

INTERFACE JAVA

```
/**
 *
 * @author Administrator
 */
public interface Bicycle {
    // definitions of methods
    public void changeCadence();

    public void changeGear();
}
```

An interface is an abstract methods consisting primarily of software component - it is possible to declare public constants - which allows indirect access to a class when the principle of encapsulation is fully implemented.

An interface is a "class" where all methods are abstract. An interface defines a set of features, a contract for the classes that implement the interface.

The code of interface methods is empty.

It is possible to implement multiple interfaces for a class.

Implements Interfaces

```
public class Wheel implements Bicycle{
    // definition function methods implements
    public void changeCadence() {
        System.out.println("long sprint");
    }

    public void changeGear() {
        System.out.println("tshirt");
    }

    public static void main(String[] args) {
        // create obhject
        Wheel m = new Wheel();
        m.changeCadence();
        m.changeGear();
    }
}
```

```
Input - FenetreAvecSaisie (run) x
run:
long sprint
tshirt
BUILD SUCCESSFUL (total time: 0 seconds)
```

Extending Interfaces

An interface can extend another interface in the same way that a class can extend another class. The `extends` keyword is used to extend an interface, and the child interface inherits the methods of parent interface.

```
/**
 *
 * @author Administrator
 */
public interface Sport extends Bicycle{
    public void setHomeTeam(String name);
    public void setVisitingTeam(String name);
}
```

