

## Assingment-2

Q1. Write a SQL statement to create a table named jobs including columns job\_id, job\_title, min\_salary and max\_salary, and make sure that, the default value for job\_title is blank and min\_salary is 8000 and max\_salary is NULL will be entered automatically at the time of insertion if no value assigned for the specified columns.

```
cdac=# create table job(job_id integer,job_title varchar(20)NOT NULL DEFAULT ' ',min_salary numeric(6,0) DEFAULT 8000,max_salary numeric(6,0)DEFAULT
NULL,primary key(job_id));
```

```
CREATE TABLE
```

```
cdac=# \d job;
```

Table "public.job"				
Column	Type	Collation	Nullable	Default
job_id	integer		not null	
job_title	character varying(20)		not null	' '::character varying
min_salary	numeric(6,0)			8000
max_salary	numeric(6,0)			NULL::numeric

```
Indexes:
```

```
"job_pkey" PRIMARY KEY, btree (job_id)
```

Q.2 Write a SQL statement to create and insert a record into the table countries to ensure that, at country\_id and the region\_id combination will be entered once in the table.

```
cdac=# create table country(country_id integer NOT NULL UNIQUE,country_name varchar(20) NOT NULL,region_id integer NOT NULL UNIQUE);
```

```
CREATE TABLE
```

```
cdac=# select * from country;
```

```
country_id | country_name | region_id
-----+-----+-----
```

```
(0 rows)
```

```
cdac=# create table country(country_id integer, country_name varchar(20) NOT NULL, region_id integer, primary key(country_id, region_id));
CREATE TABLE
cdac=# select * from country;
 country_id | country_name | region_id
-----+-----+-----
(0 rows)
```

**Q.3** Write a SQL statement to create and insert records into the table countries to ensure that the country\_id column will not contain any duplicate data and this will be automatically incremented and the column country\_name will be filled up by 'N/A' if no value assigned to that column.

**\*\* Here we provide country\_id:**

```
postgres=# create table countries(country_id serial unique, country_name varchar(20) default 'N/A', region_id integer);
CREATE TABLE
postgres=# select * from countries;
 country_id | country_name | region_id
-----+-----+-----
(0 rows)
```

```
postgres=# \d countries;
```

Table "public.countries"				
Column	Type	Collation	Nullable	Default
country_id	integer		<u>not null</u>	nextval('countries_country_id_seq'::regclass)
country_name	character varying(20)			<u>'N/A'::character varying</u>
region_id	integer			

Indexes:

```
"countries_country_id_key" UNIQUE CONSTRAINT, btree (country_id)
```

```
postgres=# insert into countries(country_id, region_id) values (1, 123), (2, 142);
INSERT 0 2
```

```
postgres=# select * from countries;
 country_id | country_name | region_id
-----+-----+-----
          1 | N/A         |        123
          2 | N/A         |        142
(2 rows)
```

```
postgres=# update countries set country_name='India' where country_id=2;
UPDATE 1
```

```
postgres=# select * from countries;
 country_id | country_name | region_id
-----+-----+-----
          1 | N/A         |        123
          2 | India      |        142
(2 rows)
```

**\*\*If we want add region Id without giving country id it is checking whether the country id is duplicated or not if it is already there it will add the record to next country id.**

```
postgres=# insert into countries (region_id)values(135);
ERROR:  duplicate key value violates unique constraint "countries_country_id_key"
DETAIL:  Key (country_id)=(1) already exists.
postgres=# insert into countries (region_id)values(135);
ERROR:  duplicate key value violates unique constraint "countries_country_id_key"
DETAIL:  Key (country_id)=(2) already exists.
postgres=# insert into countries (region_id)values(135);
INSERT 0 1
postgres=# select *from countries;
 country_id | country_name | region_id
-----+-----+-----
          1 | N/A          |         123
          2 | India        |         142
          3 | N/A          |         135
(3 rows)
```

```
postgres=# insert into countries (country name,region_id) values('Brazil',135);
INSERT 0 1
postgres=# select *from countries;
 country_id | country_name | region_id
-----+-----+-----
          1 | N/A          |         123
          2 | India        |         142
          3 | N/A          |         135
          4 | Brazil       |         135
(4 rows)
```