2021 Extern PBL Project

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Part I: Overview of Workplace

Pearson Education is a learning company that specializes in educational tools, content, products, assessments, and services. Founded in 1844 by Samuel Pearson in Yorkshire, England. Pearson now has 35,000 employees across 70 countries worldwide. Iowa City is home to one of Pearson's many locations.

Part II: Workplace Focus

AWS-Cloud Computing and test monitoring. Pearson is an early convert to AWS and cloud computing. Shifting their storage from onsite servers to ones managed by Amazon. They are AWS's 4th largest client. With large standardized tests that many learners are taking at the same time it is critical things are up and running smoothly. Pearson has a team monitoring testing happening throughout the world and diagnosing issues that may arise.

Part III: Introduce the Project or Problem

Students will create an application or website to be used by a client of their choice.
- Groups or individuals must submit a business case to start their project.
- Projects must include a cloud component.
- Create an application for a client that uses user data in some capacity.

Can be real or hypothetical

I will have several "clients" ready as options such as the weight room coach. For example, they need a record keeping system for their workouts automated and stored in the cloud.

What will be the public product?

The product will be a usable application for use by the client.

Part IV: Standards, Driving and Essential Questions

What classroom standards and learning targets could this learning unit cover?

CS Standards:

- 3A-DA-10 Evaluate the tradeoffs in how data elements are organized and where data is stored
- 3B-NI-03 Describe the issues that impact network functionality (e.g., bandwidth, load, delay, topology).
- 3B-AP-17 Plan and develop programs for broad audiences using a software life cycle process.
- 3B-AP-19 Develop programs for multiple computing platforms.

What are the main driving questions and underlying questions to help move students toward learning targets, benchmarks and the eventual project or problem solution.

- What does the client want the app to accomplish?
- How will your app/website accomplish those goals?
- How will your group test the application before the end of the semester?
- Will the application or site need to be maintained?
- How will you present your application to the client?

Part V: Extern Host Role

What is the role of your extern host in this learning unit?

    Mentorship. [Jim Sherlock](), [jim.sherlock@pearson.com](), will discuss Pearson's process to rolling out an application and the steps they must take to roll out a successful product. Students will then have a model to base their own product roll out on. A product that needs more than just creating but testing and retooling.

Part VI: Design Elements Checklist

Can you document these elements?

1. Challenging Problem or Question
2. Sustained Inquiry
3. Authenticity
4. Student Voice and Choice
5. Reflection
6. Critique and Revision
7. Public Product

Remember these documents:

Essential Design Elements
Project Planner