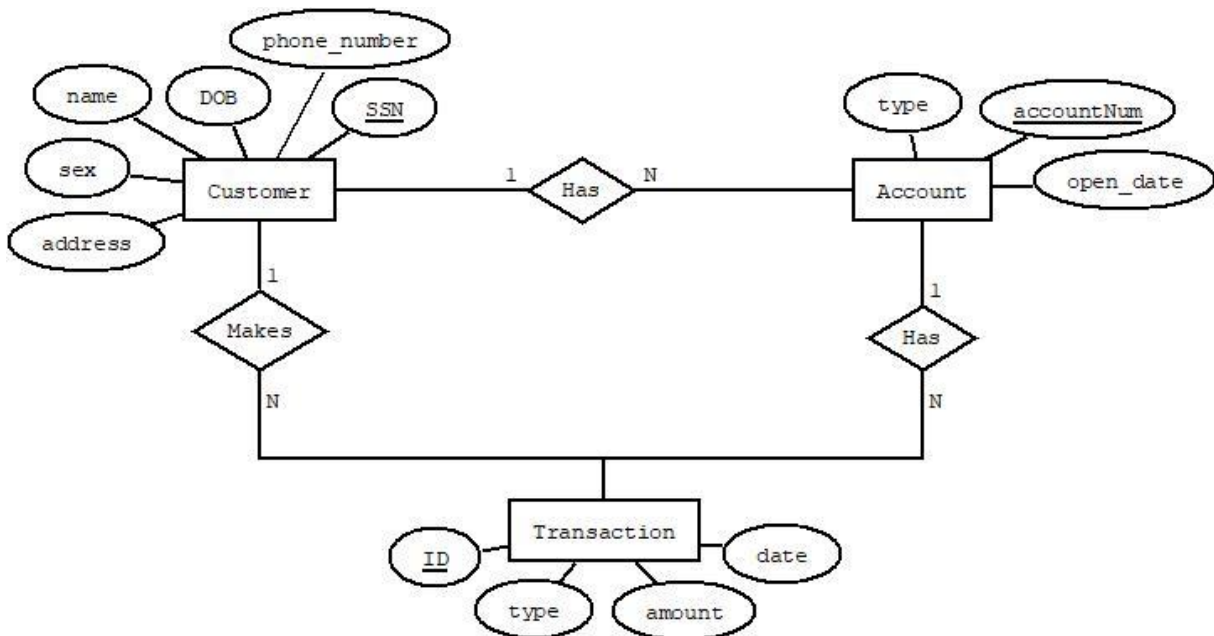


Homework 3 Report

Part 1:



Part 2:

1.) There are 11 total Deposit transactions at the bank.

```
3 #Question 1
4 • SELECT COUNT(type) AS total_deposits FROM transaction WHERE type = 'Deposit';
5
```

Result Grid

total_deposits
11

2.) The statement for September 2019 is shown below.

```
4      #Question 2
5      SELECT * FROM transaction
6      WHERE account_num = '1111222233331441' AND tdate LIKE '2019-09-__';
7
```

	id	amount	tdate	type	account_num
▶	1014	-100.00	2019-09-02	Withdraw	1111222233331441
	1015	-200.00	2019-09-08	Withdraw	1111222233331441
•	NULL	NULL	NULL	NULL	NULL

3.) The balance of account 1111222233331441 before 09/01/2019 is 5000.00.

```
8      #Question 3
9      SELECT amount FROM transaction
10     WHERE account_num = '1111222233331441' AND tdate < '2019-09-01';
11
```

	amount
▶	5000.00

4.) The customer that deposited the highest amount with one transaction is Andrew William, with a deposit of 5000.00.

```
12     #Question 4
13     SELECT name, amount FROM transaction
14     JOIN account ON transaction.account_num = account.number
15     JOIN customer ON account.owner_ssn = customer.ssn
16     WHERE amount = (SELECT MAX(amount) FROM transaction);
17
```

	name	amount
▶	Andrew William	5000.00

5.) All male customers with a Checking account: Alexander Felix, Andrew William

```
18 #Question 5
19 • SELECT name FROM customer WHERE sex = 'M'
20 AND ssn IN (SELECT owner_ssn FROM account WHERE type = 'Checking');
21
```

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Result Grid | Filter Rows: | Export: | Wrap Cell Content:

	name
▶	Alexander Felix
	Andrew William

6.) There are two accounts associated with Alexander Felix: a Checking account with account number 4111222233335444 and a Savings account with account number 5111222233339445.

```
22 #Question 6
23 • SELECT number, type FROM account
24 WHERE owner_ssn = (SELECT ssn FROM customer WHERE name = 'Alexander Felix');
25
```

<

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Con

	number	type
▶	4111222233335444	Checking
	5111222233339445	Saving
*	NULL	NULL

7.) The balance of Checking account 4111222233335444 is 100.00, and the balance of Savings account 5111222233339445 is 320.00.

```
26 #Question 7
27 • SELECT account.number, account.type, SUM(amount) AS Balance FROM transaction
28 JOIN account ON transaction.account_num = account.number
29 WHERE account_num = (SELECT number FROM account
30 WHERE owner_ssn = (SELECT ssn FROM customer WHERE name = 'Alexander Felix'))
31 AND type = 'Checking')
32 GROUP BY account.number
33 UNION
34 SELECT account.number, account.type, SUM(amount) AS Balance FROM transaction
35 JOIN account ON transaction.account_num = account.number
36 WHERE account_num = (SELECT number FROM account
37 WHERE owner_ssn = (SELECT ssn FROM customer WHERE name = 'Alexander Felix'))
38 AND type = 'Saving')
39 GROUP BY account.number;
```

Result Grid

number	type	Balance
4111222233335444	Checking	100.00
5111222233339445	Saving	320.00

8.) The customers who have transactions greater than or equal to one thousand dollars are Ana Bert and Andrew William.

A: Only nested queries


```
41 #Question 8a
42 • SELECT name FROM customer WHERE ssn IN
43 (SELECT owner_ssn FROM account WHERE number IN
44 (SELECT account_num FROM transaction WHERE amount >= 1000));
45
```

Result Grid

name
Ana Bert
Andrew William

B: Only joins


```
46 #Question 8b
47 • SELECT name FROM transaction
48 JOIN account ON transaction.account_num = account.number
49 JOIN customer ON account.owner_ssn = customer.ssn
50 WHERE amount >= 1000;
51
```

< 

	name
▶	Ana Bert
	Andrew William

9.) The customers that have at least two transactions are Alexander Felix and John Adam.

```
52 #Question 9
53 • SELECT name, COUNT(account_num)
54 FROM (SELECT * FROM transaction WHERE type = 'Deposit') AS deposits
55 JOIN account ON deposits.account_num = account.number
56 JOIN customer ON account.owner_ssn = customer.ssn
57 GROUP BY name
58 HAVING COUNT(account_num) >= 2;
```

< 

	name	COUNT(account_num)
▶	Alexander Felix	4
	John Adam	5