**INTERNSHIP REPORT**

**Review-1**

*An internship report submitted for the partial fulfillment of academic*

*requirements for the award of Degree*

*in*

**BACHELOR OF ENGINEERING**

**In Department of**

**INFORMATION SCIENCE & ENGINEERING**

**Industry/Research Internship (****21IS8I01)**

Submitted by

**NARENDRA BABU**

**4NI21IS060**

Carried out at

**HashedIn by Deloitte,**

**Bengaluru, Karnataka**

Under the supervision of

**Mrs. Prathibha B S**

**Assistant** **Professor**,

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| **Department of Information Science & Engineering**  **The National Institute of Engineering**  (An Autonomous Institute under Visvesvaraya Technological University, Belagavi)  Manandavadi Road, Mysuru 570008, Karnataka, INDIA |

**2024-2025**

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| **C:\Users\ADMINI~1\AppData\Local\Temp\nie logo jpg.jpg** | **The National Institute of Engineering, Mysuru**  (An Autonomous Institute under Visvesvaraya Technological University, Belagavi)  Manandavadi Road, Mysuru – 570008, Karnataka, INDIA  Recognized by AICTE, New Delhi  Accredited by National Board of Accreditation, New Delhi  Grant-in-Aid by Government of Karnataka |  |

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| **DEPARTMENT OF INFORMATION SCIENCE & ENGINEERING** | | |
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| **CERTIFICATE** | | |
| Certified that the “**Industry/Research** **Internship (21IS8I01)”** carried out in **HashedIn by Deloitte**, Bengaluru, Karnataka, by Narendra Babu, bearing USN 4NI21IS060, a bonafide student of 8th Semester has submitted this report as a part of Review-1 in partial fulfillment for the award of Bachelor of Engineering Degree in Information Science and Engineering of **The National Institute of Engineering, Mysuru,** an autonomous institute under Visvesvaraya Technological University, Belagavi during the academic year 2024-2025.  The internship report has been approved as it satisfies the academic requirements in respect of Internship Work prescribed for the award of the said Degree. | | |
|  |  | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |
|  |  | **Signature of the Guide** |
|  |  | **Mrs. Prathibha B S Assistant Professor**  **Dept of ISE, NIE, Mysore** |

**DECLARATION**

I,Narendra Babu bearing USN: 4NI21IS060 student of 8th semester of UG program, Department of Information Science and Engineering, The National Institute of Engineering, Mysuru, hereby declare that the **Industry/Research** **Internship (21IS8I01)** work has been carried out in **HashedIn by Deloitte, Bengaluru, Karnataka**, by me under the guidance of **Mrs. Prathibha B S,** Assistant Professor Dept of ISE, NIE, Mysore.

This internship report is submitted to **The National Institute of Engineering**, Mysuru, (An Autonomous institute under VTU, Belagavi) as a part of Review-1 in partial fulfillment of the course requirements for the award of degree in Information Science and Engineering during the academic year 2024-2025.

Further the matter embodied in this report does confine to the Non-Disclosure Agreement (NDA) signed by me in HashedIn by Deloitte, Bengaluru, Karnataka.

Place: Mysuru

Date: 29-03-2025

Narendra Babu

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I am extremely thankful to Dr. Rohini Nagapadma, Principal, NIE, Mysuru, for providing the opportunity and everlasting motivation to carry out an internship and shape our careers.

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I extend my gratitude to our Guide **Mrs. Prathibha B S ,** Assistant Professor**,** Information Science and Engineering, and Internship Coordinators **Dr. Suhaas K P**, Associate Professor and **Mrs. Mayura D Tapkire**, Assistant Professor, Dept. of Information Science and Engineering, NIE, Mysuru, for their support and guidance over the entire course of work.

I extend my thanks to my section lead, **Akash**,SDE 3 and the entire team at Hashedin by deloitte, Bengaluru, Karnataka., for their continuous support during my 15 weeks tenure at Hashedin by deloitte, Bengaluru, Karnataka.

I take this opportunity to thank all my friends, classmates who always stood by me in difficult situations also helped me in some technical aspects, and last but not least, I wish to express my inspiration and sense of gratitude to my parents who were a constant source of encouragement and stood by me as a pillar of strength for completing this work and course successfully.

Narendra Babu

4NI21IS118

**CONTENTS**

|  |  |  |  |
| --- | --- | --- | --- |
| **Sl. No** | **Particulars** | | **Page No.** |
| **Abstract** | | |  |
| 1 | Company Information | |  |
|  | 1.1 | Profile | 1 |
|  | 1.2 | Description of the Business Unit/Team | 2 |
|  | 1.3 | Overall Description of the work carried out by the team | 3 |
|  | 1.4 | Overview of the internship position and responsibilities held | 4 |
| 2 | Technology/Tools worked | | 5 |
| 3 | Description of the work carried out | | 7 |
| 4 | Personal Roles and Observation | | 11 |
| 5 | Conclusion | | 13 |

**Abstract**

This report presents a detailed account of my internship experience as a **Trainee Engineer** at **HashedIn by Deloitte**, undertaken through the **HU University Program** from 17th February 2025 to 24th March 2025. The internship was structured as an intensive, hands-on learning bootcamp aimed at bridging academic knowledge with real-world software development practices. Over the course of six weeks, I worked on multiple full-stack, data engineering, and AI-assisted projects that simulated enterprise-level application development.

The report highlights the key responsibilities I undertook, including backend development using **Java Spring Boot** and **.NET Core**, frontend design with **Angular**, and the use of tools like **Docker**, **GitHub**, **Postman**, and **Swagger**. I also gained exposure to **cloud deployment using Google Cloud Platform**, **CI/CD automation**, and **role-based security mechanisms**. A significant portion of the internship focused on **Data Engineering**, where I worked with **Apache Kafka**, **Apache Airflow**, and **PySpark on Databricks** to build and manage real-time and batch data pipelines.

An innovative highlight of the internship was the **LangGraph project**, where I leveraged to generate frontend components through generative AI. This experience provided insight into emerging trends in AI-driven development workflows.

Overall, the internship provided me with a strong foundation in software engineering, fostered collaborative team experience, and enhanced my ability to contribute effectively to real-world projects. This report encapsulates the technologies, projects, learnings, and professional growth gained during the internship.