GAM400 Project Brief: *CyberStrike*

Team Name: @w@

Game/Project Summary

CyberStrike is a single player third person action combat game where the player controls a team of characters, one at a time to fight enemies and complete objectives. It is meant to be a vertical slice/proof of concept allowing the player to experience the core gameplay of the system. The developmental goal of the project is to create a robust and in depth character system rather than a shallow but wider experience.

Target Demographic

CyberStrike will appeal to gamers who enjoy games like Genshin Impact or Honkai Impact 3rd, and Warframe. As well as people who are interested in third-person action games in general.

Target Play Time

Atom: A gameplay atom is when the players finish a campaign level or finish what they set out to do in sandbox mode. This can happen approximately every 3-5 minutes.

Session: A session is expected to occur when the players finish all levels in one mode of play (for example: finishing all elimination levels).

Project Duration

This is a single semester project.
We will focus on delivering a full campaign experience of one game mode (with other modes as stretch goals).

Game/Project Description:

DESIGN
CyberStrike is a single-semester project, so all designs will have to be finalized for the vertical slice of the game at the end of the semester.

The team will focus on developing:
- Character design and abilities
- Basic Enemies
- User Interface
- Combat mechanics and balancing
- Art and Audio

TECHNOLOGY
- Character swapping in real time
- Unique Abilities per character
- Tracking of cooldowns, ability status and other information for character(s) not in play
- Stat based character, abilities and combat based off character data
- Realtime character stat changing

ART & AUDIO
- Playable character models, textures, animations, and VFX/SFX
- Enemy character models, textures, animations, and VFX/SFX
- Environment and prop models, textures
- Player interface animations, and VFX

Animation/model/texture budget
Models will be robotic in nature. Animations will also conform to this robotic nature as animations will not be organic but rather robotic and simple. There will be animated limbs but no facial expressions. The environments will be simple but will follow the sci-fi aesthetic. Textures will also be simple.

Audio budget
        Sound effects in game will be mostly made from the accessible library DigiPen provided like Soundly. For the background music to be in time of the single semester production, it will most likely have to be from free sites with accreditations.

Levels
        Levels will mostly be open arena without much geometry or complexity to it, focusing more on enemy composition and setup to create interesting gameplay. It will likely be made using modular assets, so there's less workload on the art front. Same level can be shared across different game modes so there's no need to have a lot of different levels.

Risks

Risk Area: Character swapping tech
Description: Architecting the player in a way to dynamically swap between characters keeping track of ability timers, and other combat effects may be a bit over scoped.
Mitigation: Worst case we can remove the realtime swapping mechanic in favor of a out of "game" swap where they player chooses a character rather than a set they would like to use

Risk Area: Art / Audio
Description: We have no dedicated artist nor audio designer in the team.
Mitigation: Some of our members have a fair bit of experience modeling characters. We will try to keep the amount of unique character models low so they don't have to spend too much time on making models and animations. We will also need to create a list of sound assets needed early so we can have more time looking through the free sound library.

Risk Area: Level designs
Description: Our team has no designer specialized in level design. Having different levels for each game mode may be overscoping.
Mitigation: Design a level that can be shared between different game modes. The environment should stay very similar to each other, but will have different enemy setup or level modifiers to distinguish itself from other modes of play.

Team Members:

Name	Primary Role	Secondary Role	Tertiary Role
Cameron Monks	Gameplay Programmer	Systems Programmer	Producer
Brayan Lopez	Technical Artist	Gameplay Programmer	QA
Pasavit panottrirat	Gameplay Designer	Level Designer	QA
Pisit Suengthaworn	UX/UI Designer	Sound Designer	QA

Research:

Cameron - Dynamic character swapping (ref: Genshin Impact) and possibly Dynamic enemy spawning (ref: Risk of Rain 2 Directors)

Pasavit - Focus on researching character kits and abilities, as well as level designs.
(ref: Genshin Impact, Honkai Impact 3rd, Warframes)

Brayan - Focus on researching hard surface modeling

Pisit - Focus On user interface, player feedback and sound effects

Milestone Deliverables

Alpha Milestone – Pre-Production Exit

At this milestone, we will have basic characters with no abilities in the game. The players will be able to switch between characters in the team, testing basic commands such as movements, cameras and normal attack in Sandbox level.

We will focus on getting the Elimination game mode ready first, with players being able to attack and defeat enemies spawned in the level. Win and lose state will be implemented. Eliminating all enemies within the time limit will complete the level. If the timer runs out, players will fail the level.

STRETCH GOALS
- Simple enemy AIs (follow player, attack player, attack protection target)
- Implementation of some character abilities
- Prototype level for other game modes (Protection, Survival, Race)

Beta Milestone – First Playable

Elimination level is fully ready, with functional AI that can perform basic tasks (attack player, follow player). Character abilities are implemented enough to create one team

STRETCH GOALS
- Implementation of additional character abilities, so players can create a different team composition.
- Tutorial level for basic gameplay and each game mode.
- Animation and vfx for character abilities and enemies
- Levels for other game modes

Final Milestone – Production Exit

Elimination level fully ready, with more complex level mechanics like enemies spawning in waves or acting in particular behavior. All characters have their abilities fully implemented, functional and balanced. Animations, vfx and sfx are appropriately added to actions. HUDs and UIs are fully implemented and fleshed out.
Tutorial menu will be implemented to onboard new players into the game.

STRETCH GOALS –
- More advanced Enemy and wave generation