



# Welcome to Machine Learning

**ANI\_104d | On-Demand | Automation and Insights | Express**

**Course Duration:** 1 hour

In the age of Automation and Artificial Intelligence, Machine Learning, or ML, has become the dominant AI approach. This course provides an overview of Machine Learning and how it is used within the telecom industry. A high-level description of the training process is also explored.

## Intended Audience

This course provides an overview of AI technology with an emphasis on Machine Learning for a broad audience – both technical and non-technical.

## Objectives

After completing this course, the student will be able to:

- Define key AI terms
- Describe basic operations of training an AI model
- Describe the structure of a basic ML model
- Describe the lifecycle of an AI project
- List key steps in ML model development
- Explain common use cases for machine learning

## Course Prerequisites

No Prerequisites

## Outline

1. What is Machine Learning?
  - 1.1 What is Machine Learning?
  - 1.2 What is an AI Model?
  - 1.3 An End User View
2. Use Cases
  - 2.1 Telecom Use Cases
  - 2.2 Dig Deeper: Other Use Cases
3. Basic AI Model Design
  - 3.1 Basic AI Model Design
  - 3.2 Types of Machine Learning
4. AI and Automation Lifecycle
  - 4.1 AI Models Defined
  - 4.2 Frame the ML Problem
  - 4.3 Data Gathering and Preparation
  - 4.4 Model Creation
  - 4.5 Training the Model
  - 4.6 Apply and Deploy

Final Assessment