



Cloud Security Workshop

June 23th, 2019
8:30-18:00

Lecturer: Moshe Ferber



Syllabus:

This course is broken up into 6 modules that cover the 14 domains of the CSA Guidance and the ENISA Cloud Computing: Benefits, Risks and Recommendations for Information Security.

Module 1. Introduction to Cloud Computing:

This module covers the fundamentals of cloud computing, including definitions, architectures, and the role of virtualization. Key topics include cloud computing service models, delivery models, and fundamental characteristics. It also introduces the Shared Responsibilities Model and a framework for approaching cloud security.

Module 2. Infrastructure Security for Cloud Computing:

This module digs into the details of securing the core infrastructure for cloud computing- including cloud components, networks, management interfaces, and administrator credentials. It delves into virtual networking and workload security, including the basics of containers and serverless.

Module 3. Managing Cloud Security and Risk:

This module covers important considerations for managing security for cloud computing. It begins with risk assessment and governance, then covering legal and compliance issues, such as discovery requirements in the cloud. It also discusses important CSA risk tools including the CAIQ, CCM, and STAR registry.

Module 4. Data Security for Cloud Computing:

One of the biggest issues in cloud security is protecting data. This module covers information lifecycle management for the cloud and how to apply security controls, with an emphasis on public cloud. Topics include the Data Security Lifecycle, cloud storage models, data security issues with different delivery models, and managing encryption in and for the cloud, including customer managed keys (BYOK).



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Module 5. Application Security and Identity Management for Cloud Computing:

This module covers identity management and application security for cloud deployments. Topics include federated identity and different IAM applications, secure development, and managing application security in and for the cloud.

Module 6. Cloud Security Operations:

This module covers key considerations when evaluating, selecting, and managing cloud computing providers. This also discusses the role of Security as a Service provider and the impact of cloud on Incident Response.



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