CS Summer Challenge

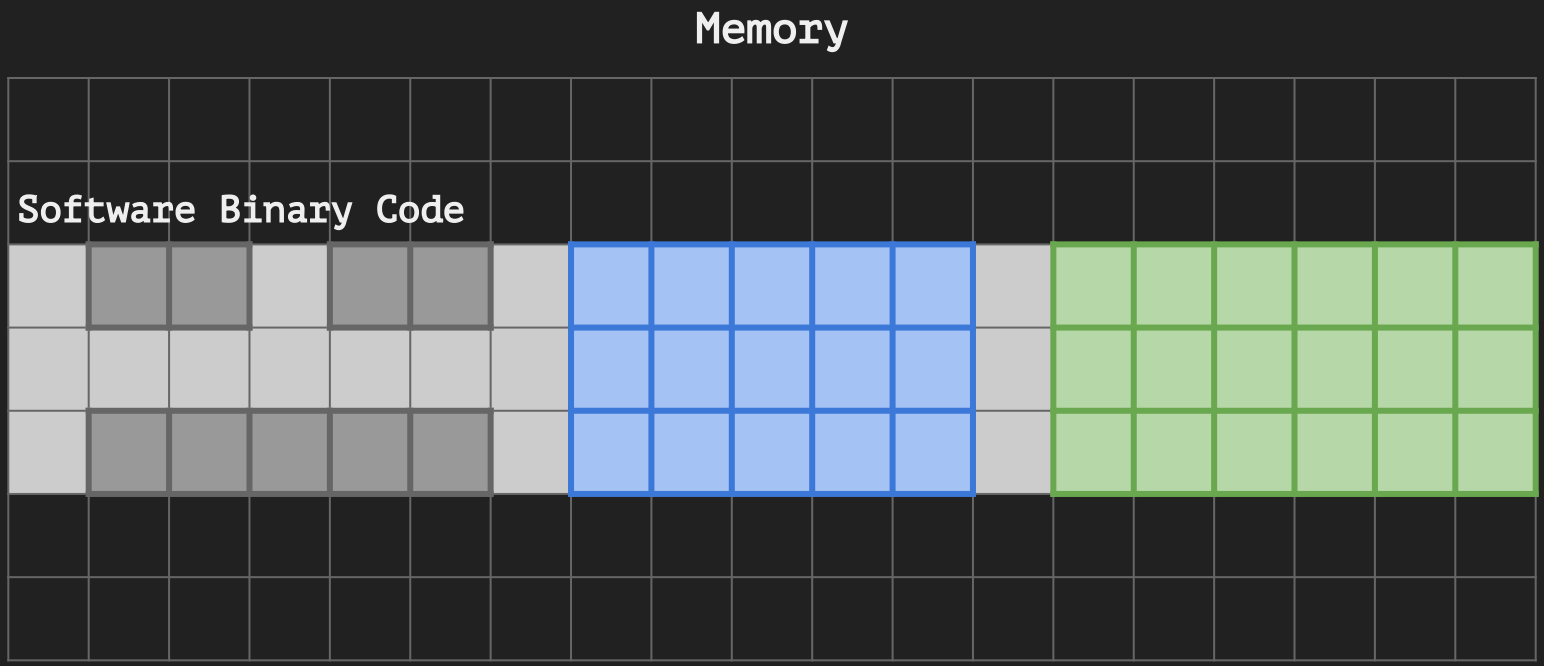
Day 0x2 / 0x3

How does a code work?

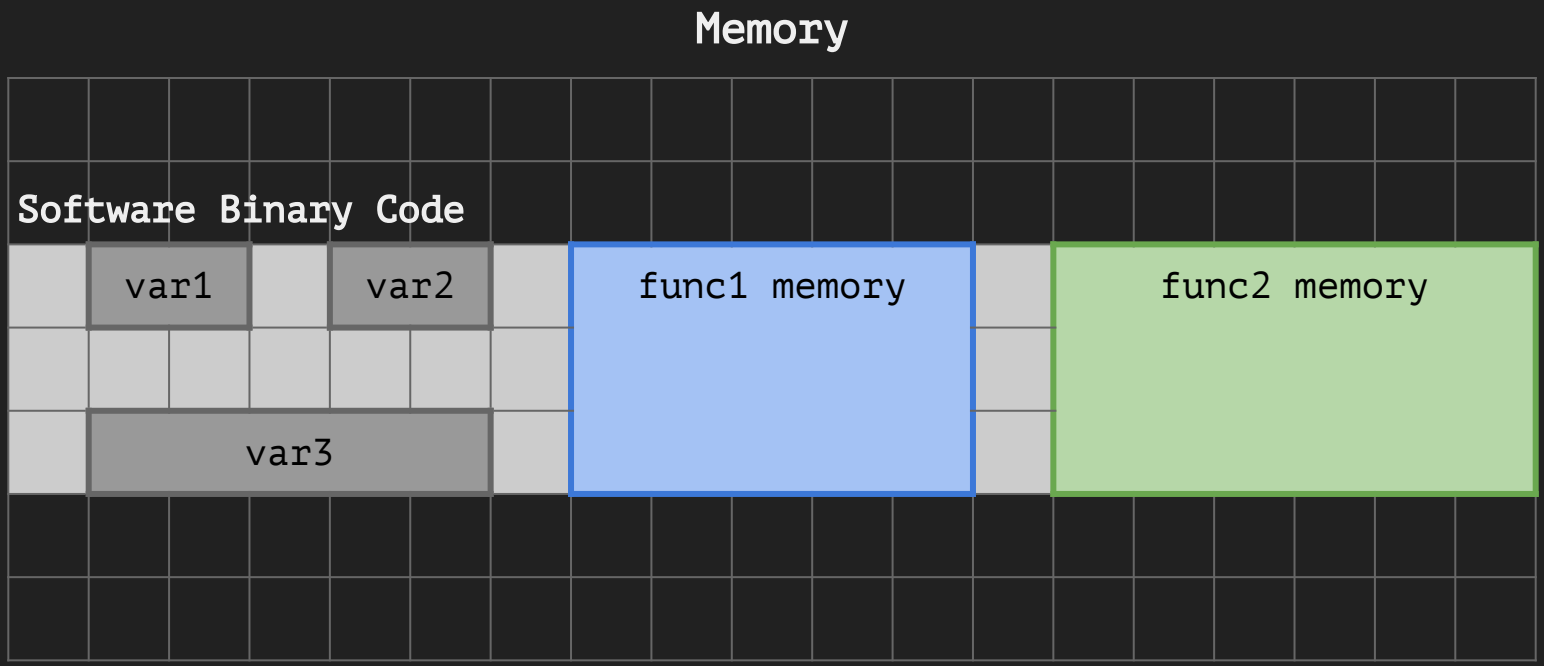
How does code work?

Variables Explained

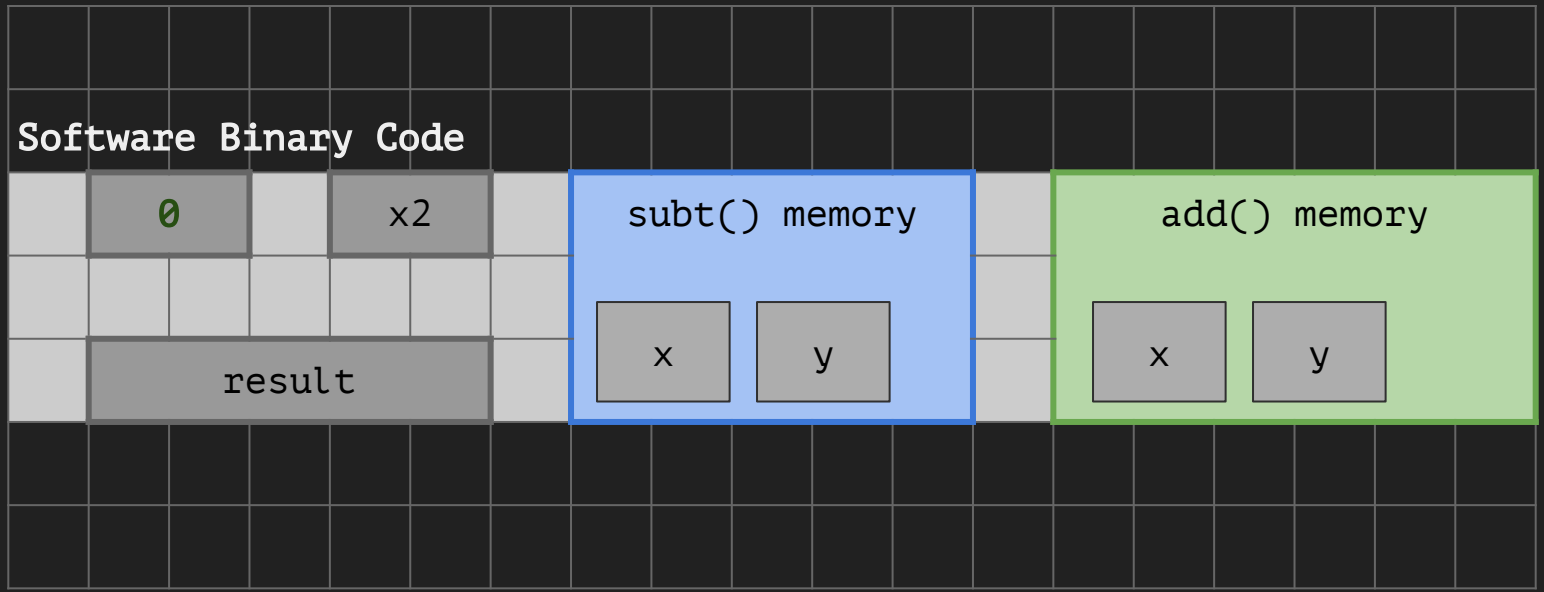
Variables: *are translated into their binary encoding and added to the binary code of the software.*



Variables: *values change in the memory locations allocated for the variables*



```
x1 = 0
...
def get_input():
    x1 = int(input())
    ...
```



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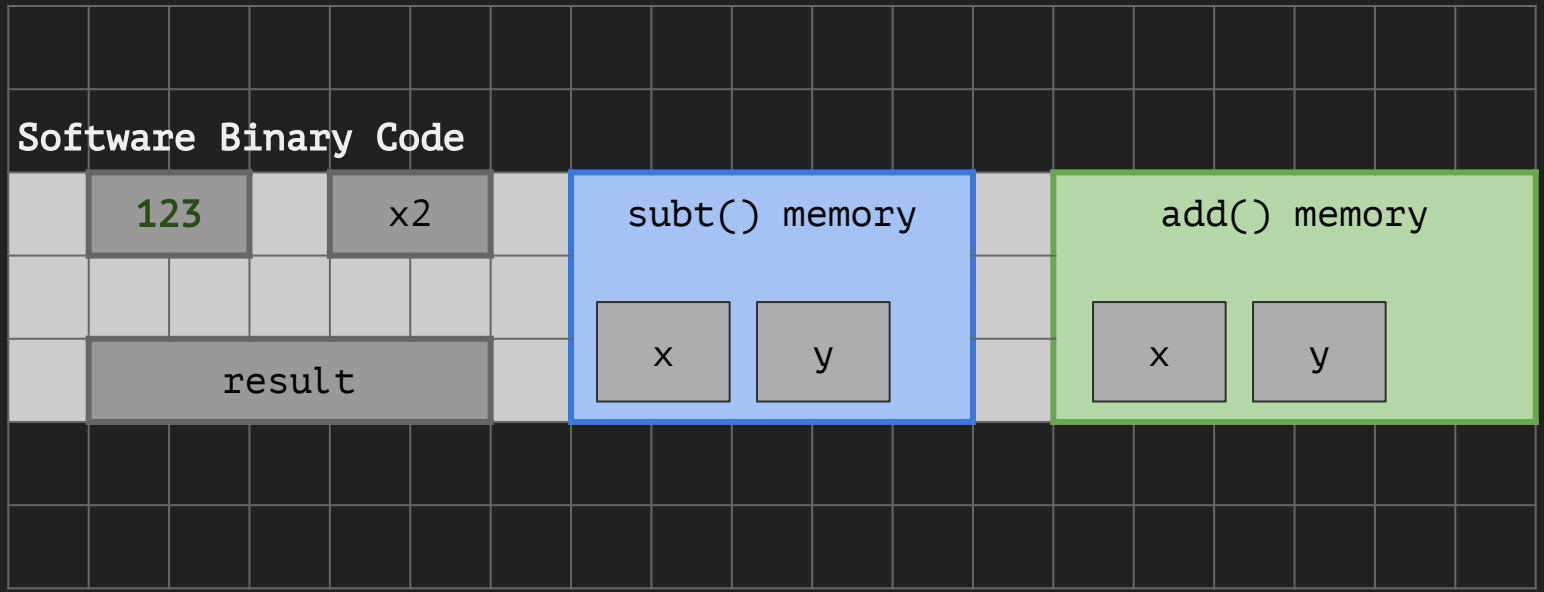
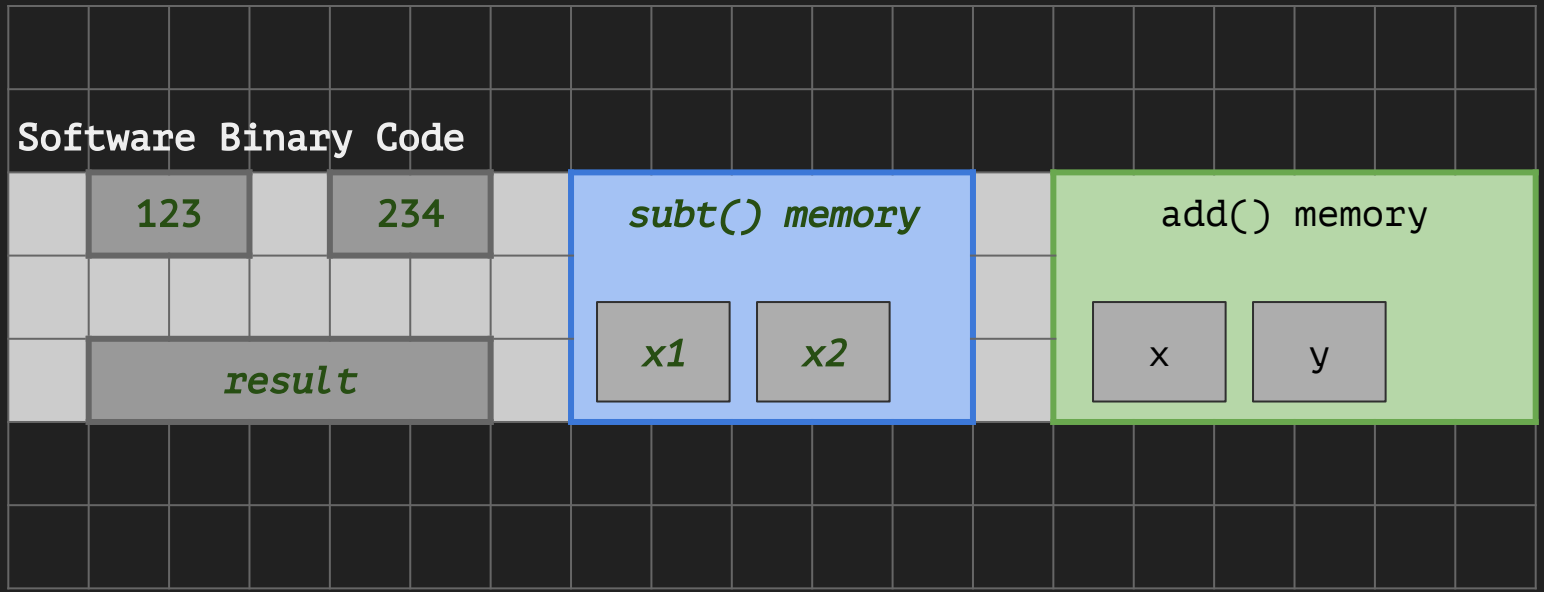


```
...
result = subt(x1, x2)
def subt(x, y):
    return x - y
    ...
```



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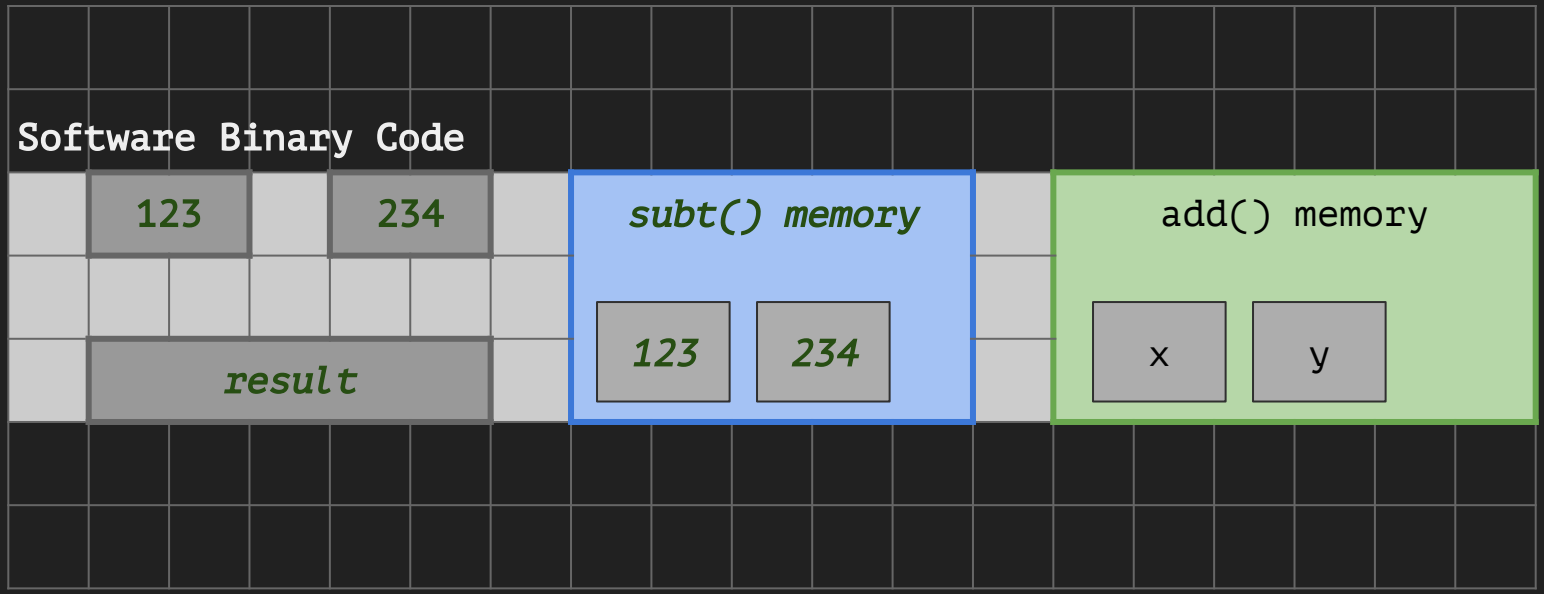

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def subt(x, y):
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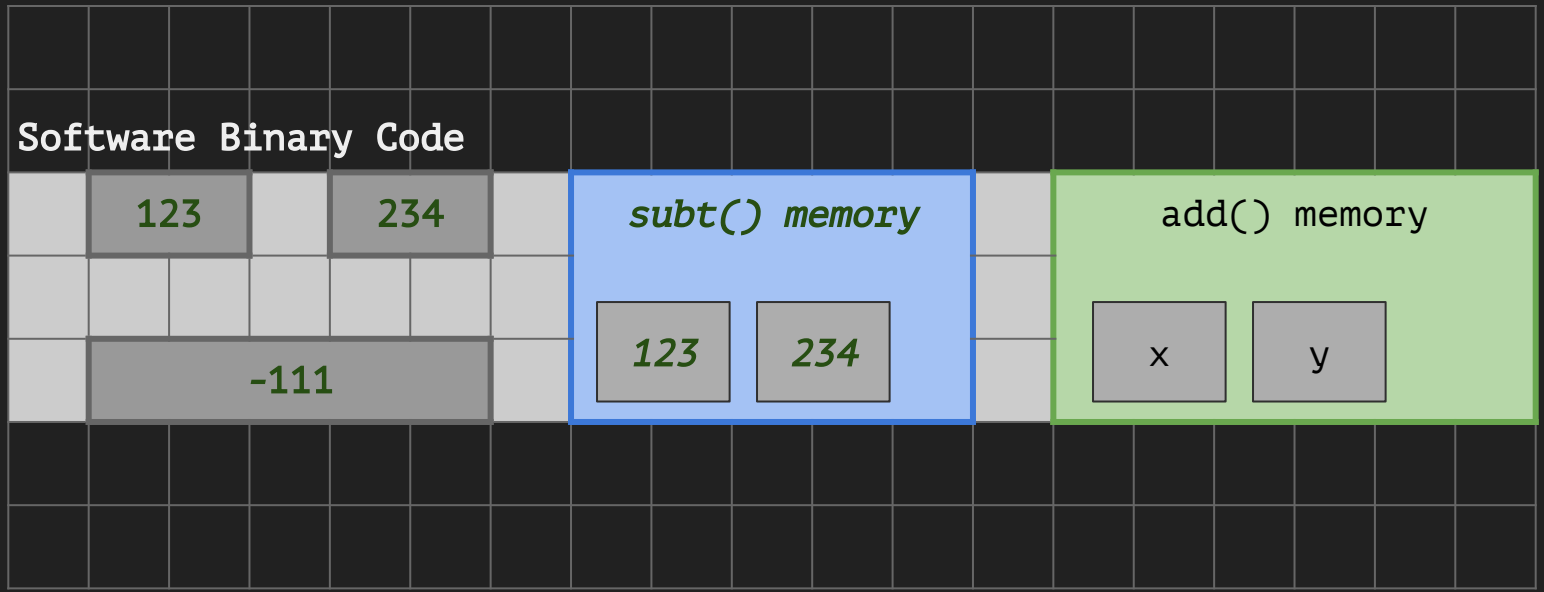
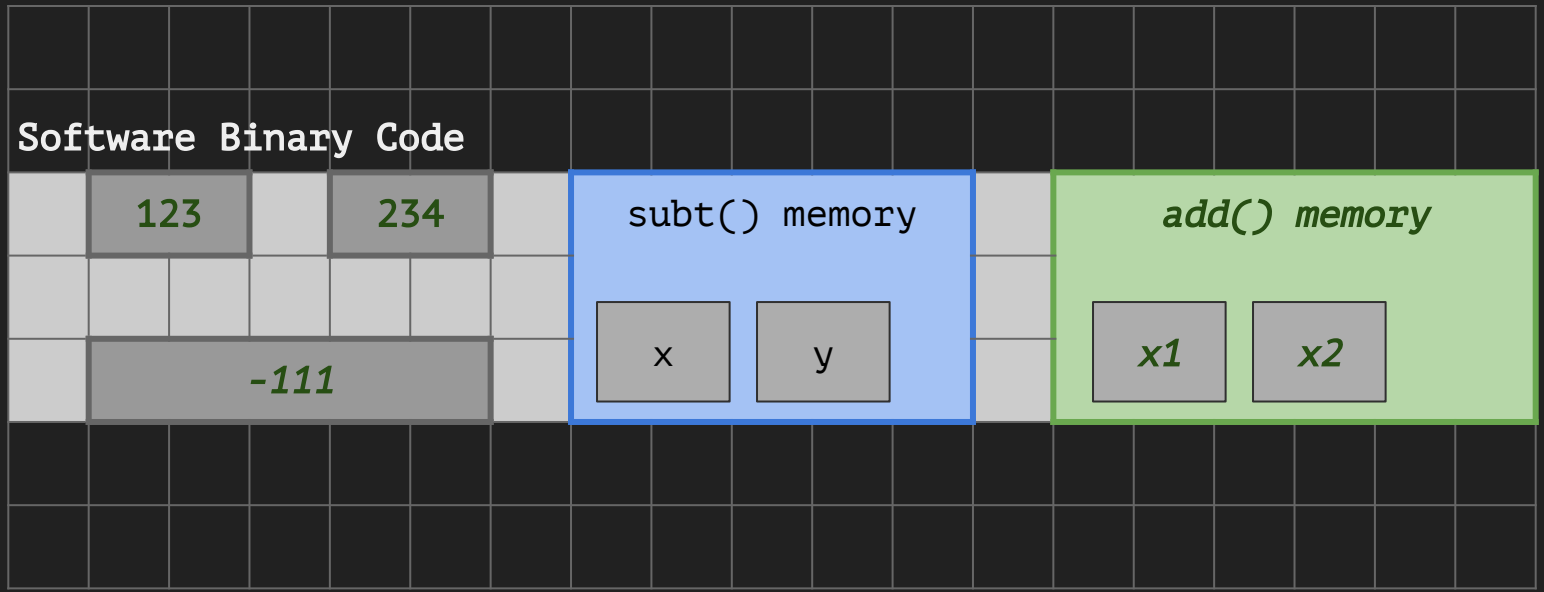


```
...
result = add(x1, x2)
def add(x, y):
    return x + y
    ...
```



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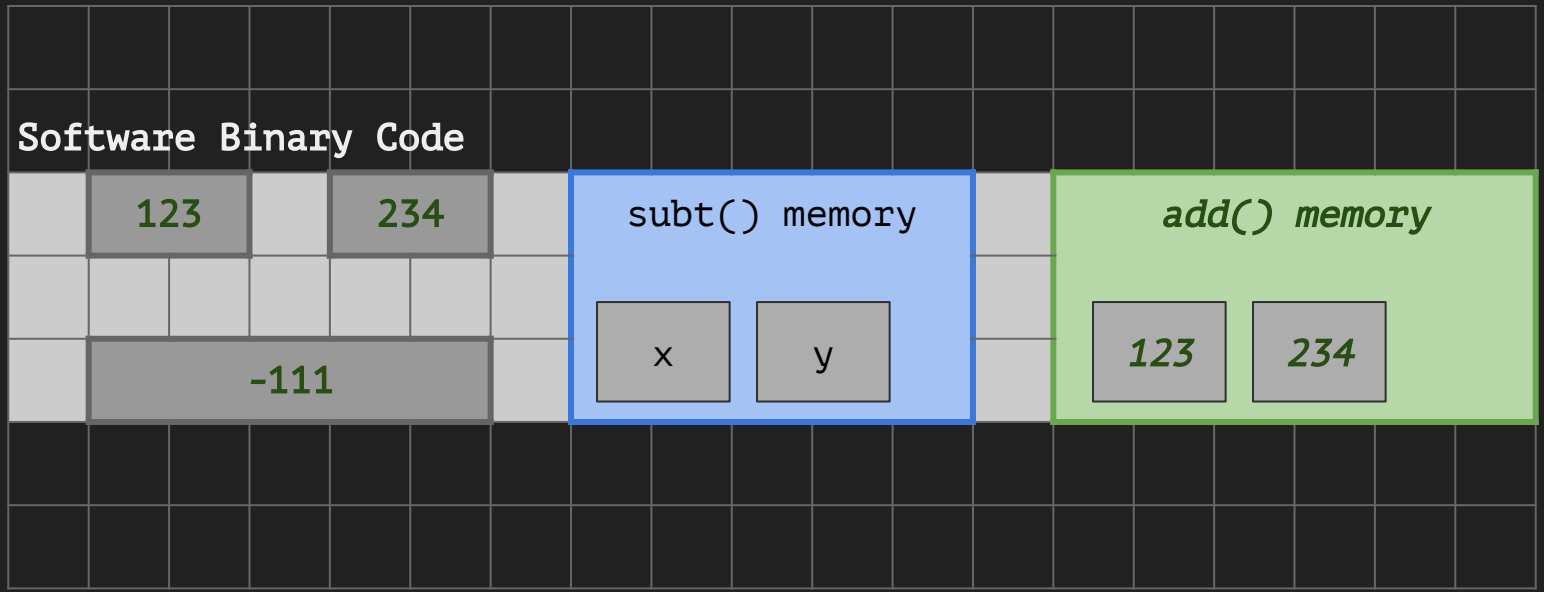

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result = add(x1, x2)
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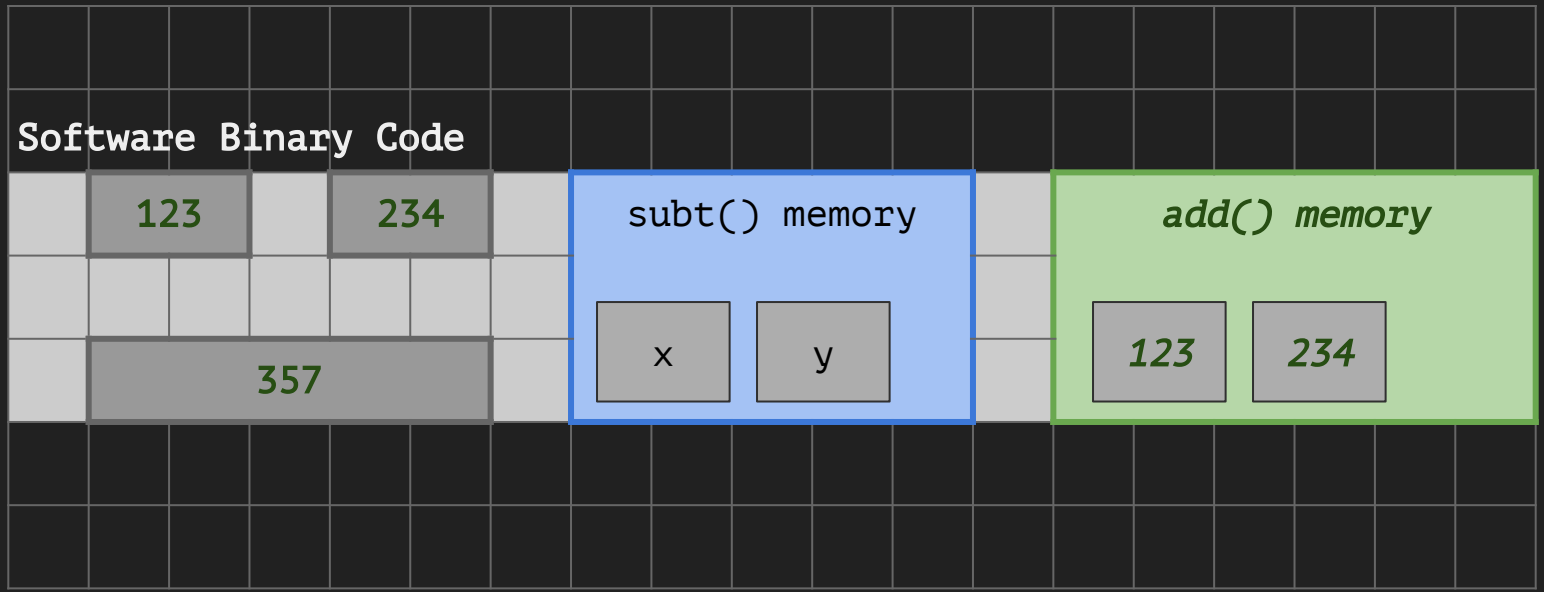
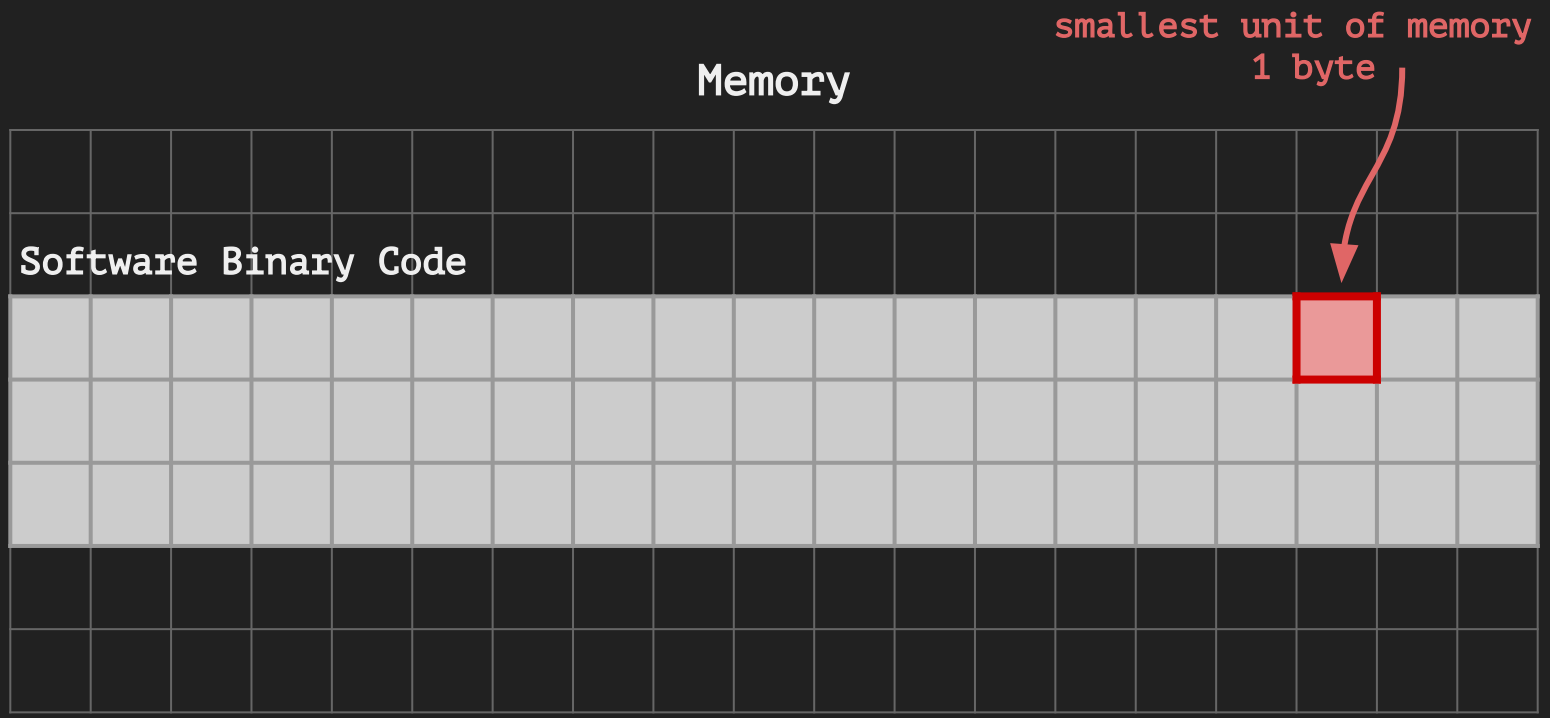


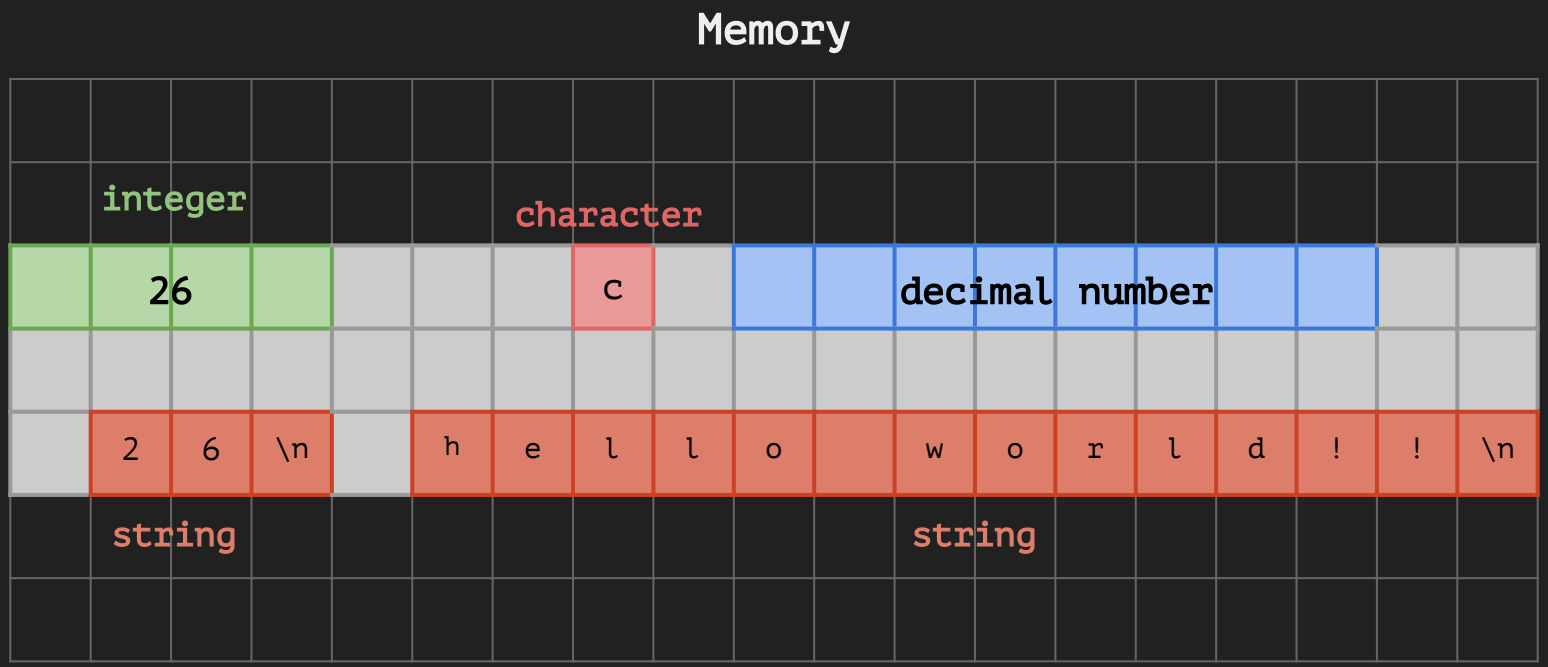
How does code work?

Variable Types

Variables: *consume different amounts of memory based on their data type*



Variables: *consume different amounts of memory based on their data type*



Variables: *have different binary encodings depending on their data type*