

Project Management

Introduction

Based on

Project Management, 2nd edition (Briefcase Book Series) by
Gary R Heerkens (2013) McGraw-Hill

A Guide to the Project Management Body of Knowledge
(PMBOK[®] Guide), 3rd Edition (2004) Project Management
Institute

A project is...

“A **temporary** endeavour undertaken to create a **unique** product, service, or result,” ...PMBOK (p5)

The person **ultimately responsible** for the success or failure of a project

The project manager

Accidental project manager

- A person who is placed into the role of project manager by organizational circumstance, rather than by design or voluntary choice of career path.

Deconstructing the definition of a project...

Temporary

- a definite beginning and a definite end.
- end is reached when the project's objectives have been achieved
- *Projects are not ongoing efforts – Business-as-usual (BAU) or Operational work (PMBOK p6-7)*

Unique

- is produced, is quantifiable, an end item or a component
- business functions supporting production or distribution
- outcomes or documents.

Progressive elaboration = developing in steps, and continuing by increments (PMBOK p6)

Projects are a means of organizing activities that cannot be addressed within the organization's normal operational limits... and are **often utilized as a means of achieving an organization's strategic plan** (PMBOK p7)

What Is *Project Management*?

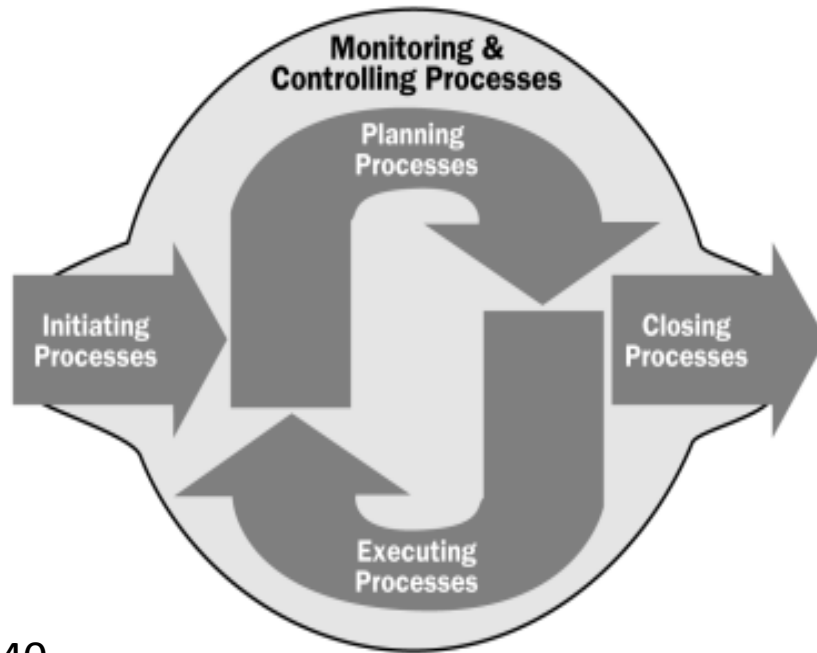
“the application of knowledge, skills, tools and techniques to project activities to meet project requirements” (PMBOK p8)

- requires a significant amount of education and on-the-job organization
- The PM process requires the creation of the **project team** (a small organizational structure),
 - a microcosm of the larger organization.
 - the team is decommissioned at the end of the project

The Project **Implementation** Life Cycle

Project implementation is carried out in four stages:

1. **Initiation/Definition** - the project is defined and launched;
2. **Planning** - solution is detailed and the work required to carry it out is identified and scheduled
3. **Execution** - the work is done and monitored;
4. **Closeout** - the project is brought to successful closure.



PMBOK p40

Figure 3-2. Project Management Process Groups Mapped to the Plan-Do-Check-Act Cycle

PMBOK FRAMEWORK

The PMBOK describes **project management** under the following nine knowledge area s:

Project managers often talk of a “triple constraint”—project scope, time and cost—in managing competing project requirements. Project quality is affected by balancing these three factors

Project Scope Management

- includes defining and controlling only **the work required to deliver** the project to meet stakeholder goals and objectives

PM Triangle
– points of negotiation

Project Time Management

- includes activity definition and sequencing, duration estimating, establishing the calendar, schedule development **and time control**

Project Cost Management

- includes the process that ensures the project is completed within the budget
- consists of **resource planning**, cost estimating, cost budgeting, cash flow and **cost control**

The 4 Core Elements which determine the project deliverables:

Project Quality Management

- ensure the project satisfies the needs for which it was undertaken
- includes critical success factors, quality planning, control and assurance

PMBOK FRAMEWORK

*Read the rest of chapter 3 –
Communication Skills*

Project Communications Management

- includes proper collection and dissemination of project information
- consists of communication planning, information distribution, project meetings, progress reporting and administrative closure

Project Integration

- integrates the 3 main PM processes of planning, execution and control

Project Human Resource Management

- process to make the most effective use of the people involved in the project
- consists of organisation planning, staff acquisition and team development
- change management

**Other 5 knowledge areas
that provide
a means of delivering the
objectives:**

Project Risk Management

- process of identifying, analysing – risk quantification and impact, and response development and control of project risk

Project Procurement Management

- process of acquiring goods and services from external parties
- consists of procurement planning, vendor selection and management, contract administration and closure

*Chapter 8
Heerkens*

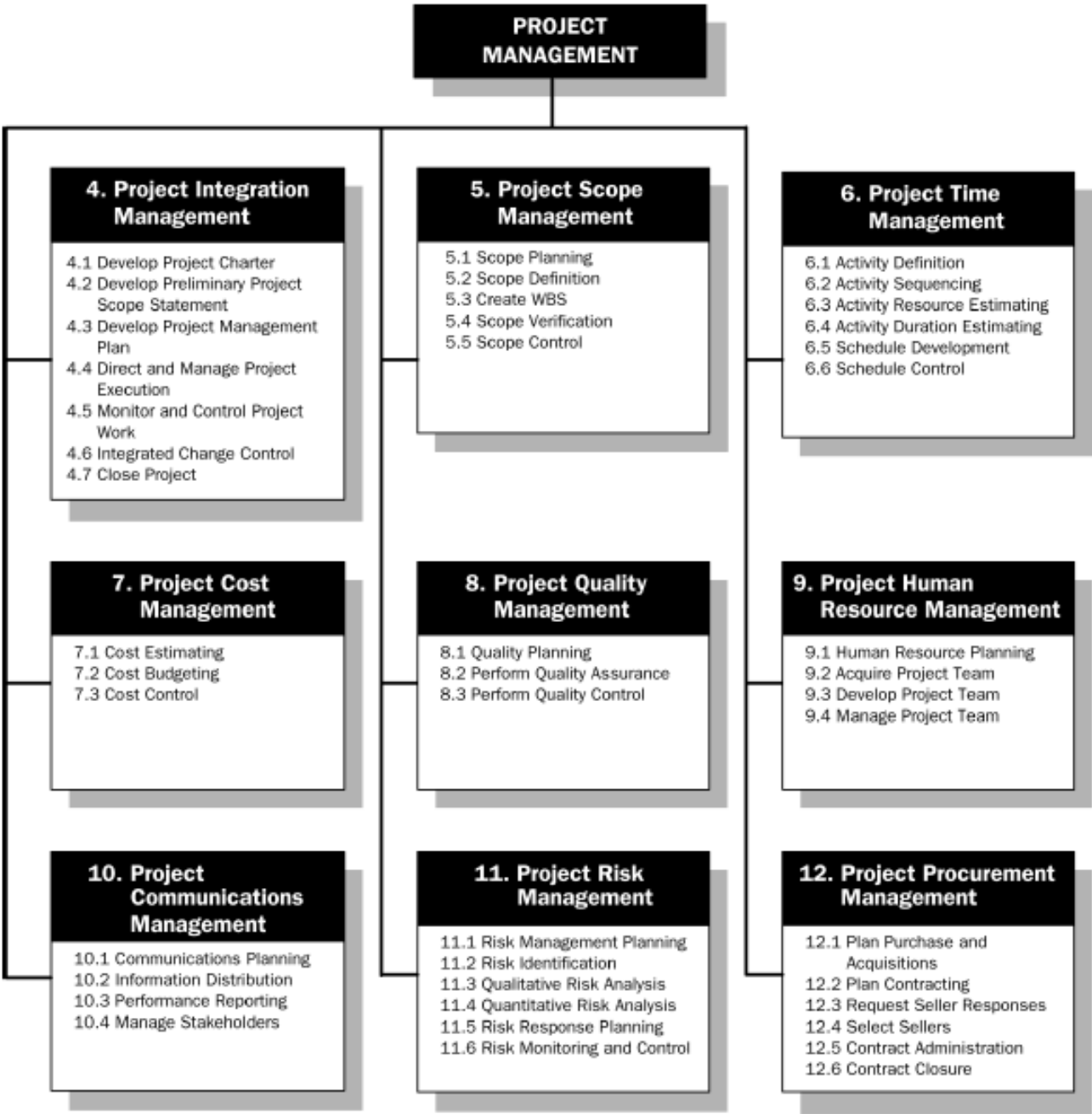


Figure 1-1. Overview of Project Management Knowledge Areas and Project Management Processes

PROJECT MANAGEMENT: ART AND SCIENCE

- **leading** the people on the project
- requires a keen insight into **human behaviour** and
- the ability to skilfully apply appropriate **interpersonal skills**

- the knowledge, understanding, and skilful application of a prescribed **project management process** (PMBOK).
- to guide project managers and project teams to effectively
- a set of **graphic tools, documents, and techniques**

<https://www.youtube.com/watch?v=5Hi3t2bMN7A>

Role of the project manager - *responsibilities*

The project

- meet the cost, schedule, functionality (scope), and quality targets
- run the project efficiently
- act as an arbiter of the differing objectives within and across the team

The organization

- an “agent” of your organization and its management
- adhere to the policies of the organization, act within the limits of your authority, and generally make decisions that are in the best interests of the organization
- Proactively manage information flow
 - communication management

Your team

- ensuring that the team is properly informed throughout the project, providing constructive feedback when warranted, and giving positive, fair, and appropriate recognition for performance

Yourself

- the responsibility for your personal growth and development

Role of the project manager – *skills*

<https://www.youtube.com/watch?v=aNVYJyZWRXQ>

“HARD” SKILLS

Project management process skills

- Knowledgeable about project management tools, techniques and be able to apply them – “hard skills”

Technology management skills

- proficiency in project’s core (primary) technology & supporting technology areas
- Industry, product, process & patent knowledge
- ability to prepare comprehensive technical specifications & design skills
- management of intellectual property

“SOFT” SKILLS

Interpersonal and behavioural skills – “the Art”

- Relationship-building, Conflict resolution, Negotiation, Influencing, Delegating, Coaching and mentoring

Desired personal traits

Honesty and integrity

Thinks like a generalist

High tolerance for ambiguity

High tolerance for uncertainty

Persuasive

Assertive

Process-oriented

Self-aware/reflective

Open and accessible

Politically astute

Decisive

The Interpersonal and Behavioural Perspective

Competency of project leadership

– “soft skills”

- crucial to a project's success
- interpersonal and behavioural problems often root causes for project failure.
- the art of project management is about dealing with people and about getting work done through other people

– Human Relations

- Project success depends on the cooperation of many people
- not granted the formal authority to direct others => rely on influence and persuasion to gain cooperation

– Creating a motivational Environment

- Refer to pp34-35 for some useful tips

– Managing Diverse Objectives & Perspectives

Being a project manager will test you in ways you cannot imagine...



- an organizational focal point.
- everyone will look to you for the answers

BUT

- be careful not to try to provide all the answers....



that's why you have a team...your team

- **rely on others** to get things done
- **delegation** may prove to be a challenge for you
- **empowering** others, then **trusting** them to follow through, may be unsettling
- **uncomfortable** with the idea that others are doing things for which you will be held responsible

THE PROS AND CONS OF BECOMING A PROJECT MANAGER

Pros

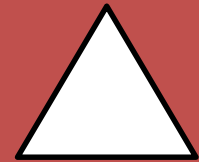
1. It can often be *a stepping-stone to a promotion.*
2. It provides *a strong sense of accomplishment.*
3. There's *considerable variety*; no two days are alike.
4. There's *significant freedom of choice.*
5. It affords the opportunity to *effect change across the organization.*

Cons

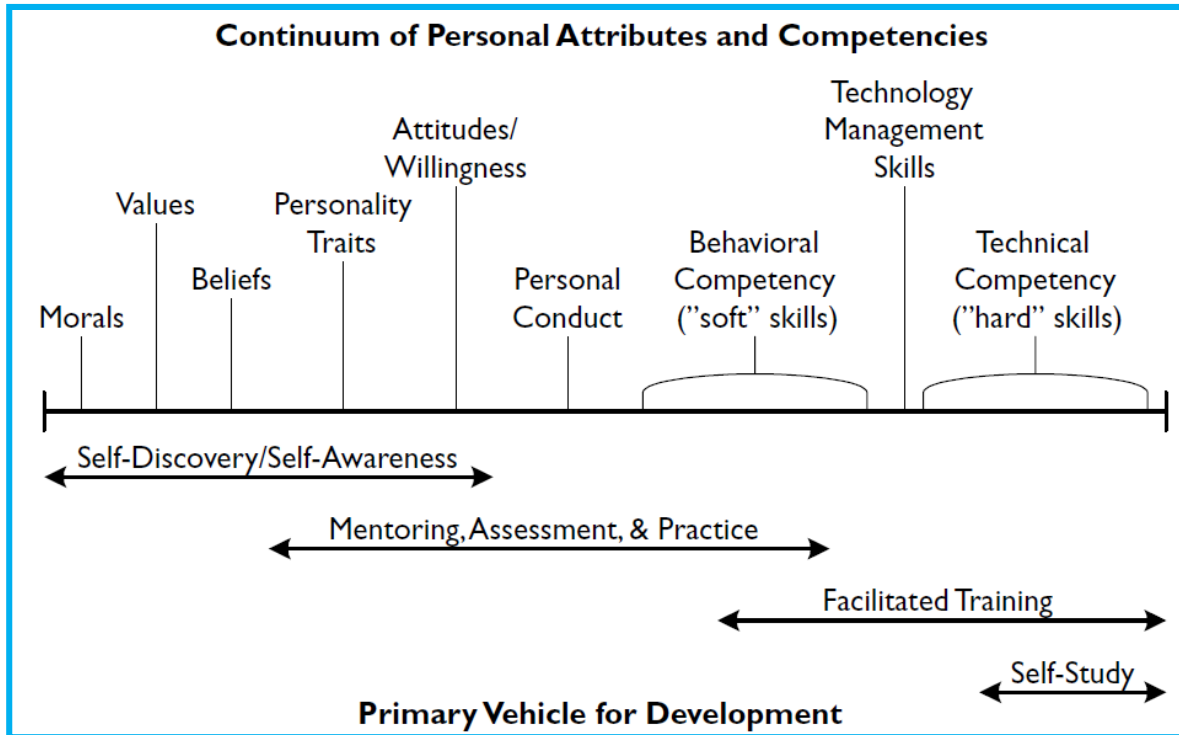
1. It requires significant *tolerance for politics.*
2. It requires significant *tolerance for ambiguity and uncertainty.*
3. There's a ***lot of responsibility, but little or no authority.***
4. You may feel *disconnected from your technical discipline.*
5. You may be perceived by some as not having "a real job."

Role of the project manager – *challenges*

- The Responsibility vs. Authority Trap
- Imposition of Unrealistic Targets
- Emphasis on Departments Versus Projects
- Dual Responsibility Trap
- Conflict of Certainty and Uncertainty
 - express project estimates (such as the final project cost and completion date) as a “*ranged estimate*” of possible outcomes, rather than a so-called “point estimate.”



Role of the project manager – *competencies*



Functional Competencies of the Project Manager -
refers to your ability to combine knowledge with skills and to apply them appropriately

PP 54-56

UNOFFICIAL JOB – babysitter, salesperson, teacher, friend etc.....