# San Francisco State University
# CSC 648-848
# Milestone 0 Submission Form
# Section 04 Team 02

## Technology Stack

| | |
|---|---|
| **Server Host:** | Amazon Web Service (AWS) EC2 |
| **Operating System:** | Ubuntu Server 24.04 LTS (HVM) |
| **Database:** | MongoDB Atlas |
| **Web Server:** | Vercel |
| **Front-End Framework:** | React |
| **Server-Side Language:** | Python |
| **Web Application Framework:** | Django |
| **Additional Technologies:** | Docker |
| **IDE:** | Visual Studio Code |

## Infrastructure

| Item | Credentials |
|---|---|
| Website URL | guacamolerigatoni.com <br><br> The front-end is deployed using Vercel. Due to pricing restrictions, we are unable to provide third-party access to Vercel. |
| Cloud Virtual Machine | ec2-54-176-55-68.us-west-1.compute.amazonaws.com |

| | Requires IP whitelisting along with a .pem key file to connect via SSH. Please request [mkullathon@sfsu.edu](mailto:mkullathon@sfsu.edu) if you require access. Then, to connect:<br><br>```<br>ssh -i <path to PEM file> ubuntu@ec2-54-176-55-68.us-west-1.compute.amazonaws.com<br>``` |
|---|---|
| Database | [guacamole-cluster-0.xlsu7.mongodb.net](http://guacamole-cluster-0.xlsu7.mongodb.net)<br><br>You can connect via the MongoDB Shell and authenticate using X.509. Please request [mukullathon@sfsu.edu](mailto:mukullathon@sfsu.edu) for the .pem file. Then, to connect:<br><br>```<br>mongosh "mongodb+srv://guacamole-cluster-0.xlsu7.mongodb.net/?authSource=%24external&authMechanism=MONGODB-X509" --apiVersion 1 --tls --tlsCertificateKeyFile <path to PEM file><br>```<br><br>The delegated username for TA access is `cs686ta` with read-only access. Upon request, we will provide you with the X.509 certificate necessary for authentication. The certificate will expire 03/18/25 12:55. |

# Study Plan

## Familiarity with technologies and packages (1–5 scale):

| Member | AWS | Python | MongoDB | Django | React | Vercel |
|--------|-----|--------|---------|--------|-------|--------|
| Katy | 3 | 5 | 4 | 2 | 4 | 1 |
| Kevin | 1 | 3 | 1 | 1 | 1 | 1 |
| Niko | 1 | 5 | 3 | 1 | 5 | 1 |
| Arjun | 3 | 5 | 4 | 2 | 4 | 2 |
| Matthew | 1 | 3 | 2 | 1 | 2 | 1 |
| Mos | 2 | 5 | 2 | 2 | 4 | 2 |
| Arizza | 1 | 3 | 1 | 1 | 2 | 1 |

## Proposed study plan

Our study plan for the upcoming period is as follows:

- **9/12 Meeting:** We'll focus on learning and practicing AWS and Vercel together to get comfortable with their features. Mos will set up our cloud server in advance so that we can all use and familiarize ourselves with it during the meeting.

- **Vercel:** We aim to complete the Vercel setup by 9/13.

- **MongoDB:** Arjun and Matthew will be working together to get familiar with MongoDB and have it set up by 9/13.

- **Front-end:** Niko and Kevin will be brushing up on the React skills and explore the use of different libraries. They will be working on the frontend together, aiming to complete this by 9/15.

- **Design, Vercel, and React:** Arizza will focus on these areas, ensuring she's up to speed by 9/15. She'll also be responsible for team communication, organizing extra meetings if needed, and keeping the team lead updated on any challenges.

Mos and Matthew will ensure that all cloud infrastructure, namely: Amazon EC2, Vercel, and MongoDB, will be ready for preliminary testing. Our primary goal is to have Vercel ready for front-end deployment for Milestone 0.

Our team lead Katy, will be involved in a bit of everything, checking in with each group, and getting a status update by 9/15 and keeping the group finishing what they need.