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Uncover Hidden Patterns in Data with a Graph Database

Traditional relational databases impose a rigid structure that doesn't handle data relationships well.

A graph database, like Neo4j AuraDB, offers flexibility, making it easy to map and analyze relationships between data entities. This leads to deep contextual insights and accurate analysis that significantly speeds up app development.

By design, AuraDB's native graph model stores and connects data efficiently. The flexible schema adapts to your evolving needs and data landscapes with minimal disruption. You can change the data and app requirements without refactoring the database or rewriting the app code.

Improve Analytics and Uncover Hidden Patterns

With AuraDB, you can quickly uncover hidden patterns in your data without JOINs using Cypher query language and advanced graph algorithms. Graph algorithms analyze interconnected relationships 1000x faster than relational databases.

Reveal hidden patterns and relationships in your data, predict trends, and make informed business decisions.

Deploy on a Scalable, Reliable, and Secure Infrastructure

Scalable

Using AuraDB instances with up to 512GB of RAM, you can manage datasets of varying sizes while tackling memory-intensive workloads. For read-intensive use cases, you can spin up "secondaries," which are analogous to horizontal scaling of existing Aura instances.

Reliable

Ensure redundancy and fault tolerance by maintaining multiple replicas of the database distributed across these nodes. **Benefit from a 99.95% uptime guarantee ensured by the self-healing cluster architecture.**

Secure

AuraDB supports comprehensive access controls, encryption, and compliance with industry standards like ISO 27001, ISO 20243, SOC2 Type2, SOC3, GDPR, and HIPAA. This ensures data security and regulatory compliance.

Empowering Companies with Neo4j AuraDB

Apiax

"AuraDB enables us to run our Neo4j instance with zero maintenance, allowing us to fully focus on our clients."

–Thomas Suter, CTO at Apiax

Dun & Bradstreet

"AuraDB aligns well with Dun & Bradstreet's cloud strategy and helps us to deliver the deep knowledge our clients need to take intelligent actions based on timely compliance decisions."

–Matthew Voss, Identity Insights Leader at Dun & Bradstreet
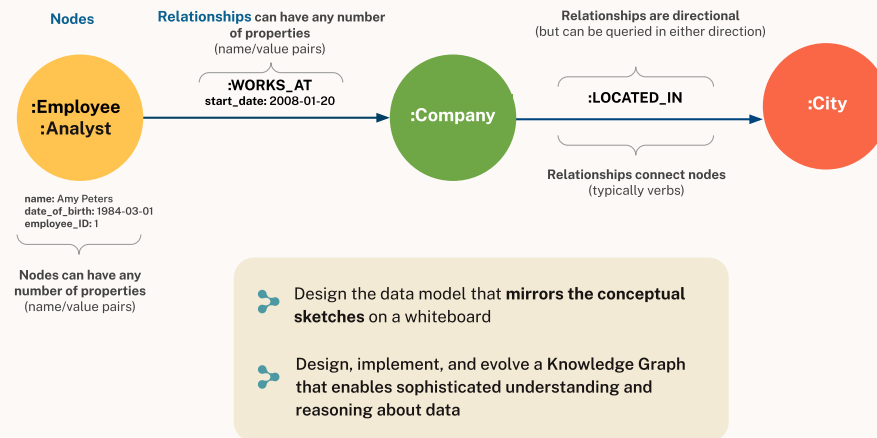
Department of Education

"Our Neo4j graph creates a shared view of our service landscape, which we use to find ways to reuse capability, improve usability, and rationalize, delivering better-value services for our users. It helps us visualize our data and the opportunities in one place, so we can focus our efforts on streamlining our service delivery and operations."

–Luke Slowen, Enterprise Architect at Department of Education

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Scalability and Flexibility With a Property Graph Model

Neo4j AuraDB's property graph model stores and connects data in nodes, preserving relationships and context. Unlike traditional databases that require slow JOINs, AuraDB provides quick access to connected data. Its flexible schema allows easy scaling and seamless addition of new datasets as business needs evolve

Nodes

Relationships can have any number of properties (name/value pairs)

:WORKS_AT
start_date: 2008-01-20

Relationships are directional (but can be queried in either direction)

:Employee :Analyst

:Company

:LOCATED_IN

:City

name: Amy Peters
date_of_birth: 1984-03-01
employee_ID: 1

Relationships connect nodes (typically verbs)

Nodes can have any number of properties (name/value pairs)

Design the data model that **mirrors the conceptual sketches** on a whiteboard

Design, implement, and evolve a Knowledge Graph that enables sophisticated understanding and reasoning about data

Seamless Data Integration With Tools Ecosystem

Neo4j AuraDB's tools ecosystem enhances the developer experience, offering a fully managed database with zero admin work, so you can focus on building impactful apps. With extensive connectors, drivers, and integrations, it's easy to integrate into data pipelines for real-time and offline use cases. Neo4j is the top choice for adding graph features to your ML and feature store pipeline. Plus, developers can start right away with a free database, perfect for building, innovating, and scaling in the Cloud.

A Property Graph Offers:

Simplicity:
A property graph model is easy to design, implement, and use

Accuracy:
Data entities and their connections accurately reflect your business domain.

Speed:
Build intelligent apps fast and easily.

Interoperability:
AuraDB integrates with any modern database system, including relational and document stores.

Standards Compliance:
ISO GQL offers the same confidence for graph implementations as ISO SQL does for relational databases.

Start Your Graph Journey.

Learn More at
neo4j.com/product/auradb

Build Your Critical Apps on AuraDB

Build Apps With Ease
- Native Graph Model
- Flexible Schema
- Cypher Query Language
- Query Planner
- Productivity Tools

Uncover Hidden Patterns in Data
- Match Patterns in Data
- Index-Free, Fast Traversals
- Diverse Workloads
- Enrich Predictions & Insights
- Visualize Graph Data

Zero Administration
- Scalable, Multi-Node Cluster
- 99.95% Uptime SLA
- Data Protection
- Tools Ecosystem
- Event-Driven Architecture