

Technical Guide for EduPath Career Tools

EduPath Development Team

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Overview

Detailing the technical architecture of the EduPath Career Tools platform.

1 System Architecture

Describing a client-side HTML/CSS/JavaScript application stored in localStorage.

1.1 HTML Structure

Utilizing semantic HTML5 elements (e.g., <header>, <main>, <section>) for accessibility.

1.2 CSS Styling

Applying responsive design with Flexbox and Grid, styled in career.css and calendar.css.

1.3 JavaScript Logic

Managing interactivity in career.js, skills.js, and notifications.js, using localStorage for data persistence.

2 Key Features

Implementing Job Matching, Resume Builder, Calendar, Notifications, and Accessibility.

2.1 Data Storage

Using localStorage with `CLOUD_STORAGE_KEY"eduPathCareer"and"eduPathSkills"`.

2.2 Event Handling

Employing addEventListener for user interactions (e.g., button clicks, form submissions).

3 Security Audit

Conducting a simulated audit on May 15, 2025, at 06:10 PM +06.

3.1 Identified Vulnerabilities

- **XSS Risk:** User input (e.g., resume-name) is directly inserted into HTML without sanitization.
- **LocalStorage Exposure:** Sensitive data (e.g., resume details) stored in plain text.
- **CSRF Risk:** No token validation for form submissions.

3.2 Recommended Fixes

- Sanitize all user inputs using DOMPurify or similar libraries.
- Encrypt localStorage data with a client-side encryption library.
- Implement CSRF tokens for form submissions (server-side required).

4 Deployment

Hosting on a static server with HTTPS for security.