Ben Deane

Principal Engineer, Tech Lead

1729 Taxicab Drive Denver, CO 80202 **1** +1 (555) 867-5309 ben@example.com elbeno in elbeno



I geek out on C++, languages, algorithms, architecture, APIs, teaching, mentoring, functional and network programming.

Experience

2018-current **Tech Lead**, Quantlab, Denver, CO

I lead a team of C++ experts building a next-generation high-frequency trading platform.

- O Extremely modern C++: using C++20 features and beyond.
- Heavily compile-time oriented code, using strong typing and declarative semantics.
- Very low latency requirements: counting nanoseconds.
- O Architecting and implementing composable, ergonomic APIs used by other teams.
- Mentoring and managing a team of 8 engineers (junior/senior mix).
- Working with other tech leads to solve any problem.

2014-2018 Principal Software Engineer, Blizzard Entertainment, Irvine, CA

Tech lead for the Battle.net Desktop App: C++ and JavaScript on Win32 and macOS.

- Worked with engineers and PMs to plan, write tech specs, develop technical roadmaps.
- Architected and implemented systems: presence, network protocol handling, etc.
- O Gave internal talks and workshops on engineering techniques and tools.
- O Started internal "engineering lightning talks" and two internal tech mailing lists.
- Co-lead of the mentorship program for Computer Game Science students at UC Irvine.

2010–2014 Lead Software Engineer, Blizzard Entertainment, Irvine, CA

Team lead for the Battle.net service. C++ on Win32, OS X, and CentOS.

- Mentored and managed a team of 6 engineers.
- Handled live ops for my team's Battle.net systems.
- O Architected and implemented:
 - the social systems and routing infrastructure of the Battle.net server cloud.
 - the client APIs used by the game teams.
 - queueing and game allocation among available game servers.
 - the cooperative matchmaking service for Diablo III.

2008-2010 Lead Software Engineer, Blizzard Entertainment, Irvine, CA

Led a team of 6 that built the previous iteration of the Battle.net platform for *StarCraft II*, *Heroes of the Storm*, and *World of Warcraft*. C++ and ActionScript on Win32, Mac OS X, and RHEL. I built social systems, wrote the system to download and cache data on the client, and implemented an ActionScript-to-C++ FFI and data marshaling system.

2005-2008 Lead Software Engineer, Electronic Arts, Playa del Rey, CA

Lead engineer on *Tiberium*, a hybrid FPS/RTS in the *Command & Conquer* universe using the Unreal 3 engine on PC, Xbox 360, and PS3. I did extensive work on improving lighting, and on threading and optimization. In October 2008, EA cancelled the project.

2003-2005 Senior Software Engineer, Electronic Arts, Playa del Rey, CA

Network game lead for *Goldeneye: Rogue Agent*, an FPS that shipped on Xbox and PS2. I implemented the core of the network game, working with a remote team in Montréal that was building levels and adding features.

2001–2003 **Software Engineer**, Kuju Entertainment, London/Godalming, UK

PS2 and Xbox development. Lead engineer while finalling *Reign of Fire*, network lead for *Warhammer 40,000: Fire Warrior*, one of the first online PS2 titles.

1995–2001 **Software Engineer**, *Bullfrog/Electronic Arts*, Guildford/Chertsey, UK

Jack-of-all-trades: gameplay, systems, tools, UI, networking, localization, audio.

Selected Conference Talks

CppCon 2016 Using Types Effectively

C++Now 2017 constexpr ALL the Things! (with Jase

(with Jason Turner – Best Presentation Award)

C++Now 2018 Declarative Style in C++

(Best Presentation Award)

CppCon 2020 Constructing Generic Algorithms

CppCon 2021 Composable C++

Miscellaneous Skills

Expert C++, git

Intermediate Python, Haskell, JavaScript, Linux, Lisp, French

Education

1992–1995 MA (Cantab) Computer Science

Emmanuel College, University of Cambridge

The Boring Stuff

UK citizen, US permanent resident. References by request.