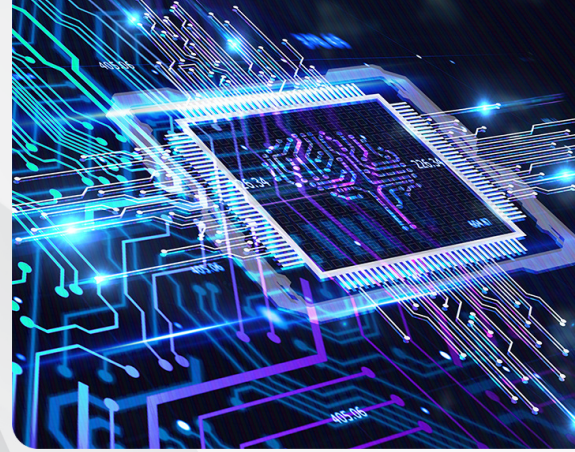


The Machine Learning Pipeline

Course Benefits & Agenda



Overview

1

Course Benefits

1

Agenda

2

Overview

In this course, students walk through each phase of the machine learning (ML) pipeline with Amazon SageMaker. They learn how to frame business problems as ML problems and how to use Amazon SageMaker to train, evaluate, tune, and deploy ML models. Hands-on learning is a key component of this course. Students choose a course project to work on and then apply the knowledge and skills they learn from course instruction to their chosen projects.

Course Benefits

This course teaches you how to:

- Select and justify the appropriate ML approach for a given business problem
- Use the ML pipeline to solve a specific business problem
- Train, evaluate, deploy, and tune an ML model in Amazon SageMaker
- Describe some of the best practices for designing scalable, cost-optimized, and secure ML pipelines in AWS
- Apply machine learning to a real-life business problem after the course is complete

Agenda

Day 1

Module	Topic
Module 1	Introduction Pre-assessment
Module 2	Introduction to Machine Learning and the ML Pipeline
Module 3	Introduction to Amazon SageMaker
Lab 1	Introduction to Amazon SageMaker
Module 4	Problem Formulation
Module 5	Exercise and Review Project Work (Problem Formulation)

Day 2

Module	Topic
Module 6	Recap and Checkpoint #1
Module 7	Data Preprocessing
Module 8	Data Preprocessing, continued
Lab 2	Data Preprocessing (including project work)
Module 9	Model Training

Agenda

Day 3

Module	Topic
Module 10	Recap and Checkpoint #2
Module 11	Model Evaluation
Lab 3	Model Training and Evaluation (including project work)
Module 12	Project Share-Out 1
Module 13	Feature Engineering and Model Tuning

Day 4

Module	Topic
Lab 4	Feature Engineering (including project work)
Module 14	Recap and Checkpoint #3
Module 15	Model Deployment
Module 16	Project Share-Out 2
Module 17	Post-Assessment