

### What is the project?

A project is a unique, transient endeavor, undertaken to achieve planned objectives, which could be defined in terms of outputs, outcomes or benefits. A project is usually deemed to be a success if it achieves the objectives according to their acceptance criteria, within an agreed timescale and budget. Time, cost and quality are the building blocks of every project.



### What is the project management?

Project management is the application of processes, methods, skills, knowledge and experience to achieve specific project objectives according to the project acceptance criteria within agreed parameters.

A key factor that distinguishes project management from just 'management' is that it has this final deliverable and a finite timespan, unlike management which is an ongoing process.

At its most fundamental, project management is about people getting things done.

The core components of project management are:



Determine the goal of the project



Capturing
project
requirements



Securing corporate agreement and funding



Leading and motivating the project delivery team



monitoring progress against plan



managing the project budget



# The core components of project management are:

Maintaining communications with stakeholders and the project organization

Managing the risks, issues and changes on the project

Developing and implementing a management plan for the project





# Project planning

Project planning requires the development of a business structure, which will later become the basis of the project communication model. This model can be used later in the evaluation of the project by comparing it with regular measures of efficiency. Planning necessarily needs to align the project goals with the organization's strategy, and then set key performance indicators to track performance.



## **Project Efficiency Metrics**

The three measures of efficiency of any project are time, cost and quality, and often the overall goal of the project is to implement the project in the shortest time, lowest cost and highest quality. Realistically, these objectives conflict with each other, as in most cases the completion of the project in a shorter time requires greater investments and therefore higher cost, as well as in the case of requesting a high quality of implementation. So the manager has to find a suitable general solution by balancing the achievement of the three objectives.



### Balance between time and cost

For a specific quality of a particular activity, the manager makes use of materials, equipment and workers necessary to achieve the objective of the activity within the least cost limits. Considering that each activity must be implemented at the lowest cost, the entire project will be implemented at the lowest total cost. But in order to shorten the time required for a business, the cost of the business often increases. This may be achieved by increasing the number of workers, requiring additional working hours from existing workers or purchasing more efficient machinery and equipment. But for every work, there is a shorter time that cannot be exceeded, no matter how high the cost. This is called "collision time".



### Work Breakdown Structure

The WBS for a project is the scheduling of all the individual activities that make up the project, the periods of these activities and their prior and subsequent relationships. The activities should be the least expensive and least prone to problems and contingencies to be used in the project. Therefore, if the schedule resulting from the initial work breakdown structure is feasible, it will be the most optimal work schedule. In the event that the schedule is not feasible due to the circumstances of the time or available resources, the manager is forced to modify the schedule to reach feasibility at the lowest possible cost.

