

Tuesday, May 7th 2019 - from 13:30 to 18:00
Corso Castelfidardo, 42/a - Maxwell Room - 5th Floor DET

Workshop: Amazon AWS Cloud Services - Technologies and Opportunities

ABSTRACT

This workshop is organized to understand all the **opportunities offered by cloud solutions** and **AWS** in particular. We will discuss technical details about the infrastructure, virtualization services, storage solutions and finally deep dive on Machine Learning/Deep Learning accelerating infrastructure.

The technical depth targets researchers, PhD students and IT experts willing to get a focus on Amazon cloud solutions.

This workshop is organized in collaboration with **CSP innovazione nelle ICT** and **project Smart-Space**.

AGENDA

Welcome introduction

- ✔ Presentation of HCP4AI Project: a new infrastructure for collaboration with SME in Piedmont
(Marco Mellia - SmartData@Polito)
- ✔ IoT, Satellites and Big Data: which challenges?
(Roberto Borri - CSP innovazione nelle ICT)

Introduction to AWS global infrastructure

- ✔ The Regions
- ✔ The Availability Zones
- ✔ The Global Network
- ✔ The Points of Presence

AWS Compute services

- ✔ Virtual Private Cloud (VPC)
- ✔ Elastic Cloud Compute (EC2)
- ✔ Container Services (ECS, ECR, Fargate)
- ✔ Lambda Functions

AWS Storage services

- ✔ Simple Storage Service (S3) object store
- ✔ Elastic Block Storage (EBS)
- ✔ Elastic File Services
- ✔ FXs for Lustre and FXs for Windows

AWS Machine Learning and Deep Learning services

- ✔ ML/DL Stack on AWS
- ✔ The Amazon Machine Image and EC2 for ML/DL
- ✔ SageMaker
- ✔ MLaaS

