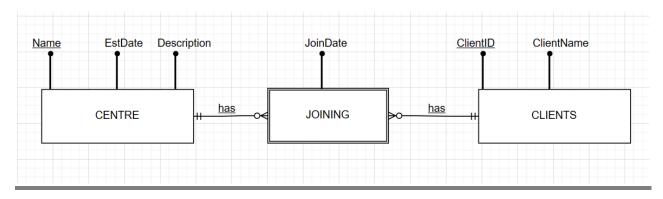
## **INF10025 Data Management and Analytics**

### Task 5 - Pass Submission

Student Number: 104082552 Student Name: Nhat Minh Tran

# **Pass 5a**Paste your screen capture(s) for this task here.



#### Pass 5b

Paste your screen capture(s) for this task here.

#### **Relational Schema**

CENTRE (Name, EstDate, Description)
PK (Name)
CLIENTS (ClientID, ClientName)
PK (ClientID)
JOINING (JoinDate, Name, ClientID)
PK (Name, ClientID)
FK (Name) references CENTRE
FK (ClientID) references CLIENTS

#### Pass 5c

Paste your screen capture(s) for this task here.

CREATE TABLE CENTRE (

Name VARCHAR(50) PRIMARY KEY,

EstDate DATETIME,

Description VARCHAR(200)

);

CREATE TABLE CLIENTS (

ClientID INTEGER PRIMARY KEY,

```
ClientName VARCHAR(50)
);

CREATE TABLE JOINING (

JoinDate DATETIME,

Name VARCHAR(50),

ClientID INTEGER,

PRIMARY KEY (Name, ClientID),

FOREIGN KEY (Name) REFERENCES CENTRE(Name),

FOREIGN KEY (ClientID) REFERENCES CLIENTS(ClientID)
```

#### Pass 5d

Paste your screen capture(s) for this task here.

- Normalization is a database design technique used to generate relational schemas.
- It refers to the process to minimize redundancy and dependency in a database.
- It requires no diagrams.
- An aim of normalization is to achieve the 3<sup>rd</sup> Normal Form (3NF). The state where the data is efficient for storage, avoids data anomalies, improve data integrity, and consistency.

Pass 5e
Paste your screen capture(s) for this task here.

CustID	Name	Phone	CarRego	MakeModel	StartDate	ReturnDate
125	John Coles	0401112233	1AU8HK	Mazda 3	31/08/2020	7/09/2020
125	John Coles	0401112233	1LM3AB	Hyundai i30	14/11/2020	21/11/2020
278	Erin Trump	0466121455	1AU8HK	Mazda 3	12/09/2020	19/09/2020
278	Erin Trump	0466121455	1KA2CA	Toyota Camry	1/10/2020	8/10/2020
278	Erin Trump	0466121455	1CZ8JK	Mazda 3	10/11/2020	12/11/2020
278	Erin Trump	0466121455	1AU8HK	Mazda 3	26/11/2020	1/12/2020
721	Emma Knox	0423544117	1LM3AB	Hyundai i30	10/09/2020	13/09/2020