

country:

I made a separate table for countries to avoid repeating names and to keep things organized when linking other tables like cities and sellers.

city:

Cities are in their own table and connected to countries. This helps avoid duplicate country names and keeps location data cleaner.

buyer:

Buyers are stored in their own table with a link to the city they live in. This keeps buyer info organized and makes it easier to group them by location.

seller:

Sellers have their own table and are connected to the country they operate from. This keeps things neat and avoids repeating country names.

product:

Products are tied to sellers. I stored prices as integers (in cents) so calculations are accurate and consistent.

credit_card:

Each buyer can have a credit card linked to them. I made sure no duplicate card numbers get entered for the same buyer.

orders:

Orders link buyers, products, and credit cards together. This table holds the quantity and date of purchases so we can track sales properly.

reviews:

Reviews are connected to orders and let us store customer feedback and ratings. This helps calculate average ratings for products.

The screenshot shows a dark-themed IDE interface with the following components:

- SOURCE CONTROL** panel on the left, showing **REPOSITORIES** and **CHANGES**. A commit message "Enter to commit on 'm..." is ready to be committed.
- project.sql** file open in the code editor, containing SQL queries. One query is highlighted: `CALL top_ten_for_country('Singapore');`.
- Result** panel showing the output of the SQL query:

buyer_id	first_name	last_name	total_amount_spent
25849	John	Doe	19032.6500
11685	Jane	Doe	17079.2900
7116	Jane	Doe	16842.8600
29441	Jane	Doe	16470.2700
17452	Jane	Doe	16225.8700
12347	Jane	Doe	16175.7200
14028	John	Doe	16140.1700
9751	Jane	Doe	16018.7500
26537	John	Doe	15826.9800
22060	John	Doe	15738.1100
- GRAPH** panel showing a dependency graph with nodes like "4 akone42", "3 akone42", and merge requests.
- PROBLEMS** tab in the bottom navigation bar, indicating no problems detected.
- Bottom status bar showing "Ln 376, Col 1" and various file icons.

The screenshot shows a developer's workspace with the following components:

- SOURCE CONTROL**: A sidebar showing repositories and changes. It highlights a commit message: "Merge pull request #2 from cisc3...".
- CODE EDITOR**: An open file named `project.sql` containing SQL queries. One query is highlighted: `SELECT * FROM top_rated_products;`
- TERMINAL**: A preview of the results of the SQL query, showing a table titled "Result2" with 10 rows of product data.
- GRAPH**: A graph visualization showing a network of nodes and edges, primarily related to pull requests and merges.
- STATUS BAR**: Shows the current workspace name ("psychic couscous"), file path ("main*"), line numbers (127.0.0.1), terminal status ("Ln 365, Col 4 (38 selected)"), and other settings like character encoding ("UTF-8") and layout ("U.S.").

The screenshot shows a dark-themed IDE interface, likely GitHub Codespaces, with the following details:

- Top Bar:** Displays the repository name "course-project-spring-25-akone42 [Codespaces: psychic couscous]" and various navigation icons.
- Left Sidebar:** Contains sections for "SOURCE CONTROL", "REPOSITORIES" (listing "course-pr...", "main*", and "Changes"), and a "GRAPH" section showing a commit history for user "3 akone42".
- Central Area:** A code editor window titled "project.sql" with the following SQL code:

```
359
360
361
362
363
364 -- CALL top_ten_for_country('Singapore');
365
366
367
368
369 -- SELECT * FROM top_rated_products;
370
371 ▶ Run
372 CALL buyer_for_date('Tyrell', 'Miller', '2022-01-07'); 6ms
373
374
375
376
377
378
379
```
- Bottom Area:** A results table titled "Result1" showing one row of data:

order_id	order_quantity	product_name	order_date
130003	10	Lackadaisical Iron	2022-01-07
- Bottom Navigation:** Includes tabs for "PROBLEMS", "OUTPUT", "DEBUG CONSOLE", "TERMINAL", and "PORTS" (with 1 port available). It also shows file statistics: "Ln 372, Col 1", "Spaces: 4", "UTF-8", "LF", "MS SQL", and "Layout: U.S."

The screenshot shows a developer's workspace with the following interface elements:

- SOURCE CONTROL** tab: Shows a repository named "course-pr..." with a main branch. A commit message "Message (⌘Enter to commit on "m...")" is entered, and a green "✓ Commit" button is visible.
- REPOSITORIES** section: Lists "course-pr..." and "Changes".
- CHANGES** section: Shows a commit history for "project.sql" with a count of 1. One commit is highlighted: "Merge pull request #2 from cisc3...".
- GRAPH** section: Displays a dependency graph with nodes labeled "4 akone42", "3 akone42", and "3 akone42".
- project.sql** tab: Contains SQL code for selecting top-rated products and buyer cities.
- Database Client** tab: Shows a table named "top_five_buyer_cities" with the following data:

city	total_amount_spent
Johnville	\$14,955,481.71
JaneVille	\$14,675,015.52
Kowloon	\$4,850,500.40
Hong Kong	\$4,706,826.80
New Territories	\$4,522,371.87

- PROBLEMS**, **OUTPUT**, **DEBUG CONSOLE**, **TERMINAL**, and **PORTS** tabs at the bottom.
- Database Client** sub-tab: Shows log entries for MySQL connection and foreign key execution.
- Layout: U.S.** and other UI icons at the bottom right.

The screenshot shows a developer's workspace with the following interface elements:

- Source Control:** Shows a repository named "course-pr..." with a main branch. A commit message is entered: "Message (⌘Enter to commit on "main")". A green "✓ Commit" button is visible.
- Changes:** A list of changes, including a merge pull request from "cisc3..." and a commit "remove decimal" by "Carlos Cuevas".
- Code Editor:** An open SQL file "project.sql" containing several database queries. One query is highlighted: "SELECT * FROM seller_sales_tiers;".
- Database Client:** A table titled "seller_sales_tiers" with the following data:

seller_id	seller_name	total_sales	sales_tier
43738	Sauer, Hodkiewicz and Saway	\$39,122.58	Medium
45518	Terry, Schuster and Koch	\$39,037.13	Medium
33078	Heller-Hegmann	\$38,919.45	Medium
40260	Daugherty, Balistreri and Wiso	\$38,655.34	Medium
39488	Altenwerth, Kunde and Porous	\$38,167.90	Medium
37112	Wuckert PLC	\$38,054.20	Medium
44286	Kirlin-Kertzmann	\$37,485.87	Medium
33104	Cummerata, Mante and Jenkin	\$37,429.67	Medium
39678	Satterfield-Becker	\$37,310.55	Medium
44797	Barrows-Braun	\$37,054.70	Medium

- Output:** Shows log entries related to MySQL connections and foreign key checks.

The screenshot shows a developer's workspace with the following components:

- SOURCE CONTROL**: A sidebar showing repositories and changes. A commit message is entered: "Message (⌘Enter to commit on "m...")". A green button says "✓ Commit".
- REPOSITORIES**: Shows a repository named "course-pr..." with a main branch.
- CHANGES**: Shows a list of changes, including a merge pull request from "cisc3..." and a commit from "Carlos Cuevas" that removes decimal points.
- project.sql**: An SQL file containing several queries. One query is highlighted: `CALL top_products_for_seller('Abbott Group');`. The output of this query is shown in the results table below.
- GRAPH**: A dependency graph showing the relationships between commits.
- RESULTS**: A table titled "Result1" showing the output of the SQL query. The columns are: seller_id, product_id, product_name, and total_sales. The data is as follows:

seller_id	product_id	product_name	total_sales
38818	99499	Unimpressive Beret	\$5,415.70
38818	98019	Fantastic Camera	\$5,331.42
38818	118151	Majestic Luggage set	\$3,785.28
38818	54183	Routine Crystal	\$2,253.58
38818	69305	Astounding Projector	\$1,238.80
38818	117438	Magical Blouse	\$864.49
38818	62258	Tolerable Beads	\$412.49
38818	122054	Vexing File cabinet	\$248.56

- PROBLEMS**: A list of log messages from the database client:

- 2025-05-03 08:13:44 [DEBUG] Creating MySQL connection for 1746255433403_meta
- 2025-05-03 08:13:44 [DEBUG] Closing connection 1746255433403_meta
- 2025-05-03 08:13:45 [INFO] Executing: SET FOREIGN_KEY_CHECKS = 1

- OUTPUT**: Terminal output showing the same log messages.
- DEBUG CONSOLE**: Not visible in the screenshot.
- TERMINAL**: Not visible in the screenshot.
- PORTS**: A list of ports, one of which is highlighted (1).
- Database Client**: A dropdown menu currently set to "Database Client".
- Bottom Status Bar**: Shows the current line (Ln 374), column (Col 46), spaces (Spaces: 4), encoding (UTF-8), line separator (LF), and database client (MS SQL).

The screenshot shows a developer's workspace with the following interface elements:

- Left Sidebar:** Contains icons for file operations (New, Open, Save, Delete), navigation (Home, Back, Forward), and search.
- Source Control:** Shows a repository named "course-pr..." with a main branch. It displays changes made by user "akone42".
- Changes:** A list of changes made to the "project.sql" file. One change is highlighted with a green checkmark and the text "Commit".
- Graph:** A dependency graph showing relationships between commits. A commit from "cisc3..." is highlighted with a yellow circle and labeled "Merge pull request #2 from cisc3...". Another commit is labeled "Merge pull request #1 from cisc...".
- Code Editor:** An open SQL file "project.sql" containing several database queries. The code includes comments like "-- CALL top_products_for_seller('Abbott Group')";, "CALL seller_running_totals('Abbott Group')";, and "SELECT * FROM top_five_buyer_cities;".
- Database Client:** A table titled "Result1" showing order details. The columns are: seller_id, order_id, order_date, order_total, and running_total. The data consists of 10 rows of order information.
- Bottom Status Bar:** Displays the current workspace ("Codespaces: psychic couscous"), terminal status, and system information (Ln 387, Col 1, Spaces: 4, UTF-8, LF, MS SQL, Layout: U.S.).