

Prop vs State

Tuesday, March 22, 2022 4:23 PM

Props vs State

Props

- ▶ Special object containing values passed from parent to child
- ▶ Prop received from parent is immutable
 - ▶ component can't change props passed to it.
- ▶ Present in both class and function components
- ▶ Readonly for component that received it.

State

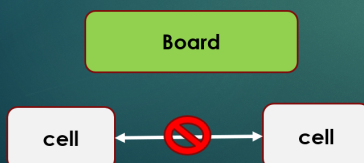
- ▶ Special Object to handle internal values of a component
- ▶ Can be changed to bring changes in the UI
 - ▶ Done using special setState method
- ▶ Present only in class component
- ▶ Can be changed.

1. A component may pass its state as a prop to the child component

1. A parent can pass its state to the Child as a prop
2. When parent changes its state, parent is re-rendered
3. When a parent is rendered all the children are also re-rendered
4. The latest value of parent state is again passed to the re-rendered children.
5. Thus child can't modify what it receives
 - a. But parent can modify what child receives

Cell Problem

- ▶ Each Cell works independently and changes from empty to "O"
- ▶ They don't know each other
- ▶ In the game The value of next cell depends on Previous.
- ▶ A React component can't interact with its siblings.
- ▶ They can communicate via parent
- ▶ It is the job of the board to know which cell should display what value



Tic Tac Toe

Next Move : O

O	-	O
-	O	-
-	-	-

Reset