```c
1   /*
2     Esempio Hello World con aggiunta variabili shared
3     Compila con gcc -fopenmp omp_shared.c -o omp_shared
4   */
5
6   #include <omp.h>
7   #include <stdio.h>
8   #include <stdlib.h>
9
10  int main (int argc, char *argv[]) {
11
12    int nthreads, tid;
13    int x=0;    /* Initialize x to zero */
14
15    /* Fork a team of threads with private copies of the variables nthreads and tid */
16  #pragma omp parallel shared(x) private(nthreads, tid)
17    {
18      /* Get thread number */
19      tid = omp_get_thread_num();
20      printf("Hello World from thread = %d\n", tid);
21
22      /* Only master thread does this */
23      if (tid == 0) {  /* Thread zero sets x to 5 */
24        x=5;
25        nthreads = omp_get_num_threads();
26        printf("Number of threads = %d\n", nthreads);
27      }
28    }
29  #pragma omp parallel shared(x) private(tid)
30    {
31      tid = omp_get_thread_num();
32      printf("In thread %d x is %d\n", tid, x);
33    }
34    /* All threads join master thread */
35    exit(0);
36  }
37
38
```