

HW5: Threads Sharing a Global Int! (Due March 15, 9.30am)

Due Mar 15 by 9:30am **Points** 20 **Submitting** a file upload

Write a program that creates 10 pthreads and waits for them to be over. Make each pthread increment a global int (with initial value 0) 10 times in a loop (i.e. a "for" loop executing 10 times with the global int incremented by 1 in each iteration of the loop). **Make sure that each pthread starts incrementing the global int only after all pthreads have been created** (How?). After each increment operation, each pthread must print a message containing its id and the new value of the global int. Once all pthreads have terminated, the main() must print the final value of the global int. One would expect the final value of the global int to be 100. Run the program a few times and explain your observations in a comment inside the code.

PS: use "gcc -pthread" to compile your code.