ISAIAH FERNANDES

Wild Texas Fighting Aggie

Mechanical Engineer

Forward-thinking Engineering College Student seeking a full-time internship during the summer in the field of petroleum engineering. Bringing forth a motivated attitude and a variety of skills with an eagerness to learn.

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EDUCATION

Texas A&M University - Master of Engineering in Subsea Engineering CGPA 4.0 Dec 23
 Fundamentals of Subsea ENG|SURF: Subsea Hardware | Umbilicals | Risers | Flowlines| Design of Risers and Pipelines| Flow Assurance | Production Operations

Texas A&M University - Engineering Project Management Certification
 Subsea Project Implementation | Petroleum Project Evaluation and Management | Engineering Economy | Project Management | Exploration and Production Evaluation

University of Mumbai - Bachelor of Engineering in Mechanical Engineering
 Mechanics | CAD,CAM,CAE | Thermodynamics | FluidMechanics | Machine Design | Power ENG | ICE Engines | FEA | RAC/HVAC |
 Heat Transfer | Production ENG | ENG Drawing | Dynamics & Kinematics of Machinery | Material ENG | Mechanical Systems | Pumps & Compressors

EXPERIENCE

Head of DBIT Engineering College Technical Festival: "Colosseum-2021". (ideation, planning and organizing)
 Jan 21- Mar 21

- Personally led a team of 30 individuals in planning, execution, and management of the technical festival.
- Exhibited proficiency in stakeholder management by engaging with multiple companies and securing affluent sponsors for the fest.
- I was responsible for procuring, maintaining, and ensuring the proper functioning of all computer hardware and related equipment.
- Head of sponsorship for MADGEARS MOTORSPORT Club, BAJA SAE INDIA (society of automotive engineers India) 2020-2021
 - Gained practical experience in a professional engineering society, working collaboratively with a team of mechanical engineering students.
 - It involved a team to design and build a prototype of a four-wheel vehicle. Personally, managed the sponsorship and marketing portfolio as head, to secure additional funding to support the project's budget and expenses.

PROJECTS

- Kyle offshore oil field Development Project:

Aug 22-Dec 22

A subsea project on an actual location provides development options along with tie back options, prepared a field development plan, created a project schedule, and estimated a project cost.

— Design & Fabrication of an independent solar panel cleaning robot using robotics (Product Development): Aug 20-June 21

Design of the product frame was accomplished via Machine Design equations, using a real-world problem statement as a basis. Analysis and Evaluation of Designs in fusion 360, based on Mechanics to accomplish the project objective. Tested it on Ansys Workbench and ran simulations on Ansys Fluid. Power utilized and saved was calculated for Peak Efficiency.

— A case study on Centrifugal Trash Pumps:

Oct 21

In-depth investigation into the design, construction, and functioning of trash pumps, as well as their practical applications. Through an examination of the physical principles and mathematical models, this case study aims to elucidate the fundamental operating principles of trash pumps and identify the critical factors that impact their performance in various contexts.

- Fabrication of a working Viscometer:

April 19-May 19

A functional viscometer for the purpose of measuring the viscosity of diverse fluid samples. It was designed to accurately determine the flow properties of fluids by analyzing the resistance they exhibit to deformation under an applied force.

- Entrepreneurship Project Presentation on "Porthole location and filling systems":

Dec 20

Proposed an innovative engineering idea that had never before been implemented, with the goal of creating a smarter future. My Project set a unique way of locating portholes and a cheaper alterantive solution to fixing it. (Won an award for it)

SKILLS & CERTIFICATIONS

INTERPERSONAL SKILLS

- Mechanical Modelling softwares: DS SOLIDWORKS | Autodesk FUSION 360
- Autodesk Certified: Mechanical ENG Design | Simulation Analysis | CAM and Design Manufacturing | Modelling & Design
- FEA simulation Softwares: Ansys Workbench | Ansys Fluid
- Computational fluid dynamics softwares: OLGA | PIPESIM
- Structural finite element softwares: OrcaFlex
- Graphic design softwares: Adobe Illustrator | Adobe Photoshop | Inkscape
- Matrix based calculation softwares: Mathlab
- **Basic programming** C | C++ | Java languages.

- Innovative & Inspired thinking mindset
- Imaginative & Inventive
- Adaptability & Flexibility
- Publicity & marketing skills
- Publicity & marketing skillsPublic relations & Salesmanship
- Communication & People skills
- Oratory & Debating skills
- Research and Writing skills
- Project Adept & Project Management
- Problem Solving & Critical, Analytical Thinking
- Teambuilding & Team leading skills
- Responsible Event Planning & Coordination

EXTRACURRICULARS

Attended the student subsea tieback competition at the **Subsea Tieback Forum & Exhibition Conference**.

—College debate team representator in all Inter & Intra college debate challenges across the state.