# **David Watson**

#### d@davidwatson.org

Software developer designing, deploying, and documenting prototypes, products, and processes from API to GUI to HCI across R&D labs, design studios, and tech startups for more than three decades.

# **Experience**

# 2023-2024 Technical Consultant (1099) WYVERN Ltd

Integrated legacy PHP and Typescript point products into unified product suite

# 2021 Technical Consultant (1099) Caterpillar

Built and optimized terrain visualization C++ code ported from Intel to Xilinx

# **2020** Senior Member of Technical Staff (W-2) Carnegie Mellon University

Researched and Developed AI, HPC, and HCI in SEI Emerging Technology group

## 2018-2020 Software Engineering Specialist (W-2) Caterpillar

Collaborated with IT executives to move data storage provisioning to cloud native

## **2016-2018** Senior Software Developer (W-2) RealPage

Transformed legacy crawler into modern cloud native data pipeline

## 2015-2016 VP Product Development (W-2) Wellbridge Health

Sunset MVP, built API backend and production deployment; MAYA designed and developed UX/UI

# **2013-2014** Senior Software Developer(W-2) Forever

Prototyped MVP solo; developed 1.0-2.0 production releases with team of 4;

## 2011-2012 Senior Engineer (W-2) SMaSh

- Built conversational SMS text interfaces with a team of two
- Supported large production clients such as Pittsburgh Steelers and Miller-Coors

## Student Github, Hack PGH, MIT

- Completed Git Foundations Workshop course
- Completed Programming Arduino: Physical Pixels course
- Completed RDBMS and Internet Application Programming (Greenspun/Stonebraker) course

# 2010-2011 Software Development Manager(W-2) Wellspring Worldwide

Led team to transform legacy data center deployment to automated CI/CD pipeline

#### Student UPMC

Completed Mindfulness-Based Stress Reduction course at UPMC Shea Medical Center

# 2009 Technical Consultant (1099) TenthRow

Developed live music experience in the browser streaming to fans worldwide

# 2008-2009 Project Engineer (W-2) Qinetiq

■ Ported C# GUI to C++/Qt OCU; Coded python sonar parser/visualization bridging sensors->UI

# 2008 Usability Consultant (1099) MAYA Design

Provided design feedback to MAYA Design on usability of Bayer Diabetes Glycemic Monitor

# 2008 Technical Consultant (1099) Zenit Solutions

Designed and implemented python system to track inbound/outbound movers in Google Maps

## **2006-2007** UI Software Developer (W-2) Nomos

Wrote QA tests for Corvus radiotherapy product; Designed and Prototyped 4D UI/UX

## 2004-2006 Software Design Engineer (W-2) MAYA Design

- Built AJAX stack on Python and NoSQL DB
- Designed and implemented early stage Zigbee drag and drop lighting design prototype for Lutron/Phillips
- Received top 100 Award from InfoWorld magazine for deployment of DHS website

## **2003-2004** *Cofounder (W-2)* **Cobind**

- Won Idea Foundry **fellowship** to launch Cobind
- Ideated and shipped the Cobind Desktop to test the DIY Linux build tools

## **2000-2003** Senior Software Engineer (W-2) Management Science Associates

 Envisioned and implemented client-server web services bridge which imported products from Excel through VBA to DB

## 1995-2000 Principal Member of Technical Staff (W-2) CA Technologies

■ Wrote C++ code on Legent Automation Point, Platinum Raveler, and CA-Unicenter products

## 1992-1995 Programmer (W-2) Mellon Financial

- Implemented C++ on Executive Workbench product on OS/2
- Wrote first bank-wide rolodex in VB

# 1990-1992 Programmer (W-2) United States Steel

Programmed API in IBM/Microsoft C compiler on OS/2 to reduce ops load in the datacenter

# **Education**

- Duquesne University
  - BS/BA Coursework included Business, Computer Science, and Music