## **Introduction to Flowcharts**

The expression of algorithm vary as different expression has different language. One of the things that would represent an algorithm is a Flowchart which is a diagram that shows the instructions, and the language it used. Basically, this flowchart sums up the input, process and the output of a given problem. Input is something that definitely ask, "What it is and Why it is needed?" because there's so much ways and processes that might be go through to the problem that you're solving. If it happened that you've gone to different process than to what it should be, it would be hassle and will eat a lot of time and would waste your effort. As this input predicts what would be your output, you first must be sure that that input has its purpose and has its use. Process? I would say this is the most critical one, because you have considered everything. First, the problem should already had defined. Second, you have to plan for a solution because solution is something that would not come up in just a snap of your fingers, otherwise your program will suffer as well as the user. Plan for it! Search and be productive for as much as sources that you have, as this is the act of manipulating, altering or viewing the data. In some cases, process might have a set of predetermined rules that must be followed and you're lucky enough if that would be the scenario. But if not, boost as much effort that you can and have such patience to try and try until you've finished and come up to what we call the output. Output is something you definitely work hard on it. After you've been through such process including the testing part and the documenting part, finally! You've reached the end, fixed the blemishes and errors your program had. It is the product which pays all your hardships, efforts and patience.

I learned that flowchart is one a tool for a programmer wherein they use it to design a solution to a problem. Although this might be the basic one, this still have some disadvantages. First, you should be able to familiarize the shapes and symbols used in flowcharting. Second, it can be complex when the logic of a program is quite complicated, and programmers might have a difficult time understanding the logic and process of the flowchart. Third, drawing flowchart is a time-consuming task because it is difficult to alter and sometimes, the designer needs to redraw the complete flowchart to change the logic of it or to alter portions of it. But with those disadvantages comes the advantages. First, the flowchart is an excellent way of communicating the logic of a program. Second, it is easy and efficient to analyze problem because during program development cycle, it plays the role of a guide and after successful development of a program, it needs continues timely maintenance during the course of its operation. This says that flowchart development and system maintenance easier. Last, it is easy to convert the flowchart into any programming language code as it does not use any specific programming language concept.

This concludes that flowcharting is not just applicable for programming. As long as you have your input, process and output you would be able to convert it to flowcharts.