Assignments – 21/3/24

Task 1:

1. create database StudentRecords;
2. exec sp\_renamedb StudentRecords,UniversityRecords;
3. drop database UniversityRecords;
4. Int – Integers

Varchar- variable length string

Char- fixed length string

Smallint-smaller range of int

Decimal(p,s)- Integer with point values p-precision s-scale

Text- Large line of string

Date – stores as YYYY-MM-DD

Datetime-combines date and time

1. Create table student (studentid int primary key , firstname varchar(50) not null, lastname varchar(50) not null, Phone varchar(20) unique, DOB date, Gender char(1) check (Gender in ('M','F')),address text, cgpa decimal(3,2) check (cgpa between 0 and 10),Graduatedstatus char(1) check(GraduatedStatus in (‘Y’,’N’));
2. alter table student add Email varchar(50);
3. exec sp\_rename student,UniversityStudents;
4. drop table UniversityStudents;
5. insert into student values(1,'riyan','pranav','12345','2003-05-03','M','Chennai',8.3),(2,'Arnab','Keshav','23456','2003-10-20','M','Delhi',8.4),(3,'Niharika','Menon','45645','2005-03-30','F','Bangalore',8.5),(4,'Madhu','Mintra','56543','2002-08-10','F','Chennai',9.1),(5,'Sai','Ritheshwar','63834','2004-02-08','M','Chennai',9.3);
6. update student set Email='riyan@gmail.com' where firstname='riyan';
7. delete from student where Graduatedstatus=’Y’;
8. Select firstname,lastname,Email from student;
9. Select \* from student where age>18;
10. Select \* from student;
11. Select \* from student where dept=’CSE’; Select \* from student where dept=’ECE’;
12. Select \* from student where Gender in ‘M’;

Select \* from student where DOB between ‘2002-01-01’ and ‘2003-01-01’;

Select \* from student where fistname like ‘n%’;

Task 2

1. Create database empolyeerecords;
2. Exec sp\_renamedb ‘employeerecords’,’HR\_Database’;
3. Alter database HR\_Database set offline;

Drop database HR\_Database;

1. Int – Integers use case-quantity,age

Varchar- variable length string use case-email,phone no

Char- fixed length string use case-gender,yes or no questions

Smallint-smaller range of int use case- student id , product id

Decimal(p,s)- Integer with point values p-precision s-scale use case- price

Text- Large line of string use case – description , address

Date – stores as YYYY-MM-DD use case- date of joining ,DOB

1. Create table customers (customerid int primary key, fullname varchar(50) not null, Email varchar(50) not null unique, Phone varchar(10), datejoined date);
2. Alter table customers add address text;
3. Exec sp\_rename customers,ClientDetails;
4. Drop table ClientDetails;
5. insert into ClientDetails values (1,'Jihad','ji12@gmail.com','12345','2021-05-03','chennai'),(2,'Jaham','j@gmail.com','23456','2018-10-02','delhi'),(3,'Rohit','r@gmail.com','34543','2020-10-05','Kolkata'),(4,'Rohan','ro@gmail.com','45644','2020-02-02','bengaluru'),(5,'mahaan','m@gmail.com','76767','2010-02-02','hyderabad');
6. update ClientDetails set Email=’abc@gmail.com’ where customerid=3;
7. delete from ClientDetails where customerid=5;
8. Insert into ClientDetails values (6,’nikumb’,’n@gmail.com,’454324’,’2020-12-08’,’chennai’),(7,’ajay’,’a@gmail.com’,’72132’,’2021-02-08’,’kerala’);
9. Select firstname,Email from ClientDetails;
10. Select \* from ClientDetails where datejoined > ‘2020-01-01’;
11. Select \* from ClientDetails where fullname LIKE ‘J%’;
12. Select \* from ClientDetails where Phone is null;
13. Select \* from ClientDetails where customerid in (1,3,7);
14. Select distinct Email from ClientDetails;
15. Select \* from ClientDetails where address=’chennai’ or datejoined> ‘2019-06-01’;

Select \* from ClientDetails where address=’chennai’ AND datejoined> ‘2019-06-01’;

1. Select customerid from ClientDetails where datajoined between ‘2018-01-01’ and ‘2023-12-31’;
2. Select customer id as cid, fullname as fname from ClientDetails;
3. Select customerid from ClientDetails where address=’hyderabad’ and datejoined<’2016-01-01’;

Task 3

1. select concat(FirstName,LastName) as Fullname from Employees;
2. select FirstName,DATEDIFF(year,DateOfBirth,GETDATE()) as Age from Employees;
3. select FirstName,DATEDIFF(year,HireDate,GETDATE()) as Age from Employees;
4. update Employees set SalaryCategory=CASE

when Salary<50000 then 'low'

when Salary between 50000 and 100000 then 'medium'

else 'high'

end;

1. select datename(month,HireDate) as Monthofjoining from Employees;