

1. Introduction

With technology infiltrating every part of our lives, the way we interact with literature is experiencing a significant shift. Online book reading web site have completely transformed how people engage with written content. This project aims to explore digital reading and introduce a online book collection system that will revolutionize the reading experience.

Online book websites allow readers with different tastes in literature to navigate through various categories and find books that suit their preferences. At the heart of our project lies a vision to create an immersive reading experience that transcends the limitations of traditional mediums. By leveraging the power of digital platforms, we seek to empower readers to explore, discover, and engage with an array of literary works. Our goal is not merely to replicate the experience of reading a physical book but to enhance it.

People have traditionally read literature in printed formats such as physical books, which can be cumbersome to transport. In this book collection system, the readers have easy access to the book they desire by probing with the book name. Users can register with their names on the websites and log into the websites to read the books.

2. Problem Definition

In the past, accessing literature physically posed significant challenges for readers. They had to spend time searching for books in stores. Additionally, once a book was published, it took considerable time for it to reach bookstores, limiting availability. Furthermore, readers had to carry physical books with them, adding to the inconvenience.

Physical books are prone to damage and gradual deterioration. Traditional libraries have insufficient copies of popular or in-demand books but in online platform readers can access books if it is posted in online platform.

3. Objectives

- To read books by searching in an online book collection platform.
- To download books in pdf form for offline reading.

4. Methodology

The system is going to be made using Iterative and Incremental model. This model combines elements of waterfall model in an iterative fashion. Moreover, each linear sequence produces deliverable increments of the software. The basic requirements are addressed in the first increment, and it is the core product, however, many supplementary features (some known, others unknown) remain undeliverable at this increment [1].

4.1. Requirement Identification

Identifying the system which is to be made is an important process. The web site which is to be created in this project is a site to read books. In this phase we decided what we would be working on for the rest of the project. It is a first step of project development as it is not possible to create an entire project without knowing the requirement of the user. It is important to decide who is the targeted users of the system, their expectations, what software would do so they have a better experience.

4.1.1. Study of existing system

There are a lot of online books reading sites available. The main site that we studied for our project is Kindle and Wattpad. The apps to read books are a great solution to that matter, you can take as many books as you wish with you, without occupying space, or lifting a heavy bag.

Kindle: Developed by Amazon, Kindle has its own bookstore where you can buy millions of titles in different languages, including comics and audiobooks [2]. It also gives you the option to read a sample of the book before buying it, and there are also free books available to download. To enhance your reading experience, you can highlight passages you find interesting, look up the words you don't know the meaning of, adjust the font size and track your reading progress.

Wattpad: Wattpad is the right platform for that, you are going to find thousands of titles released by writers who are starting now, and put their works available on the app [3]. You can browse Wattpad's library by genres such as science fiction, romance, thriller, comedy, and poetry. There are books in different idioms, including, English, Portuguese, French, Deutsch, Spanish, and much more.

4.1.2. Requirement Collection

Requirement collection is the most important step of a project. If the project team fails to capture all the necessary requirements for a solution, the project will be running with a risk. This may lead to many disputes and disagreements in the future, and as a result, the business relationship can be severely damaged. Few of the ways in which we found our requirement are:

I. Brainstorming

Brainstorming is used in requirement gathering to get as many ideas as possible. Generally used to identify possible solutions to problems, and clarify details of opportunities. All the required features that were to add in a system was thought about.

II. Observation

Observing other sites to read book helps determine process flow, step, and opportunities for improvement. Observing how those books reading site functions and we decided to add few new features on our own.

We used brainstorming and observation for determining user's expectations for a new of modified book reading system. Few of the functional and non-functional features that we decided to add are given below:

Functional Requirements

The most basic facility that is add to a site to read books is access to wide range of books. Books in the system can only be added and deleted by the admin. Users can read the available books as well as download those books so they could access them offline as well. The system also provides search facilities so that the required book can be found easily.

Non-Functional requirements

Few of the non-functional facility that is included in the system is security, flexibility. It is going to be a secured site as it requires user login to add contents. No stranger could modify the content. It is going to be a flexible website as it automatically adjusts to fit multiple screen size.

4.2. Feasibility Study

Feasibility Studies are pieces of research done before a main study. They are used to estimate important parameters that are needed to design the main study [4]. As name suggests feasibility study is the feasibility analysis or it is a measure of the software product in terms of how much beneficial product development will be for the organization in a practical point of view. Feasibility study is carried out based on many purposes to analyze whether software product will be right in terms of development, implantation, contribution of project to the organization etc.

4.2.1. Economic Feasibility

In Economic Feasibility study cost and benefit of the project is analyzed. The system is economically feasible. It does not require any addition hardware or software. Since the interface for this system is developed using the existing resources and technologies which are available for free. Besides that, we are intended to develop the simple website to read books which would make the users experience better. Computer is the only equipment required for development and deploying the system.

4.2.2. Technical Feasibility

In Technical Feasibility current resources both hardware software along with required technology are analyzed/assessed to develop project. The work for the project can be done with the current equipment existing software technology and available personal. The system is going to use HTML, CSS, PHP, MySQL, JavaScript to create this web base application. These technical resources are easily available. The system can be upgraded if developed. Various platforms are available to build the system.

4.2.3. Operational Feasibility

Operational Feasibility is the assessment of how well a proposed system or project can achieve its goals and satisfy the requirements of the users. The system is operationally feasible as it is very easy for the user to operate it. It only needs internet access and basic knowledge to use a website. The User Interface of the system is not that complex, so any person can use it easily.

4.3. High Level Design of System

Flow chart

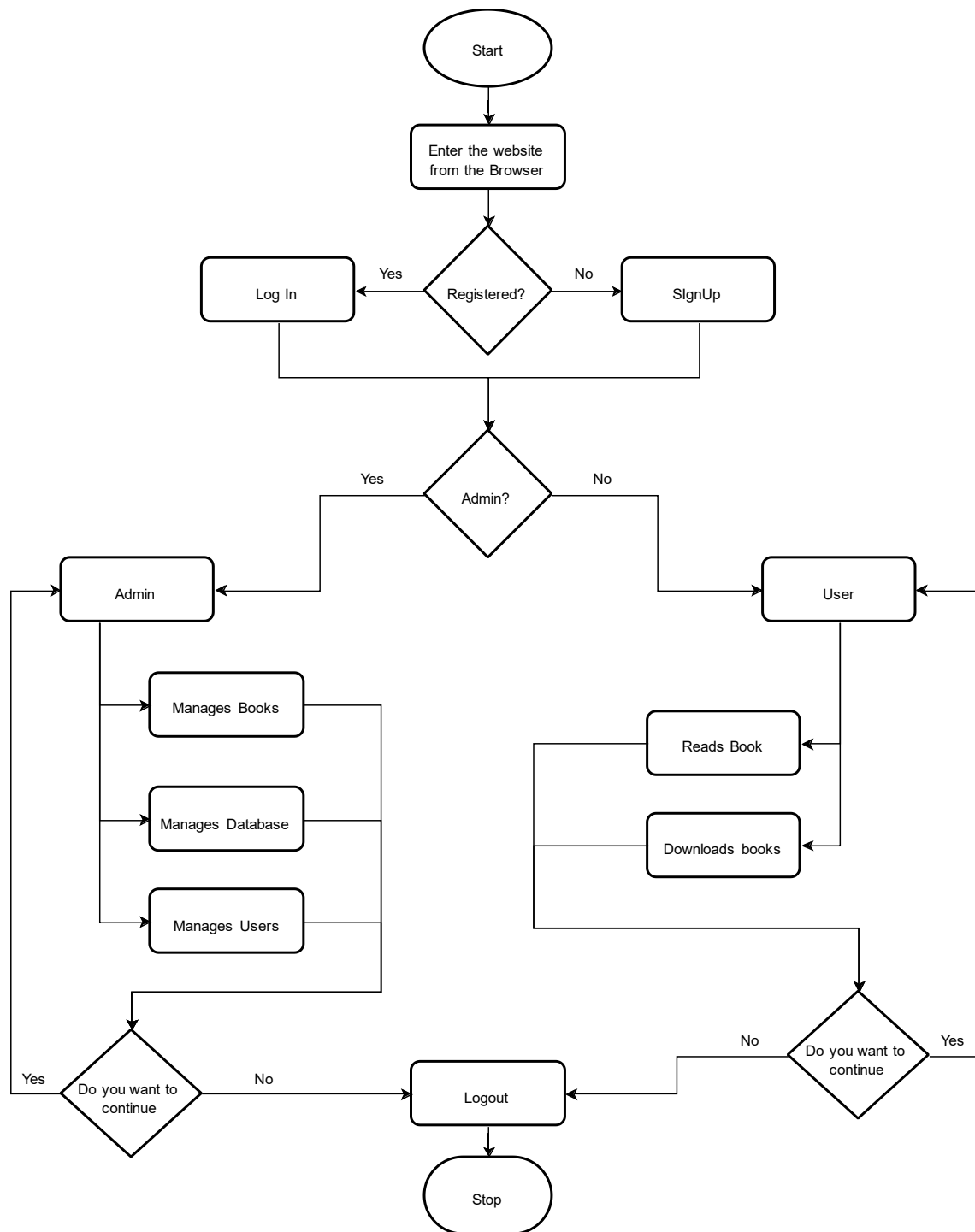


Fig 1: Flow chart of a website to Read Books

DFD of a site to read books

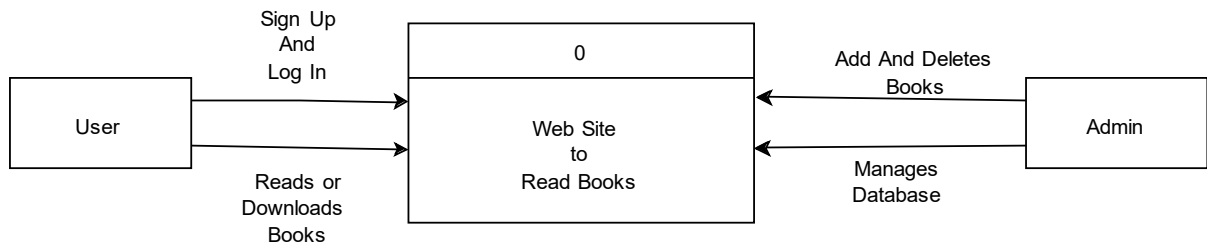


Fig 2: DFD Level 0 of a website to Read Books

Use case of a site to read books

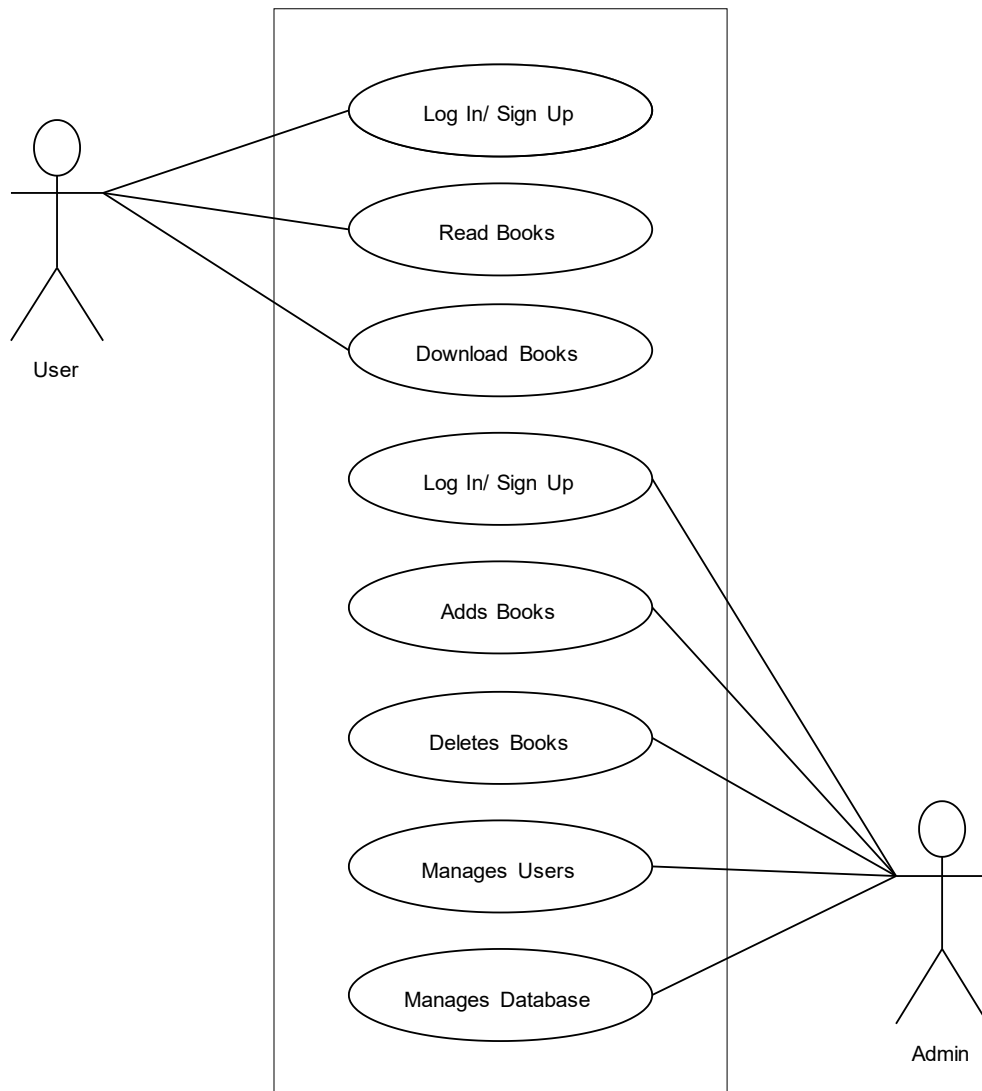
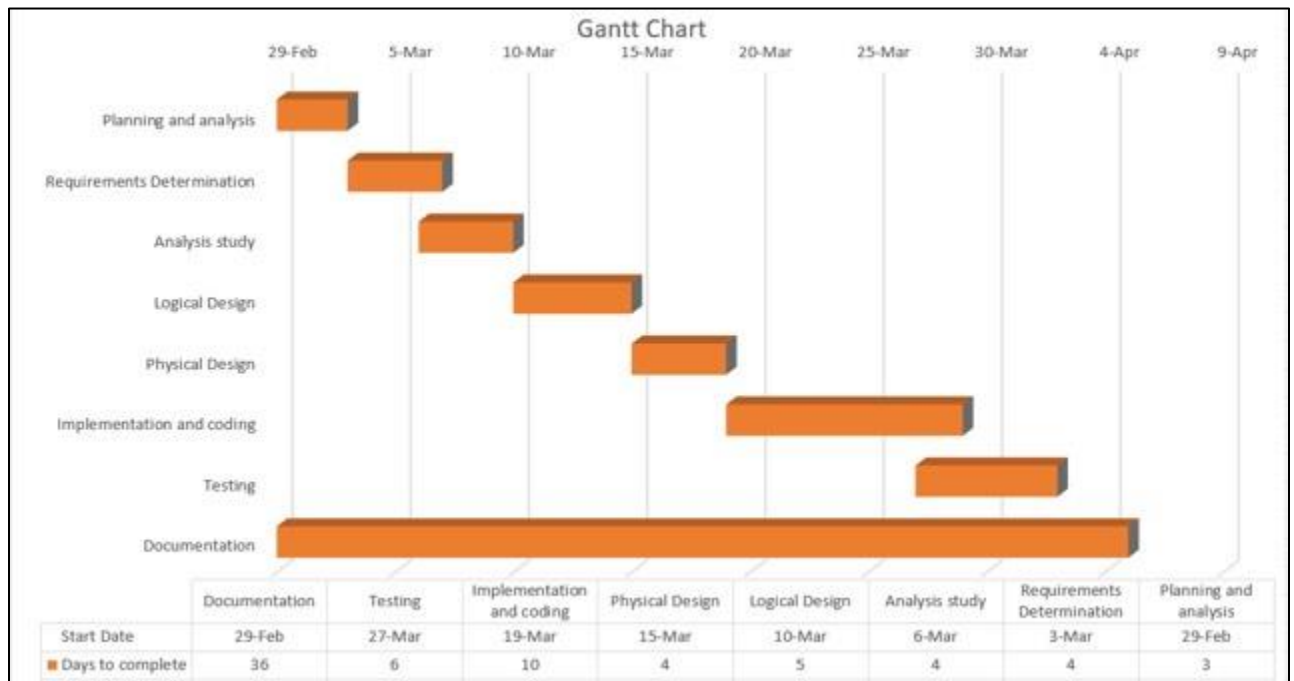


Fig 3: Use Case of a website to Read Books

5. Gantt Chart



Gantt chart of our project

6. Expected Outcome

Log in page

LOG IN PAGE

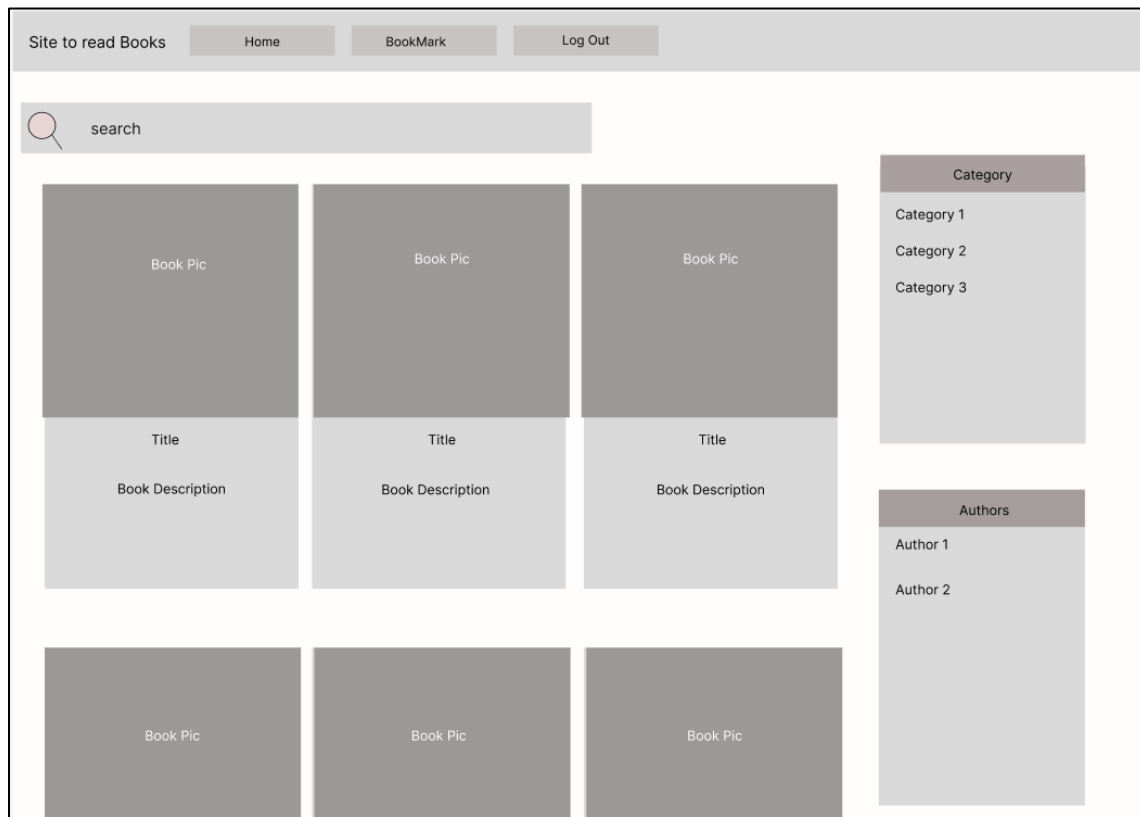
USER NAME

PASSWORD

SUBMIT

SIGN UP

Home Page



References

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- [4] M. Arain, M. Campbell, C. L. Cooper and G. A. Lancaster, "What is a pilot or feasibility study?," no. 4, 2010.