

# AWS RedShift Serverless

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# AWS RedShift Serverless



Data Warehousing Solution from AWS



Allow to Analyze data and Run analytical queries on data






Allow Building Dashboards

# Task Scenario

Explore AWS RedShift Serverless and use RedShift Serverless To load data and run analytical queries on data and see the result

# AWS RedShift Serverless

 Services  [Alt+S]



Analytics

## Amazon Redshift

Fast, fully managed, petabyte-scale cloud data warehouse.

Amazon Redshift makes it easier for you to run and scale analytics without having to manage your data warehouse. Get insights by running real-time and predictive analytics on all of your data, across operational databases, data lake, data warehouse, and thousands of third-party datasets.

### Get to powerful insights fast

Get insights from data in seconds without managing data warehouse infrastructure. First-time Redshift Serverless customers receive a \$300 credit to use in their account.



[Try Redshift Serverless free trial](#)

### Getting started

[Redshift Serverless overview](#)


[Evaluation and POC support](#)

### How it works





Getting Started with Amazon Redshift Serverless | ...


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# AWS RedShift Serverless Configuration



 Services  [Alt+S]



 Try new Amazon Redshift features in preview

Create a workgroup with preview features. Production use of the workgroup is not supported. Use this workgroup for testing only.

Create preview workgroup



[Amazon Redshift Serverless](#) > Get started with Amazon Redshift Serverless

## Get started with Amazon Redshift Serverless [Info](#)

To start using Amazon Redshift Serverless, set up your serverless data warehouse and create a database.  
You will receive \$300.00 credit towards your Redshift Serverless usage in this account.

### Configuration

☒ Use default settings  
Default settings have been defined to help you get started. You can change them at any time later.

☐ Customize settings  
Customize your settings for your specific needs.


### Namespace [Info](#)

Namespace is a collection of database objects and users. Data properties include database name and password, permissions, and encryption and security.

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# AWS RedShift Serverless Configuration

 Services  [Alt+S]

☰

## Namespace [Info](#)

Namespace is a collection of database objects and users. Data properties include database name and password, permissions, and encryption and security.


 Your data is encrypted by default with an AWS owned key. To choose a different key, choose **Customize settings**.



Target namespace  
default-namespace


### Database name and password

Database name dev	Admin user credentials Created based on IAM credentials
----------------------	--

### Permissions

 Associate an IAM role so that your serverless endpoint can LOAD and UNLOAD data. You can create an IAM role as the default for this configuration that has the [AmazonRedshiftAllCommandsFullAccess](#) policy attached. This policy includes permissions to run SQL commands to COPY, UNLOAD, and query data with Amazon Redshift Serverless. This policy also grants permissions to run SELECT statements for related



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# Adding IAM Rule to allow Redshift to run queries

The screenshot shows the AWS IAM console interface. At the top, there's a navigation bar with the AWS logo, 'Services' menu, a search bar, and user information for 'Salma\_Salah @ salma-salah' in 'N. Virginia'. A blue tooltip box is visible, explaining that a specific policy grants permissions to run SQL commands (COPY, UNLOAD, SELECT) on Amazon Redshift Serverless and related services like Amazon S3, CloudWatch logs, SageMaker, and AWS Glue.

The main content area is titled 'Associated IAM roles (0)'. It includes a 'Set default' dropdown and a 'Manage IAM roles' button. A dropdown menu is open under 'Manage IAM roles', showing options: 'Associate IAM roles', 'Create IAM role' (which is highlighted with a blue border), and 'Remove IAM roles'. Below this is a search bar for associated IAM roles.

At the bottom of the console view, there's a table header with columns for 'IAM roles', 'Status', and 'Role type'. The table currently shows 'No resources' and 'No associated IAM roles', with an 'Associate IAM role' button below it.

The footer of the console contains links for 'CloudShell', 'Feedback', and copyright information for Amazon Web Services, Inc. (© 2024), along with links for 'Privacy', 'Terms', and 'Cookie preferences'.

# Specify S3Bucket that IAM rule is allowed to access

The screenshot shows the AWS IAM console interface. A modal dialog titled "Create the default IAM role" is open. The dialog contains an information box with details about the `AmazonRedshiftAllCommandsFullAccess` policy. Below this, it asks the user to specify an S3 bucket for the IAM role to access, with a link to "visit S3" for creating a new bucket. Three radio button options are provided: "No additional S3 bucket" (selected), "Any S3 bucket", and "Specific S3 buckets". At the bottom of the dialog are "Cancel" and "Create IAM role as default" buttons. The background shows the IAM console with a search bar and a list of associated IAM roles.

**Create the default IAM role**

**i** Associate an IAM role so that your serverless endpoint can LOAD and UNLOAD data. You can create an IAM role as the default for this configuration that has the [AmazonRedshiftAllCommandsFullAccess](#) policy attached. This policy includes permissions to run SQL commands to COPY, UNLOAD, and query data with Amazon Redshift Serverless. This policy also grants permissions to run SELECT statements for related services, such as Amazon S3, Amazon CloudWatch logs, Amazon SageMaker, and AWS Glue. You won't be able to run these SQL commands without an IAM role attached to your namespace.

Specify an S3 bucket for the IAM role to access  
To create a new bucket, [visit S3](#)

☒ No additional S3 bucket  
Create the IAM role without specifying S3 buckets.

☐ Any S3 bucket  
Allow users that have access to your Redshift Serverless data to also access any S3 bucket and its contents in your AWS account.

☐ Specific S3 buckets  
Specify one or more S3 buckets that the IAM role being created has permission to access.

**Cancel** **Create IAM role as default**



# IAM rule is set as default rule for Redshift

aws

Services

Search

[Alt+S]

N. Virginia

Salma\_Salah @ salma-salah

attached. This policy includes permissions to run SQL commands to COPY, UNLOAD, and query data with Amazon Redshift Serverless. This policy also grants permissions to run SELECT statements for related services, such as Amazon S3, Amazon CloudWatch logs, Amazon SageMaker, and AWS Glue. You won't be able to run these SQL commands without an IAM role attached to your namespace.

✓

The IAM role [AmazonRedshift-CommandsAccessRole-20240115T044836](#) was successfully created and set as the default.

Associated IAM roles (1)

Set default

Manage IAM roles

Create, associate, or remove an IAM role. You can associate up to 50 IAM roles. You can also choose an IAM role and set it as the default.

Search for associated IAM role by name, status, or role type

< 1 >

<input type="checkbox"/>	<a href="#">IAM roles</a>	Status	Role type
<input type="checkbox"/>	<a href="#">AmazonRedshift-CommandsAccessRole-20240115T044836</a>	Not applied	Default

Encryption and security

CloudShell

Feedback


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# Workgroup details

 Services  [Alt+S]



## Workgroup [Info](#)

Workgroup is a collection of compute resources from which an endpoint is created. Compute properties include network and security settings.



Workgroup name  
default-workgroup


## Capacity [Info](#)

The capacity is measured in Redshift processing units (RPU).

Base capacity  
128

## Network and security

Virtual private cloud (VPC) <a href="#">vpc-07e368fb8901161b4</a> 	Subnet subnet-0d99639a3e2877e1d, subnet-079b1da1aed8bc4dc, subnet-0a5451b8900b824c2, subnet-0b61a6f56cdd003f5, subnet-0347a6804ddb789b0, subnet-02137f6d24d30f236,
VPC security group <a href="#">sg-0a03a7fbcf5f773</a> 	

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# Saving Configuration

aws

Services

Q Search

[Alt+S]

N. Virginia ▼

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Workgroup name

default-workgroup

Capacity [Info](#)

The capacity is measured in Redshift processing units (RPU's).

Base capacity

128

Network and security

Virtual private cloud (VPC)

[vpc-07e368fb8901161b4](#) [↗](#)

VPC security group

[sg-0a03a7fbcfcb5f773](#) [↗](#)

Subnet

subnet-0d99639a3e2877e1d,  
subnet-079b1da1aed8bc4dc,  
subnet-0a5451b8900b824c2,  
subnet-0b61a6f56cdd003f5,  
subnet-0347a6804ddb789b0,  
subnet-02137f6d24d30f236,

Enhanced VPC routing

Off

Cancel

Save configuration

CloudShell

Feedback

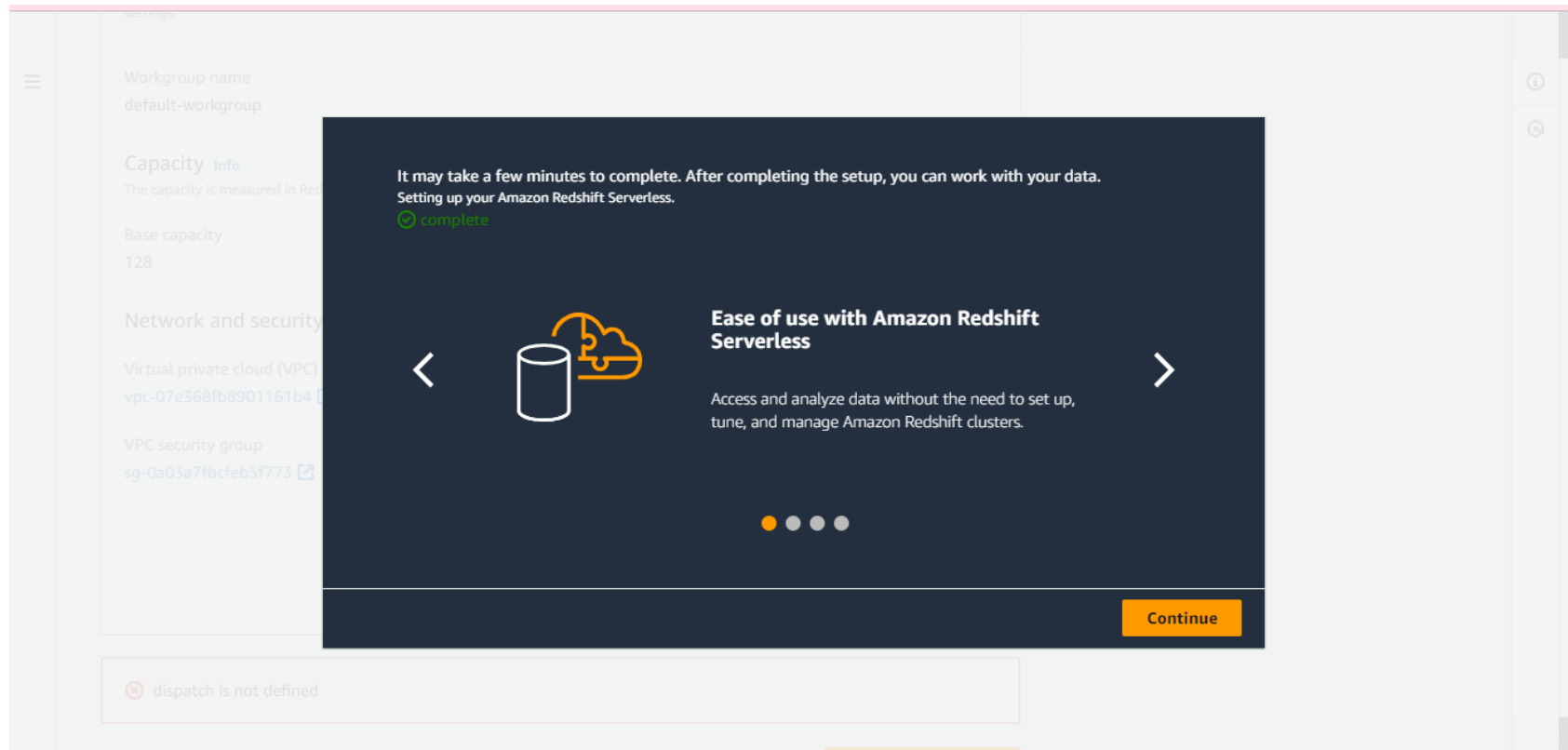
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# Wait until setup is completed



The screenshot shows the Amazon Redshift console interface. On the left, a sidebar contains a menu icon and a list of configuration items: 'Workgroup name' (default-workgroup), 'Capacity' (with an 'Info' link and a note 'The capacity is measured in Redshift Units'), 'Base capacity' (128), 'Network and security', 'Virtual private cloud (VPC)' (vpc-07e368fb8901161b4), and 'VPC security group' (sg-0a03a7fbcfeb5f773). A modal dialog is centered on the screen, indicating that the setup is complete. The modal has a dark blue background and contains the following text: 'It may take a few minutes to complete. After completing the setup, you can work with your data. Setting up your Amazon Redshift Serverless. complete'. Below this text is an illustration of a database cylinder and a puzzle piece. The modal also features a title 'Ease of use with Amazon Redshift Serverless', a description 'Access and analyze data without the need to set up, tune, and manage Amazon Redshift clusters.', and a 'Continue' button at the bottom right. At the bottom of the console, a red error message states 'dispatch is not defined'.

Workgroup name  
default-workgroup

Capacity [Info](#)  
The capacity is measured in Redshift Units

Base capacity  
128

Network and security

Virtual private cloud (VPC)  
vpc-07e368fb8901161b4

VPC security group  
sg-0a03a7fbcfeb5f773

It may take a few minutes to complete. After completing the setup, you can work with your data.  
Setting up your Amazon Redshift Serverless.  
complete


**Ease of use with Amazon Redshift Serverless**




Access and analyze data without the need to set up, tune, and manage Amazon Redshift clusters.

Continue

dispatch is not defined

# Namespace successfully created

 Services  [Alt+S]

 Serverless dashboard [Info](#)  [Query data](#) [Create workgroup](#) 

**Namespace overview** [Info](#)

Filter namespace  
All namespaces ▼

Namespace data from your account

Total snapshots  
0

Datashares in my account  
0

Datashares requiring authorization  
0


Datashares from other accounts  
0

Datashares requiring association  
0

**Namespaces / Workgroups** [Info](#)

Namespace	Status	Workgroup	Status
default-namespace	✓ Available	default-workgroup	✓ Available


**Queries metrics**

 default-workgroup ▼ Last hour ▼ [View details](#)


Workgroup metrics from your account


**Total compute usage - new** [Info](#)

Choose a workgroup ▼ Last hour ▼

To visualize the costs of your total compute usage, go to [AWS Cost Explorer](#) 

Total consumed RPU hours  
--

 Retrieving a workgroup's total compute

 CloudShell [Feedback](#)

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# Namespace Details

## Click on Query data

The screenshot displays the AWS Redshift console interface. At the top, the navigation bar includes the AWS logo, 'Services', a search bar, and user information for 'Salma\_Salah' in 'N. Virginia'. A green banner at the top of the main content area states 'Successfully setup Amazon Redshift Serverless' and provides a 'Query data' button. Below this, the breadcrumb trail shows 'Amazon Redshift Serverless > Namespace configuration > default-namespace'. The main heading is 'default-namespace' with an 'Info' link. To the right of the heading are buttons for 'Refresh', 'Actions', and 'Query data'. The 'General information' section contains a table with details about the namespace.

Namespace	Status	Admin user name
default-namespace	Available	admin
Namespace ID	Date created	Database name
ae18df1c-cb00-4f18-bb94-b8847277d025	January 15, 2024, 04:54 (UTC+02:00)	dev
Namespace ARN	Storage used	Total table count
arn:aws:redshift-serverless:us-east-1:821594020462:namespace/ae18df1c-cb00-4f18-bb94-b8847277d025	355.5 MB	-

At the bottom of the console, there is a horizontal menu with links: 'Workgroup', 'Data backup', 'Security and encryption', 'Datashares', 'Zero-ETL integrations', 'Resource policy', and 'Tags'. The footer of the page contains 'CloudShell', 'Feedback', and copyright information for Amazon Web Services, Inc. or its affiliates, along with links for 'Privacy', 'Terms', and 'Cookie preferences'.

# AWS RedShift Query editor

The screenshot displays the AWS RedShift Query Editor v2 interface. At the top, the AWS logo is on the left, followed by a 'Services' menu and a search bar. The right side of the top bar shows the region 'N. Virginia' and the user 'Salma\_Salah @ salma-salah'. Below this, a left-hand navigation sidebar contains icons for Editor, Queries, Notebooks, Charts, History, Scheduled queries, and a settings icon. The main workspace is titled 'Redshift query editor v2' and features a 'Create' button, a 'Load data' button, and a 'Filter resources' search bar. Below the filter bar, a dropdown menu shows 'Serverless: default-workgroup'. The central area contains a toolbar with a 'Run' button, a 'Limit 100' toggle, an 'Explain' toggle, an 'Isolated session' toggle, and a 'Cluster or wor...' dropdown. Below the toolbar is a 'Schedule' button and a 'Database' dropdown. The main query editor area shows a single line of text: '1 Use Ctrl-Space for autocomplete'. At the bottom of the interface, there is a footer with 'CloudShell', 'Feedback', and copyright information: '© 2024, Amazon Web Services, Inc. or its affiliates.' along with links for 'Privacy', 'Terms', and 'Cookie preferences'.

aws Services Search [Alt+S]

Editor

Redshift query editor v2

Create Load data

Filter resources

Serverless: default-workgroup

Run Limit 100 Explain Isolated session Cluster or wor... Database

Schedule

1 Use Ctrl-Space for autocomplete

Row 1, Col 1, Chr 0

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# Connection to the default Workgroup

The screenshot displays the AWS Redshift query editor v2 interface. A modal dialog titled "Connect to default-workgroup" is open, allowing the user to choose a connection method. The dialog lists four options: IAM Identity Center, Other ways to connect (selected), Federated user, Database user name and password, and AWS Secrets Manager. The "Other ways to connect" option is selected, and the "Federated user" sub-option is chosen. Below the options, there is a "Database" input field containing the text "dev". At the bottom of the dialog are "Cancel" and "Create connection" buttons. The background interface shows the AWS logo, a search bar, and a sidebar with navigation options like Editor, Queries, Notebooks, Charts, History, and Scheduled queries. The top right corner shows the region "N. Virginia" and the user "Salma\_Salah @ salma-salah".

**Connect to default-workgroup**

- ☐ IAM Identity Center  
Connect to Amazon Redshift with your single sign-on credentials from your identity provider (IdP). Your cluster or workgroup must be enabled for IAM Identity Center.
- ☒ Other ways to connect [Learn more](#)
- ☐ Federated user  
The query editor v2 generates a temporary password to connect to the database.
- ☐ Database user name and password  
Provide a database user and password for the database that you are connecting to. The query editor v2 stores your credentials in AWS Secrets Manager on your behalf.
- ☐ AWS Secrets Manager  
Choose a secret with credentials that are associated with the namespace or that you created in AWS Secrets Manager. Only secrets tagged with a key starting with 'Redshift' are listed.

**Database**

dev

The database name must be 1-64 characters. Valid characters are lowercase alphanumeric characters.

[Cancel](#) [Create connection](#)

Row 1, Col 1, Chr 0

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# Using aws provided sample data

The screenshot displays the AWS Redshift Query Editor v2 interface. The top navigation bar includes the AWS logo, a 'Services' menu, a search bar, and a keyboard shortcut '[Alt+S]'. The right side of the top bar shows the region 'N. Virginia' and the user 'Salma\_Salah @ salma-salah'. The left sidebar contains a navigation menu with icons for Editor, Queries, Notebooks, Charts, History, and Scheduled queries. The 'Editor' tab is active, showing a 'Redshift query editor v2' header. Below this, there are buttons for 'Create' and 'Load data', and a 'Filter resources' search bar. The 'Serverless: default-workg...' workspace is selected, showing a tree view of resources. The 'sample\_data\_dev' folder is highlighted with a blue box, and a tooltip 'Open sample notebooks' is visible. The main editor area shows a query editor with a 'Run' button, a 'Limit 100' toggle, an 'Explain' button, an 'Isolated session' toggle, and a 'Serverless: de...' dropdown. The bottom status bar shows 'CloudShell', 'Feedback', and copyright information for Amazon Web Services, Inc. or its affiliates.

aws Services Search [Alt+S] N. Virginia Salma\_Salah @ salma-salah

Redshift query editor v2

Editor

Queries

Notebooks

Charts

History

Scheduled queries

Create Load data

Filter resources

Serverless: default-workg... i

awsdatacatalog

dev

sample\_data\_dev

ticket

tpcds

tpch

Open sample notebooks

Untitled 1 x

Run Limit 100 Explain Isolated session i Serverless: de... dev

Schedule

Use Ctrl-Space for autocomplete

1

Row 1, Col 1, Chr 0

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# Creating sample database to perform queries

The screenshot displays the AWS Redshift Query Editor v2 interface. On the left, a sidebar contains navigation options: Editor, Queries, Notebooks, Charts, History, Scheduled queries, and a settings icon. The 'Queries' section is active, showing a tree view of resources under 'Serverless: default-workg...'. The tree includes 'awsdatacatalog', 'dev', and 'sample\_data\_dev'. Under 'sample\_data\_dev', there are sub-items: 'ticket', 'tpcds', and 'tpch'. The main editor area shows a toolbar with 'Run', 'Limit 100', 'Explain', 'Isolated session', 'Serverless: de...', and 'dev'. Below the toolbar, a text input field contains the text 'Use Ctrl-Space for autocomplete'. A modal dialog box titled 'Create sample database' is open in the center, displaying the message: 'You do not have a sample database yet. Do you want us to create a sample database for you?'. The dialog has 'Cancel' and 'Create' buttons. The bottom of the interface shows the 'CloudShell' logo, a 'Feedback' link, and copyright information: '© 2024, Amazon Web Services, Inc. or its affiliates. Privacy Terms Cookie preferences'.

aws Services Search [Alt+S] N. Virginia Salma\_Salah @ salma-salah

Redshift query editor v2

Editor

Create Load data

Filter resources

Serverless: default-workg...

- awsdatacatalog
- dev
- sample\_data\_dev
  - ticket
  - tpcds
  - tpch

Run Limit 100 Explain Isolated session Serverless: de... dev

Schedule

Use Ctrl-Space for autocomplete

1

Create sample database

You do not have a sample database yet. Do you want us to create a sample database for you?

Cancel Create

Row 1, Col 1, Chr 0

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# AWS provide various tables

The screenshot displays the AWS Redshift Query Editor v2 interface. The left sidebar contains navigation options: Editor, Queries, Notebooks, Charts, History, Scheduled queries, and a settings icon. The main panel is titled "Redshift query editor v2" and shows a tree view of resources under "Serverless: default-workgroup". The tree includes "awsdatacatalog", "dev", and "sample\_data\_dev". Under "sample\_data\_dev", there is a "ticket" folder containing a "Tables" folder with 7 tables: "category", "date", "event", "listing", "sales", "users", and "venue". The "category" table is selected. The main editor area shows a SQL query titled "Sales per event" with a "Run" button and a "Limit 100" toggle. The query is as follows:

```
1 SET search_path to ticket;
2 SELECT eventname, total_price
3 FROM (SELECT eventid, total_price, ntile(1000) over(order by total_price desc) as percentile
4       FROM (SELECT eventid, sum(pricepaid) total_price
5             FROM ticket.sales
6             GROUP BY eventid)) Q, ticket.event E
7 WHERE Q.eventid = E.eventid
8 AND percentile = 1
9 ORDER BY total_price desc;
```

The query results are displayed in a table with 3 columns: eventname, total\_price, and percentile. The first row shows "eventname" with a total\_price of 1000 and a percentile of 1. The second row shows "eventname" with a total\_price of 1000 and a percentile of 1. The third row shows "eventname" with a total\_price of 1000 and a percentile of 1. The fourth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The fifth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The sixth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The seventh row shows "eventname" with a total\_price of 1000 and a percentile of 1. The eighth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The ninth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The tenth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The eleventh row shows "eventname" with a total\_price of 1000 and a percentile of 1. The twelfth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The thirteenth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The fourteenth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The fifteenth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The sixteenth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The seventeenth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The eighteenth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The nineteenth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The twentieth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The twenty-first row shows "eventname" with a total\_price of 1000 and a percentile of 1. 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The sixty-sixth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The sixty-seventh row shows "eventname" with a total\_price of 1000 and a percentile of 1. The sixty-eighth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The sixty-ninth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The seventieth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The seventy-first row shows "eventname" with a total\_price of 1000 and a percentile of 1. The seventy-second row shows "eventname" with a total\_price of 1000 and a percentile of 1. The seventy-third row shows "eventname" with a total\_price of 1000 and a percentile of 1. The seventy-fourth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The seventy-fifth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The seventy-sixth row shows "eventname" with a total\_price of 1000 and a percentile of 1. 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The eighty-eighth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The eighty-ninth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The ninetieth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The ninety-first row shows "eventname" with a total\_price of 1000 and a percentile of 1. The ninety-second row shows "eventname" with a total\_price of 1000 and a percentile of 1. The ninety-third row shows "eventname" with a total\_price of 1000 and a percentile of 1. The ninety-fourth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The ninety-fifth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The ninety-sixth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The ninety-seventh row shows "eventname" with a total\_price of 1000 and a percentile of 1. The ninety-eighth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The ninety-ninth row shows "eventname" with a total\_price of 1000 and a percentile of 1. The hundredth row shows "eventname" with a total\_price of 1000 and a percentile of 1.

The bottom of the interface shows the "Total quantity per buyer" section, which is currently empty. The footer of the interface includes the "CloudShell" logo, a "Feedback" link, and copyright information for Amazon Web Services, Inc. or its affiliates, along with links for "Privacy", "Terms", and "Cookie preferences".

# Choosing a table

The screenshot displays the AWS Redshift Query Editor v2 interface. On the left sidebar, the 'Queries' section is active, showing a tree view of resources under 'Serverless: default-workgroup'. The tree includes 'awsdatacatalog', 'dev', and 'sample\_data\_dev', with 'tickit' selected under 'sample\_data\_dev'. A context menu is open over the 'tickit' folder, offering options: 'Select table', 'Show table definition', and 'Delete'. Below the tree, the 'category' section shows the 'Distribution key: catid', 'Sort key: catid', and 'Sort type: Compound'. A table lists fields and their types:

	Field	Type	PK	CMP
#	catid	smallint	NN	none
A	catgroup	character varying(10)	NULL	lzo
A	catname	character varying(10)	NULL	lzo
A	catdesc	character varying(50)	NULL	lzo

The main editor area shows a notebook titled 'tickit-sample-notebook'. The top bar includes 'Run all', 'Isolated session' (checked), 'Serverless: de...', and 'sample\_data\_...'. A 'Generative SQL' button is also present. The notebook content is titled 'Sales per event' and contains a SQL query:

```
1 SET search_path to tickit;
2 SELECT eventname, total_price
3 FROM (SELECT eventid, total_price, ntile(1000) over(order by total_price desc) as percentile
4       FROM (SELECT eventid, sum(pricepaid) total_price
5             FROM tickit.sales
6             GROUP BY eventid)) Q, tickit.event E
7 WHERE Q.eventid = E.eventid
8 AND percentile = 1
9 ORDER BY total_price desc;
```

The bottom of the notebook shows 'Total quantity per buyer'. The footer includes 'CloudShell', 'Feedback', and copyright information for Amazon Web Services, Inc. or its affiliates.

# Results After Running the query

The screenshot displays the AWS Redshift Query Editor v2 interface. The top navigation bar includes the AWS logo, 'Services' link, a search bar, and user information 'N. Virginia' and 'Salma\_Salah @ salma-salah'. The left sidebar contains navigation icons for Editor, Queries, Notebooks, Charts, History, Scheduled queries, and a settings icon. The main editor area shows a SQL query in a file named 'Untitled 2':

```
1 SELECT
2   *
3 FROM
4   "sample_data_dev"."tickit"."category";
```

Below the query editor, the 'Result 1 (11)' table is displayed. The table has five columns: catid, catgroup, catname, and catdesc. The results show 11 rows of data, including categories like NHL, Jazz, NBA, MLB, NFL, Opera, Musicals, Classical, MLS, Pop, and Plays.

catid	catgroup	catname	catdesc
2	Sports	NHL	National Hockey League
10	Concerts	Jazz	All jazz singers and bands
4	Sports	NBA	National Basketball Assoc...
1	Sports	MLB	Major League Baseball
3	Sports	NFL	National Football League
8	Shows	Opera	All opera and light opera
6	Shows	Musicals	Musical theatre
11	Concerts	Classical	All symphony, concerto, a...
5	Sports	MLS	Major League Soccer
9	Concerts	Pop	All rock and pop music co...
7	Shows	Plays	All non-musical theatre

At the bottom right, the status bar indicates 'Elapsed time: 248 ms' and 'Total rows: 11'. The footer of the interface includes 'CloudShell', 'Feedback', and copyright information for Amazon Web Services, Inc. or its affiliates, along with links for Privacy, Terms, and Cookie preferences.

# If Want to upload data from S3 Click Load data

The screenshot displays the AWS Redshift Query Editor v2 interface. On the left sidebar, the 'Tables' folder under 'sample\_data\_dev' is expanded, showing a list of tables including 'category', 'date', 'event', 'listing', 'sales', 'users', and 'venue'. The 'category' table is highlighted. In the top right, the 'Load data' button is visible. The main editor area shows a SQL query window with a 'Run' button and a 'Limit 100' toggle. Below the query window, a table of results is displayed, showing 11 rows of data. The table has columns: catid, catgroup, catname, and catdesc. The data includes various sports and entertainment categories like NHL, Jazz, NBA, MLB, NFL, Opera, Musicals, Classical, MLS, and Pop.

**Redshift query editor v2**

Filter resources

Serverless: default-workgroup

- awsdatacatalog
- dev
- sample\_data\_dev
  - ticket
    - Tables (7)
      - category**
      - date
      - event
      - listing
      - sales
      - users
      - venue
    - Views (0)
    - Functions (0)

Run Limit 100 Explain Isolated session

Serverless: de... sample\_data...

Schedule

Result 1 (11)

catid	catgroup	catname	catdesc
2	Sports	NHL	National Hockey Lea
10	Concerts	Jazz	All jazz singers and b
4	Sports	NBA	National Basketball A
1	Sports	MLB	Major League Baseb
3	Sports	NFL	National Football Lea
8	Shows	Opera	All opera and light op
6	Shows	Musicals	Musical theatre
11	Concerts	Classical	All symphony, concer
5	Sports	MLS	Major League Soccei
9	Concerts	Pop	All rock and pop mus

Elapsed time: 248 ms Total rows: 11

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# Choose Bucket and Object and file format

**Load data**

**Data source**

☒ Load from S3 bucket ☐ Load from local file

S3 URI:  [Browse S3](#)

S3 file location  ☐ Manifest file

File format:  [File options >](#)

Delimiter character:   
Specifies the single ASCII character that is used to separate fields in the input file, such as a pipe character (|), a comma (,), or a tab (\t).

☒ Ignore header rows   
Treats the specified number\_rows as a file header and doesn't load them. Use this option to skip file headers in all files in a parallel load.

[Advanced settings](#) [Data conversion parameters >](#) [Load operations >](#)

catname	catdesc
NHL	National Hockey League
Jazz	All jazz singers and bands
NBA	National Basketball Association
MLB	Major League Baseball
NFL	National Football League
Opera	All opera and light opera
Musicals	Musical theatre
Classical	All symphony, concert, and chamber music
MLS	Major League Soccer
Pop	All rock and pop music

Elapsed time: 248 ms Total rows: 1

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# Namespace and workgroup after running query

The screenshot displays the AWS Redshift console interface. At the top, the navigation bar includes the AWS logo, a 'Services' menu, a search bar, and icons for CloudShell, notifications, help, and settings. The region is set to 'N. Virginia' and the user is 'Salma\_Salah @ salma-salah'. The main content area is divided into two sections. The top section, titled 'Namespace', shows details for the 'default-namespace'. The bottom section, titled 'Workgroup', shows details for the 'default-workgroup'. Both sections have tabs for 'Workgroup', 'Data backup', 'Security and encryption', 'Datashares', 'Zero-ETL integrations', 'Resource policy', and 'Tags'. The 'Workgroup' section also includes an 'Actions' button.

Namespace	Status	Admin user name
default-namespace	Available	admin

Namespace ID	Date created	Database name
ae18df1c-cb00-4f18-bb94-b8847277d025	January 15, 2024, 04:54 (UTC+02:00)	dev

Namespace ARN	Storage used	Total table count
arn:aws:redshift-serverless:us-east-1:821594020462:namespace/ae18df1c-cb00-4f18-bb94-b8847277d025	18.9 GB	7

### Workgroup name

Set up compute resources for your workgroup.

Workgroup	Status
default-workgroup	Available

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