

DIEGO CRISAFULLI

Address: 3680 Loreto, Brossard, J4Y 3G6

Cell: 514-679-5568 · Email: diego.crisafu@gmail.com

[LinkedIn](#) · [Personal Website](#)

OBJECTIVE

To transform industries and enrich human experiences by merging advanced AI, simulation engineering, and 3D artistry. Guided by a passion for immersive innovation and a proven track record in VR/AR, generative AI, and interactive design, I strive to pioneer breakthroughs that solve real-world challenges, empower teams, and shape the future of cutting-edge technology.

EDUCATION

Concordia University

Double Major in Computational Design & Computer Science

2022 – Present

- Engaged in projects spanning 3D graphics, high-performance computing, and AI development.
- Gaining hands-on experience with advanced equipment for game engine development and machine learning.

Marianopolis College

DEC Commerce (Completed)

2020 – 2022

- Strengthened critical thinking and methodology skills with a focus on business and information systems.

Heritage Regional High School

iCan - Innovative Computer and Networking Program (Completed)

2015 – 2020

- Specialized high school curriculum emphasizing computer technology, software engineering, and web design.
-

PROJECTS

VR Brain Installation | *Collaborating with McGill University Neuroscience*

September 2024 - Expected Completion: April 2025

- Partnered with a neuroscience PhD candidate to develop a VR experience using actual brain scan data.
- Processed and converted neural imaging files into VR-compatible formats, preserving scientific accuracy and visual fidelity.
- Led the design and development of interactive 3D environments, integrating Unreal Engine, C++, Python, Maya, and AI-based plugins.

EXPERIENCE

IVR System Developer | CAE

September 2024 – Present (contract until May 2025)

- Designed and executed comprehensive test plans for IVR solutions, ensuring alignment with user requirements and best practices.
- Developed and optimized automated test scripts (JavaScript, XML, JSON), boosting testing coverage and reducing defects.
- Analyzed test outcomes, identified root causes, and collaborated with cross-functional teams to enhance system reliability.
- Proposed continual improvements to IVR functionality and user experience, driving measurable gains in customer satisfaction.

Software Engineer Intern | CAE

October 2023 – September 2024

- Contributed to the Ondulus IR team, developing and testing advanced simulation technologies including night vision, LiDAR, and infrared systems.
- Led C++ sensor testing processes and optimized algorithms to automate testing workflows.
- Created comprehensive test cases to validate physics-based simulation modules under diverse conditions.

Enterprise IT Asset Management, Full-time Student | CAE

June 2023 – August 2023

- Oversaw the handling, movement, and minor repair of equipment
- Communicated and proposed solutions to improve operational processes.
- Delivered solutions for efficiency in the handling of assets

Simulation Developer, Student | PRESAGIS

June 2022 – June 2023

- Coded simulations using NVIDIA Omniverse Isaac Sim, implementing machine learning, point cloud, and lidar technology for AI solutions.
- Integrated USD (Universal Scene Description) workflows into Velocity5D.
- Created digital twins with 3D modeling, texturing, and mapping; collaborated with developers and 3D artists on project briefs and demos.
- Utilized Python for automation and tool development.

3D Artist/Developer, Part-time Student | PRESAGIS

September 2021 – June 2022

- Built a robust library of custom 3D models, textures, and animations using Unreal Engine, Omniverse, and Blender.
- Employed Python scripting to streamline asset creation and optimize 3D workflows.
- Collaborated with cross-functional teams to deliver visually engaging simulation assets for client demonstrations.

3D Artist, Summer Student | PRESAGIS

June 2021 – August 2021

- Created 3D assets, visual effects, and animations for game engine-based visualization frameworks and services.
 - Contributed to rendering pipeline development, surface material frameworks, and web-based 3D viewport services.
-

Volunteer | Royal Victoria Hospital

June 2019 – December 2019

- Provided patient support and guided family members, showcasing strong communication and adaptability.
 - Ensured a friendly, attentive environment through efficient navigation assistance in a high-paced hospital setting.
-

SKILLS

- **AI & Machine Learning:** OpenAI API, Hugging Face Transformers, TensorFlow, PyTorch, GitHub Copilot, Prompt Engineering
- **Programming & Development:** Python, C++, C, Java, JavaScript, HTML5, CSS3, React, XML, Erlang, Clojure
- **3D & Simulation:** Unreal Engine, Unity, Blender, Maya, NVIDIA Omniverse Isaac Sim, LiDAR, Point Cloud data analysis
- **Other Tools:** AWS, Azure, MATLAB, Photoshop, Illustrator, Eclipse, Google Workspace, Microsoft Office, Git/GitHub, GitHub Actions

Technical

- Machine Learning, Computer Vision, Natural Language Processing, Generative AI, Digital Twins, Simulation, Game Engine Development
- 3D Modeling, Texturing, UV Mapping, Rigging, Animation

Personal

- Effective Communication, Teamwork, Organization, Attention to Detail
 - Problem-Solving, Creative Thinking, Adaptability
-

LANGUAGES

English, French, Spanish (Trilingual)

ACTIVITIES

- Advocate for environmental sustainability, exploring intersections of art, technology, and clean tech solutions.
- Passion for combining technical expertise with artistic expression through digital painting and generative AI art.