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WORK EXPERIENCE      MORE AT: [LINKEDIN.COM/IN/IMANABDUL/](https://www.linkedin.com/in/imanabdul/)

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- **ColdSpace LLC (Start-Up)** Buffalo, NY  
*Software Engineer* *Nov 2018 - Feb 2019*
  - Designed and implemented a solution to query pertinent subscriber data from the start-ups remote MySQL database, that leveraged Python-Peewee ORM, coupled with a series of implemented triggers. The query is crucial in that it sets the combinations to each solenoid-lock protected refrigeration compartment, needed so subscribers can use the start-ups product at the time they reserved their compartment.
  - 'Normalized' pre-existing MySQL database tables to eliminate redundancy and to mitigate scalability concerns.
  - Implemented form-field validation using jQuery, and PHP; added SHA-256 passcode encryption. Created new, and enhanced pre-existing web-pages to accurately reflect subscriber information.
- **UB Nano-Satellite Lab** Buffalo, NY  
*Flight Software Co-Lead Engineer* *Oct 2018 - Present*
  - Co-lead a small Software Team of roughly 20 undergraduates understand requirements, develop-code, and unit tests in C++, to meet & fulfill expectations set by the US-AFRL.
  - Lead weekly 'work-sessions' 3 times a week, where I frequently conducted code-reviews, discussed current goals, and gave software tool tutorials.
  - Developed various software, primarily in C++. One particular task I completed was the implementation of software that appropriates voltage & current to the satellites hardware peripheral devices by way of a 16Bit micro-controller.
- **UB Nano-Satellite Lab** Buffalo, NY  
*Undergraduate Research Software Engineer* *Sep 2016 - Sep 2017*
  - Built web pages for the 'Mission Control web-portal': a web-client that is used to send commands to the GLADOS Satellite when it is in Space. Web-pages were built using HTML, CSS, JavaScript, jQuery-AJAX.
  - Developed automated unit-tests leveraging Python, Flask-Unit Testing Framework, Selenium WebDriver, and MongoDB.
- **University at Buffalo** Buffalo, NY  
*Teaching Assistant* *Jan 2018 - Feb 2019*
  - **CSE 331 Algorithm Analysis & Design**
    - Lead of Homework Video Implementation and Design: the process of taking the Homework: Algorithmic Programming and Mathematical-Proof Questions, and creating YouTube content for students to use as help with their assignments.
    - Other Duties: Homework & Exam Grading, Invigilation, 1-on-1 Tutoring, Teaching Labs, Hosting Office Hours
  - **CSE 111 Quantitative Analysis**
    - Taught primarily algorithmic and quantitative reasoning techniques and skills to labs of roughly 25-40 students.
    - Other Duties: Homework & Exam Grading, Invigilation, 1-on-1 Tutoring, Teaching Labs, Hosting Office Hours

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SOFTWARE PROJECTS      MORE AT: [GITHUB.COM/IHABDULR](https://github.com/ihabdulr)

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- **StopBy Android App (Java, Google-Maps API, Firebase NoSQL DB, Node.js):**  
Developed utilizing agile software implementation methodology: the app facilitated location based meetings between users, using Google maps, and offered a user-to-user messaging system.
- **Contact-Book Desktop App (JavaFX, Java)**  
Mac & Windows compatible. Supports adding images, and V-Card Export (Drag & Drop), and URL Support; users can add contacts & their corresponding info, save and load, using this desktop app.

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HONORS & AWARDS

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- **Best Undergraduate Teaching Award** awarded by, UB Department of Computer Science & Engineering.
- **George Norton SEAS Scholarship** awarded by, UB Department of Computer Science & Engineering

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SKILLS

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**Preferred Lang. & Tech.** Python, C++, Java, JavaScript, PHP, MySQL, HTML, CSS, Vim, Atom, Unix  
**Familiar Lang. & Tech.** Android Studio, Firebase, Google Maps API, JavaScript, REACT, jQuery, AJAX, MongoDB, Selenium WebDriver, Flask Testing, JavaFX, JavaSwing, Phaser.js