

# **ACE Cloud Security**

**ACE Solutions Architecture Team** 

## Break the ice



- Your name and job title?
- Cloud Experience?



## Course Overview and Learning Objectives



#### **Overview:**

- Business-critical apps need advanced security controls with resiliency
- Customers need "cloud-friendly" and "modernized" security solutions.
- Overview of cloud security with a simple and repeatable approach
- Augment CSP features with consistent security designs

#### **Learning Objectives:**

- Design a Resilient Zero Trust Network Architecture (ZTNA)
- https://www.nist.gov/publications/zero-trust-architecture
- Learn the advantages of using a distributed security model over a centralized model
- Learn the cost optimization tips and tricks while improving security.
- Best practice, repeatable security design for single, multiple, and hybrid clouds.





#### **ACE Learning Paths**





Design and Deploy cloud networks solving cloud networking pain points (3 Days ILT)



Troubleshoot real-world Day 2 cloud and on-prem issues (2 Days ILT)



Design a highly available, scalable, and secure multi-cloud architecture (in-person)



NEW

Learn CSP networking basics and review Aviatrix features. Mandatory course. Starting point of your cloud networking journey.

(5 Hours Self-Pace)

**AVIATRIX** 

**ACE** 

**ASSOCIATE** 



Build a CSP agnostic cloud backbone for secure hybrid cloud connectivity (1 Day ILT)



Learn to secure internet egress traffic and build Zero Trust Cloud Network (1 Day ILT)



Use GitHub and Terraform to build, repeatable, and secure infrastructure (1 Day ILT)



Create secure and highperformance hybrid cloud solutions using Aviatrix Edge (1 Day ILT)

**SUBJECT MATTER LEARNING PATH** 



## How to Get the ACE Security Certificate





ACE Associate is pre-req Attend the training.

Pass the Quiz. 17 questions. 76% passing score. Retake allowed. Few questions Based on the lab pod Complete the Survey

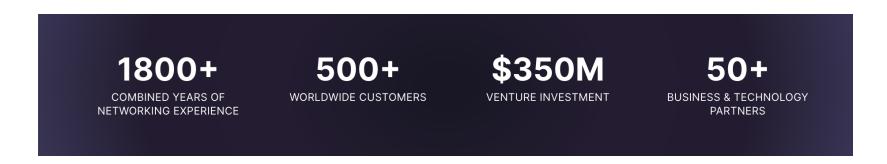
Please do not share the Quiz and Survey links outside of this group



### Who is Aviatrix?



"Aviatrix: Simplify Your Cloud Networking and Network Security, Break Free from CSP Lock-In, Lead the Digital Transformation, and Save Costs!"



#### **Awards & recognition**

Aviatrix continues to receive recognition and accolades from the most trusted authorities across business, cloud, and security communities.













# **Enterprises Pick Cloud Networking Leader Aviatrix**



<b>Abbott</b>	abbvie	Adobe ®	Afrac.	<i>⇔</i> ABInBev	( APPTIO	0000	AVIS® Budget®	BAKER HUGHES a GE company	BankUnited
ВНР	Biogen.	BNY MELLON	CHOICE	<b>CENTENE</b> ° Corporation	CHANGE HEALTHCARE	chewy.com	CHS	Constellation Brands	covetrus 📞
Cummins	DELL	dōTERRA	TECHNOLOGY	e·on	FACTSET.	FEMA	Ford	Genworth	GN
GUIDEWIRE	<del>**</del> Heineken	Home Office	<b>IHG</b> <sup>®</sup>	Informatica	inmarsat	Johnson Controls	Jefferies	Lufthansa Systems	lululemon
<b>LG</b>	Mercedes-Benz	NASA	navitaire an amadeus company	at	NIKE	<b>PACCAR</b>	pwc	Raytheon Technologies	RheinEnergie
Roche	salesforce	SIEMENS	splunk>	Takeda	THALES	UNITED AIRLINES	VERINT.	WiX	VARA





## Rizwan Jamal

Rizwan Jamal is highly experienced Senior Solutions Architecture at <u>Aviatrix</u>. He is an expert on hybrid and public cloud networking

With over 25 years of experience in the technology sector, Rizwan has established himself as SME in Cloud Computing, Datacenters and Colocation networking services.

His past career highlights include:

- Principal Network Architect at Equinix, where he was responsible for global network architecture and engineering, introducing innovative solutions like Intent-based Programmable Network for Equinix Interconnection services.
- Senior Service Engineer at Microsoft, where he was a senior member of the NIS design team, developing scalable and cost-effective network designs for Microsoft's internal datacenters and worldwide network.
- Network Consulting Engineer at Cisco, where he was responsible for designing and building core networking for large enterprises and telcos such as Bell Canada.



https://linkedin.com/in/rizwan-j-35429723





## Joe Amendolara

Joe Amendolara is a Senior Solutions Architect - ACE at Aviatrix, bringing a wealth of experience in network engineering and design. As a Cisco Certified Internetwork Expert (CCIE), Joe possesses deep technical knowledge and expertise in advanced networking concepts.

Prior to joining Aviatrix, Joe held significant positions at Orange Business Services as a Senior Infrastructure Integration Solution Consultant and at Huawei Technologies as an IP Solution Sales Manager. His experience also includes roles at Whirlpool Corporation and Dimension Data, where he honed his skills in network engineering and service delivery management.

Joe's technical expertise spans various areas, including:

- Multicloud Networking and Security
- QoS and Multicast implementation
- IPv6 solutions deployment
- Cisco ACI (Application Centric Infrastructure)



https://linkedin.com/in/joe-amendolara



# Aviatrix ACE Security Course Agenda



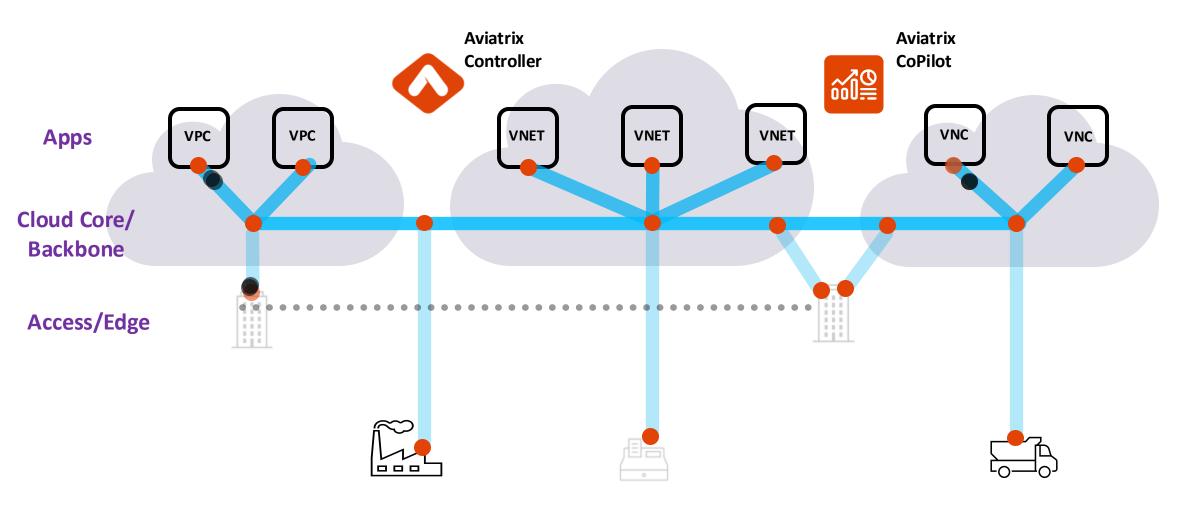
Topics	Approx. Duration (Minutes)			
Introduction	25			
Zero Trust Architecture (ZTA or ZTNA)	25			
Asset Inventory and Grouping (Smart Groups)	15			
Break	15			
Distributed Cloud Firewall and FireNet	35			
Cloud Perimeter Security	25			
Micro Segmentation	15			
ThreatIQ, Geoblocking and Anomaly Detection	15			
Break	15			
Security Visibility	10			
SecOps (NetFlow, Alerts, RBAC) – Demo	20			
Self-Service LAB and Quiz and Survey	35			
Total Duration	250 min (4 hours and 10 minutes)			



# Aviatrix Secure Cloud Networking | Distributed Security and Operations

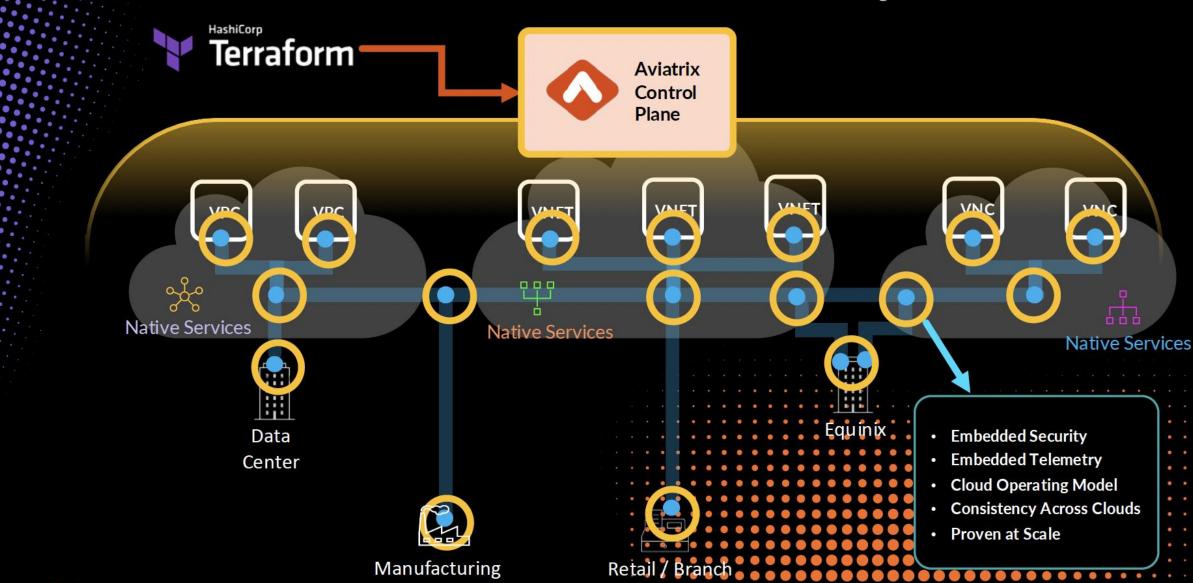


#### **Embedded Security and Operations – The data plane sees every packet**



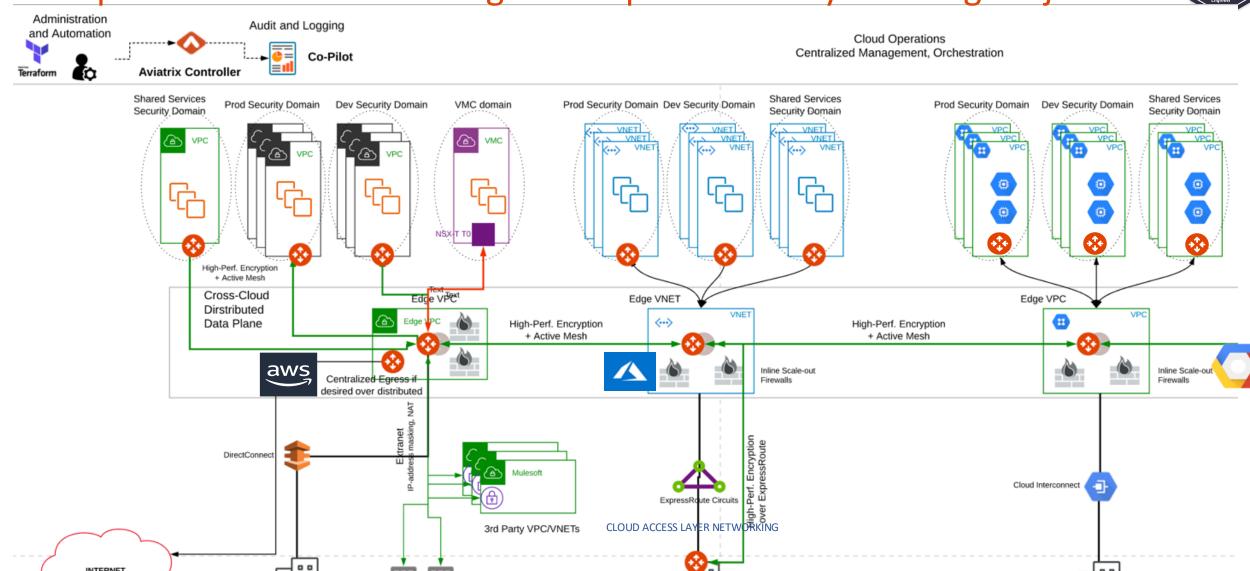


# **Aviatrix Cloud Network Security Fabric**



## Blueprint of Cloud Networking – Example from a 3 years long Project





0 0 0

Datacenter

INTERNET

00

00 Datacenter

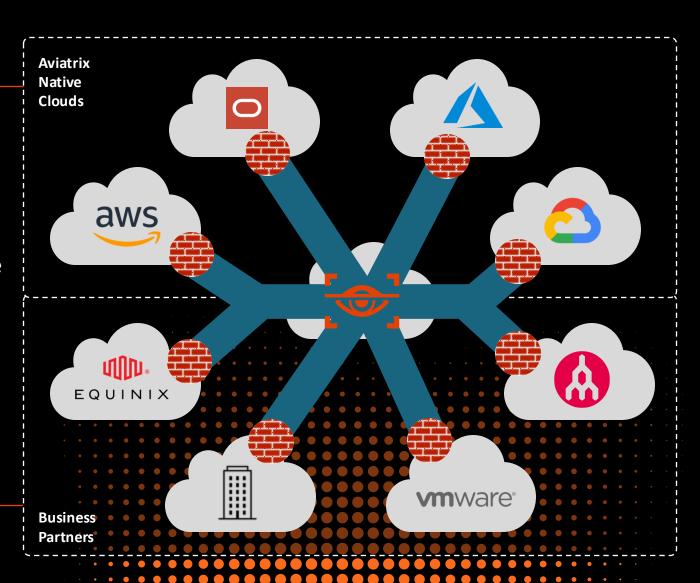
Customer Sites

Datacenter

#### **VISION**

# The Cloud Network Security Fabric

- Built on a strong network foundation
- Runs across the entire hybrid cloud.
- Visibility and traffic inspection Everywhere
- Security that both Infosec and App Teams love
- Dynamic Identity-Driven, Intent-based Policy
- Optimized for Policy as Code
- Perimeter, Macro and Micro-Segmentation





## LAB Access



### https://docs.aviatrixlab.com/ace-security/

- Lab access is provided
- Make sure you can log in
- During the lectures feel free to browse the UI





