

CHAPTER III

RESEARCH METHODOLOGY

3.1 Research Methodology

In this research, there are five steps :

1. Finding References

The first step is about collecting references that associated with parallel computing. That references can be obtained from articles, books, and a research that have been done by someone.

2. Analyzing and Learning

The second step is to analyze and learn about how parallel algorithm works. Each algorithm has different calculation, which makes the parallel algorithm may be different from sequential algorithm. Therefore, analyzing and learning how to apply the sequential algorithm into parallel approach are needed.

3. Preparing and Build The Parallel Workstation Environment

The third step is to do preparation to build parallel workstation by preparing computer hardware, operating system, network installation, and software configuration.

4. Implementation and Testing

The fourth step in this project are doing the implementation and testing of parallel computing. To implement the parallel computing, a program that designed for parallel algorithm should be created. The program created depends on the size of main job and the number of processes generated.

After all, the parallel workstation is ready to be tested. Then do some testing by using several variations of circumstances.

5. Getting the Conclusion and make the report

After doing the implementation and testing, the results of this project can be obtained. Then this results can be analyzed to determine the conclusion and make the report of this project.

