

Day 54

Masters of MongoDB

The Coding Bootcamp | May 23, 2017

Project Recap

Awesome Job

(Y'all don't need memes anymore. You are professionals now.)

Just Kidding.



The Clear Positives

- (++) You stayed ambitious
- (++) You made smart decisions feature-wise
- (++) You demonstrated technical mastery
- (++) You learned 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

1. **Always Start with Guns Blazing**

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

2. **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.

3. **Don't be afraid to take charge**

Learn to start being confident. Chime in when you can. Look for ways to lead in the groups you find yourself in.

Next Steps

1. 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.*

2. Create a Guest Login:

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

3. Write a Tutorial:

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

Next Steps

4. List your Niche Skills on LinkedIn:

All of you should be listing out Node, Express, SQL, Data Visualization, etc. on your LinkedIn Pages.

5. List your Project on LinkedIn:

If you don't have a lot of tech experience on LinkedIn milk the project you created for all it's worth – especially if it was really good.

6. Consider Writing each Other Recommendations:

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

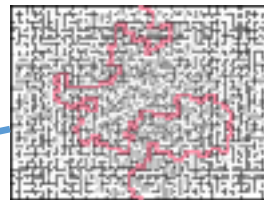
Road Ahead...

The Road Ahead...

Your Castle of Knowledge



Your Final Journey



Alg1: $O(n^2)$
Alg2: $O(2^n)$
Alg3: $O(n \ln(n))$
Alg4: $O(n^3)$
Alg5: $O(n!)$

This Should be You



A Castle of Knowledge

But if this is you...



A Crappy Castle of Knowledge

Double Down

Then it's time to double-down and get caught up.

- You have access to myself and the TAs for 2 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.



Because let's be real.

*You aren't going to
start when you
graduate.*

Your Goals – Beginning of the Year

“To land a solid career.. and be able to support a 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.”

“[a chapter] better than the last.”

For Reference...



Students who tend to be doing well in our classes are putting in an average of 17 hours per week.

MongoDB

What's MongoDB?

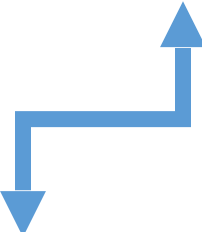
- MongoDB is a very popular **noSQL Database**
- It uses a **document-oriented model** as opposed to a table-based relational model (SQL)
- MongoDB stores data in **BSON Format** (effectively compressed JSONs)
- MongoDB has tons of **drivers and packages** for connecting to Node, C++, Java, etc.



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)

```
{
  "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
},
```

- *noSQL Databases on the other hand are effectively JSONs.*
- *They excel at heterogeneous data formats and are easy to implement.*

MongoDB Storage

Database composed of multiple collections

Collection composed of multiple documents



Collection composed of multiple documents



MongoDB Storage

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

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

> YOUR TURN!!

Quick Activity:

Work with your neighbors to research the following

1. What are the advantages of using a noSQL database like MongoDB according to the **MongoDB Website**?
2. What are the advantages of using a noSQL database like MongoDB according to the web (places like Quora)?
3. What are the disadvantages of using a noSQL database like MongoDB according to the web (places like Quora)?

Learn to See Through the..



The tech world is filled with it.

Code Time!
