COOPER BRISLAIN

Software Engineer • Creative Coder

Interdisciplinary Software Engineer and Visual Artist seeking role on a team developing innovative software around Augmented Reality, Virtual Reality, IoT, and other emerging fields.

TECHNICAL SKILLS

Full-Stack Development Git Unity Flow-Based Programming C# LAMP Linux Apache PHP mySQL

HTML5 SCSS Node.js Javascript JQuery Front-End Development Flash Real-Time Graphics GLSL Shaders

Projection Mapping Video Editing Agile Development Arduino Content Management Systems Adobe Creative Cloud

Photography Event Production Generative Art Integration and Automation Experience Design Rapid Prototyping

Spiline Reticulation Virtual Environments

EXPERIENCE

Lighting R&D Engineer, Simple Machinists 2018

- adobe-creative-cloud
-) git
- > arduino
- generative-art
- > integration-and-automation
- > trello
- agile-development
- projection-mapping
- > rapid-prototyping
- > experience-design

Collaboratively designed custom-fabricated parts for high-performance ARTNet LED fixtures.

Delivered 150 LED fixtures in time for use for installations at live events.

Developed production, q/a, and asset tracking software using QR codes, Pub/Sub, and mySQL

Developed qa and diagnostic tools using Arduino

Designed custom 3D-printed parts to improve durability and normalize assembly.

Made design recommendations based on common challenges encountered in event production.

Motion Graphics Software Engineer & Visual Artist, Vektor Selektor 2011-present

- > adobe-creative-cloud
- [>] arduino
- > unity
- > flow-based-programming
- > c#
- > real-time-graphics-for-live-events
- glsl-shaders
-) quartz-composer
- projection-mapping
- > photography
- > generative-art
- > video-editing
- > blender
-) glsl
- > shaders
- > experience-design

Created audio-reactive, realtime visual content for live events using Unity, Quartz Composer, GLSL Shaders and Processing.

Design human-computer interaction schemes for controlling live visuals using control surfaces and gesture devices, including Wii Remote, XBox Kinect, LEAP Motion, and various MIDI controllers.

Design LED and projection mapping for stages.

Solve complex technical challenges on location, using limited available resources.

Performed original content live before audiences of up to 10,000.

Software Engineer, BetterHelp 2015-2016

- adobe-creative-cloud
- > php
- > lamp
- > linux
-) apache
- › mysql
- > html5
-) javascript
- › regex
- full-stack-development
-) ait
- > front-end-development
- agile-development
- > trello
- analytics
- integration-and-automation
- > refactoring

- > scalability
- virtual-environments
- > vagrant

Worked on an agile development team to release iterative improvements to user experience based on data acquired from multivariate analytics.

Utilized XDebug with PHP and __NginX to identify bottlenecks and reduce landing page load time by 240%.

Developed **automated** qualification and approval for financial aid applicants, freeing significant customer support presources.

Integrated billing system with Paypal's Braintree API, standardizing payment flow and allowing acceptance of new payment methods.

Software Engineer, Visions in Education 2015-2016

- > adobe-creative-cloud
- > virtual-environments
- > full-stack-development'
-) regex
- > wordpress
- content-management-systems
- > trello
- agile-development
- > scrum
- > git
- > angular-js
- > php
- html5
- > mysql
- > SCSS
- platform-migration

Modernized student information portal.

Standardized course catalog and event listings in content management system.

Audited Wordpress extensions and determined optimization strategies to minimize overhead and points of failure.

Audited git repository and codebase diffs to determine points at which undesirable behavior was introduced.

Developed strategies and solutions to avoid future complications.

Lead Software Engineer, Taylor Online Marketing 2010-2017

- > virtual-environments
- > system-administration
-) php
- > lamp
- > mysql
- → joomla
- > wordpress
- → git
- > full-stack-development
-) javascript
-) jquery
- > front-end-development
- → flash
- content-management-systems
- > linux
- > apache
- > nginx
- > system-administration
- > html5
- > SCSS
- regex
- adobe-creative-cloud
- platform-migration
- integration-and-automation
- › rest
- > api
-) plesk

Designed mySQL database for auto-shipping leads.

Built __REST__ful API for partners and affiliates.

Created embeddable form widget for use by affiliates and partners.

Redesigned system for greater extensibility, increasing lead volume and providing additional cross-selling popportunities.

Designed tools for the reporting and visualization of lead data.

Improved efficiency and agility by automating frequent or time-consuming rasks.

Software Engineer, Design Reactor 2008

- > adobe-creative-cloud
- > flash
- actionscript
- > html5

- > css3
- > CSS
-) quartz-composer
- > lamp
- > php
-) javascript
- > expression-engine
-) jquery
- content-management-systems

Developed interactive Flash landing page for Disney Parks 2008 campaign.

Produced pixel-perfect web materials for marketing campaigns, adhering to critical style equidelines.

•Created rich, interactive user interface for agency portfolio, using Actionscript and Expression Engine.

Software Engineer, Jupiter Hosting 2007

- adobe-creative-cloud
- content-management-systems
- > php
- > lamp
- > mysql
-) javascript
-) joomla
- > flash
- actionscript

Developed custom modules and features for Joomla-based content management system.

Optimized mySQL queries for highly-trafficked websites.

EDUCATION

BA Film & Digital Media UC Santa Cruz 2003-2007

COURSEWORK

Abstract Data Structures Algorithms X86 Assembly Differential Equations Discrete Math Linear Algebra Logic

Digital Media Production Film Studio Production Documentary Production Film Theory Digital Media Theory

Social Documentation Java Programming C++ Programming AP Computer Science Cisco Networking

ASSOCIATIONS

Visual Artist, Opulent Chill • 2017 Visual Artist, Wormhole; Oakland • 2015–Present Visual Artist, Camp Question Mark • 2009–)?(Technology Director, SCTV; UCSC • 2005 Student Trustee, Napa Valley College • 2002

INTERESTS

Generative Art Flow-Based Programming Intelligent Lighting

CORE VALUES

The end user's privacy and security is paramount. Monetization shouldn't compromise utility. The best thing to say when you don't know is that you don't know.