# <u>www.CarlAllanSommer.com</u> <u>https://www.linkedin.com/in/carl-sommer</u>

317-201-2665

# **UX Designer | Product Designer | Prototype Developer**

Innovative product designer with a strong technical foundation in interactive prototyping and real-time system optimization. Adept at bridging the gap between design and development, leveraging expertise in design systems, game engines and interaction design to create intuitive, high-performance digital experiences. Passionate about scalable design systems, accessible interaction models, and achieving results through cross-team collaboration and user feedback. Proven track record of leading teams, mentoring developers, and delivering cutting-edge interfaces across gaming, automotive, web, and enterprise applications.

# **Areas of Expertise**

UX/UI Design | Design Systems | Prototyping | Wireframing | Information Architecture | Cross-functional collaboration

#### **Technical Skills**

Figma | Illustrator | Photoshop | After Effects | Unreal | C++ | Blueprints | Unity | C# | HTML | CSS | Git | SVN | Jira

## **Professional Experience**

# PACCAR

(Kirkland, WA) April 2019 - February 2025

Technical UX Designer / Prototyper

September 2022 - February 2025

- Designed UX/UI and developed front end for electric truck app, boosting battery efficiency via driver coaching.
- Led a six person team in analyzing, writing and presenting a report on the UX and ergonomic impact of new HUD technology to be considered by Peterbilt for alignment with business goals and technical feasibility.
- Collaborated with cross-functional teams while contributing to the design, documentation and prototyping of various apps and systems within Kenworth and Peterbilt's in-vehicle infotainment displays.
- Established a process for developing rapid prototypes used in a series of weekly user tests that built upon each other to support larger-scale user studies with both quantitative and qualitative metrics.
- Expanded upon the design system to support additional use cases for prototyping, documentation and marketing asset needs on top of wireframing and high-fidelity UI art purposes.

## Front End Development Lead

June 2020 - September 2022

- Mentored and supervised a team of up to five developers to fully restructure the front-end for DAF's digital display. Ultimately reduced project size by over 323%, VRAM consumption by 345% and improved FPS by 233-275%; all while continuing to add new features as the project was being refactored by reducing redundant code and assets..
- Improved developer efficiency and performance metric tracking by implementing revisions to the development pipeline and project architecture.

UI Technical Artist April 2019 - June 2020

- Improved digital display performance and scalability by establishing a foundational set of reusable design components and code used throughout both the Kenworth and Peterbilt branded displays.
- Created a safer driving experience by developing new functions in accordance with ISO standards and NHTSA guidelines associated with driver distraction, font and icon legibility and asset color contrast.
- Improved driver experience during startup by establishing an asset loading strategy and developing custom Kanzi features to support dynamic asset loading.

# Soma Games August 2018 - April 2019

UI Designer / Developer

- Designed and implemented main menu UI, interaction flows and animations for desktop/console interface.
- Adapted existing UI art and created new UI art for mobile interface.

## **Frontwire Studios**

**December 2016 - May 2018** 

UI Designer / Developer

- Designed, developed and created art and animations for desktop/console game UI elements including the main menu, multiplayer lobby, HUD's for air and ground vehicles, weapon crosshairs, etc.

# **Wonky Rhino Games**

September 2015 - Present

Founder, Game Designer, Graphic Designer

- Designed game mechanics, graphics and rulebook to ensure accessibility and clarity for two board games.
- Conducted user tests, regularly iterating upon rules and components to support fun, intuitive gameplay.
- Designed assets for game and marketing content including print, social media, videos and websites.
- Managed deadlines, budgets and relationships with printers, reviewers and other media contacts prior to Kickstarter launch.

**Purdue University** 

August 2014 - May 2016

Polytechnic Institute Teaching Assistant

- Contributed to lesson plan design, lecturing and student feedback, grading and evaluations for four computer graphics classes covering first-year intro to design, second year raster graphics and vector graphics and third year visual effects and compositing.
- Collaborated with and mentored over 200 students, providing weekly feedback and guidance on their progress.

## **Additional Relevant Experience**

## **CG Visions**

Web Designer

## Intellihire

**Application Developer** 

## **Exhibit Design Center**

Game Designer / Developer

## **Education**

## M.S. Computer Graphics Technology

Purdue University, West Lafayette, IN

## B.S. Computer Graphics Technology / Minor in Art & Design

Purdue University, West Lafayette, IN

#### **Selected Volunteer Activities**

## **Unreal Engine Bootcamp Instructor**

February 2023 - August 2023

- Developed an 8-week curriculum focused on teaching Unreal Engine and Blueprint technical essentials, emphasizing key game design concepts such as accessibility, level design, and systems design.
- Created and implemented a one-button-control game as a practical learning tool for the course.
- Delivered lectures and authored detailed tutorial materials to support student learning and engagement.

## Computer and Design Foundations Instructor

May 2015 - July 2015

- Designed/taught 6-week curriculum for teaching introduction to graphic, web and user experience design for non-English native language students.
- Designed/taught 6-week curriculum for teaching non-English native language students basic computer skills including using Microsoft Windows and the Office suite as well as efficient keyboard and typing form.