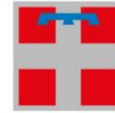




Cofinanziato
dall'Unione europea



REGIONE
PIEMONTE

FinTech Software Developer- 2023/2025

Basi di dati SQL

Docente: Roi Davide Simone

Titolo argomento: Architettura di Postgresql - Installazione e Setup

Roi Davide
Dispense

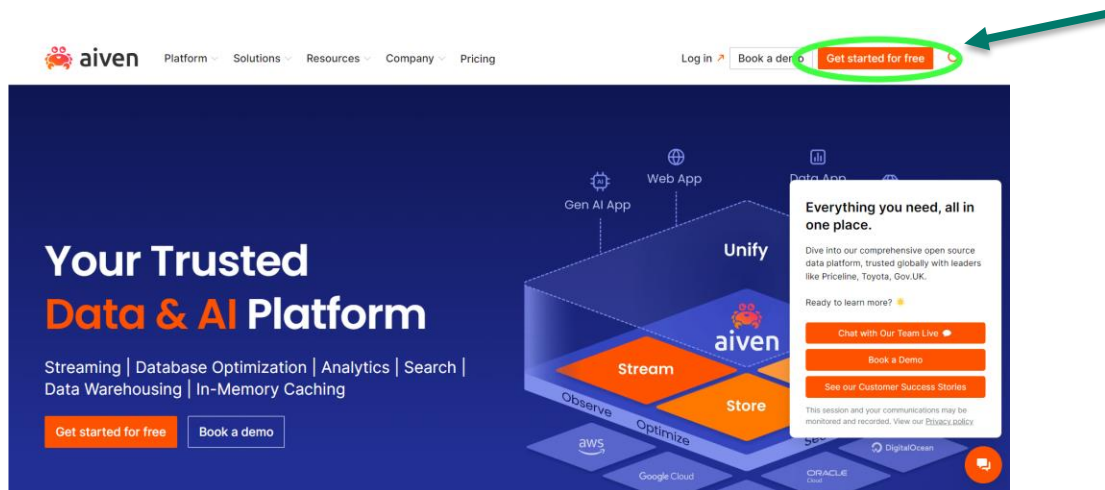
Principali servizi Cloud che offrono PostgreSQL

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Dispense

- AIVEN
- ElephantSQL
- Heroku
- Amazon Web Services (AWS) con Amazon RDS for PostgreSQL
- Google Cloud Platform (GCP) con Cloud SQL for PostgreSQL
- Microsoft Azure con Azure Database for PostgreSQL

CLOUD AIVEN

- Apri l'url: <https://aiven.io/> e clicca su «Get started for free»



CLOUD AIVEN

- Registrati con un utente Google oppure con la tua email

aiven
CONSOLE

Explore Aiven's fully managed open source data platform

Setup Apache Kafka®, PostgreSQL®, OpenSearch® and more in minutes.

No credit card required.


- ✓ Easy setup via web interface, CLI or Terraform
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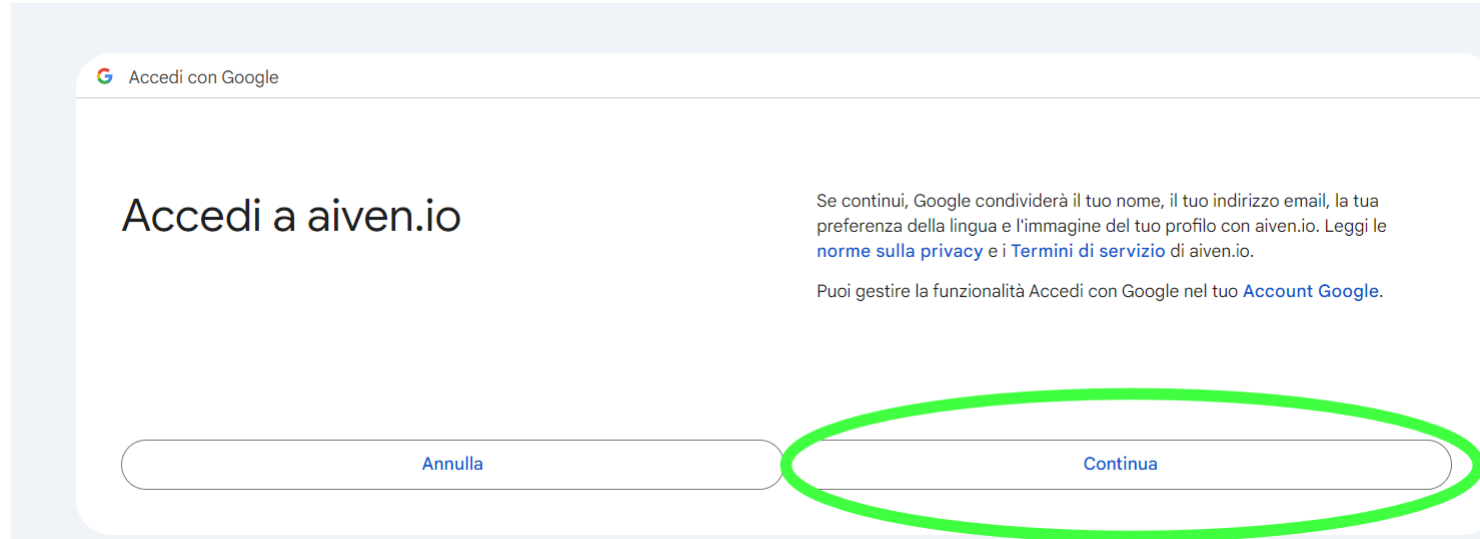
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Dispense


- Clicca su «Continua»




CLOUD AIVEN

- Clicca su «Personal»

How do you plan to use Aiven?

**Personal**
A streamlined experience for individuals. You can always switch to Business later for free.

**Business**
Get access to additional features for your organization at no extra cost.

CLOUD AIVEN

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Dispense

- Insisci il tuo Nome
- Progetto: fintech2024
- Clicca su «Done»

Complete your registration

Set up your profile to get started.

Your name*

Mario Rossi

Name of your first project on Aiven*

Projects let you organize your services into collections. You can create more projects later.

fintech2024

Country*

Italy

Newsletter signup

☐ Subscribe to our newsletter for product updates and open source news

Done

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Dispense

- Clicca in basso a SX su «PostgreSQL»

PROJECT
fintech2024

Services

Integration endpoints

VPCs

Event log

Members

Settings

My Organization / fintech2024 / Services

Services

Create example data pipeline

Combine multiple services into a data pipeline with this example guide.

Create example data pipeline

Create new service

PostgreSQL®
PostgreSQL - High-performance relational database with advanced extensions

MySQL
MySQL - Popular general-purpose easy-to-use relational database

Redis™*
Redis - In-memory, key-value NoSQL database


CLOUD AIVEN

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Dispense

- Clicca su: «Free plan» e poi su «Create free service»

[< Back](#)

Create PostgreSQL® service

 **PostgreSQL®** Version 15 ▾

PostgreSQL - High-performance relational database with advanced extensions

Free
Free plan

- One free managed PostgreSQL service
- Good for building a small application and learning to use cloud databases
- No credit card required

1
☒ **Trial**
Full platform

- 30-day trial with \$300 of free usage included
- Good for proof of concepts and testing Aiven for production use cases
- No credit card required

1. Select service region

Asia Pacific Australia **Europe** North America

Service summary

Name
pg-2b0a15a3

Service
 PostgreSQL 15

Cloud
 DigitalOcean

Region
Europe, Netherlands - DigitalOcean: Amsterdam

Plan
Free-1-5gb
@ 1 CPU @ 1 GB RAM @ 5 GB storage
@ backups for disaster recovery @ 1 node

Monthly price
\$0 USD

2
Create free service

CLOUD AIVEN

- Clicca per 3 volte il basso su «Skip the step»

- Connection details
- Secure connection
- Add data
- Extensions

SERVICE

- PostgreSQL 15
- Europe, Netherlands - DigitalOcean: Amsterdam

DEPLOYMENT STATUS

- Nodes 1
- Rebuilding

Connection details

</> Developer tooling

You can connect to and manage your Aiven services programmatically using the Aiven CLI, API, Terraform provider, or Kubernetes operator.

- [Aiven CLI docs](#)
- [API documentation](#)
- [Aiven Terraform provider docs](#)

Connect with:

General

Service URI	postgres://CLICK_TO_REVEAL_PASSWORD@pg-2b0a15a3-fintech2024.h.aivencloud.com:25084/defaultdb?sslmode=require	📄
Database name	defaultdb	📄
Host	pg-2b0a15a3-fintech2024.h.aivencloud.com	📄

Skip this step

Next: Secure connection

CLOUD AIVEN

- Clicca in basso su «Finish setup»



- Connection details
- Secure connection
- Add data
- Extensions

SERVICE

- PostgreSQL 15
- Europe, Netherlands - DigitalOcean: Amsterdam

DEPLOYMENT STATUS

- Nodes 1
- Rebuilding

Popular extensions

Aiven supports more than +70 PostgreSQL extensions. Any Aiven supported extension can be installed by the `avnadm CREATE EXTENSION <EXTENSION_NAME> CASCADE;` command.

See all Aiven supported extensions or learn how to install and update extension from our [documentation](#).

bloom

Bloom access method - signature file based index.

pgcrypto

Cryptographic functions.

timescaledb

Enables scalable inserts and complex queries for time-series data.

pg_stat_statements

Track planning and execution statistics of all SQL statements executed.

pg_repack

Reorganize tables in PostgreSQL databases with minimal locks.

pg_cron

Job scheduler for PostgreSQL.

avien_extras

Enabling the database administrator to perform superuser-like functionalities.

tablefunc

Functions that manipulate whole tables, including crosstab.

postgres_fdw

Foreign-data wrapper for remote PostgreSQL servers.

Finish setup

CLOUD AIVEN

- Nell'ultima schermata trovi tutti i dati per configurare il client DBEAVER

The screenshot shows the Aiven console interface. On the left is a sidebar with navigation links: Overview, Integrations, Metrics, AI insights, Logs, Query statistics, Current queries, Users, Databases, Pools, Backups, and Service settings. The main area displays 'Connection information' for a PostgreSQL service. The values for 'Database name', 'Host', 'Port', 'User', and 'Password' are highlighted with green circles. The 'Password' field is masked with asterisks and has a 'Show' button next to it. A 'Quick connect' button is located in the top right corner of the connection information section.

Field	Value
Service URI	postgres://CLICK_TO_REVEAL_PASSWORD@pg-2b0a15a3-fintech2024.h.aivencloud.com:25084/defaultdb?sslmode=require
Database name	defaultdb
Host	pg-2b0a15a3-fintech2024.h.aivencloud.com
Port	25084
User	avnadmin
Password	*****
SSL mode	require
CA certificate	Show

CLOUD AIVEN

Roi Davide
Dispense

Fine della Presentazione