

 (555) 987-6543
 gale.smith@email.com
 Detroit, MI

EDUCATION

Master of Science in Automotive Engineering

University of Michigan – Ann Arbor, MI
Graduated: December 2014

Bachelor of Science in Mechanical Engineering

Michigan State University – East Lansing, MI
Graduated: May 2012

Projects

- **Electric Vehicle (EV) Powertrain Development.** Spearheaded the design and testing of a lightweight electric vehicle powertrain that improved range by 25%.
- **Autonomous Vehicle Braking System.** Led a project to develop an adaptive braking system for autonomous vehicles, improving safety metrics in emergency scenarios.

SKILLS

- Automotive CAD Software (CATIA, SolidWorks)
- Thermal and Fluid Systems Design
- Finite Element Analysis (FEA)
- Structural Integrity and Stress Testing
- Electric Vehicle (EV) System Design
- Vehicle Safety Regulations
- Cross-Functional Team Collaboration
- Design for Manufacturability (DFM)
- Materials Selection and Testing
- Prototype Testing and Optimization

GALE SMITH

SENIOR AUTOMOTIVE MECHANICAL DESIGN ENGINEER

PROFESSIONAL SUMMARY

Highly skilled Senior Automotive Mechanical Design Engineer with experience in designing and developing advanced automotive systems and components. Extensive knowledge of suspension systems, drivetrain components, and electric vehicle (EV) architecture. Proven success in managing multidisciplinary teams, reducing production costs, and delivering innovative solutions to enhance vehicle safety, efficiency, and performance.

EXPERIENCE

- 2018 - Now

Senior Automotive Mechanical Design Engineer

Ford Motor Company / Dearborn, MI

- Lead the design and optimization of suspension and drivetrain systems for Ford's new electric vehicle lineup, resulting in a 15% improvement in handling and a 20% increase in range.
- Collaborate with internal and external teams to develop innovative solutions that adhered to safety, cost, and performance standards for new vehicle models.
- Conduct thermal simulations and stress analysis to enhance the durability of critical engine components, achieving a 12% reduction in failure rates.

- 2015 - 2018

Automotive Mechanical Design Engineer

General Motors / Detroit, MI

- Designed advanced braking systems for GM's new generation of vehicles, improving braking efficiency by 10% and reducing component wear.
- Led the integration of sustainable design practices in the development of components, resulting in a 20% reduction in environmental impact during the manufacturing phase.

- 2012 - 2014

Mechanical Design Engineer

Chrysler Group LLC / Auburn Hills, MI

- Developed detailed 3D CAD models for automotive components, focusing on lightweight yet durable materials.
- Supported the transition from design to manufacturing by ensuring that all designs were optimized for the assembly process, reducing production errors.