

LAB - 8

1. Firstly, I converted the given hex code to 32-bit binary code and stored it as a vector.
2. Using `.end()`, extracted the opcode from 32-bit binary code and stored it as a vector.
3. Compared this opcode with opcodes of different formats like R, I, S, B, J, U.
4. Written 8 different functions for each format (in I format 3 cases) and extracted all like `rd`, `rs1`, `rs2`, `offset` `imm`.
5. In each function, cases for each instruction like `add`, `or`, `xor`, `and`, `sub` in R-format.
6. And stored each instruction as a string and converted binary to decimal for finding registers.
7. Using `.push_back()`, inserted all strings to the output vector.