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Data & Analytics
Skills Tracker

Track your AWS data skills development

Empower yourself with the knowledge to harness one of the world's most valuable resources—data. As organizations rapidly expand their data infrastructure, a data skills gap has emerged. AWS Training and Certification provides access to a wide range of digital on-demand and virtual classroom courses to help you learn sought-after data skills to fill the skills gap and advance your career. This Skills Tracker provides an overview of the courses and their content while you follow the recommended sequence of courses to build your data and analytics skills.
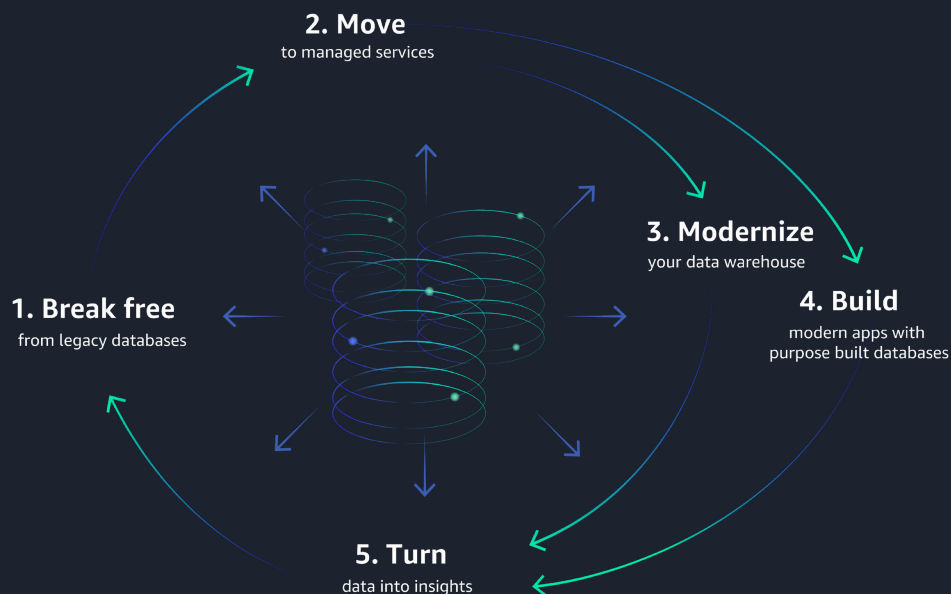
Track your progress as you move through your data and analytics learning journey. From learning how to build data lakes on AWS to exploring the visualization of data, get ready to become the data champion at your organization.

The AWS Data Flywheel

The AWS Data Flywheel provides a comprehensive and insightful approach to help you get the most value from your data. The AWS Data & Analytics Skills Tracker maps specific AWS Training courses to each step of the Data Flywheel.

Start at the step that aligns with your skills and knowledge, where you'll discover three AWS Training courses that provide insight and knowledge for each step. Complete the courses within each step in any order.

2. Move
to managed services

3. Modernize
your data warehouse

4. Build
modern apps with
purpose built databases

1. Break free
from legacy databases

5. Turn
data into insights

Step 1. Break free of legacy databases

Discover the value of moving from legacy databases, gain an overview of different databases on AWS, and learn how to migrate a production database.

Step 2. Move to managed services

Become familiar with the database migration process, discover the process of designing databases, and learn strategies to perform migrations to AWS.

Step 3. Modernize your data warehouse

Learn about implementing a data warehouse using Amazon Redshift and discover cloud-based big data solutions.

Step 4. Build modern apps with purpose-built databases

Explore how to use purpose-built databases in the AWS Cloud. Discover how to interact with and leverage Amazon DynamoDB for serverless architectures.
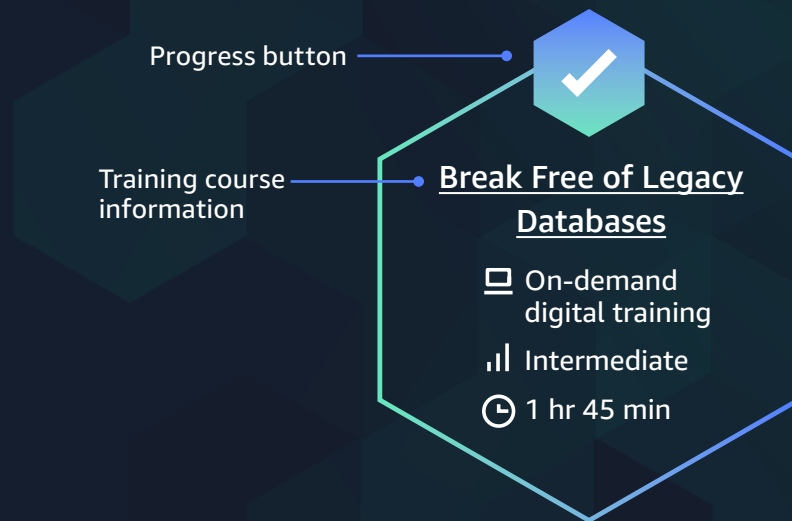
Step 5. Turn data into insights

Discover how to build data lakes on AWS, learn typical data science processes, and become familiar with data visualization techniques.

How to use the AWS Data & Analytics Skills Tracker

Unlock any insight with courses from the AWS Data & Analytics Skills Tracker. The courses run in tandem with the steps of the AWS Data Flywheel:

1. **Break free of legacy databases**
2. **Move to managed services**
3. **Modernize your data warehouse**
4. **Build modern apps with purpose-built databases**
5. **Turn data into insights**

Look for symbols and icons on the course chart to find out about course lengths and training methods (digital or classroom). Discover specific skills you'll learn and use the map to track your progress. Select each course title to learn more about it. Then take the next step to transform your data and analytics skills to unlock any insight.

Progress button

Training course information

Break Free of Legacy Databases

🖥 On-demand digital training

📊 Intermediate

🕐 1 hr 45 min

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Use the course chart to track the skills you've gained

Break Free of Legacy Databases

Break Free of Legacy Databases
- 🖥 On-demand digital training
- 📊 Intermediate
- 🕐 1 hr 45 min

AWS Database Offerings
- 🖥 On-demand digital training
- 📊 Fundamental
- 🕐 5 hr 30 min

Introduction to Database Migration
- 🖥 On-demand digital training
- 📊 Fundamental
- 🕐 45 min

Move to Managed Services

Moving to Managed Databases on AWS
- 🖥 On-demand digital training
- 📊 Intermediate
- 🕐 4 hrs

Planning and Designing Databases on AWS
- 🖥 Classroom training
- 📊 Intermediate
- 🕐 3 days

AWS Foundations: Strategies and Tools to Perform Large-Scale Migrations
- 🖥 On-demand digital training
- 📊 Fundamental 🕐 1 hr

Modernize your data warehouse

Best Practices for Data Warehousing with Amazon Redshift
- 🖥 On-demand digital training
- 📊 Intermediate 🕐 30 min

Data Warehousing on AWS
- 🖥 Classroom training
- 📊 Intermediate
- 🕐 3 days

Big Data on AWS
- 🖥 Classroom training
- 📊 Intermediate
- 🕐 3 days

Build Modern Apps with Purpose Built Databases

Build Modern Apps with Purpose-Built Databases
- 🖥 On-demand digital training
- 📊 Intermediate
- 🕐 3 hrs

Application Development using AWS DynamoDB
- 🖥 On-demand digital training
- 📊 Intermediate
- 🕐 1 hr 30 min

Amazon DynamoDB for Serverless Architectures
- 🖥 On-demand digital training
- 📊 Fundamental
- 🕐 2 hrs

Turn data into insights

Building Data Lakes on AWS
- 🖥 Classroom training
- 📊 Intermediate
- 🕐 1 day

Visualizing with QuickSight
- 🖥 On-demand digital training
- 📊 Fundamental
- 🕐 4 hrs

Practical Data Science with Amazon SageMaker
- 🖥 Classroom training
- 📊 Intermediate
- 🕐 1 day

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Discover AWS Training and Certification courses in more detail

Break Free of Legacy Databases

Sign up or start this course »

About this course

Learn the value and process of moving from legacy databases into cloud-native databases in this three-course curriculum. Discover why you would want to break free of legacy databases, and learn key factors to consider in choosing a cloud-native database.

Skills learned

✔ Value of using cloud-native databases
✔ Value of moving from a legacy database to a cloud-native solution
✔ Migrating using Amazon Aurora and Amazon DynamoDB

🖥 On-demand digital training

📊 Intermediate

🕐 1 hr 45 min

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AWS Database Offerings

Sign up or start this course »

About this course

Gain an overview of different database technologies and architectures. Get familiar with various AWS database services and purpose-built databases.

Skills learned

✔ Nature of data
✔ Relational databases
✔ Non-relational databases
✔ Database migration

🖥 On-demand
   digital training

📊 Fundamental

🕐 5 hrs 30 min

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Introduction to Database Migration

Sign up or start this course »

About this course

Learn how to migrate a production database using AWS Database Migration Service (AWS DMS). Become familiar with the full database migration process, from envisioning to post-production support.

Skills learned

✔ Migrate a production database
✔ Use AWS Schema Conversion Tool (AWS SCT) to help you migrate
✔ Use AWS DMS to do an initial move

⌨ On-demand digital training

ᵢₗ Fundamental

🕐 45 min

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Moving to Managed Databases on AWS

Sign up or start this course »

About this course

In this eight-course curriculum, you'll gain an overview and clear perspective on the entire database migration process. Discover the value and process of moving from self-managed databases (on premises or in the cloud) into fully managed AWS database solutions.

Skills learned

✔ Identify factors to consider when moving to a managed database
✔ Migrate from Microsoft SQL Server to Amazon RDS
✔ Migrate from Oracle to Amazon RDS
✔ Migrate from PostgreSQL to Amazon RDS

🖥 On-demand digital training

📊 Intermediate

🕐 4 hrs

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Planning and Designing Databases on AWS

Sign up or start this course »

About this course

This course introduces you to the process of planning and designing for both relational and nonrelational databases. Become familiar with all AWS database services to discover which is right for your workloads.

Skills learned

✔ Design considerations for hosting databases on Amazon Elastic Compute Cloud (Amazon EC2)
✔ Learn about Amazon RDS, Amazon Aurora, and Amazon Redshift
✔ Learn about Amazon DocumentDB, Amazon DynamoDB, and Amazon ElastiCache

Classroom training

Intermediate

3 days

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AWS Foundations: Strategies and Tools to Perform Large-Scale Migrations

Sign up or start this course »

About this course

Learn about AWS's strategies and discover proven techniques to make migrations successful. Become familiar with best practices for performing large-scale migrations synthesized from AWS's experience with helping hundreds of enterprise customers.

Skills learned

✔ The migration process
✔ Migration Readiness Assessment and Planning process
✔ Common application migration strategies
✔ Tools and services to accelerate the process

⌨ On-demand digital training

⬛ Fundamental

🕐 1 hr

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Best Practices for Data Warehousing with Amazon Redshift

Sign up or start this course »

About this course

Discover the concepts of implementing a data warehouse using Amazon Redshift. Learn best practices, including basic table design and data storage.

Skills learned

✔ Data ingestion techniques
✔ Workload management
✔ Effect of node and cluster sizing

🖥 On-demand digital training

📊 Intermediate

🕐 30 min

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Data Warehousing on AWS

Sign up or start this course »

About this course

Discover best practices, concepts, and strategies for designing a cloud-based data warehousing solution using Amazon Redshift. Learn how to collect, store, and prepare data for the data warehouse using other AWS services.

Skills learned

✔ Designing a warehousing solution for AWS
✔ Collecting, storing, and preparing data for data warehouse
✔ Amazon QuickSight for performance analysis

Classroom training

Intermediate

3 days

aws training and certification

Big Data on AWS

Sign up or start this course »

About this course

This course provides you with an introduction to cloud-based big data solutions. Learn how to use Amazon EMR to process data using the broad ecosystem of Hadoop tools. Discover how to create big data environments and leverage best practices for security and cost-effectiveness.

Skills learned

✔ Cloud-based big data solutions
✔ Amazon Elastic MapReduce (EMR), Amazon Redshift, Amazon Kinesis
✔ Create big data environments
✔ Amazon Athena and Amazon Kinesis

Classroom training
Intermediate
3 days

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Build Modern Apps with Purpose-Built Databases

Sign up or start this course »

About this course

Discover the value and process of using purpose-built databases in the AWS Cloud in this six-course curriculum. Learn how to explain the value of using purpose-built databases to meet specific application needs. Identify the factors you need to consider when choosing purpose-built databases.

Skills learned

✔ Design an Amazon DynamoDB database for a restaurant review and rating application
✔ Add caching to your restaurant review and rating application using Amazon ElastiCache
✔ Add a fraud-detection service with Amazon Neptune for storage
✔ Manage marketing resources with Amazon DocumentDB

🖥 On-demand digital training

📊 Intermediate

🕐 3 hrs

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Application Development Using AWS DynamoDB

Sign up or start this course »

About this course

This first in the series for DynamoDB for Developers curriculum teaches you how to begin interacting programmatically with DynamoDB tables and data stored within them. Gain an understanding of the nonrelational, or NoSQL, mindset in using DynamoDB features to develop performant solutions.

Skills learned

✔ Learn how to install and use DynamoDB Local
✔ Learn how to install and use the AWS Command Line Interface (AWS CLI)
✔ Learn how to install and use the AWS Software Development Kits (SDKs)
✔ Become familiar with Python, Java, Node.js, and .NET

On-demand digital training & hands-on lab

Intermediate

1.5 hrs

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Amazon DynamoDB for Serverless Architectures

Sign up or start this course »

About this course

Leverage Amazon DynamoDB to build a serverless architecture in this in-depth and hands-on introduction. Learn how to set up and access core DynamoDB components when creating a serverless application.

Skills learned

Build Serverless Architecture using DynamoDB and other AWS services:

✔ Use DynamoDB features to provide serverless solutions
✔ Set up and access Amazon DynamoDB
✔ Design and architect a serverless application
✔ Differentiate SQL from NoSQL database systems
✔ Migrate from existing RDMS to Amazon DynamoDB
✔ Monitor performance using Amazon CloudWatch, AWS CloudTrail, CloudWatch Logs, etc.

🖥 On-demand digital training
📊 Fundamental
🕐 2 hrs

Building Data Lakes on AWS

Sign up or start this course »

About this course

Learn how to build an operational data lake that supports analysis of both structured and unstructured data. Discover the components and functionality of the services involved in creating a data lake. Utilize AWS Lake Formation to build a data lake.

Skills learned

✔ Learn AWS Lake Formation
✔ Learn AWS Glue to build a data catalog
✔ Learn Amazon Athena to analyze data
✔ Explore several common data lake architectures

Classroom training

Intermediate

1 day

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Visualizing with QuickSight

Sign up or start this course »

About this course

This course introduces you to the technical side of business intelligence and data visualization. Discover how to build and share interactive dashboards and analyses with Amazon QuickSight. Learn how to embed dashboards into applications and websites.

Skills learned

✔ Technical overview of data visualization via QuickSight
✔ Connect and prepare data for visualization
✔ Create visual analyses and dashboards

On-demand digital training

Fundamental

4 hrs

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Practical Data Science with Amazon SageMaker

Sign up or start this course »

About this course

Solve a real-world use case with machine learning and produce actionable results using Amazon SageMaker. Learn how to cover different stages of the typical data science process, including analyzing and visualizing a dataset.

Skills learned

✔ Solve real-world cases using SageMaker
✔ Use SageMaker to prepare data and feature engineering
✔ Practical aspects of model building, training, tuning, and deployment

Classroom training

Intermediate

1 day

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Validate your data and analytics skills

Showcase your AWS data and analytics skills with an industry-recognized credential. Become a data champion and prove to business leaders your ability to drive innovation with two AWS Certifications.

AWS Certified Database - Specialty

Register now »

About this certification

Validate your ability to recommend, design, and maintain the optimal AWS database solution. Attain an industry-recognized credential to advance your career.

AWS Certified Data Analytics - Specialty

Register now »

About this certification

Validate your technical skills to design, build, secure, and maintain analytics solutions using AWS. Receive an industry-recognized credential for AWS analytics skills.

Learn more about the diverse range of certification exams and how AWS empowers individuals to meet their goals.

Explore the certifications »

Unlock any insight using the full value of data and analytics

Unveiling insights and understanding the reasoning behind every data point informs smarter decisions, advances careers, and helps your business grow. AWS Training and Certification can help you build the skills to become data-fluent, to unlock any insight, and to deliver transformative business value. All you need to do is start training today.

Get started »

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