

SE 216 – SOFTWARE PROJECT MANAGEMENT

PROJECT NEEDS DOCUMENT

PROJECT NAME:IR-SEE

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#	SOFTWARE NEEDS	DESCRIPTION
	App Development Platform (IDE)	This refers to the environment where you'll build your app. Each platform has its own set of tools, languages, and frameworks for development
	Programming Languages	The languages we choose will depend on our target platform. For example, YOLO :python , and for firebase Authantication system : SDKs
	YOLO	The eye exercise software utilizes the YOLO (You Only Look Once) algorithm to swiftly detect and track the user's eyes in real-time. By employing YOLO's speed and accuracy, the software instantly identifies eye position, size, and movement, enabling precise monitoring during exercises. This ensures prompt feedback to users, enhancing exercise effectiveness by tracking eye coordination and focus.
	Text Processing:	Implement algorithms to process text efficiently for speed reading. This might involve techniques like breaking text into smaller chunks, adjusting display speed, or highlighting text dynamically.
	User Interface (UI) and User Experience (UX) Design	Design an intuitive interface optimized for speed reading and eye-tracking interaction. Consider factors like readability, text size, contrast, and navigation.
	Testing Tools	Use testing tools to ensure the app functions correctly across different devices and scenarios. This includes both functional testing (ensuring features work as intended) and usability testing (evaluating user experience).
	Analytics and Data Tracking:	Integrate analytics to track user behavior and performance metrics. This data can help you understand how users interact with the app and identify areas for improvement.
#	HARDWARE NEEDS	DESCRIPTION
	Eye-Tracking Hardware:	Eye-tracking hardware devices capture and analyze eye movement data. This includes specialized cameras or sensors that track the user's gaze and pupil movements.
	Device Compatibility:	Ensure your app is compatible with a wide range of devices, including smartphones, tablets, and computers. Consider factors like screen size, resolution, and processing power.
	Server Infrastructure:	A powerful server is required to process large datasets and accelerate training processes.
	WiFi Connection:	Fast and reliable WiFi connection for data transfer and updates.

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#	SUPPORT NEEDS	DESCRIPTION
	Documentation and Tutorials:	Create user-friendly documentation and tutorials to help users understand how to use the app and eye-tracking features effectively. This can include written guides, video tutorials, and FAQs.
	Community Forums or Helpdesk:	Establish forums or a helpdesk where users can ask questions, share tips, and seek advice from other users or support staff.
	Updates and Maintenance:	Regularly update the app to fix bugs, improve performance, and add new features. Maintenance also involves ensuring compatibility with new operating system versions and hardware updates.
	Training and Onboarding:	Provide training materials and resources for users who are new to speed reading techniques or eye-tracking technology. This can include exercises, tips, and best practices for improving reading speed and comprehension.
	Legal and Privacy Compliance:	Ensure compliance with legal and privacy regulations governing the collection and use of eye-tracking data. This includes obtaining user consent, protecting sensitive data, and providing transparency about data usage.