

Can Göloğlu

SOFTWARE ENGINEER

FREDERICKSBURG, VA 22407

[GITHUB](#) | [LINKEDIN](#) | [WEBSITE](#) | [EMAIL](#)

SUMMARY

Life-long learner. Former physician. Developed a deep passion for clean software architecture, informed by firsthand experience of its transformative effects. Self-driven, detail-oriented team player, dedicated to creating efficient, user-friendly software and pushing technology's boundaries.

SKILLS

Programming Languages: HTML | CSS | JavaScript | Python | C# | Visual Basic | C++

Frameworks: NodeJS | Mongoose | Express | Angular | React | Bootstrap | EJS | jQuery | Jest | Django | Tensorflow | Keras | .NET Core | EF Core

Databases: MongoDB | PostgreSQL | PL/SQL

Tools: VS Code | VS Community | Replit | Git | ChatGPT | Stable Diffusion | Postman | NSwag | MediatR

Enterprise Software: Slack | Zoom | Microsoft Office | Adobe Suite | Blender 3D | Unreal Engine | Brush

Spoken Languages: English (Fluent) | Turkish (Fluent) | French (Intermediate) | Spanish (Beginner)

SOFTWARE ENGINEERING EXPERIENCE - PROJECTS

[The Thomas Collective](#) | [Django Full-Stack Travel App - Team Project](#) | [Full Stack Developer](#)

Tech Stack: Django, Python, Materialize, JavaScript, HTML5, CSS3

[Github](#) | [Live Site](#) | [Live Site Mirror](#)

- Collaborated with 3 other talented developers to develop and deploy a fully-functional CRUD (Create Read Update Delete) app, leveraging Django's built-in user authentication capabilities, as well as adding email verification.
- Leveraged mob programming approach to collaborate and turned challenges into learning opportunities.
- 2 days before deadline, we had to revise our data-entity model due to an initial oversight in planning phase. Successfully overcame this challenge as a team and were able to deliver a highly polished project.

[email-verify](#) | [Lightweight Email Verification Extension for Django](#) | [Backend Developer](#)

Tech Stack: Django, Python

[Github](#) | [PyPI](#)

- What started as an experimental feature during a group project, turned into a personal side project where I employed best-practices and Django style design patterns to deliver, package and distribute a reusable lightweight Django app for email verification during sign-up
- Utilized clean architecture with separation of concerns to offer developers an easy to integrate email verification workflow with out-of-the-box functionality as well as granular customization options, with full documentation, with less than a week between ideation and first release.

[eyeConnect](#) | [MEN Full-Stack Telemedicine Web Application](#) | [Full Stack Developer](#)

Tech Stack: MongoDB, Express, NodeJS, EJS, Bootstrap, Tensorflow, Keras, Python, Flask, Docker

[Github](#) | [Live Site](#)

- Utilized MEN (MongoDB, Express, NodeJS) stack with EJS (embedded javascript) and Bootstrap5 to build a highly interactive and responsive tele-medicine web application called eyeConnect that connects non-specialist health care providers (HCP) with ophthalmology specialists for early detection of diabetes induced retinopathy (DR) in underserved regions where access to specialized eye care may be limited.

- Deployed a previously trained AI system for automatic classification of retina images with respect to DR as a private API for eyeConnect to consume, so as to provide non-specialist HCPs with early guidance.
- Followed MVC conventions with added service layer abstraction to decouple business logic from database implementation, used custom middleware to authorize views and actions based on user-role. Followed best practices for a medical data handling application such as enforcing transport layer security between client, backend and AI service as well as implementing encryption at rest for all medical data: exam/consultation notes and images.

[Solitaire](#) | [Desktop Browser Game](#) | [Frontend Developer](#)

Tech Stack: HTML/CSS/JS

[Github](#) | [Live Site](#)

- Leveraged a custom event-driven MVC architecture with vanilla Javascript, HTML5 and CSS3 to build a desktop browser game of Klondike Solitaire as a practice in DOM-manipulation.
- Delivered an interactive gaming experience for desktop users in the browser with numerous game options such as deck color choice, enabling animations, enabling visual feedbacks, animation speed customization, unlimited undo game-mode, scored game-mode, background music; without any 3rd party dependencies so as to improve compatibility (playable in all major browsers except Firefox).
- Wireframed the designs using Figma, documented the software architecture using UML diagrams and provided an extensive documentation of the custom event system for anyone exploring the repo.

[Tic-Tac-Toe](#) | [Responsive Browser Game](#) | [Frontend Developer](#)

Tech Stack: HTML/CSS/JS

[Github](#) | [Live Site](#)

- Built a tic-tac-toe browser game as a weekend project, with 2-player and vs AI modes, with the infrastructure to add additional types of AI opponents as an icebox feature.
- Practiced DOM manipulation, bit board representations and minimax algorithm.

[Workflow Catalog](#) | [Full CRUD App for Internal Co. Use](#) | [Full Stack Developer](#)

Tech Stack: Angular, .NETCore, EF Core, C#, Mediatr, PostgreSQL (dev), PL/SQL (production)

- Leveraged the built-in LINQ (Language Integrated Query) in C#, alongside EF Core (Entity Framework), with dependency injection, CQRS (Command Query Responsibility Segregation) - via Mediatr - with a clean architecture geared towards .NET (separation of domain model, business logic, API and presentation layers with unidirectional dependency flow) to develop a fully-functioning CRUD-application to track and categorize Workflow Diagrams and Use Case Scenario documents created and utilized by fellow BAs (Business Analysts) in the company.
- Integrated with in-house identity service via JSON Web Token and OpenID protocols for user-friendly and secure authentication. This app was deployed and utilized in-house.

[Diabetic Retinopathy Classifier](#) | [Medical Image Classifier PoC](#) | [Data Scientist](#)

Tech Stack: Python, Tensorflow, Keras, OpenCV, NumPy, matplotlib, Jupyter Notebook

- As a proof-of-concept, designed and trained an image classifier for early detection of retinopathy from retina images that was trained on publicly available data and tested on anonymized in-house data. It achieved an F1 score of 0.89 with 85% accuracy for binary classification: while below the SoTA of the time, it was marginally better than our competing potential solution.
- Presented the design, training and testing processes with transparency and as a reproducible Jupyter Notebook to management, leading to the executive decision to form an in-house data-science team.

PROFESSIONAL EXPERIENCE

Pfizer | Remote

Nov '22 - Mar '23

Business Analyst

- Worked with a multi-national team of developers, product owners and project managers at the end stage of a global web-deployment project as part of the global deployment team.
- Contracted for a limited period at the late stages of the project, I learned the ins and outs of the system at hand, and provide assistance and communications to regional deployment teams.
- Established communications between teams, communicated requirements and capabilities between parties. Wrote and presented communication plans. Organized short daily stand-ups with critical software teams to ensure timely progression of project and alignment.

Acibadem Technology | Istanbul, Turkey

Jan '19 - Jan '21

Project Specialist/Data Science Team Lead

- Completed a full-stack CRUD application for the benefit of business analysts in our company, enabling easy tracking and digitalization of workflow and use-case diagrams.
- Completed a proof-of-concept image classification project, leading to the formation of an in-house data-science team, which I was assigned to lead. We won a government grant worth \$300k and bootstrapped several AI projects to be integrated with our existing in house hospital informatics management system (HIMS.)
- Carried out administrative tasks by communicating with clients, gathering requirements, writing documentation.
- Worked with an international team of developers and business analysts for implementation and deployment of our HIMS product at a Malaysian hospital.

Istanbul Public Health Directorate | Istanbul, Turkey

Jan '15 - Aug '17

Physician (General Practitioner) / Systems Designer

- Tasked with identifying departmental and workflow inefficiencies which could benefit from IT solutions and proposing solutions.
- Designed an in-house on-line system for streamlining collection of data from various departments and produced a system design document with workflow diagrams and draft ERD.
- Carried out administrative healthcare tasks such as overseeing immunization programs, teeth and oral-care program for children; performing disease outbreak monitoring; providing smoking cessation assistance, pregnancy evaluations, cancer screenings; organizing educational campaigns, home-visits for bed-ridden patients and psychiatric patients.
- Carried out clinical tasks filling-in for family physicians on-leave, provided non-forensic coronial services by performing initial examination of the deceased.

EDUCATION

General Assembly | Remote

Jun '23 - Sep '23

Certificate of Completion, Software Engineering Immersive (SEI)

Coursera | Remote/Self-Paced

Dec '18

Certificate of Completion, Deep Learning, a 5-course specialization by deeplearning.ai

Coursera | Remote/Self-Paced

Mar '16

Certificate of Completion, Machine Learning by Stanford University

Baskent University | Ankara, Turkey

Sep '09 - Jul '15

(M.D.) General Practitioner