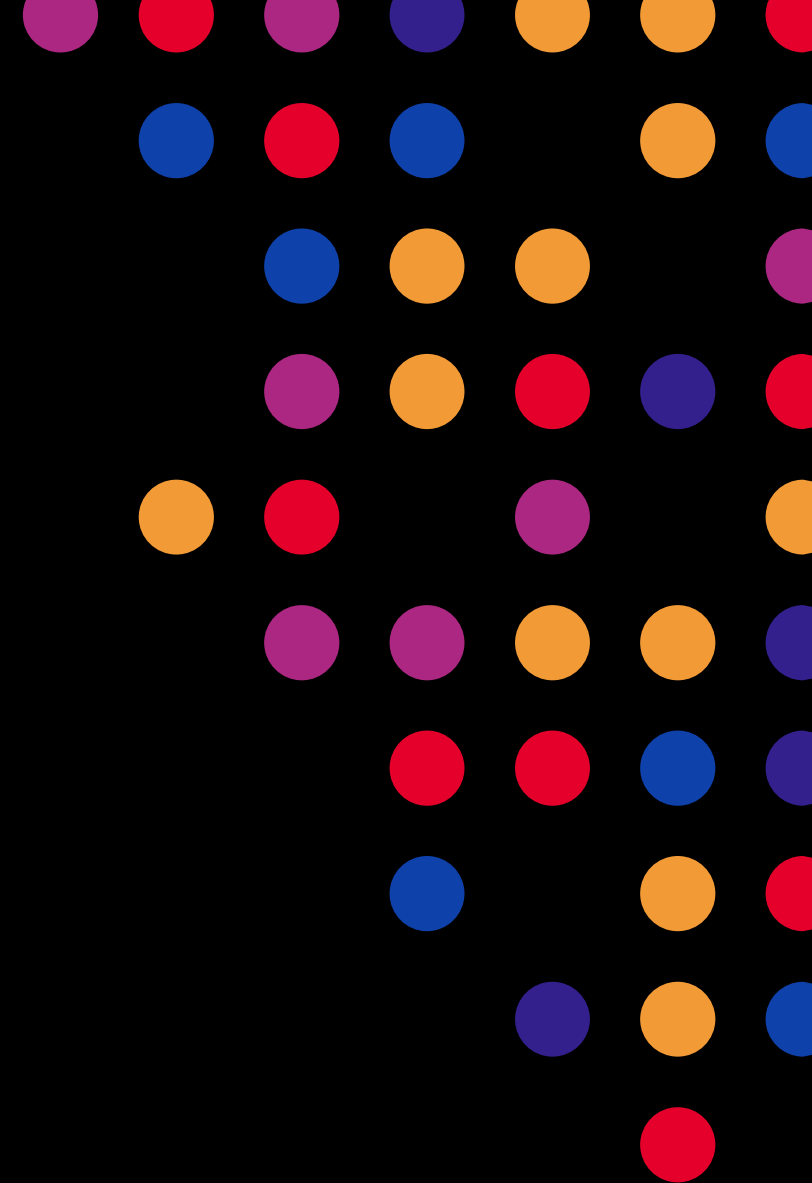




Federal Symposium 2024: An Introduction to F5 NGINX+

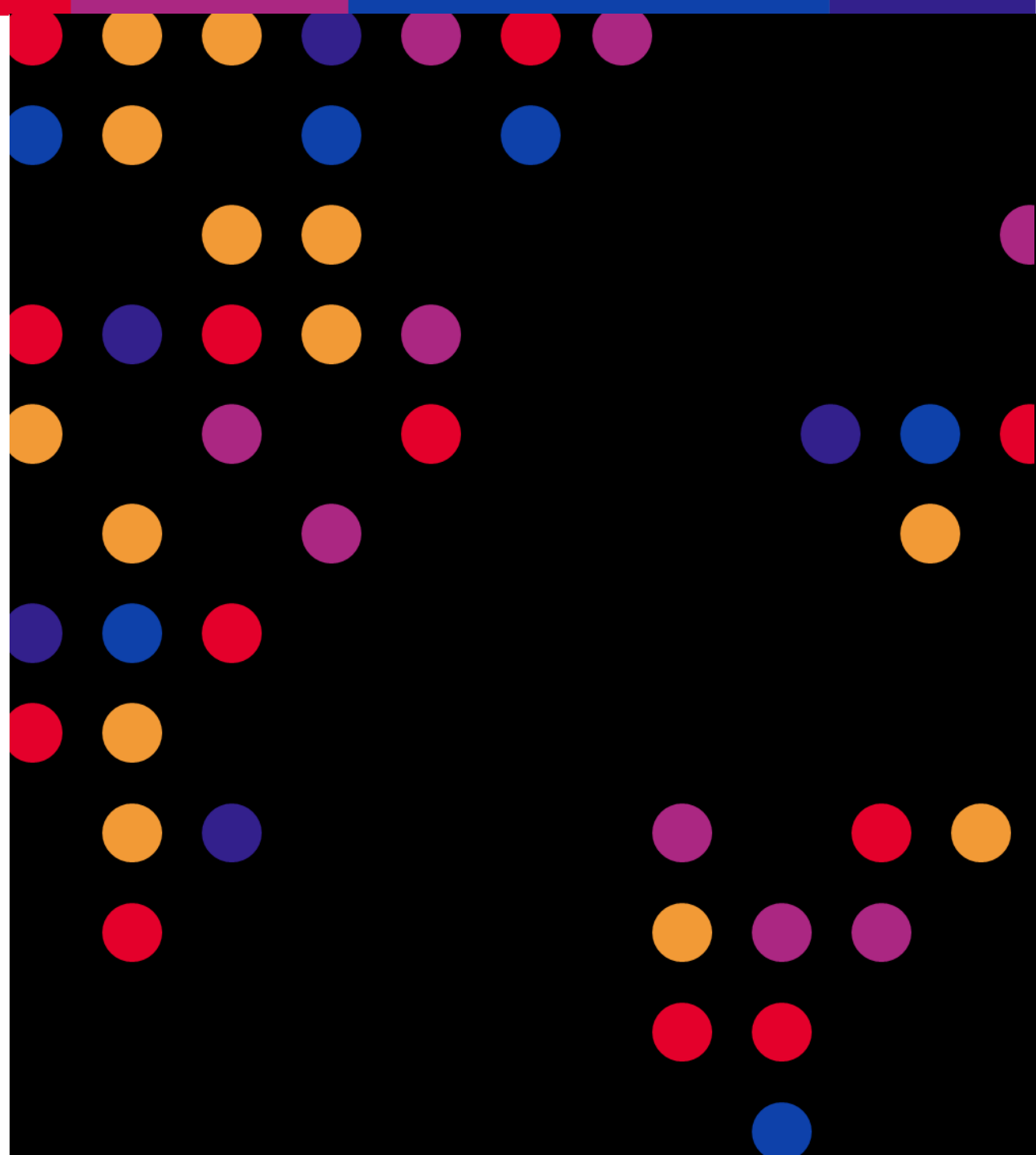


Agenda

Lab Housekeeping

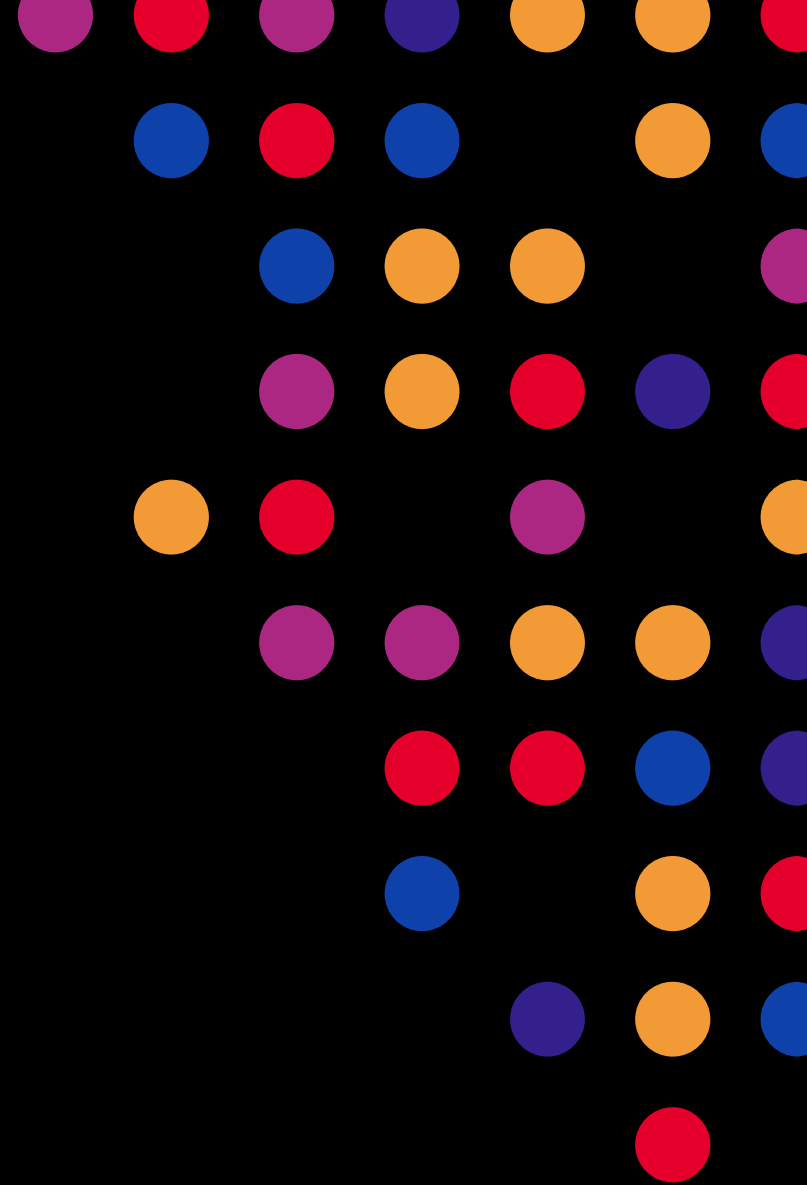
Introduction to NGINX+

Self-paced Lab





Lab Components and Tour



Lab Attendee Invite

UDF Course Registration: F5 XC 102 Lab Test

○ **courses@notify.udf.f5.com**
To i@chas.one

Reply Reply all Forward Delete Add to Safe Senders Add to Blocked Senders ☰

You have been invited to UDF course session F5 XC 102 Lab Test by Chas Lesley.

Your session starts at May 24th 2022, 2:00:00 am PDT and will run until May 27th 2022, 2:00:00 am PDT. The session location is Seattle, WA.

Your instructor for this session is Chas Lesley (c.lesley@f5.com).

The email address you can use to login is i@chas.one

You can visit this course here:
<https://udf.f5.com/meet/c28722ad-1169-4a63-9acc-68023889a2ac/20216d49-2d24-4a0f-8156-b9fd5bc791ce>,
however, you will not be able to join until the scheduled start time.

You can visit all of your courses here: <https://udf.f5.com/courses>.

You can log into the UDF here:
https://auth.udf.f5.com/login?response_type=code&client_id=6d4taklbgvj7imltc2id7qho&redirect_uri=https://udf.f5.com/login

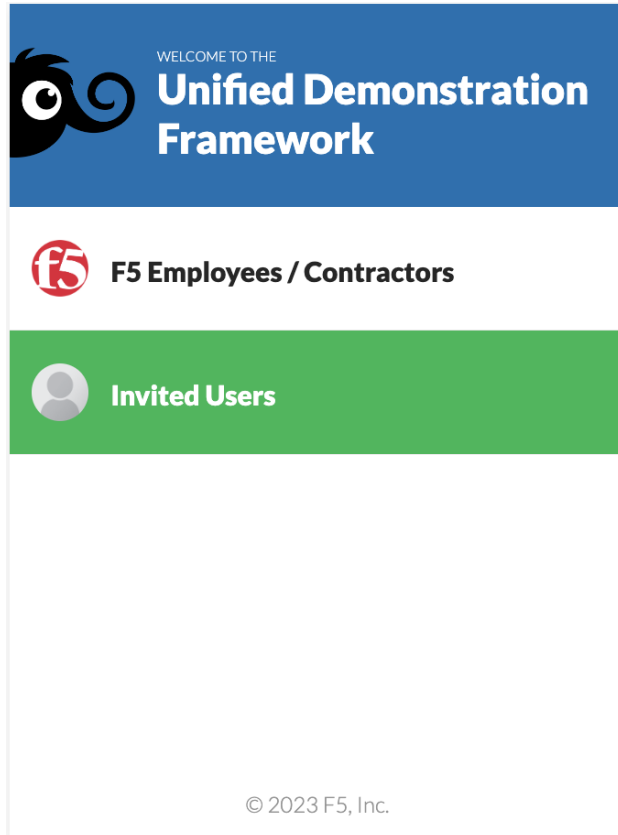
For more information on how to join a training course and the UDF system, please click this link:
<https://help.udf.f5.com/en/articles/3832165-how-to-join-a-training-course>

Learn how to reset your password here:
<http://help.udf.f5.com/en/articles/5014567-how-do-i-reset-my-password>

- F5 Networks - Unified Demonstration Framework

- Lab Attendees will receive invite email
- Lab Attendees can click the provided link

Lab Attendee Login



Sign in with your email and password

Email

Password

[Forgot your password?](#)


Sign in

- Lab Attendees will select *Invited Users*
- Lab Attendees can enter username and password if returning user or username and “Forgot your password”


Lab Attendee MFA

SET UP 2-STEP AUTHENTICATION


F5 requires you to set up 2-step authentication to add an additional layer of security when signing in to your account

 Google Authenticator
Enter single-use code from the mobile app.

[Setup](#)

 SMS Authentication
Enter a single-use code sent to your mobile phone.

[Setup](#)



 Email Authentication
Enter a verification code sent to your email.

[Setup](#)


SET UP 2-STEP AUTHENTICATION

You can configure any additional optional factor or click finish


Enrolled factors

 Email Authentication 

Additional optional factors

 Google Authenticator
Enter single-use code from the mobile app.

[Setup](#)

 SMS Authentication
Enter a single-use code sent to your mobile phone.

[Setup](#)

[Finish](#)

- MFA setup for invited guests
- Users will be given MFA options for Google Authenticator, SMS and Email authentications
- Agree to UDF use policy

Welcome

[Privacy Policy](#) +

[Terms and Conditions](#) +

[Cookie Policy](#) +

[AGREE & CONTINUE](#)

Lab Attendee Password Reset

F5's UDF: Password Reset

○ noreply@registration.udf.f5.com
To i@chas.one

Reply Reply all Forward Delete Add to Safe Senders Add to Blocked Senders ☰

Here is your temporary reset password code for F5's Unified Demonstration Framework **535580**. If you did not request a password reset, please contact your instructor.

We have sent a password reset code by email to I***@c***. Enter it below to reset your password.

Code

New Password

Enter New Password Again

- ✓ Password must contain a lower case letter
- ✓ Password must contain an upper case letter
- ✓ Password must contain a number
- ✓ Password must contain at least 8 characters

Change Password

- Screens show the forgot password experience

Lab Attendee Join Class

LOBBY

F5 XC 102 Lab Test

TUE 24 MAY 02:00 AM TO FRI 27 MAY 02:00 AM PDT


🕒 Ends in 3 days | 📍 Seattle, WA | 🌐 Oregon, USA

[Join](#)

✔ External Access Enabled

Course Overview
No course overview provided.

Tools
[Manage SSH Keys](#)

Instructors
 Chas Lesley
F5, Solutions Architect

- Upon, successful access, click *Join*



Lab Attendee Environment

< DOCUMENTATION DEPLOYMENT

Ends in 3 days
Leave Session

Deployment Description

Agility 2022 F5XC Security Lab

Course Overview

Spinning up a deployment or joining a course based on this blueprint will generate an ephemeral account in [F5-xc-lab-sec tenant](#).

Cloud Accounts

All resources created in Cloud Accounts are ephemeral and will be deleted when the deployment is stopped. For more information, see our [Deployment Cloud Accounts documentation](#).

AWS

Reserved

Regions: us-west-2, ap-northeast-1, ap-northeast-2, ap-south-1, ap-southeast-1, ap-southeast-2, ca-central-1, eu-central-1, eu-west-1, eu-west-2, eu-west-3, sa-east-1, us-east-1, us-east-2, us-west-1

Services: acm, autoscaling, cloudformation, cloudwatch, logs, ecr, ecs, ec2, eks, elasticloadbalancing, iam, lambda, secretsmanager, sqs, s3

Account ID: 849442431405

Role ARN: arn:aws:iam:849442431405:role/udf

API Key: AKIA4LRVW4GWS7LHF2X7

API Secret: **API Secret**

Console URL: <https://849442431405.signin.aws.amazon.com/console>

Console Username: udf

Console Password: **Password**

< DOCUMENTATION DEPLOYMENT

Ends in 3 days
Leave Session

Your Deployment

F5 Products

Subnets

- Management
10.1.1.0/24
DETAILS

Systems

- Client
Ubuntu 20.04 LTS Server
ACCESS DETAILS

- The screen shows the Lab environment and resources
- Note experiences may differ

▶ Your Deployment

F5 Products

Rick Jorolemon

Subnets

▶ Management
10.1.1.0/24

[DETAILS](#)

Systems

▶ web3
Ubuntu 18.04 LTS

[ACCESS](#) [DETAILS](#)

▶ nginx-plus-3 (New Install)
Ubuntu 18.04 LTS

[ACCESS](#) [DETAILS](#)

▶ jumphost
Windows Server 2019 Base

[ACCESS](#) [DETAILS](#)

▶ nginx-plus-1 (Load Balancer)
Ubuntu 18.04 LTS

[ACCESS](#) [DETAILS](#)

⌂ web2
Ubuntu 18.04 LTS

[ACCESS](#) [DETAILS](#)

⌂ web1
Ubuntu 18.04 LTS

Important:
Use
Windows
Jumphost to
run workshop

No need to
access other
systems directly

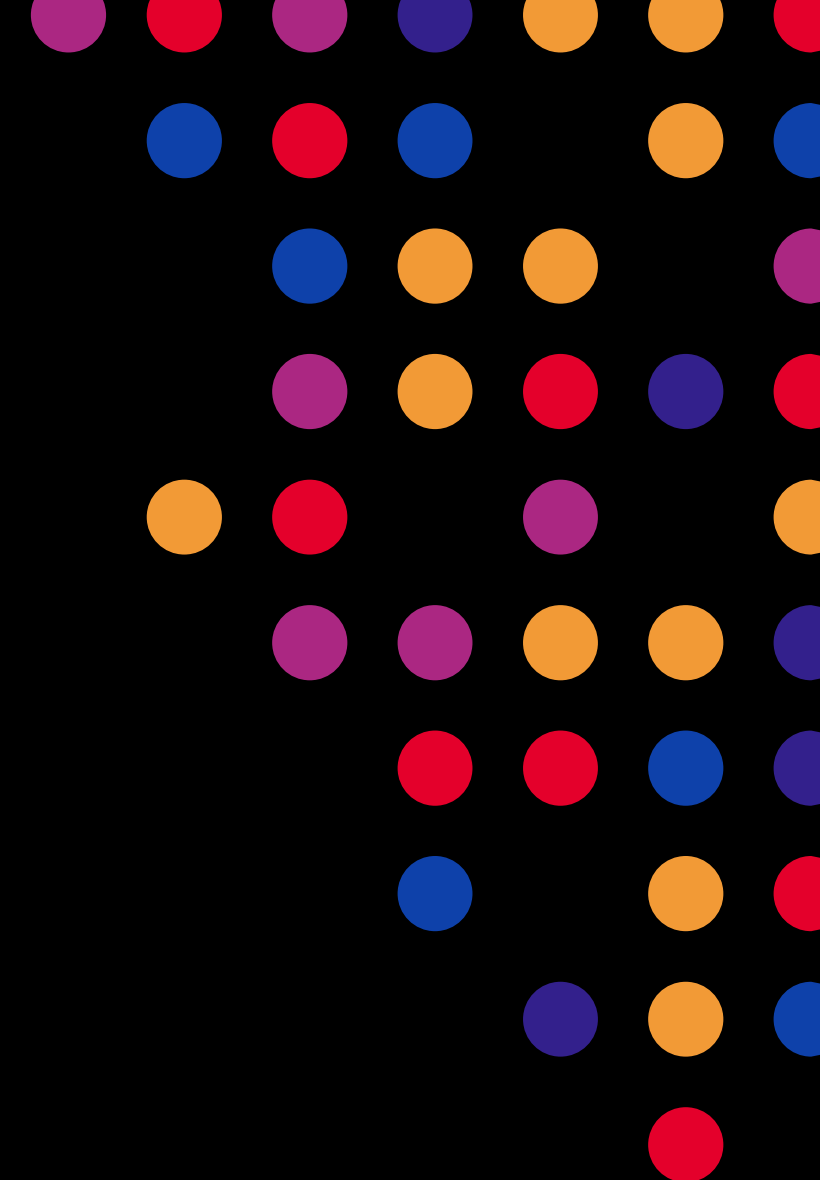
Getting started



- **Chrome based web browser** highly recommended
- **RDP client** required. If you do not have one, please download one, Some examples are:
 - Remote desktop connection (macOS) <https://apps.apple.com/us/app/microsoft-remote-desktop/>
 - Chrome browser RDP <https://remotedesktop.google.com/>
- **Bypass VPNs** (known to cause issues)



Introduction to NGINX Plus





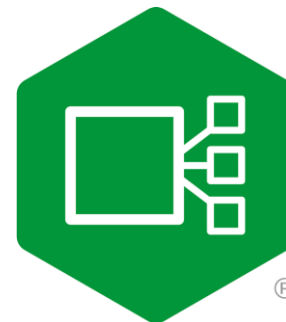
NGINX **Open Source**

Fast, Flexible, Portable



NGINX **Plus**

Enterprise-Class Data Plane



Enabling modern app delivery at scale



NGINX Open Source

The open source web server that powers more than 400 million websites



NGINX Plus

The only all-in-one load balancer, web server, content cache, and API gateway



NGINX Instance Manager

Centralized monitoring and management for NGINX Plus



NGINX App Protect

Modern app security powered by F5 WAF technology running on NGINX Plus



NGINX Unit

Multi-language application server from NGINX



NGINX One[®]



**Data Plane +
Management**



SaaS Console



**Consumption
Pricing**

Whole product offer

NGINX Open Source Capabilities

Web Server

TLS Offload

Extendable via JavaScript

Reverse Proxy

Rate Limiting

Passive Health Checks

Load Balance
(L7 & TCP/UDP)

Caching

Logging

Extra Capabilities in NGINX Plus

Secure

JWT Authentication

OpenID Connect and OAuth token validation

FIPS-Compliance

Verifiable FIPS mode for audit-friendly TLS

WAF

Stop SQL injection and almost any L7 attack

Strengthen

Active Health Checks

Detect and work around a much wider variety of problems

Supported High Availability

Avoid single points of failure on-prem and in clouds

Real-Time Monitoring

Create live dashboards and connect to NGINX/3rd-party tools

Scale

DNS-Based Service Discovery

Automate discovery and load balancing of new servers

Key-Value Store

Dynamically control traffic flow through RESTful API

Clustering

Share runtime state across multiple instances

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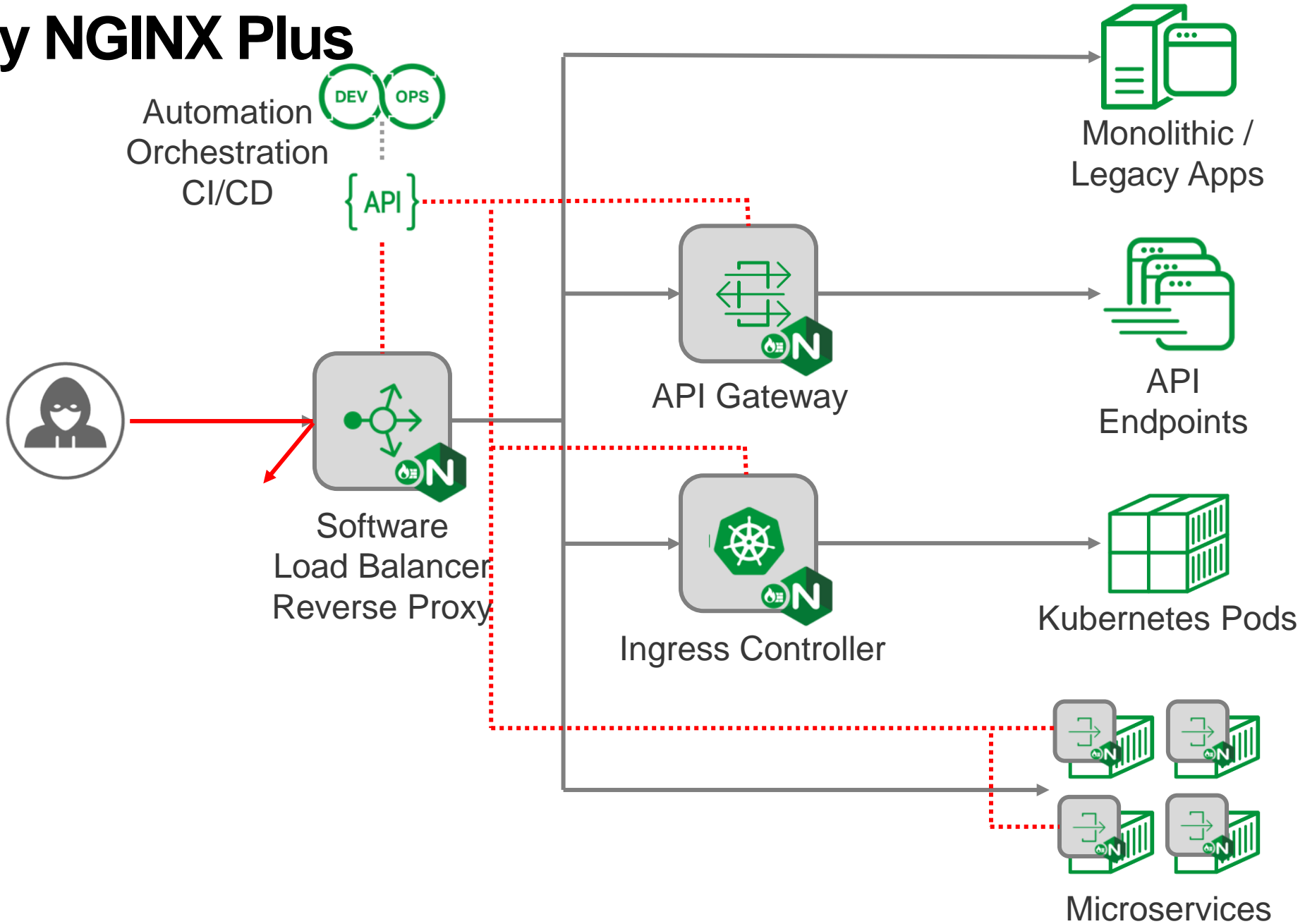
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Clustering

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Deploy NGINX Plus



Hands On Lab