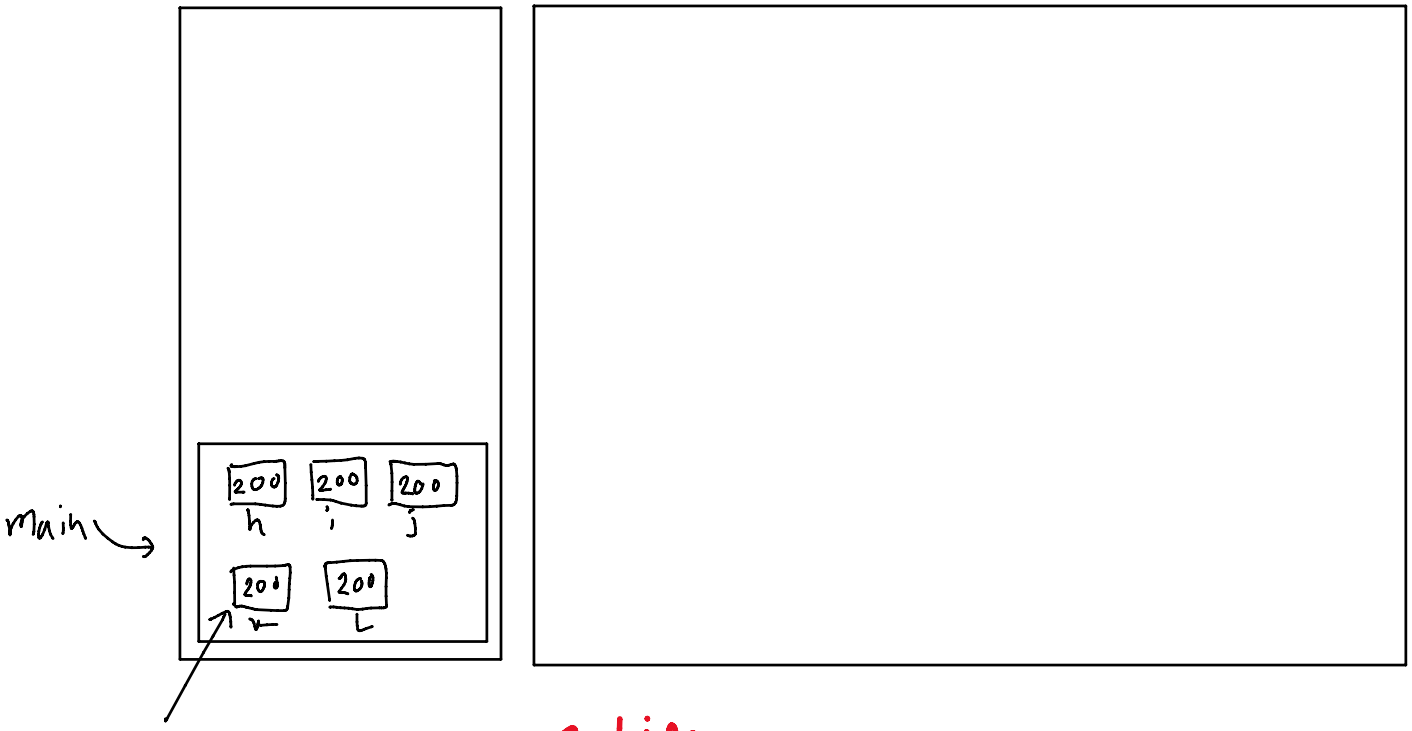
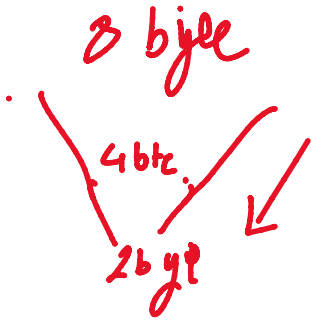
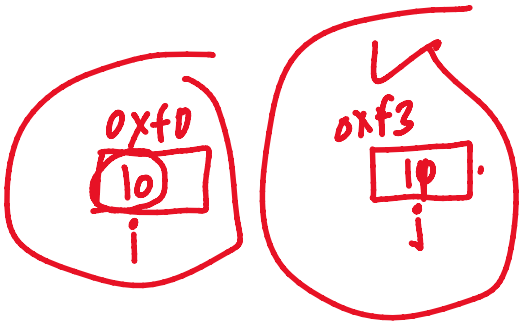
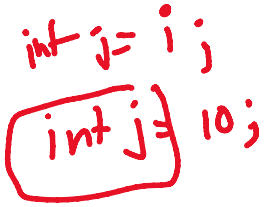
Day 5

01 March 2022 22:48









1. Write a program in C++ to find Size of fundamental data types.

Sample Output:

```
Find Size of fundamental data types :
----------------------------------------
The sizeof(char) is : 1 bytes
The sizeof(short) is : 2 bytes
The sizeof(int) is : 4 bytes
The sizeof(long) is : 8 bytes
The sizeof(long long) is : 8 bytes
The sizeof(float) is : 4 bytes
The sizeof(double) is : 8 bytes
The sizeof(long double) is : 16 bytes
The sizeof(bool) is : 1 bytes
```

2. Write a program in C++ to check the upper and lower limits of integer.

Expected Output:

```
Check the upper and lower limits of integer :
-------------------------------------------------
The maximum limit of int data type : 2147483647
The minimum limit of int data type : -2147483648
The maximum limit of unsigned int data type : 4294967295
The maximum limit of long long data type : 9223372036854775807
The minimum limit of long long data type : -9223372036854775808
The maximum limit of unsigned long long data type : 18446744073709551615
The Bits contain in char data type : 8
The maximum limit of char data type : 127
The minimum limit of char data type : -128
The maximum limit of signed char data type : 127
The minimum limit of signed char data type : -128
The maximum limit of unsigned char data type : 255
The minimum limit of short data type : -32768
The maximum limit of short data type : 32767
The maximum limit of unsigned short data type : 65535
```

3. Write a program in C++ to check whether the primitive values crossing the limits or not.
4. Write a program which takes input of hex colour code with RGBA (Red, Green, Blue, Alpha) and print the value in following decimal format. Hint (use float for Alpha)

```
Input -> 43ff64d9
Output
    Red     : 67
    Green   : 255
    Blue    : 100
    Alpha   : 0.85
```