

C++ Cheatsheet

Overview of unique features

- Object-oriented programming language
- Strongly-typed language
- Supports templates and generics
- Wide range of libraries and frameworks
- Can be used for system programming and game development

Variables

```
// Declare a variable
int x = 42;

// Declare a constant
const int y = 10;

// Declare an array
int myArray[3] = {1, 2, 3};

// Declare a string
std::string myString = "hello";
```

Functions

```
// Declare a function
int add(int x, int y) {
    return x + y;
}

// Call a function
int result = add(3, 4);
```

Loops

```
// Define a for loop
for (int i = 0; i < 10; i++) {
    // do something
}

// Define a while loop
while (condition) {
    // do something
}
```

Conditionals

```
// Define an if-else statement
int max(int x, int y) {
    if (x > y) {
        return x;
    } else {
        return y;
    }
}
```

Object-oriented programming

```
// Define a class
class MyClass {
public:
    int myField;
    void myMethod() {
        // do something
    }
};

// Create an instance of a class
MyClass myInstance;
myInstance.myField = 42;
myInstance.myMethod();
```

Resources

- [C++ documentation](#)
- [C++ tutorial](#)
- [C++ forum](#) for community support and troubleshooting.