Selection Statements
Lecture 3 Assignments

1. The following if statement is unnecessarily complicated. Simplify it as much as possible.
(*Hint:* The entire statement can be replaced by a single assignment.)

```c
#include <stdio.h>

int main(){

    int age;

    if(age >= 13 && age <= 19){
        teenager = true;
    }
    else{
        teenager = false;
    }
}
```

2. Write a C program that does the following:
Enter a two-digit number: 25
Number entered in words: twenty-five

```c
#include <stdio.h>

int main(void)
{
    int first_digit, second_digit;

    printf("Enter two digits: ");
    scanf("%1d%1d",&first_digit,&second_digit);

    if (first_digit == 1) {
        switch(second_digit % 10) {
            case 0: printf("Ten"); break;
            case 1: printf("Eleven"); break;
            case 2: printf("Twelve"); break;
            case 3: printf("Thirteen"); break;
            case 4: printf("Fourteen"); break;
            case 5: printf("Fifteen"); break;
            case 6: printf("Sixteen"); break;
            case 7: printf("Seventeen"); break;
            case 8: printf("Eighteen"); break;
            case 9: printf("Nineteen"); break;
        }
        return 0;
    }
    switch(first_digit % 10) {
        case 1: printf("Ten"); break;
        case 2: printf("Twenty"); break;
        case 3: printf("Thirty"); break;
        case 4: printf("Forty"); break;
        case 5: printf("Fifty"); break;
        case 6: printf("Sixty"); break;
        case 7: printf("Seventy"); break;
        case 8: printf("Eighty"); break;
        case 9: printf("Ninety"); break;
    }
    switch(second_digit % 10) {
        case 0: break;
        case 1: printf("-one"); break;
        case 2: printf("-two"); break;
        case 3: printf("-three"); break;
        case 4: printf("-four"); break;
        case 5: printf("-five"); break;
        case 6: printf("-six"); break;
        case 7: printf("-seven"); break;
        case 8: printf("-eight"); break;
        case 9: printf("-nine"); break;
    }
    return 0;
}
```

```
Enter two digits: 21
Twenty-one
Process returned 0 (0x0)   execution time : 1.787 s
Press any key to continue.
```