

OUTPUT

a)

```
mysql> CREATE TABLE customer ( customer_id INT PRIMARY KEY,  
-> name VARCHAR(15), phone VARCHAR(10), address VARCHAR(100));
```

customer_id	name	phone	address
1	John Doe	1234567890	123 Main St, Mumbai, India
2	Jane Doe	0987654321	456 Park St, Delhi, India
3	Alice	1112223333	789 Market St, Chennai, India
4	Bob	4445556666	321 Broadway, Bangalore, India
5	Charlie	7778889999	654 Broadway, Kolkata, India

b)

```
mysql> CREATE TABLE accounts( customer_id INT NOT NULL,  
-> bank_code VARCHAR(15), account_no VARCHAR(15),  
-> account_type VARCHAR(20), balance DECIMAL(10,2),  
-> PRIMARY KEY(account_no),  
-> FOREIGN KEY(customer_id) REFERENCES customer(customer_id));
```

customer_id	bank_code	account_no	account_type	balance
1	SBI123	ACC123456	Savings	10000.00
3	SBI789	ACC345678	Savings	30000.00
5	SBI345	ACC678901	Savings	50000.00
2	SBI456	ACC789012	Current	20000.00
4	SBI012	ACC901234	Current	40000.00

c)

```
mysql> CREATE TABLE loan ( loan_id INT PRIMARY KEY, loan_type VARCHAR(20),  
-> loan_amount DECIMAL(10,2), customer_id INT NOT NULL,  
-> FOREIGN KEY(customer_id) REFERENCES customer(customer_id));
```

loan_id	loan_type	loan_amount	customer_id
101	Home Loan	500000.00	1
102	Car Loan	200000.00	2
103	Education Loan	100000.00	3
104	Personal Loan	30000.00	4
105	Business Loan	400000.00	5

d)

```
mysql> CREATE TABLE loan_installment ( loan_id INT,  
-> installment_no INT,  
-> installment_amount DECIMAL(10,2),
```

```
-> PRIMARY KEY(loan_id,installment_no),
-> FOREIGN KEY(loan_id) REFERENCES loan(loan_id));
```

```
mysql> SELECT * FROM loan_installment;
```

loan_id	installment_no	installment_amount
101	1	20000.00
101	2	20000.00
102	1	10000.00
103	1	15000.00
104	1	10000.00
105	1	5000.00
105	2	5000.00

e)

```
mysql> SELECT customer.customer_id,name,address,account_no
-> FROM customer
-> JOIN accounts
-> ON customer.customer_id = accounts.customer_id;
```

customer_id	name	address	account_no
1	John Doe	123 Main St, Mumbai, India	ACC123456
2	Jane Doe	456 Park St, Delhi, India	ACC789012
3	Alice	789 Market St, Chennai, India	ACC345678
4	Bob	321 Broadway, Bangalore, India	ACC901234
5	Charlie	654 Broadway, Kolkata, India	ACC678901

f)

```
mysql> SELECT loan.loan_id,loan_type,total_amount_paid
-> FROM loan
-> JOIN (
-> SELECT loan_id,SUM(installment_amount) AS total_amount_paid
-> FROM loan_installment
-> GROUP BY loan_id) paid
-> ON loan.loan_id = paid.loan_id;
```

loan_id	loan_type	total_amount_paid
101	Home Loan	40000.00
102	Car Loan	10000.00
103	Education Loan	15000.00
104	Personal Loan	10000.00
105	Business Loan	10000.00