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CS 470 Final Reflection

<https://youtu.be/owbgOSRvTUg>

New Experience

While I have had prior experience with AWS, I was happy to see that AWS continues to extend and strengthen their offering. I felt comfortable using the new AWS console and immediately could get to work. I have used S3 for public website hosting previously. API gateway was a new experience and I plan to use it further in the future. Policy definition and planning were important new skills I learned. IAM security design for an application is extremely valuable.

Strengths

My main strength as a developer and architect is to see the big picture. Software development is a series of decisions. Deciding induces a tradeoff. Understanding how those tradeoffs impact your customers is really what it's all about.

Targeted roles

I am currently a software architect at my current shop. I am doing what I love, but the challenges are many. Continuous learning is the only way to stay ahead of the curve. I intend to investigate an MBA program to match my technical experience with better business understanding.

Planning for Growth

The existing services of S3, API gateway, lambda functions and DynamoDB is a strong foundational on which to grow. The first step will be measuring. We must measure the application usage and performance. External measuring of the application performance matched with AWS Cloud Ops will show, over time, which services are no longer scaling to our demand. Many of the services we have chosen will already scale at demand, other will need to be adjusted to allow for growth. S3 is a fine file serving service. However, likely we will need a more functional services such as Elastic Beanstalk. Coupled with Elastic load balancing we should be able to stretch rather far.

Monitoring the spending rate is just as important. When a service becomes too expensive for the business, we must be prepared to find a way to cut costs. Cloud is expensive for a reason. We can replace the services with software build by us. The cost in maintenance and IT input will need to be balanced, but at high enough scale sometimes this is cheaper.