

# Online 1: Buffer Overflow

Section: A1

Time: 35 minutes

You are given a file A1.c. Replace the <SZ> and <MAX> values according to the given rules. Craft a payload that, when **strcpy**-ed into buf,

- first executes `greet()`
- then immediately executes `get_shell()`

Don't change anything except the two macros.

Submit your exploit as `exploit.py`

**Expected output:**

```
Greetings challenger, 2005123!  
CSE406# whoami  
root  
CSE406
```

$SZ = 100 + \text{<Last 3 digits of your ID>} * 5$

$MAX = 200 + \text{<Last 3 digits of your ID>} * 5$

**Hint:**

If function foo's address is 0xDEADBEEF, then you can call foo using these instructions:

```
mov ebx, 0xDEADBEEF  
call ebx
```

Use the following link to create assemble the instructions into raw hex:

<https://defuse.ca/online-x86-assembler.htm#disassembly>

If a function takes parameters, don't forget to push the values before calling that function.

# Online 1: Buffer Overflow

Section: B2

Time: 35 minutes

You are given a file B2.c containing some C code. Your task is to get access to the root shell by exploiting the stack buffer overflow attack.

Change the values `<param_1>` and `<param_2>` according to the given rules:

`<param_1> = 100 + <Last 3 digits of your ID> * 5`  
`<param_2> = 200 + <Last 3 digits of your ID> * 10`

Expected output:

```
Main started...
Returning from foo...
CSE406# whoami
root
CSE406# █
```

Submit your **exploit.py** file only.