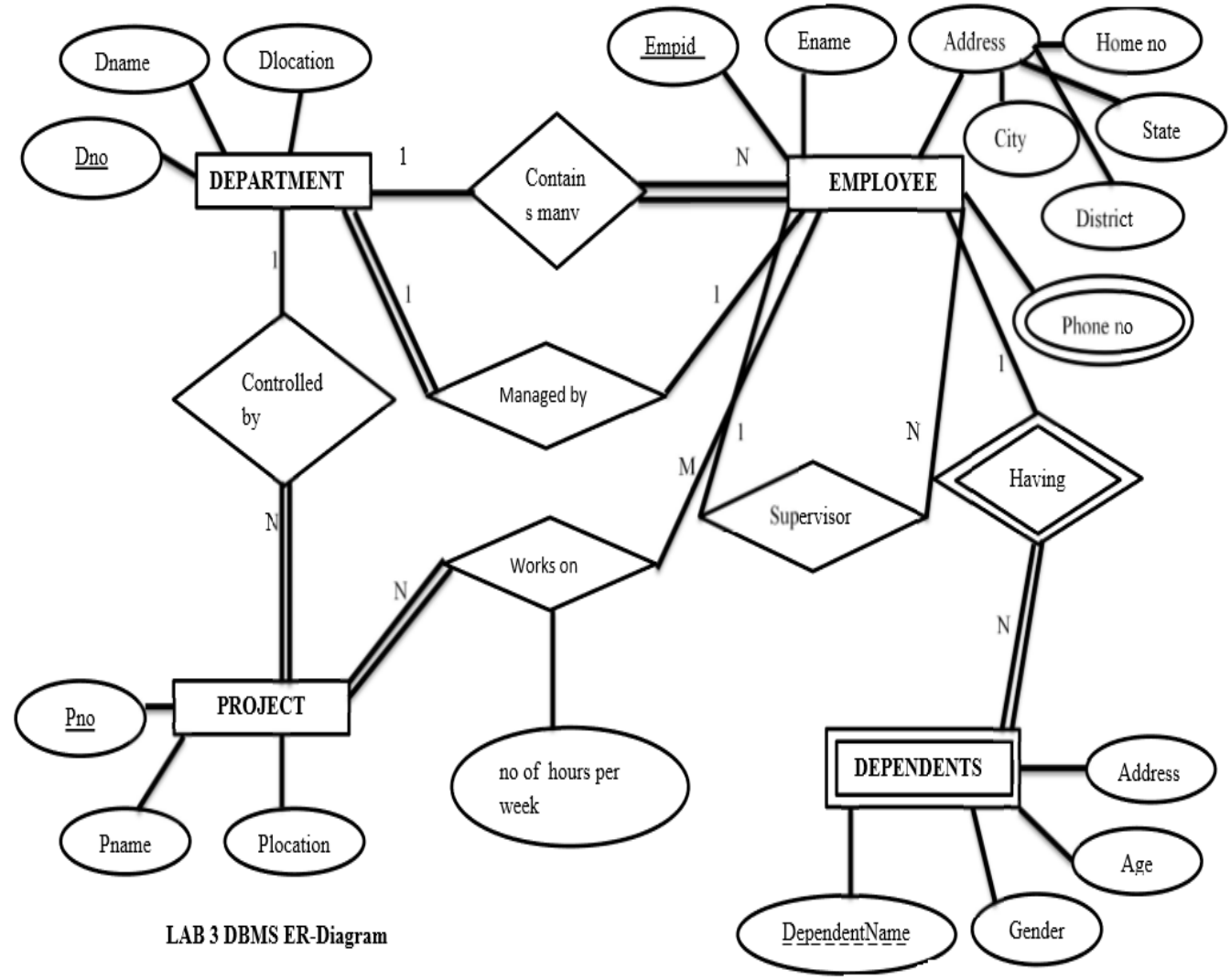
1. Display the details of the employees who are working on both the projects havingproject_no 5 and 10.

2. Display the details of employees having atleast two dependents.

3. Display the project name on which more number of employees are working. 4. Retrieve the employees who do not have any dependents.

5. Display the Employee details whose total number of hours per week working on various projects is maximum than all other employees.

6. create a view to display the number of employees working in each department.



LAB 3 DBMS ER-Diagram

ER-DIAGRAM

TABLES

Select * from employ;

eid	ename	gender	age	spreid	Dno
11	**Ravi**	**Male**	**21**	**11**	**1**
12	**Jamu**	**female**	**21**	**11**	**1**
13	**Kavya**	**Female**	**20**	**11**	**2**
14	**Chiru**	**male**	**23**	**12**	**2**
15	**yogi**	**male**	**23**	**12**	**3**

Select * from dependent;

dno	dname	age	meid
1	Abc	20	11
2	Efg	20	22
3	Hij	20	33
4	Pqr	21	44
5	xyz	21	55

Select * from project;

pno	pname	dno
111	hotel	1
222	Hostel	1
333	Store	4
444	Electrical	4
555	Transport	5

Select * from workpn;

pno	eid	Time
222	13	5
555	14	10
555	15	10
111	11	2
111	12	2
555	14	2
222	14	2
111	14	2

Select * from dependent;

eid	depname	gender	age	address	Relation
11	Ranji	Female	20	mysore	Chandru
11	Abc	Male	20	mysore	Ruka
11	Ravi	Male	20	mysore	Chikksamy
11	Jamu	Female	20	mysore	Null
13	kavya	Female	20	mysore	null

Select * from deloc;

dno	Locname
1	Mysore
1	Mysore
1	Mysore
2	Banglor
3	mnnglor

1. Display the details of the employees who are working on both the projects havingproject_no 5 and 10.

display the details of the employees who are working on project number=111?

mysql> select distinct eid from workpn where pno=111;

eid
11
12
14

display the details of the employees who are working on project number=555?

mysql> select distinct eid from workpn where pno=555;

eid
14
15

display the details of the employees who are working on both the project having project_no=111 and 555?

mysql> select distinct eid from workpn where eid in(select eid from workpn where pno=111)and pno=555;

eid
14

2. Display the details of employees having atleast two dependents.

display the eid and no_of_dependent?

mysql> select eid,count(depname) from dependent group by eid;

eid	Count(depname)
11	4
13	1

display the eid and no_of_dependent more then 2?

mysql> select eid,count(depname) from dependent group by eid having count(depname)>2;

eid	Count(depname)
11	4

display the employ details having atleast two dependent?

mysql> select d.eid,e.ename,count(depname)from dependent d,employ e where d.eid=e.eid group by eid having count(depname)>2;

eid	ename	Count(depname)
11	ravi	4

3. Display the project name on which more number of employees are working

list the pno and no_of_pno are works?

mysql> select pno,count(pno) from workpn group by pno;

Pno	Count(pno)
111	3
222	2
555	3

display the project name on which number of employess are working?

mysql> select w.pno,count(w.pno),p.pname from workpn w,project p where p.pno=w.pno group by w.pno;

pno	Count(w.pno)	Pname
111	3	Hotel
222	2	Hostel
555	3	transport

display the project name on which number of employess are working in desending order?

Pno	**Count(w.pno)**	**Pname**
555	**3**	**Transport**
111	**3**	**Hotel**
222	**2**	**hostel**

display the project name on which more number of employess are working?

mysql> select w.pno,count(w.pno),p.pname from workpn w,project p where p.pno=w.pno group by w.pno order by count(w.pno)desc limit 1;

Pno	Count(w.pno)	Pname
555	3	transport

4. Retrieve the employees who do not have any dependents.

display the eid and ename from employ?

mysql> select eid,ename from employ;

eid	Ename
11	Ravi
12	Jamu
13	Kavya
14	Chiru
15	yogi

display the eid from depandent?

mysql> select eid from dependent;

eid
11
11
11
11
13

retrieve the employee who do not have any dependents

mysql> select eid,ename from employ where eid NOT IN(select eid from dependent);

EID	Ename
12	Jamu
14	Chiru
15	yogi

5. Display the Employee details whose total number of hours per week working on various projects is maximum than all other employees.

display the employ details and total number houres to work?

mysql> select w.eid,sum(w.time),e.ename from workpn w,employ e where w.eid=e.eid group by w.eid ;

eid	Sum(w.time)	Ename
11	2	Ravi
12	2	Jamu
13	5	Kavya
14	16	Chiru
15	10	yogi

display the employ details and total number houres to work in desending order?

mysql> select w.eid,sum(w.time),e.ename from workpn w,employ e where w.eid=e.eid group by w.eid order by sum(w.time)desc;

eid	Sum(w.time)	Ename
14	16	Chiru
15	10	Yogi
13	5	Kavya
11	2	Ravi
12	2	jamu

display the employ details whose total number houres to work on various project is maximum than all other employee?

mysql> select w.eid,sum(w.time),e.ename from workpn w,employ e where w.eid=e.eid group by w.eid order by sum(w.time)desc limit 1;

eid	Sum(w.time)	Ename
14	16	chiru

6)create an view to display the number of employees working in each department?

mysql> create view vdep_emp as(select dno,count(eid) as no_of_employ from employ group by dno);

Query OK, 0 rows affected (0.11 sec)

mysql> select * from vdep_emp;

dno	No_of_employ
1	2
2	2
3	1

TOURISM

Design an ER-diagram for the following scenario, Convert the same into a relational model, normalize Relations into a suitable Normal form and then solve the following queries. A country can have many Tourist places . Each Tourist place is identified by using tourist_place_id, having a name, belongs to a state, Number of kilometers away from the capital city of that state,history. There are many Tourists visits tourist places every year. Each tourist is identified uniquely by using Tourist_id, having a Name, age, Country and multiple emailids. A tourist visits many Tourist places, it is also required to record the visted_date in the database. A tourist can visit a Tourist place many times at different dates. A Tourist place can be visited by many tourists either in the same date or at different dates.

Queries:

1 List the state name which is having maximum number of tourist places.

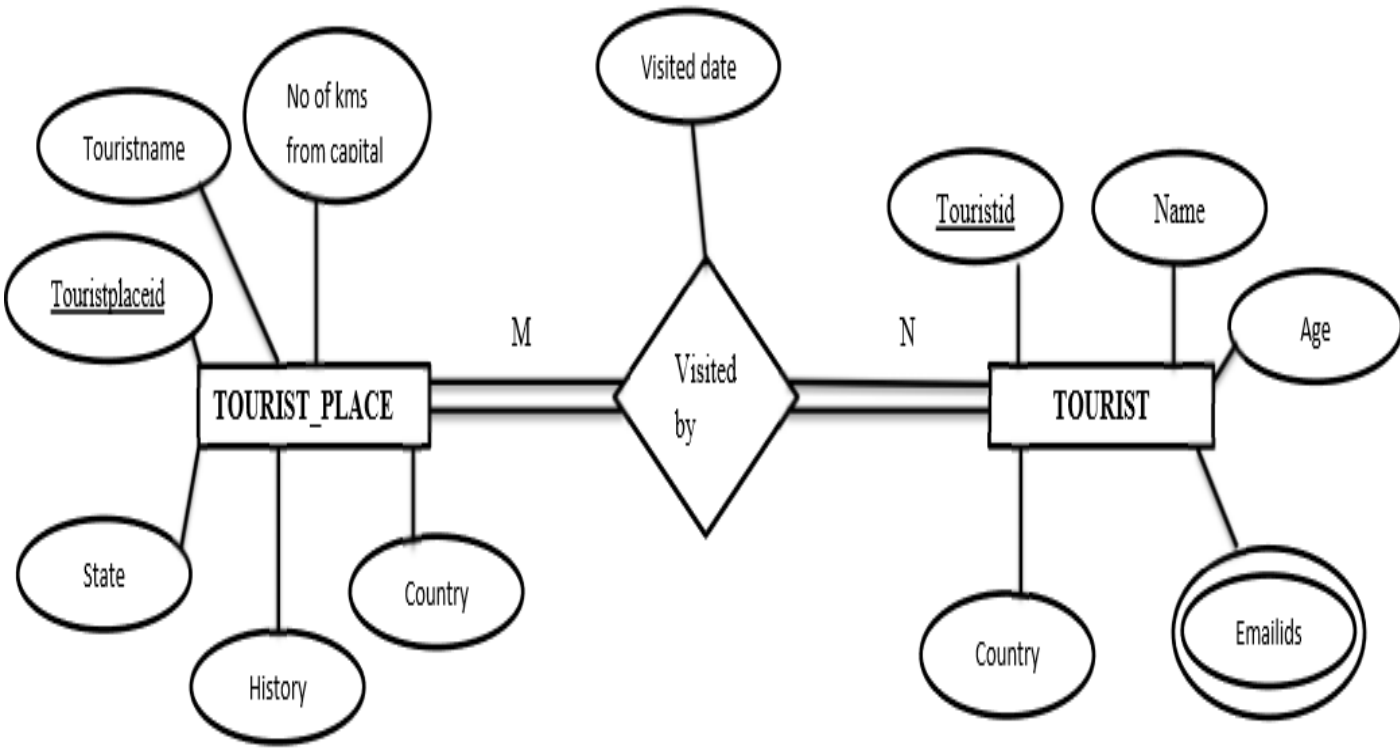
2 List details of Tourist place where maximum number of tourists visited.

3 List the details of tourists visited all tourist places of the state “KARNATAKA”.

4 Display the details of the tourists visited at least one tourist place of the state, but visited all states tourist places.

5 Display the details of the tourist place visited by the tourists of all country.

LAB 4 DBMS ER-DIAGRAM



TOURIST TABLE

touristid	touristname	age	country
1001	Sachin	25	India
1002	Santhu	24	India
1003	Nidhi	15	India
1004	niranth	12	India
1005	Rashi	8	India
1006	Paavu	22	america
1007	Smaya	22	Japan
1008	smaya	22	Korea

TOURIST PLACE TABLE

tplaceid	tplacename	state	No_of_kms	history	country
100	mysore	karnataka	100	sedsdsdd	india
200	shimogga	karnataka	122	Asdsds	india
300	kodachadri	karnataka	454	Dsdasds	india
400	mandya	karnataka	484	Sasasaaa	india
500	| hassan	karnataka	499	Eeedj	india
600	hosanagara	delhi	111	Eeeeee	america
700	kuruva	goa	888	Wwwww	Uk
800	chimmu	andhra	888	Aaaaaa	China

TOURIST EMAIL TABLE

Touristid	Email_id

1001	sachinkv@gmail.com
1001	santhu@gmail.com
1002	Niru@gmail.com
1003	paav@gmail.com
1004	smaya@gmail.com

TOURIST_VISITED_PLACES TABLE

touristid	tplaceid	Visited date
1001	100	2018-02-03
1002	200	2018-03-18
1003	300	2017-02-08
1004	400	2015-02-05
1005	500	2014-02-08
1006	600	2018-05-09
1007	700	2018-09-01
1008	800	2016-01-09
1004	600	2010-01-03
1008	400	2011-22-03
1008	100	2012-02-03

1: List the state name which is having maximum number of tourist places.

mysql> select state, count(tplaceid) from touristplace group by state order by count(tplaceid) desc limit 1;

STATE	COUNT(tplaceid)
KARNATAKA	5

2: List details of touristplace where maximum number of tourist visited.

```
mysql> select tp.tplaceid,tp.tplacename,tp.state,count(tv.touristid) from
touristplace tp,tourist_visited_places tv where tv.tplaceid=tp.tplaceid
group by tv.tplaceid order by count(tv.touristid) desc limit 1;
```

tplaceid	tplacename	state	Count(tv.touristid)
100	mysore	karnataka	4

3:List details of tourist visited all tourist places of the KARNATAKA.

list out the tourist places in karnataka

```
mysql> select state ,count(tplaceid) as no_of_places from touristplace where
state="karnataka";
```

state	No_of_places
karnataka	5

list out tourists who visited plaes in Karnataka state

```
mysql> select tv.touristid from tourist_visited_places tv,touristplace tp
where tv.tplaceid=tp.tplaceid  and state="karnataka";
```

touristid
1001
1001
1001
1001
1001
1001
1002
1003
1004

list out the tourist id and no.of.places in karnataka

```
mysql> select tv.touristid , count(tv.touristid) as no_of_places from
tourist_visited_places tv ,touristplace tp where tp.tplaceid=tv.tplaceid and
state="karnataka" group by tv.touristid;
```

touristid	No_of_places
1001	6
1002	1
1003	1
1004	1

List details of tourist visited all tourist places of the KARNATAKA.

```
mysql> select tv.touristid,count(tv.touristid) as no_of_places from
tourist_visited_places tv ,touristplace tp where tp.tplaceid=tv.tplaceid and
state="karnataka" group by tv.touristid having count(tv.touristid)>=(select
count(tplaceid) from touristplace where state="karnataka");
```

touristid	no_of_places
1001	6

4: Display the details of the tourists visited atleast one tourist place of the state, but visited all states tourist places.

List out the distinct no.of.states.

```
mysql> select count(distinct state) from touristplace;
```

Count(distinct state)
4

list out touristid and no.of.places.

```
mysql> select touristid,count(distinct tplaceid) from tourist_visited_places
group by touristid having count(distinct tplaceid);
```

touristid	Count(distinct tplaceid)
1001	8
1002	1
1003	1
1004	1

list out the touristid more than 4 places of distinct states.

```
mysql> select touristid,count(distinct tplaceid) from tourist_visited_places
group by touristid having count(distinct tplaceid)>=4;
```

touristid	Count(distinct placeid)
1001	8

Display the details of the tourists visited atleast one tourist place of the state, but visited all states tourist places.

mysql> select touristid,count(distinct tplaceid) from tourist_visited_places group by touristid having count(distinct tplaceid)>=(select count(distinct state) from touristplace);

Touristid	Count(distinct tplaceid)
1001	8

5:Display the details of the tourist place visited by the tourists of all country.

list out the no.of.countries

mysql> select count(distinct country) as no_of_countries from touristplace;

No_of_countries
4

list out the tourist placeid and no.of.visitors

```
mysql>  select tplaceid,count(touristid) as no_of_visitors from
tourist_visited_places group by tplaceid having count(distinct touristid);
```

tplaceid	No_of_visitors
100	11
200	2
300	2
400	2
500	2
600	1
700	1
800	1

list out the tourist id and no.of.visitors from different country

```
mysql> select tv.tplaceid,count(tv.touristid),count(distinct t.country) from
tourist_visited_places tv,tourist t ,touristplace tp where
tv.touristid=t.touristid and tv.tplaceid=tp.tplaceid group by tv.tplaceid
having count(distinct t.country)=4;
```

tplaceid	Count(tv.touristid)	Count(distinct t.country)
100	11	4

Display the details of the tourist place visited by the tourists of all country.

```
mysql> select tv.tplaceid,count(tv.touristid) as no_of_visitors,count(distinct
t.country) as no_of_contries from tourist_visited_places tv,tourist t
,touristplace tp where tv.touristid=t.touristid and tv.tplaceid=tp.tplaceid
group by tv.tplaceid having count(distinct t.country)>=(select
count(distinct t.country) from tourist t);
```

tplaceid	No_of_visitors	No_of_countries
100	11	4

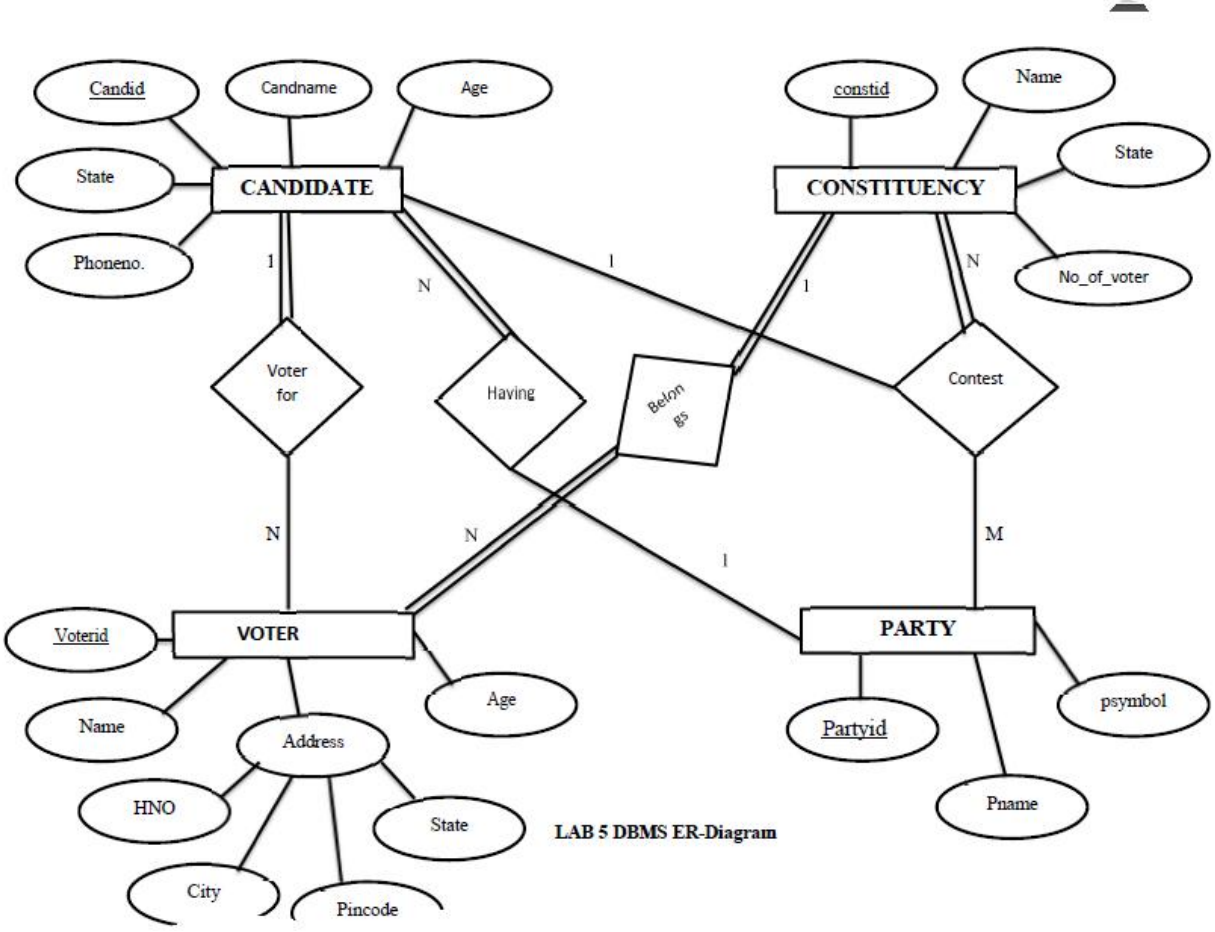
VOTERS

Design an ER-diagram for the following scenario, Convert the same into a relational model,
normalize Relations into a suitable Normal form and then solve the following queries.

A country wants to conduct an election for the parliament. A country having many constituencies.
Each constituency is identified uniquely by Constituency_id, having the Name, belongs to a state,Number_of_voters. A constituency can have many voters. Each voter is uniquely identified by
using Voter_id, having the Name, age, address (involves Houseno,city,state,pincode). Each voter
belongs to only one constituency. There are many candidates contesting in the election. Each
candidates are uniquely identified by using candidate_id, having Name, phone_no, age, state. A
candidate belongs to only one party.Thereare many parties. Each party is uniquely identified by
using Party_id, having Party_Name,Party_symbol. A candidate can contest from many constituencies under a same party. A party can have many candidates contesting from different
constituencies. No constituency having the candidates from the same party. A constituency can have
many contesting candidates belongs to different parties. Each voter votes only one candidate of
his/her constituencty.

Queries:

1 List the details of the candidates who are contesting from more than one constituencies which are belongs to different states.
2 Display the state name having maximum number of constituencies.
3 Create a stored procedure to insert the tuple into the voter table by checking the voter age.
If voter's age is at least 18 years old, then insert the tuple into the voter else display the "Not an eligible voter msg" .
4 Create a stored procedure to display the number_of_voters in the specified constituency. Where the constituency name is passed as an argument to the stored procedure.
5 Create a TRIGGER to UPDATE the count of " Number_of_voters" of the respective constituency in "CONSTITUENCY" table , AFTER inserting a tuple into the "VOTERS" table.



LAB 5 DBMS ER-Diagram

mysql> select * from candidate;

cid	Cname	Phno	Age	State	Pid
1	Sagar	9874563210	22	Karnataka	11
2	Sasi	8547856958	30	Karnataka	11
3	Manu	8569741258	35	Karnataka	22
4	Anoop	8745896321	38	Karnataka	22
5	sanoop	9854712365	25	Karnataka	33

mysql> select * from voter;

Vid	Vname	Age	City	State	Hno	Coined	cid
111	Shreyas	25	Mysore	karnataka	503	300	1
112	Shan	30	Virajpet	karnataka	505	300	1
113	Ranjith	40	Virajpet	karnataka	510	301	2
114	Manja	32	Madikeri	karnataka	514	302	3
115	veerappan	32	mandya	karnataka	654	302	4

mysql> select * from constituency;

Coined	Conname	State	No_of_voters
300	Virajpet	karnataka	100
301	Mysore	karnataka	100
302	Madurai	tm	1000

cid	Pid	coinid
1	11	301
1	11	302
1	11	303
1	11	300
2	22	304
3	33	301
3	33	304

mysql> select * from contest;

1. List the details of the candidates who are contesting from more than one constituencies which are belongs to different states

mysql> select cid,count(coinid) from contest group by(cid);

cid	Count(coined)
1	4
2	1
3	2

mysql> select c.cid,cd.cname,count(c.coinid)from contest c,candidate cd where c.cid=cd.cid group by(cid);

cid	Cname	Count(c.coinid)
1	Sagar	4
2	Sasi	1
3	manu	2

mysql> select c.cid,cd.cname,count(c.coinid)from contest c,candidate cd where c.cid=cd.cid group by(cid) having count(c.coinid)>2;

cid	Cname	Count(c.coinid)
1	Sagar	4

2.Display the state name having maximum number of constituencies.

mysql> select state,count(coinid) from constituency group by state order by count(coinid) desc limit 1;

State	Count(coinid
Karnataka	2

3.Create a stored procedure to insert the tuple into the voter table by checking the voter age. If voter's age is at least 18 years old, then insert the tuple into the voter else display the "Not an eligible voter msg" .

Delimiter //

mysql> CREATE PROCEDURE V11(IN vid int,IN vname1 varchar(20)

-> ,IN age1 int,IN city1 varchar(20),IN state1 varchar(20),IN HNO1 int,IN coinid1 int,IN cid1 int)

-> BEGIN

-> declare msg varchar(70);

-> if age1>=18 then

-> insert into voter values(vid,vname1,age1,city1,state1,HNO1,coinid1,cid1);

-> set msg="row inserted succesfully";

-> else

-> set msg="voter age is less than 18 years";

-> end if;

-> select msg;

-> END;

-> //

mysql> CALL V11(119,"akshay",15,"mysore","karnataka",120,300,1);

-> //

Msg
Voter age is less than 18

mysql> CALL V11(119,"akshay",19,"mysore","karnataka",120,300,1);

-> //

Msg
Row inserted successfully

mysql> select * from voter;

-> //

Vid	Vname	Age	City	State	Hno	Coined	cid
111	Shreyas	25	Mysore	Karnataka	503	300	1
112	Shan	30	Virajpet	Karnataka	505	300	1
113	ranjith	40	Virajpet	Karnataka	510	301	2
114	manja	32	Madikeri	Karnataka	514	302	3
115	veerappan	32	Mandya	Karnataka	654	302	4
116	Aaa	15	Mandya	Karnataka	51	300	1
119	Akshay	19	Mysore	Karnataka	120	300	1

4. Create a stored procedure to display the number_of_voters in the specified constituency. Where the constituency name is passed as an argument to the stored procedure

mysql> CREATE PROCEDURE V2(coin1 int)BEGIN select no_of_voters from constituency where coinid=coinid1;END//

mysql> select * from constituency;

-> //

Coined	Conname	State	No_of_voter

300	virajpet	Karnataka	100
301	mysore	Karnataka	100
302	madurai	Tm	1000

mysql> CREATE PROCEDURE V3(coin1 int)BEGIN select no_of_voters from constituency where coinid=coin1;END//

mysql> select * from constituency//

Coined	Conname	State	No_of_voters
300	Virajpet	Karnataka	100
301	Mysore	Karnataka	100
302	Madurai	Tm	1000

mysql> CALL V3(300)//

No_of_voters
100

mysql> CREATE PROCEDURE V4(conname1 varchar(50)) BEGIN select no_of_voters from constituency where conname=conname1;END//

mysql> CALL V4("mysore")//

No_of_voters
100

5. Create a TRIGGER to UPDATE the count of " Number_of_voters" of the respective constituency in "CONSTITUENCY" table , AFTER inserting a tuple into the "VOTERS" table

mysql> create trigger T after insert on voter for each row begin update constituency set no_of_voters=no_of_voters+3 where coinid=new.coinid;end//

mysql> insert into voter values(116,"aaa",15,"mandya","karnataka",51,300,1)//

mysql> select * from voter;

-> //

Vid	Vname	Age	City	State	Hno	Coinid	cid
111	Shreyas	25	Mysore	karnataka	503	300	1
112	Shan	30	Virajpet	karnataka	505	300	1
113	Ranjith	40	Virajpet	karnataka	510	301	2
114	manja	32	madikeri	karnataka	514	302	3
115	Veerappan	32	Mandya	karnataka	654	302	4
116	Aaa	15	Mandya	karnataka	51	300	1
119	akshay	19	mysore	karnataka	120	300	1