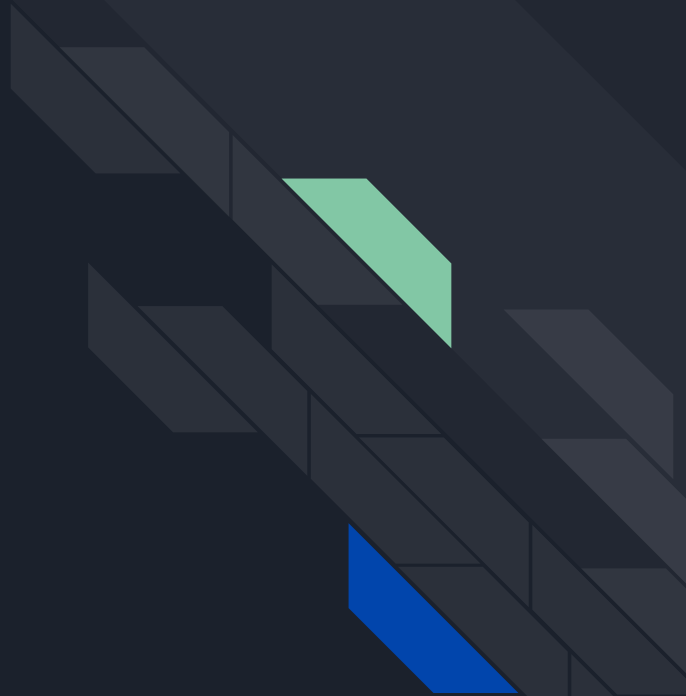
A Deep Dive into AWS AppRunner



Topics

1. What is AppRunner ?
2. AppRunner Architecture
3. Application Deployment for AppRunner
4. Scaling and Performance
5. Cost
6. Security and Compliance
7. Monitoring Logging and Tracing
8. Real-World Use Cases

What is AWS AppRunner ?

1. It's a fully serverless compute engine
2. Accelerate application development and deployment
3. Optimize costs with pay-as-you-go pricing
4. Deployment flexibility
5. Has built in auto-scaling

AppRunner Architecture

1. From code or container to a running service.
2. It is powered by AWS Fargate.
3. AppRunner workflow involves build, deploy and scale.

App Deployment with AppRunner

1. From Source Code (Github, BitBucket) to AppRunner Service
2. From AWS Elastic Container to AppRunner Service

Scaling and Performance

1. Scales based on Concurrent Request
2. Can handling traffic spikes
3. Cal also minimizing cold starts. AppRunner always reserves one instance when there are no request to minimize cold start.

Cost

It currently only supports Pay As You Go

Security and Compliance

1. Automatic SSL certificates
2. Integration with AWS Identity and Access Management (IAM).
3. Support VPC Endpoint Interface

Monitoring Logging and Tracing

1. Native integration with Amazon CloudWatch for metrics and logs.
2. Application-level monitoring.
3. Troubleshooting using logs and performance metrics
4. Can be integrated with AWS X-Ray

Real-World Use Cases

1. Support for Web Apps
2. Support Microservices Applications