

	Lobby	Don't eat me	Running Rhino	Convergence	Clash of Species	Cards of Wild	Sea Divide
Client	S1	S2	S3	S4	S5	S6	S7
Server	S8	S9	S10	S11	S12	S13	S14
User Interface	S15	S16	S17	S18	S19	S20	S21
Integration	S22	S22	S23	S23	S24	S24	S25
Data Base	S26	S26	S27	S27	S28	S28	S29
Game Concept	S21	S9	S3	S4	S5	S13	S14
Scientific Game Content	S30	S30	S31	S32	S33	S33	S34

[Technical Team Assignment - horizontal]

- **Game Concept Design Team:** this team has most important initial responsibility. The concept design team should consider the limitations such as time (10 weeks for actual implementation), lack of artists, and unknown factors like the potential of other team's performance. The team also has to collect everyone's idea, finalize the game concept into several milestones and produce the documentation.
- **Game Client Team:** this team is responsible to implement 2D/3D game client using Unity. Students have to learn 3D graphics, game engine and C#. Also client communicates with server using the game protocol to update the status (position, motions, and levels, etc) of other clients concurrently in the same virtual space.
- **Game Server/Protocol Team:** this team is responsible to implement game server that connects to all the clients, synchronize every client status and update the Database. The server team had to read and revise the game server. Also the server team has to develop an effective set of protocols used between clients and server. Students in this team have to learn socket programming, client-server architecture, and Network protocols.
- **Art Support Team/UI:** this team is responsible to provide 3D models to create the virtual world and characters in the game. As there are no artists in the class, this team has to find freely available 3D models and convert the format to work with Panda3D. Students in this team have to learn basic of 3D modeling tools such as Blender or Maya and converting 3D model formats, and real time rendering performance trade-off (visual quality vs. rendering speed).
- **Scientific Game Content Team:** World of Balance game has ecology game content. It uses population dynamics computation model. So, students with interest in ecology should work in this team.
- **Integration Team:** Integration team member plays core responsibility to keep the code to be reliable and consistent throughout the whole class. Should be familiar with GitHub and develop unitTest modules to test before integration.

[Modular Team Assignment - vertical]

Each module needs members from technical team such as client, server, etc. By having their own module, the communication becomes effective within each module.

- **Lobby Team:** this part is the central to most multiplayer online game. Players come to lobby to meet other players, host mini games, join mini games hosted by others, and maintain personal inventory, money, etc.