FINAL SPRINT

PROJECT 1 – ERD & REPORT DESIGN

BY GROUP – 2

GROUP MEMBERS:
1. MELANIE ADAMS
2. MAY BASALO
3. JACOB CRUMMEY
4. EUGENE KEPICH
5. JENNIFER LYVER
6. HARINI MANOHAR

HAB TAXI SERVICES
ENTITY – RELATIONSHIP DIAGRAM

Employees
Driver-Number (PK)
Name
Address
Phone-Number
DL-Number
License-Expiry
Insurance-Company
Insurance-Number
Own-Car
Balance-due

Expenses
Invoice-Number (PK)
Invoice-Date
Driver-Number (FK)
Item-Number
Item-Description
Item-Cost
Item-Quantity
Item-Total
Subtotal
HST
Total

Cars
Car-Number (PK)
Car-Make
Car-Model
Car-Year
Car-License-Plate
Car-Status

Revenue
Transaction-ID (PK)
Transaction-Date
Transact-Description
Driver-Number (FK)
Transact-Amount
HST
Total

Payments
Payment-ID (PK)
Driver-Number (FK)
Payment-Date
Payment-Amount
Payment-Reason
Payment-Method

Rentals
Rental-ID (PK)
Driver-Number (FK)
Start-Date
Car-Number (FK)
Rental-Duration
Rental-Cost
HST
Total

Maintenance
Maintenance-ID (PK)
Car-Number (FK)
Maintenance-Date
Maintenance-Desc
Maintenance-Cost
HST
Total
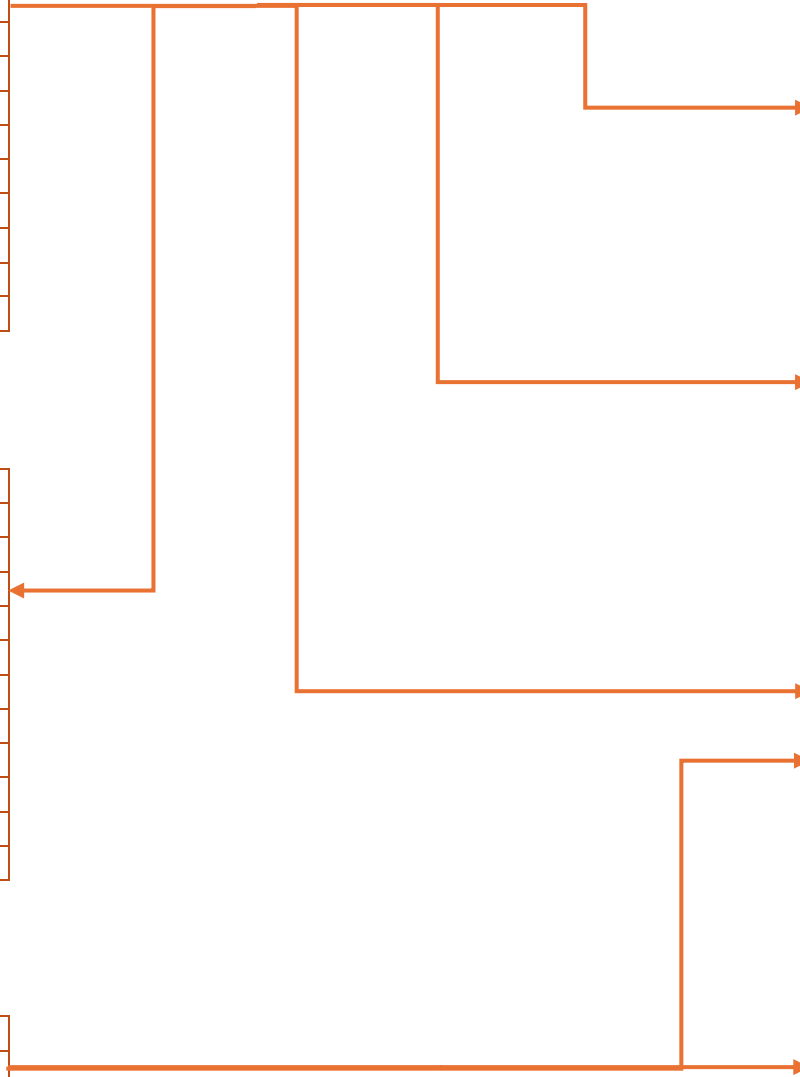
EXTRA FEATURES

1. New Entity: Cars:

- **Purpose:** Manage and track vehicles used in HAB Taxi Services.
- **Attributes:**
  - o Car-Number (Primary Key): Unique identifier for each car.
  - o Car-Make: Manufacturer of the car (e.g., Toyota, Ford).
  - o Car-Model: Specific model of the car (e.g., Camry, Focus).
  - o Car-Year: Year the car was manufactured.
  - o Car-License-Plate: License plate number of the car.
  - o Car-Status: Current status (e.g., available, rented, under maintenance).
- **Benefits:**
  - o Centralized management of vehicle information.
  - o Track car availability and status.
  - o Better record-keeping for maintenance and rental history.

2. Updated Rentals Entity:

- **Change:** Added Car-Number as a foreign key to reference the Cars table.
- **Purpose:** Link rental information directly to specific vehicles.

- **Benefits:**
  - o Improved tracking of car rentals.
  - o Accurate linkage of rental transactions to vehicles.
  - o Detailed reporting on car usage and rental history.

3. New Entity: Maintenance:

- **Purpose:** Record all maintenance activities for vehicles.
- **Attributes:**
  - o Maintenance-ID (Primary Key): Unique identifier for each maintenance record.
  - o Car-Number (Foreign Key): References the Cars table.
  - o Maintenance-Date: Date of maintenance.
  - o Maintenance-Desc: Description of maintenance work.
  - o Maintenance-Cost: Cost of maintenance.
  - o HST: Harmonized Sales Tax on maintenance cost.
  - o Total: Total cost including HST.
- **Benefits:**
  - o Detailed maintenance records for each vehicle.
  - o Track maintenance costs and budgeting.
  - o Ensure regular and safe maintenance of vehicles.

RECEIPT DESIGNS

CAR RENTAL RECEIPT

```
123456789012345678901234567890123456789012345678901234567890123456789012345
         1         2         3         4         5         6         7         8

          ----------------------------------------------
                        HAB TAXI SERVICES
                          123 ANY STREET
                       ST. JOHN'S, NL A1A 1A1
                          (709) 555-1234
          ----------------------------------------------
          Customer Name : XXXXXXXXXXXXXXXXXXXXXXXXXX
          Customer Phone: (XXX)XXX-XXXX
          ----------------------------------------------
             Rental ID        :    ##########
             Driver Number    :    ##########
             Rental Date      :    YYYY-MM-DD
             Car Number       :          ####
             Rental Duration  :      ### days
          ----------------------------------------------
          Rental Cost :                    $#,###.##
          HST (15%)   :                     $###.##
          ----------------------------------------------
          Total Cost  :                   $##,###.##
          ----------------------------------------------
                      Thank you for choosing
                        HAB Taxi Services!
          ----------------------------------------------
```

BALANCE PAYMENT RECEIPT

```
123456789012345678901234567890123456789012345678901234567890123456789012345
         1         2         3         4         5         6         7         8
```

```
------------------------------------------------
                 HAB TAXI SERVICES
                  123 ANY STREET
               ST. JOHN'S, NL A1A 1A1
                  (709) 555-1234
------------------------------------------------
Customer Name : XXXXXXXXXXXXXXXXXXXXXXXXXX
Customer Phone: XXXXXXXXXX
------------------------------------------------
Payment ID        :              ##########
Driver Number     :              ##########
Payment Date      :              YYYY-MM-DD
Payment Reason    :      XXXXXXXXXXXXXXXXXX
Payment Method    :      XXXXXXXXXXXXXXXXXX
------------------------------------------------
Payment Amount    :              $##,###.##
------------------------------------------------
             Thank you for your payment!
------------------------------------------------
```

PROFIT LISTING REPORT

```
123456789012345678901234567890123456789012345678901234567890123456789012345
        1         2         3         4         5         6         7         8
```

```
------------------------------------------------
                HAB TAXI SERVICES
                 123 ANY STREET
              ST. JOHN'S, NL A1A 1A1
                 (709) 555-1234
------------------------------------------------
               PROFIT LISTING REPORT
        From: YYYY-MM-DD        To: YYYY-MM-DD
------------------------------------------------
        Total Revenues:                $##,###.##
        Total Expenses:                $##,###.##
------------------------------------------------
        Profit (Loss) :                $##,###.##
------------------------------------------------
              Thank you! Have a nice day!
------------------------------------------------
```

DRIVER FINANCIAL LISTING

```
123456789012345678901234567890123456789012345678901234567890123456789012345
         1         2         3         4         5         6         7         8
```

```
---------------------------------------------
                HAB TAXI SERVICES
                 123 ANY STREET
             ST. JOHN'S, NL A1A 1A1
                 (709) 555-1234
---------------------------------------------
             DRIVER FINANCIAL LISTING
Driver Number    : ########
Driver Name      : XXXXXXXXXXXXXXXXXXXXXXX
From: YYYY-MM-DD  To: YYYY-MM-DD
---------------------------------------------
  Date           Description         Amount
---------------------------------------------
YYYY-MM-DD   XXXXXXXXXXXXXXXXXXX  $#,###.##
YYYY-MM-DD   XXXXXXXXXXXXXXXXXXX  $#,###.##
YYYY-MM-DD   XXXXXXXXXXXXXXXXXXX  $#,###.##
---------------------------------------------
Total Revenues:                   $#,###.##
---------------------------------------------
         Thank you for your business!
---------------------------------------------
```