Database project

4/26/19

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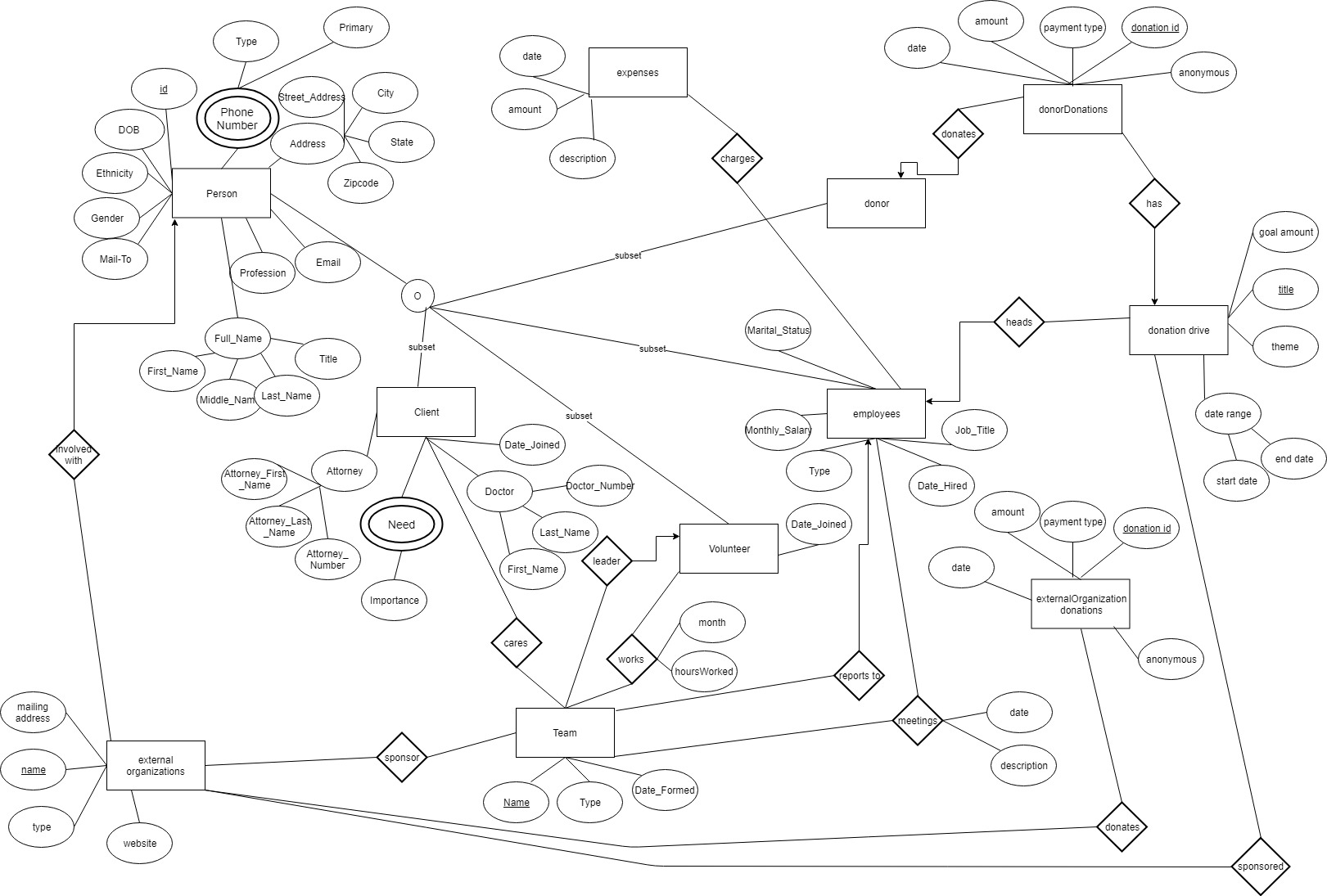
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ER-Diagram



Data Dictionary

Person(id NUMBER, First\_Name VARCHAR2(30 CHAR), Middle\_Name VARCHAR2(30  
 CHAR), Last\_Name VARCHAR2(30 CHAR), Title VARCHAR2(30 CHAR), DOB  
 DATE, Ethnicity VARCHAR2(30 CHAR), Gender CHAR(1), Profession  
 VARCHAR2(50 CHAR), Email VARCHAR2(50 CHAR), Street\_Address  
 VARCHAR2(50 CHAR), City VARCHAR2(30 CHAR), State CHAR(2), Zipcode  
 NUMBER(5), Mail\_To CHAR(1));  
 Constraints for Donor:  
 CHECK (Mail\_To IN('Y', 'N')),  
 CONSTRAINT Person\_pk PRIMARY KEY(id)

Phone\_Number( Person\_Id NUMBER NOT NULL, Phone\_Number NUMBER NOT NULL,  
 Primary CHAR(1), Type VARCHAR2(10 CHAR));  
 Constraints for Phone\_Number:  
 CHECK (Primary IN('Y', 'N')),  
 FOREIGN KEY(Person\_Id) REFERENCES Person(id),  
 CONSTRAINT Phone\_Number\_pk PRIMARY KEY(Person\_Id, Phone\_Number)

Client( id NUMBER, Person\_Id NUMBER UNIQUE, Date\_Joined DATE);  
 Constraints for Client:  
 FOREIGN KEY(Person\_Id) REFERENCES Person(id),  
 CONSTRAINT Client\_pk PRIMARY KEY(id)

Doctor(Client\_Id NUMBER UNIQUE, First\_Name VARCHAR2(50 CHAR), Last\_Name  
 VARCHAR2(50 CHAR), Doctor\_Number NUMBER);  
 Constraints for Doctor:  
 Doctor\_Number NUMBER,  
 FOREIGN KEY(Client\_Id) REFERENCES Client(id)

Attorney(Client\_Id NUMBER UNIQUE, Attorney\_First\_Name VARCHAR2(50 CHAR),  
 Attorney\_Last\_Name VARCHAR2(50 CHAR), Attorney\_Number NUMBER);  
 Constraints for Attorney:  
 FOREIGN KEY Client\_Id REFERENCES Client(id)

Needs(Client\_Id NUMBER, Need VARCHAR2(30 CHAR), Importance NUMBER(2));  
 Constraints for Needs:  
 CONSTRAINT Needs\_pk PRIMARY KEY(Client\_Id, Need, Importance)

Volunteer(**id** NUMBER, Person\_Id NUMBER UNIQUE, Date\_Joined DATE);  
 Constraints for Volunteer:  
 FOREIGN KEY(Person\_Id) REFERENCES Person(id),  
 CONSTRAINT Volunteer\_pk PRIMARY KEY(id)

Employee(id NUMBER, Person\_Id NUMBER, Monthly\_Salary NUMBER(6,2),  
 Marital\_Status CHAR(1), Job\_Title VARCHAR2(50 CHAR), Date\_Hired  
 DATE, Type VARCHAR2(9 CHAR));  
 Constraints for Employee:  
 CHECK (Marital\_Status IN('S', 'M', 'D', 'W')),  
 CHECK (Type IN('FULL-TIME', 'PART-TIME')),  
 FOREIGN KEY(Person\_Id) REFERENCES Person(id),  
 CONSTRAINT Employee\_pk PRIMARY KEY(id)

Team(Name VARCHAR2(30 CHAR), Type VARCHAR2(30 CHAR), Date\_Formed DATE,  
 Team\_Leader NUMBER, Reports\_To NUMBER);  
 Constraints for Team:  
 FOREIGN KEY(Reports\_To) REFERENCES Employee(id),  
 FOREIGN KEY(Team\_Leader) REFERENCES Volunteer(ID),  
 CONSTRAINT Team\_pk PRIMARY KEY(Name)

Cares(Client\_Id NUMBER, Team\_Name VARCHAR2(30 CHAR));  
 Constraints for Cares:  
 FOREIGN KEY(Client\_Id) REFERENCES Client(id),   
 FOREIGN KEY(Team\_Name) REFERENCES Team(Name),  
 CONSTRAINT Cares\_pk PRIMARY KEY(Client\_Id, Team\_Name)

Works(Volunteer\_Id NUMBER, Team\_Name VARCHAR2(30 CHAR), Month CHAR(3),  
 Hours NUMBER);  
 Constraints for Works:  
 CHECK(MONTH IN('JAN', 'FEB', 'MAR', 'APR', 'MAY', 'JUN',   
 'JUL', 'AUG', 'SEP', 'OCT', 'NOV', 'DEC')),  
 CHECK(HOURS >= 0),  
 FOREIGN KEY(Volunteer\_Id) REFERENCES Volunteer(id),  
 FOREIGN KEY(Team\_Name) REFERENCES Team(Name),  
 CONSTRAINT Works\_pk PRIMARY KEY(Volunteer\_Id, Team\_Name, Month)

Expenses(Employee\_Id NUMBER, "Date" DATE, Amount NUMBER(6, 2),   
 Description VARCHAR2(100 CHAR));  
 Constraints for Expenses:  
 CHECK(Amount > 0),  
 FOREIGN KEY(Employee\_Id) REFERENCES Employee(id),  
 CONSTRAINT Expenses\_pk PRIMARY KEY(Employee\_Id, "Date",   
 Amount, Description)

Donation\_Drive(Title VARCHAR2(50 CHAR), Employee\_Id NUMBER, Start\_Date   
 DATE, End\_Date DATE, Goal NUMBER(7, 2), Theme VARCHAR2(30 CHAR));  
 Constraints for Donation\_Drive:  
 CHECK(Goal >=0),  
 FOREIGN KEY(Employee\_Id) REFERENCES Employee(id),  
 CONSTRAINT Donation\_Drive\_pk PRIMARY KEY(Title)

Donor(id NUMBER,Person\_Id NUMBER);  
 Constraints for Donor:  
 FOREIGN KEY(Person\_Id) REFERENCES Person(id),  
 CONSTRAINT Donor\_pk PRIMARY KEY(id)

Donor\_Donations(id NUMBER, Donor\_id NUMBER, Amount NUMBER(6, 2), Type   
 VARCHAR2(10 CHAR), Donation\_Drive\_Title VARCHAR2(50 CHAR), "Date"   
 DATE, Anonymous CHAR(1));  
 Constraints for Donor\_Donations:  
 CHECK(Amount > 0),  
 CHECK(Anonymous IN('Y', 'N')),  
 FOREIGN KEY(Donation\_Drive\_Title) REFERENCES   
 Donation\_Drive(Title),  
 FOREIGN KEY(Donor\_id) REFERENCES Donor(id),  
 CONSTRAINT Donor\_Donations\_pk PRIMARY KEY(id)

Organization(Name VARCHAR2(50 CHAR), Person\_Id NUMBER, Type   
 VARCHAR2(50 CHAR), Mailing\_Address VARCHAR2(75 CHAR), Website   
 VARCHAR2(40 CHAR));  
 Constraints for Organization:  
 FOREIGN KEY(Person\_Id) REFERENCES Person(id),  
 CONSTRAINT Organization\_pk PRIMARY KEY(Name)

Team\_Sponsor(Org\_Name VARCHAR2(50 CHAR), Team\_Name VARCHAR2(30 CHAR));  
 Constraints for Team\_Sponsor:   
 FOREIGN KEY(Org\_Name) REFERENCES Organization(Name),   
 FOREIGN KEY(Team\_Name) REFERENCES Team(Name),  
 CONSTRAINT Team\_Sponsor\_pk PRIMARY KEY(Org\_Name, Team\_Name)

Org\_Donations(id NUMBER, Org\_Name VARCHAR2(50 CHAR), Amount NUMBER(6, 2),   
 Type VARCHAR2(10 CHAR), "Date" DATE, Anonymous CHAR(1));  
 Constraints for Org\_Donations:  
 CHECK(Amount > 0),  
 CHECK(Anonymous IN('Y', 'N')),  
 FOREIGN KEY(Org\_Name) REFERENCES Organization(Name),  
 CONSTRAINT Org\_Donations\_pk PRIMARY KEY(id)

Donation\_Drive\_Sponsor(Title VARCHAR2(50 CHAR), Name VARCHAR2(50 CHAR));  
 Constraints for Donation\_Drive\_Sponsor:  
 FOREIGN KEY(Title) REFERENCES Donation\_Drive(Title),  
 FOREIGN KEY(Name) REFERENCES Organization(Name),  
 CONSTRAINT Donation\_Drive\_Sponsor PRIMARY KEY(Title, Name)

Meetings(Employee\_Id NUMBER, "Date" DATE, Team\_Name varchar2(50 char),   
 Description VARCHAR2(100 CHAR));  
 Constraints for Meetings:  
 FOREIGN KEY(Employee\_Id) REFERENCES Employee(id),  
 FOREIGN KEY(Team\_Name) References team(name),  
 CONSTRAINT meetings\_pk PRIMARY KEY(Employee\_Id, "Date",   
 Description)

SQL Statements for creating tables

CREATE TABLE Person(

id NUMBER,

First\_Name VARCHAR2(30 CHAR),

Middle\_Name VARCHAR2(30 CHAR),

Last\_Name VARCHAR2(30 CHAR),

Title VARCHAR2(30 CHAR),

DOB DATE,

Ethnicity VARCHAR2(30 CHAR),

Gender CHAR(1),

Profession VARCHAR2(50 CHAR),

Email VARCHAR2(50 CHAR),

Street\_Address VARCHAR2(50 CHAR),

City VARCHAR2(30 CHAR),

State CHAR(2),

Zipcode NUMBER(5),

Mail\_To CHAR(1), ---Y/N---

CHECK (Mail\_To IN('Y', 'N')),

CONSTRAINT Person\_pk PRIMARY KEY(id)

);

CREATE TABLE Phone\_Number(

Person\_Id NUMBER NOT NULL,

Phone\_Number NUMBER NOT NULL,

Primary CHAR(1), ---Y/N---

Type VARCHAR2(10 CHAR),

CHECK (Primary IN('Y', 'N')),

FOREIGN KEY(Person\_Id) REFERENCES Person(id) on delete cascade,

CONSTRAINT Phone\_Number\_pk PRIMARY KEY(Person\_Id, Phone\_Number)

);

CREATE TABLE Client(

id NUMBER,

Person\_Id NUMBER UNIQUE,

Date\_Joined DATE,

FOREIGN KEY(Person\_Id) REFERENCES Person(id) on delete cascade,

CONSTRAINT Client\_pk PRIMARY KEY(id)

);

CREATE TABLE Doctor(

Client\_Id NUMBER UNIQUE,

First\_Name VARCHAR2(50 CHAR),

Last\_Name VARCHAR2(50 CHAR),

Doctor\_Number NUMBER,

FOREIGN KEY(Client\_Id) REFERENCES Client(id) on delete cascade

);

CREATE TABLE Attorney(

Client\_Id NUMBER UNIQUE,

Attorney\_First\_Name VARCHAR2(50 CHAR),

Attorney\_Last\_Name VARCHAR2(50 CHAR),

Attorney\_Number NUMBER,

FOREIGN KEY(Client\_Id) REFERENCES Client(id) on delete cascade

);

CREATE TABLE Needs(

Client\_Id NUMBER,

Need VARCHAR2(30 CHAR),

Importance NUMBER(2),

CHECK(Importance BETWEEN 1 AND 10),

FOREIGN KEY(Client\_Id) REFERENCES Client(id) on delete cascade,

CONSTRAINT Needs\_pk PRIMARY KEY(Client\_Id, Need, Importance)

);

CREATE TABLE Volunteer(

id NUMBER,

Person\_Id NUMBER UNIQUE,

Date\_Joined DATE,

FOREIGN KEY(Person\_Id) REFERENCES Person(id) on delete cascade,

CONSTRAINT Volunteer\_pk PRIMARY KEY(id)

);

CREATE TABLE Employee(

id NUMBER,

Person\_Id NUMBER,

Monthly\_Salary NUMBER(6,2),

Marital\_Status CHAR(1), ---S, M, D, W

Job\_Title VARCHAR2(50 CHAR),

Date\_Hired DATE,

Type VARCHAR2(9 CHAR), ---FULL-TIME/PART-TIME

CHECK (Marital\_Status IN('S', 'M', 'D', 'W')),

CHECK (Type IN('FULL-TIME', 'PART-TIME')),

FOREIGN KEY(Person\_Id) REFERENCES Person(id) on delete cascade,

CONSTRAINT Employee\_pk PRIMARY KEY(id)

);

CREATE TABLE Team(

Name VARCHAR2(30 CHAR),

Type VARCHAR2(30 CHAR),

Date\_Formed DATE,

Team\_Leader NUMBER,

Reports\_To NUMBER, ---EMPLOYEE ID

FOREIGN KEY(Reports\_To) REFERENCES Employee(id) on delete cascade,

FOREIGN KEY(Team\_Leader) REFERENCES Volunteer(ID) on delete cascade,

CONSTRAINT Team\_pk PRIMARY KEY(Name)

);

CREATE TABLE Cares(

Client\_Id NUMBER,

Team\_Name VARCHAR2(30 CHAR),

FOREIGN KEY(Client\_Id) REFERENCES Client(id) on delete cascade,

FOREIGN KEY(Team\_Name) REFERENCES Team(Name) on delete cascade,

CONSTRAINT Cares\_pk PRIMARY KEY(Client\_Id, Team\_Name)

);

CREATE TABLE Works(

Volunteer\_Id NUMBER,

Team\_Name VARCHAR2(30 CHAR),

Month CHAR(3),

Hours NUMBER,

CHECK(MONTH IN('JAN', 'FEB', 'MAR', 'APR', 'MAY', 'JUN', 'JUL', 'AUG',

'SEP', 'OCT', 'NOV', 'DEC')),

CHECK(HOURS >= 0),

FOREIGN KEY(Volunteer\_Id) REFERENCES Volunteer(id) on delete cascade,

FOREIGN KEY(Team\_Name) REFERENCES Team(Name) on delete cascade,

CONSTRAINT Works\_pk PRIMARY KEY(Volunteer\_Id, Team\_Name, Month)

);

CREATE TABLE Expenses(

Employee\_Id NUMBER,

"Date" DATE,

Amount NUMBER(6, 2),

Description VARCHAR2(100 CHAR),

CHECK(Amount > 0),

FOREIGN KEY(Employee\_Id) REFERENCES Employee(id) on delete cascade,

CONSTRAINT Expenses\_pk PRIMARY KEY(Employee\_Id, "Date", Amount, Description)

);

CREATE TABLE Donation\_Drive(

Title VARCHAR2(50 CHAR),

Employee\_Id NUMBER,

Start\_Date DATE,

End\_Date DATE,

Goal NUMBER(7, 2),

Theme VARCHAR2(30 CHAR),

CHECK(Goal >=0),

FOREIGN KEY(Employee\_Id) REFERENCES Employee(id) on delete cascade,

CONSTRAINT Donation\_Drive\_pk PRIMARY KEY(Title)

);

CREATE TABLE Donor(

id NUMBER,

Person\_Id NUMBER,

FOREIGN KEY(Person\_Id) REFERENCES Person(id) on delete cascade,

CONSTRAINT Donor\_pk PRIMARY KEY(id)

);

CREATE TABLE Donor\_Donations(

id NUMBER,

Donor\_id NUMBER,

Amount NUMBER(6, 2),

Type VARCHAR2(10 CHAR),

Donation\_Drive\_Title VARCHAR2(50 CHAR),

"Date" DATE,

Anonymous CHAR(1), ---Y/N

CHECK(Amount > 0),

CHECK(Anonymous IN('Y', 'N')),

FOREIGN KEY(Donation\_Drive\_Title) REFERENCES Donation\_Drive(Title) on delete cascade,

FOREIGN KEY(Donor\_id) REFERENCES Donor(id) on delete cascade,

CONSTRAINT Donor\_Donations\_pk PRIMARY KEY(id)

);

CREATE TABLE Organization(

Name VARCHAR2(50 CHAR),

Person\_Id NUMBER,

Type VARCHAR2(50 CHAR),

Mailing\_Address VARCHAR2(75 CHAR),

Website VARCHAR2(40 CHAR),

FOREIGN KEY(Person\_Id) REFERENCES Person(id) on delete cascade,

CONSTRAINT Organization\_pk PRIMARY KEY(Name)

);

CREATE TABLE Team\_Sponsor(

Org\_Name VARCHAR2(50 CHAR),

Team\_Name VARCHAR2(30 CHAR),

FOREIGN KEY(Org\_Name) REFERENCES Organization(Name) on delete cascade,

FOREIGN KEY(Team\_Name) REFERENCES Team(Name) on delete cascade,

CONSTRAINT Team\_Sponsor\_pk PRIMARY KEY(Org\_Name, Team\_Name)

);

CREATE TABLE Org\_Donations(

id NUMBER,

Org\_Name VARCHAR2(50 CHAR),

Amount NUMBER(6, 2),

Type VARCHAR2(10 CHAR),

"Date" DATE,

Anonymous CHAR(1), ---Y/N

CHECK(Amount > 0),

CHECK(Anonymous IN('Y', 'N')),

FOREIGN KEY(Org\_Name) REFERENCES Organization(Name) on delete cascade,

CONSTRAINT Org\_Donations\_pk PRIMARY KEY(id)

);

CREATE TABLE Donation\_Drive\_Sponsor(

Title VARCHAR2(50 CHAR),

Name VARCHAR2(50 CHAR),

FOREIGN KEY(Title) REFERENCES Donation\_Drive(Title) on delete cascade,

FOREIGN KEY(Name) REFERENCES Organization(Name) on delete cascade,

CONSTRAINT Donation\_Drive\_Sponsor PRIMARY KEY(Title, Name)

);

CREATE TABLE Meetings(

Employee\_Id NUMBER,

"Date" DATE,

Team\_Name varchar2(50 char),

Description VARCHAR2(100 CHAR),

FOREIGN KEY(Employee\_Id) REFERENCES Employee(id) on delete cascade,

FOREIGN KEY(Team\_Name) References team(name) on delete cascade,

CONSTRAINT meetings\_pk PRIMARY KEY(Employee\_Id, "Date", Description)

);

SQL Statements for removing tables

﻿DROP TABLE MEETINGS CASCADE CONSTRAINTS;

DROP TABLE Donation\_Drive\_Sponsor CASCADE CONSTRAINTS;

DROP TABLE Org\_Donations CASCADE CONSTRAINTS;

DROP TABLE Team\_Sponsor CASCADE CONSTRAINTS;

DROP TABLE Organization CASCADE CONSTRAINTS;

DROP TABLE Donor\_Donations CASCADE CONSTRAINTS;

DROP TABLE Donor CASCADE CONSTRAINTS;

DROP TABLE Donation\_Drive CASCADE CONSTRAINTS;

DROP TABLE Expenses CASCADE CONSTRAINTS;

DROP TABLE Works CASCADE CONSTRAINTS;

DROP TABLE Cares CASCADE CONSTRAINTS;

DROP TABLE Team CASCADE CONSTRAINTS;

DROP TABLE Employee CASCADE CONSTRAINTS;

DROP TABLE Volunteer CASCADE CONSTRAINTS;

DROP TABLE Needs CASCADE CONSTRAINTS;

DROP TABLE Attorney CASCADE CONSTRAINTS;

DROP TABLE Doctor CASCADE CONSTRAINTS;

DROP TABLE Client CASCADE CONSTRAINTS;

DROP TABLE Phone\_Number CASCADE CONSTRAINTS;

DROP TABLE Person CASCADE CONSTRAINTS;

SQL Statements for populating tables

insert INTO Person(id, First\_Name, Middle\_Name, Last\_Name, Title, DOB, Ethnicity,

Gender, Profession, Email, Street\_Address, City, State, Zipcode, Mail\_To)

VALUES(1, 'Blake', 'Ellis', 'Richey', 'Mr', TO\_DATE('03/04/1996', 'MM/DD/YYYY'),

'White', 'M', 'Software Developer', 'blake.e.richey@gmail.com',

'1504 E Lantrip St', 'Kilgore', 'TX', 75662, 'Y');

insert INTO Person(id, First\_Name, Middle\_Name, Last\_Name, Title, DOB, Ethnicity,

Gender, Profession, Email, Street\_Address, City, State, Zipcode, Mail\_To)

VALUES(2, 'James', NULL, 'Kwon', 'Mr', TO\_DATE('05/31/1995', 'MM/DD/YYYY'),

'Asian', 'M', 'Biomedical Engineer Student', 'james.kwon@gmail.com',

'123 Austin St', 'Austin', 'TX', 78708, 'N');

insert INTO Person(id, First\_Name, Middle\_Name, Last\_Name, Title, DOB, Ethnicity,

Gender, Profession, Email, Street\_Address, City, State, Zipcode, Mail\_To)

VALUES(3, 'Kaya', 'Firefly', 'Click', 'Mr', TO\_DATE('12/31/1995', 'MM/DD/YYYY'),

'White', 'M', 'Software Developer', 'kaya.click@gmail.com', '1504 Lantrip',

'Kilgore', 'TX', 75662, 'N');

insert INTO Person(id, First\_Name, Middle\_Name, Last\_Name, Title, DOB, Ethnicity,

Gender, Profession, Email, Street\_Address, City, State, Zipcode, Mail\_To)

VALUES(4, 'Tyler', 'Test', 'Andrews', 'Mr', TO\_DATE('10/05/1994', 'MM/DD/YYYY'),

'White', 'M', 'Manifold Fabrication Specialist', 'tyler.andrews@gmail.com',

'1504 Lantrip', 'Kilgore', 'TX', 75662, 'N');

insert INTO Person(id, First\_Name, Middle\_Name, Last\_Name, Title, DOB, Ethnicity,

Gender, Profession, Email, Street\_Address, City, State, Zipcode, Mail\_To)

VALUES(5, 'Alpha', 'Beta', 'Delta', 'Miss', TO\_DATE('01/02/1994', 'MM/DD/YYYY'),

'White', 'F', 'Zookeeper', 'abcs@hotmail.com', '165 Prewitt Rd', 'Hallsville',

'TX', 75650, 'Y');

insert INTO Person(id, First\_Name, Middle\_Name, Last\_Name, Title, DOB, Ethnicity,

Gender, Profession, Email, Street\_Address, City, State, Zipcode, Mail\_To)

VALUES(6, 'Leonard', 'Lockheart', 'Brown', 'Dr',

TO\_DATE('06/12/1975', 'MM/DD/YYYY'), 'African American', 'M',

'Computer Science Professor', 'lbrown@uttyler.edu', '3000 University Blvd',

'Tyler', 'TX', 75701, 'Y');

insert INTO Person(id, First\_Name, Middle\_Name, Last\_Name, Title, DOB, Ethnicity,

Gender, Profession, Email, Street\_Address, City, State, Zipcode, Mail\_To)

VALUES(7, 'Geralt', 'Witcher', 'Rivia', 'Mr',

TO\_DATE('08/04/1909', 'MM/DD/YYYY'), 'White', 'M', 'Witcher',

'cdprojectred@gamers.net', '300 W Rivia', 'Poland', 'TX', 77710, 'Y');

insert INTO Person(id, First\_Name, Middle\_Name, Last\_Name, Title, DOB, Ethnicity,

Gender, Profession, Email, Street\_Address, City, State, Zipcode, Mail\_To)

VALUES(8, 'Walluam', 'Esper', 'Bard', 'Mr', TO\_DATE('03/20/2019', 'MM/DD/YYYY'),

'White', 'M', 'Musician', 'deseuler@yahoo.com', '230 Cotton St', 'Longview',

'TX', 75601, 'Y');

insert INTO Person(id, First\_Name, Middle\_Name, Last\_Name, Title, DOB, Ethnicity,

Gender, Profession, Email, Street\_Address, City, State, Zipcode, Mail\_To)

VALUES(9, 'Atleetaleetalee', NULL, NULL, 'Mr',

TO\_DATE('05/21/2018', 'MM/DD/YYYY'), 'Blue', 'M', 'Military General',

'deseuler@gmail.com', '9 Tulas Ave', 'Aklar', 'TX', 79835, 'Y');

insert INTO Person(id, First\_Name, Middle\_Name, Last\_Name, Title, DOB, Ethnicity,

Gender, Profession, Email, Street\_Address, City, State, Zipcode, Mail\_To)

VALUES(10, 'Reginald', 'Archibald', 'Qralorae', 'Mr',

TO\_DATE('06/09/2017', 'MM/DD/YYYY'), 'White', 'M', 'Historian',

'blake.e.richey@gmail.com', '777 Nihon Court', 'Norwegistania', 'TX', 75000,

'Y');

----------INSERT INTO PHONE NUMBER----------

insert INTO Phone\_Number(Person\_Id, Phone\_Number, Primary, Type)

VALUES (1, 9033538260, 'Y', 'Cell');

insert INTO Phone\_Number(Person\_Id, Phone\_Number, Primary, Type)

VALUES (1, 9033536496, 'N', 'Cell');

insert INTO Phone\_Number(Person\_Id, Phone\_Number, Primary, Type)

VALUES (2, 5128797342, 'Y', 'Cell');

insert INTO Phone\_Number(Person\_Id, Phone\_Number, Primary, Type)

VALUES (3, 9032522207, 'Y', 'Cell');

insert INTO Phone\_Number(Person\_Id, Phone\_Number, Primary, Type)

VALUES (4, 9034318514, 'Y', 'Cell');

insert INTO Phone\_Number(Person\_Id, Phone\_Number, Primary, Type)

VALUES (4, 9033538260, 'N', 'Cell');

insert INTO Phone\_Number(Person\_Id, Phone\_Number, Primary, Type)

VALUES (5, 1112223333, 'Y', 'Home');

insert INTO Phone\_Number(Person\_Id, Phone\_Number, Primary, Type)

VALUES (6, 9035715703, 'Y', 'Business');

insert INTO Phone\_Number(Person\_Id, Phone\_Number, Primary, Type)

VALUES (8, 9035551234, 'Y', 'Home');

insert INTO Phone\_Number(Person\_Id, Phone\_Number, Primary, Type)

VALUES (10, 9035557777, 'Y', 'Cell');

----------INSERT INTO CLIENT----------

insert INTO Client(id, Person\_Id, Date\_Joined) VALUES(1, 1, TO\_DATE('01/01/2018', 'MM/DD/YYYY'));

insert INTO Client(id, Person\_Id, Date\_Joined) VALUES(2, 2, TO\_DATE('02/06/2018', 'MM/DD/YYYY'));

insert INTO Client(id, Person\_Id, Date\_Joined) VALUES(3, 4, TO\_DATE('03/09/2018', 'MM/DD/YYYY'));

insert INTO Client(id, Person\_Id, Date\_Joined) VALUES(4, 6, TO\_DATE('04/19/2018', 'MM/DD/YYYY'));

insert INTO Client(id, Person\_Id, Date\_Joined) VALUES(5, 8, TO\_DATE('05/23/2018', 'MM/DD/YYYY'));

insert INTO Client(id, Person\_Id, Date\_Joined) VALUES(6, 10, TO\_DATE('06/12/2018', 'MM/DD/YYYY'));

insert INTO Client(id, Person\_Id, Date\_Joined) VALUES(7, 3, TO\_DATE('07/17/2018', 'MM/DD/YYYY'));

insert INTO Client(id, Person\_Id, Date\_Joined) VALUES(8, 5, TO\_DATE('08/10/2018', 'MM/DD/YYYY'));

insert INTO Client(id, Person\_Id, Date\_Joined) VALUES(9, 7, TO\_DATE('09/03/2018', 'MM/DD/YYYY'));

insert INTO Client(id, Person\_Id, Date\_Joined) VALUES(10, 9, TO\_DATE('09/30/2018', 'MM/DD/YYYY'));

----------INSERT INTO DOCTOR----------

insert INTO Doctor(Client\_Id, First\_Name, Last\_Name, Doctor\_Number)

VALUES (1, 'Matt', 'Hipke', 9033337898);

insert INTO Doctor(Client\_Id, First\_Name, Last\_Name, Doctor\_Number)

VALUES (2, 'Aaron', 'Smith', 4137585685);

insert INTO Doctor(Client\_Id, First\_Name, Last\_Name, Doctor\_Number)

VALUES (3, 'Abdul', 'Johnson', 8318200627);

insert INTO Doctor(Client\_Id, First\_Name, Last\_Name, Doctor\_Number)

VALUES (4, 'Abe', 'Williams', 5225692491);

insert INTO Doctor(Client\_Id, First\_Name, Last\_Name, Doctor\_Number)

VALUES (5, 'Alex', 'Jones', 3043153218);

insert INTO Doctor(Client\_Id, First\_Name, Last\_Name, Doctor\_Number)

VALUES (6, 'John', 'Brown', 6494678524);

insert INTO Doctor(Client\_Id, First\_Name, Last\_Name, Doctor\_Number)

VALUES (7, 'James', 'Davis', 3954291377);

insert INTO Doctor(Client\_Id, First\_Name, Last\_Name, Doctor\_Number)

VALUES (8, 'Brent', 'Miller', 9056628259);

insert INTO Doctor(Client\_Id, First\_Name, Last\_Name, Doctor\_Number)

VALUES (9, 'Lloyd', 'Wilson', 2757367132);

insert INTO Doctor(Client\_Id, First\_Name, Last\_Name, Doctor\_Number)

VALUES (10, 'Amanda', 'Robinson', 9572180473);

----------INSERT INTO ATTORNEY----------

insert INTO Attorney(Client\_Id, Attorney\_First\_Name, Attorney\_Last\_Name, Attorney\_Number)

VALUES (1, 'Patrick', 'Chan', 8354992912);

insert INTO Attorney(Client\_Id, Attorney\_First\_Name, Attorney\_Last\_Name, Attorney\_Number)

VALUES (2, 'Oswaldo', 'Villa', 9648542765);

insert INTO Attorney(Client\_Id, Attorney\_First\_Name, Attorney\_Last\_Name, Attorney\_Number)

VALUES (3, 'Patricia', 'Avila', 3486902027);

insert INTO Attorney(Client\_Id, Attorney\_First\_Name, Attorney\_Last\_Name, Attorney\_Number)

VALUES (4, 'Paris', 'Fernandez', 5273444119);

insert INTO Attorney(Client\_Id, Attorney\_First\_Name, Attorney\_Last\_Name, Attorney\_Number)

VALUES (5, 'Scott', 'Strickland', 3552067122);

insert INTO Attorney(Client\_Id, Attorney\_First\_Name, Attorney\_Last\_Name, Attorney\_Number)

VALUES (6, 'Seth', 'Velez', 6666432755);

insert INTO Attorney(Client\_Id, Attorney\_First\_Name, Attorney\_Last\_Name, Attorney\_Number)

VALUES (7, 'Trey', 'Sellers', 7845123652);

insert INTO Attorney(Client\_Id, Attorney\_First\_Name, Attorney\_Last\_Name, Attorney\_Number)

VALUES (8, 'Wayne', 'Herman', 3642897099);

insert INTO Attorney(Client\_Id, Attorney\_First\_Name, Attorney\_Last\_Name, Attorney\_Number)

VALUES (9, 'Emily', 'Warner', 2244391860);

insert INTO Attorney(Client\_Id, Attorney\_First\_Name, Attorney\_Last\_Name, Attorney\_Number)

VALUES (10, 'Susan', 'Anthony', 9549279451);

----------INSERT INTO NEEDS----------

insert INTO Needs(Client\_Id, Need, Importance) VALUES(1, 'Housekeeping', 6);

insert INTO Needs(Client\_Id, Need, Importance) VALUES(1, 'Transportation', 1);

insert INTO Needs(Client\_Id, Need, Importance) VALUES(2, 'Shopping', 6);

insert INTO Needs(Client\_Id, Need, Importance) VALUES(2, 'Cooking', 4);

insert INTO Needs(Client\_Id, Need, Importance) VALUES(3, 'Shopping', 7);

insert INTO Needs(Client\_Id, Need, Importance) VALUES(5, 'Yard Work', 8);

insert INTO Needs(Client\_Id, Need, Importance) VALUES(6, 'Housekeeping', 2);

insert INTO Needs(Client\_Id, Need, Importance) VALUES(7, 'Yard Work', 3);

insert INTO Needs(Client\_Id, Need, Importance) VALUES(9, 'Transportation', 10);

insert INTO Needs(Client\_Id, Need, Importance) VALUES(10, 'Shopping', 5);

----------INSERT INTO VOLUNTEER----------

insert INTO Volunteer(id, Person\_Id, Date\_Joined)

VALUES (1, 1, TO\_DATE('04/19/2019', 'MM/DD/YYYY'));

insert INTO Volunteer(id, Person\_Id, Date\_Joined)

VALUES (2, 10, TO\_DATE('01/02/2003', 'MM/DD/YYYY'));

insert INTO Volunteer(id, Person\_Id, Date\_Joined)

VALUES (3, 9, TO\_DATE('10/13/2001', 'MM/DD/YYYY'));

insert INTO Volunteer(id, Person\_Id, Date\_Joined)

VALUES (4, 2, TO\_DATE('06/07/2011', 'MM/DD/YYYY'));

insert INTO Volunteer(id, Person\_Id, Date\_Joined)

VALUES (5, 8, TO\_DATE('07/23/2006', 'MM/DD/YYYY'));

insert INTO Volunteer(id, Person\_Id, Date\_Joined)

VALUES (6, 3, TO\_DATE('03/14/2009', 'MM/DD/YYYY'));

insert INTO Volunteer(id, Person\_Id, Date\_Joined)

VALUES (7, 7, TO\_DATE('01/17/2007', 'MM/DD/YYYY'));

insert INTO Volunteer(id, Person\_Id, Date\_Joined)

VALUES (8, 4, TO\_DATE('09/12/2016', 'MM/DD/YYYY'));

insert INTO Volunteer(id, Person\_Id, Date\_Joined)

VALUES (9, 6, TO\_DATE('08/29/2017', 'MM/DD/YYYY'));

insert INTO Volunteer(id, Person\_Id, Date\_Joined)

VALUES (10, 5, TO\_DATE('11/30/2018', 'MM/DD/YYYY'));

----------INSERT INTO EMPLOYEE----------

INSERT INTO Employee(id, Person\_Id, Monthly\_Salary, Marital\_Status, Job\_Title, Date\_Hired, Type)

VALUES (1, 1, 1200.00, 'S', (SELECT Profession FROM Person WHERE Person.id = 1),

TO\_DATE('01/02/2018', 'MM/DD/YYYY'), 'PART-TIME');

INSERT INTO Employee(id, Person\_Id, Monthly\_Salary, Marital\_Status, Job\_Title, Date\_Hired, Type)

VALUES (2, 2, 300.00, 'S', (SELECT Profession FROM Person WHERE Person.id = 2),

TO\_DATE('05/09/2017', 'MM/DD/YYYY'), 'FULL-TIME');

INSERT INTO Employee(id, Person\_Id, Monthly\_Salary, Marital\_Status, Job\_Title, Date\_Hired, Type)

VALUES (3, 3, 3000.00, 'S', (SELECT Profession FROM Person WHERE Person.id = 3),

TO\_DATE('08/06/2015', 'MM/DD/YYYY'), 'FULL-TIME');

INSERT INTO Employee(id, Person\_Id, Monthly\_Salary, Marital\_Status, Job\_Title, Date\_Hired, Type)

VALUES (4, 4, 2000.00, 'S', (SELECT Profession FROM Person WHERE Person.id = 4),

TO\_DATE('09/23/2013', 'MM/DD/YYYY'), 'PART-TIME');

INSERT INTO Employee(id, Person\_Id, Monthly\_Salary, Marital\_Status, Job\_Title, Date\_Hired, Type)

VALUES (5, 5, 1100.00, 'W', (SELECT Profession FROM Person WHERE Person.id = 5),

TO\_DATE('02/21/2008', 'MM/DD/YYYY'), 'FULL-TIME');

INSERT INTO Employee(id, Person\_Id, Monthly\_Salary, Marital\_Status, Job\_Title, Date\_Hired, Type)

VALUES (6, 6, 2500.00, 'M', (SELECT Profession FROM Person WHERE Person.id = 6),

TO\_DATE('06/19/2009', 'MM/DD/YYYY'), 'FULL-TIME');

INSERT INTO Employee(id, Person\_Id, Monthly\_Salary, Marital\_Status, Job\_Title, Date\_Hired, Type)

VALUES (7, 7, 1000.00, 'S', (SELECT Profession FROM Person WHERE Person.id = 7),

TO\_DATE('11/14/2009', 'MM/DD/YYYY'), 'FULL-TIME');

INSERT INTO Employee(id, Person\_Id, Monthly\_Salary, Marital\_Status, Job\_Title, Date\_Hired, Type)

VALUES (8, 8, 900.00, 'D', (SELECT Profession FROM Person WHERE Person.id = 8),

TO\_DATE('12/11/2008', 'MM/DD/YYYY'), 'PART-TIME');

INSERT INTO Employee(id, Person\_Id, Monthly\_Salary, Marital\_Status, Job\_Title, Date\_Hired, Type)

VALUES (9, 9, 4000.00, 'S', (SELECT Profession FROM Person WHERE Person.id = 9),

TO\_DATE('07/30/2011', 'MM/DD/YYYY'), 'FULL-TIME');

INSERT INTO Employee(id, Person\_Id, Monthly\_Salary, Marital\_Status, Job\_Title, Date\_Hired, Type)

VALUES (10, 10, 1900.00, 'M', (SELECT Profession FROM Person WHERE Person.id = 10),

TO\_DATE('02/08/2010', 'MM/DD/YYYY'), 'PART-TIME');

----------INSERT INTO TEAM----------

INSERT INTO Team(Name, Type, Date\_Formed, Team\_Leader, Reports\_To)

VALUES ('ICPC', 'Extracurricular',

TO\_DATE('04/20/2010', 'MM/DD/YYYY'), 3, 5);

INSERT INTO Team(Name, Type, Date\_Formed, Team\_Leader, Reports\_To)

VALUES ('IEEE Robotics', 'Extracurricular',

TO\_DATE('01/01/2019', 'MM/DD/YYYY'), 1, 2);

INSERT INTO Team(Name, Type, Date\_Formed, Team\_Leader, Reports\_To)

VALUES ('DND', 'Fun and Games',

TO\_DATE('04/20/2010', 'MM/DD/YYYY'), 4, 1);

INSERT INTO Team(Name, Type, Date\_Formed, Team\_Leader, Reports\_To)

VALUES ('ATMAE', 'Organizational',

TO\_DATE('04/20/2010', 'MM/DD/YYYY'), 2, 3);

INSERT INTO Team(Name, Type, Date\_Formed, Team\_Leader, Reports\_To)

VALUES ('SHRM', 'Networking',

TO\_DATE('04/20/2010', 'MM/DD/YYYY'), 5, 6);

INSERT INTO Team(Name, Type, Date\_Formed, Team\_Leader, Reports\_To)

VALUES ('Painters Club', 'Civil Service',

TO\_DATE('04/20/2010', 'MM/DD/YYYY'), 6, 4);

INSERT INTO Team(Name, Type, Date\_Formed, Team\_Leader, Reports\_To)

VALUES ('Trinity Givers', 'Religious',

TO\_DATE('04/20/2010', 'MM/DD/YYYY'), 9, 9);

INSERT INTO Team(Name, Type, Date\_Formed, Team\_Leader, Reports\_To)

VALUES ('UIL', 'Extracurricular',

TO\_DATE('04/20/2010', 'MM/DD/YYYY'), 7, 8);

INSERT INTO Team(Name, Type, Date\_Formed, Team\_Leader, Reports\_To)

VALUES ('Speling tha rite way', 'Competitive',

TO\_DATE('04/20/2010', 'MM/DD/YYYY'), 10, 7);

INSERT INTO Team(Name, Type, Date\_Formed, Team\_Leader, Reports\_To)

VALUES ('Cant Touch This', 'Dance',

TO\_DATE('04/20/2010', 'MM/DD/YYYY'), 8, 10);

----------INSERT INTO CARES----------

insert INTO Cares(Client\_Id, Team\_Name) VALUES(1, 'DND' );

insert INTO Cares(Client\_Id, Team\_Name) VALUES(2, 'Painters Club' );

insert INTO Cares(Client\_Id, Team\_Name) VALUES(3, 'SHRM' );

insert INTO Cares(Client\_Id, Team\_Name) VALUES(4, 'Trinity Givers' );

insert INTO Cares(Client\_Id, Team\_Name) VALUES(5, 'Trinity Givers' );

insert INTO Cares(Client\_Id, Team\_Name) VALUES(6, 'ICPC' );

insert INTO Cares(Client\_Id, Team\_Name) VALUES(7, 'Cant Touch This' );

insert INTO Cares(Client\_Id, Team\_Name) VALUES(8, 'Trinity Givers' );

insert INTO Cares(Client\_Id, Team\_Name) VALUES(9, 'Speling tha rite way');

insert INTO Cares(Client\_Id, Team\_Name) VALUES(10, 'ATMAE' );

----------INSERT INTO WORKS----------

insert INTO Works(Volunteer\_Id, Team\_Name, Month, Hours) VALUES(10, 'DND' , 'JAN', 30);

insert INTO Works(Volunteer\_Id, Team\_Name, Month, Hours) VALUES( 9, 'Painters Club' , 'MAR', 15);

insert INTO Works(Volunteer\_Id, Team\_Name, Month, Hours) VALUES( 8, 'SHRM' , 'JUN', 20);

insert INTO Works(Volunteer\_Id, Team\_Name, Month, Hours) VALUES( 7, 'Trinity Givers' , 'MAR', 44);

insert INTO Works(Volunteer\_Id, Team\_Name, Month, Hours) VALUES( 6, 'Trinity Givers' , 'JUL', 19);

insert INTO Works(Volunteer\_Id, Team\_Name, Month, Hours) VALUES( 5, 'ICPC' , 'MAR', 32);

insert INTO Works(Volunteer\_Id, Team\_Name, Month, Hours) VALUES( 4, 'Cant Touch This' , 'DEC', 36);

insert INTO Works(Volunteer\_Id, Team\_Name, Month, Hours) VALUES( 3, 'Trinity Givers' , 'JAN', 19);

insert INTO Works(Volunteer\_Id, Team\_Name, Month, Hours) VALUES( 2, 'Speling tha rite way', 'MAR', 18);

insert INTO Works(Volunteer\_Id, Team\_Name, Month, Hours) VALUES( 1, 'ATMAE' , 'OCT', 29);

---------INSERT INTO DONOR ----------

INSERT INTO DONOR(id,Person\_Id) values(1,1);

INSERT INTO DONOR(id,Person\_Id) values(2,3);

INSERT INTO DONOR(id,Person\_Id) values(3,5);

INSERT INTO DONOR(id,Person\_Id) values(4,5);

INSERT INTO DONOR(id,Person\_Id) values(5,7);

INSERT INTO DONOR(id,Person\_Id) values(6,9);

INSERT INTO DONOR(id,Person\_Id) values(7,10);

INSERT INTO DONOR(id,Person\_Id) values(8,5);

INSERT INTO DONOR(id,Person\_Id) values(9,9);

INSERT INTO DONOR(id,Person\_Id) values(10,3);

-------insert into donation\_drive------------

insert into donation\_drive(title,employee\_id,start\_date,end\_date,goal,theme) values('donation\_drive1',1,TO\_DATE('03/25/2010','MM/DD/YYYY'),TO\_DATE('03/26/2010','MM-DD-YYYY'),1000,'star wars');

insert into donation\_drive(title,employee\_id,start\_date,end\_date,goal,theme) values('donation\_drive2',2,TO\_DATE('04/15/2017','MM/DD/YYYY'),TO\_DATE('04/16/2017','MM/DD/YYYY'),500,'lord of the rings');

insert into donation\_drive(title,employee\_id,start\_date,end\_date,goal,theme) values('donation\_drive3',3,TO\_DATE('03/28/2018','MM/DD/YYYY'),TO\_DATE('04/01/2018','MM/DD/YYYY'),1500,'harry potter');

insert into donation\_drive(title,employee\_id,start\_date,end\_date,goal,theme) values('donation\_drive4',3,TO\_DATE('08/21/2016','MM/DD/YYYY'),TO\_DATE('08/22/2016','MM/DD/YYYY'),100,'sql party');

insert into donation\_drive(title,employee\_id,start\_date,end\_date,goal,theme) values('donation\_drive5',1,TO\_DATE('07/11/2014','MM/DD/YYYY'),TO\_DATE('07/12/2014','MM/DD/YYYY'),6000,'do my laundry drive');

insert into donation\_drive(title,employee\_id,start\_date,end\_date,goal,theme) values('donation\_drive6',6,TO\_DATE('11/12/2013','MM/DD/YYYY'),TO\_DATE('11/13/2013','MM/DD/YYYY'),5000,'military');

insert into donation\_drive(title,employee\_id,start\_date,end\_date,goal,theme) values('donation\_drive7',8,TO\_DATE('03/25/2012','MM/DD/YYYY'),TO\_DATE('03/26/2012','MM/DD/YYYY'),8000,'warcraft');

insert into donation\_drive(title,employee\_id,start\_date,end\_date,goal,theme) values('donation\_drive8',1,TO\_DATE('09/14/2019','MM/DD/YYYY'),TO\_DATE('09/15/2019','MM/DD/YYYY'),4000,'starcraft');

insert into donation\_drive(title,employee\_id,start\_date,end\_date,goal,theme) values('donation\_drive9',9,TO\_DATE('06/09/2018','MM/DD/YYYY'),TO\_DATE('06/10/2018','MM/DD/YYYY'),10000,'fortnite');

insert into donation\_drive(title,employee\_id,start\_date,end\_date,goal,theme) values('donation\_drive10',10,TO\_DATE('12/20/2020','MM/DD/YYYY'),TO\_DATE('12/21/2020','MM/DD/YYYY'),9000,'summer');

-------- insert into donor\_donations

insert into donor\_donations(id,donor\_id,amount,type,donation\_drive\_title,"Date",Anonymous) values(1,1,500,'check',null,TO\_DATE('03/25/2010','MM-DD-YYYY'),'Y');

insert into donor\_donations(id,donor\_id,amount,type,donation\_drive\_title,"Date",Anonymous) values(2,1,100,'credit','donation\_drive1',TO\_DATE('10/19/2016','MM-DD-YYYY'),'Y');

insert into donor\_donations(id,donor\_id,amount,type,donation\_drive\_title,"Date",Anonymous) values(3,2,600,'debit',null,TO\_DATE('03/25/2010','MM-DD-YYYY'),'N');

insert into donor\_donations(id,donor\_id,amount,type,donation\_drive\_title,"Date",Anonymous) values(4,5,900,'cash','donation\_drive2',TO\_DATE('08/21/2014','MM-DD-YYYY'),'Y');

insert into donor\_donations(id,donor\_id,amount,type,donation\_drive\_title,"Date",Anonymous) values(5,7,5,'credit',null,TO\_DATE('09/25/2010','MM-DD-YYYY'),'N');

insert into donor\_donations(id,donor\_id,amount,type,donation\_drive\_title,"Date",Anonymous) values(6,6,22,'check','donation\_drive3',TO\_DATE('08/22/1988','MM-DD-YYYY'),'N');

insert into donor\_donations(id,donor\_id,amount,type,donation\_drive\_title,"Date",Anonymous) values(7,4,300,'debit',null,TO\_DATE('2/23/2002','MM-DD-YYYY'),'N');

insert into donor\_donations(id,donor\_id,amount,type,donation\_drive\_title,"Date",Anonymous) values(8,10,150,'credit','donation\_drive4',TO\_DATE('07/12/2015','MM-DD-YYYY'),'Y');

insert into donor\_donations(id,donor\_id,amount,type,donation\_drive\_title,"Date",Anonymous) values(9,6,777,'cash',null,TO\_DATE('06/14/2019','MM-DD-YYYY'),'N');

insert into donor\_donations(id,donor\_id,amount,type,donation\_drive\_title,"Date",Anonymous) values(10,8,666,'cash','donation\_drive5',TO\_DATE('08/10/1699','MM-DD-YYYY'),'Y');

------- insert into organization ------------------

insert into organization(name,person\_id,type,mailing\_address,website) values('organization1',1,'for-profit','123 drive way','wwww.organization.com');

insert into organization(name,person\_id,type,mailing\_address,website) values('organization2',2,'for-profit','456 park place','wwww.organization2.com');

insert into organization(name,person\_id,type,mailing\_address,website) values('organization3',3,'for-profit','789 drive drive','wwww.organization3.com');

insert into organization(name,person\_id,type,mailing\_address,website) values('organization4',4,'non-profit','555 university way','wwww.organization4.com');

insert into organization(name,person\_id,type,mailing\_address,website) values('organization5',5,'non-profit','123 roundaboutway','wwww.organization5.com');

insert into organization(name,person\_id,type,mailing\_address,website) values('organization6',6,'non-profit','666 depths below','wwww.organization6.com');

insert into organization(name,person\_id,type,mailing\_address,website) values('organization7',7,'non-profit','123 fourfivesix','wwww.organization7.com');

insert into organization(name,person\_id,type,mailing\_address,website) values('organization8',8,'non-profit','999 altered six','wwww.organization8.com');

insert into organization(name,person\_id,type,mailing\_address,website) values('organization9',9,'for-profit','558 south park blvd','wwww.organization9.com');

insert into organization(name,person\_id,type,mailing\_address,website) values('organization10',10,'non-profit','301 north park blvd','wwww.organization10.com');

--- insert into organization donations ----

insert into Org\_Donations (id,Org\_Name,Amount,Type,"Date",Anonymous) values(1,'organization1',500,'debit',TO\_DATE('08/21/2018','MM-DD-YYYY'),'Y');

insert into Org\_Donations (id,Org\_Name,Amount,Type,"Date",Anonymous) values(2,'organization2',5000,'credit',TO\_DATE('09/22/2020','MM-DD-YYYY'),'N');

insert into Org\_Donations (id,Org\_Name,Amount,Type,"Date",Anonymous) values(3,'organization3',880,'debit',TO\_DATE('10/01/2014','MM-DD-YYYY'),'N');

insert into Org\_Donations (id,Org\_Name,Amount,Type,"Date",Anonymous) values(4,'organization3',9000,'credit',TO\_DATE('11/15/2006','MM-DD-YYYY'),'N');

insert into Org\_Donations (id,Org\_Name,Amount,Type,"Date",Anonymous) values(5,'organization5',450,'check',TO\_DATE('06/13/2008','MM-DD-YYYY'),'N');

insert into Org\_Donations (id,Org\_Name,Amount,Type,"Date",Anonymous) values(6,'organization9',666,'check',TO\_DATE('07/14/2015','MM-DD-YYYY'),'Y');

insert into Org\_Donations (id,Org\_Name,Amount,Type,"Date",Anonymous) values(7,'organization10',123,'check',TO\_DATE('09/06/2014','MM-DD-YYYY'),'Y');

insert into Org\_Donations (id,Org\_Name,Amount,Type,"Date",Anonymous) values(8,'organization2',999,'debit',TO\_DATE('04/11/2017','MM-DD-YYYY'),'Y');

insert into Org\_Donations (id,Org\_Name,Amount,Type,"Date",Anonymous) values(9,'organization4',1500,'credit',TO\_DATE('06/15/1970','MM-DD-YYYY'),'Y');

insert into Org\_Donations (id,Org\_Name,Amount,Type,"Date",Anonymous) values(10,'organization1',2300,'check',TO\_DATE('05/01/2005','MM-DD-YYYY'),'N');

-- insert into expenses --

insert into expenses(employee\_id,"Date",amount,description) values (1,TO\_DATE('06/25/2018','MM-DD-YYYY'),500,'gas for trip');

insert into expenses(employee\_id,"Date",amount,description) values (1,TO\_DATE('06/25/2018','MM-DD-YYYY'),100,'warcraft subscription');

insert into expenses(employee\_id,"Date",amount,description) values (2,TO\_DATE('06/25/2018','MM-DD-YYYY'),45,'league is 100% free');

insert into expenses(employee\_id,"Date",amount,description) values (5,TO\_DATE('06/25/2018','MM-DD-YYYY'),55,'steam sale');

insert into expenses(employee\_id,"Date",amount,description) values (6,TO\_DATE('06/25/2018','MM-DD-YYYY'),60,'necessary accessories');

insert into expenses(employee\_id,"Date",amount,description) values (10,TO\_DATE('06/25/2018','MM-DD-YYYY'),80,'groceries');

insert into expenses(employee\_id,"Date",amount,description) values (8,TO\_DATE('06/25/2018','MM-DD-YYYY'),50,'dinner out');

insert into expenses(employee\_id,"Date",amount,description) values (9,TO\_DATE('06/25/2018','MM-DD-YYYY'),60,'necessary vidya game');

insert into expenses(employee\_id,"Date",amount,description) values (4,TO\_DATE('06/25/2018','MM-DD-YYYY'),80,'cell phone');

insert into expenses(employee\_id,"Date",amount,description) values (6,TO\_DATE('06/25/2018','MM-DD-YYYY'),10,'taco bell');

----insert into donation\_drive\_sponsor-------

insert into donation\_drive\_sponsor(title,name) values('donation\_drive1','organization2');

insert into donation\_drive\_sponsor(title,name) values('donation\_drive10','organization8');

insert into donation\_drive\_sponsor(title,name) values('donation\_drive4','organization1');

insert into donation\_drive\_sponsor(title,name) values('donation\_drive4','organization3');

insert into donation\_drive\_sponsor(title,name) values('donation\_drive5','organization5');

insert into donation\_drive\_sponsor(title,name) values('donation\_drive3','organization6');

insert into donation\_drive\_sponsor(title,name) values('donation\_drive1','organization7');

insert into donation\_drive\_sponsor(title,name) values('donation\_drive9','organization3');

insert into donation\_drive\_sponsor(title,name) values('donation\_drive4','organization4');

insert into donation\_drive\_sponsor(title,name) values('donation\_drive1','organization6');

--insert into meetings---

insert into meetings(Employee\_id,"Date",Team\_Name,Description) values(1,TO\_DATE('06/20/2018','MM-DD-YYYY'),'Cant Touch This','Very hot at meeting');

insert into meetings(Employee\_id,"Date",Team\_Name,Description) values(2,TO\_DATE('06/15/2018','MM-DD-YYYY'),'Cant Touch This','Very cold at meeting');

insert into meetings(Employee\_id,"Date",Team\_Name,Description) values(3,TO\_DATE('06/14/2018','MM-DD-YYYY'),'Cant Touch This','Very mild at meeting');

insert into meetings(Employee\_id,"Date",Team\_Name,Description) values(8,TO\_DATE('06/13/2018','MM-DD-YYYY'),'Cant Touch This','Very not-hot at meeting');

insert into meetings(Employee\_id,"Date",Team\_Name,Description) values(1,TO\_DATE('06/10/2018','MM-DD-YYYY'),'Cant Touch This','Very not-cold at meeting');

insert into meetings(Employee\_id,"Date",Team\_Name,Description) values(5,TO\_DATE('06/08/2018','MM-DD-YYYY'),'Cant Touch This','Very not not-cold at meeting');

insert into meetings(Employee\_id,"Date",Team\_Name,Description) values(9,TO\_DATE('06/01/2018','MM-DD-YYYY'),'Cant Touch This','Very not not-hot at meeting');

insert into meetings(Employee\_id,"Date",Team\_Name,Description) values(10,TO\_DATE('05/25/2018','MM-DD-YYYY'),'Cant Touch This','Very not mild at meeting');

insert into meetings(Employee\_id,"Date",Team\_Name,Description) values(4,TO\_DATE('05/10/2018','MM-DD-YYYY'),'Cant Touch This','Very not not-mild at meeting');

insert into meetings(Employee\_id,"Date",Team\_Name,Description) values(6,TO\_DATE('05/08/2018','MM-DD-YYYY'),'Cant Touch This','MEETING COLLAPSED INTO THE VOID');

SQL and Relational Algebra Statements

Query1

**SQL:**

select first\_name,middle\_name,last\_name,street\_address,city,state,zipcode

from person

where

Mail\_To='Y'

order by state,city,last\_name,first\_name,middle\_name;

**Relational Algebra**:

Π first\_name,middle\_name,last\_name,street\_address,city,state,zipcode(σ

mail\_to=’Y’(Person))

Query2

**SQL:**

**SELECT**

**Person.Title as Title,**

**Person.First\_Name as First,**

**Person.Middle\_Name as Middle,**

**Person.Last\_Name as Last,**

**Doctor.First\_Name as DoctorFirstName,**

**Doctor.Last\_Name as DoctorLastName,**

**Doctor.Doctor\_Number as DoctorNumber**

**FROM CLIENT**

**INNER JOIN Doctor ON Doctor.Client\_Id=Client.id**

**INNER JOIN Person ON Person.id=Client.Person\_Id**

**ORDER BY Last ASC, First ASC;**

**Relational Algebra:**

(Π\_Person.Title,

Person.First\_Name,

Person.Middle\_Name,

Person.Last\_Name,

Doctor.First\_Name,

Doctor.Last\_Name

Doctor.Doctor\_Number((Client ⋈ Doctor) ⋈ Person))

Query3

**SQL:**

select person.first\_name,volunteer.date\_joined

from works,volunteer,team,cares,person

where cares.Client\_Id = &clientId and volunteer.Person\_id = person.id

And

works.volunteer\_id=volunteer.id and works.team\_name=team.name

and

team.name=cares.team\_name

order by volunteer.date\_joined;

**Relational Algebra:**

**(Π**person.first\_name,volunteer.date\_joined(**σ** cares.client\_id = ‘&clientId’ ∧

volunteer.person\_id = person.id **∧** works.volunteer\_id = volunteer.id ∧

works.team\_name = team.name **∧** team.name = cares.team\_name

(works **X** volunteer **X** team **X** cares **X** person))

Query4

**SQL:**

**--Clients that are supported by team that reports to highest paid**

**SELECT**

**Person.Title as Title,**

**Person.First\_Name as First,**

**Person.Middle\_Name as Middle,**

**Person.Last\_Name as Last,**

**Person.Street\_Address as StreetAddress,**

**Person.City,**

**Person.State,**

**Person.Zipcode**

**FROM Employee**

**INNER JOIN Team ON Team.Reports\_To=Employee.id**

**INNER JOIN Cares ON Cares.Team\_Name=Team.Name**

**INNER JOIN Client ON Client.id=Cares.Client\_Id**

**INNER JOIN Person ON Person.id=Client.Person\_Id**

**WHERE (Monthly\_Salary) IN**

**( SELECT MAX(Monthly\_Salary)**

**FROM Employee**

**)**

**ORDER BY Last ASC;**

**Relational Algebra:**

Π\_Person.Title,

Person.First\_Name,

Person.Middle\_Name,

Person.Last\_Name,

Person.Street\_Address,

Person.City,

Person.State,

Person.Zipcode(

σ\_Monthly\_Salary=G\_MAX(Monthly\_Salary)(Employee)(

(((Employee ⋈ Team) ⋈ Cares) ⋈ Client) ⋈ Person

)

)

Query5

**SQL**:

Select

person.first\_name,person.last\_name,person.street\_address,person.city,

person.state,person.zipcode,person.profession,sum(donor\_donations.amount) as sum,donor\_donations.anonymous

From

Client,person,donor,donor\_donations

Where

client.person\_id = person.id

And

donor.person\_id=person.id

And

donor\_donations.donor\_id = donor.id

group by person.first\_name,person.last\_name,person.street\_address,person.city,person.state,person.zipcode,person.profession,donor\_donations.anonymous

order by sum desc;

**Relational Algebra:**

**Π**person.first\_name,person.last\_name,person.street\_address,person.city,

person.state,person.zipcode,person.profession,**P**sum(**G**sum(donor\_donations.amount)),

donor\_donations.anonymous(**σ** client.person\_id = person.id ∧ donor.person\_id =

person.id ∧ donor\_donations.donor\_id = donor.id (client **X** person **X** donor **X**

donor\_donations)

Query6

**SQL:**

**SELECT**

**Person.Title as Title,**

**Person.Last\_Name as Last,**

**Phone\_Number.Phone\_Number as "Number",**

**Donor\_Donations."Date" as "Date",**

**Donor\_Donations.Amount**

**FROM Donor**

**INNER JOIN Donor\_Donations ON Donor\_Donations.Donor\_Id=Donor.id**

**INNER JOIN Person ON Person.id=Donor.Person\_Id**

**INNER JOIN Phone\_Number ON Phone\_Number.Person\_Id=Person.id**

**WHERE (Donor\_Donations.Donor\_Id, Donor\_Donations."Date") IN (**

**SELECT Donor\_Id, MAX("Date") as "Date"**

**FROM Donor\_Donations**

**GROUP BY Donor\_Id**

**)**

**AND Donor\_Donations.Anonymous = 'Y'**

**AND Phone\_Number.Primary = 'Y'**

**AND Person.Mail\_To = 'N'**

**ORDER BY Donor\_Donations.Amount DESC;**

**Relational Algebra:**

**Π**\_Person.Title,

Person.Last\_Name,

Phone\_Number.Phone\_Number,

Donor\_Donations.Date,

Donor\_Donations.Amount(

**σ**\_Donor\_Donation.Donor\_Id, Donor\_Donations.Date=

**Π**\_Donot\_Id, MAX(Date)(

Donor\_Id\_**G**\_MAX(Date)(Donor\_Donations)

)

)

**∧** Donor\_Donations.Anonymous='Y'

**∧** Phone\_Number.Primary='Y'

**∧** Person.Mail\_To='N'(

(((Donor **⋈** Donor\_Donations) **⋈** Person) **⋈** Phone\_Number)

)

)

Query7

**SQL:**

SELECT

Person.First\_Name AS "ClientFirstName",

Person.Middle\_Name AS "ClientMiddleName",

Person.Last\_Name AS "ClientLastName",

VolunteerPerson.First\_Name AS "VolunteerFirstName",

VolunteerPerson.Middle\_Name AS "VolunteerMiddleName",

VolunteerPerson.Last\_Name AS "VolunteerLastName",

Volunteer.Date\_Joined,

Team.Name AS "Team Name"

FROM Client

INNER JOIN Cares ON Client.id=Cares.Client\_Id

INNER JOIN Team ON Team.Name = Cares.Team\_Name

INNER JOIN Works ON Works.Team\_Name = Team.Name

INNER JOIN Volunteer ON Volunteer.id = Works.Volunteer\_Id

INNER JOIN (

SELECT \* FROM Person

) VolunteerPerson ON (VolunteerPerson.id=Volunteer.Person\_Id)

INNER JOIN Person ON Person.id = Client.Person\_Id

WHERE Person.Gender != VolunteerPerson.Gender

ORDER BY "ClientLastName", "ClientFirstName", "Team Name", "VolunteerLastName",

"VolunteerFirstName";

**Relational Algebra:**

Π\_Person.First\_Name,

Person.Middle\_Name,

Person.Last\_Name,

VolunteerPerson.First\_Name,

VolunteerPerson.Middle\_Name,

VolunteerPerson.Last\_Name,

Volunteer.Date\_Joined,

Team.Name(

σ\_Person.Gender!=VolunteerPerson.Gender(

(((((Client ⋈ Cares) ⋈ Team) ⋈ Works) ⋈ Volunteer) ⋈ Person as VolunteerPerson) ⋈ Person

)

)

Query8

**SQL:**

select person.ethnicity,person.gender,count(\*) from client,person

where client.person\_id = person.id group by person.ethnicity,person.gender

union (select person.gender,person.ethnicity,count(\*) from client,person

where client.person\_id = person.id group by person.gender,person.ethnicity)

union (select person.ethnicity,person.gender,count(\*) from client,person

where client.person\_id = person.id group by person.ethnicity,person.gender);

**Relational Algebra:**

**Π**person.ethnicity,person.gender,Gcount(\*)(**σ**client.person\_id = person.id(client **X**

person)**∪ Π**person.gender,person.ethnicity,Gcount(\*)(**σ**client.person\_id = person.id(client

Xperson) **∪** **Π**person.ethnicity,person.gender,Gcount(\*)(**σ**client.person\_id =

person.id(client**X** person)

Query9

**SQL:**

select organization.type,sum(amount),count(Org\_donations.id) from

organization,Org\_Donations

where organization.name = Org\_donations.Org\_Name

group by organization.type;

**Relational Algebra**:

**Π** organization.type,sum(amount),**G**count(Org\_donations.id)(**σ** organization.name =

Org\_donations.Org\_name (organizations **X** Org\_Donations)

Query10

**SQL:**

select person.first\_name fName,person.last\_name lName,phone\_number.phone\_number Phone#, extract(year from donor\_donations."Date")year

from

donor,donor\_donations,person,phone\_number

where

phone\_number.person\_id = person.id and phone\_number.primary='Y' and person.id=donor.person\_id and donor.id = donor\_donations.donor\_id

group by person.first\_name,person.last\_name,phone\_number.phone\_number,donor\_donations."Date"

having (sum(donor\_donations.amount)

in

(select sum(donor\_donations.amount)

from

donor,donor\_donations

where donor.id = donor\_donations.donor\_id

group by donor.id));

**Relational Algebra:** Π**ρfName(**person.first\_name),**ρlName**(person.last\_name),**ρPhone#**(phone\_number.phone\_number),**ρyear**(donor\_donations.”Date”)(σ phone\_number.person\_id = person.id **∧** phone\_number.primary=’Y’ **∧** person.id=donor.person\_id **∧** donor.id = donor\_donations.donor\_id (donor **X** donor\_donations **X** person **X** phone\_number) **∧** sum(donor\_donations.amount) **∩** (**Π** donor.id **G**sum(donor\_donations.amount) (**σ** donor.id = donor\_donations.donor\_id(donor **X** donations))

Query11

**SQL:**

select organization.name,

sum(donor\_donations.amount)+sum(Org\_donations.amount)

from person,organization,donor,donor\_donations,Org\_donations where

org\_donations.org\_name = organization.name and

organization.person\_id = person.id and person.id=donor.person\_id

and donor\_donations.donor\_id=donor.id group by organization.name

order by organization.name;

**Relational Algebra:**

**Π** organization.name,**G**sum(donor\_donations.amount),

(**σ** org\_donations.org\_name = organization.name **∧** organization.person\_id = person.id

**∧**

person.id = donor.person\_id **∧** donor\_donations.donor\_id = donor.id(person **X**

organization **X** donor **X** donor\_donations **X** Org\_donations)

Query12

**SQL:**

**SELECT**

**Need**

**FROM Client**

**INNER JOIN Needs ON Needs.Client\_Id=Client.id**

**WHERE Needs.Importance >= 7**

**GROUP BY Needs.Need**

**HAVING Count(Need) >= 2;**

**Relational Algebra:**

Π\_Need(σ\_Count(Need) > 1 ∧ Importance >=7(Need\_G\_Count(Need)((Client ⋈ Needs))))

Query13

**SQL:**

Select

person.first\_name,person.last\_name,sum(expenses.amount),

employee.monthly\_salary

From

person,employee,expenses where employee.person\_id = person.id

and expenses.employee\_id=employee.id

group by person.first\_name,person.last\_name,employee.monthly\_salary

having sum(expenses.amount) < employee.monthly\_salary;

**Relational Algebra:**

**Π**person.first\_name,person.last\_name,**G**sum(expenses.amount),employee.montl

y\_salary(**σ** employee.person\_id = person.id **∧** expenses.employee\_id = employee.id(person **X** employee **X** expenses)

Query14

**SQL:**

SELECT DISTINCT \*

FROM (

SELECT

Team.Name,

Team.Type,

LeaderPerson.First\_Name AS "LeaderFirstName",

LeaderPerson.Last\_Name AS "LeaderLastName",

Person.First\_Name AS "ReportToFirstName",

Person.Last\_Name AS "ReportToLastName",

CountVolunteers."NumVolunteers" AS "NumVolunteers",

CountVolunteers."Hours" AS "SumHours",

MeetDates."Date" AS "Date"

FROM Team

LEFT OUTER JOIN Works ON Works.Team\_Name=Team.Name

LEFT OUTER JOIN Volunteer ON Volunteer.id=Works.Volunteer\_Id

LEFT OUTER JOIN (

SELECT \* FROM Person

) LeaderPerson ON (LeaderPerson.id=Team.Team\_Leader)

LEFT OUTER JOIN Person ON Person.id=Team.Reports\_To

LEFT OUTER JOIN(

SELECT

Team.Name AS "Name",

COUNT(Volunteer\_Id) AS "NumVolunteers",

SUM(Works.Hours) AS "Hours"

FROM Team

INNER JOIN Works ON Works.Team\_Name=Team.Name

GROUP BY Team.Name

) CountVolunteers ON CountVolunteers."Name"=Team.Name

FULL OUTER JOIN(

SELECT

Team\_Name,

MAX("Date") AS "Date"

FROM Meetings

GROUP BY Team\_Name

) MeetDates ON MeetDates.Team\_Name=Team.Name

)

ORDER BY Type ASC, Name ASC;

**Relational Algebra:**

**Π**team.name,team.type,**ρ**LeaderFirstName(leaderperson.first\_name),**ρ**LeaderLastName(leaderperson.last\_name),**ρ**ReportToFirstName(person.first\_name),**ρ**ReportToLastName(person.last\_name),**ρ**NumVolunteers(countvolunteers.”numvolunteers”),**ρ**NumHours(countvolunteers.”hours”),**ρ**Date(meetDates.”Date”)(**σ**((Team **⟕** works) **⟕** volunteer **⟕** (**Π** \* (**σ**leaderperson.id = team.team\_leader(person))) **⟕** person **⟕** (**Π**Pname(team.name),**P**numVolunteers(count(volunteer.id)),**P**hours(sum(works.hours))(team **⋈** works)) **⟗** (**Π**team\_name,**P**”Date”(max(“Date”))(meetings))))

Query15

**SQL:**

Select donation\_drive.title,donation\_drive.theme,donation\_drive.start\_date,

donation\_drive.end\_date,sum(donor\_donations.amount)

From

Donor\_donations,donation\_drive

where donor\_donations.donation\_drive\_title = donation\_drive.title

group by donation\_drive.title,donation\_drive.theme,donation\_drive.start\_date,

Donation\_drive.end\_date,donation\_drive.goal

Having

sum(donor\_donations.amount) >= donation\_drive.goal;

**Relational Algebra:**

**Π**donation\_drive.title,donation\_drive.theme,donation\_drive.start\_date,donation\_drive.ed

\_date,**G**sum(donor\_donations.amount)(**σ**donor\_dontions.donation\_drive\_title=donation\_

drive.title) **∧** sum(donor\_donations.amount) > donation\_drive.goal(donor\_donations **X**

donation\_drive)

Query16

**SQL:**

SELECT

Donation\_Drive.Title,

Donation\_Drive.End\_Date,

Person.Last\_Name,

Employee.Job\_Title

FROM Donation\_Drive

LEFT OUTER JOIN Employee ON Employee.id = Donation\_Drive.Employee\_Id

LEFT OUTER JOIN Person ON Person.id = Employee.Person\_Id

WHERE Donation\_Drive.Title IN(

SELECT

Donation\_Drive.Title

FROM Donation\_Drive

LEFT OUTER JOIN Donor\_Donations ON Donor\_Donations.Donation\_Drive\_Title=Donation\_Drive.Title

GROUP BY Donation\_Drive.Title, Donation\_Drive.Goal

HAVING SUM(NVL(Donor\_Donations.Amount, 0)) <= Donation\_Drive.Goal

)

ORDER BY Donation\_Drive.Goal DESC;

**Relational Algebra:**

Π\_Donation\_Drive.Title,

Donation\_Drive.End\_Date,

Person.Last\_Name,

Employee.Job\_Title(

σ\_Donation\_Drive.Title=Π\_Donation\_Drive.Title(

Title\_G\_SUM\_Donor\_Donations.Amount(Donation\_Drive ⟕ Donor\_Donations)

)((Donation\_Drive ⟕ Employee) ⟕ Person)

)

Query17

**SQL:**

Select

Person.last\_name,employee.monthly\_salary,employee.marital\_status,

count(team.reports\_to),count(donation\_drive.employee\_id)

from person,employee,team,donation\_drive

Where

donation\_drive.employee\_id = employee.id and person.id = employee.person\_id

And

employee.type='PART-TIME' and team.reports\_to = employee.id

group by person.last\_name,employee.monthly\_salary,employee.marital\_status order by person.last\_name;

**Relational Algebra:**

**Π**person.last\_name,employee.monthly\_salary,employee.marital\_status,

**G**count(team.reports\_to),count(donation\_drive)(**σ** donation\_drive.employee\_id =

Employee.id **∧** person.id = employee.person\_id **∧** employee.type=’PART-TIME’ **∧**

Team.reports\_to = employee.id(person**X**employee**X**team**X**donation\_drive)

Query18

**SQL:**

Select organization.name,organization.type,organization.website,person.first\_name,

person.last\_name

From

Org\_donations,organization,person

Where

person.id = organization.person\_id

And

organization.name = org\_donations.org\_name

And

org\_donations.anonymous='N'

and not exists

(select organization.name from organization,donation\_drive\_sponsor

where organization.name = donation\_drive\_sponsor.name)

order by organization.name;

**Relational Algebra:**

**Π**Organization.name,organization.type,organization.website,person.first\_name,person.last\_name(**σ** person.id = organization.person\_id **∧** organization.name = org\_donations.org\_name **∧** org\_donations.anonymous = ‘N’ (Org\_donations **X** organization **X** person ) **-** (**Π** organization.name(**σ** organization.name = donation\_drive\_sponsor.name)(organization **X** donation\_drive\_sponsor)

Query19

**SQL:**

Select

person.first\_name,person.last\_name,count(works.team\_name),sum(works.hours)

from volunteer,person,works WHERE volunteer.id = works.volunteer\_id

and person.id=volunteer.person\_id and date\_joined between

TO\_DATE (add\_months(sysdate,-3), 'DD/MM/YY')

AND

TO\_DATE (sysdate, 'DD/MM/YY')

group by person.first\_name,person.last\_name

order by person.last\_name,person.first\_name;

**Relational Algebra:**

**Π** person.first\_name,person.last\_name,**G**count(works.team\_name),sum(works.hours)

(**σ** volunteer.id = works.volunteer\_id **∧** person.id = volunteer.person\_id **∧**

Join\_date > (sysdate,-3)(volunteer **X** person **X** works)

Query20

**SQL:**

UPDATE Employee

SET Monthly\_Salary = Monthly\_Salary\*1.1

WHERE Employee.id IN(

SELECT

Employee.id

FROM Team

INNER JOIN Employee ON Employee.id=Team.Reports\_To

GROUP BY Employee.id

HAVING COUNT(Team.Name) > 1

)

AND Type='PART-TIME';

**Relational Algebra:**

Employee ← Π\_id, Person\_Id, Monthly\_Salary, Marital\_Status, Job\_Title, Date\_Hired, Type(

σ\_Employee.id=(Π\_Employee.id(Team ⋈ Employee)) ∧ Employee.id\_G\_COUNT(Team.Name)((Team ⋈ Employee)) > 1(

Employee

)

)

Query21

**SQL:**

update needs set importance=(importance+1)

where needs.client\_id in

(SELECT EMPLOYEE.ID FROM EMPLOYEE,MEETINGS

WHERE EMPLOYEE.ID=MEETINGS.EMPLOYEE\_ID

having count(meetings.employee\_id) <>

(select min(employee.id) from employee,meetings

where employee.id = meetings.employee\_id fetch next 1 rows only)

GROUP BY EMPLOYEE.ID);

**Relational Algebra:**

Needs.importance **←** (Needs.importance + 1(**σ** needs.client\_id ∩ **( Π**

Employee.id(σ employee.id = meetings.employee\_id **∧**

Count **!=** (**Π** **G**min(employee.id)(σemployee.id = meetings.employee\_id)(employee **X**

meetings)))(meetings.employee\_id)(employee **X** meetings))

Query22

**SQL:**

UPDATE Org\_Donations

SET Amount = Amount\*2

WHERE Org\_Donations."Date" IN(

SELECT

MAX(Org\_Donations."Date")

FROM Org\_Donations

);

**Relational Algebra:**

Org\_Donations <- Π\_id, Org\_Name, 2\*Amount, Type, "Date", Anonymous(

σ\_"Date"=G\_MAX("Date")(Org\_Donations)

)(Org\_Donations)

Query23

**SQL:**

delete from employee where employee.id in (select id from (

select employee.id,count(meetings.employee\_id) as count\_meetings

from meetings right outer join employee on

employee.id = meetings.employee\_id group by employee.id)x

having min(x.count\_meetings) = 0 group by id);

**Relational Algebra:**

Employee ← Employee - (**σ** **G**min(x.count\_meetings = 0(**Π** employee.id(employee)) **∩**

**P**x(**Π** employee.id,**G**(meetings.employee\_id)(**σ** employee.id = meetings.employee\_id

(meetings **⟖** employee))

Query24

**SQL:**

DELETE FROM Volunteer

WHERE Volunteer.id = (

SELECT

Volunteer\_Id

FROM Works

WHERE Works.Hours IN(

SELECT

MIN(Hours)

FROM Volunteer

INNER JOIN Works ON Works.Volunteer\_Id=Volunteer.id

)

);

**Relational Algebra:**

Volunteer ← Π\_id, Person\_Id, Date\_Joined(Volunteer)

-

Π\_id, Person\_Id, Date\_Joined(

σ\_Works.Hours = G\_MIN(Hours)(Volunteer ⋈ Works)

)

Query25

**SQL:**

delete from donation\_drive

where donation\_drive.title

not in

(select donation\_drive.title from donation\_drive,donor\_donations

where donation\_drive.title = donor\_donations.donation\_drive\_title);

**Relational Algebra:**

Donation\_drive ← donation\_drive - ((**Π** donation\_drive.title) ∩

**(Π** donation\_drive.title(**σ** donation\_drive.title !=

donor\_donation\_drive\_title(donation\_drive **X** donor\_donations)))