



Research Methodology

2014-15

Dr. Abhinanda Sarkar

To begin with, think of projects in terms of four broad steps:

1. Define – “What is the project about?”
2. Measure – “What information do I need?”
3. Analyze – “How do I analyse the information?”
4. Communicate – “How do I share my findings?”

In each of these steps, there are specific tasks that are typically done.

Define:

Before executing on a project, understand the expectations and capabilities of the parties involved. If you do not do this, there is the danger of setting unreasonable expectations or assuming capabilities that do not exist. Ask and answer the following:

- A. What does the client or the customer expect from the project?
- B. What are you and the team capable of delivering to the customer or the client?

Measure:

Once you know what the project is about, a systematic effort at gathering data and information is needed. This is dictated by the requirements of the project as well as by the practical realities of what is possible and available. There are two main kinds of data and information:

- A. Secondary data and information from currently available sources.
- B. Primary data and information from new surveys and experiments to be carried out.

Analyze:

The analysis of the data and information collected can be varied and depends on the topic being studied. The critical aspect is to be rigorous and logical. In business, there are many analytical styles. Two common ones are:

- A. Qualitative analysis based on business reasoning.
- B. Quantitative analysis using graphical and statistical techniques.

Communicate:

The outcome of a project has to be presented in some format to the customer or client as well as to other interested parties (such as your instructors). Twenty-first century communication can and does make effective use of multimedia, going beyond basic text normally used for:

- A. Written communication via a report.
- B. Verbal communication via a presentation.

Of course, each project is different. We will discuss several, including yours, in weeks to come.