### A REPORT ON

## WEB DEVELOPMENT

Submitted by,

Mr. Rishi Anand - 20211CDV0032

Under the guidance of,

Ms. Meena Kumari K S

in partial fulfillment for the award of the degree of

## **BACHELOR OF TECHNOLOGY**

IN

**COMPUTER SCIENCE AND TECHNOLOGY(DEVOPS)** 

At



PRESIDENCY UNIVERSITY
BENGALURU
MAY 2025

## PRESIDENCY UNIVERSITY

# PRESIDENCY SCHOOL OF COMPUTER SCIENCE AND ENGINEERING

#### CERTIFICATE

This is to certify that the Internship report "WEB DEVELOPMENT" being submitted by RISHI ANAND bearing roll number 20211CDV0032 in partial fulfillment of the requirement for the award of the degree of Bachelor of Technology in Computer Science and Technology (DevOps) is a bonafide work carried out under my supervision.

Ms. MEENA KUMARI K S

000

Assistant Professor

**PSCS** 

Presidency University

Dr. MYDHILI NAIR

Associate Dean

PSCS

Presidency University

Dr. S PRAVINTH RAJA

Professor & HoD

**PSCS** 

Presidency University

Dr. SAMEERUDDIN KHAN

Pro-Vice Chancellor - Engineering

Dean -PSCS / PSIS

Presidency University

## PRESIDENCY UNIVERSITY

# PRESIDENCY SCHOOL OF COMPUTER SCIENCE AND ENGINEERING

## DECLARATION

DEVELOPMENT" in partial fulfillment for the award of Degree of Bachelor of Technology in Computer Science and Technology(DevOps), is a record of my own investigations carried under the guidance of Ms. Meena Kumari K S, Assistant Professor, Presidency School of Computer Science and Engineering, Presidency University, Bengaluru.

I have not submitted the matter presented in this report anywhere for the award of any other Degree.

Rishi Anand

20211CDV0032

### INTERNSHIP COMPLETION CERTIFICATE



## Rishi Anand

In recognition of his hard work and dedication, he has successfully completed his internship as a **Web Development intern** at UptoSkills from January 25, 2025, to April 25, 2025. During this period, he demonstrated exceptional leadership skills while fulfilling his responsibilities as a team leader, contributing significantly to the team's success.

This certificate can be verified at hr@uptoskills.com

Shivam Agrawal

#### **ABSTRACT**

Web development is a multifaceted and continually evolving discipline that involves the creation, deployment, and maintenance of websites and web-based applications that power the modern digital experience. It is broadly divided into front-end and back-end development. Front-end development focuses on the client side, dealing with the structure, design, and interactivity of web interfaces using HTML, CSS, JavaScript, and modern frameworks such as React, Angular, and Vue.js. Back-end development, in contrast, is concerned with server-side logic, databases, and application architecture, employing technologies like Node.js, PHP, Python, Ruby on Rails, and Java. The synergy between front-end and back-end components results in full-stack development, enabling developers to build end-to-end solutions. With the proliferation of mobile devices and the growing demand for seamless user experiences, responsive and mobilefirst design principles have become industry standards. Moreover, the adoption of Single Page Applications (SPAs), Progressive Web Apps (PWAs), and headless CMS architectures has significantly enhanced the functionality and performance of modern websites. Web development also involves integrating third-party services through APIs, utilizing cloud platforms for scalable hosting, and applying DevOps practices for continuous integration and deployment. Security is another critical concern, necessitating measures like HTTPS, secure authentication, and protection against common vulnerabilities such as cross-site scripting and SQL injection. Accessibility and performance optimization further underscore the importance of inclusive and efficient design practices. As artificial intelligence, voice search, and real-time technologies like WebSockets gain traction, web development is set to become even more interactive and user-centric. Ultimately, web development is not just about coding but about creating powerful digital ecosystems that connect users, deliver content, and enable innovation across virtually every industry in the global economy.