SOFTWARE REQUIREMENTS SPECIFICATION

For

FacultyWebsite

Version 1.0

Group 14

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Purpose:

1. The purpose of the faculty website is to provide a platform for the faculty member to showcase their research, publications, and professional profile to a wider audience. The website will serve as a digital repository of their academic work, providing visitors with easy access to their research projects, publications, and professional background.

Intended Audience:

1. The intended audience for the faculty website includes students, researchers, colleagues, and other academics who are interested in the research and publications of the faculty member. The website will also be accessible to the general public who are interested in learning about the work of the faculty member.

Project Scope:

1. The project scope includes the development of a website that includes sections on research, publications, and profile of the faculty member. The website will be developed using HTML and CSS for the front-end, and Streamlit for hosting and development of the back-end. The website will be hosted on a Streamlit server, and will use a relational database management system (RDBMS) such as MySQL or PostgreSQL to store and manage data.

User Requirements:

1. The user requirements for the faculty website include the ability to easily navigate the website, filter and search for research projects and publications, and access the faculty member's professional profile. The website should be accessible on desktop and mobile devices, and should load quickly and respond to user input promptly. The website should also be secured with SSL encryption to ensure that all data transmitted between the website and the visitor is encrypted and secure.

Sure, here is some additional information regarding the system architecture, system requirement specification, functional requirements, non-functional requirements, and system evolution of a faculty website containing research, publications, and profile sections using HTML, CSS, Github for hosting:

System Architecture:

1. The system architecture of the faculty website will include a front-end developed using HTML and CSS, and a back-end developed using Streamlit. The website will be hosted on a Streamlit server, and will use a database management system to store and manage data. The website will use SSL encryption to ensure secure transmission of data between the website and visitors.

System Requirement Specification:

1. The system requirement specification (SRS) of the faculty website includes technical requirements such as the web development technologies to be used (HTML, CSS, and Streamlit), hosting platform (Streamlit server), and database management system (e.g. MySQL or PostgreSQL). The SRS also includes user requirements such as the ability to easily navigate the website, filter and search for research projects and publications, and access the faculty member's professional profile.

Functional Requirements:

1. The functional requirements of the faculty website include the ability to display research projects and publications, filter and search for content, display the professional profile of the faculty member, and provide a contact form or email address for visitors to contact the faculty member. The website should be accessible on desktop and mobile devices and load quickly and respond to user input promptly.

Non-functional Requirements:

1. The non-functional requirements of the faculty website include the website's security, reliability, and performance. The website should be secured with SSL encryption to ensure that all data transmitted between the website and the visitor is encrypted and secure. The website should be reliable, with minimal downtime and high availability. The website should also be responsive, with fast load times and minimal lag or delay in response to user input.

System Evolution:

1. The faculty website can evolve over time to include new features and functionality, such as integration with social media platforms, multimedia content, and advanced search and filtering options. As the faculty member's research and publications grow, the website can be expanded to accommodate additional content and data. The website can also be optimized for improved performance and user experience over time. Additionally, new technologies and tools can be incorporated into the website's development stack as they become available to further enhance its functionality and performance.

functional and non-functional requirements for a faculty website containing research, publications, and profile sections using HTML, CSS, and Streamlit for hosting:

Functional Requirements:

1. The website should allow visitors to view the faculty member's professional profile.
2. The website should display the faculty member's research projects and publications in a clear and organized manner.
3. The website should allow visitors to filter and search for specific research projects or publications based on keywords, authors, or other criteria.
4. The website should provide visitors with a way to contact the faculty member, such as a contact form or email address.
5. The website should be accessible on desktop and mobile devices.

Non-functional Requirements:

1. The website should be secured with SSL encryption to ensure the secure transmission of data between the website and visitors.
2. The website should be reliable, with minimal downtime and high availability.
3. The website should be responsive, with fast load times and minimal lag or delay in response to user input.
4. The website should comply with accessibility guidelines to ensure that it can be accessed by all visitors, including those with disabilities.
5. The website should be optimized for search engines to improve its visibility and accessibility on the web.

These are just some examples of functional and non-functional requirements for a faculty website. The actual requirements may vary depending on the specific needs of the project and the goals of the faculty member

**GLOSSARY**

1. Faculty Website: A website that showcases the research, publications, and professional profile of a faculty member.
2. HTML: A markup language used for creating web pages and web applications.
3. CSS: A stylesheet language used for describing the presentation of a document written in HTML.
4. Streamlit: A web application framework used for building data-driven applications.
5. Front-end: The user-facing part of a web application that includes the user interface and user experience.
6. Back-end: The server-side part of a web application that includes the server, application, and database.
7. RDBMS: Relational database management system, a software used to manage relational databases.
8. MySQL: An open-source RDBMS.
9. PostgreSQL: An open-source RDBMS.
10. User Requirements: The specific needs and expectations of the users for a web application.
11. SSL Encryption: Secure Sockets Layer encryption, a security protocol used to encrypt data transmitted over the internet.
12. System Architecture: The structure and organization of a web application's components, including the front-end, back-end, and database.
13. System Requirement Specification: A document that outlines the technical and user requirements for a web application.
14. Functional Requirements: The specific functions and features required for a web application to meet the user's needs.
15. Non-functional Requirements: The specific characteristics required for a web application to meet the user's expectations for performance, reliability, and security.
16. System Evolution: The process of updating and improving a web application over time to meet changing user needs and new technology.