CREATE TABLE departments (

department\_id INT PRIMARY KEY,

department\_name VARCHAR (30) NOT NULL

);

CREATE TABLE employees (

employee\_id INT PRIMARY KEY,

first\_name VARCHAR (20) DEFAULT NULL,

last\_name VARCHAR (25) NOT NULL,

email VARCHAR (100) NOT NULL,

phone\_number VARCHAR (20) DEFAULT NULL,

hire\_date DATETIME NOT NULL,

salary FLOAT NOT NULL,

manager\_id INT DEFAULT NULL,

department\_id INT DEFAULT NULL,

FOREIGN KEY (department\_id) REFERENCES departments (department\_id),

FOREIGN KEY (manager\_id) REFERENCES employees (employee\_id)

);

/\*Data for the table departments \*/

INSERT INTO departments(department\_id,department\_name)

VALUES (1,'Administration');

INSERT INTO departments(department\_id,department\_name)

VALUES (2,'Marketing');

INSERT INTO departments(department\_id,department\_name)

VALUES (3,'Purchasing');

INSERT INTO departments(department\_id,department\_name)

VALUES (4,'Human Resources');

INSERT INTO departments(department\_id,department\_name)

VALUES (5,'Shipping');

INSERT INTO departments(department\_id,department\_name)

VALUES (6,'IT');

INSERT INTO departments(department\_id,department\_name)

VALUES (7,'Public Relations');

INSERT INTO departments(department\_id,department\_name)

VALUES (8,'Sales');

INSERT INTO departments(department\_id,department\_name)

VALUES (9,'Executive');

INSERT INTO departments(department\_id,department\_name)

VALUES (10,'Finance');

INSERT INTO departments(department\_id,department\_name)

VALUES (11,'Accounting');

/\*Data for the table employees \*/

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (100,'Steven','King','steven.king@sqltutorial.org','515.123.4567','1987-06-17',24000.00,NULL,9);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (101,'Neena','Kochhar','neena.kochhar@sqltutorial.org','515.123.4568','1989-09-21',17000.00,100,9);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (102,'Lex','De Haan','lex.de haan@sqltutorial.org','515.123.4569','1993-01-13',17000.00,100,9);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (103,'Alexander','Hunold','alexander.hunold@sqltutorial.org','590.423.4567','1990-01-03',9000.00,102,6);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (104,'Bruce','Ernst','bruce.ernst@sqltutorial.org','590.423.4568','1991-05-21',6000.00,103,6);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (105,'David','Austin','david.austin@sqltutorial.org','590.423.4569','1997-06-25',4800.00,103,6);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (106,'Valli','Pataballa','valli.pataballa@sqltutorial.org','590.423.4560','1998-02-05',4800.00,103,6);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (107,'Diana','Lorentz','diana.lorentz@sqltutorial.org','590.423.5567','1999-02-07',4200.00,103,6);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (108,'Nancy','Greenberg','nancy.greenberg@sqltutorial.org','515.124.4569','1994-08-17',12000.00,101,10);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (109,'Daniel','Faviet','daniel.faviet@sqltutorial.org','515.124.4169','1994-08-16',9000.00,108,10);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (110,'John','Chen','john.chen@sqltutorial.org','515.124.4269','1997-09-28',8200.00,108,10);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (111,'Ismael','Sciarra','ismael.sciarra@sqltutorial.org','515.124.4369','1997-09-30',7700.00,108,10);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (112,'Jose Manuel','Urman','jose manuel.urman@sqltutorial.org','515.124.4469','1998-03-07',7800.00,108,10);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (113,'Luis','Popp','luis.popp@sqltutorial.org','515.124.4567','1999-12-07',6900.00,108,10);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (114,'Den','Raphaely','den.raphaely@sqltutorial.org','515.127.4561','1994-12-07',11000.00,100,3);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (115,'Alexander','Khoo','alexander.khoo@sqltutorial.org','515.127.4562','1995-05-18',3100.00,114,3);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (116,'Shelli','Baida','shelli.baida@sqltutorial.org','515.127.4563','1997-12-24',2900.00,114,3);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (117,'Sigal','Tobias','sigal.tobias@sqltutorial.org','515.127.4564','1997-07-24',2800.00,114,3);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (118,'Guy','Himuro','guy.himuro@sqltutorial.org','515.127.4565','1998-11-15',2600.00,114,3);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (119,'Karen','Colmenares','karen.colmenares@sqltutorial.org','515.127.4566','1999-08-10',2500.00,114,3);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (120,'Matthew','Weiss','matthew.weiss@sqltutorial.org','650.123.1234','1996-07-18',8000.00,100,5);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (121,'Adam','Fripp','adam.fripp@sqltutorial.org','650.123.2234','1997-04-10',8200.00,100,5);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (122,'Payam','Kaufling','payam.kaufling@sqltutorial.org','650.123.3234','1995-05-01',7900.00,100,5);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (123,'Shanta','Vollman','shanta.vollman@sqltutorial.org','650.123.4234','1997-10-10',6500.00,100,5);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (126,'Irene','Mikkilineni','irene.mikkilineni@sqltutorial.org','650.124.1224','1998-09-28',2700.00,120,5);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (145,'John','Russell','john.russell@sqltutorial.org',NULL,'1996-10-01',14000.00,100,8);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (146,'Karen','Partners','karen.partners@sqltutorial.org',NULL,'1997-01-05',13500.00,100,8);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (176,'Jonathon','Taylor','jonathon.taylor@sqltutorial.org',NULL,'1998-03-24',8600.00,100,8);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (177,'Jack','Livingston','jack.livingston@sqltutorial.org',NULL,'1998-04-23',8400.00,100,8);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (178,'Kimberely','Grant','kimberely.grant@sqltutorial.org',NULL,'1999-05-24',7000.00,100,8);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (179,'Charles','Johnson','charles.johnson@sqltutorial.org',NULL,'2000-01-04',6200.00,100,8);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (192,'Sarah','Bell','sarah.bell@sqltutorial.org','650.501.1876','1996-02-04',4000.00,123,5);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (193,'Britney','Everett','britney.everett@sqltutorial.org','650.501.2876','1997-03-03',3900.00,123,5);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (200,'Jennifer','Whalen','jennifer.whalen@sqltutorial.org','515.123.4444','1987-09-17',4400.00,101,1);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (201,'Michael','Hartstein','michael.hartstein@sqltutorial.org','515.123.5555','1996-02-17',13000.00,100,2);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (202,'Pat','Fay','pat.fay@sqltutorial.org','603.123.6666','1997-08-17',6000.00,201,2);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (203,'Susan','Mavris','susan.mavris@sqltutorial.org','515.123.7777','1994-06-07',6500.00,101,4);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (204,'Hermann','Baer','hermann.baer@sqltutorial.org','515.123.8888','1994-06-07',10000.00,101,7);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (205,'Shelley','Higgins','shelley.higgins@sqltutorial.org','515.123.8080','1994-06-07',12000.00,101,11);

INSERT INTO employees(employee\_id,first\_name,last\_name,email,phone\_number,hire\_date,salary,manager\_id,department\_id)

VALUES (206,'William','Gietz','william.gietz@sqltutorial.org','515.123.8181','1994-06-07',8300.00,205,11);

**Queries**

**1. Run the above create table and Insert scripts**

**2. Solve the following**

(a) To display the full name, email id, salary of all the employees

(b) To display the full name, email id for department 'Purchasing'

(c) To display the employees who are getting more than salary 8000

(d) To display the employees whose department id is 7 or 11

(e) To display department name, number of employees for each department

(f) To insert a new department and employee

(g) To increase the salary of the employees to 20% whose salary is less than 8000

(h) To display department name, total salary of the department

(i) Write the output of the following

-- Slect MIN(SALARY) from employee

-- Slect SUM(SALARY) from employee

-- Slect AVG(SALARY) from employee

-- Slect COUNT(DISTINCT SALARY) from employee

**3. Write stored procedure to display the employees for given department\_id**

Name of the stored procedure is sp\_list\_employees\_by\_department

argument is @department\_id INT

Stored procedure has to display the employees for given @department\_id

**4. Introduce the column location\_id into department table**

And create the location table to have location\_id, location\_name

Introduce all the required keys included FOREIGN KEY for the department table.

And query the department\_name, location\_name using department, location tables.