

1. To Create Database/Scheme

```
CREATE SCHEMA `bootcamp` ;
```

2. Create a table with date database with columns: Id, firstName, lastName, age, department.

```
CREATE TABLE `bootcamp`.`database` (  
  `id` INT NOT NULL,  
  `firstName` VARCHAR(45) NOT NULL,  
  `lastName` VARCHAR(45) NOT NULL,  
  `age` INT NOT NULL,  
  `department` VARCHAR(45) NOT NULL,  
  PRIMARY KEY (`id`));
```

3. Add one or two columns to the table.

```
alter table bootcamp.database add address VARCHAR(40);  
alter table bootcamp.database add date date;
```

4. Drop one column for the table.

```
alter table bootcamp.database drop column date;
```

5. Update firstName and lastName of the table with 5 records?

--Before completing this, I first added values to our database.

```
INSERT INTO `bootcamp`.`database` (`id`, `firstName`,  
  `lastName`, `age`, `department`, `address`) VALUES ('123',  
  'SHEKHAR', 'BASNET', '12', 'engr', 'npl');
```

```
INSERT INTO `bootcamp`.`database` (`id`, `firstName`,  
  `lastName`, `age`, `department`, `address`) VALUES ('124',  
  'ram', 'thapa', '13', 'it', 'ind');
```

```
INSERT INTO `bootcamp`.`database` (`id`, `firstName`,  
  `lastName`, `age`, `department`, `address`) VALUES ('125',  
  'hari', 'dhital', '82', 'back', 'kora');
```

```
INSERT INTO `bootcamp`.`database` (`id`, `firstName`,  
  `lastName`, `age`, `department`, `address`) VALUES ('126',  
  'gita', 'oli', '46', 'font', 'japan');
```

```

INSERT INTO `bootcamp`.`database` (`id`, `firstName`,
`lastName`, `age`, `department`, `address`) VALUES ('127',
'ravi', 'pand', '48', 'out', 'usa');

INSERT INTO `bootcamp`.`database` (`id`, `firstName`,
`lastName`, `age`, `department`, `address`) VALUES ('128',
'sita', 'rimal', '85', 'in', 'canada');

INSERT INTO `bootcamp`.`database` (`id`, `firstName`,
`lastName`, `age`, `department`, `address`) VALUES ('129',
'anil', 'adhi', '42', 'date', 'brazil');

INSERT INTO `bootcamp`.`database` (`id`, `firstName`,
`lastName`, `age`, `department`, `address`) VALUES ('130',
'bharat', 'poudel', '41', 'stair', 'germeny');

INSERT INTO `bootcamp`.`database` (`id`, `firstName`,
`lastName`, `age`, `department`, `address`) VALUES ('131',
'sunil', 'toki', '30', 'ship', 'ukraine');

INSERT INTO `bootcamp`.`database` (`id`, `firstName`,
`lastName`, `age`, `department`, `address`) VALUES ('132',
'rabin', 'hun', '31', 'driver', 'russia');

INSERT INTO `bootcamp`.`database` (`id`, `firstName`,
`lastName`, `age`, `department`, `address`) VALUES ('133',
'rajin', 'solti', '32', 'logi', 'india');

INSERT INTO `bootcamp`.`database` (`id`, `firstName`,
`lastName`, `age`, `department`, `address`) VALUES ('134',
'vicky', 'dev', '35', 'adm', 'turkey');

INSERT INTO `bootcamp`.`database` (`id`, `firstName`,
`lastName`, `age`, `department`, `address`) VALUES ('135',
'vedant', 'khatri', '71', 'user', 'qatar');

INSERT INTO `bootcamp`.`database` (`id`, `firstName`,
`lastName`, `age`, `department`, `address`) VALUES ('136',
'ronal', 'ghimire', '24', 'demo', 'usa');

INSERT INTO `bootcamp`.`database` (`id`, `firstName`,
`lastName`, `age`, `department`, `address`) VALUES ('137',
'uniq', 'sunar', '23', 'skill', 'bhutan');

INSERT INTO `bootcamp`.`database` (`id`, `firstName`,
`lastName`, `age`, `department`, `address`) VALUES ('138',
'raj', 'thapa', '22', 'account', 'maldives');

INSERT INTO `bootcamp`.`database` (`id`, `firstName`,
`lastName`, `age`, `department`, `address`) VALUES ('139',
'kumar', 'stha', '21', 'market', 'nepal');

INSERT INTO `bootcamp`.`database` (`id`, `firstName`,
`lastName`, `age`, `department`, `address`) VALUES ('140',
'ganesh', 'sonar', '20', 'brand', 'nepal');

```

-- Now updating --

-- record 1 --

```
update bootcamp.database
set firstName ='allen',
    lastName='Jonas'
where id = 125;
```

-- record 2 --

```
update bootcamp.database
set firstName ='gopal',
    lastName='adhi'
where id = 126;
```

-- record 3 --

```
update bootcamp.database
set firstName ='shiva',
    lastName='hamal'
where id = 127;
```

-- record 4 --

```
update bootcamp.database
set firstName ='anmol',
    lastName='gupta'
where id = 128;
```

-- record 5 --

```
update bootcamp.database
set firstName ='subash',
    lastName='suyal'
where id = 139;
```

5	2010:35	update bootcamp.database set firstName = 'allen', lastName = 'Jonas' where id = 125	1 row(s) affected Rows matched: 1 Changed: 1 Warnings: 0	0.000 sec
6	2010:42	update bootcamp.database set firstName = 'gopal', lastName = 'adhi' where id = 126	1 row(s) affected Rows matched: 1 Changed: 1 Warnings: 0	0.016 sec
7	2010:45	update bootcamp.database set firstName = 'shiva', lastName = 'hamal' where id = 127	1 row(s) affected Rows matched: 1 Changed: 1 Warnings: 0	0.000 sec
8	2010:48	update bootcamp.database set firstName = 'anmol', lastName = 'gupta' where id = 128	1 row(s) affected Rows matched: 1 Changed: 1 Warnings: 0	0.000 sec
9	2010:51	update bootcamp.database set firstName = 'subash', lastName = 'suyal' where id = 139	1 row(s) affected Rows matched: 1 Changed: 1 Warnings: 0	0.000 sec

6. Delete 4 rows from the records whose age is below 18 years?

```
delete from bootcamp.database  
where age<18;
```

1 20:06:18 delete from bootcamp.database where age<18 2 row(s) affected

7. Use Aggregate function to the age column in the table

```
select count(age) as totalPeopleOver40  
from bootcamp.database  
where age>40;
```

13 20:14:50 select count(firstName) as totalPeopleOver40 from bootcamp.database where age>40 LIMIT 0, 1000 1 row(s) returned

8. Use where clause, having, order by, group by

```
select firstName  
from bootcamp.database  
group by age  
having count(id)<135  
order by firstName;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content: |

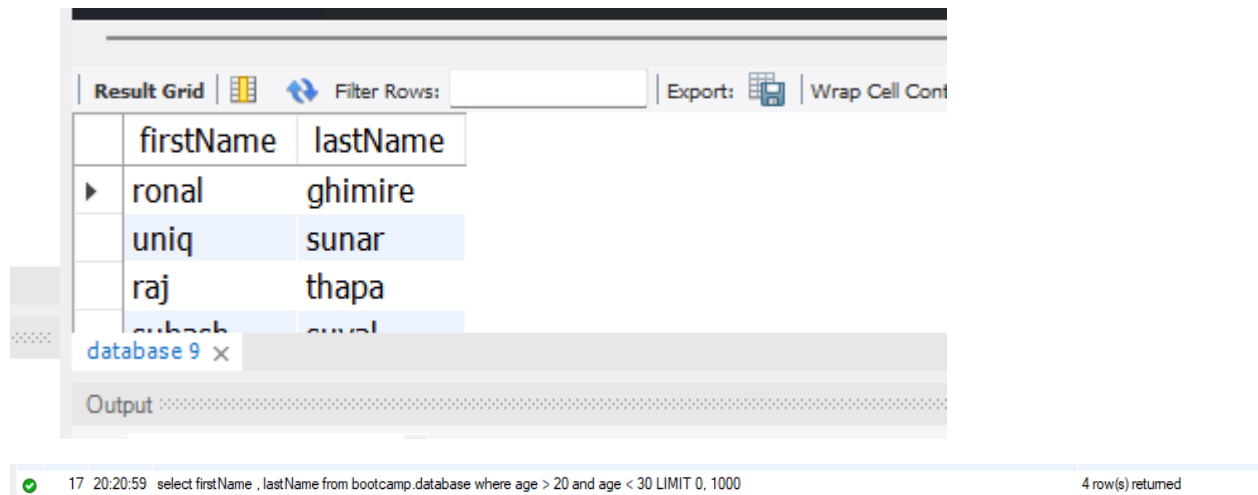
firstName
allen
anil
anmol
bharat
ganesh
gopal
rabin
rishi

16 20:19:02 select firstName from bootcamp.database group by age having count(id)<135 order by firstName LIMIT 0, 1000 16 row(s) returned

9. Show the difference between AND and OR logical operator?

➤ Use of AND

```
select firstName , lastName  
from bootcamp.database  
where age > 20 and age < 30;
```



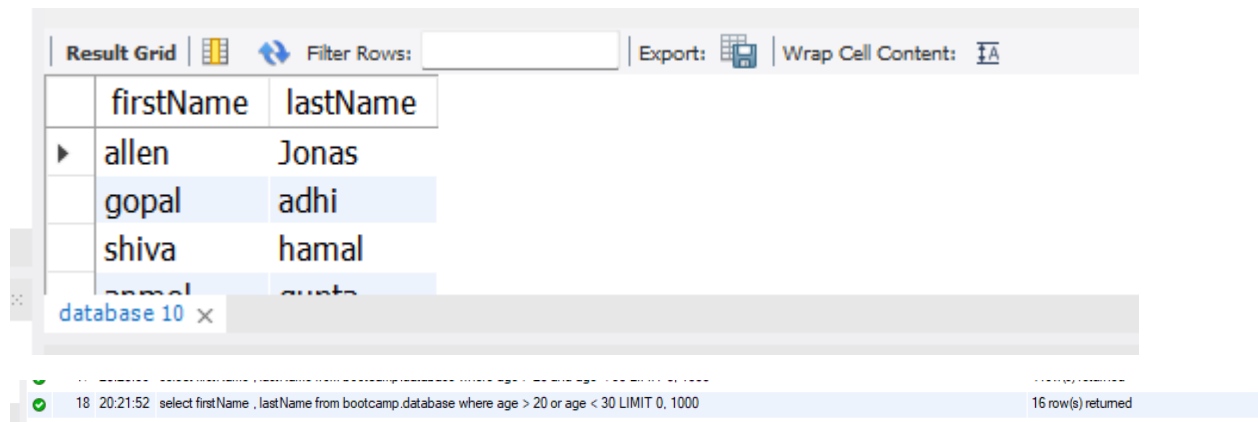
The screenshot shows a database query result in a 'Result Grid' format. The query is: `select firstName , lastName from bootcamp.database where age > 20 and age < 30 LIMIT 0, 1000`. The result displays 4 rows of data:

firstName	lastName
ronal	ghimire
uniq	sunar
raj	thapa
subash	sunar

The status bar at the bottom indicates: 17 20:20:59 select firstName , lastName from bootcamp.database where age > 20 and age < 30 LIMIT 0, 1000 4 row(s) returned

➤ User of OR

```
select firstName , lastName
from bootcamp.database
where age > 20 or age < 30;
```



The screenshot shows a database query result in a 'Result Grid' format. The query is: `select firstName , lastName from bootcamp.database where age > 20 or age < 30 LIMIT 0, 1000`. The result displays 16 rows of data:

firstName	lastName
allen	Jonas
gopal	adhi
shiva	hamal
arnab	gusta

The status bar at the bottom indicates: 18 20:21:52 select firstName , lastName from bootcamp.database where age > 20 or age < 30 LIMIT 0, 1000 16 row(s) returned

10. Why do we use between and like in mysql? What is the difference in IN and NOT IN?

➤ Use of between to print the value which is between two numbers

```
select firstName, age
from bootcamp.database
where age between 20 and 30
order by firstName asc;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

	firstName	age
▶	ganesh	20
	raj	22
	ronal	24
	subash	21
	sunil	30
	uniq	23

database 13 x

22 20:25:51 select firstName, age from bootcamp.database where age between 20 and 30 order by firstName asc LIMIT 0, 1000 6 row(s) returned

- Printing values using LIKE which will print the only if it matches a value which we put between %[string]%

```
select firstName, age
from bootcamp.database
where firstName like '%raj%';
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

	firstName	age
▶	rajin	32
	raj	22

23 20:27:29 select firstName, age from bootcamp.database where firstName like "%raj%" LIMIT 0, 1000 2 row(s) returned

-- Using IN to find people living in japan

```
select firstName, address
from bootcamp.database
where address in ('japan');
```

Result Grid			Filter Rows:	Export:	Wrap Cell Content:
	firstName	address			
▶	gopal	japan			

25	20:30:38	select firstName, address from bootcamp.database where address in ('japan') LIMIT 0, 1000	1 row(s) returned
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-- Using IN to find people not living in nepal

```
select firstName, address
from bootcamp.database
where address not in ('nepal');
```

Result Grid			Filter Rows:	Export:	Wrap Cell Content:
	firstName	address			
▶	allen	kora			
	gopal	japan			
	shiva	usa			
	anmol	canada			
	anil	brazil			
	bharat	germeny			

26	20:31:38	select firstName, address from bootcamp.database where address not in ('nepal') LIMIT 0, 1000	14 row(s) returned
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