1. **Learning management system with integrated automatic attendance and grading system.**

**Description:** Learning Management System is a web-based system and will be created using PHP programming language with Laravel framework and VueJs that can be used in a classroom-based setup. This LMS will also have some other system integrated to it to make it more hassle free both for the student and teacher for computing grades and checking attendance, also a build in messaging system that only teacher and student that is join to class can communicate so that they will not need third party application to communicate. They can also create and publish quiz or examination that will be taken by the student and it will be recorded automatically to their grades.

**Why -** This Learning management system can provide a new platform to use by student’s and teacher it has some feature added that other learning flatform doesn’t have, like our automatic attendance system and auto compute grade system, it also has a build in messaging app.

**How -** I plan to create this using the PHP programming language and a Vue Js, with help of my capstones group we will used PHP framework called Laravel for back-end and Vue Js a front-end framework for front-end. This proposed learning management than adopt and used both by Secondary to Senior high school and college student.

**What –** To be able to create this program there are things that must obtain first a laptop or desktop for that have installed php framework Laravel, a database MySQL and knowledge about front end development using Vue’s.

**SWOT Analysis**

|  |  |
| --- | --- |
| **Strengths**   * Provides manageable system for online and offline learning. * Provides fast result of computed grade, * Provides build-in messaging system so that student and teacher can communicate efficiently without using third party app. | **Weaknesses**   * Focused on control and managing more than learner experience. * Still focused on formal learning to be pushed to learners. Course-centric workflows and approach is inherent. * Apart from Interoperability standards – no real standards govern LMS development. * Varied and fragmented suppliers pool with differing technical and functional capabilities. Overall customer experience with LMS is not consistent. |
| **Opportunities**   * Social and Informal learning trends. A real opportunity for LMS to create learner-centric environments rather than centralized course delivery system. By not only providing the tools but also revamping the whole learner experience is required. * Talent management. Given the core strength of the LMS and its capability to link with other systems, being able to offer talent management functionality in the context of both formal and informal learning is an excellent opportunity for the LMS to become and remain relevant for the HR/training function. | **Threats**   * Social networking tools. Tools focused on providing a networked environment to learners and allowing them to share content, opinions and information with each other could extend to take over some of the LMS functionality posing a new competition (already are) to LMS. |

1. **Philippine’s colonization story and strategy game**

**Description:** It is 2d flat former story and strategy game this game aim to show history of Philippines times during colonization period of Spanish.

**Why -** I choose this type of game because with this I can create a story game that can boost strategy of the user and at same time can show history of Philippine times during when we are colonize by the Spanish period.

**How -** To create this, I can use the Godot platform because this where we are focusing in creating games, this will be a 2D and will have some 3D part on the game.

**What –** To accomplish this there are things needed a graphics for the characters, voice over, computer for development and internet connectivity for resources.

**SWOT Analysis**

|  |  |
| --- | --- |
| **Strengths**   * Story game that shows history of Philippines during colonization period * The game development tool that is used is simple but powerful and a rich in feature. * Unique story mode. | **Weaknesses**   * May have some bugs due to development. * Some story will not be exact as the history because of some tweaks added to make the game more interesting. * May have some similarities to other story game. * Can only play using computer. |
| **Opportunities**   * Simple game mechanics that will attract story game lovers. | **Threats**   * A lot of competitors in in this genre of game. |

1. **Coin Printing Kiosk with file sharer.**

**Description:** It is a system for an automatic printing process and a convenient sharing of softcopy file to the printer without using computer manually. This will help speed up the process of printing people’s document wheatear this is softcopy or hardcopy.

**Why -** I choose this kind of system to conserve time in printing process of documents, because of what I experience some printing shops are to slow because their staff cannot multitask when there is a lot of people what to print their documents.

**How -** To create the program for the printing I will use python programming, to build the sharing process of file in the printer there will be a sharing device to receive the file to be print by the printer.

**What -** A coin printing kiosk that will have automatic file sharing system, so that they will not need to used computer to print, they just send and put coin depending on how many pages and it automatically print it, there is no need for a person to manually used computer to print.

**SWOT Analysis**

|  |  |
| --- | --- |
| **Strengths**   * There is no need a person to print of photocopy, they can print by them self. * There is no need for computer when their file is softcopy, they can easily share it to the printer, and put coin it will automatically print it. * When mistake occur during printing process or there is mistake on there, they easily stop the process. | **Weaknesses**   * Some may have issue when Ink of the printer is empty. * Tool that is used to build the process of sharing file to printer are high cost. |
| **Opportunities**   * More income will produce for printing business. * More accurate and less mistake in printing | **Threats**   * Issue may occur when uncorrected process is done to the program due to human intervention because it is do it your self-printing. |