Name: GroupA 6_Maththumagoda Alwis
Student Reference Number: 10898407

Module Code: PUSL2021	Module Name: Computing Group Project
Coursework Title: GreenSparkEvents website - Proposal	
Deadline Date: 25th October 2023	Member of staff responsible for coursework: Mr. Pramudya Thilakarathne
Programme: BSc(Hons) Software Engineering	

Please note that University Academic Regulations are available under Rules and Regulations on the University website www.plymouth.ac.uk/studenthandbook.

Group work: please list all names of all participants formally associated with this work and state whether the work was undertaken alone or as part of a team. Please note you may be required to identify individual responsibility for component parts.

Maththumagoda Alwis – 10898407
Amarasingha Amarasingha – 10900350
Kavindya Gunasinghe – 10899540
Chandrasekara Kaushlya – 10900365
Mahagama Tharusha – 10899713
Arachchige Thiranya – 10898679

We confirm that we have read and understood the Plymouth University regulations relating to Assessment Offences and that we are aware of the possible penalties for any breach of these regulations. We confirm that this is the independent work of the group.

Signed on behalf of the group: Maththumagoda Alwis

Use of translation software: failure to declare that translation software or a similar writing aid has been used will be treated as an assessment offence.

I *have not used translation software.

Overall mark _____%   **Assessors Initials** _____   **Date**_____

Contents

Introduction

In our university there are so many events organized during the year. So as students, we are excited to participate in those events. But often we get exhausted of the hassle of purchasing event tickets. So, our group members decided and came to a decision about creating a web application called "GreenSparkEvents" as our Computing group project.

The main functionality of our website is to purchase online tickets for university events. And also, undergraduates and alumni of the university can view the upcoming events and their updated information by using this web application.

Other than undergraduates and alumni there is another user category called admin who can do many changes of this system.

Problem:

At the present moment according to the manual system, purchasing a ticket for an event is a major drawback.

- Standing in long queues
    - Due to the limited number of people on the administrative board who took part in the ticket issuing process, the workload for them is piling up. Therefore, long queues are generated.
    - Moreover, students are experiencing disruptions with their studies and lectures, because of these long queue lines.
    - As well as they are complaining about waiting in long queues taking lots of time and effort also.
- Shortage of paper
    - With the current situation in the country, it was difficult to print more tickets would be printed.
    - Printing tickets will have an impact on the environment.

- Travel expenses

  - No matter how far away a student is, he/she cannot get the ticket without attending the university premises. This would enhance travelling costs too.

Solution:

To address the above-mentioned challenges, our "GreenSparkEvents" web application will provide innovate solution process and enhance user experiences. According to the features available on this application, students can grab a ticket through an online platform easily. Therefore, no queues are generated, students can do their study purposes as usual, less time consuming, no more effort, no travelling cost and environmental pollution is decreased.
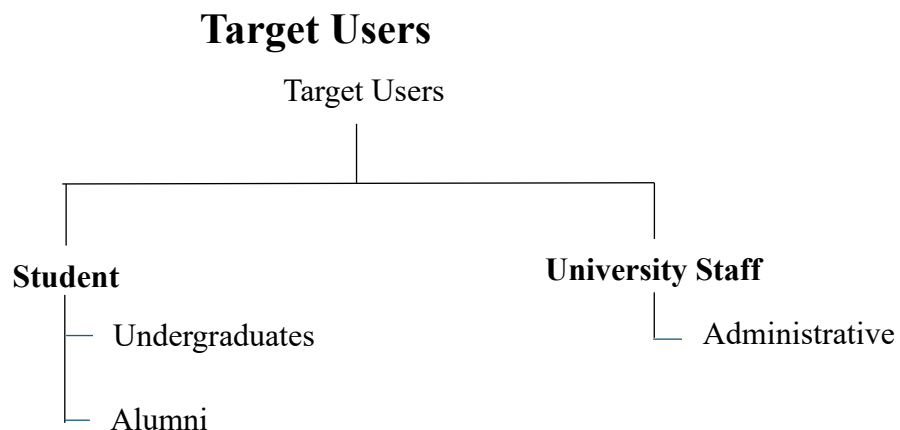
Project Objectives

- Efficient ticketing process – For undergraduates and alumni this is a rapid process to conduct to collect tickets for the events and other sponsored activities in the university.
- Accessibility through website – GreenSparkEvents online ticketing website can be access through PCs, mobile devices etc.
- Secure online payment – Trough this, the data entered during a transaction is done very securely.
- Sustainability – Due to this online application paper usage get decreased. So, we can achieve sustainable goals very easily.

Tools and Technologies

For our web application mentioned below are the tools and technologies we are using for our project.

- User Interface (UI) design – Figma
- Website Development – Visual Studio (HTML/CSS/JS)

- Database Management – My SQL

- Version Control – GitHub

- Project Management (Time sheet) – Trello

- Payment Gateway – PayPal, Card payments (Visa/Master)

- Testing and Quality Assurance – Selenium, J Unit

- User Feedback Analytics – Google analytics

- Documentation – Microsoft Word

- Communication – Email (Outlook)

Target Users

```
                        Target Users
                             |
        ┌────────────────────┴────────────────────┐
     Student                              University Staff
        ├─ Undergraduates                         └─ Administrative
        └─ Alumni
```

- Undergraduates – Students who are studying currently in the university.

    They would use it to purchase tickets for university events and other activities organized by the university.

- Alumni – Person who have previously attended to the university or graduated from that university.

    Alumni of the NSBM Green University frequently have strong connections with the university while allowing them to use this website to purchase the tickets for the alumni events.

- Administrative staff (Admin) – Staff who are responsible for managing the non-academic aspects and ensure whether operations are running smoothly in the university.

Admins use this web application for back-end management tasks such as generate reports, monitoring ticket sales, user's issues and inquiries are resolving.

Application Features and Description

- Event Interface – When we visit through the URL, it will go directly to the interface which shows all the events and their information at the university premises.

- Student/Alumni Sign up and Login – When a student/alumni want to buy a ticket they have to click on the relevant event which shows on the homepage. Then, if they want to purchase a ticket for that relevant event, they have to click on the 'buy'option. After they click on the 'buy' option, it will direct to the login page. If an undergraduate/alumni had registered into the system already, they can log into the system successfully. If not, they have to sign up by using their personal information.

- Payment process – After login, they need to select a payment method and add details to the system, and if the payment was successful a QR code will generate as the ticket, and it will send into their university email addresses.

- Admin Login – Admin can login using their admin credentials. After they login to the system they can create events, update events, view events, delete events, crowd control and reserve tickets.

Time Frame

(Gantt Chart)

Events	Start Date	End Date	Duration
Project Initiation	2023/10/05	2023/10/08	3 Days
Requirement Analysis	2023/10/09	2023/10/12	3 Days
Design Wireframes	2023/11/01	2023/11/14	14 Days
Frontend Development	2023/11/15	2024/12/10	26 Days
Backend Development	2023/12/11	2024/01/05	26 Days
Database Integration	2023/01/06	2024/01/20	15 Days
Testing and QA	2024/01/21	2024/02/10	21 Days
Client Feedback and Revisions	2024/02/11	2024/02/24	14 Days
Final Deployment and Launch	2024/02/25	2024/03/09	14 Days