

Adding PostgreSQL Data Warehouses

A PostgreSQL data warehouse contains the tables and views that you want to import as fact datasets and dimension datasets into AtScale models. It also contains aggregate table instances that either you or the AtScale engine creates in a database that you specify.

Prerequisites

- ▶ You must be logged in as an admin user.
- ▶ You must know the schema to use for building aggregate tables in the data warehouse. AtScale reads and writes aggregate data to this schema, so the AtScale service account user must have ALL privileges for it. BI tool user accounts should not have the select permission.

Add The Data Warehouse

1. In Design Center, open the main menu and select **Settings**. The **Settings** page opens.
2. In the **Settings** panel, click **Data Warehouses**.
3. In the **Add Data Warehouse** section, click the **PostgreSQL** icon. The **Add PostgreSQL Data Warehouse** panel opens.
4. Enter a unique **Name** for the data warehouse. AtScale displays this name in the Design Center and uses it in log files.
5. (Optional) Enter the name of the **External connection ID**. This field defaults to the **Name** value but can be overridden by enabling the **Override generated value?** option.
6. Enter the name of the **Database**, which AtScale uses when creating aggregate tables. You must create this; AtScale does not create one automatically.
7. Enter the name of the **Aggregate Schema** for AtScale to use when creating aggregate tables. You must create this schema; AtScale does not create one automatically.
8. (Optional) Specify whether the data warehouse is a **Read-only source**.
 - ▶ Select this option if AtScale will be configured to access this database with credentials that do not have permission to create new tables, or if you need to prevent AtScale from placing any aggregate tables in this data warehouse.
 - ▶ If **Read-only source** is enabled upon editing an existing data warehouse with aggregates present, all existing aggregates stored in this data warehouse will be deactivated.
9. In the **Custom function installation mode** field, select **Customer managed** if you set up PostgreSQL in customer managed mode; otherwise, select **None**.
10. If you selected **Customer managed** above, enter the **AtScale UDAF Schema**.
11. Click **Apply**.

Add A PostgresSQL Connection

After setting up your data warehouse, you must add a connection to the data warehouse before you can run queries. You can establish multiple connections with different configurations to the same data warehouse. If multiple connections are configured, you can assign which types of queries are permitted per connection; for details, see [Configuring Query Mapping](#).

To add a PostgresSQL connection:

1. On the **Data Warehouses** page, click the expand icon for your data warehouse.
2. In the **Add Connection** field, click the plus icon. The **Add PostgresSQL Connection** panel opens.
3. Complete the following fields:
 - ▲ **Name:** The name of the connection.
 - ▲ **Host:** The location of the PostgresSQL server.
 - ▲ **Port:** The port number to route transmitted data.
 - ▲ **Database:** The name of the default database to use after connecting.
4. In the **Authorization** section, enter the username AtScale uses when connecting to the data warehouse.
5. In the **Authentication Method** field, select the authentication method to use when connecting to the data warehouse, then complete the credential fields as needed.
6. (Optional) In the **Extra jdbc flags** field, enter the JDBC flags that are needed for the connection.
7. Click **Test connection** to test the connection.
8. Click **Apply**.