

Inheritance (Nasl yoki voris olish)

Reja:

1. Inheritance
2. super kalit so'zi
3. instanceof kalit so'zi.



THE
INHERITANCE



Base Class

Derived Class



Inheritance in Java



I am
Derived Class

I am
Base Class



**PERSONAL
DEVELOPMENT PROCESS**
stay weird, stay different

Animal



Dog



Cat

- INHERITED SKILLS
- NEW SKILLS

ABILITIES

- COOK
- SING
- DANCE
- TEACH



ABILITIES

- COOK
- SING
- DANCE
- TEACH
- FLY PLANES
- PLAY FOOTBALL



ABILITIES

- COOK
- SING
- DANCE
- TEACH
- CODE



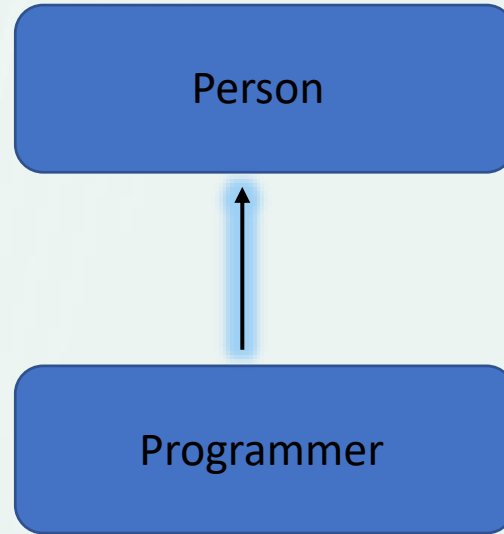
ABILITIES

- COOK
- SING
- DANCE
- TEACH
- SHOOT GUNS
- REPAIR ELECTRONICS

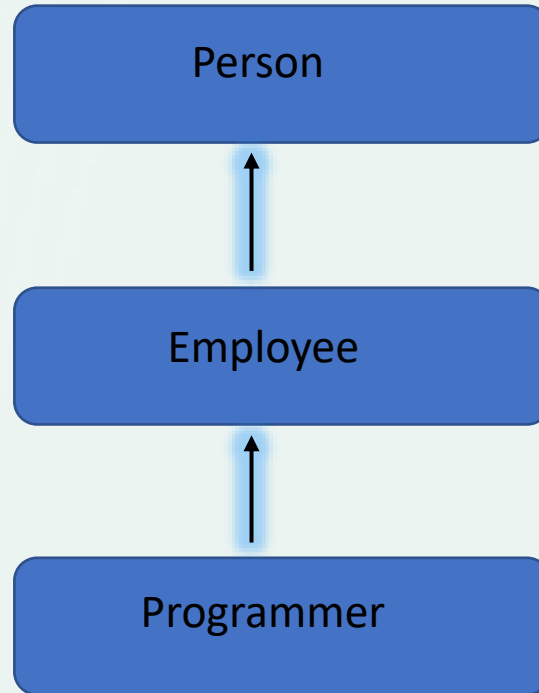
Types of Inheritance in Java



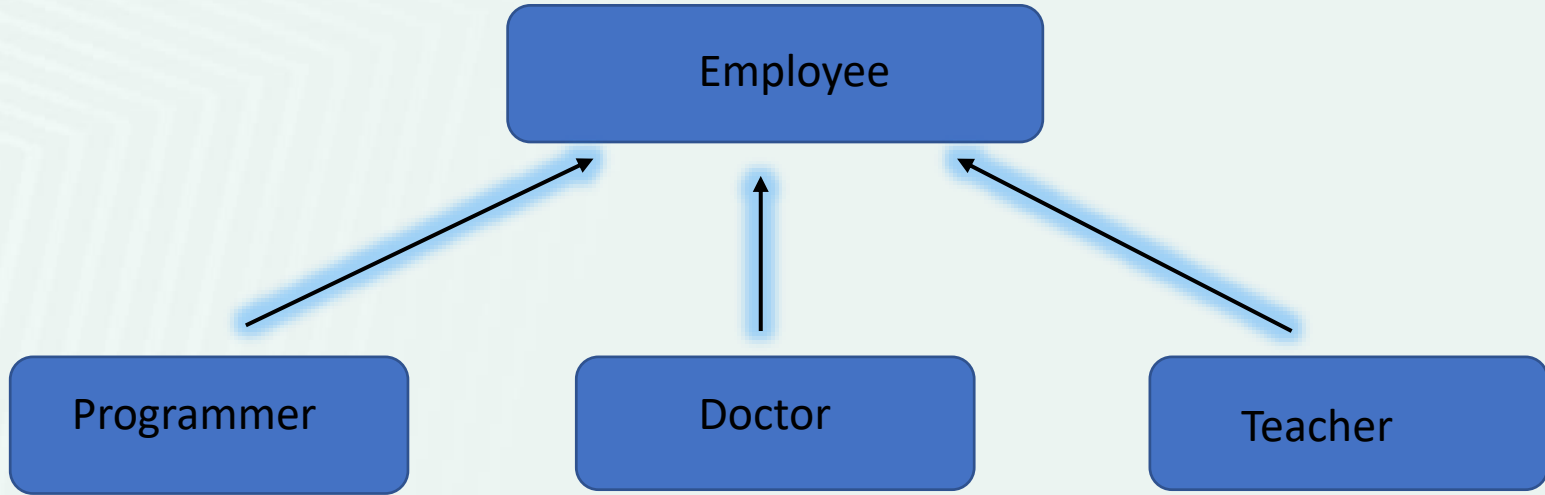
Single Inheritance



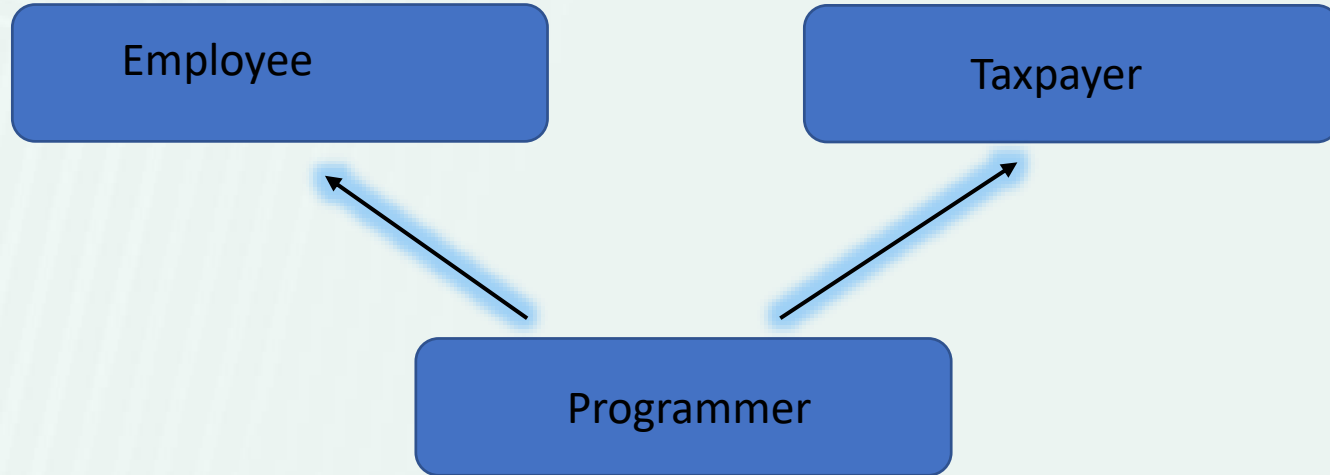
Multilevel Inheritance



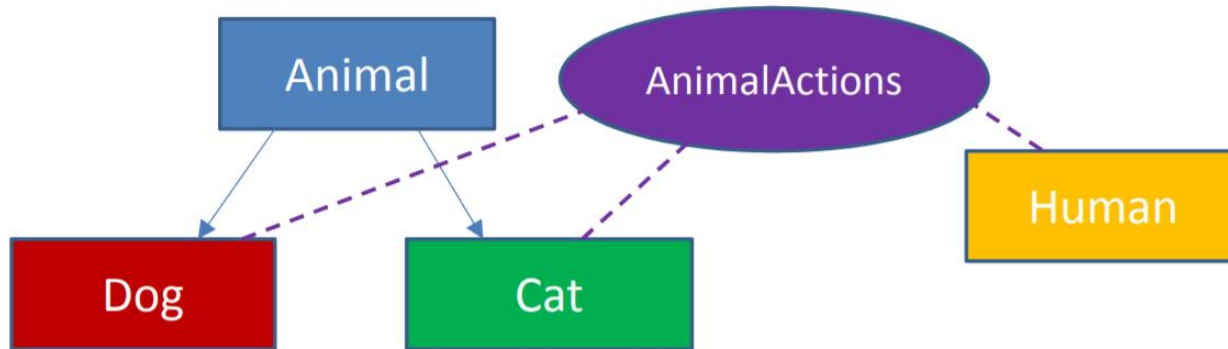
Hierarchical Inheritance



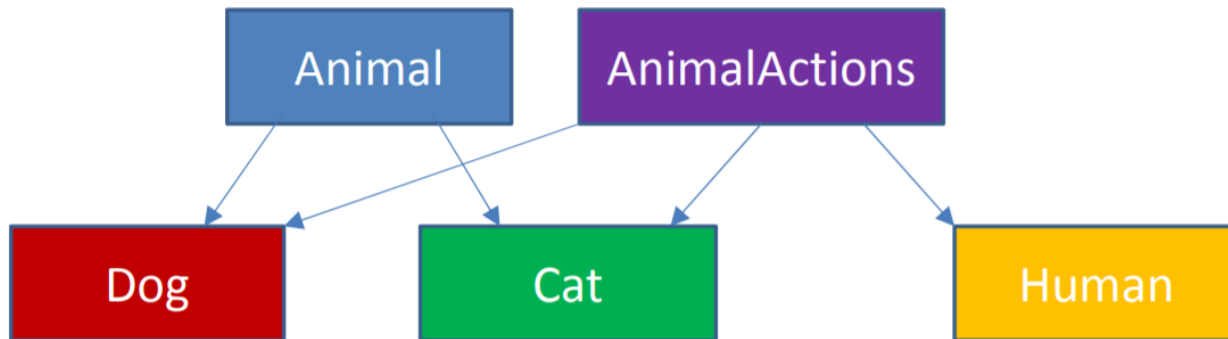
Multiple Inheritance



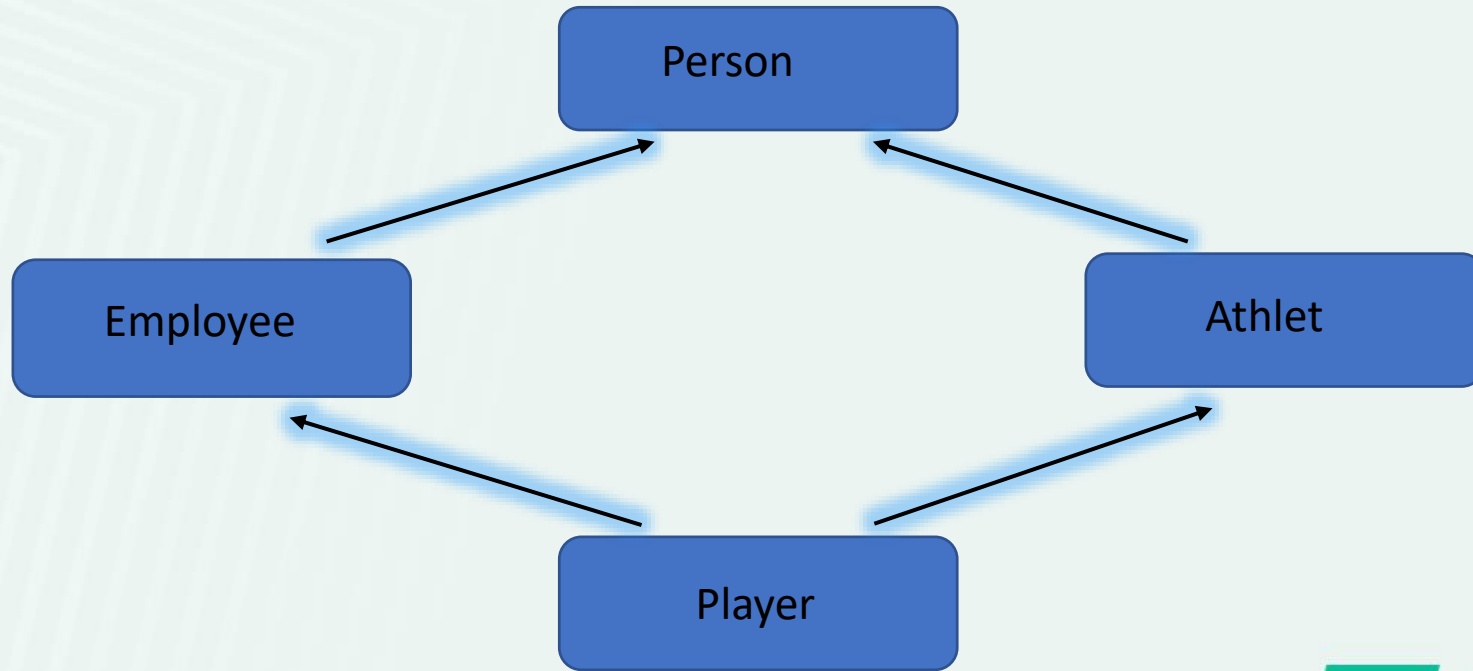
Java: Interface



C++



Hybrid Inheritance



Rules of Inheritance in Java

- **Multiple Inheritance ni amalga oshirib bo'lmaydi.**
- **Cyclic Inheritance ni amalga oshirib bo'lmaydi.**
- **private constructor l bor bo'lgan classdan Inheritance ni amalga oshirib bo'lmaydi**
- **Constructor lardan voris olinmaydi.**
- **Private a'zolardan voris olinmaydi.**
- **Constructor larni super() orqali chaqirish mumkin.**

Inheritance asosan 2 maqsadda amalga oshiriladi:

- Bir nechta classga tegishli bo'lgan a'zolari har bir classda qayta qayta yozmaslik;
- Classlarni guruhlash;



Instanceof operatori

```
Programmer p = new Programmer();  
if(p instanceof Employee) {  
    Employee e = (Employee) p;  
    e.work();  
}  
p.writeCode();
```



protected access modifikatori

- Obe'kt olinganda –package ga xos xususiyatga ega
- Voris olinganda – public ga xos xususiyatga ega



