Problem One Screenshots

```
D:\this semester\Database\MPI\Debug>mpiexec -n 6 MPI.exe
Hello from master process.
Please enter number of slave processes...
5
Number of slave processes is 5
Please enter size of array...
10
Please enter array elements ...
-3 4 2 10 5 8 9 7 -2 -5
Hello from slave#1 Max number in my partition is 4 and index is 1.
Hello from slave#2 Max number in my partition is 10 and index is 1.
Hello from slave#3 Max number in my partition is 8 and index is 1.
Hello from slave#4 Max number in my partition is 9 and index is 0.
Hello from slave#5 Max number in my partition is -2 and index is 0.
Master process announce the final max which is 10 and its index is 3.
Thanks for using our program

D:\this semester\Database\MPI\Debug>
```

Problem Two Screenshots

```
"F:\Ahmed\FCAI - CU\Third Year (CS)\Second Term\High Performance Computing\Assignments\Assignment 1\Problems\cmake-build-debug\Problems.exe"
Choose input mode: C or c for console, F or f for file.
c
Choose encryption mode: E or e for encryption, D or d for decryption.
e
Enter the size of your text:tutorial
 Enter your text: Result: wxwruldo

Process finished with exit code 0
```

```
"F:\Ahmed\FCAI - CU\Third Year (CS)\Second Term\High Performance Computing\Assignments\Assignment 1\Problems\cmake-build-debug\Problems.exe"
Choose input mode: C or c for console, F or f for file.
c
Choose encryption mode: E or e for encryption, D or d for decryption.
d
Enter the size of your text:wxwruldo
 Enter your text: Result: tutorial

Process finished with exit code 0
```

```
"F:\Ahmed\FCAI - CU\Third Year (CS)\Second Term\High Performance Computing\Assignments\Assignment 1\Problems\cmake-build-debug\Problems.exe"
Choose input mode: C or c for console, F or f for file.
f
Choose encryption mode: E or e for encryption, D or d for decryption.
e
Result: wxwruldo

Process finished with exit code 0
```

```
"F:\Ahmed\FCAI - CU\Third Year (CS)\Second Term\High Performance Computing\Assignments\Assignment 1\Problems\cmake-build-debug\Problems.exe"
Choose input mode: C or c for console, F or f for file.
f
Choose encryption mode: E or e for encryption, D or d for decryption.
d
Result: tutorial

Process finished with exit code 0
```