

The screenshot shows a PostgreSQL development environment with a dark theme. In the top-left corner, the title bar says "Lab2" and "main". The Database Explorer sidebar on the left lists databases "labs-DB" and "lab3", and tables like "public", "Database Objects", "postgres", and "Server Objects". The main editor window contains the SQL query:

```
select * from passengers where last_name = first_name
```

The Services tab at the bottom displays the execution of several scripts in the "lab3" database:

- creating_database.sql (22 ms)
- 4.find_tickets.sql (338 ms)
- 1_same_last_first_names.sql [session: same_last_first_names] (356 ms)
- 5_to_China.sql (356 ms)
- creating_and_inserting.sql (6 ms)
- drop_database.sql (68 ms)
- 3.all_male_and_born.sql (367 ms)

The output pane shows the results of the last query:

passenger_id	first_name	last_name	date_of_birth	gender	country_of_citizenship

There are 0 rows.

This screenshot shows the same PostgreSQL environment. The main editor now contains the query:

```
select distinct last_name from passengers
```

The Services tab shows the execution of the same set of scripts as before, with the results of the last query being:

last_name
Hardman
Payne
Mixer
Gheorghe
Golsby
McGennis

There are 199 rows.

Lab2 main

Database Explorer

- labs-DB [2]
 - lab3 [1 of 3]
 - public
 - Database Objects
 - postgres [1 of 3]
 - Server Objects

3.all_male_and_born.sql x 4.find_tickets.sql x 5.to_China.sql x 2.all_names_nd.sql x

```
1 ✓ select * from passengers where gender = 'male' or gender = 'Male' and (date_of_birth b
```

Files

- Lab3 ~/University/DB/Lab3
 - 1_same_last_first_names.sql [labs-DB]
 - 2.all_names_nd.sql [labs-DB]
 - 3.all_male_and_born.sql [labs-DB]
 - 4.find_tickets.sql [labs-DB]
 - 5_to_China.sql [labs-DB]
 - creating_and_inserting.sql [labs-DB]
 - creating_database.sql [labs-DB]
 - drop_database.sql [labs-DB]
- Scratches and Consoles

Services

Tx +, , - x

Output lab3.public.passengers x

	passenger_id	first_name	last_name	date_of_birth	gender	country_of_cit
1	5	Wayne	Bangs	1996-04-22	Male	Bosnia and Herzeg
2	14	Conrad	Sutherland	1998-01-25	Male	France
3	17	Wood	Yve	1997-01-18	Male	Latvia
4	26	Warden	Huett	2000-11-04	Male	Brazil
5	62	Peyton	Durnian	1993-09-16	Male	Russia
6	73	Spencer	Moffet	1994-11-01	Male	Colombia
...
21 rows						

1:122 LF UTF-8 4 spaces

Lab3 > 3.all_male_and_born.sql

Lab2 main

Database Explorer

- labs-DB [2]
 - lab3 [1 of 3]
 - public
 - Database Objects
 - postgres [1 of 3]
 - Server Objects

3.all_male_and_born.sql x 4.find_tickets.sql x 5.to_China.sql x 2.all_names_nd.sql x

```
1 ✓ select date_trunc('month', created_at) as month, sum(price) as total_price
2   from booking
3   group by date_trunc('month', created_at)
4   order by month asc
```

Files

- Lab3 ~/University/DB/Lab3
 - 1_same_last_first_names.sql [labs-DB]
 - 2_all_names_nd.sql [labs-DB]
 - 3_all_male_and_born.sql [labs-DB]
 - 4_find_tickets.sql [labs-DB]
 - 5_to_China.sql [labs-DB]
 - creating_and_inserting.sql [labs-DB]
 - creating_database.sql [labs-DB]
 - drop_database.sql [labs-DB]
- Scratches and Consoles

Services

Tx +, , - x

Output Result 4 x lab3.public.booking 2

	month	total_price
1	2023-03-01 00:00:00.000000 +00:00	155294.81
2	2023-04-01 00:00:00.000000 +00:00	240649.84
3	2023-05-01 00:00:00.000000 +00:00	207361.58
4	2023-06-01 00:00:00.000000 +00:00	177058.76
5	2023-07-01 00:00:00.000000 +00:00	33.58
13 rows		

4:16 LF UTF-8 4 spaces

Lab3 > 4.find_tickets.sql

Lab2 main

Database Explorer

- labs-DB
 - lab3 1 of 3
 - public
 - Database Objects
 - postgres 1 of 3
 - Server Objects

Playground

```
1 ✓ select * from flights
2 right join airport on flights.arrival_airport_id = airport.airport_id
3 where airport.country = 'China'
```

Files

- Lab3 ~/University/DB/Lab3
 - 1_same_last_first_names.sql [labs-DB]
 - 2_all_names_nd.sql [labs-DB]
 - 3_all_male_and_born.sql [labs-DB]
 - 4_find_tickets.sql [labs-DB]
 - 5_to_China.sql [labs-DB]
 - creating_and_inserting.sql [labs-DB]
 - creating_database.sql [labs-DB]
 - drop_database.sql [labs-DB]
- Scratches and Consoles

Services

Tx

Output Result 3

	flight_id	flight_no	scheduled_departure	scheduled_arrival	departure_airport_id
1	3	FI-OL	2023-03-29	2023-08-01	
2	9	IN-OR	2023-05-18	2023-09-19	
3	13	BR-PE	2024-01-16	2023-06-02	
4	14	US-IN	2023-07-24	2024-02-27	
5	23	CN-65	2023-03-21	2024-01-08	
6	24	BR-T0	2024-03-09	238 rows	
	25	MZ-P	2026-01-20	2023-09-05	

CSV LF UTF-8 4 spaces

Lab3 > 5_to_China.sql

Lab2 main

Database Explorer

- labs-DB
 - lab3 1 of 3
 - public
 - Database Objects
 - postgres 1 of 3
 - Server Objects

Playground

```
1 ✓ select * from airline
2 where airline_country in ('France', 'Poland', 'Portugal')
3 and created_at between '2023-11-01' and '2024-03-31'
```

Files

- Lab3 ~/University/DB/Lab3
 - 1_same_last_first_names.sql [labs-DB]
 - 2_all_names_nd.sql [labs-DB]
 - 3_all_male_and_born.sql [labs-DB]
 - 4_find_tickets.sql [labs-DB]
 - 5_to_China.sql [labs-DB]
 - 6_multy_cnt_and_created.sql [labs-DB]
 - creating_and_inserting.sql [labs-DB]
 - creating_database.sql [labs-DB]
 - drop_database.sql [labs-DB]
- Scratches and Consoles

Services

Tx

Output lab3.public.airline x lab3.public.airline 2

	airline_id	airline_code	airline_name	airline_country	created_at	updated_at
1	4	0OKB	KHS	France	2023-11-18	2024-02-18
2	13	OIFE	IFH	Portugal	2024-01-09	2023-11-09
3	15	SYKZ	KKG	Poland	2023-12-24	2023-10-30
4	24	ZSRG	RUG	Portugal	2024-03-11	2023-08-22
5	28	RKPD	JDG	Poland	2023-11-03	2023-12-03
6	30	CYST	YST	Poland	2023-11-24	2023-10-09
	7	EVNM	EVNM	Poland	2023-11-24	2023-10-09

CSV LF UTF-8 4 spaces

Lab3 > 6_multy_cnt_and_created.sql

Lab2 main

Database Explorer

- labs-DB [2]
 - lab3 [1 of 3]
 - public
 - Database Objects
 - postgres [1 of 3]
 - Server Objects

Playground

```
1 ✓ select * from airline where airline_country = 'Kazakhstan'
```

Files

- Lab3 ~/University/DB/Lab3
 - 1_same_last_first_names.sql [labs-DB]
 - 2_all_names_nd.sql [labs-DB]
 - 3_all_male_and_born.sql [labs-DB]
 - 4_find_tickets.sql [labs-DB]
 - 5_to_China.sql [labs-DB]
 - 6_multy_cnt_and_created.sql [labs-DB]
 - 7_arin_Kazakhstan.sql [labs-DB]
 - creating_and_inserting.sql [labs-DB]
 - creating_database.sql [labs-DB]
 - drop_database.sql [labs-DB]

Services

Tx

- Database
 - labs-DB
 - 7_arin_Kazakhstan.sql [346 ms]
 - creating_database.sql [22 ms]
 - 4_find_tickets.sql [338 ms]
 - 1_same_last_first_names.sql [session: same_last_first_n...]
 - 5_to_China.sql [356 ms]
 - creating_and_inserting.sql [6 ms]
 - drop_database.sql [68 ms]
 - 3_all_male_and_born.sql [343 ms]

Output lab3.public.airline

	airline_id	airline_code	airline_name	created_at	updated_at
1	5 CYLQ	YLQ	Kazakhstan	2023-03-23	2023-07-2

1 row

1.59 (58 chars) LF UTF-8 4 spaces

7_arin_Kazakhstan.sql

Lab2 main

Database Explorer

- labs-DB [2]
 - lab3 [1 of 3]
 - public
 - Database Objects
 - postgres [1 of 3]
 - Server Objects

Playground

```
1 ✓ update booking
2   set price = price - price * 0.1
3   where created_at < '2023-01-11'
```

Files

- Lab3 ~/University/DB/Lab3
 - 1_same_last_first_names.sql [labs-DB]
 - 2_all_names_nd.sql [labs-DB]
 - 3_all_male_and_born.sql [labs-DB]
 - 4_find_tickets.sql [labs-DB]
 - 5_to_China.sql [labs-DB]
 - 6_multy_cnt_and_created.sql [labs-DB]
 - 7_arin_Kazakhstan.sql [labs-DB]
 - 8_reduce_price.sql [labs-DB]
 - 9_top3_bags.sql [labs-DB]
 - 10_youngest.sql [labs-DB]
 - creating_and_inserting.sql [labs-DB]
 - creating_database.sql [labs-DB]
 - drop_database.sql [labs-DB]

Services

Tx

- 7_arin_Kazakhstan.sql [343 ms]
- 9_top3_bags.sql [348 ms]
- creating_database.sql [22 ms]
- 4_find_tickets.sql [338 ms]
- 1_same_last_first_names.sql [session: same_last_first_n...]
- 5_to_China.sql [356 ms]
- 8_reduce_price.sql [24 ms]
- creating_and_inserting.sql [6 ms]
- drop_database.sql [68 ms]
- 3_all_male_and_born.sql [343 ms]

[2025-09-30 23:00:12] Connected to lab3
[2025-09-30 23:00:12] completed in 30 ms
[2025-09-30 23:07:25] lab3: update booking
set price = price - price * 0.1
where created_at < '2023-01-11'
[2025-09-30 23:07:25] completed in 7 ms

3:32 LF UTF-8 4 spaces

8_reduce_price.sql

The screenshot shows a SQL development environment with the following interface elements:

- Database Explorer**: Shows the database structure with `lab3` selected.
- Playground**: A tab where the query `select * from baggage where weight_in_kg > 25 order by weight_in_kg desc limit 3` is being run.
- Output**: Shows the results of the query, which is empty (`0 rows`).
- Services**: Shows the transaction history with various SQL scripts run.
- Files**: A sidebar listing all the SQL files in the current directory, including `9_top3_bags.sql`.

The screenshot shows a SQL development environment with the following interface elements:

- Database Explorer**: Shows the database structure with `lab3` selected.
- Playground**: A tab where the query `select first_name from passengers order by date_of_birth desc limit 1` is being run.
- Output**: Shows the results of the query, displaying the name `Bernie`.
- Services**: Shows the transaction history with various SQL scripts run.
- Files**: A sidebar listing all the SQL files in the current directory, including `10_youngest.sql`.

Lab2 main

Database Explorer

- labs-DB
 - lab3 1 of 3
 - public
 - Database Objects
 - postres 1 of 3
 - Server Objects

Playground

```
1 ✓ select booking_platform, min(price) as cheapest from booking
2   group by booking_platform
3   order by cheapest ASC
```

Files

- Lab3 ~/University/DB/Lab3
 - 1_same_last_first_names.sql [labs-DB]
 - 2_all_names_nd.sql [labs-DB]
 - 3_all_male_and_born.sql [labs-DB]
 - 4_find_tickets.sql [labs-DB]
 - 5_to_China.sql [labs-DB]
 - 6_multy_cnt_and_created.sql [labs-DB]
 - 7_arin_Kazakhstan.sql [labs-DB]
 - 8_reduce_price.sql [labs-DB]
 - 9_top3_bags.sql [labs-DB]
 - 10_youngest.sql [labs-DB]
 - 11_cheapest_on_each.sql [labs-DB]
 - creating_and_inserting.sql [labs-DB]
 - creating_database.sql [labs-DB]
 - drop_database.sql [labs-DB]

Services

Output

booking_platform	cheapest
Dare-Reiniger	2184.1
Torphy Inc	2246.2
Grant LLC	2289.12
Bruen and Sons	2291.9
Zboncak Group	2306.61
Hudson LLC	
Koch and Sons	

3:22 LF UTF-8 4 spaces

Lab2 main

Database Explorer

- labs-DB
 - date_of_birth date
 - gender varchar(50)
 - country_of_citizenship varchar
 - country_of_residence varchar
 - passport_number varchar(5)
 - created_at date
 - update_at date
 - keys 1
 - indexes 1
 - security_check
 - columns 5
 - keys 1
 - security_check_pkey
 - foreign keys 1
 - security_check_passenger
 - indexes 1
 - Database Objects
 - postgres 1 of 3

Playground

```
1 ✓ select * from airline
2   order by created_at desc
3   limit 5
```

Files

- Lab3 ~/University/DB/Lab3
 - 1_same_last_first_names.sql [labs-DB]
 - 2_all_names_nd.sql [labs-DB]
 - 3_all_male_and_born.sql [labs-DB]
 - 4_find_tickets.sql [labs-DB]
 - 5_to_China.sql [labs-DB]
 - 6_multy_cnt_and_created.sql [labs-DB]
 - 7_arin_Kazakhstan.sql [labs-DB]
 - 8_reduce_price.sql [labs-DB]
 - 9_top3_bags.sql [labs-DB]
 - 10_youngest.sql [labs-DB]
 - 11_cheapest_on_each.sql [labs-DB]
 - 12_has_digit.sql [labs-DB]
 - 13_rec.sql [labs-DB]
 - 14_spc_check.sql [labs-DB]
 - 15_bags_check_spc.sql [labs-DB]
 - creating_and_inserting.sql [labs-DB]
 - creating_database.sql [labs-DB]
 - drop_database.sql [labs-DB]

Services

Output

_id	airline_code	airline_name	airline_country	created_at	update_at
1	9	KNX	Venezuela	2024-03-16	2023-09-16
2	48	LTBD	CII	2024-03-15	2024-01-29
3	22	2AK6	HGZ	2024-03-13	2023-10-20
4	24	ZSRG	RUG	2024-03-11	2023-08-24
5	45	HCMV	BUO	2024-02-18	2023-12-10

3:8 LF UTF-8 4 spaces

Lab2 main

Database Explorer

- labs-DB
 - date_of_birth date
 - gender varchar(50)
 - country_of_citizenship varchar
 - country_of_residence varchar
 - passport_number varchar(5)
 - created_at date
 - update_at date
 - keys 1
 - indexes 1
 - security_check
 - columns 5
 - keys 1
 - security_check_pkey
 - foreign keys 1
 - security_check_passenger_
 - indexes 1
- Database Objects
- postgres 1 of 3

Services

Tx	Output	Result 4
5_to_China.sql 356 ms		
8_reduce_price.sql 24 ms		
creating_and_inserting.sql 6 ms		
drop_database.sql 68 ms		
3_all_male_and_born.sql 343 ms		
2_allNames_nd.sql 358 ms		
6_multy_cnt_and_created.sql 326 ms		
13_rec.sql 361 ms		
14_spc_check.sql 354 ms		

Lab3 ~/University/Db/Lab3

- 1_same_last_first_names.sql [labs-DB]
- 2_all_names_nd.sql [labs-DB]
- 3_all_male_and_born.sql [labs-DB]
- 4_find_tickets.sql [labs-DB]
- 5_to_China.sql [labs-DB]
- 6_multy_cnt_and_created.sql [labs-DB]
- 7_arin_Kazakhstan.sql [labs-DB]
- 8_reduce_price.sql [labs-DB]
- 9_top3_bags.sql [labs-DB]
- 10_youngest.sql [labs-DB]
- 11_cheapest_on_each.sql [labs-DB]
- 12_has_digit.sql [labs-DB]
- 13_rec.sql [labs-DB]
- 14_spc_check.sql [labs-DB]
- 15_bags_check_spc.sql [labs-DB]
- creating_and_inserting.sql [labs-DB]
- creating_database.sql [labs-DB]
- drop_database.sql [labs-DB]

Scratches and Consoles

Lab2 main

Database Explorer

- labs-DB 2
 - lab3 1 of 3
 - public
 - Database Objects
- postgres 1 of 3
- Server Objects

Services

Tx	Output	lab3.public.airline 2
9_top3_bags.sql		
10_youngest.sql		
11_cheapest_on_each.sql		
12_has_digit.sql		
13_rec.sql		
14_spc_check.sql		
15_bags_check_spc.sql		

Lab3 ~/University/Db/Lab3

- 1_same_last_first_names.sql [labs-DB]
- 2_all_names_nd.sql [labs-DB]
- 3_all_male_and_born.sql [labs-DB]
- 4_find_tickets.sql [labs-DB]
- 5_to_China.sql [labs-DB]
- 6_multy_cnt_and_created.sql [labs-DB]
- 7_arin_Kazakhstan.sql [labs-DB]
- 8_reduce_price.sql [labs-DB]
- 9_top3_bags.sql [labs-DB]
- 10_youngest.sql [labs-DB]
- 11_cheapest_on_each.sql [labs-DB]
- 12_has_digit.sql [labs-DB]
- 13_rec.sql [labs-DB]
- 14_spc_check.sql [labs-DB]
- 15_bags_check_spc.sql [labs-DB]
- creating_and_inserting.sql [labs-DB]
- creating_database.sql [labs-DB]
- drop_database.sql [labs-DB]

Lab3 ~/University/Db/Lab3

- 10_youngest.sql 337 ms
- 9_top3_bags.sql 348 ms
- 12_has_digit.sql 342 ms
- 11_cheapest_on_each.sql 362 ms
- creating_database.sql 22 ms
- 4_find_tickets.sql 338 ms
- 1.same_last_first_names.sql [session: same_last_first_n]
- 5_to_China.sql 356 ms
- 8_reduce_price.sql 24 ms
- creating_and_inserting.sql 6 ms

Lab3 ~/University/Db/Lab3

Lab2 main

Database Explorer

- labs-DB
 - date_of_birth date
 - gender varchar(50)
 - country_of_citizenship varchar
 - country_of_residence varchar
 - passport_number varchar(5)
 - created_at date
 - update_at date
 - keys 1
 - indexes 1
 - security_check
 - columns 5
 - keys 1
 - security_check_pkey
 - foreign keys 1
 - security_check_passenger_
 - indexes 1
 - Database Objects
 - postgres 1 of 3

Files

- Lab3 ~/University/Db/Lab3
 - 1_same_last_first_names.sql [labs-DB]
 - 2_all_names_nd.sql [labs-DB]
 - 3_all_male_and_born.sql [labs-DB]
 - 4.find_tickets.sql [labs-DB]
 - 5_to_China.sql [labs-DB]
 - 6_multy_cnt_and_created.sql [labs-DB]
 - 7_arin_Kazakhstan.sql [labs-DB]
 - 8_reduce_price.sql [labs-DB]
 - 9_top3_bags.sql [labs-DB]
 - 10_youngest.sql [labs-DB]
 - 11_cheapest_on_each.sql [labs-DB]
 - 12_has_digit.sql [labs-DB]
 - 13_rec.sql [labs-DB]
 - 14_spc_check.sql [labs-DB]
 - 15_bags_check_spc.sql [labs-DB]
 - creating_and_inserting.sql [labs-DB]
 - creating_database.sql [labs-DB]
 - drop_database.sql [labs-DB]

Scratches and Consoles

Services

Tx + ⚙️ ⚙️ X

Output lab3.public.baggage_check lab3.public.baggage_check 2

check_id	check_result	created_at	updated_at	booking_id	passenger_id
34	Checked	2023-04-25	2023-04-08	28	57
86	Checked	2023-12-25	2023-12-07	312	22
104	Checked	2024-03-17	2024-03-14	41	83
109	Not checked	2023-08-30	2023-08-09	469	91
119	Not checked	2023-12-02	2023-12-01	135	55
148	Checked	2024-03-17	2023-03-17	86	5
240	Checked	2023-03-17	2023-03-16	-	-

18 rows

3:16 LF UTF-8 4 spaces ⌂

Lab3 > 15_bags_check_spc.sql