

CSCI 1312 (Introduction to Programming for Engineering), Fall 2018

Quiz 2 Solution

1. (5 points) What will be printed by the following C program?

```
#include <stdio.h>

int foobar(int n, int m) {
    printf("calling foobar with %d, %d\n", n, m);
    return 2*(n+m);
}

int main(void) {
    printf("result is %d\n", foobar(1, 1));
    printf("result is %d\n", foobar(10, 20));
    return 0;
}
```

Solution: The following will be printed.

```
calling foobar with 1, 1
result is 4
calling foobar with 10, 20
result is 60
```

2. (5 points) Write a complete C program that prompts the user for an integer and then prints one of the following, as appropriate:

- “not an integer”
- “even”
- “odd”

(*Hint:* An easy way to distinguish even integers from odd ones is to compute the remainder when the number is divided by 2 — a remainder of 0 means the number is even.)

Solution: Here is one solution.

```
#include <stdio.h>
int main(void) {
    int n;
    printf("enter an integer:\n");
    if (scanf("%d", &n) != 1) {
        printf("not an integer\n");
    } else if ((n % 2) == 0) {
        printf("even\n");
    } else {
        printf("odd\n");
    }
    return 0;
}
```