② Runtime / dynamic polymoaphism

class Parent {   class Child extends Parent {

}   }

Parent p = new Parent ()

reference
variable

└──→ new object

Child c = new child ()

Parent obj = new Child ()

Function Overriding

Static Polymorphism	Dynamic Polymorphism
Overloading	Overriding
Early binding	Late binding
compile time	run time

final keyword

↳ ① variables

final int a; ⟶ can only assign value once

⟶ ② Functions

↳ cannot be overriden

⟶ ③ Classes

↳ cannot extend

---

③ Encapsulation

↳ binding all the data members and member functions in class together

⟶ wrapping everything in class

④ Abstraction

⟶ Hiding all the unnecessary details and show only the required part.

Access. Modifiers
Abstract class
Interface

Access Modifiers / Specifiers

↳ specifies access / permission

① Public

② Protected

③ Default

④ Private

	class	Package	Sub class in diff package	Anywhere / diff package
Public	✓	✓	✓	✓
Protected	✓	✓	✓	
Default	✓	✓		
Private	✓	✗	✗	✗