C++

运算符重载

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概念

▌ C++准许以运算符命名函数！！！

string a = "hello"；

a += " world"；// +(a, "world"）；

cout<< "hello"；// <<(cout, "hello"）；

可重载的运算符

```
new     delete        new[]          delete[]
+       -       *      /       %       ^       &       |       ~
!       =       <      >       +=      -=      *=      /=      %=
^=      &=      |=     <<      >>      >>=     <<=     ==      !=
<=      >=      &&     ||      ++      --      ,       ->*     ->
()      []
```

不可重载的运算符

The following operators cannot be overloaded:

```
.       .*      ::      ?:
```

nor can the preprocessing symbols # and ## (clause 16).

实现形式

▌ 成员函数式(第一个行参是对象的引用)

```
class Time{
public:
        Time operator+(Time t);
private:
        int hour;
        int min;
        int sec;
};
Time  a, b;
Time  c = a+b;
```

实现形式

▌ 友元函数式*(左操作数不是本身, 可交换型)*

class Time{

public:

  friend void operator<<(ostream, Time);

private:

  int hour;

  int min;

  int sec;

};

Time a;

std::out<<a;

分类

数学运算符

+ - * / ++ --

关系运算符

== >= <= !=

特殊运算符

[ ]

=   赋值运算符

( )   仿函数

<<   输出运算符

扫一扫，获取更多信息

THANK YOU