# Runtime polymorphism

```
PROBLEMS (S) OUTPUT DEBUG CONSOLE TERMINAL PORTS

PS D:\Codes\Java> & 'C:\Program Files\Java\jdk-21.0.6\bin\java.exe' '-XX:+ShowCodeDetailsInExceptionMessages' '-cp' 'C:\Users\Shravan Upadhyaya\AppDa e9c0399b5b74a\redhat.java\jdt_ws\Java_e1b065e4\bin' 'Runtime_Polymorphism'

Car speed: 170 km/h

Bike speed: 99 km/h

PS D:\Codes\Java>
```

### Multilevel inheritance

```
PROBLEMS 5 OUTPUT DEBUG CONSOLE TERMINAL PORTS

PS D:\Codes\Java> & 'C:\Program Files\Java\jdk-21.0.6\bin\java.exe' '-XX:+ShowCodeDetailsInExceptionMessages' '-cp' 'C:\Users\Shravan Upadhyaya\AppDa e9c039b574a\redhat.java\jdt_ws\Java_e1b065e4\bin' 'Multilevel_Inheritance'
Dog 3bsh574a\redhat.java\jdt_ws\Java_e1b065e4\bin' 'Multilevel_Inheritance'
O PS D:\Codes\Java>
```

## Diamond problem

```
PS D:\Codes\Java> & 'C:\Program Files\Java\jdk-21.0.6\bin\java.exe' '-XX:+ShowCodeDetailsInExceptionMessages' '-cp' 'C:\Users\Shravan Upadhyaya\AppDee0c039b5b74a\redhat.java\jdt_ws\Java_e1b065e4\bin' 'Diamond_Problem'
Hii from C
Hii from B
Hii from D
PS D:\Codes\Java>
```

### Example for interface

```
PS D:\Codes\Java> & 'C:\Program Files\Java\jdk-21.0.6\bin\java.exe' '-XX:+ShowCodeDetailsInExceptionMessages' '-cp' 'C:\Users\Shravan Upadhyaya\AppDe e9c039b5b74a\redhat.java\jdt_ws\Java_e1b065e4\bin' 'Example_Interface'
Printing document..
Printing image...
PS D:\Codes\Java>
```

### Multiple inheritance

```
PROBLEMS 
OUTPUT DEBUG CONSOLE TERMINAL PORTS

PS D:\Codes\Java> & 'C:\Program Files\Java\jdk-21.0.6\bin\java.exe' '-XX:+ShowCodeDetailsInExceptionMessages' '-cp' 'C:\Users\Shravan Upadhyaya\AppDa e9C839b5b74a\redhat.java\jdt_ws\Java_e1b065e4\bin' 'Multiple_Inheritance'
Duck is flying
Duck is swimming
PS D:\Codes\Java>
```