Application Delivery Integrated with Service Discovery Smarts.

Service Monitoring in a Multi-cloud Deployment

Organizations need to ensure that application traffic is optimally managed across any cloud or on-premises environment to consistently deliver the best experience for users and customers. Service monitoring is one of the key components necessary to intelligently redirect the traffic among available resources and sites or spin up or tear down services depending on the demands without any intervention. With the dynamic nature of the new-world demands, it makes perfect sense to automate service and network operations based on service discovery smarts, maximizing operational as well as economic efficiencies.

Product Integration

HashiCorp Consul is a service mesh solution providing a full featured control plane with service discovery, configuration, and segmentation functionality. Each of these features can be used individually as needed, or they can be used together to build a full service mesh. Consul requires a data plane and supports both a proxy and native integration model.

A10 Thunder Application Delivery Controller (ADC) is integrated natively with HashiCorp Consul and utilizes its cloud-agnostic service discovery monitoring smarts for more agile and automated application delivery and security. This enables IT operators to streamline the service operation and maintenance in any cloud deployment.
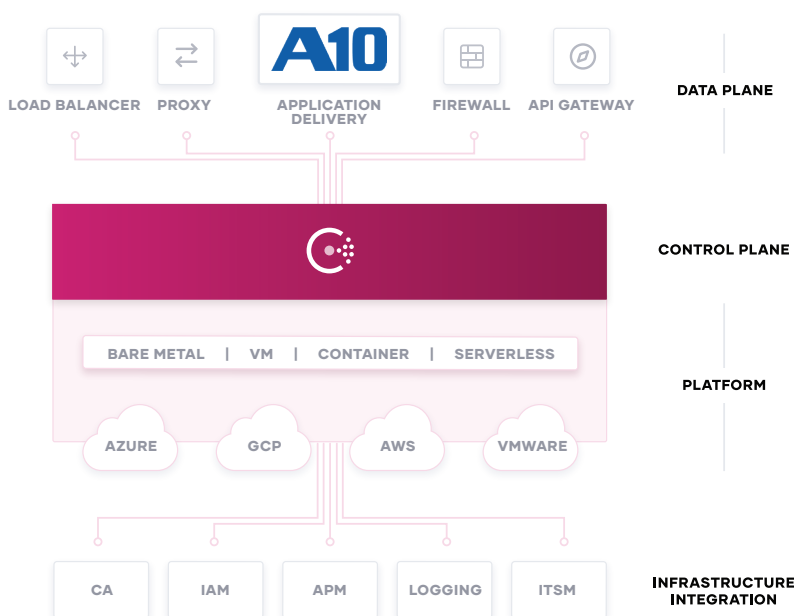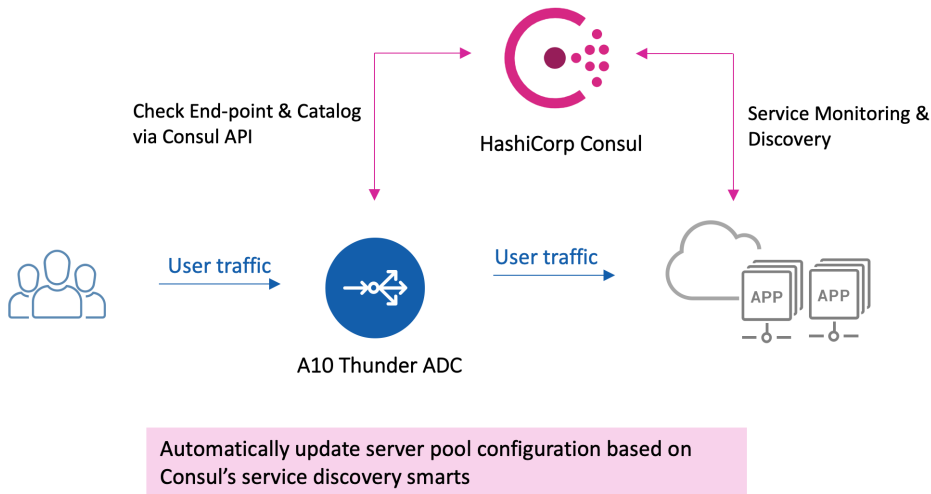
How It Works

A10 has partnered with HashiCorp solutions to offer automation across Day0 through DayN operations. The Consul integration helps with application delivery and service availability because the service can dynamically scale based on traffic load.

A10 Thunder ADC communicates directly with the Consul and checks the associated services catalog periodically while serving user traffic for load balancing and application security. When service status changes are detected on the Consul for any reason, Thunder ADC automatically updates the server pool configuration accordingly. This supports the dynamic service load demands in real time as user traffic grows or reduces, and helps eliminate any manual steps and associated delay in filing a ticket and someone addressing it in a maintenance cycle.

Check End-point & Catalog via Consul API

HashiCorp Consul

Service Monitoring & Discovery

User traffic

A10 Thunder ADC

User traffic

APP   APP

Automatically update server pool configuration based on Consul's service discovery smarts

Use Cases

Use Case 1: Automate ADC Configuration

Streamlines the service maintenance process between the server team and network team by automating ADC configuration based on service discovery smarts provided by Consul.

Use Case 2: Master Polynimbus Deployment

Take advantage of the dynamic infrastructure in multi-cloud deployments and maximize service updates using Thunder ADC, which leverages Consul's real-time health monitoring in case of service failure or a surge in traffic.

Use Case 3: Network Infrastructure Automation

Together, A10 and HashiCorp enable IT operators to automate dynamic application delivery service workflows leveraging the tight integration between Consul and the A10 Networks Thunder Terraform provider at runtime.

Company Info

A10 Networks provides secure application services for on-premises, multi-cloud and edge-cloud environments at hyperscale. Our mission is to enable service providers and enterprises to deliver business-critical applications that are secure, available and efficient for multi-cloud transformation and 5G readiness. www.a10networks.com