



Masters of MongoDB

Web Development Boot Camp
Lesson 18.1



Project Recap

Project Recap

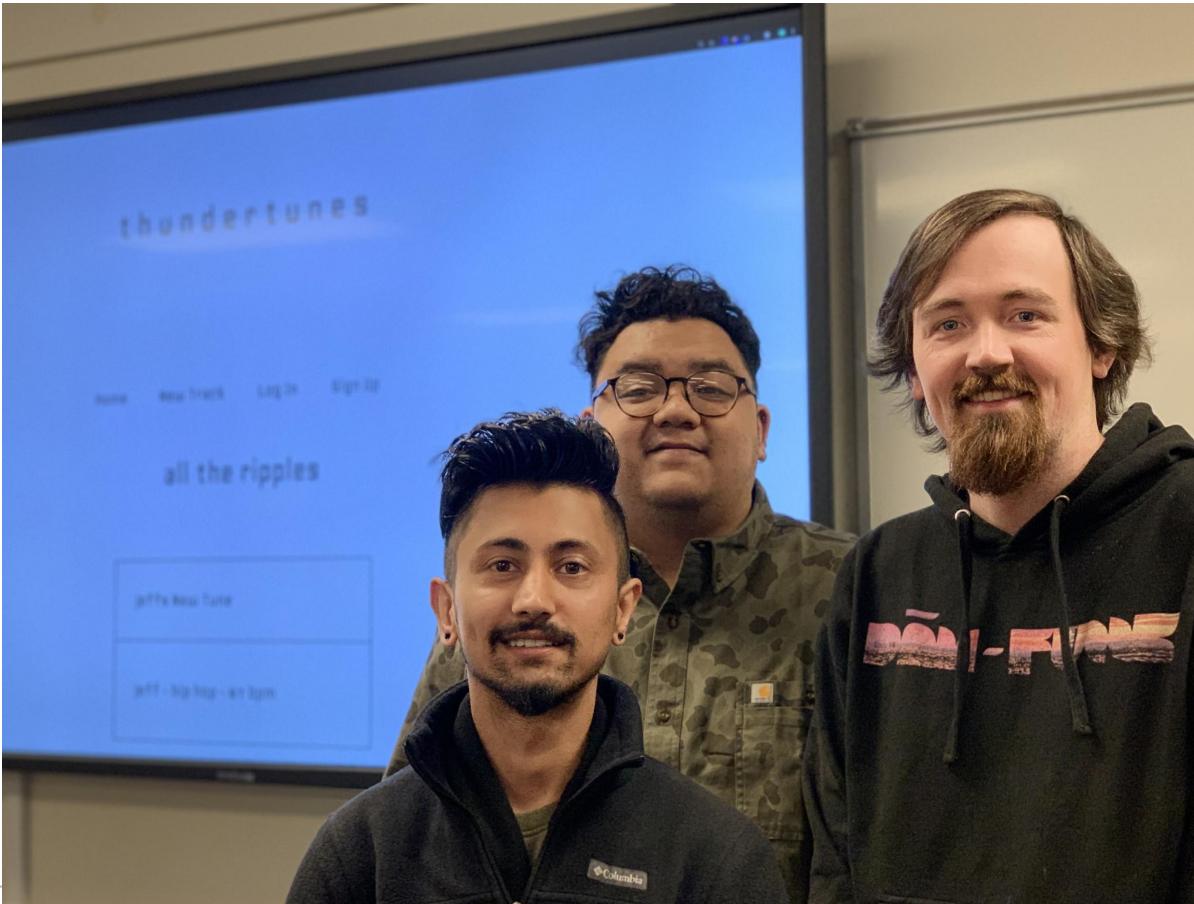




Project 2 - SQL Injectors



Project 2 - RESTless APIs



Project 2 - The Four Loopers



Project 2 - Master Branchers



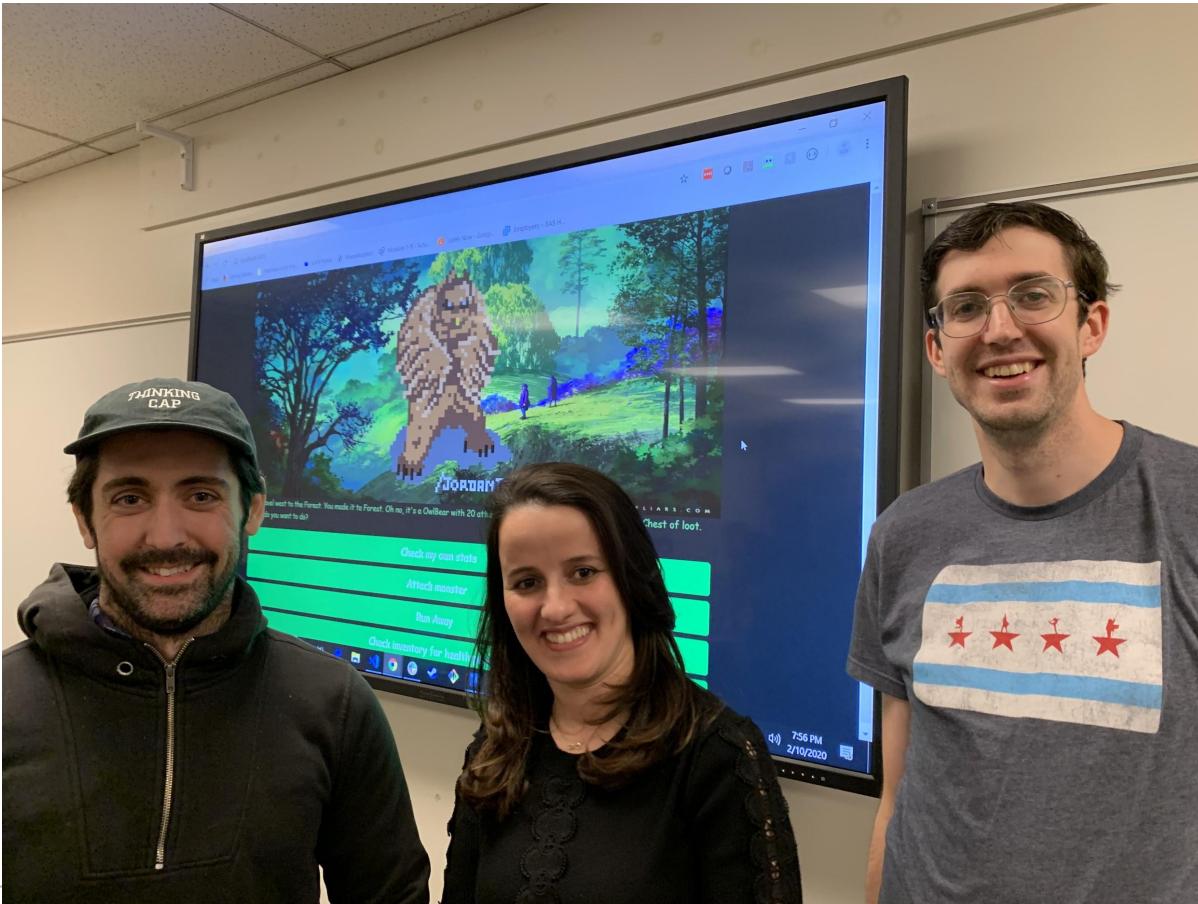
Project 2 - Heroku Heros



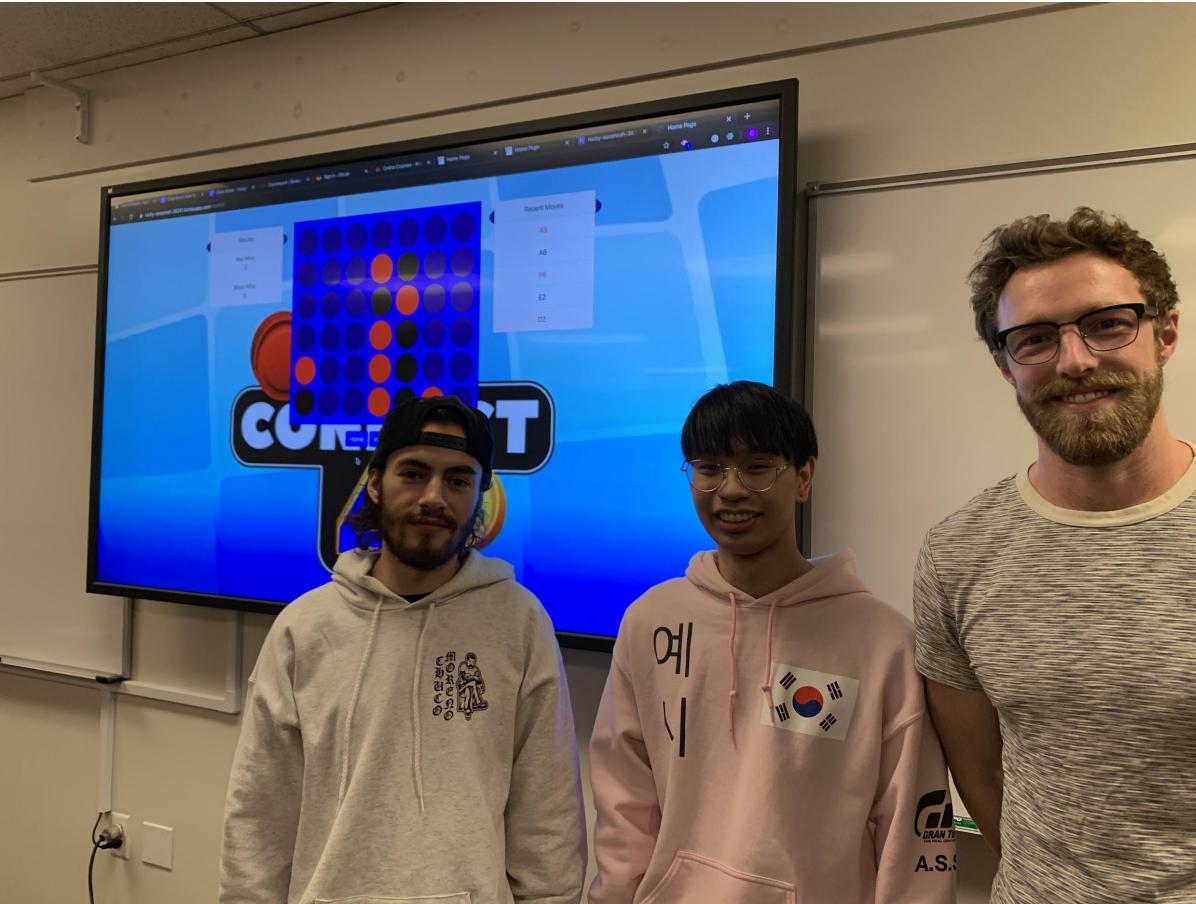
Project 2 - The Rushin' Hackers



Project 2 - The Binary Trio



Project 2 - The Primary Keys



The Clear Positives



++ You stayed ambitious.



++ You made smart decisions feature-wise.



++ You demonstrated technical mastery.



++ You did a ton of learning on your own.



++ You closed out.



++ You dominated.



++ You didn't make excuses even when you had them.

Advice For Next Time

01

Always start with guns blazing. The first 30 seconds always count. Always come ready to impress. Show a demo. Say something interesting.

02

Practice, practice, practice. The difference between good speakers and weak ones is in the execution of minor details. Don't get lost in transitions. Don't get lost looking for your code.

03

Don't be afraid to take charge. Learn to be confident by default. Chime in when you can. Look for ways to lead in the groups you find yourself in.

Next Steps

01

GIF your GitHub readme. Back-end projects like the ones you completed are harder to “see” for a recruiter. Throw in a GIF that flips through all the screens of your project. There are plenty of ways to record a video and convert it to GIF. *This will look really impressive.*

02

Create a guest login. Have a “dummy” guest login to enter your application. Make it easily apparent on your readme.

03

Write a tutorial. Pitch a tutorial to scotch.io if you used any unusual libraries. You will get \$\$\$ and build credibility.

Next Steps

04

List your niche skills on LinkedIn. All of you should be listing Node, Express, SQL, data visualization, etc. on your LinkedIn profile.

05

List your project on LinkedIn. If you don't have a lot of tech experience on LinkedIn, milk the project you created for all its worth—especially if it is really good.

06

Consider writing recommendations for each other. I will remind you about this later as well—consider writing recommendations for your group members and peers. Right now you are all students, but you won't be for long. Spread the credit!

The Road Ahead

The Road Ahead: Your Final Journey

MongoDB
React

Computer Science Fundamentals:

- Algorithms
- Big O Notation
- Data Structures



Double Down

It's time to double down and make sure you have a strong foundation.



You have access to me and the TAs for two months.



Look through the code base. Identify your weaknesses.



Schedule a help session during office hours.



And put in the hard hours!



This is the **absolute best** time to learn this material.

Start Now. Don't Procrastinate.



Your Goals: Beginning of the Year



"To land a solid career and be able to support my family."



"Hope to make something of myself one day."



"An opportunity to be more creative in my day-to-day work."



"To get a better paying job."



"I want nothing more in the entire world than to be a game designer."



"Change careers and become a web developer."



"To build mastery. To learn a skill that I haven't yet explored."



"To create a chapter better than the last."



For Reference:

Students who do well in our part-time classes tend to put in an average of **20 hours a week** for homework and self-study.

MongoDB

What's MongoDB?



MongoDB is a very popular noSQL database.



It uses a document-oriented model as opposed to a table-based relational model (SQL).



MongoDB stores data in BSON format (effectively, compressed JSONs).



MongoDB has tons of drivers and packages for connecting to Node, C++, Java, etc.

What's MongoDB?



What's MongoDB?



vs



What's MongoDB?



vs



<https://www.youtube.com/watch?v=4r7wHMg5Yjg>

Relational Databases (SQL)

ID	Title	Author	Published
1	The History of Blah	Blah Matic	2010
2	The Chronicles of Blahrnia	Sir Blahston	2011
3	Love in the Time of Blah	Gabriel Garcia Blah	2013



SQL relies on **joins** to combine relevant data.

Author	Email	Phone Number
Blah Matic	blahston@gmail.com	911-546-5454
Sir Blahston	blahby@gmail.com	911-544-5112
Gabriel Garcia Blah	blahby231@gmail.com	125-215-5645

Document Database (noSQL)

noSQL databases, on the other hand, are effectively JSONs.

They excel at heterogeneous data formats and are easy to implement.

```
  {
    "id": 1,
    "Title": "The History of Blah",
    "Author": {
      "name": "Blah Matic",
      "email": "blahston@gmail.com",
      "phone": "911-546-5454"
    },
    "Published": 2010
  },
  {
    "id": 2,
    "Title": "The Chronicles of Blahrnia",
    "Author": {
      "name": "Sir Blahston",
      "email": "blahby@gmail.com",
      "phone": "911-544-5112"
    },
    "Published": 2011
  },

```

MongoDB Storage

Database composed of multiple collections

Collection composed of multiple documents

```
{  
  {  
    {  
      "Patientid": "AFH123",  
      "PatientName": "Ahmed",  
      "Age": 25,  
      "BiomarkersTested": ["CRP", "MYO", "CKMB"],  
      "BiomarkerScore": 96  
    }  
  }  
}
```

} Individual **Document**

Collection composed of multiple documents

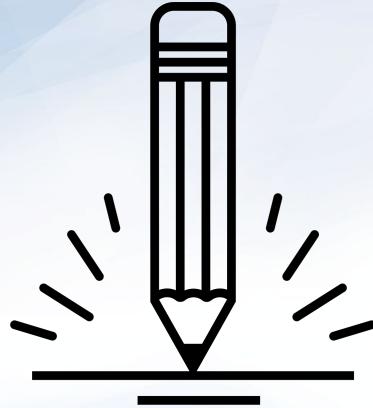
```
{  
  {  
    {  
      "Patientid": "JTM987",  
      "PatientName": "John",  
      "BiomarkersTested": ["CRP", "MYO", "BNP"],  
      "BiomarkerScore": 90,  
      "Location": "NYC"  
    }  
  }  
}
```

} Individual **Document**

MongoDB Storage

Terms are slightly different in the noSQL context. Take note!

SQL Term	noSQL Term
Database	Database
Table	Collection
Row	Document
Column	Field



Partner Activity:

Questions & Answers

Suggested Time:
10 minutes



Partner Activity: Questions & Answers

Work with your neighbors to research the following:

01

What are the advantages of using a noSQL database like MongoDB according to the MongoDB website?

02

What are the advantages of using a noSQL database like MongoDB according to the web (according to places like Quora)?

03

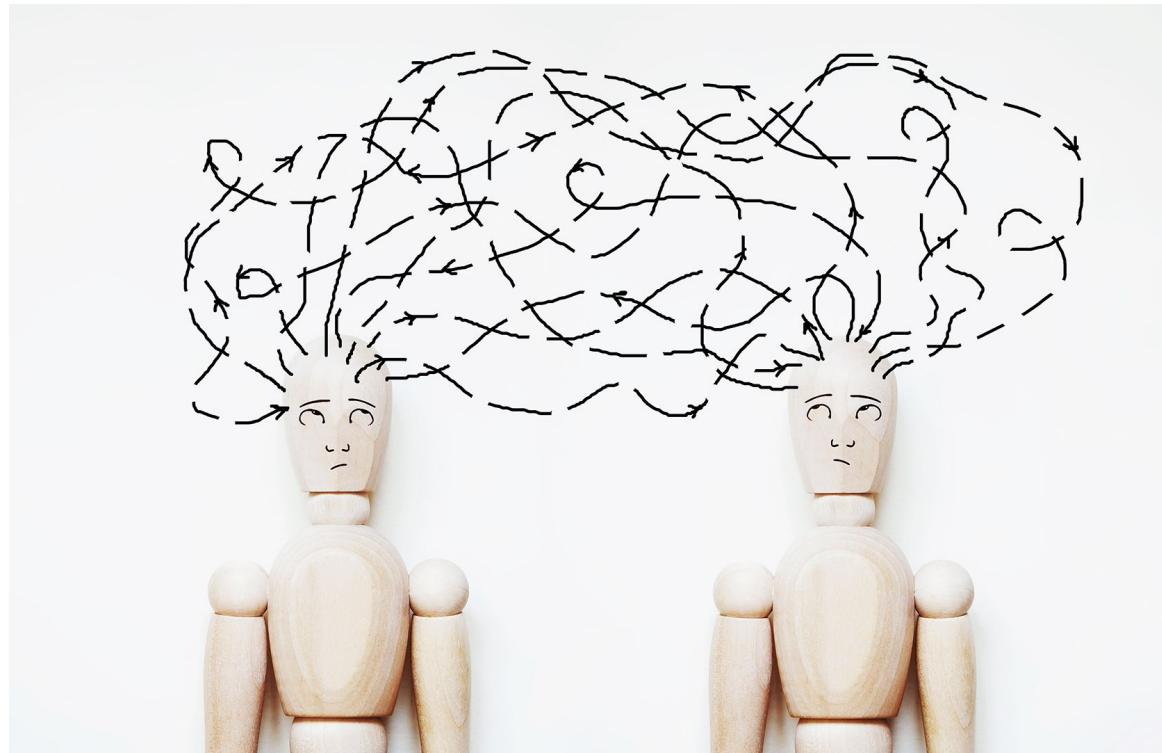
What are the disadvantages of using a noSQL database like MongoDB according to the web (according to places like Quora)?

Suggested Time: 10 minutes



Learn to See Through the Nonsense

The tech world is filled with it.



<Time to Code>

