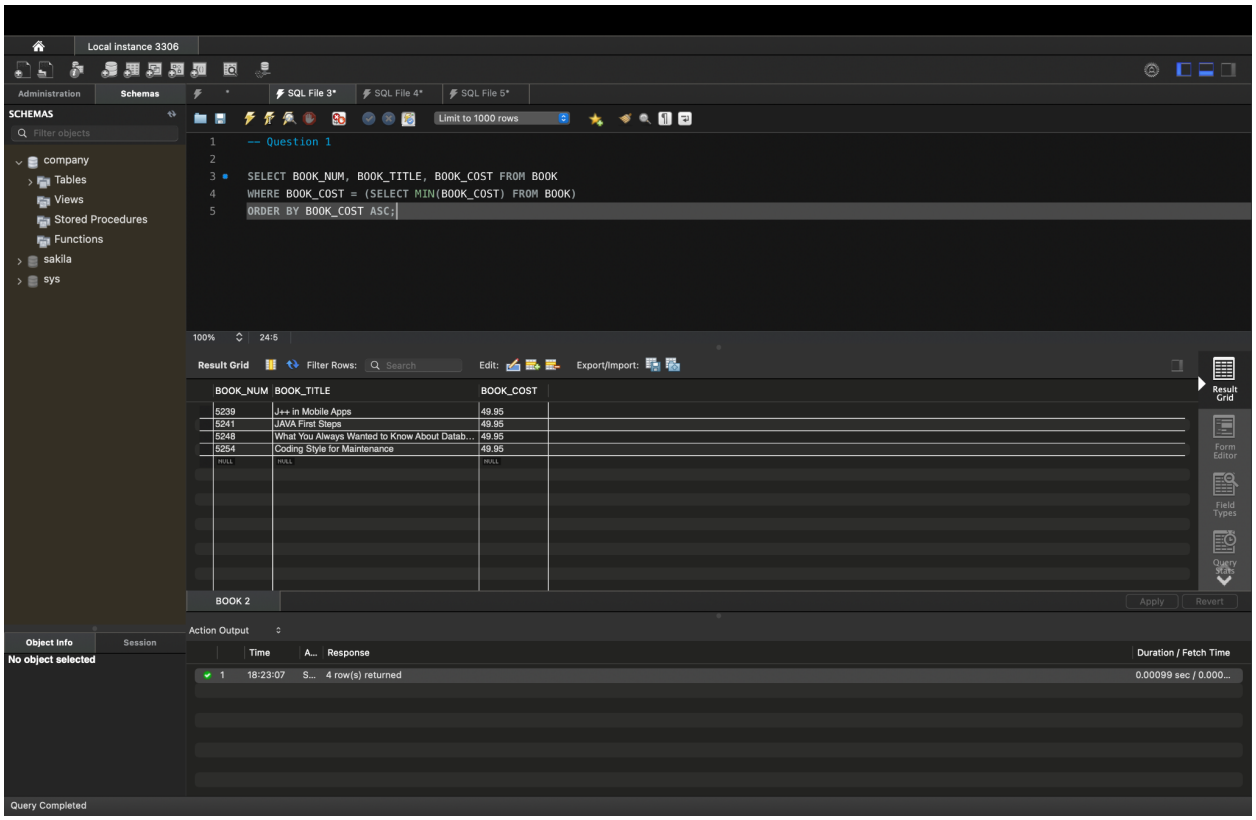
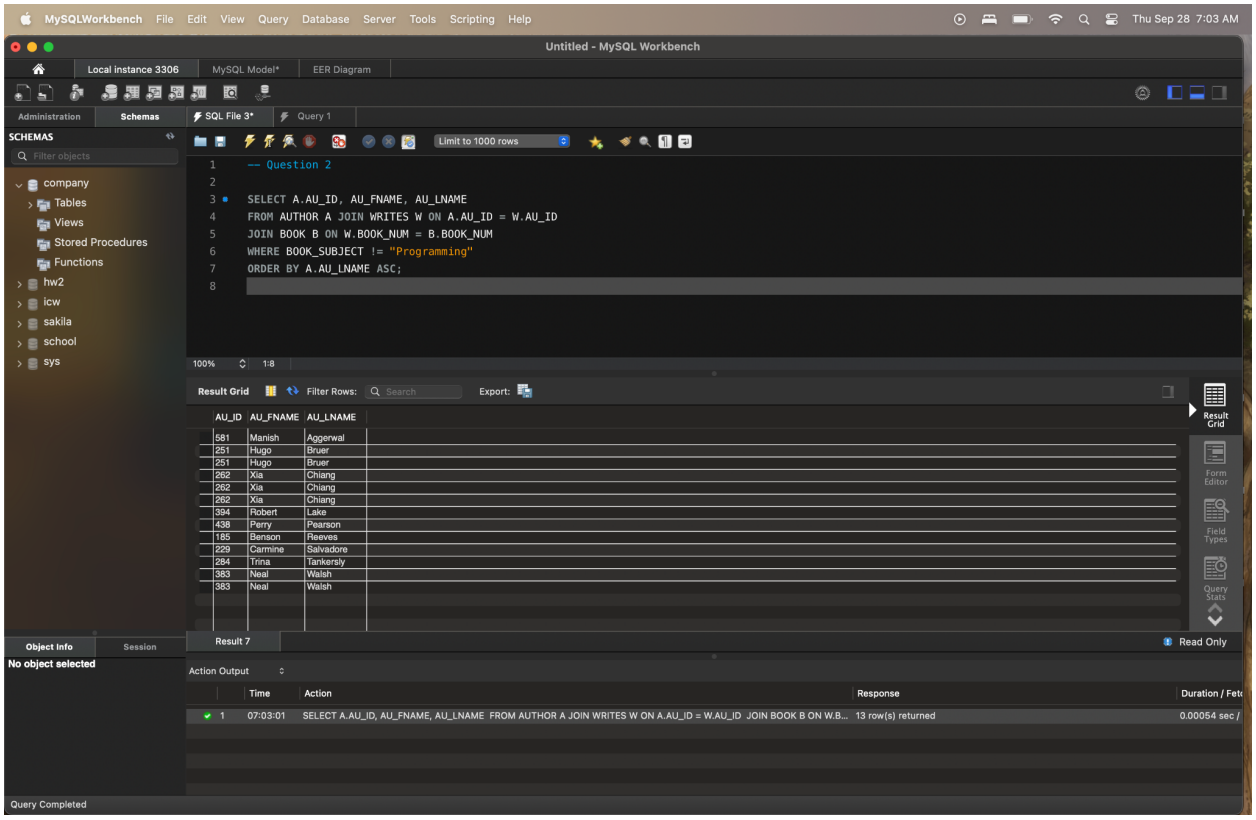
Assignment 4

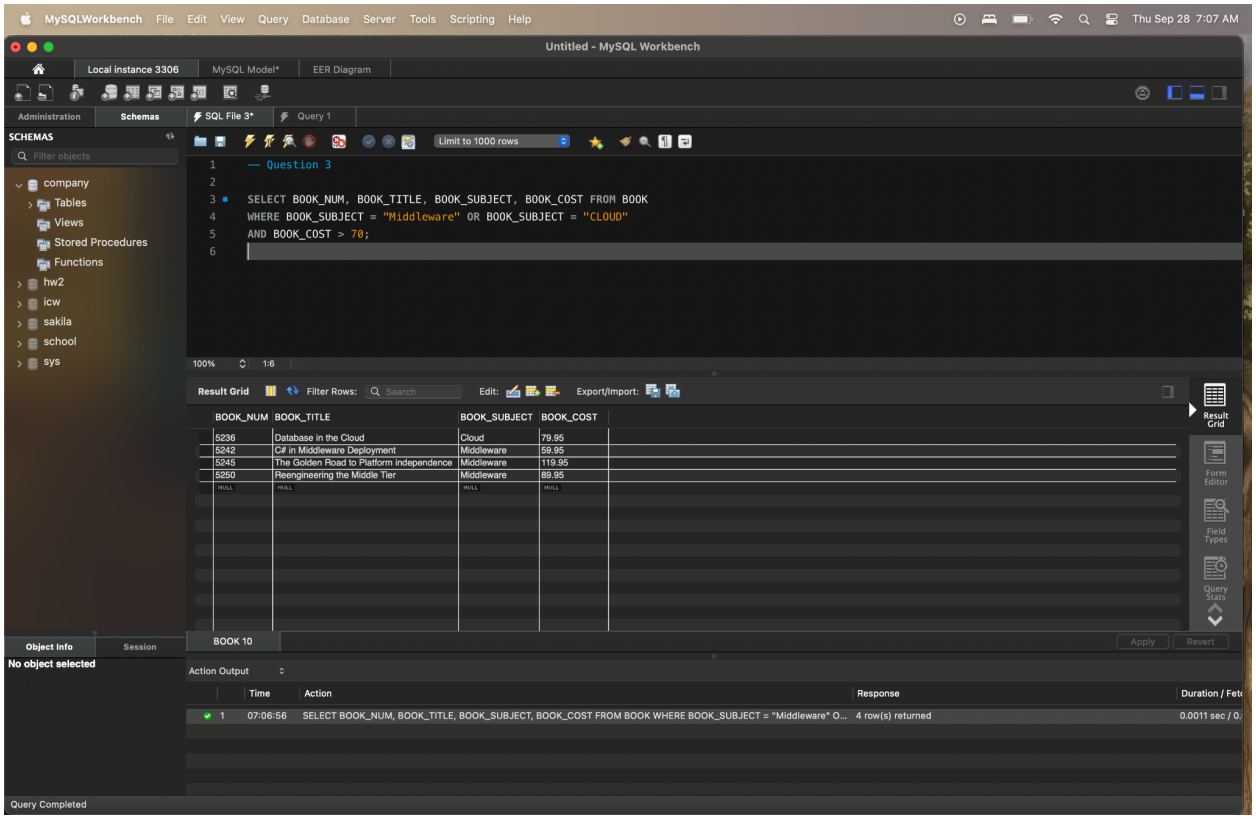
1. Write a query to display the number, title, and cost of books that have the lowest cost in the system. Sort the results by book number.



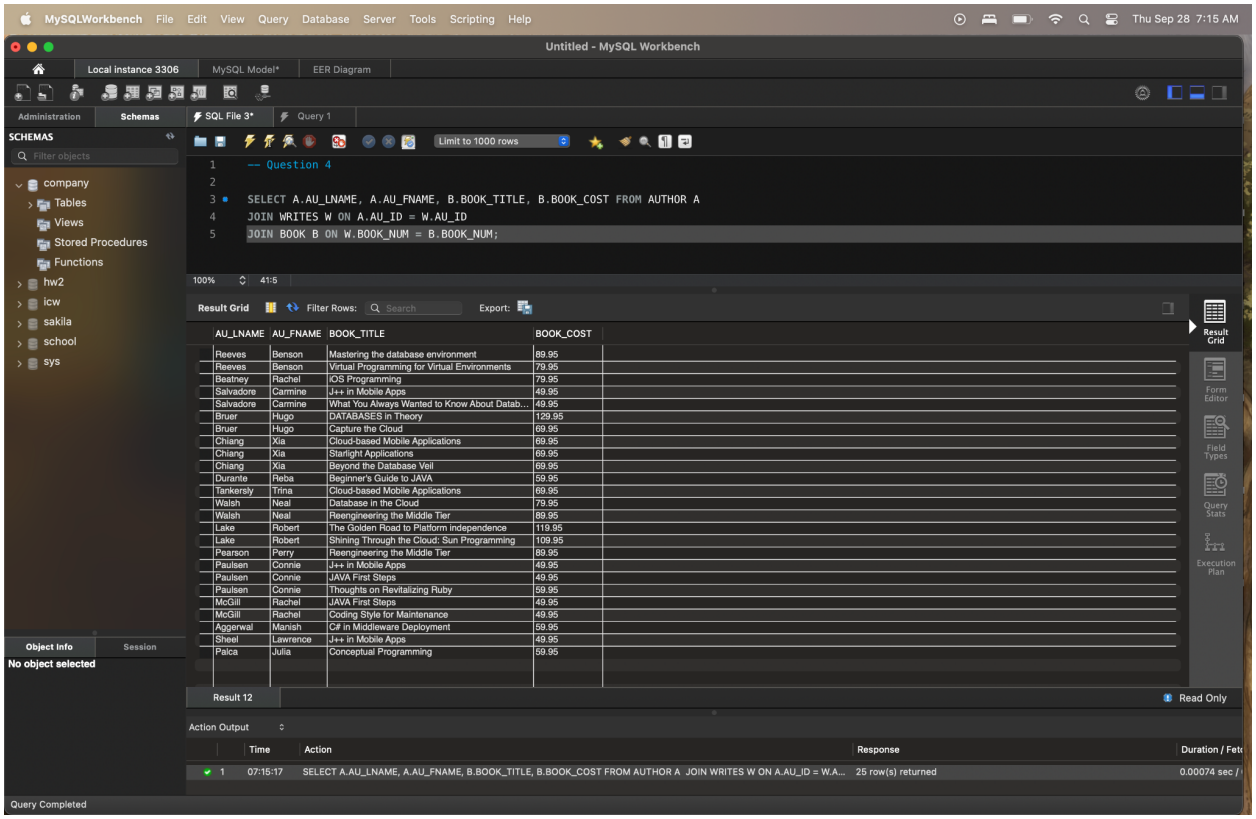
2. Write a query to display the author ID, first and last name for all authors who have never written a book with the subject Programming. Sort the results by author last name



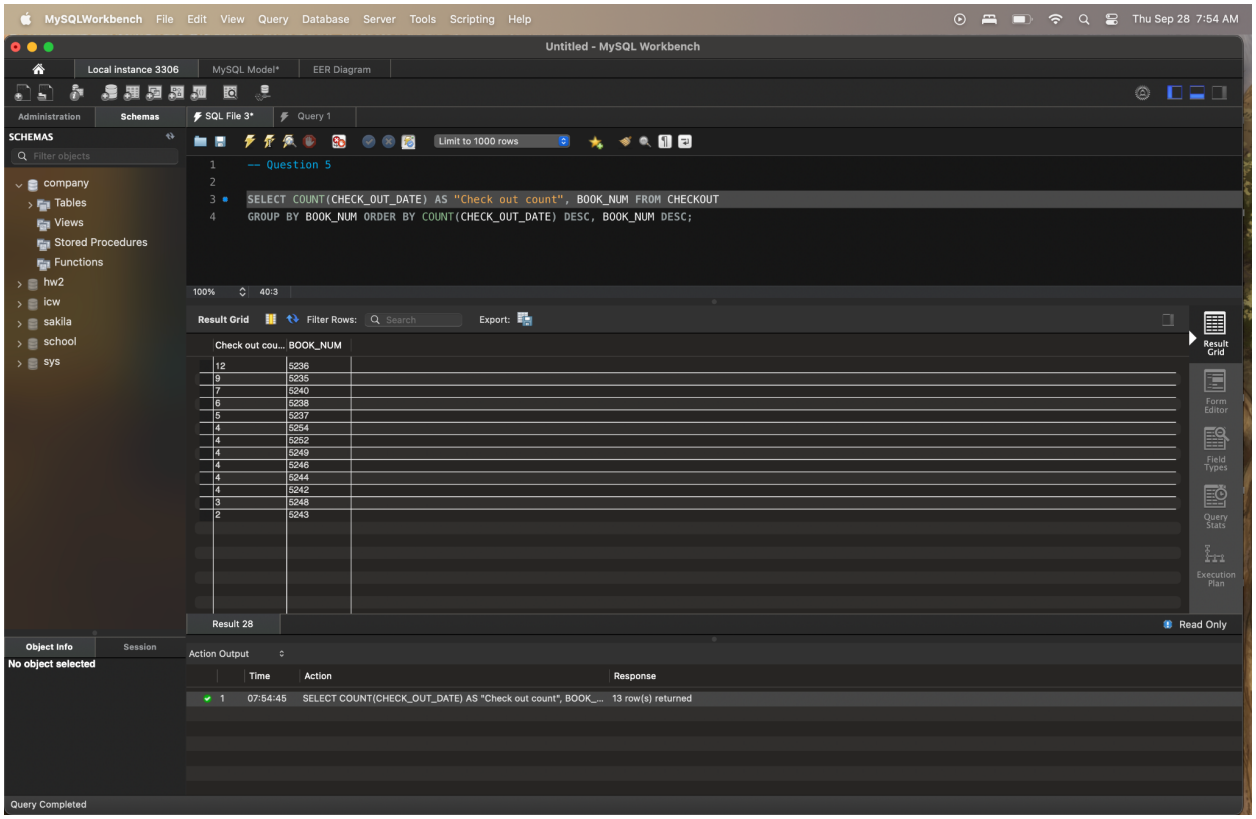
3. Write a query to display the book number, title, subject, and cost for all books that are on the subjects of “Middleware” or “Cloud,” and that cost more than $70 sorted by book number.



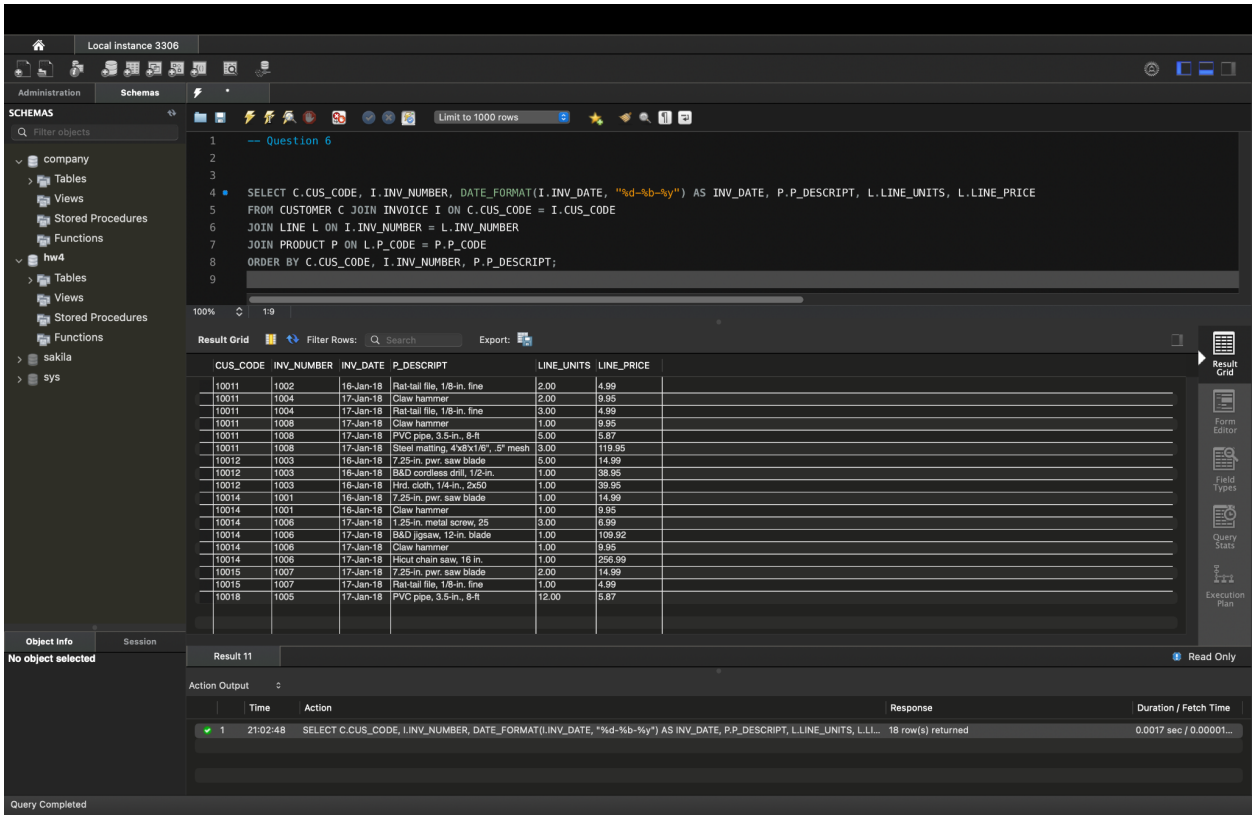
4. Write a query to display the author's last name, first name, book title, and replacement cost for each book. Sort the results by book number and then author ID.



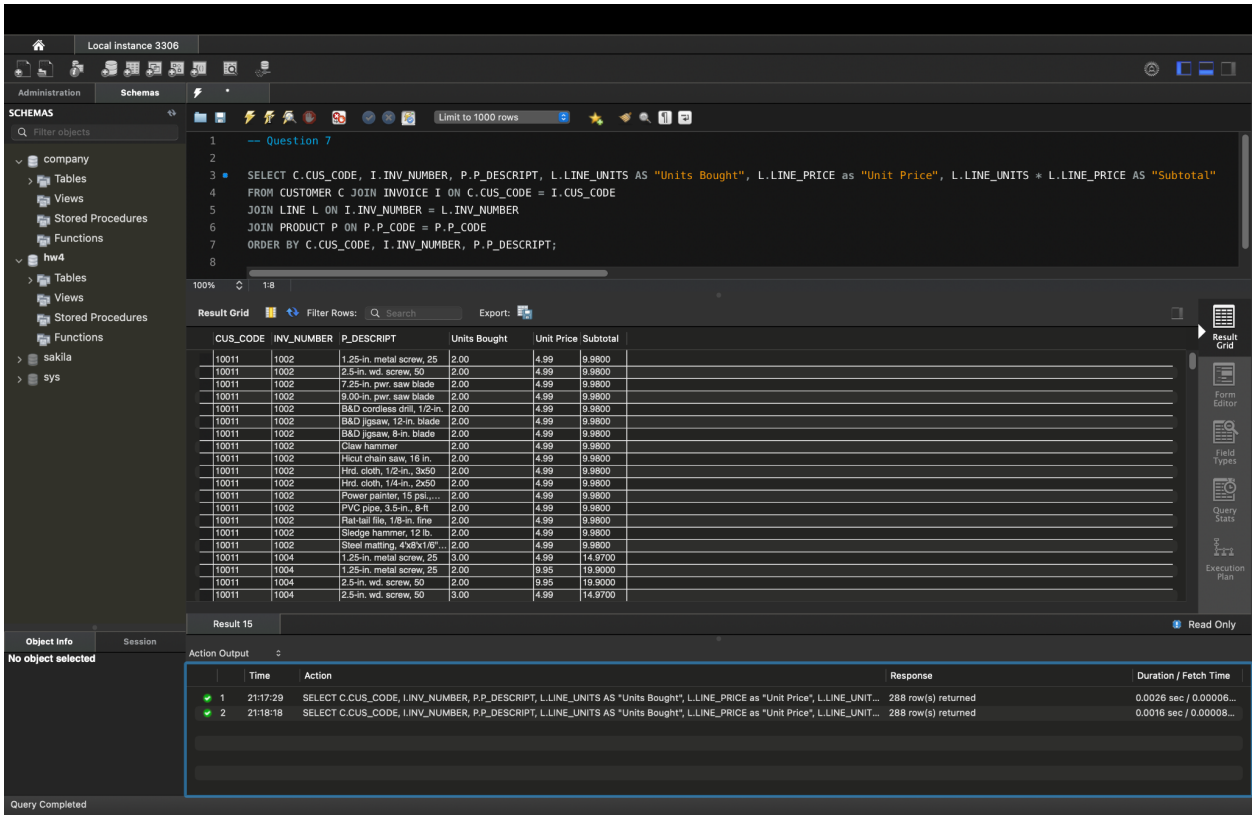
5. Write a query to display the book number and the number of times each book has been checked out. Do not include books that have never been checked out. Sort the results by the number of times checked out in descending order and then by book number in descending order.



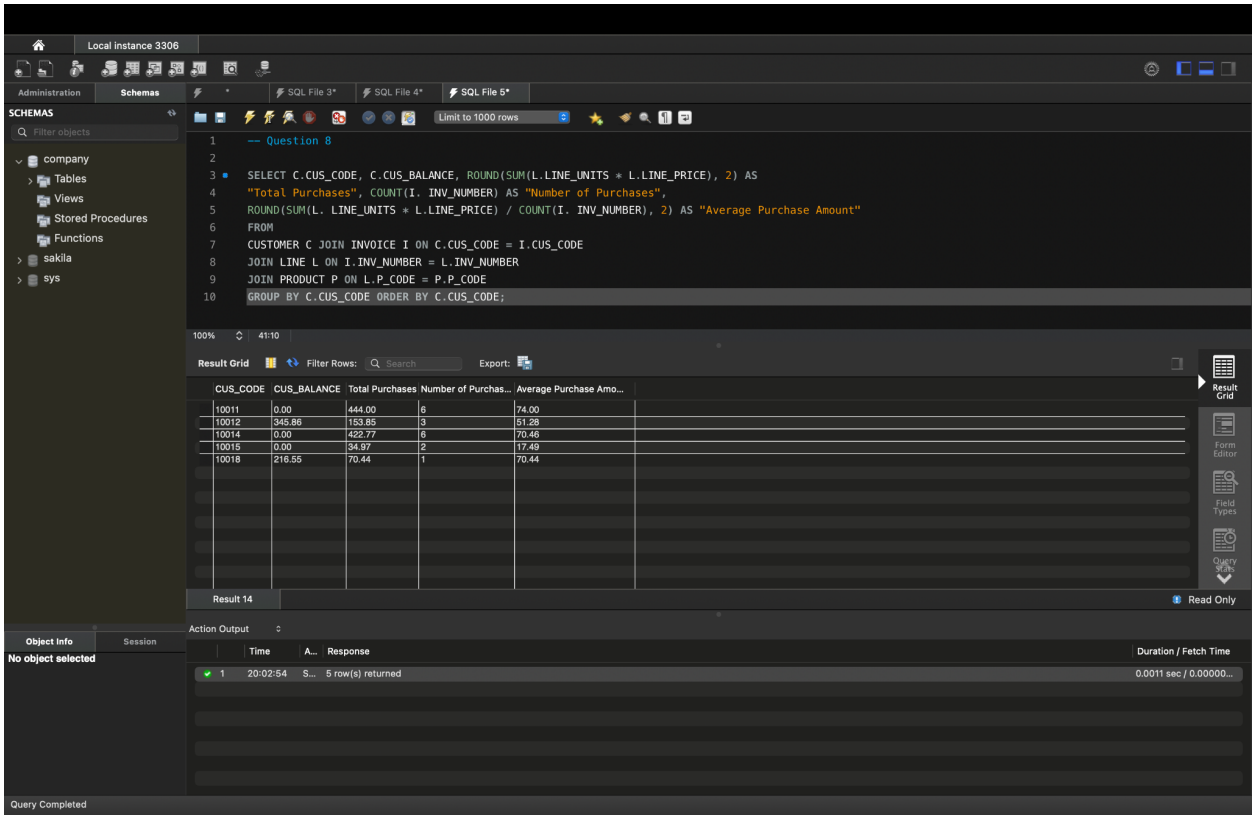
6. Generate a listing of all purchases made by the customers by displaying customer code, invoice number, date (For example: Display as ’01-Jan-19’), p_descript, line units and line price. Sort the results by customer code, invoice number, and product description.



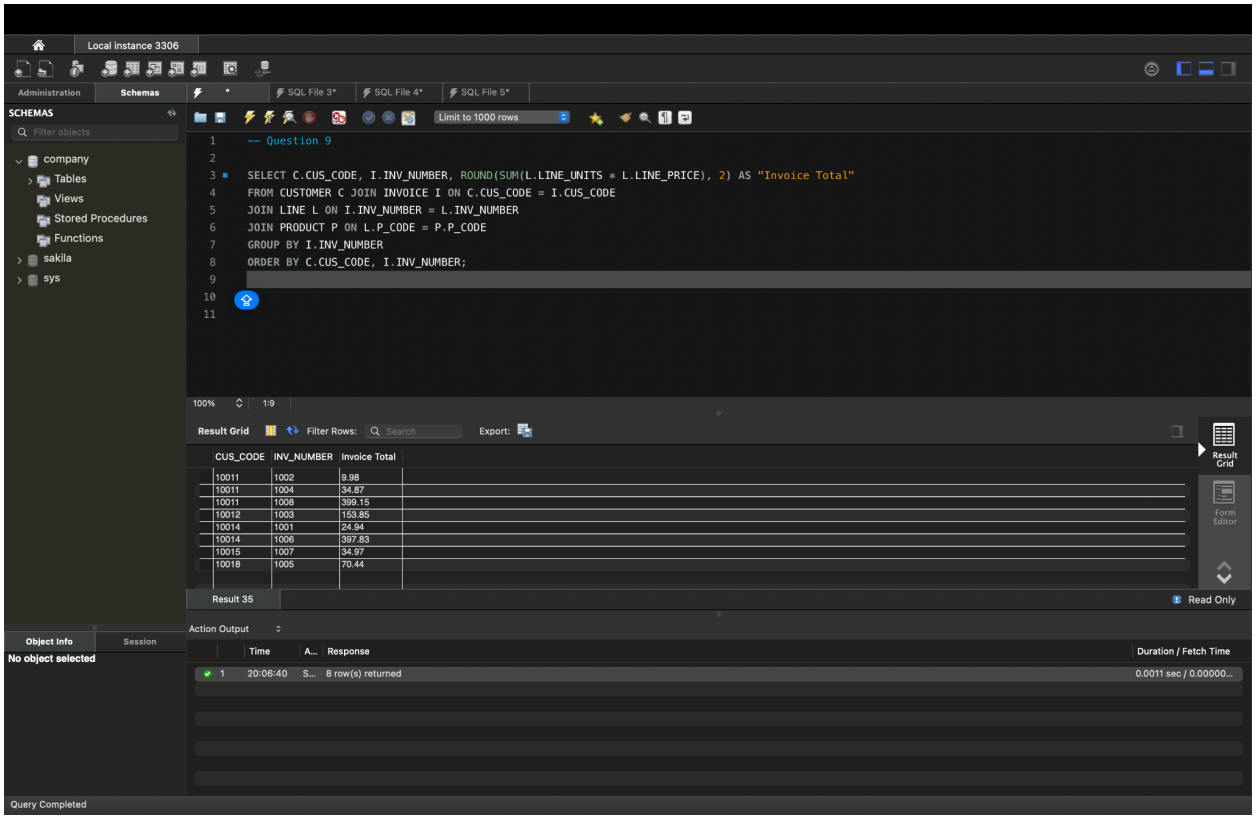
7. Using the output shown below as your guide, generate a list of customer purchases, including the subtotals for each of the invoice line numbers. The subtotal is a derived attribute calculated by multiplying LINE_UNITS by LINE_PRICE. Sort the output by customer code, invoice number, and product description. Be certain to use the column aliases as shown below. **Be certain to use the column aliases as shown in the figure**



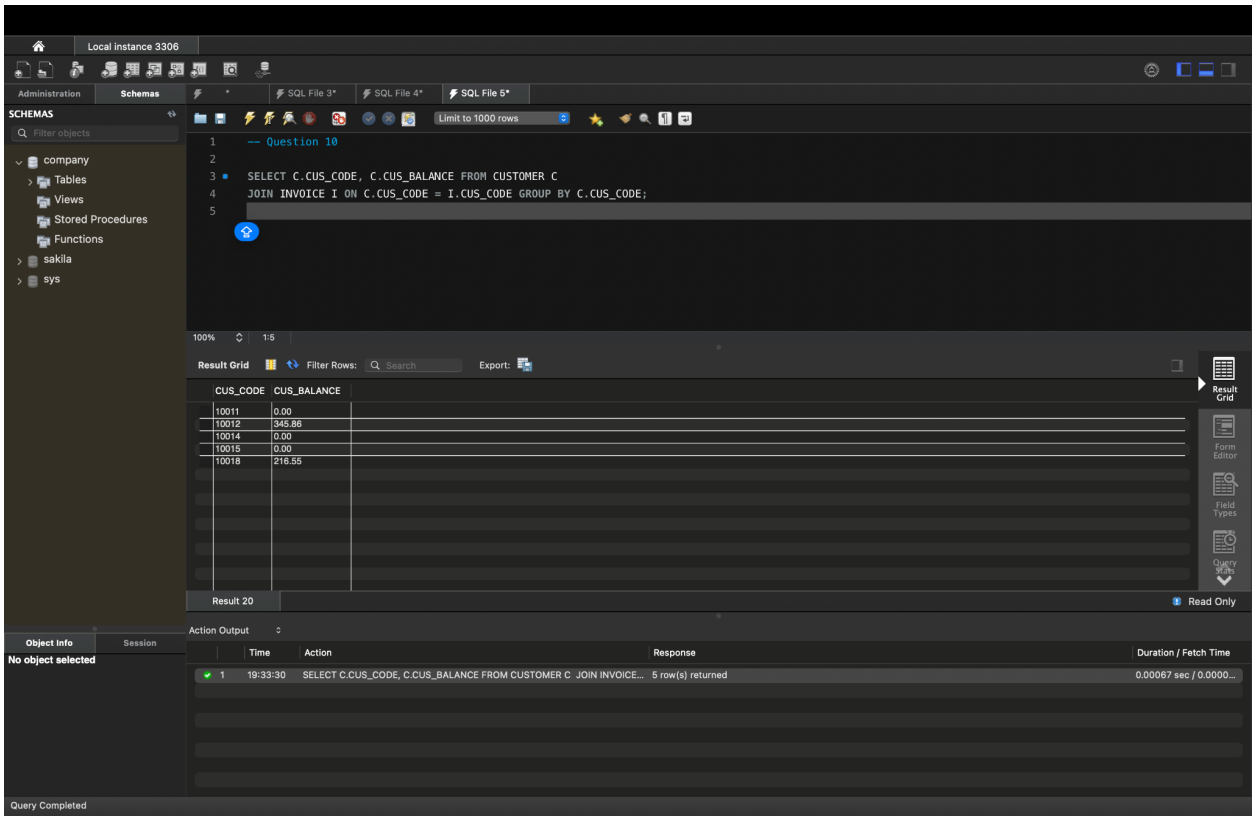
8. Use a query to compute the total of all purchases, the number of purchases, and the average purchase amount made by each customer. Sort the results by customer code. **Your output values must match those shown in Figure**



9. Use a query to show the invoices and invoice totals. Sort the results by customer code and then by invoice number. **Your output values must match those shown in Figure.**



10. List the balances of customers who have made purchases during the current invoice cycle—that is, for the customers who appear in the INVOICE table. Be certain to display CUS_CODE and CUS_BALANCE.



11. 3NF from the given dependency diagram

A	C	E	F

A	D

C	B

E	G