DAN CHRISTENSEN
ENGINEER/CHAMELEON

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WHAT I'VE DONE

CUSTOM SOFTWARE/ HARDWARE
Nov 2014-Present

INDEPENDENT CONTRACTOR (NC,CO) → **Quick-learning chameleon**

Work closely with clients to provide custom creative and unique solutions, including designing and building interactive signage along New Belgium's tour route, coding a cubic spline interpolator for a developing snowboard game, and creating complex Excel Workbooks for custom data and reporting solutions.

As an example, I started with almost no experience coding in Excel, but delivered a program powerful enough to impress my client's own IT department.

CUSTOM DESIGN/ CRAFTSMAN
Dec 2012-Present

INDEPENDENT CONTRACTOR (NC,CO) → **Hands-on dexterity**

Design and build custom projects-- furniture, instruments, and whatever else I'm asked to make. I specialize in fully original designs and exploring new techniques.

Working with power and hand tools, building custom jigs, and achieving precision.

DESIGN ENGINEER
Sept 2007-May 2009

NEXEN GROUP, INC. (MN) → **Working with a team**

Performed engineering changes, customized existing products, and designed new products. This involved creating and editing 3D/2D models and drawings, performing mathematical and FEA analysis, building and testing prototypes, and writing product specifications.

Coordinating with other engineers and departments to complete complex projects and tasks in an effective and timely manner.

MOST RELEVANT SKILL

WHERE I LEARNED THINGS

SOUTH DAKOTA SCHOOL OF MINES & TECHNOLOGY
Aug 2003-May 2007

MECHANICAL ENGINEERING (BSME)

I completed various math, physics, circuits, mechatronics, and programming courses. Above all, I learned universal skills of problem solving and the ability to quickly learn and absorb new tools into my engineering toolbox.

MINNESOTA SCHOOL OF PIANO TECHNOLOGY
Sept 2008-Nov 2008

PIANO TUNING AND REPAIR

Hands-on instruction in maintaining, repairing, and tuning pianos (Defebaugh tuning method).

METROPOLITAN STATE UNIVERSITY OF DENVER
Dec 2009-Dec 2012

MUSIC COMPOSITION

Music theory, notation, ear training, arranging, writing for specific instruments, cello performance, basic playing skills for strings, woodwinds, brass, and percussion.

MY SPECIFIC SKILLS

Proactively **learning and growing** skills for any given project

Seeing obstacles and unknowns as puzzles to be solved

Working with microcontrollers: **Arduino/Teensy/Axoloti Core**

Programming: **C/JavaScript/VBA**

Circuit board design: **KiCad**

CAD/CAM: **SolidWorks, Fusion 360, using a CNC router**

Fabrication using various materials

Building quick mockups to test ideas (both physical and virtual)

Photo/Document editing: **Photoshop/Inkscape/MS Office**

MY INTERESTS/HOBBIES

Synthesizers I'm building an eight-voice polyphonic synthesizer on a microcontroller. My current build has about 4,500 lines of code.

Playing cello and piano

Rock climbing, biking

Puzzle games One of my favorites is *The Witness*.

Combining my interests across fields in weird projects On any given day I might sketch out designs, code physics equations, work with power tools, or create wind sounds for a video game, and I love that variety.

Cooking Usually involving spicy peppers and cheese.