

MEMORY MANAGEMENT IN C/C++

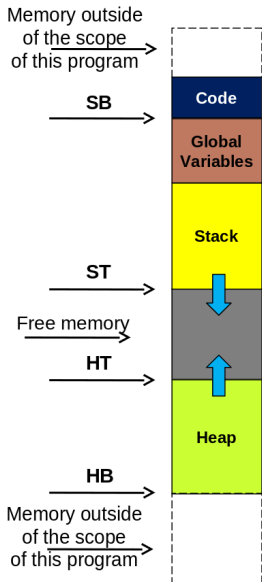
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Memory management in C/C++



Stack

- Allocation: implicit
- Deallocation: implicit

Heap

- Allocation: explicit
- Deallocation: explicit (with GC = implicit)



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```
#include <iostream>

// global variables ①

int main() {
    int a = 1; double b = 2; ②

    double *p = new double(); ③
    *p = b; ④ *p = 4; ⑤

    int *pa = &a; ⑥
    *pa = 2; ⑦

    std::cout << "a = " << a << ", b = " << b << std::endl;

    delete p; ⑧

    return 0;
} ⑨
```

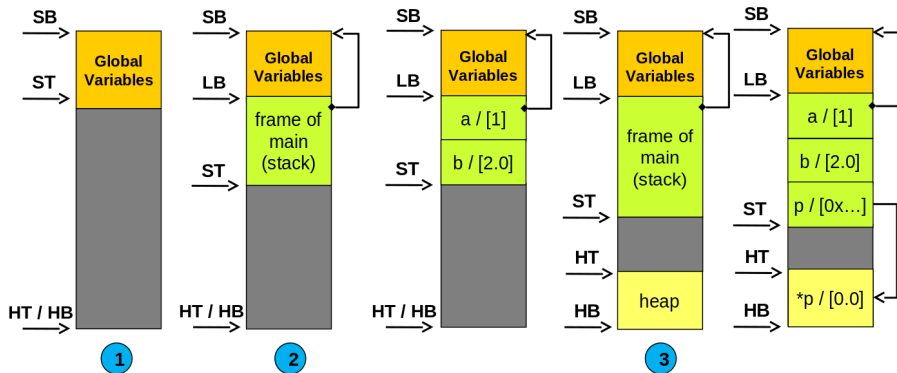


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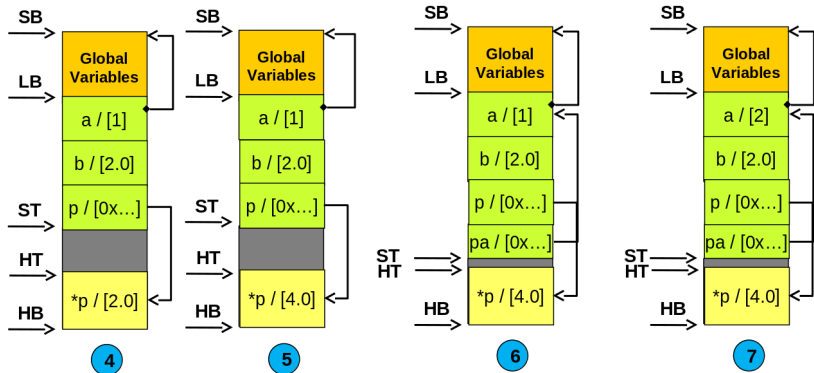


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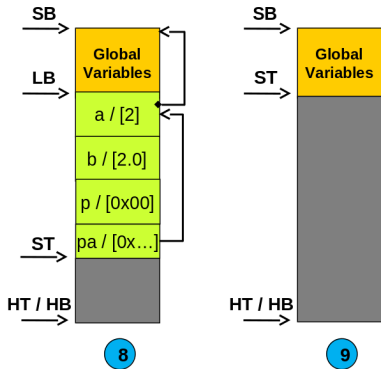
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