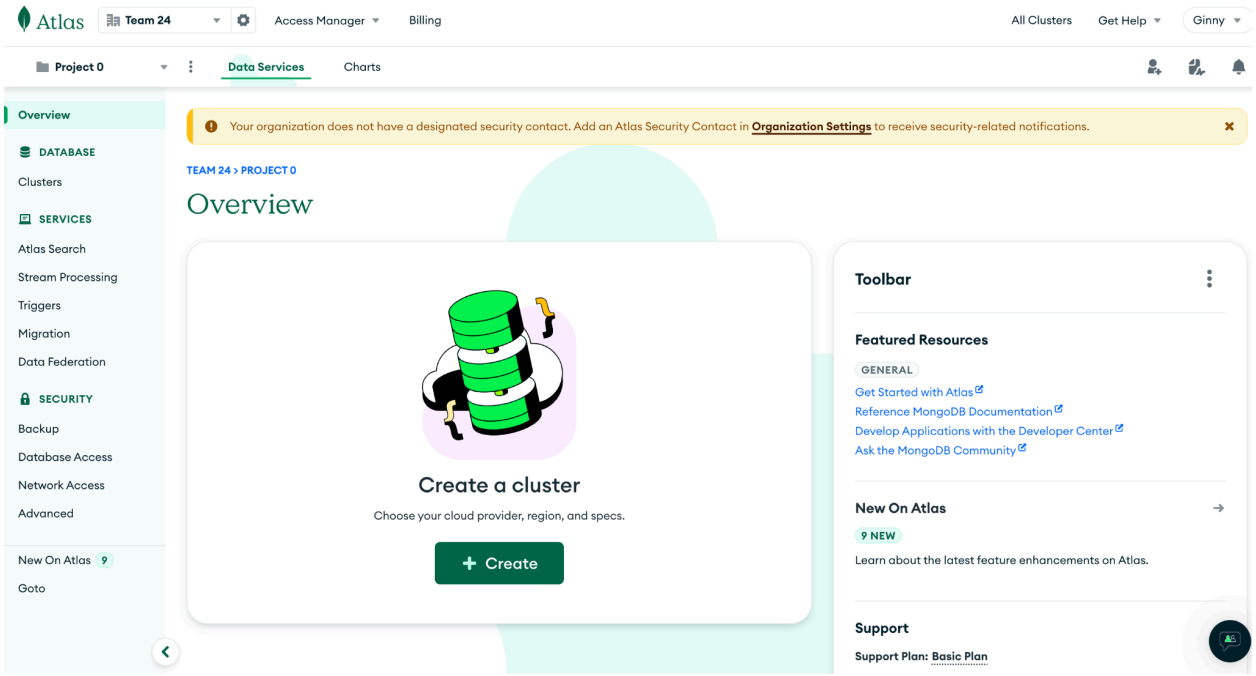
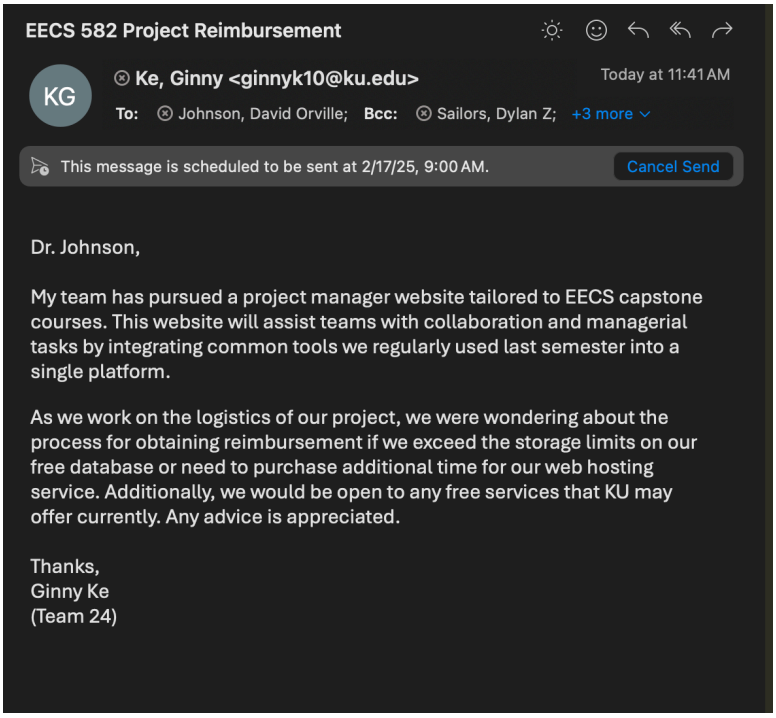
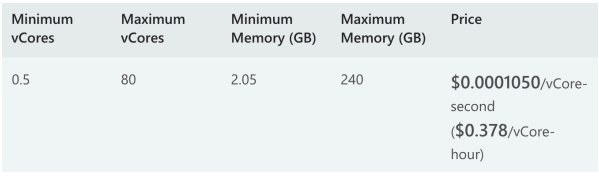
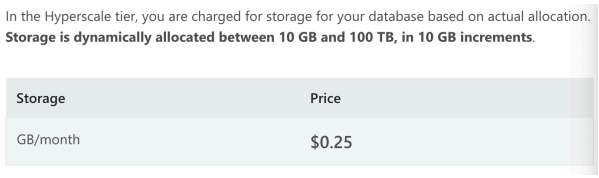
Based on research and the need to support ~12 database tables, we will move forward with MongoDB Atlas for our database needs. Its non relational capabilities will give us more freedom in creating various tools within our project manager website. Additionally, our previous experience with MongoDB will streamline the connection process and if any issues arise there are several online resources and tutorials to fall back on. We've also created a MongoDB (email: ginnyk10@ku.edu) account and have reacquainted ourselves with the UI and setup. An email has been schedule sent to Dr. Johnson about possible reimbursement options once the "free trial" for our database has been reached.





MongoDB	
Pros	**Cons**
Familiarity with database since we used it for 581 project.	Clusters are billed hourly with monthly invoices.
Scalable.	Base prices includes: 9$/month for 2GB storage, 25$/month for 5GB of storage
NoSQL database	higher storage consumption
Flexible Schema	can lead to data duplication or redundancy
Easy to understand dashboards and has tutorials for easy setup	
non relational meaning can store flexible data that may be unstructured/dynamic	

Azure Database for MySQL	
Pros	**Cons**
connects directly with Microsoft Azure which is what we used last semester to host our website. Familiarity with MySQL database from previous course.	
extensive support available through Microsoft for troubleshooting.	
high/strong data integrity and supports complex queries through SQL.	scaling horizontally can be complex.

Firebase Firestore (NoSQL) from Google	
Pros	**Cons**
real time syncing for collaboration, automatic updates reflects on all devices. Can be great for chats, progress updates, and editing tasks.	scaling can be expensive with larger use.

easy set up	Related to google cloud so we would not be able to move data in the future to AWS or Azure
flexible schema various types of data can be stored	scaling horizontally can be complex.
free up to 50,000 reads/month, 20,000 writes/month, 10000 deletes/month, 1GB storage.	Pay as you go option. Opening the project page triggers multiple reads so this can get expensive. Reads: .06$ per 100,000 reads Writes: .18$ per 100,000 writes Deletes: .02$ per 100,000 deletes Storage: .18 per GB/month