

Graeme Arthur

Senior Software Engineer

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PROFILE

Senior software engineer specialising in Apple platforms, with 10+ years delivering high-quality native apps at scale. Comfortable contributing across the full stack — from native mobile through to frontend and backend — with hands-on experience collaborating with engineers across all layers. I care deeply about craft, testability, and building systems that other engineers can depend on. Experienced with agentic programming tools as part of my day-to-day engineering workflow.

EXPERIENCE

DuckDuckGo

Sep 2022 – Nov 2025

Senior Software Engineer

- Member of the Apple platforms team, shipping iOS and macOS apps to tens of millions of users.
- Led architecture and full lifecycle rollout of the iOS VPN — a core component of the company's first paid subscription bundle.
- Worked closely with frontend engineers on the autofill and password manager experience, designing messaging flows between native and web layers, and reviewing and debugging TypeScript code.
- Worked on DuckPlayer, inspecting and analysing web content to enable Picture-in-Picture video — demonstrating comfort working across native and web layers.
- Developed cross-platform sync and data import stacks; increased sync adoption 3–4x, cut import errors by over 50%, and demonstrably improved browser retention.
- Architected feature flag infrastructure shared across iOS and macOS, enabling safer, data-driven deployment of features.
- Conceived and built the alpha CI build pipeline and internal TestFlight distribution system from scratch.
- Managed regular iOS releases, maintained app health, coordinated incident response.
- Part of the hiring team, reviewing candidates' technical submissions.
- Built features using agentic programming tools (Cursor, Claude Code).

Mimi Hearing Technologies

Feb 2022 – Aug 2022

iOS Tech Lead

- Led iOS SDK architecture and engineering at a hearing health company serving international B2B partners.
- Served as technical point of contact for B2B partner integrations.
- Defined architecture, coding standards, and testing practices across the SDK.
- Introduced internal feature flagging and release train systems to improve deployment reliability.

SoundCloud

2016 – 2021

Senior Software Engineer

- iOS owner of SoundCloud's core audio infrastructure, playback engine, and queuing systems.
- Core developer on the cross-platform C++ streaming engine (Flipper) shared across iOS, Android, and web, including updating CMake build scripts to produce the library as an iOS framework.
- Integrated Apple and third-party playback APIs: AVFoundation, AirPlay, Chromecast, CarPlay.
- Worked across iOS and TypeScript layers; collaborated with a Google representative to implement the Chromecast integration, and contributed to the Creators React Native app.
- Provided technical leadership across all teams that touched the mobile playback stack.
- Built monitoring microservices and GCP dashboards for playback performance visibility; implemented optimised ad content preloading, boosting ads revenue by 7%.
- Built onboarding, upgrade, and downgrade flows for SoundCloud's first subscription product.
- Led Swift unit testing and mocking standards for the iOS collective; built the XCTest UI testing framework using the Page Object Model pattern.
- Contributed to application modularisation, decoupling features into independent frameworks.

Kotikan / FanDuel (post-acquisition)

2013 – 2016

Software Engineer

- Skyscanner: Led adaptive UI refresh for iOS 8, implemented price alert notifications and SSO login; introduced TDD/BDD test coverage and configured Jenkins CI pipelines.
- Standard Life UK: Built a transactional finance app from scratch under strict security and accessibility requirements, using MVP and Clean Architecture patterns.
- WHO Health Stats: Delivered a public health data visualisation app to tight deadlines.
- FanDuel: Built developer tooling including an internal UI snapshot testing (screenshot diff) library integrated into the CI pipeline.

Freelance

2008 – 2012

Audio Designer & Engineer

- Music production, sound design, editing, mastering, and programming for games, film, and theatre.

SKILLS

Core iOS/macOS: Swift, SwiftUI, Objective-C, Combine, UIKit, AppKit, AVFoundation, Core Audio, CoreData, StoreKit, Network Extension, WireGuard, WebKit, SafariServices, Swift Concurrency, NotificationCenter, XPC

Architecture: MVVM, VIPER, MVP, Clean Architecture, modular frameworks, SOLID

Mobile/Web: TypeScript, JavaScript, HTML, React Native (minor), C++ (cross-platform streaming engine), CMake

Testing: XCTest, TDD, BDD, snapshot testing, UI testing (Page Object Model)

CI/CD & Tooling: Fastlane, Jenkins, TestFlight, Firebase, feature flag systems, Danger, CocoaPods, Cursor, Claude Code

Backend / Data: Scala (BFF features), GCP, AWS, Airflow, Grafana, Elasticsearch, Prometheus

Audio / Streaming: AVFoundation, AirPlay, Chromecast, CarPlay, Core Audio, C++ streaming engines, FMOD

EDUCATION

MSc with Distinction, Software Development — University of Glasgow (2012–2013)

MSc, Sound Design — University of Edinburgh (2009–2011)

BA (Hons) 2:1, Music — Newcastle University (2005–2008)