



William Collins

Principal Cloud Architect

alkira



[@wcollins502](https://twitter.com/wcollins502)



[william-collins](https://www.linkedin.com/in/william-collins)



wcollins.io



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Is the Traditional Network Dead?



What does it mean to be DEAD?



dead adjective

 Save Word

\ 'ded  \

Definition of *dead* (Entry 1 of 3)

1 : deprived of life : no longer alive

// a dead tree

// dead soldiers

// missing and presumed dead

2 a (1) : having the appearance of death : DEATHLY

// in a dead faint

(2) : lacking power to move, feel, or respond : NUMB

// my arm feels dead



It's almost 2023



<https://www.networkworld.com> › article › are-firewalls-... ⋮

Are Firewalls Dead? - Network World.com

Jul 18, 2012 — No, really. With so many of today's attacks coming over port 80, is your **firewall** providing any defense anymore? Has the **firewall** outgrown its ...

<https://oxfordcomputergroup.com> › resources › traditio... ⋮

The Traditional Perimeter is Dead, Now What?

Jan 12, 2017 — Instead of '**perimeter** thinking', we need to implement policies that protect data and information regardless of the device being used or its ...

<https://www.infosecurity-magazine.com> › infosec › zer... ⋮

The Wall Has Fallen, but Zero-Trust Architectures Can Save You

Oct 19, 2020 — A collection of CISOs operating as the Jericho Forum heralded the **death of the network perimeter** in 2004, announcing it as 'deperimeterization.' ...

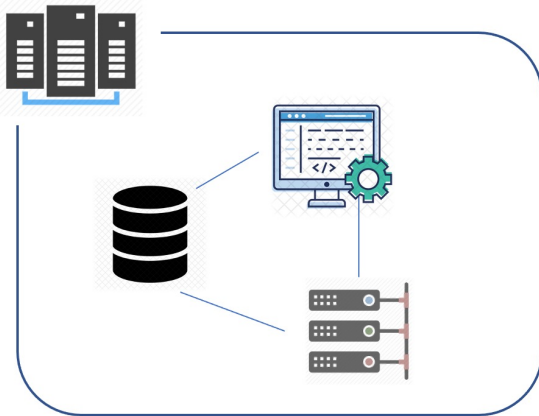
<https://...> the-ip-address-is-dead ⋮

The IP address is dead

Jun 15, 2022 — Regardless of what you may have heard, **the IP address is in fact, dead.** Brought down by several public clouds that replicate the same ...



You don't choose *Multi-Cloud*



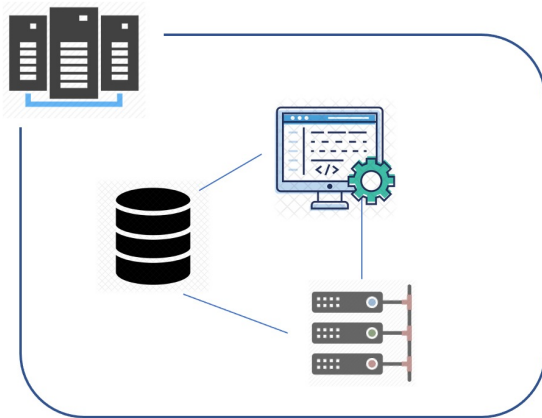
Greenfield (*Cloud Native*)



“92 percent of enterprises have a multi-cloud strategy; 45 percent integrating data between clouds”- [Flexera](#)



You don't choose *Multi-Cloud*



Greenfield (*Cloud Native*)

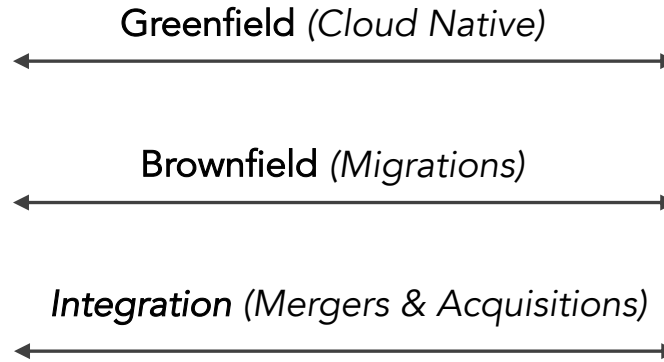
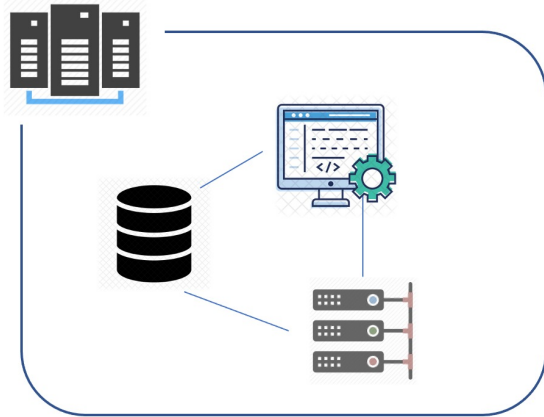
Brownfield (*Migrations*)



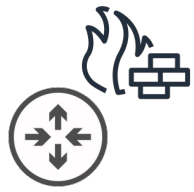
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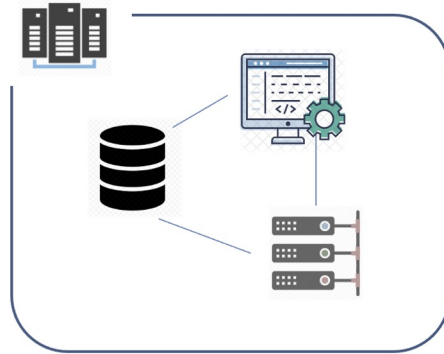


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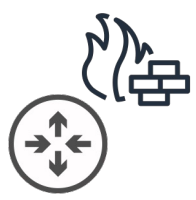


What is real?

Data Centers

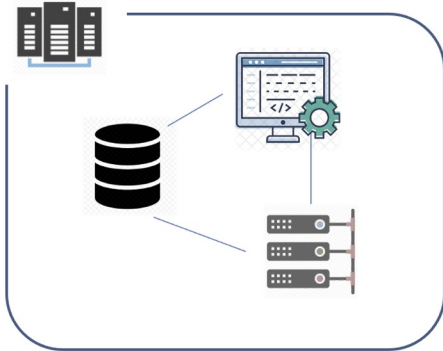


Public Clouds



What is real?

Data Centers

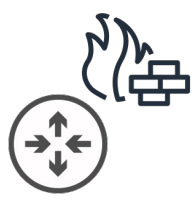


Public Clouds

HIPAA

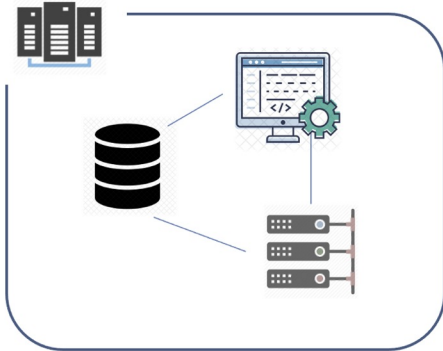
GDPR

PCI-DSS



What is real?

Data Centers



Public Clouds

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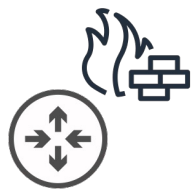
GDPR

PCI-DSS



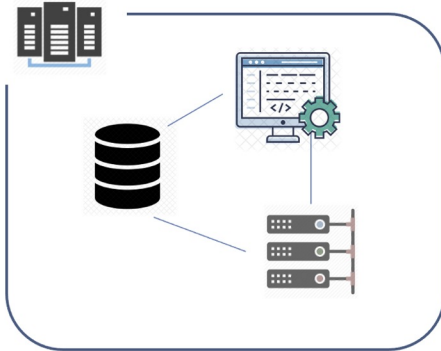
More Patterns

- ✓ Internet Access
- ✓ Identity & Access Management
- ✓ Cloud Endpoints to On-Premises
- ✓ On-Premises to Cloud Endpoints



What is real?

Data Centers



Public Clouds



Data Leakage + Exfiltration

HIPAA

GDPR

PCI-DSS



More Patterns

- ✓ Internet Access
- ✓ Identity & Access Management
- ✓ Cloud Endpoints to On-Premises
- ✓ On-Premises to Cloud Endpoints



Defense in Depth!



Bad Actor

(Loves stealing Data)



Williams's Cereal Supply

(E-Commerce Giant)





Defense in Depth!



Network Firewall
(Layer 3-4)





Defense in Depth!

(Layer 3-4)



Web App Firewall
(Layer 7)





Defense in Depth!

(Layer 3-4)



(Layer 7)



Social Engineering





Defense in Depth!

(Layer 3-4)

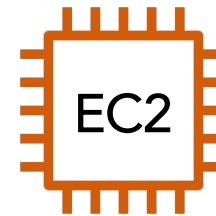


(Layer 7)



Social Engineering

An entry point!





Defense in Depth!

(Layer 3-4)

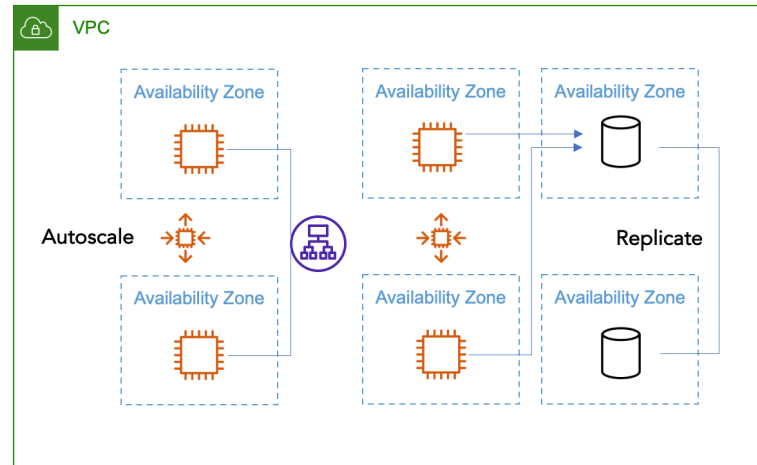
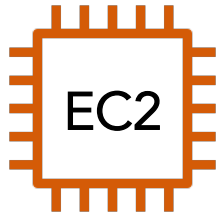


(Layer 7)



Social Engineering

How far can I get?





Defense in Depth!

(Layer 3-4)



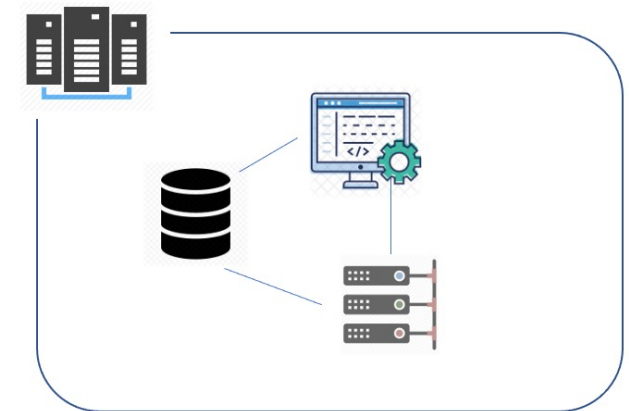
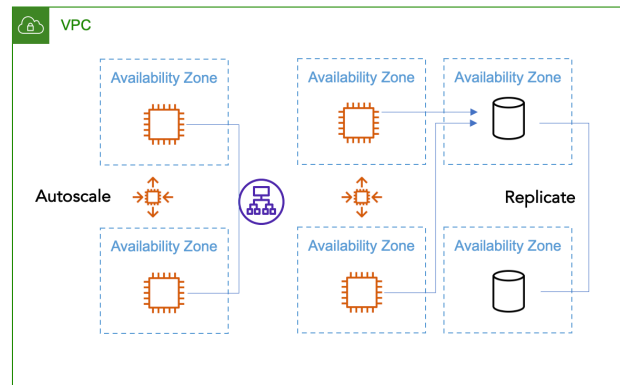
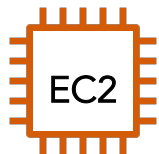
(Layer 7)



Social Engineering

IAM

(Resource Level)

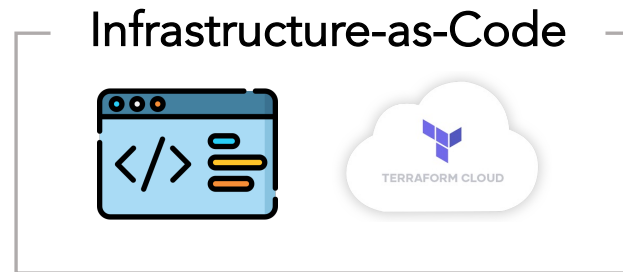
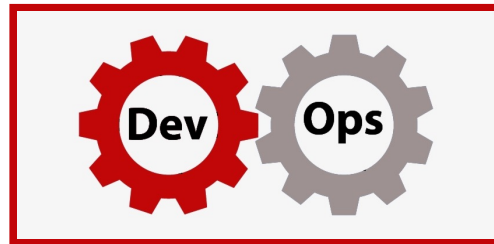




Network + Security + Cloud

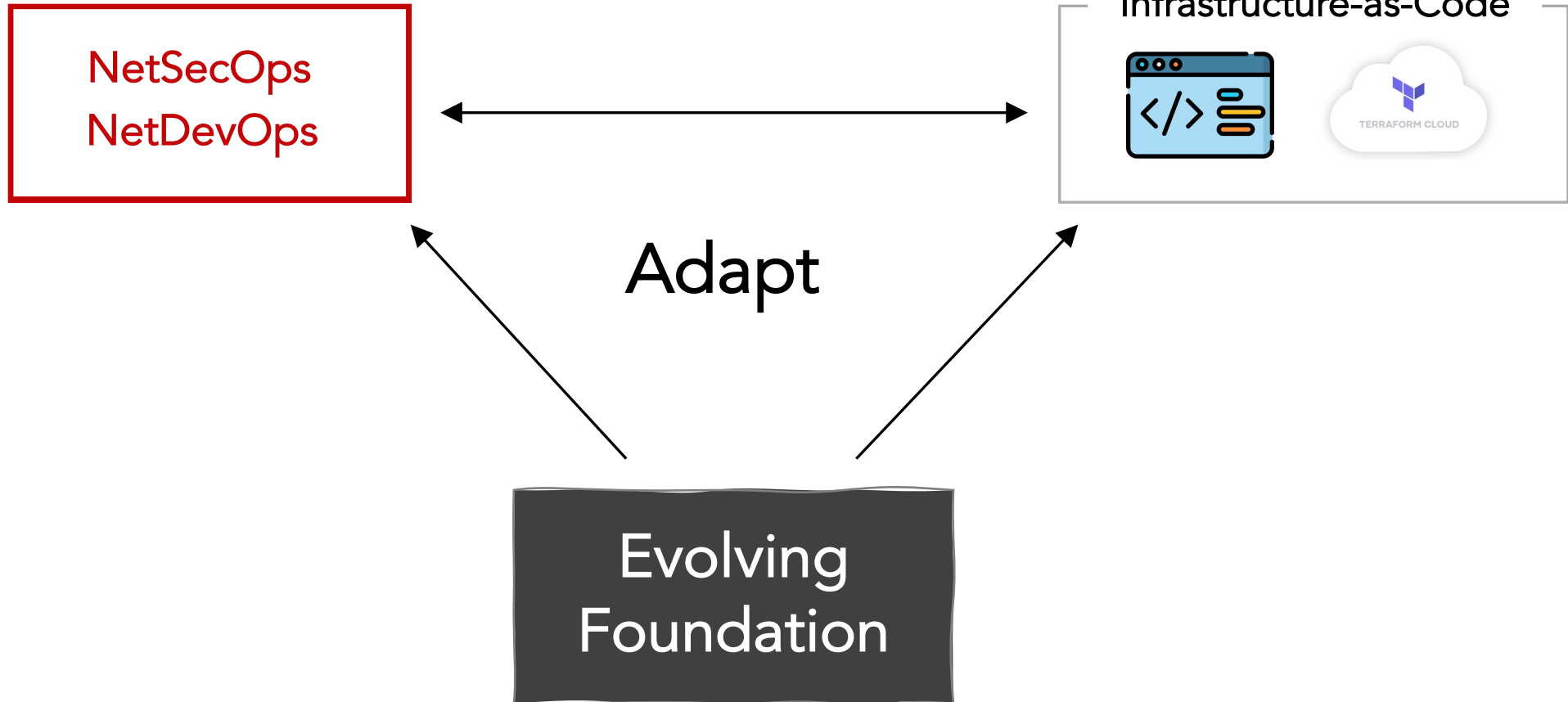
Shift Left:

Ensuring desired intent while *proactively* validating security requirements are met prior to any workload being connected





Network + Security + Cloud



Demo