! This class has been made inactive. No posts will be allowed until an instructor reactivates the class.

note @364 @ 👚



173 views

[Exams] Past Exams 2016 and older Q&A

Discuss all questions pertaining to exams which took place in 2016 and older here.

You can find the past exams here: https://cs61c.org/resources/exams

When posting questions, you MUST reference the semester, exam, AND question so we can help you.

Please put this at the beginning of your post in this format: [{Year} {Semester}-{Exam}]:Q{Question Number}

For example: [2016 SP-MT1]:Q1, or [2014 SU-F]:Q3

{Semester} is one of these: SP, SU, FA {Exam} is of of these: Q, MT, MT1, MT2, F

If you follow this format, it will make it very easy to search for similar questions!

midterm_exam1

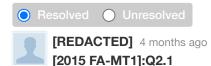
midterm_exam2

final_exam

~ An instructor (Jie Qiu) thinks this is a good note ~

Updated 1 month ago by Stephan Kaminsky

followup discussions for lingering questions and comments



Why is the order for the last three values c, &temp, and &b?

Consider the following C program:

```
int a = 5;
void foo(){
    int temp;
int main()
    int b = 0;
    char* s1 = "cs61c";
    char s2[] = "cs61c";
    char* c = malloc(sizeof(char) * 100);
    foo();
    return 0;
};
```

1) Sort the following values from least to greatest: &b, c, b, &temp, &a.

b < &a < c < &temp < &b



Jie Qiu 4 months ago c is a heap address. &temp and &b are stack addresses. b is initialized before temp on the stack therefore has a larger address.

helpful! 0



Anonymous Beaker 4 months ago Isn't b the same as &b?

helpful! 0



Jie Qiu 4 months ago b is 0 while &b is a stack address

helpful! 1





[REDACTED] 1 month ago [2015 SP-F]:M1-3

In the RISC-V solutions of this question, they used addiu instead of addi in order to increment the stack pointer, but I remember for everything else we have done in this class, we have always used addi and never addiu. I was wondering why that is the case that addiu is typically never used for us, and perhaps why it was used in this question.

As well, when I searched on stack overflow about addi vs addiu, there was a response that said addi should never be used in practise, and it should always be addu or addiu. Can someone please explain what is going on here and why?

helpful! 0

Daniel Fan 1 month ago I think addiu is MIPS while addi is RISC-V. So just use addi for everything in this semester.

helpful! 0