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Assignment 1: Identifying Root Causes and Solutions

Problem #1

Two root causes can be seen in this problem with the job application and interviewing process.

The first problem that is immediately visible is miscommunication between the employees of

this team over the task of writing correct or truthful descriptions of the job position openings.

The second root cause is the lack of technical expertise in the HR department where they have

very little knowledge of the technologies they're describing in the job postings. This would

mislead candidates for jobs that they later learn that they may not be quite qualified for and the

team not getting the actual technical needs.

Here are 2 suggested features for the system that could address these issues. One is providing a

collaborative job posting tool with technical reviews for the HR department. The other is having

periodic sync meetings between the HR and technical team. Both are the most cost-effective

options compared to many other relevant suggestions.

If the HR department is provided with a collaborative job posting tool, the employees in the HR

department can draft the job postings, and then route these drafts to relevant technical leads to

review the drafts and then approve them. This would be very useful in that it won't require a significant amount of time for the technical employees to spend as all they need to do is review the job posting drafts written by the HR department for any corrections and then approve it. This approach would ensure that the technologies listed are accurate and aligned with the team's needs without the technical employees having to provide their input.

A great way to reduce miscommunications is for the company to have periodic sync meetings between HR and the technical team. Establishing regular sync meetings would lead to discussions between HR representatives and technical team leads over hiring needs, changes or advancements in technology, and any other relevant updates. The meetings can be brief, however, still must focus on making sure that everyone between HR and the technical leads has reached an understanding and is in full acknowledgment of the current business needs.

## Problem #2

There is a problem with having the lack of knowledge of the local laws of many different states, counties, and cities in the US, and also the problem of lacking a reliable centralized system of some sort to keep track of all laws regarding remote jobs and regulations for this employer to

construe. These two root causes can be resolved by having a comprehensive legal compliance software and a State-by-State compliance training program for the HR department.

Let's assume that this employee has a comfortable amount of budget and does not mind investing some of the budget into fully comprehensive legal compliance software to track and store employment laws, benefits regulations, payroll taxes, and other relevant employment regulations across all U.S. states, counties, and cities into a large database. This would centralize all necessary legal information, establishing the employer remaining amenable with little manual effort. This also reduces the risk of the employer running into potential legal issues that can cost them money for non-compliance and associated penalties.

For a cost-effective measure, a state-by-state compliance training program for the HR department of this company would also be beneficial and save the company money assuming they have already invested money into the legal compliance centralized software. Developing a training program that educates HR employees on the nuances of employment laws across different states could reduce the knowledge gap and empower them to manage compliance more effectively. Most importantly, this would decrease the risk of legal issues caused by non-compliance, which can be costly.

## Problem #3

It appears that the issues with this problem are a lack of automation in the setup processes and outdated or incomplete documentation. The setup processes could have too many manual setups, thus increasing the risk of too much time being spent and errors. There is also always the chance that the documentation may not be updated due to how quickly the setup configurations can evolve or be updated, and with the amount of time and effort required to update the documentation, it stays out of date.

The company could have automated environment setup scripts as the first feature. With the automated environment setup scripts, they can automate the setup and configuration of the development environment. They can handle tasks like installing required software, setting up environment variables, configuring tools, and even cloning repositories with the correct branches to organize everything better. Such scripts can significantly lessen the time and effort needed for the setup, which ensures consistency for all of the developers' environments, decreases the likelihood of human error, and decreases the inconveniences involving manual configuration.

For the second and final suggested feature, the company can also have a tool that handles containerization of development environments. There are useful tools like Docker that can consolidate the whole development environment, which includes all of the tools, libraries, and configuration settings. Once that entire development environment is consolidated, developers can easily pull a pre-configured container image and immediately begin their tasks.