

Use of Amazon Web Services in the ISQA 4380 Distributed Technology and Systems

At a recent MWAIS (Midwest Association for Information Systems) conference held in Omaha at PKI, I had a chance to discuss techniques in teaching Distributed Technology and Systems with Dr. Matt G. in a Midwestern University. He explained that he was using Amazon Web Services with his classes. Each student have their own virtual machine to use during the class. He also indicated that Amazon would provide a \$100 credit for each student who develops a new account and, according to Matt, this is more than enough for students to do their assignments during a semester. Matt also pointed me to the individual at Amazon Web Services to contact to request the codes for students to obtain the \$100 credits.

I contacted Kurt Messersmith (kurtme@amazon.com) from Amazon and explained I want to try this with a graduate class this summer and Kurt was very responsive in sending me the credit codes. I used a credit code and have found it very easy to select a Linux virtual machine that is available with the LAMP stack which I can use for my class. There are Windows Server virtual machines available as well. Security to access the virtual machines is strong. You are required to create a X.509 certificate to use with Putty. Putty has a utility to use certificate for root access. Beyond that it is just like working with a virtual machine on a server on your campus. I am now in the process of building a "clonable" virtual machine that my class can use this summer.

I am excited about this because students begin to better understand the benefits and issues of working with cloud based services. I also wanted the ability for students to also use additional middleware components such as an open source message broker/ESB as part of an integration project. This can be hosted on a second virtual machine that students use in an integration project.

Please feel free to check out the use of Amazon Web Services (AWS) at the following link. It has instructions on applying for the class credit to use AWS in your classes. There are also materials from other colleges using AWS described at this link.

<http://aws.amazon.com/education/>

You can also email Kurt Messersmith at kurtme@amazon.com and request the services once you apply. I will be developing Camtasia Video Clips for my students to demonstrate the use of Amazon web services and I will post them on our wiki site in the coming weeks. In the meantime, let me know if you have any questions

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