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CS-470 Final Reflection

https://youtu.be/ZAzlBjNqwfg

The course material and activities in the Full Stack Development II course at Southern New Hampshire University helped sculpt much of the skills I have today as a software developer. The skills include knowledge in containerization such as Docker which was utilized for the project and the ability to convert applications to a serverless paradigm using Amazon Web Services (AWS). As material and activities got extensive, I was able to offer any troubleshooting experience to my classmates and discuss solutions based on the new versions available. The roles I am prepared to assume include using my skills to join a team as a full stack developer or software engineer.

Microservices and tools, such as AWS, offer the ability to handle an application's stack and manage it. Using step functions and Lambdas also gives the ability to handle errors. AWS offers plenty of services to accommodate for deployment and security. It also allows for scalability depending on the traffic flow or demand utilizing AWS Auto Scaling.

To predict the cost, AWS offers the ability to conveniently calculate or estimate using the AWS Pricing Calculator. The user can estimate the cost based on specific use cases. As it is serverless, using the calculator can help predict the costs for any upcoming application management or based on usage; Auto scaling could also predict the cost to be increased due to demand or usage. It is more cost-efficient to use a serverless system as it notifies the user of upcoming expenses when compared to containerization.

When it comes to the pros and cons that would help in deciding which plans are better for expansion, you must consider the application. Research must be done to understand the demand in the current market and determine cost optimization such as which features will benefit the company more effectively. An analysis of the business expansion must be established to determine the optimal plan. An example of a con would be the time and expansion; It would take time to build the infrastructure and lay out the steps required to properly expand the business. Other factors that may play a role in cons would be network management, office-spaces, and maintenance. The pros, however, would be a more organized or structured business and more revenue. Using serverless systems allows for optimization of scaling, costs, and resources. With a Pay-for-service model, the business can only pay for the execution time or for the services that you use. Using these tools is essential in securing a proper business growth model for the future.