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National
Supercomputing
Mission



Centre for
Development of
Advanced Computing

Distributed for the course “HPC Shiksha: Basics of High Performance Computing”
Course Website: <https://www.iitgoa.ac.in/hpcshiksha/>

1. Installation Steps on Linux Systems

- 1.1 Install gcc compiler: `sudo apt-get install build-essentials`
- 1.2 Install OpenMP library: `sudo apt-get install libomp-dev`

2. Installation Steps on Windows Systems – Windows not recommended

2.1 Installation Steps on Linux on Windows Systems

1. Virtualization software:

Virtualization software: Any free software such as VMware ([url](#))
 Install linux in the virtual machine ([url](#))
 Run commands in section 1.1 and 1.2

3. Installation Steps on Mac Systems: `brew install llvm`

```

/* Sample Program */
//Note: if done copy paste to text file, “ “ need to retyped.
#include<omp.h>
#include<stdio.h>
int main(){
    #pragma omp parallel for num_threads(5)
    for(int i=0;i<10;i++){
        printf("Hello World i=%d thread-id=%d\n", i, omp_get_thread_num());
    }
    return 0;
}

```