

PROFILE

To seek a challenging, responsible and professionally rewarding position, that fully utilizes my professional and academic training with the new opportunities and technologies provided at your organization. With 4.9 years of experience in the support and development activities in domain of Crash analysis and Nonlinear analysis. Having good knowledge on the design and development of Future Mobility (E-Vehicles), an interdisciplinary of the Electrical and Mechanical Devices using MATLAB and SIMULINK through certificate courses. I am keenly looking forward to work with an organization where I can apply the skills acquired in academia to solve the real world problem.

WORK EXPERIENCE

ROLES & RESPONSIBILITIES

Satyam Venture Engineering , Hyderabad

3 Months

Specialist

April 2023 - Present

Client **BMW (Occupant Safety)**

- Conducted crash simulations and occupant safety analysis using LS-DYNA software to evaluate the performance of vehicle restraint systems and improve occupant protection.
- Collaborated with design teams to propose safety enhancements and optimize restraint system performance based on simulation results.
- Analyzed and interpreted crash test data to assess injury risks and evaluate the effectiveness of safety features.
- Ensured compliance with regulatory requirements and industry standards related to occupant safety.

Tata Consultancy Services, Bangalore

1 Year 7 Months

System Engineer

Sep2021 - Mar2023

- GMTCI (General Motors Technical Center India), (On client location) · Modeling and Integration of Sub-assemblies like Front suspension, Steering system, Front door trims, Rear door trims, Aero shutter, Front Fascia, Rear Fascia, CRFM etc. sub-assemblies as per the customer standards
- Leading team, modeling estimation and review of the mesh models.
- Creation of joints as per subsystem requirement
- Running primer checks for final review of the subsystem after integration. ·
- Client interaction for understanding their requirement and delivery

Detroit Engineered Product (Bangalore)

2 Year 6 Months

Associate project Engineer

March 2019-Sep-2021

- GMTCI (General Motors Technical Center India), Bangalore (On Client location) · Working with cross functional team for product development and improvement · Reviewing FE models and documenting inaccuracies found in model · Mesh Model preparation for crash and Pedpro Analysis.
- Key executions: - Front Fascia Grill, Headlamp, HVAC, Exterior Trims/ Interior Trims etc.

SKILLS	<ul style="list-style-type: none"> ● In-depth knowledge of occupant safety principles, crash dynamics, and restraint systems ● Proficient in crash simulation software, such as LS-DYNA, ● Strong understanding of crash test procedures and regulatory requirements (FMVSS, ECE, KNCAP, CNCAP etc.) ● Experience in occupant protection analysis, including head injury criteria (HIC) and chest acceleration assessment (CFC) ● Familiarity with regulatory safety standards and industry guidelines ● Skilled in data analysis using MATLAB, Python, or similar tools ● Excellent problem-solving and critical thinking abilities ● Strong communication and teamwork skills
CERTIFICATIONS	
Introduction to HEV using MATLAB & Simulink Company name : SKILL LYNC Duration : 3 months	Project Carried out <ul style="list-style-type: none"> · Design of Power train for Aircraft towing vehicle · Design of an electric vehicle

ACADEMIC PROFILE			
M.Tech	Indian Institute Of Technology (ISM) Dhanbad	8.37/10	2016-18
B.E	Vemana Institute of Technology Bangalore	71%	2009-13
Class XII	K V ASC center Bangalore	75%	2008-09
Class X	K V AFS Jaisalmer	78%	2006-07
PROFESSIONAL KNOWLEDGE			
Software/Language Proficiency	<ul style="list-style-type: none"> • HYPERMESH • ANSA • MESHWORKS 	<ul style="list-style-type: none"> • MSC-ADAMS • LS-DYNA • PRIMER 	<ul style="list-style-type: none"> • ANIMATOR • MATLAB • SIMULINK
ACADEMIC ACHIEVEMENTS			
<ul style="list-style-type: none"> • Gate qualified in 2016 with a gate score of 646 • Got AIR 30 in ISMEE exam for M. Tech admission 			

DECLARATION

I, ADITYA KUMAR SINGH, hereby declare that the information contained herein is true and correct to the best of my knowledge and belief.



Bangalore, Karnataka

ADITYA KUMAR SINGH