

Scratch Basic

Session 1: Introduction to Scratch

1. Introduction to Scratch:

- What is Scratch?
- Overview of the Scratch interface.

2. Understanding Programming:

- Basic concepts of programming.
- Difference between programming and design.

3. Design and Blocks:

- Introduction to the concept of blocks in Scratch.
- How to use blocks to create programs.

4. User Interface and Properties:

- Detailed walkthrough of the Scratch interface.
- Explanation of sprites, stages, and their properties.

5. First Story Creation and Drawing :

- Drawing and creating characters.
- Making characters move and interact.

Session 2: Events and Loops

1. Event Blocks:

- Introduction to event blocks.
- How to start scripts using events.

2. Repeat and Forever Blocks:

- Introduction to loops.
- Difference between repeat and forever blocks.

3. Second Game Creation:

- **Building the Chicken Game:**
- Design and sprite creation.
- Implementing movements and interactions.
- **Building the Basketball Game:**
- Designing the court and characters.
- Implementing the shooting mechanism.

Session 3: Conditions and Timers

1. If Blocks:

- Introduction to conditional statements.
- How to use if blocks in Scratch.

2. Time and Score Blocks:

- Introduction to timers.
- Adding score mechanisms to games.

3. Third Game Creation:

- **Building Ball Ping Game:**
- Designing the game setup.
- Implementing the ping mechanism.
- **Building Ping Pong Game:**
- Designing paddles and balls.
- Implementing game logic.

Session 4: Visibility and Score Management

1. Hide and Show Blocks:

- How to hide and show sprites.
- Using these blocks to create game dynamics.

2. Fourth Game Creation:

- **Building Apple Game:**
- Designing apples and characters.
- Implementing collection mechanics.
- **Building Collect Orange Game:**
- Designing the game setup.
- Implementing collection and scoring.

Session 5: space war Game Design

1. Game Planning:

- Discuss the concept and mechanics of the space war Game.
- Plan the design and interactions.

2. Designing the space war Game:

- Create sprites and backgrounds.
- Set up the initial game layout.

Session 6: Building and Finishing the space war Game

1. Implementing Game Logic:

- Adding blocks to control game behavior.
- Implementing interactions and scoring.

2. Testing and Debugging:

- Playtesting the game.
- Debugging any issues.

3. Final Touches:

- Adding finishing touches.
- Reviewing and polishing the game.

