

**Donald Thibodeaux**

**4/22/2023**

## **CS 470 Final Reflection**

<https://www.youtube.com/watch?v=IWKAjinIr1Y>

### **Experiences and Strengths:**

Throughout my coursework, I have gained experience using the AWS platform and developing both frontend and backend applications. As a software developer, I have developed a strong skill set in patience, problem solving, and a passion for continuous learning in the field of software development and security.

My professional goal is to obtain an entry-level role as a software developer, with a focus on cyber security. I am committed to gaining further knowledge and experience in securing systems, and I believe that an entry-level role will provide me with the opportunity to build upon my current skills and contribute to the success of the organization.

I am excited to join a team where I can utilize my technical skills, creativity, and problem-solving abilities to develop and secure software systems. I am a dedicated and hardworking individual who is eager to contribute to the success of the organization and further my career in the field of software development and security.

### **Planning for Growth:**

Cloud services are a powerful tool for business looking to scale their web applications and improve efficiencies of management. Micro services make it easier to add or remove services as needed, which can help improve performance and efficiency of the application. Container applications can be more expensive than serverless because containers require more resources.

When planning for expansion with cloud services there are pros and cons that should be taken into consideration to make an informed decision. The pros are scalability (cloud services can offer greater scalability and the ability to handle higher levels of traffic and demand), flexibility (Cloud services offer a high degree of flexibility in terms of architecture and deployment, allowing businesses to easily add or remove services as needed), cost savings (Cloud services can offer cost savings in terms of infrastructure and maintenance costs, particularly with serverless architectures that only charge for the resources used), accessibility (Cloud services can offer greater accessibility and availability, as they are typically available globally and can be accessed from anywhere with an internet connection), and security (Cloud services often provide enhanced security features, such as automated backups and disaster recovery plans, that can improve the overall security and reliability of the application). There are also cons that should be considered such as complexity (Expanding a web application with cloud services can be complex, particularly when dealing with large and complex architectures), Learning (Developers and IT

staff may need to learn new technologies and tools in order to effectively manage and maintain cloud services), security (While cloud services can offer enhanced security features, there may also be risks associated with storing sensitive data in the cloud, particularly if proper security measures are not taken), and cost(While cloud services can offer cost savings in terms of infrastructure and maintenance, there may also be additional costs associated with using these services, such as licensing fees or charges for exceeding resource limits ). After considering all these factors you should be able to make an informed decision.

Two factors that play a vital role in decision making for planned future growth are pay-for-service and elasticity. Elasticity is the systems ability of a system to scale resources up or down as needed in response to changes in demand. In cloud services elasticity is achieved through automatic scaling based on traffic or workload. Elasticity also allows businesses to avoid downtime or performance issues due to sudden spikes in traffic or workload. Pay for services is when businesses only pay for the service they use. This makes it easier for businesses to scale up or down as needed, without having to worry about overpaying for resources that are not being used.