Minimum qualifications:

* BA/BS degree in Computer Science or related technical field, or equivalent practical experience.
* Experience or previous project assignments with Data Structures and Algorithms (i.e. selecting and implementing an algorithm, using data structures to solve a problem.) Experience creating algorithms that improve a product’s capabilities, speed, efficiency, or reliability.
* Experience in writing code fixes and tools to solve problems in C, C++, C#, Java, JavaScript, Go or Python (e.g., removing duplicate elements from a list) and experience in optimizing code (e.g., crawling, search, troubleshooting).
* Experience with data structures, branching, function-calls, and conditionals as well as debugging code and submitting the fix.

Preferred qualifications:

* Graduated from a BS/MS program in Dec 2017 or Spring/Summer 2018.
* Experience developing thorough testing solutions across testing layers (e.g., unit, functional, integration, stress testing) for your code, using one or more of the following: C, C++, C#, Java, JavaScript, Go, or Python.
* Experience manipulating code to improve system availability and latency; Experience with improving inventing or proving the value of new algorithms that improve a product's capabilities, speed, efficiency and reliability.
* Demonstrated experience programming in 2 or more of the above languages: C, C++, C#, Java, JavaScript, Go or Python.
* Previous tech internships or relevant work experience programming in C, C++, C#, Java, JavaScript, Go or Python.
* Skill in isolating problems to a database subsystem.

As a daily user of Youtube for both entertainment and education (and any combination of things in between), I’ve witnessed the small and big changes that came to the platform over the years. Small changes like fast-forwarding and backing up in 10 second intervals only complemented the larger changes such as progressively better recommendations. It would be a delight to be a part of this team that works with one of the largest social platform on the web.

By the summer of 2018, I will have graduated from Carleton College with a degree in Computer Science. In that journey, I’ve familiarized myself with tools and knowledge that is essential in working in a software development setting and in doing so, developed a way of thinking that aids in solving problems that may exist outside of my scope of expertise. This paired with my wide exposure to different disciplines makes it possible for me to apply this way of thinking in any other area.

Like any other CS major, I’ve done many projects that involve decision making on data structures and algorithms, but the most recent example is for my senior-year capstone project. In creating an automated tool for discovery in legal cases, I contributed to deciding on implementing random forests over any other algorithms based on the size and nature of the data set as well as considerations for the specific functionality and difficulty of implementation. I feel that this is a good example of my ability to make sound decisions when not all the information is available to me. The large amount of data that we are working with necessitates an optimization on the now-fairly-complicated code that we achieved using code profilers and unit tests. Additionally, the system’s ability to handle variable data was tested through stress testing. This project is being done in Python, which I would say is my most comfortable language.

In the past summer, I worked on developing a prototype for a new social media app that would be presented to investors. In doing so, I made the decision to create it using Apache Cordova, so I have some extensive experience in using Javascript in this setting. Additionally, I’ve used the language in past assignments, one of which was creating a webapp that was connected to a custom-made API written in Python. Through other classes, I have experience in using C/C++ and Java, and would not have a hard time learning a new language or becoming an expert in ones that I already know.

With all of the above considered, I feel that I am a good match for this position. I have plenty of experience in creating things using code, but more than that, I have a strong algorithmic background which comes in handy, especially for larger projects. Additionally, I feel that my liberal arts exposure will help me to understand and connect the relationship between what I might be writing behind the computer to the greater community that exists on Youtube.