George A. Risca

garisca@me.com +40 (731) 277-578 Lisbon, Portugal

WORK EXPERIENCE

Sagaris Group Inc.

Jun 2016 - Present

Project Engineer

Detroit, MI

- Collaborated as part of a small team on diverse engineering projects, including research in Nickel Electroplating and developing CAD designs for sheet metal & ease of manufacturing.
- Engineered and designed process equipment, collaborating closely with client manufacturing and tooling engineering teams to optimize manufacturing processes.
- Assisted the launch of production for nickel slush tools, working with process engineering teams to develop optimal parameters at manufacturing locations.
- Troubleshot and repaired damaged instrument panel tools using laser welding and texture reconstruction techniques.
- Conducted research and development projects, including developing silicone molds for high-definition textures and adapting various materials for tooling applications.

Cheyenne Express Inc.

Jun 2015 - Aug 2015

Mechanic

Novi, MI

- Conducted maintenance tasks for semi-trucks, such as battery changes, tire changes, cleaning, and tag retrieval.
 Additionally, assisted with short-distance driving and parking of semi-trucks.
- Assisted with general workshop maintenance, including the installation of air compressors and air lines.

PROJECTS

Conceptual - Constructive Aspects of an Electric Motorcycle

Senior Dissertation — Mechanical Engineering

- I led a senior thesis project in mechanical engineering where I designed and built a unique electric motorcycle from scratch. Utilizing advanced materials like carbon fiber and aluminum, I addressed challenges related to frame strength and motor positioning, resulting in a high-performance, custom-built motorcycle. The project showcased my expertise in innovative design, problem-solving, and hands-on fabrication.
- Project Link: https://georgerisca.github.io/website/pages/projects/1capstone.html

EDUCATION

Technical University of Iasi

Jun, 2021

BS Mechanical Engineering – Automobile Manufacturing

Iasi, Romania

College For Creative Studies

2013 - 2015

Advertising Design

Detroit, Michigan

LANGUAGES

- English: Native (USA Citizenship)
- Romanian: Working Professional (Romanian / EU Citizenship)

SKILLS

- **CAD Design:** Proficient in AutoCAD, Inventor, Fusion360, and SolidWorks for 2D/3D drafting, design, stress analysis, and fluid simulations.
- Project Management: Experienced in effectively planning, organizing, and executing projects to meet objectives.
- Manufacturing: Skilled in assembly, soldering, and various welding techniques for efficient production.
- Composite Materials: Experienced in working with carbon fiber, fiberglass, and applying strengthening resins.
- Mold Making: Skilled in creating molds using silicone and casting materials for production purposes.
- Additive Manufacturing: Designing for 3D printing, managing 3D printers, and creating prototypes using software such as ZBrush and Blender.
- Automotive Systems: In-depth knowledge of vehicle systems and hands-on experience in maintenance and repair.
- Electrical & Battery Technology: Proficient in assembling, testing, and soldering electrical components and Li-ion battery packs.
- **Software:** Microsoft Office, Unreal Engine 4, Flow Design (fluid simulations), Adobe Creative Suite, HTML & CSS.