

## OOP VS FP

Object-Oriented Programming (OOP)	Functional Programming (FP)
Centers around objects and classes that encapsulate state and behavior.	Focuses on functions, immutable data, and the absence of side effects.
Employs classes for modularity; instances created are objects.	Achieves modularity through self-contained, reusable functions.
State is mutable and can be shared among objects.	Avoids shared state; functions return new states without altering existing ones.
Ideal for systems simulating real-world entities, complex UIs, and applications demanding concrete data representations.	Suited for applications requiring concurrency, high predictability, and ease of testing.