

String Operations Contd

Exercises

- Explain what the `append()` member function of `std::string` does
- In the code below, what are the final values of `hello` and `hello2`?

```
string hello {"Hello"};  
hello.append(" world");  
string hello2 {"Hello"};  
hello2.append("wow!!!!", 3, 2);
```

- Write a program to check your answer

- Explain what the insert() member function of std::string does
- In the code below, what is the final value of hello?

```
string hello { "hello" };  
hello.insert(4, "eh");  
hello.insert(6, 3, '.');  
hello.insert(6, 1, '.');
```

- Write a program to check your answer

- Convert the code below into a working program. What results do you expect?

```
string hello { "hello" };  
hello.insert(4, "eh");  
hello.insert(6, 3, '.');  
hello.insert(6, 1, '.');  
string dol {"Dolly"};  
hello.insert(4, dol, 1, 3);  
size_t opos = hello.find('o');  
if (opos != string::npos)  
    hello.insert(opos, "OOO");
```

- What does the `std::string erase()` member function do?
- Add the following code to your program from the last exercise. What result do you expect?

```
size_t oopos = hello.find('O');  
hello.erase(oopos, 3);
```

- Explain what the code below does
- Convert it into a working program
- What results do you expect?

```
string pi { to_string(3.14159) };  
hello += pi;  
cout << stoi(pi) << endl;  
cout << stod(pi) << endl;
```

- Explain what the code below does
- Convert it into a working program
- What results do you expect?

```
string hi { "Hello" };  
string howdy { 'H', 'e', 'l', 'l', 'o' };  
string triplex(3, 'x');  
string hello(hi, 1);  
string hello2(hi, 1, 3);
```