

mysql\_assgnmnt\* SQL File 9\* SQL File 10\* SQL File 11\* joins SQL File 14\* SQL File 14\* SQL File 15\* SQL File 16\* SQL File 17\* SQL File 18\* x

Limit to 500 rows

```

1 # Create a Database called 'Library'
2 • CREATE DATABASE library;
3 • USE library;
4
5 # 1. create table "Branch"
6 • CREATE TABLE Branch
7 (
8   Branch_no VARCHAR(10) PRIMARY KEY,
9   Manager_id VARCHAR(10),
10  Branch_address VARCHAR(30),
11  Contact_no VARCHAR(15)
12 );
13

```

Output

Action Output

#	Time	Action	Message
✓ 1	20:18:41	CREATE DATABASE library	1 row(s) affected
✓ 2	20:18:43	USE library	0 row(s) affected
✓ 3	20:18:48	CREATE TABLE Branch ( Branch_no VARCHAR(10) PRIMARY KEY, Manager_id VARCHAR(10), Branch_address V...	0 row(s) affected

Limit to 500 rows

```

14 # 2. Create table "Employee"
15 • CREATE TABLE Employee
16 (
17   Emp_id VARCHAR(10) PRIMARY KEY,
18   Emp_name VARCHAR(30),
19   Position VARCHAR(30),
20   Salary DECIMAL(10,2),
21   Branch_no VARCHAR(10)
22 );
23
24 # 3. Create table "Books"
25 • CREATE TABLE Books
26 (
27   ISBN VARCHAR(10) PRIMARY KEY,
28   Book_title VARCHAR(50),
29   Category VARCHAR(30),
30   Rental_Price DECIMAL(10,2),
31   Status ENUM('Yes','No'),
32   Author VARCHAR(30),
33   Publisher VARCHAR(30)
34 );
35

```

Output

Action Output

#	Time	Action	Message
✓ 2	20:18:43	USE library	0 row(s) affected
✓ 3	20:18:48	CREATE TABLE Branch ( Branch_no VARCHAR(10) PRIMARY KEY, Manager_id VARCHAR(10), Branch_address...	0 row(s) affected
✓ 4	20:19:22	CREATE TABLE Employee ( Emp_id VARCHAR(10) PRIMARY KEY, Emp_name VARCHAR(30), Position VARCHA...	0 row(s) affected
✓ 5	20:19:55	CREATE TABLE Books ( ISBN VARCHAR(10) PRIMARY KEY, Book_title VARCHAR(50), Category VARCHAR(30),...	0 row(s) affected

```

37 # 4 Create table "Customer"
38 • CREATE TABLE Customer
39 (
40     Customer_Id VARCHAR(10) PRIMARY KEY,
41     Customer_name VARCHAR(30),
42     Customer_address VARCHAR(30),
43     Reg_date DATE
44 );
45
46 # 5. Create table "IssueStatus"
47 • CREATE TABLE IssueStatus
48 (
49     Issue_Id VARCHAR(10) PRIMARY KEY,
50     Issued_cust VARCHAR(30),
51     Issued_book_name VARCHAR(50),
52     Issue_date DATE,
53     Isbn_book VARCHAR(15),
54     FOREIGN KEY (Issued_cust) REFERENCES customer(Customer_id) on DELETE CASCADE,
55     FOREIGN KEY (Isbn_book) REFERENCES books(ISBN) on DELETE CASCADE
56 );
57 • ALTER TABLE issuestatus MODIFY COLUMN Issued_book_name VARCHAR(80);
58 • ALTER TABLE issuestatus MODIFY COLUMN Isbn_book VARCHAR(25);
59
60

```

Output

Action Output

#	Time	Action	Message
✓ 6	20:20:22	CREATE TABLE Customer ( Customer_Id VARCHAR(10) PRIMARY KEY, Customer_name VARCHAR(30), Custome...	0 row(s) affected
✓ 7	20:20:28	CREATE TABLE IssueStatus ( Issue_Id VARCHAR(10) PRIMARY KEY, Issued_cust VARCHAR(30), Issued_book_...	0 row(s) affected
✓ 8	20:20:36	ALTER TABLE issuestatus MODIFY COLUMN Issued book name VARCHAR(80)	0 row(s) affected Records: 0 Duplicates: 0 Warnings: 0

```

58
59 # 6. Create table "ReturnStatus"
60 • CREATE TABLE ReturnStatus
61 (
62     Return_id VARCHAR(10) PRIMARY KEY,
63     Return_cust VARCHAR(30),
64     Return_book_name VARCHAR(50),
65     Return_date DATE,
66     isbn_book2 VARCHAR(15),
67     FOREIGN KEY (isbn_book2) REFERENCES books(ISBN) on DELETE CASCADE
68 );
69
70 • ALTER TABLE returnstatus MODIFY COLUMN Return_book_name VARCHAR(80);
71 • ALTER TABLE returnstatus MODIFY COLUMN isbn_book2 VARCHAR(25);
72

```

Output

Action Output

#	Time	Action	Message
✓ 3	20:18:48	CREATE TABLE Branch ( Branch_no VARCHAR(10) PRIMARY KEY, Manager_id VARCHAR(10), Branch_address...	0 row(s) affected
✓ 4	20:19:22	CREATE TABLE Employee ( Emp_id VARCHAR(10) PRIMARY KEY, Emp_name VARCHAR(30), Position VARCHA...	0 row(s) affected
✓ 5	20:19:55	CREATE TABLE Books ( ISBN VARCHAR(10) PRIMARY KEY, Book_title VARCHAR(50), Category VARCHAR(30)...	0 row(s) affected
✓ 6	20:20:22	CREATE TABLE Customer ( Customer_Id VARCHAR(10) PRIMARY KEY, Customer_name VARCHAR(30), Custome...	0 row(s) affected
✓ 7	20:20:28	CREATE TABLE IssueStatus ( Issue_Id VARCHAR(10) PRIMARY KEY, Issued_cust VARCHAR(30), Issued_book_...	0 row(s) affected
✓ 8	20:20:36	ALTER TABLE issuestatus MODIFY COLUMN Issued_book_name VARCHAR(80)	0 row(s) affected Records: 0 Duplicates: 0 Warnings: 0
✓ 9	20:20:39	ALTER TABLE issuestatus MODIFY COLUMN Isbn_book VARCHAR(25)	0 row(s) affected Records: 0 Duplicates: 0 Warnings: 0
✓ 10	20:22:01	CREATE TABLE ReturnStatus ( Return_id VARCHAR(10) PRIMARY KEY, Return_cust VARCHAR(30), Return_bo...	0 row(s) affected
✓ 11	20:22:06	ALTER TABLE returnstatus MODIFY COLUMN Return_book_name VARCHAR(80)	0 row(s) affected Records: 0 Duplicates: 0 Warnings: 0
✓ 12	20:22:09	ALTER TABLE returnstatus MODIFY COLUMN isbn_book2 VARCHAR(25)	0 row(s) affected Records: 0 Duplicates: 0 Warnings: 0

```

73 # Insert values into each tables
74
75 • INSERT INTO branch (
76     Branch_no,
77     Manager_id,
78     Branch_address ,
79     Contact_no
80 ) VALUES
81     ('01', 'M01', '01 Thrissur', '+919099988676'),
82     ('02', 'M02', '02 Calicut', '+919099988677'),
83     ('03', 'M03', '03 Trivandrum', '+919099988678'),
84     ('04', 'M04', '04 Kottayam', '+919099988679'),
85     ('05', 'M05', '05 Kannur', '+919099988680');
86 • SELECT * FROM branch;
87

```

Result Grid Filter Rows:  Edit: Export/Import: Wrap Cell Content:

	Branch_no	Manager_id	Branch_address	Contact_no
▶	01	M01	01 Thrissur	+919099988676
	02	M02	02 Calicut	+919099988677
	03	M03	03 Trivandrum	+919099988678
	04	M04	04 Kottayam	+919099988679
	05	M05	05 Kannur	+919099988680
•	NULL	NULL	NULL	NULL

branch 1 x

```

89 • INSERT INTO employee (
90     Emp_id,
91     Emp_name,
92     Position,
93     Salary,
94     Branch_no )
95     VALUES
96     ('E01', 'Shan Parveen', 'manager', 60000.00, '01'),
97     ('E02', 'Sreethi Satheesh', 'Clerk', 45000.00, '02'),
98     ('E03', 'Stemy Mariya', 'Librarian', 55000.00, '03'),
99     ('E04', 'Shilpa Suresh', 'Assistant', 40000.00, '01' ),
100    ('E05', 'Ashma hahul', 'Assistant', 42000.00, '05'),
101    ('E06', 'ShifaSabeel', 'Assistant', 43000.00, '02'),
102    ('E07', 'Rani Micheal', 'Manager', 62000.00, '03'),
103    ('E08', 'Anjali Sasikumar', 'Clerk', 46000.00, '04'),

```

Result Grid Filter Rows:  Edit: Export/Import: Wrap Cell Content:

	Emp_id	Emp_name	Position	Salary	Branch_no
▶	E01	Shan Parveen	manager	60000.00	01
	E010	Sherin Thomas	Assistant	41000.00	03
	E011	Sherly John	Manager	65000.00	04
	E02	Sreethi Satheesh	Clerk	45000.00	02
	E03	Stemy Mariya	Librarian	55000.00	03
	E04	Shilpa Suresh	Assistant	40000.00	01
	E05	Ashma hahul	Assistant	42000.00	05
	E06	ShifaSabeel	Assistant	43000.00	02
	E07	Rani Micheal	Manager	62000.00	03
	E08	Anjali Sasikumar	Clerk	46000.00	04
	E09	Angela Thomas	Librarian	57000.00	01
•	NULL	NULL	NULL	NULL	NULL

Limit to 500 rows

```

125 ('9-0-6-7-8', 'Harry Potter and the Sorcerer's Stone', 'Fantasy', 7.00, 'yes', 'J.K. Rowling', 'Scholastic'),
126 ('9-0-7-4', 'The Da Vinci Code', 'Mystery', 8.00, 'yes', 'Dan Brown', 'Doubleday'),
127 ('9-0-0-9-9', 'A Game of Thrones', 'Fantasy', 7.50, 'yes', 'George R.R. Martin', 'Bantam'),
128 ('9-0-3--8', 'A People's History of the United States', 'History', 9.00, 'yes', 'Howard Zinn', 'Harper Perennial'),
129 ('9-0-1-2-1', 'The Guns of August', 'History', 7.00, 'yes', 'Barbara W. Tuchman', 'Oxford University Press'),
130 ('9-0-3-5-1', 'Sapiens: A Brief History of Humankind', 'History', 8.00, 'yes', 'Yuval Noah Harari', 'Harper Perennial'),
131 ('9-0-3-7-8', 'The Diary of a Young Girl', 'History', 6.50, 'yes', 'Anne Frank', 'Bantam'),
132 ('9-0-1-3', 'The Histories', 'History', 5.50, 'yes', 'Herodotus', 'Penguin Classics'),
133 ('9-0-3-8', 'Guns, Germs and Steel The Fates of Human Society', 'History', 7.00, 'yes', 'Jared Diamond', 'W. W. Norton & Company'),
134 ('9-0-3-1', '1491: New Revelations of the Americas ', 'History', 6.50, 'yes', 'Charles C. Mann', 'Vintage Books');
135 • SELECT * FROM books;
136

```

Result Grid

ISBN	Book_title	Category	Rental_Price	Status	Author	Publisher
9-0-0-9-9	A Game of Thrones	Fantasy	7.50	Yes	George R.R. Martin	Bantam
9-0-1-1-1	One Hundred Years of Solitude	Literary Fiction	6.50	Yes	Gabriel Garcia Marquez	Penguin Books
9-0-1-2-1	The Guns of August	History	7.00	Yes	Barbara W. Tuchman	Oxford University Press
9-0-1-3	The Histories	History	5.50	Yes	Herodotus	Penguin Classics
9-0-1-4-6	Jane Eyre	Classic	4.00	Yes	Charlotte Bronte	Penguin Classics
9-0-3--8	A People's History of the United States	History	9.00	Yes	Howard Zinn	Harper Perennial
9-0-3-1	1491: New Revelations of the Americas	History	6.50	Yes	Charles C. Mann	Vintage Books
9-0-3-2-8	Animal Farm	Classic	5.50	Yes	George Orwell	Penguin Books
9-0-3-3-1	The Alchemist	Fiction	2.50	Yes	Paulo Coelho	HarperOne
9-0-3-5-1	Sapiens: A Brief History of Humankind	History	8.00	Yes	Yuval Noah Harari	Harper Perennial
9-0-3-7-8	The Diary of a Young Girl	History	6.50	Yes	Anne Frank	Bantam
9-0-3-8	Guns, Germs and Steel The Fates of Hu...	History	7.00	Yes	Jared Diamond	W. W. Norton & Comp...
9-0-5-2-2	The Catcher in the Rye	Classic	7.00	Yes	J.D. Salinger	Little Brown and Comp...
9-0-5-7-5	The Great Gatsby	Classic	8.00	Yes	F. Scott Fitzgerald	Scribner
9-0-6-7-8	Harry Potter and the Sorcerer's Stone	Fantasy	7.00	Yes	J.K. Rowling	Scholastic
9-0-7-4	The Da Vinci Code	Mystery	8.00	Yes	Dan Brown	Doubleday

books 4 x Apply

Limit to 500 rows

```

139 • INSERT INTO customer (
140     Customer_Id,
141     Customer_name,
142     Customer_address ,
143     Reg_date
144 ) VALUES
145     ('C01', 'Alice Johnson', '123 Main St', '2021-05-15'),
146     ('C02', 'Bob Smith', '456 Elm St', '2021-06-20'),
147     ('C03', 'Carol Davis', '789 Oak St', '2021-07-10'),
148     ('C04', 'Dave Wilson', '567 Pine St', '2021-08-05'),
149     ('C05', 'Eve Brown', '890 Maple St', '2021-09-25'),
150     ('C06', 'Frank Thomas', '234 Cedar St', '2021-10-15'),
151     ('C07', 'Grace Taylor', '345 Walnut St', '2021-11-20'),
152     ('C08', 'Henry Anderson', '456 Birch St', '2021-12-10'),
153     ('C09', 'Ivy Martinez', '567 Oak St', '2022-01-05'),

```

Result Grid

Customer_Id	Customer_name	Customer_address	Reg_date
C01	Alice Johnson	123 Main St	2021-05-15
C010	Jack Wilson	678 Pine St	2022-02-25
C02	Bob Smith	456 Elm St	2021-06-20
C03	Carol Davis	789 Oak St	2021-07-10
C04	Dave Wilson	567 Pine St	2021-08-05
C05	Eve Brown	890 Maple St	2021-09-25
C06	Frank Thomas	234 Cedar St	2021-10-15
C07	Grace Taylor	345 Walnut St	2021-11-20
C08	Henry Anderson	456 Birch St	2021-12-10
C09	Ivy Martinez	567 Oak St	2022-01-05

customer 5 x

Limit to 500 rows

```

157 • INSERT INTO IssueStatus VALUES
158 ('IS101', 'C01', 'The Catcher in the Rye', '2023-05-01', '9-0-5-2-2'),
159 ('IS102', 'C02', 'The Da Vinci Code', '2023-05-02', '9-0-7-4'),
160 ('IS103', 'C03', '1491: New Revelations of the Americas ', '2023-05-03', '9-0-3-1'),
161 ('IS104', 'C04', 'Sapiens: A Brief History of Humankind', '2023-05-04', '9-0-3-5-1'),
162 ('IS105', 'C05', 'The Diary of a Young Girl', '2023-05-05', '9-0-3-7-8');
163 • SELECT * FROM issuestatus;

```

Result Grid

Issue_Id	Issued_cust	Issued_book_name	Issue_date	Isbn_book
IS101	C01	The Catcher in the Rye	2023-05-01	9-0-5-2-2
IS102	C02	The Da Vinci Code	2023-05-02	9-0-7-4
IS103	C03	1491: New Revelations of the Americas	2023-05-03	9-0-3-1
IS104	C04	Sapiens: A Brief History of Humankind	2023-05-04	9-0-3-5-1
IS105	C05	The Diary of a Young Girl	2023-05-05	9-0-3-7-8
NULL	NULL	NULL	NULL	NULL

```

165 • INSERT INTO ReturnStatus(
166     Return_id,
167     Return_cust,
168     Return_book_name,
169     Return_date,
170     isbn_book2) VALUES
171 ('RS101', 'C01', 'The Catcher in the Rye', '2023-06-06', '9-0-5-2-2'),
172 ('RS102', 'C02', 'The Da Vinci Code', '2023-06-07', '9-0-7-4'),
173 ('RS103', 'C03', 'The Diary of a Young Girl', '2023-06-08', '9-0-3-7-8'),
174 ('RS104', 'C04', 'The Histories', '2023-06-09', '9-0-1-3'),
175 ('RS105', 'C105', 'A Game of Thrones', '2023-06-10', '9-0-0-9-9');
176 • SELECT * FROM returnstatus;

```

Result Grid




Return_id	Return_cust	Return_book_name	Return_date	isbn_book2
RS101	C01	The Catcher in the Rye	2023-06-06	9-0-5-2-2
RS102	C02	The Da Vinci Code	2023-06-07	9-0-7-4
RS103	C03	The Diary of a Young Girl	2023-06-08	9-0-3-7-8
RS104	C04	The Histories	2023-06-09	9-0-1-3
RS105	C105	A Game of Thrones	2023-06-10	9-0-0-9-9
NULL	NULL	NULL	NULL	NULL



```

179      /*Queries*/
180
181      # 1. Retrieve the book title, category, and rental price of all available books.
182      • SELECT book_title, category, rental_price FROM books WHERE Status = 'Yes';

```



Result Grid   Filter Rows:  | Export:  | Wrap Cell Content: 

	book_title	category	rental_price
▶	A Game of Thrones	Fantasy	7.50
	One Hundred Years of Solitude	Literary Fiction	6.50
	The Histories	History	5.50
	Jane Eyre	Classic	4.00
	A People's History of the United States	History	9.00
	1491: New Revelations of the Americas	History	6.50
	The Alchemist	Fiction	2.50
	Sapiens: A Brief History of Humankind	History	8.00
	The Diary of a Young Girl	History	6.50
	The Catcher in the Rye	Classic	7.00
	The Great Gatsby	Classic	8.00
	Harry Potter and the Sorcerer's Stone	Fantasy	7.00
	The Da Vinci Code	Mystery	8.00

```

184      # 2. List the employee names and their respective salaries in descending order of salary.
185      • SELECT emp_name, salary FROM employee ORDER BY Salary DESC;
186
187
188

```

Result Grid   Filter Rows:  | Export:  | Wrap Cell Content: 

	emp_name	salary
▶	Sherly John	65000.00
	Rani Micheal	62000.00
	Shan Parveen	60000.00
	Angela Thomas	57000.00
	Stemy Mariya	55000.00
	Anjali Sasikumar	46000.00
	Sreethi Satheesh	45000.00
	ShifaSabeel	43000.00
	Ashma hahul	42000.00
	Sherin Thomas	41000.00
	Shilpa Suresh	40000.00

```

187 # 3. Retrieve the book titles and the corresponding customers who have issued those books.
188 • SELECT issuestatus.Issued_book_name, customer.Customer_name FROM issuestatus INNER JOIN
189 customer on issuestatus.Issued_cust = customer.Customer_Id;
190
191

```

Result Grid | Filter Rows: | Export: | Wrap Cell Content: [IA](#)

	Issued_book_name	Customer_name
▶	The Catcher in the Rye	Alice Johnson
	The Da Vinci Code	Bob Smith
	1491: New Revelations of the Americas	Carol Davis
	Sapiens: A Brief History of Humankind	Dave Wilson
	The Diary of a Young Girl	Eve Brown

```

191 # 4. Display the total count of books in each category.
192 • SELECT Category, COUNT(Book_title) FROM books GROUP BY Category;
193

```

Result Grid | Filter Rows: | Export: | Wrap Cell Content: [IA](#)

	Category	COUNT(Book_title)
▶	Fantasy	2
	Literary Fiction	1
	History	7
	Classic	4
	Fiction	1
	Mystery	1

エフ

```

194 # 5. Retrieve the employee names and their positions for the employees whose salaries are above Rs.50,000.
195 • SELECT emp_name, position FROM employee WHERE Salary > 50000;
196

```

Result Grid | Filter Rows: | Export: | Wrap Cell Content: [IA](#)

	emp_name	position
▶	Shan Parveen	manager
	Sherly John	Manager
	Stemy Mariya	Librarian
	Rani Micheal	Manager
	Angela Thomas	Librarian

```

196
197 # 6. List the customer names who registered before 2022-01-01 and have not issued any books yet.
198 • SELECT customer_name FROM customer WHERE Reg_date < '2022-01-01' AND Customer_Id NOT IN
199 (SELECT issued_cust FROM issuestatus);

```

Result Grid | Filter Rows: | Export: | Wrap Cell Content: [IA](#)

	customer_name
▶	Frank Thomas
	Grace Taylor
	Henry Anderson

200

201 # 7. Display the branch numbers and the total count of employees in each branch.

202 • `SELECT branch_no, COUNT(emp_id) FROM employee GROUP BY branch_no;`

Result Grid	Filter Rows:	Export:	Wrap Cell Content:
branch_no	COUNT(emp_id)		
01	3		
03	3		
04	2		
02	2		
05	1		

203

204 # 8. Display the names of customers who have issued books in the month of June 2023.

205 • `SELECT customer.Customer_name FROM customer INNER JOIN issuestatus ON`

206 `customer.Customer_Id = issuestatus.Issued_cust WHERE issuestatus.Issue_date >= '2023-06-01' AND`

207 `issuestatus.Issue_date <= '2023-06-30';`

Result Grid	Filter Rows:	Export:	Wrap Cell Content:
Customer_name			

210

211 # 9. Retrieve book\_title from book table containing 'history'.

212 • `SELECT book_title FROM books WHERE Category = 'history';`

Result Grid	Filter Rows:	Export:	Wrap Cell Content:
book_title			
The Guns of August			
The Histories			
A People's History of the United States			
1491: New Revelations of the Americas			
Sapiens: A Brief History of Humankind			
The Diary of a Young Girl			
Guns, Germs and Steel The Fates of Human Soc...			



212

213 # 10.Retrieve the branch numbers along with the count of employees for branches having more than 5 employees.

214 • `SELECT branch_no, COUNT(emp_id) FROM employee GROUP BY branch_no HAVING COUNT(Emp_id) > 5;`




Result Grid  Filter Rows:  Export:  Wrap Cell Content: 

branch_no	COUNT(emp_id)
-----------	---------------

216 # 11.Retrieve the names of employees who manage branches and their respective branch addresses.

217 • `select Emp_name, Branch_address from Employee`

218 `JOIN Branch ON Emp_Id = Manager_Id;`

Result Grid  Filter Rows:  Export:  Wrap Cell Content: 

Emp_name	Branch_address
----------	----------------


220 # 12. Display the names of customers who have issued books with a rental price higher than Rs. 25.

221 • `SELECT Customer_Name FROM Customer`

222 `JOIN IssueStatus ON Customer_Id = Issued_cust`

223 `JOIN Books ON Isbn_book = ISBN`

224 `WHERE Rental_Price > 25;`

Result Grid  Filter Rows:  Export:  Wrap Cell Content: 

Customer_Name
---------------