

Education

Lebanese University, Beirut, Hadath:

oct 2022 – Jun 2025

Bachelor of Science in Computer Science

Relevant Coursework: Data Structures and Algorithms, Computer Networks, Software Engineering, Object Oriented Programming, full-stack web development, mobile development, design patterns, software engineering

Projects

Algorithm Hub | [link](#)

- Developed understanding of data structures with 14 interactive visualizations.
- Created custom animations using D3.js for complex algorithms, combining educational value with technical skills in JavaScript and D3.js.

ChurnInsights | [GitHub](#)

- Built a machine learning model to predict customer churn with five models (Logistic Regression, Random Forest, XGBoost, SVM, Decision Tree).
- Achieved 81% accuracy using techniques like cross-validation and hyperparameter tuning.

MyGit | [GitHub](#)

- Built a simplified Git version in Python, implementing 16 core commands such as commit, logs and more.
- Designed a user-friendly CLI for streamlined repository management.

Full-Stack Real-Time Chat Application | [link](#)

- Implemented a complete chat solution with real-time messaging and secure authentication.
- Built both frontend and backend components using Socket.io, JWT, and Bcrypt.

LearnSphere | [link](#)

- Built an online course platform using Laravel, implementing Spatie for advanced role-based access control and secure user permissions.
- Designed and managed database schema with Eloquent models and migrations, ensuring efficient data relationships and scalability.

Technologies and Languages

- **Languages:** C++, C, Java, JavaScript, Python, SQL, Matlab, HTML, PHP
- **Technologies:** SQL Server, PostgreSQL, Git, Node.js, D3.js, MongoDB, Pandas, Matplotlib, React, Express, Django, Docker, Flask, sickit-learn, android studio, laravel

Certifications

- **Andrew ng ML specialization** (Audited) – Coursera | [Notes](#)
- **Data Analysis with Python** – free code camp | [link](#)