SQL Assignment 1

Note : Queries to look at the exact table have been included to just understand the table and columns available.

Q1. Do we have actors in the actor table that share the full name and if yes display those shared names.

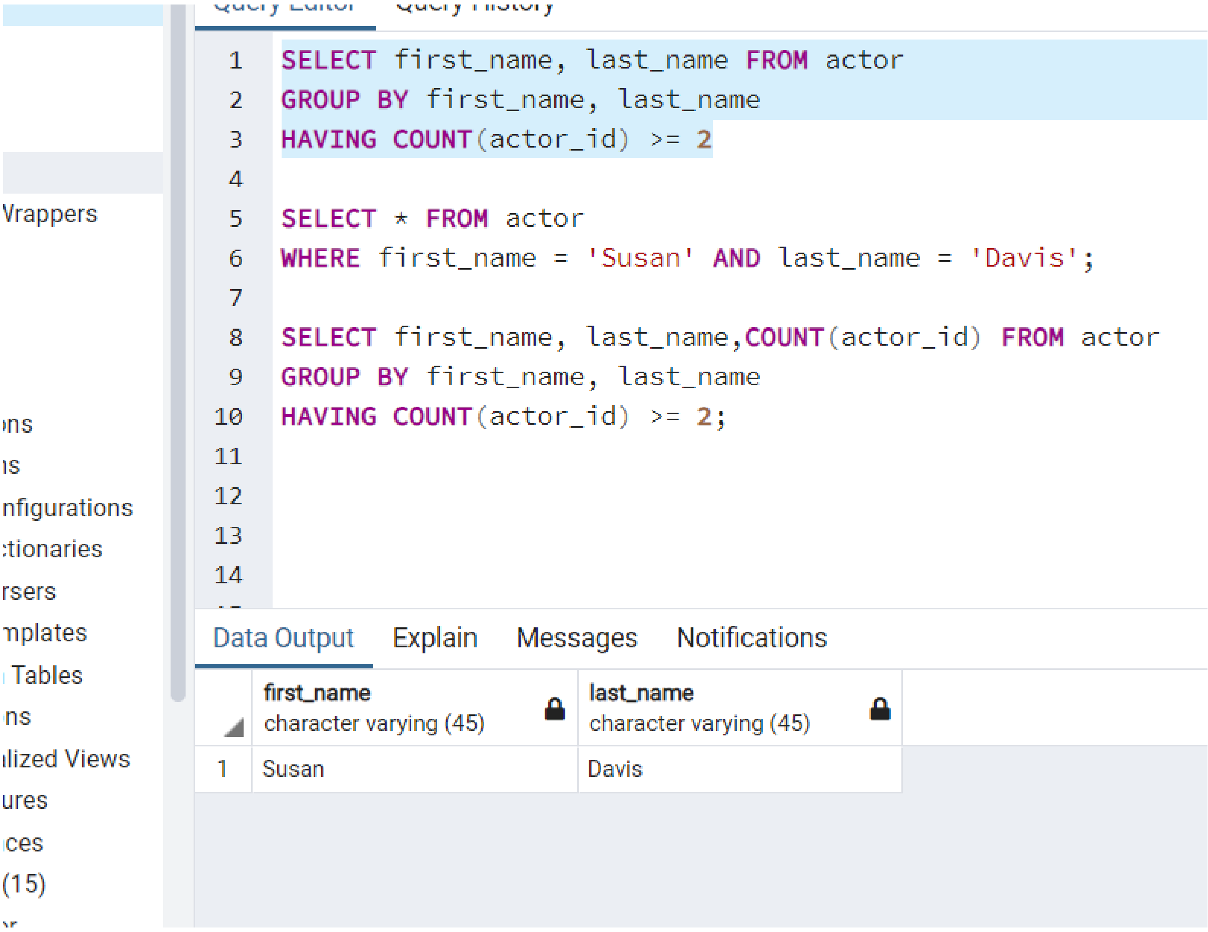
Answer: Yes, we do. The shared name is Susan Davis.

1. Required query

SELECT first_name, last_name FROM actor

GROUP BY first_name, last_name

HAVING COUNT(actor_id) >= 2



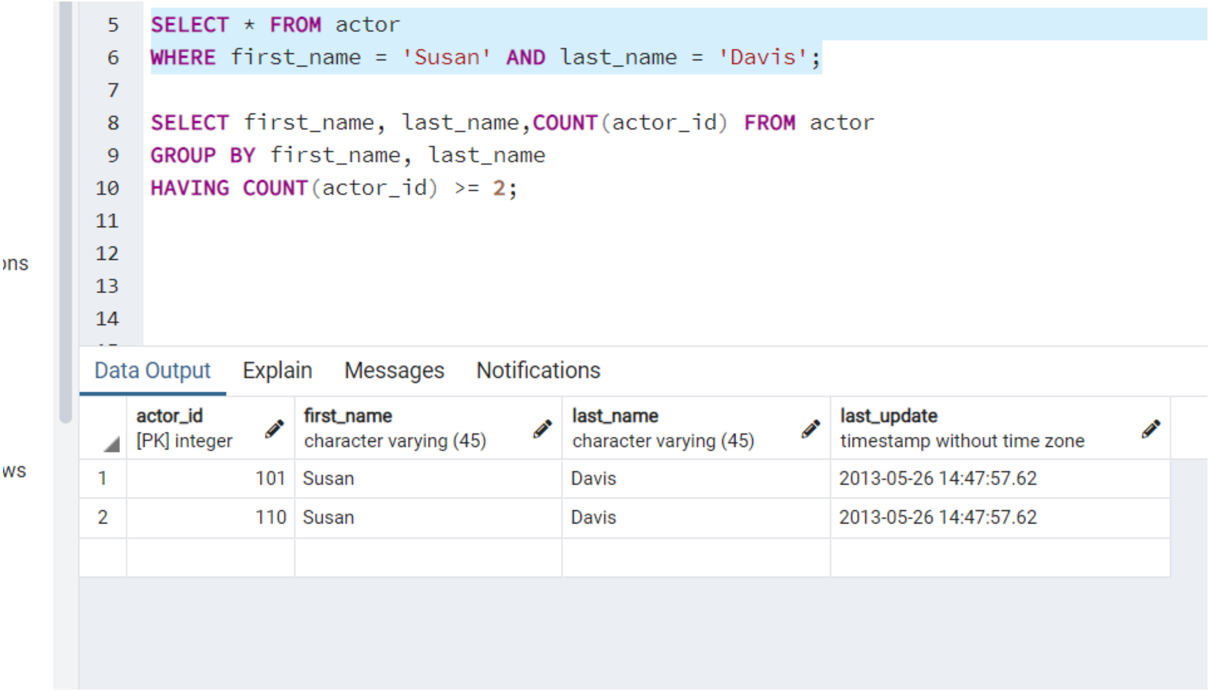
```
SELECT first_name, last_name FROM actor
GROUP BY first_name, last_name
HAVING COUNT(actor_id) >= 2

SELECT * FROM actor
WHERE first_name = 'Susan' AND last_name = 'Davis';

SELECT first_name, last_name,COUNT(actor_id) FROM actor
GROUP BY first_name, last_name
HAVING COUNT(actor_id) >= 2;
```

	first_name character varying (45)	last_name character varying (45)
1	Susan	Davis

2. Just validating the findings.

SELECT * FROM actor

WHERE first_name = 'Susan' AND last_name = 'Davis';



```sql
SELECT * FROM actor
WHERE first_name = 'Susan' AND last_name = 'Davis';

SELECT first_name, last_name,COUNT(actor_id) FROM actor
GROUP BY first_name, last_name
HAVING COUNT(actor_id) >= 2;
```

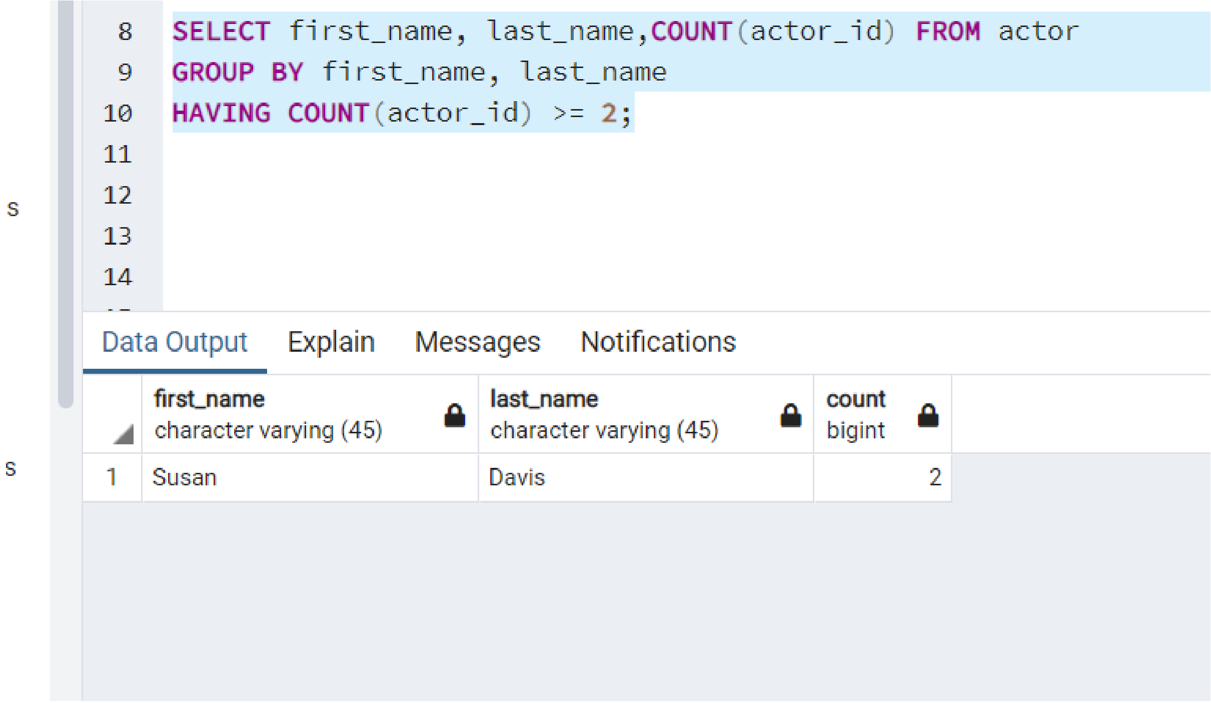
	actor_id [PK] integer	first_name character varying (45)	last_name character varying (45)	last_update timestamp without time zone
1	101	Susan	Davis	2013-05-26 14:47:57.62
2	110	Susan	Davis	2013-05-26 14:47:57.62

3. A more organised answer.

SELECT first_name, last_name,COUNT(actor_id) FROM actor

GROUP BY first_name, last_name

HAVING COUNT(actor_id) >= 2;



```sql
SELECT first_name, last_name,COUNT(actor_id) FROM actor
GROUP BY first_name, last_name
HAVING COUNT(actor_id) >= 2;
```

	first_name character varying (45)	last_name character varying (45)	count bigint
1	Susan	Davis	2

Q2. Return the customer IDs of customers who have spent at least $110 with the staff member who has an ID of 2.

SELECT * FROM payment;

2. Required answer

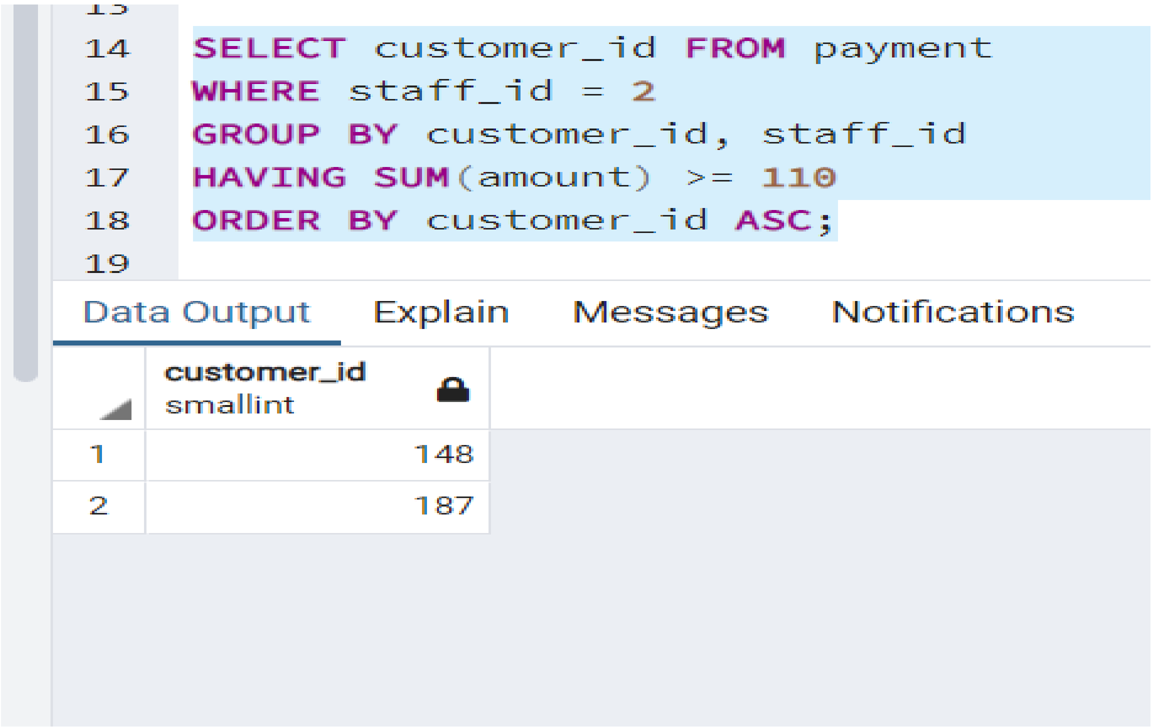
SELECT customer_id FROM payment

WHERE staff_id = 2

GROUP BY customer_id, staff_id

HAVING SUM(amount) >= 110

ORDER BY customer_id ASC;



```
SELECT customer_id FROM payment
WHERE staff_id = 2
GROUP BY customer_id, staff_id
HAVING SUM(amount) >= 110
ORDER BY customer_id ASC;
```

	customer_id smallint
1	148
2	187

3. A better, oragnised answer.

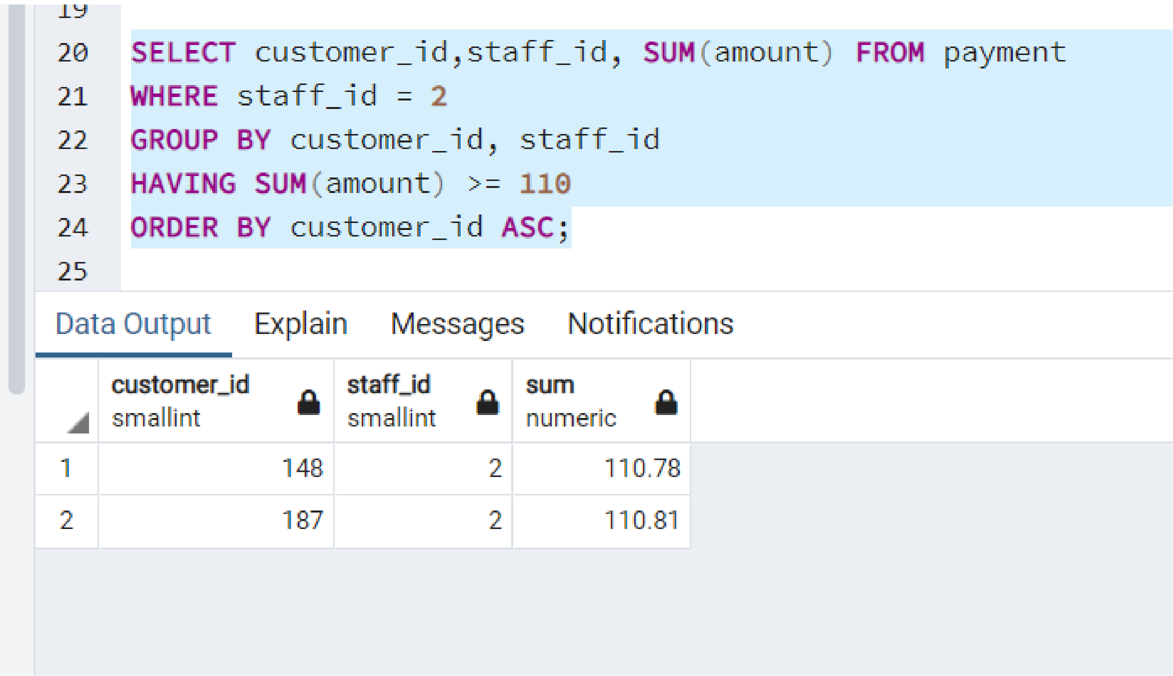
SELECT customer_id,staff_id, SUM(amount) FROM payment

WHERE staff_id = 2

GROUP BY customer_id, staff_id

HAVING SUM(amount) >= 110

ORDER BY customer_id ASC;



```
SELECT customer_id,staff_id, SUM(amount) FROM payment
WHERE staff_id = 2
GROUP BY customer_id, staff_id
HAVING SUM(amount) >= 110
ORDER BY customer_id ASC;
```

	customer_id smallint	staff_id smallint	sum numeric
1	148	2	110.78
2	187	2	110.81

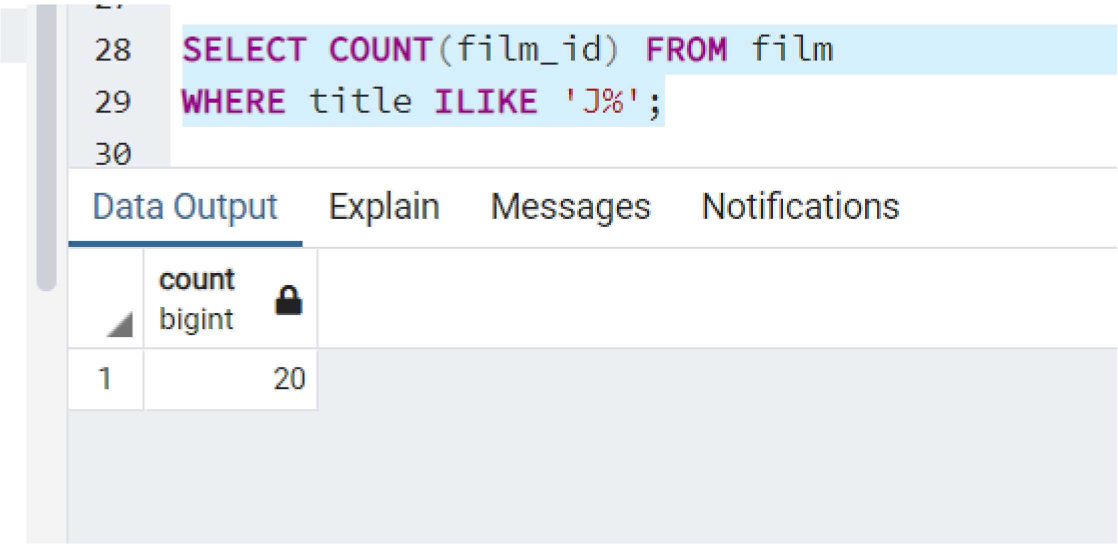
Q3. How many films begin with the letter J?

Answer: 20 Films.

SELECT * FROM film;

SELECT COUNT(film_id) FROM film

WHERE title ILIKE 'j%';



```
SELECT COUNT(film_id) FROM film
WHERE title ILIKE 'J%';
```

	count bigint
1	20

Q4. What customer has the highest customer ID number whose name starts with an 'E' and has an address ID lower than 500?

Answer : Eddie Tomlin whose customer_id is 434 fulfils the given criteria.

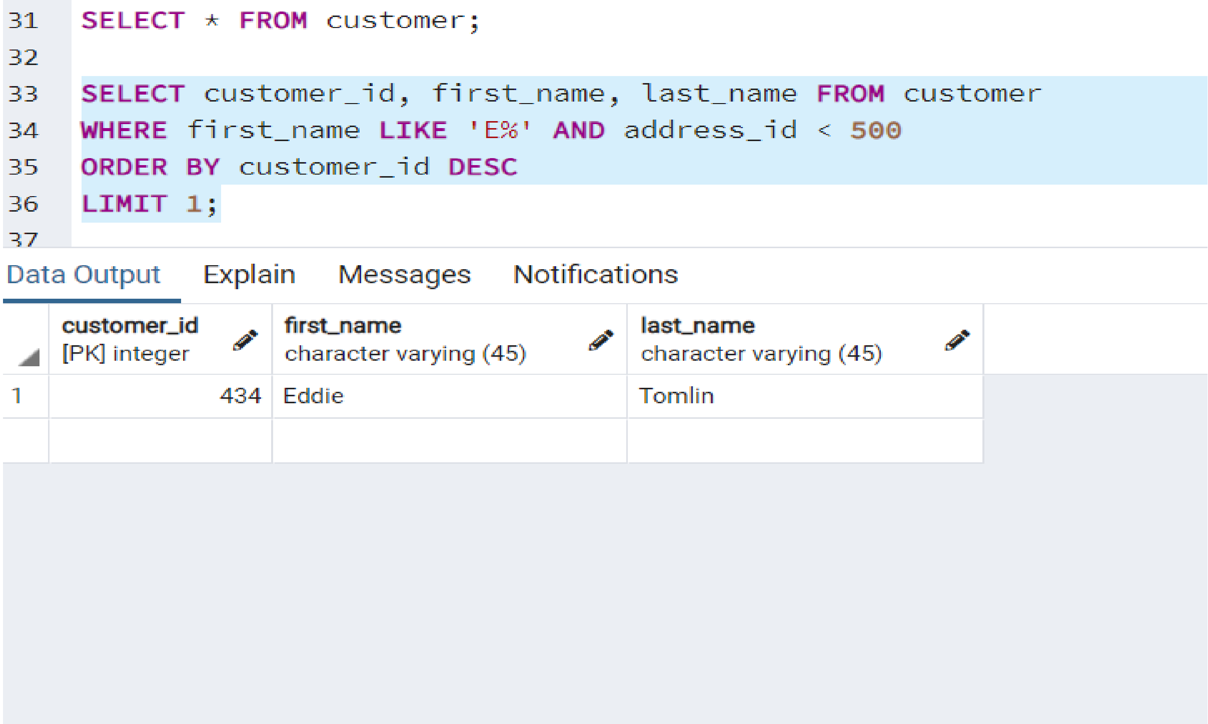
SELECT * FROM customer;

SELECT customer_id, first_name, last_name FROM customer

WHERE first_name LIKE 'E%' AND address_id < 500

ORDER BY customer_id DESC

LIMIT 1;



```
SELECT * FROM customer;

SELECT customer_id, first_name, last_name FROM customer
WHERE first_name LIKE 'E%' AND address_id < 500
ORDER BY customer_id DESC
LIMIT 1;
```

	customer_id [PK] integer	first_name character varying (45)	last_name character varying (45)
1	434	Eddie	Tomlin

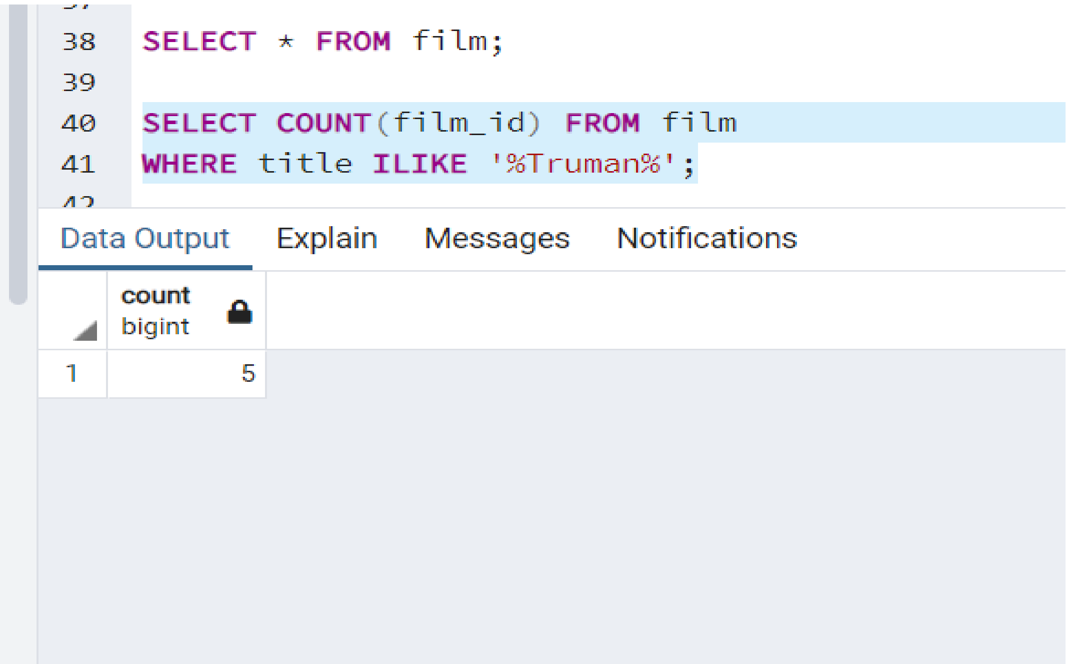
Q5. How many films have the word Truman somewhere in the title?

Answer: 5 Films.

SELECT * FROM film;

SELECT COUNT(film_id) FROM film

WHERE title ILIKE '%Truman%';



```
SELECT * FROM film;

SELECT COUNT(film_id) FROM film
WHERE title ILIKE '%Truman%';
```

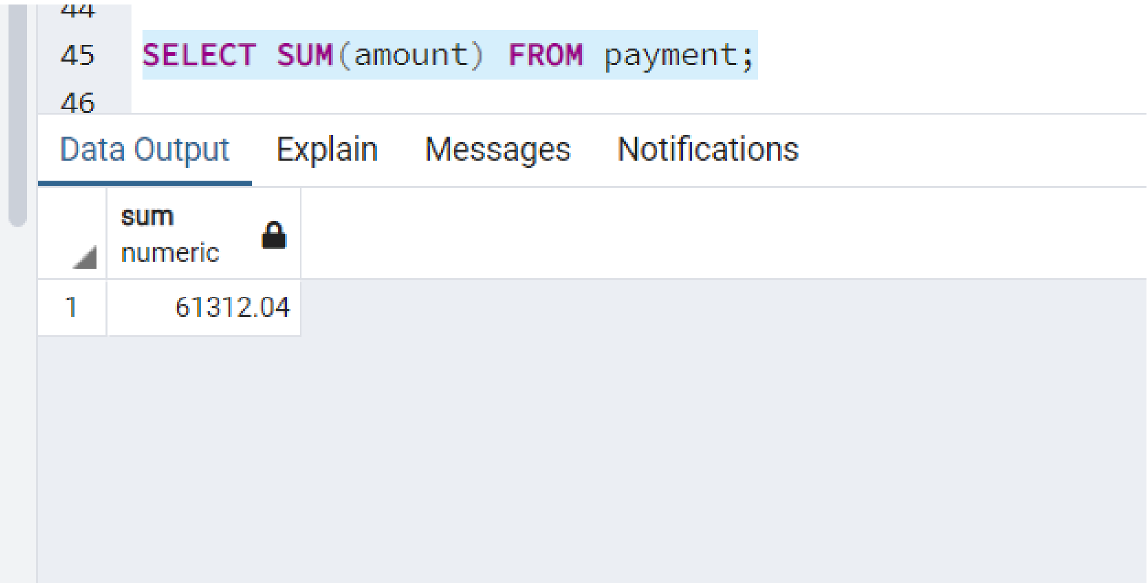
```
   count
   bigint
1      5
```

Q6. Display the total amount payed by all customers in the payment table.

Answer: Total amount paid was $61312.04

SELECT * FROM payment;

SELECT SUM(amount) FROM payment;



```
SELECT SUM(amount) FROM payment;
```

```
   sum
   numeric
1  61312.04
```

'S

Q7. Display the total amount payed by each customer in the payment table.

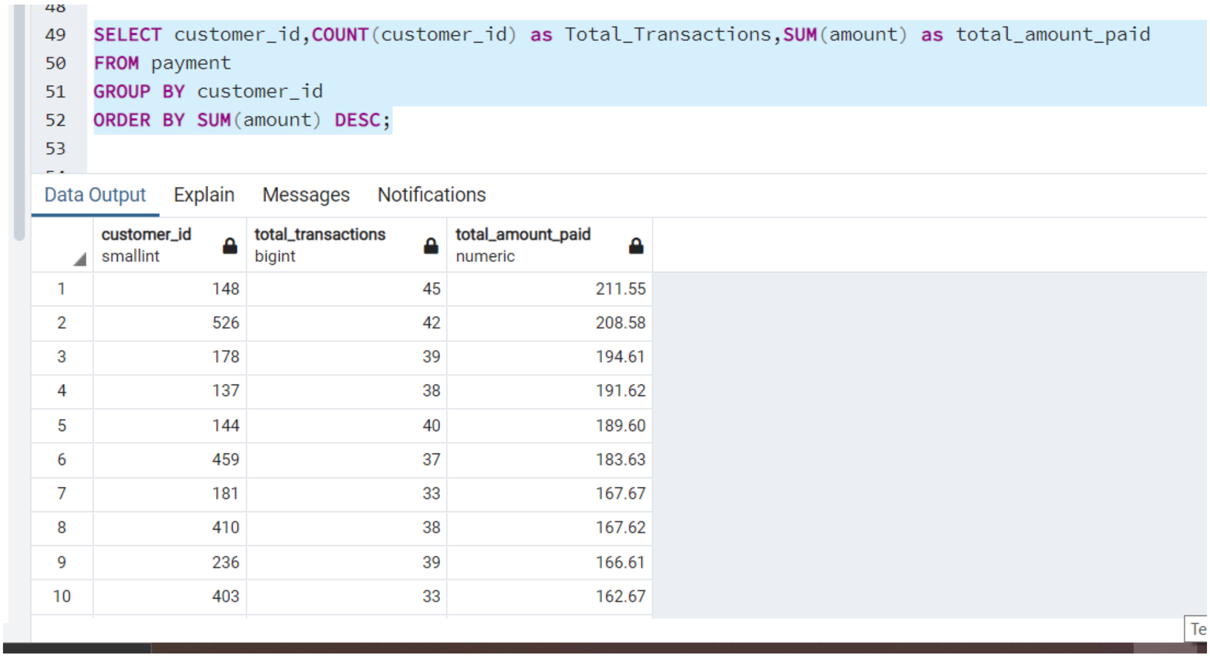
SELECT * FROM payment;

SELECT customer_id,COUNT(customer_id) as Total_Transactions,SUM(amount) as total_amount_paid

FROM payment

GROUP BY customer_id

ORDER BY SUM(amount) DESC;



```
SELECT customer_id,COUNT(customer_id) as Total_Transactions,SUM(amount) as total_amount_paid
FROM payment
GROUP BY customer_id
ORDER BY SUM(amount) DESC;
```

	customer_id smallint	total_transactions bigint	total_amount_paid numeric
1	148	45	211.55
2	526	42	208.58
3	178	39	194.61
4	137	38	191.62
5	144	40	189.60
6	459	37	183.63
7	181	33	167.67
8	410	38	167.62
9	236	39	166.61
10	403	33	162.67

Q8. What is the highest total_payment done.

Answer $211.5 , assuming this refers to highest total payment made by a single person.

SELECT * FROM payment;

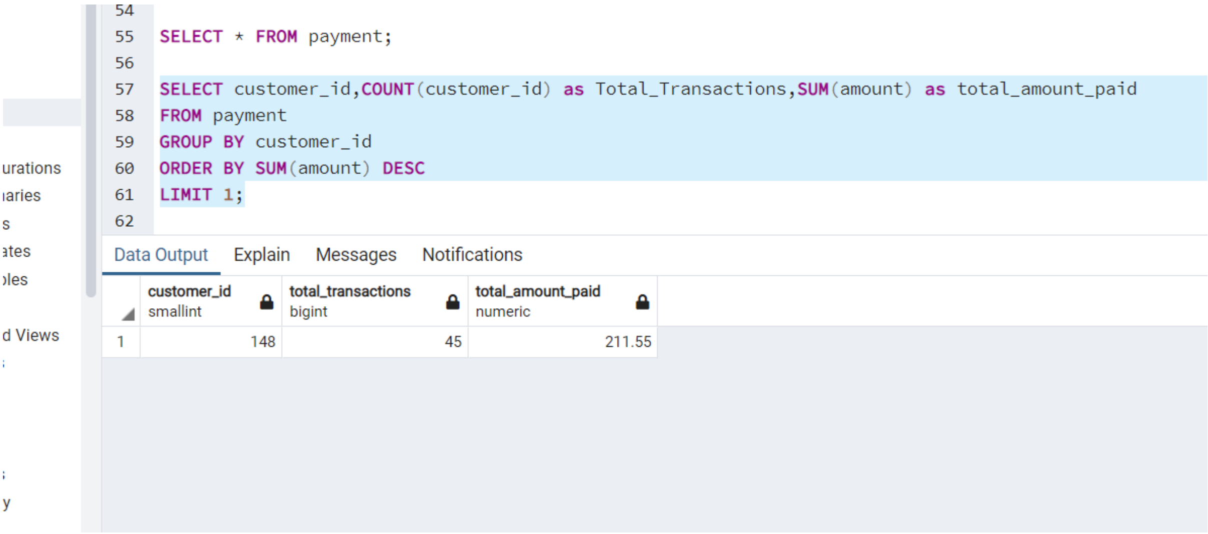
SELECT customer_id,COUNT(customer_id) as Total_Transactions,SUM(amount) as total_amount_paid

FROM payment

GROUP BY customer_id

ORDER BY SUM(amount) DESC

LIMIT 1;



```sql
SELECT * FROM payment;

SELECT customer_id,COUNT(customer_id) as Total_Transactions,SUM(amount) as total_amount_paid
FROM payment
GROUP BY customer_id
ORDER BY SUM(amount) DESC
LIMIT 1;
```

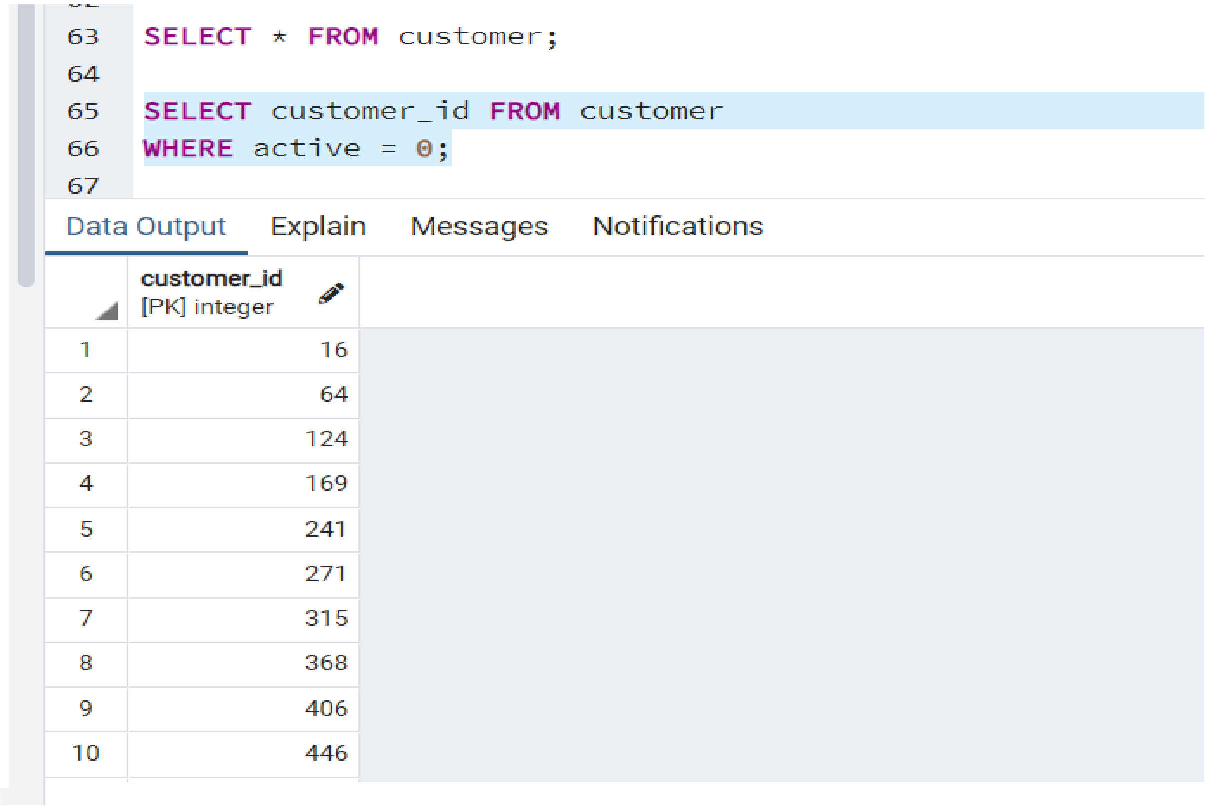
	customer_id smallint	total_transactions bigint	total_amount_paid numeric
1	148	45	211.55

Q9. Which customers have not rented any movies so far.

SELECT * FROM customer;

SELECT customer_id FROM customer

WHERE active = 0;



```sql
SELECT * FROM customer;

SELECT customer_id FROM customer
WHERE active = 0;
```

	customer_id [PK] integer
1	16
2	64
3	124
4	169
5	241
6	271
7	315
8	368
9	406
10	446

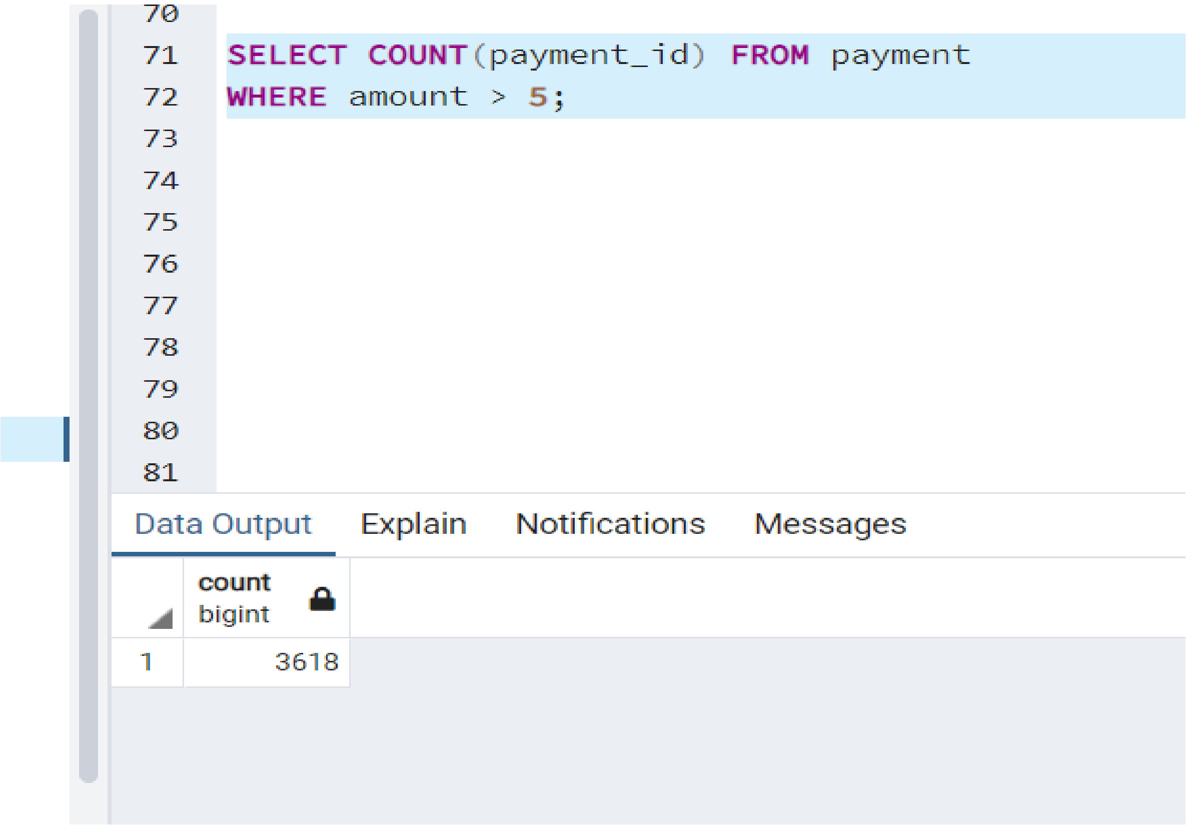
Q10. How many payment transactions were greater than $5.00?

Answer: 3618 transactions

SELECT * FROM payment;

SELECT COUNT(payment_id) FROM payment

WHERE amount > 5;



```
SELECT COUNT(payment_id) FROM payment
WHERE amount > 5;
```

	count bigint
1	3618