APO Manual
PUBLIC-SECTOR PRODUCTIVITY

COLLABORATION

LEADERSHIP

PERFORMANCE MANAGEMENT

CHANGE MANAGEMENT

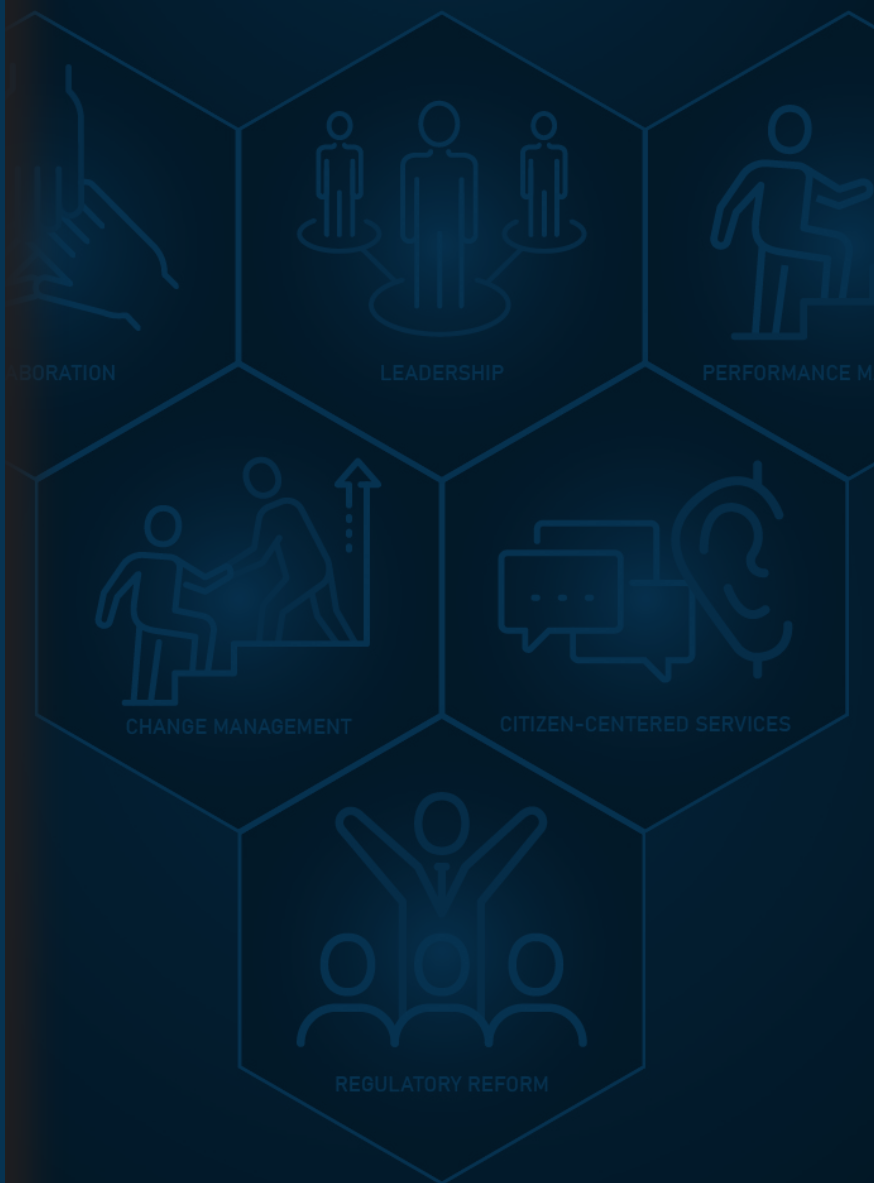CITIZEN-CENTERED SERVICES

REGULATORY REFORM

APO

The Asian Productivity Organization (APO) is an intergovernmental organization committed to improving productivity in the Asia-Pacific region. Established in 1961, the APO contributes to the sustainable socioeconomic development of the region through policy advisory services, acting as a think tank, and undertaking smart initiatives in the industry, agriculture, service, and public sectors. The APO is shaping the future of the region by assisting member economies in formulating national strategies for enhanced productivity and through a range of institutional capacity-building efforts, including research and centers of excellence in member countries.

APO members
Bangladesh, Cambodia, Republic of China, Fiji, Hong Kong, India, Indonesia, Islamic Republic of Iran, Japan, Republic of Korea, Lao PDR, Malaysia, Mongolia, Nepal, Pakistan, Philippines, Singapore, Sri Lanka, Thailand, Turkey, and Vietnam.

APO MANUAL: PUBLIC-SECTOR PRODUCTIVITY

CONTENTS

CONTENTS

FOREWORD

The Asian Productivity Organization (APO) has been focusing on enhancing the productivity of public-sector organizations in member countries. The primary goal is to lay the crucial foundations that will allow the public sector to achieve national socioeconomic goals. In future government, improving public-sector productivity will involve two distinct paths: first, improving policy, program, service, and regulatory outcomes; and second, improving the policy and productivity environment for the private sector. A forward-looking approach should therefore be taken to sustain the gains from productivity improvement over the long term.

This *APO Manual: Public-sector Productivity* was developed by an international panel of experts, professionals, and scholars. The emphasis is on disseminating practical know-how to make public-sector organizations more efficient. The manual serves as an important guide for national productivity organizations as well as the APO Center of Excellence on Public-sector Productivity in training productivity specialists and undertaking effective improvement plans for the sector. The contents are structured to accommodate the diverse needs and challenges of APO member countries and based on a case-study methodology.

The *APO Manual: Public-sector Productivity* is also designed to help member countries improve the five key elements of citizen satisfaction, public trust, cost-effectiveness, competitiveness, and citizens' quality of life. Eleven key modules support these five objectives, each of which outlines the knowledge, tools, strategies, and best practices that can be used to upgrade public-sector performance. The specific areas covered in the modules are: 1) leadership for productivity improvement; 2) e-government, citizen-centric services, and regulatory reform; 3) performance management; 4) productivity improvement planning; 5) change management; 6) collaboration for improved performance; 7) the productivity improvement toolbox; and 8) productivity improvement measurement.

The modules contain overviews of the most recent knowledge in the field, followed by summaries of international best practices. Case studies and class exercises are provided for training purposes, as well as a bibliography of important publications on the different fields of study referred to in the manual.

The APO believes that this manual can contribute to raising living standards in its member countries by improving the productivity of their public-sector organizations and hopes that it will find a wide audience within and beyond the Asia-Pacific region.

Dr. AKP Mochtan
Secretary-General

AN INTRODUCTION AND OVERVIEW

The Public-sector Productivity Improvement Imperative

International management expert Peter Drucker [4] has stated that the greatest global management challenge is to learn how to manage public-sector organizations to achieve high performance.

> *"What now has to be learned is to manage public service institutions for performance. This may well be the biggest and most important management task of the century."*
>
> – Peter Drucker

This manual is the Asian Productivity Organization's (APO's) contribution towards helping public managers achieve that goal.

Achieving a high-performing public sector serves two purposes:

a. It improves the efficiency, effectiveness, and quality of government policies and services for citizens and taxpayers, especially in countries where the public sector accounts for a large portion of national economic activity.

b. An efficient and effective public sector promotes a stronger private sector and better economic and social development outcomes for the country.

The APO Business Excellence Framework

The APO promotes the use of Business Excellence Framework (BEF) for both private- and public-sector organizations. Moreover, many APO countries use the framework as the foundation for their national excellence awards programs. The BEF is derived from the Malcolm Baldrige Quality Award Framework [8] in the USA. Figure 1.1 outlines the BEF's major components.

The APO advocates the use of business excellence models for organizations to assess their current level of performance and to identify priority areas for performance improvement. The BEF model can also be used to benchmark against other organizations. A guide to the use of Business Excellence Models and Awards for the Public Sector [1], including individual organizations and national excellence award programs, has been published by the APO, and is available online.

Developed by Robin Mann, the guide is designed to help public organizations use the Business Excellence Model to assess and improve the overall organizational performance in a systematic way. Assessment can be accomplished in two ways: a self-assessment by the organization itself, and an external assessment conducted by outside auditors who are trained in the use of the Business Excellence Model. In either case, the most important step comes after the organizational assessment, which is to identify areas for performance improvement and to implement a plan to achieve better organizational operations and results.

FIGURE 1.1

THE APO BUSINESS EXCELLENCE FRAMEWORK AND ITS KEY COMPONENTS.

Business Excellence
Achieving excellecne through successful integration and application of a range of improvement initiatives.

Leadership	Strategic planning	Customer focus		Workforce focus	Operations focus	Measurement, analysis, and knowledge management
Corporate social responsibility program	Enterprise risk management and business continuity management	Service and product innovation		Employee engagement survey	Supply chain management	Knowledge management
Corporate governance management	Balanced scorecard	Customer relationship management		Employee performance management	Lean and/or Six Sigma	Benchmarking
Leadership development program	Strategic alliances	Customer satisfaction survey		Suggestion scheme	Quality management systems	Business excellence self-assessment
Succession planning	Action plan (resources, financial, HR)	Service standards		Training and development	Improvement teams	Performance measurement
Management by walking about (MBWA)	SWOT analysis	Customer segmentation		Employee induction	Plan-do-check-action (PDCA) cycle	Information collection and analysis
Vision, mission and values	Strategy plan (objectives/ goals)	Market research		Recruitment and selection	Process mapping and documentation	Communication platforms for staff and non-staff

PROGRESSING

STARTING

This poster shows how a business excellence model serves as an overarching framework for managing and integrating multiple improvement initiatives.

*For further information, refer to APO's "Implementing Business Excellence: An Implementation Guidebook for SMEs" booklet or Centre for Excellence for Business Excellence website, www.apo.bpir.com.

In Europe, the Business Excellence Model has been adapted specifically for the public sector across all European Union countries. There, it is called the Common Assessment Framework (CAF), and is supported by European Institute of Public Administration [2, 9]. The CAF and the BEF models are very similar, although the CAF uses public-sector nomenclature (see Figure 1.2).

Research into High-performing Government Organizations

In the past thirty years, there has been an increasing academic interest in identifying the attributes of high-performing public organizations, beginning in 1991 with the book The Well Performing Government Organization by McDavid and Marson [7] in Canada. The study concluded that clear goals and a focus on managing people and meeting the needs of clients were among the important features of well-performing public-sector organizations.

Subsequently, the USA Government's General Accounting Office [5] conducted a similar study of high-performing public organizations and the common attributes identified by it included the following:

FIGURE 1.2

THE COMMON ASSESSMENT FRAMEWORK.
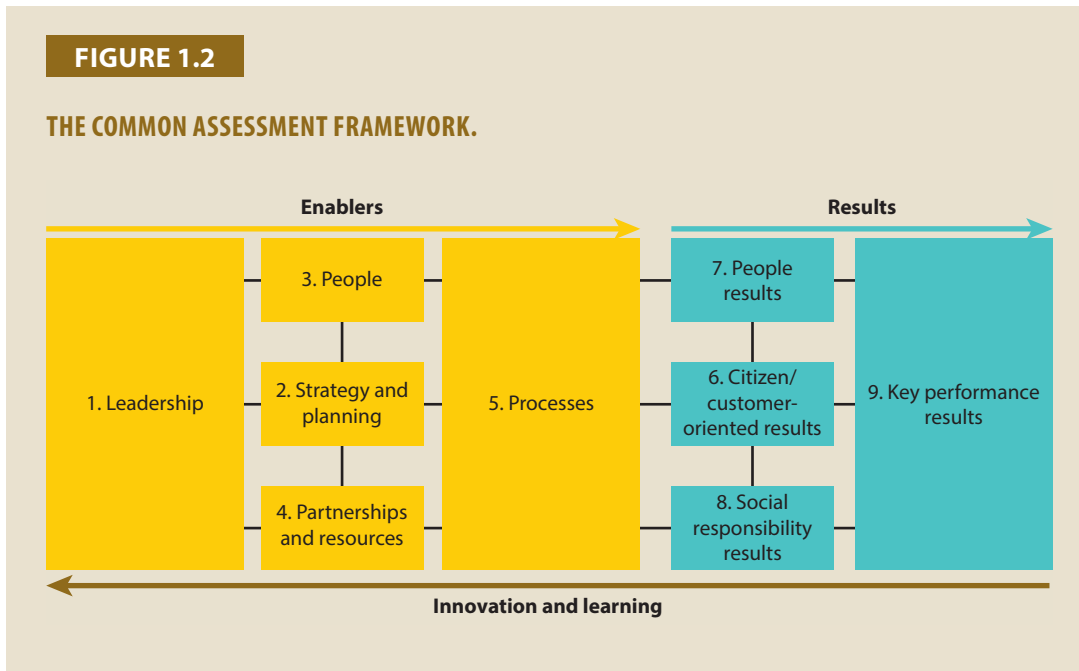
A clear, well-articulated, and compelling mission: High-performing organizations have a clear, well-articulated, and compelling mission; the strategic goals to achieve it; and a performance management system that aligns with these goals to show employees how their performance can contribute to overall organizational results.

Strategic use of partnerships: Since the federal government is increasingly reliant on partners to achieve its outcomes, becoming a high-performing organization requires that federal agencies effectively manage relationships with other organizations outside of their direct control.

Focus on needs of clients and customers: Serving the needs of clients and customers involves identifying their needs, striving to meet them, measuring performance, and publicly reporting on progress to help assure appropriate transparency and accountability.

Strategic management of people: Most high-performing organizations have strong, charismatic, visionary, and sustained leadership; the capability to identify what skills and competencies the employees and the organization need; and other key characteristics including effective recruiting, comprehensive training and development, retention of high-performing employees, and a streamlined hiring process.

Since then, several other studies have gone beyond identifying the attributes of high-performing organizations to study an important second question: how can public organizations achieve higher levels of performance? An important book by Robert Denhard [3] titled *Pursuit of Significance: Strategies for Managerial Success in Public Organizations* studied a number of public organizations that had improved their performances and identified five key strategies.

The book identified five principles for transforming hierarchical, rule-bound public bureaucracies into high-performance organizations. These are: a commitment to common purpose; a concern for high-quality public services; empowerment and shared leadership; a strategy of "pragmatic incrementalism," and a dedication to public service.

Likewise, *The New Public Organization* (see Figure 1.3) by Kernaghan, Marson, and Borins [6] identified a wide range of public organizations that had measurably improved their performance and documented the strategies used to achieve significant improvements in productivity. They called the high-performance model of public organizations, namely, The Post Bureaucratic Model. This manual covers many of the components of the Post Bureaucratic Model such as: results measurement, leadership, citizen-centricity, people management, collaboration, and change management.

FIGURE 1.3

THE NEW PUBLIC ORGANIZATION MODEL.

Bureaucratic	Post-bureaucratic
Organization-centered	Citizen-centered
Position power	Leadership
Rule-centered	People-centered
Independent action	Collaboration
Status-quo-oriented	Change-oriented
Process-oriented	Result-oriented
Centralization	Decentralized
Departmental form	Non-departmental form
Budget-driven	Revenue-driven
Monopolistic	Competitive

The APO Public-sector Productivity Improvement Framework

Building on its work in applying the Business Excellence Model to improve private-sector productivity throughout Asia, a few years ago, the APO launched an initiative to improve productivity performance in the public sector as well. Through a series of workshops involving international experts from APO countries, the APO created a productivity improvement framework for the public sector. Figure 1.4 outlines the APO framework for improving public-sector performance.

It identifies five themes, plus the methods to be used, and the key outcomes to be achieved: citizen satisfaction, public trust, cost-effectiveness, competitiveness, and the quality of life for the citizens. The five major themes are separately shown in Figure 1.5.

The Design of the Public-sector Productivity Improvement Manual

Based on the APO Public-sector Productivity Framework, the APO has developed this manual, which provides specific tools and guidance for improving the productivity of public-sector organizations and of the overall public sector. The twelve modules have been developed by a team of international experts from the Republic of Korea (ROK), Malaysia, the Philippines, Indonesia, Thailand, and Canada. The modules in the manual align with the APO Productivity Framework (see Figure 1.6) and show how to use an array of productivity tools and strategies to improve the organizational performance.

FIGURE 1.4

THE APO PUBLIC-SECTOR PRODUCTIVITY FRAMEWORK.

Internal environment
(Organizational structure and culture, personnel, and resources)

Thematic areas
- Service quality
- Innovation leadership
- E-government
- Regulatory reform
- Citizen-centered service

Targets
- Central government
- Local government
- Public service agencies
- Public enterprises

Methods
- Center of excellence
- Best practice manual
- Training
- Observational study mission
- Development of NPOs
- Seminar
- Workshop
- Research
- Study meeting
- Adoption of P&Q tools

Results
- Citizen satisfaction
- Public trust
- Cost-effectiveness
- Competitiveness
- Quality of life

External environment
(Economic, social, cultural, political, and demographic)

FIGURE 1.5

THEMES IDENTIFIED BY THE APO PUBLIC-SECTOR PRODUCTIVITY FRAMEWORK.
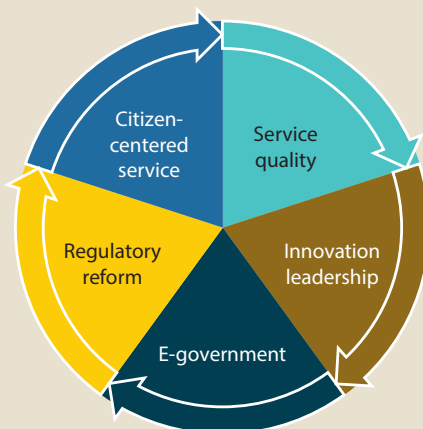
FIGURE 1.6

ALIGNING THE TRAINING MANUAL WITH THE APO PUBLIC-SECTOR PRODUCTIVITY FRAMEWORK.

The modules mirror the APO thematic areas and results areas in the framework, as well as the methods.

THE APO PUBLIC-SECTOR PRODUCTIVITY FRAMEWORK

Internal environment
(Organizational structure and culture, personnel, and resources)

Thematic areas
- Service quality
- Innovation leadership
- E-government
- Regulatory reform
- Citizen-centered service

Targets
- Central government
- Local government
- Public service agencies
- Public enterprises

Methods
- Center of excellence
- Best practice manual
- Training
- Observational study mission
- Development of NPOs
- Seminar
- Workshop
- Research
- Study meeting
- Adoption of P&Q tools

Results
- Citizen satisfaction
- Public trust
- Cost-effectiveness
- Competitiveness
- Quality of life

External environment
(Economic, social, cultural, political, and demographic)

The manual includes twelve modules, which can be used for training pertaining to specific public-sector productivity topics and tools or used as part of a complete curriculum to train and certify APO public-sector productivity specialists. Figure 1.7 outlines the curriculum framework as set out in the modules in the Public-sector Productivity Manual.

Each module contains practical information on how to improve organizational performance. Also, training material and reference material is provided in each module.

How to Use the *APO Manual: Public-sector Productivity*

As noted earlier, this manual is designed to provide reference material to train and certify individual public-sector productivity specialists, as well as to train public-sector productivity trainers.

FIGURE 1.7

CURRICULUM FRAMEWORK AS SET OUT IN THE MODULES IN THE PUBLIC-SECTOR PRODUCTIVITY MANUAL.

Productivity improvement planning and implementation

| Collaboration | Leadership | Change management |

| Performance management | Productivity measurement |

| Citizen-centered service | E-government | Regulatory reform |

The productivity tool box

Introduction to public-sector productivity and the APO Framework
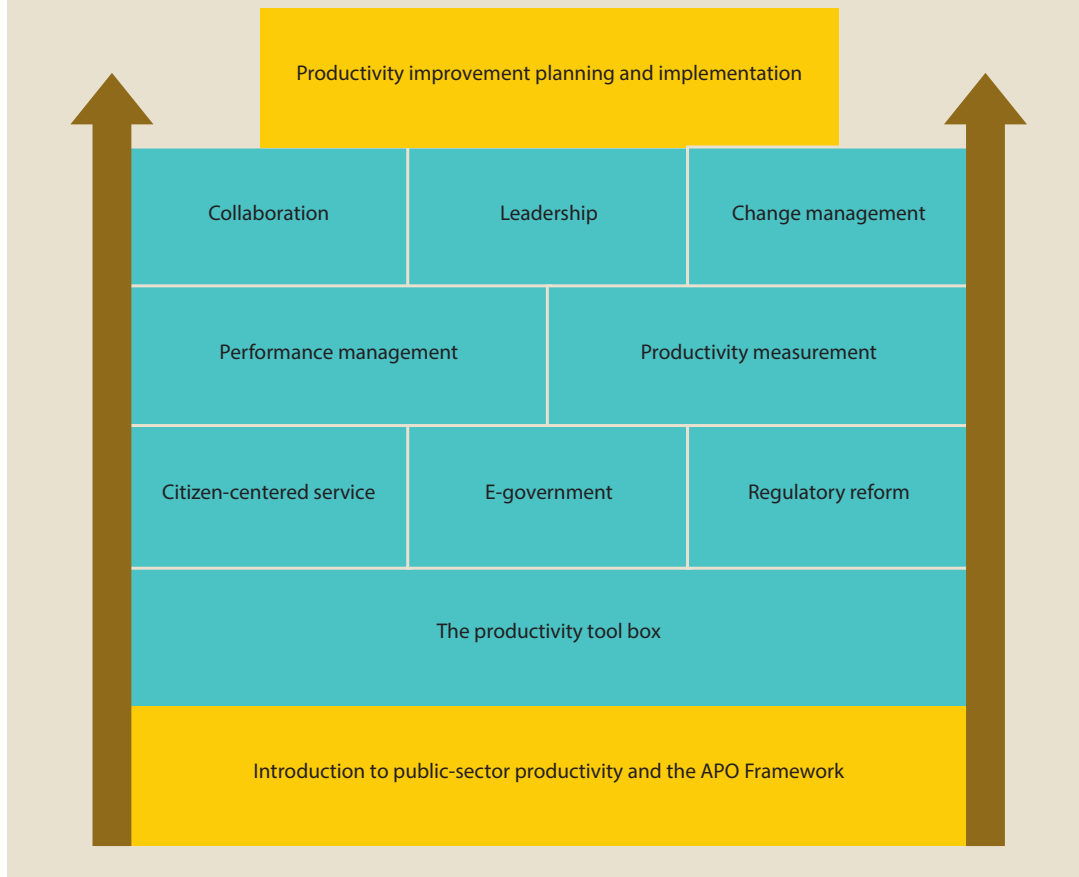
References

[1]   APO. Tokyo: Business Excellence Models and Awards for the Public Sector; 2016.

[2]   EIPA. CAF. Improving Public Organizations through Self-Assessment. Maastrict, Netherlands: European Institute of Public Administration and European Union Public Administration Network; 2013.

[3]   Denhardt R. Pursuit of Significance. Longrove: Waveland Press; 2000.

[4]   Drucker P.F. Management (Revised Edition). New York: HarperCollins; 2008.

[5]   High-Performing Organizations: Metrics, Means, and Mechanisms for Achieving High Performance in the 21st Century Public Management Environment. Washington DC: GAO; 2004.

[6]   Kernaghan K., Marson D.B., Borins S. The New Public Organization. Toronto: IPAC; 2000.

[7]   McDavid J., Marson D.B. The Well Performing Government Organization. Toronto: Institute of Public Administration of Canada; 1991.

[8]   US Department of Commerce. Baldrige Excellence Framework 2015-2016: A systems approach to improving your organization's performance. National Institute of Standards and Technology. Gaithersburg, MD: 2015.

[9]   European Institute of Public Administration. https://www.eipa.eu/portfolio/european-caf-resource-centre/.

THE NATURE OF THE PUBLIC SECTOR AND ITS ROLE IN IMPROVING PRODUCTIVITY

After studying this module, you should be able to

1. understand what is meant of international issues such as democracy, productivity, governance, public sector, and how these four are interrelated;

2. understand and analyze the evolution of old public administration into new public management and new public service;

3. categorize and analyze the differences between countries based on particular categorizations; and

4. analyze and critique the role of the public sector in improving public-sector productivity in relation to the modern models of good public-sector governance and management.

This module consists of two units:

Unit 1: Understanding the Nature of the Public Sector and the Evolution of Public Management

Unit 2: Understanding the Role of Public Sector in Promoting Productivity

Unit 1: Understanding the Nature of the Public Sector and the Evolution of Public Management

Public administration has been evolving for years, from the state of strong central government to the growth of devolved market approaches; from being state-centric to citizen-centric; and from having a national focus to having an international focus. The understanding of public administration practice has been shifting from the old bureaucratic paradigm to a newer global, high-performance perspective. One important change factor is the awareness of environmental influence beyond national boundaries, i.e., globalization. Globalization of the economy, politics, and many other forms of international relations describes worldly interconnectedness and interdependence of various sectors and actors. It has been recognized as the major phenomena of the beginning of the twentieth century, or maybe longer.

In today's world, there might be no country isolated from globalization. Each country is encouraged to embrace and engage with globalization in various ways. Global values are also part of how countries share many things in common. Stronger democratic values, for instance, are seen as a twenty-first century necessity as much as economic development by international organizations. Competition among countries has become a day-to-day global picture. In such a situation, the level of productivity of a country makes a difference to the welfare of the country and its citizens. Some countries are incorporating their own characteristics into global requirements. Thus, they may succeed in developing their economy as well as protecting their domestic market. On the other hand, some others may lose if they fail to design appropriate policies to adjust to global economic

forces such as more open international trade. For them, globalization may be very costly and may increase the poverty level as well as other problems.

Maintaining as well as increasing productivity is therefore a must when a country wants to survive globalization.

This section is aimed at providing an understanding of how a country could cope with globalization challenges by improving productivity, and, in particular, how the public sector can play its significant role in such an effort.

Conceptual Definitions

This section explains a number of concepts related to public sector and productivity. This includes wider concepts of democracy, productivity, governance, and public sector.

Democracy: There are numerous ways to define a country's democratic level, from its values of transparency and accountability to public participation and other democracy indicators developed by scholars. The Democracy Index developed by The Economist, for instance, is based on five categories: electoral process and pluralism; civil liberties; the functioning of government; political participation; and political culture. Any country that meets the high standards of these five categories will be grouped as a democratic country, or otherwise. From these categories, the index divides regimes into four types: full democracies, flawed democracies, hybrid regimes, and authoritarian regimes. Yet, for the purpose of this manual, this module simplifies the grouping technique by dividing countries into democratic and non-democratic countries only.

Productivity: Productivity is commonly defined as a ratio between the output volume and the volume of inputs. Some scholars tend to employ gross domestic product, economic growth, and performance as indicators of productivity. In another definition, Berman [1] defines productivity as "the effective and efficient use of resources to achieve results."

Others such as Martin, et al [12] have defined productivity as the amount of output in relation to the level of input required. Companies raise productivity by increasing their output (more goods or services) and/or reducing their input (less capital, labor or material). In particular, to economists, productivity is the efficiency with which firms, organizations, industry, and the economy as a whole, convert inputs into output. Productivity grows when output grows faster than inputs, which makes the existing inputs more productively efficient. Productivity does not reflect how much we value the outputs. It only measures how efficiently we use our resources to produce them.

Governance: Bevir [3] states that governance encompasses all of the processes of governing, whether undertaken by a government, market or networks; whether over a family, tribe, formal or informal organization or territory; and whether through the laws, norms, power or language of an organized society. More generally, the term governance refers to various new theories and practices of governing and the dilemmas which they give rise to.

According to Weiss [18, 19], governance is the sum of laws, norms, policies and institutions that define, constitute, and mediate relations among citizens, society, market, and the state, which together comprise the wielders and objects of the exercise of public power. In this regard, he emphasizes not only upon the presence of actors, but also the laws and norms as software of the system of governance as well as policies as pivotal instruments of governments to do their jobs. As noted by Kaier [9], the

World Bank defines governance as the institutional capability of public organizations to provide the public and other goods demanded by a country's citizens or their representatives in an effective, transparent, impartial, and accountable manner, subject to resource constraints.

This definition is intended to be applied as policy condition to recipient countries. However, if we agree that public organizations are identical to governments, then this definition is actually a kind of deterioration, especially when most definitions encourage more and more participation from other actors outside the government. There is no doubt that the World Bank needs to ensure the recipient countries' integrity prior to providing loans or any other kind of aid. From a banking perspective, the World Bank needs to assure that the loans go into the right hands, so that such investment can be used properly in recipient countries. However, to consider governments as the only actors that constitute the degree of a country's governance may not be fair, when there are so many influencing factors around them, like politicians, political environment, international pressure, and so on. Achieving a certain degree of good governance may be another constraint faced by such countries.

There are certainly various definitions of what global governance is. One of the most cited ones, according to Grugel and Pipper, is from Commission on Global Governance, which defines it as "the sum of the many ways individuals and institutions, public and private, manage their common affairs. It is a continuing process through which conflicting or diverse interests can be accommodated and cooperative action taken. It includes formal institutions and regimes empowered to enforce compliance, as well as informal arrangements that people and institutions either have agreed to or perceive to be in their interest… governance… must now be understood as also involving non-governmental organizations, citizens' movements, multinational corporations and the global market" [8].

Another definition comes from Weiss [18, 19], who basically says "to capture and describe the confusing and seemingly ever-accelerating transformation of the international system. States are central but their authority is eroding. Their creations, inter-governmental organizations are no more in control than they ever were."

Eventually, Grugel and Pipper [8] synthesized the definition as, "Global governance becomes an arena of global policy-making, peopled with different actors, many of which are occupying spaces that were previously controlled by states, filled with politics, tensions, contestation and conflict. State-based actors fight to get heard and shape policy alongside international bureaucracies and the non-state sector. Resources matter, but power is increasingly diffuse. This approach certainly has a greater appreciation of the difficulties of institution-building and rulemaking at the global level, the ambiguous nature of state power and the range of actors caught in global governance. But, at the same time, it does not capture or theorize the shift in global politics that is expressed by the concept of governance, and changes in the nature of policy delivery or the agenda of politics – the essence of the governance agenda, in short – go unremarked."

Based on several definitions above, we may assume that essentially global governance has characteristics of perceived common affairs, multiple actors, crossing borders and almost no single sovereignty, and international influence over state-based actors.

Public Sector: In general terms, the public sector consists of governments and all publicly controlled or publicly funded agencies, enterprises, and other entities that deliver public programs, goods or services. It is not, however, always clear whether any particular organization should be included under that umbrella. Therefore, it is necessary to identify specific criteria to help define the boundaries.

Yet, the concept of public sector is actually broader than simply that of core government and may overlap with the not-for-profit or private sectors. For the purposes of this guidance, the public sector consists of an expanding ring of organizations, with core government at the center, followed by agencies and public enterprises. Around this ring is a gray zone consisting of publicly funded contractors and publicly owned businesses, which may be, but for the most part are not, part of the public sector.

The Evolution of Public Administration

The understanding of how public administration works and operates has evolved dramatically, from one side of state-centric approach along a continuum towards a less direct role for the government. While the Old Public Administration (OPA) offered a planned and strong-structured approach to run bureaucracy, approaches like New Public Management (NPM) emphasize upon the increasing role of sectors beyond the government, as well as the different ways of how government should operate by embracing new values and new policies and program delivery strategies. Osborne and Gaebler [14] suggest that governments should

1. steer, not row, i.e., governments should only run a strategic function and not interfere in the implementation or technical activities;

2. empower communities to solve their own problems rather than simply deliver services;

3. encourage competition rather than monopolies;

4. be driven by missions, rather than rules;

5. be results-oriented by funding outcomes rather than inputs;

6. meet the needs of the customer, not the bureaucracy;

7. concentrate on earning money rather than spending it;

8. invest in preventing problems rather than curing crises;

9. decentralize authority, change from hierarchy to participatory governance and delegate some of its authority to the regions through the organization or existing systems; and

10. solve problems by influencing market forces rather than creating public programs, i.e., drive change through market.

These principles are known as the reinventing government approach. The results of the reinventing government approach include improving the business processes of governance, the realization of efficiency, increasing program effectiveness, and improvement of the administrative system such as increased capacity, flexibility, and reducing resistance to change in the public-sector environment. The success of reinventing government initiatives proposed by Osborne and Gaebler [14] depends on the context and characteristics of the countries and sectors addressed, institutional capacity, and context of the institution itself such as the climate and the management ideology espoused, attitudes toward authority, and social relationships and groups.

However, the reinventing government concepts of Osborne and Gaebler [14] have gained serious criticism from many circles. Denhardt and Denhardt [5] criticize the reinventing government

formula of Osborne and Gaebler and propose an alternative reform model called New Public Service (NPS). They say, "Government shouldn't be run like a business; it should be run like a democracy. Across this country and around the world, both elected and appointed public servants are acting on this principle and expressing renewed commitment to such ideals as the public interest, the governance process, and expanding democratic citizenship."

Denhardt and Denhardt [5] outline the major principles of their NPS model as follows:

1. **Serve citizens, not customers:** The public interest is the result of a dialogue about shared values rather than the aggregation of individual self-interests. Therefore, public servants do not merely respond to the demands of "customers," but rather focus on building relationships of trust and collaboration with and among citizens.

2. **Seek the public interest:** Public administrators must contribute to building a collective, shared notion of public interest. The goal is not to find quick solutions driven by individual choices. Rather, it is the creation of shared interests and shared responsibility.

3. **Value citizenship over entrepreneurship:** The public interest is better advanced by public servants and citizens committed to making meaningful contributions to society than by entrepreneurial managers acting as if public money were their own.

4. **Think strategically, act democratically:** Policies and programs meeting public needs can be most effectively and responsibly achieved through collective efforts and collaborative processes.

5. **Recognize that accountability isn't simple:** Public servants should be attentive to more than the market; they should also attend to statutory and constitutional laws, community values, political norms, professional standards, and citizen interests.

6. **Serve rather than steer:** It is increasingly important for public servants to use shared, value-based leadership in helping citizens articulate and meet their shared interests rather than attempting to control or steer society in new directions.

7. **Value people, not just productivity:** Public organizations and the networks in which they participate are more likely to be successful in the long run if they are operated through processes of collaboration and shared leadership based on respect for all people.

In principle, the NPS model has shifted the focus of public administration from taking a business approach to being people centric by placing more value on citizen and public interests. Yet, NPS is not only the only new paradigm, as there are many others offered in the public administration literature. The brief comparison of OPA, NPM, and NPS can be seen in Table 2.1.

Categorizing Countries

With this understanding of the evolution of OPA, NPM, and NPS, we next need to answer questions such as what constitutes democratic or non democratic countries; what productivity actually is; what defines governance; and where public sector operates. We need to understand why some countries are better off and some others are worse off; what makes a country more developed than others; and how do we define and distinguish one country from another.

TABLE 2.1

COMPARING PERSPECTIVES: OLD PUBLIC ADMINISTRATION, NEW PUBLIC MANAGEMENT, AND NEW PUBLIC SERVICE.

	OPA	NPM	NPS
Primary theoretical and epistemological foundations	Political theory, social and political commentary augmented by naïve social science	Economic theory, more sophisticated dialogue based on positivist social science	Democratic theory, varied approaches to knowledge including positive, interpretive, and critical
Prevailing rationality and associated models of human behavior	Synoptic rationality, "administrative man"	Technical and economic rationality, "economic man," or the self-interested decision maker	Strategic or formal rationality, multiple tests of rationality (political, economic, and organizational)
Conception of the public interest	Public interest is politically defined and expressed in law	Public interest represents the aggregation of individual interests	Public interest is the result of a dialogue about shared values
To whom are public servants responsive	Clients and constituents	Customers	Citizens
Role of government	Rowing (designing and implementing policies focusing on a single, politically defined objective)	Steering (acting as a catalyst to unleash market forces)	Serving (negotiating and brokering interests among citizens and community groups, creating shared values)
Mechanisms for achieving policy objectives	Administering programs through existing government agencies	Creating mechanisms and incentive structures to achieve policy objectives through private and nonprofit agencies	Building coalitions of public, nonprofit, and private agencies to meet mutually agreed upon needs
Approach to accountability	Hierarchical: Administrators are responsible to democratically elected political leaders	Market-driven: The accumulation of self interests will result in outcomes desired by broad groups of citizens (or customers)	Multifaceted: Public servants must attend to law, community values, political norms, professional standards, and citizen interests
Administrative discretion	Limited discretion allowed administrative officials	Wide latitude to meet entrepreneurial goals	Discretion needed but constrained and accountable
Assumed organizational structure.	Bureaucratic organizations marked by top-down authority within agencies and control or regulation of clients	Decentralized public organizations with primary control remaining within the agency	Collaborative structures with leadership shared internally and externally
Assumed motivational basis of public servants and administrators	Pay and benefits, civil . service protections	Entrepreneurial spirit, ideological desire to reduce size of government	Public service, desire to contribute to society

Source: Adapted from Denhardt and Denhardt [5].

To start with, we need to agree upon the categorization we need to employ in framing countries. Countries are typically categorized by two opposing attributes: rich and poor, developed and developing (some prefer to say developed and emerging), and so on. For a clearer understanding, Table 2.2 shows the comparison of categorization done by three global financial institutions.

TABLE 2.2

CATEGORY DIFFERENCE OF COUNTRIES.

	IMF	UNDP	World Bank
Developed countries	Advanced countries	Developed countries	High-income countries
Developing countries	Emerging and developing countries	Developing countries	Low and middle income countries
Development threshold	Not explicit	75 percentile in the HDI distribution	USD6,000 GNI per capita in 1987 prices
Type of development threshold	Most likely absolute	Relative	Absolute
Share of countries 'developed' in 1990	13%	25%	16%
Share of countries 'developed' in 2010	17%	25%	26%
Subcategories of 'developing countries'	1. Low-income developing countries, and 2. Emerging and other developing countries	3. Low human development countries 4. Medium human development countries 5. High human development countries	1. Low-income countries and middle-income countries

Source: Adapted from International Monetary Fund Working Paper [13].

Such categorization is arguably problematic, especially when there is no agreement on how to define developed and developing countries. UNDP, for instance, is the institution that recognizes the term "developed and developing countries." It sets a development threshold of 75 percentile in the HDI distribution, which means those which pass this threshold can be categorized as developed countries. The World Bank recognizes countries as developed, using the term "high-income countries," only if they could stay above the threshold of USD6,000 GNI per capita in 1987 prices.

Despite the differences, these categorizations actually share the same ground of defining countries based on their development level. Such categorization emphasizes on economic perspective and human development that most countries wish to achieve.

Meanwhile, it is worth mentioning the Democracy Index developed by The Economist to compare a number of countries that embrace democracy based on several indicators.

TABLE 2.3

DEMOCRACY INDEX.

No	Countries	Electoral process and pluralism	Functioning of government	Political participation	Political culture	Civil liberties	Rank
1	PR China	0.00	4.64	3.33	6.25	1.47	136
2	Indonesia	7.75	7.14	6.67	6.25	7.35	49
3	Malaysia	6.92	7.86	5.56	6.25	5.59	68
4	Russia	2.67	2.86	5.00	2.50	3.53	132
5	UK	9.58	7.14	6.67	8.75	9.41	16
6	Thailand	4.50	3.93	5.56	5.00	6.47	98
7	Japan	9.17	8.21	6.11	7.50	8.82	23
8	Norway	10.00	9.64	10.00	10.00	10.00	1

Source: The Economist.

Table 2.3 shows how far a country has embraced democracy. Some particular countries are extremely poor in government function, participation and liberty, despite their economic advances. Some others get political participation and civil liberties well done, yet they are poor in welfare development. PR China is the obvious example of how the state of democracy does not affect or hinder its economy development. The two are clearly separate from each other. Norway and the UK, on the other hand, combine both political and economic developments in a similar direction. They achieve and maintain both economy and democracy levels high.

So how do we determine the countries' levels of development? Do we employ one single perspective, e.g., economy or politics, and ignore others? Is economic indicator more important than politics? To answer these questions, we need to combine both the perspectives, which results in a quadrant that maps countries. Figure 2.1 shows how we can tell the development level of one country from another based on two different perspectives, namely, democratic level and economic orientation.

FIGURE 2.1

QUADRANT TO MAP COUNTRIES BY THEIR DEVELOPMENT LEVELS.
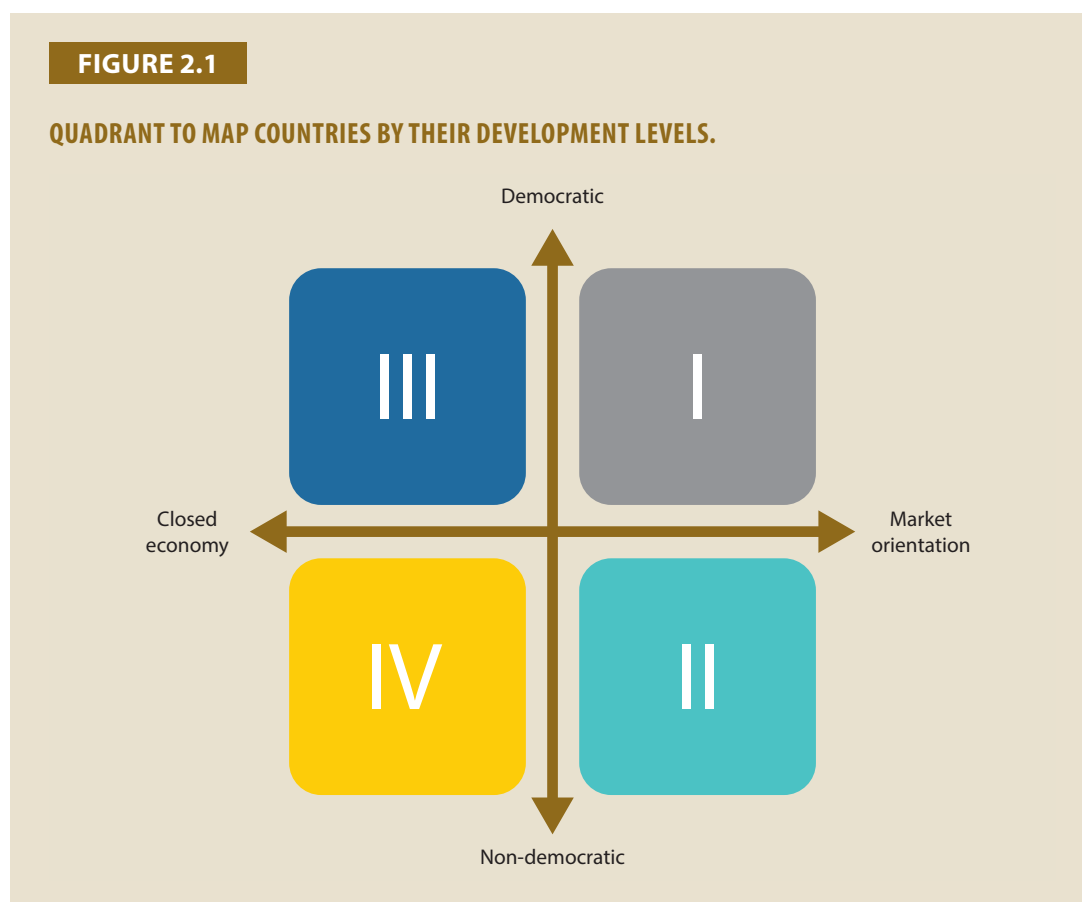
The Politics and Economy Quadrant

From this quadrant, we can see that countries can be categorized through combined perspectives. Type I countries are those that have already achieved and maintained both economic and political levels. Roughly, Sweden, Norway, the UK, and the USA are those that belong to this group. Type IV countries, in contrast, are those that need to improve both. Few countries belong to this group. North Korea and Cuba would most likely be among those categorized in this group. Type II and III countries are those that need to improve either political or economic situation in their respective countries. China can be seen as the type II country, where the economy grows extraordinarily but is less developed from the democracy perspective. Even though there are still many critics of democracy

systems and improvements may be warranted, still, they do promote the effectiveness of public policy by providing more space for the people to participate all the way from planning to monitoring.

To get a deeper perspective of why a country achieves economic development and fails to develop its democracy, or vice versa, we need to define the state of governance of the country. Several principles of good governance have been promoted in various ways. The World Bank, for instance, had introduced the following principles of good governance: accountability, transparency, predictability, and participation. These sorts of principles have been usually a major conditional instrument for the World Bank to assist developing countries in many of their projects. Meanwhile, the UNDP has its own version of principles which they call sound governance, consisting of legitimacy and voice, direction, performance, accountability, and fairness.

Good governance is meaningful when it contributes to the process of achieving a nation's goals. According to the UNDP, sound governance is "wherein public resources and problems are managed effectively, efficiently and in response to critical needs of society" [17]. This is related to Koiiman's view [10], which states that governance can be seen as all of those interactive arrangements in which public as well as private actors participate with the aim of solving societal problems or creating societal opportunities and attending to the institutions in which these governing activities take place.

In fact, the term "good governance" as either a concept or a guidance has been extensively explored and advocated to all governance components. As a concept, the term is academically well-established and widely recognized by all parties. Unfortunately, it is apparently less institutionalized, internalized, and actualized in policy and service dimensions. Hence, in nationwide efforts, this good governance movement has been one of major initiatives carried out by most central government institutions. As a matter of fact, most of the government institutions include a good governance program in their annual program or activity. It means that every program undertaken by those institutions is regarded as part of developing good governance as a whole.

Meanwhile, in accordance with autonomy implementation, good governance is also translated into local governance activities. Local parties are encouraged to develop their respective roles in order to support and develop their good "local" governance.

On the other hand, policy actors (executive and legislative), including other policy stakeholders from the business community, and civil society components may not be solid enough and synergized in achieving the nation's goals. As a matter of fact, running the nation by including all governance components has an ultimate goal to achieve people's welfare through development activities. People's welfare can only be achieved effectively when the development process is supported by a pro-welfare policy. In other words, the needs and aspirations of people can best be translated through a good policy guiding the development process well.

The condition of state-dominated development and stateless development (World Bank) or "too much state and too little state at the same time" may impose different types of policy processes. State-dominated or too much state will certainly put more power and discretion in the hands of the state and/or the government. Consequently, it may ignore the existence of the other pillars.

On the contrary, when the state has less power to do so, the policy process may be chaotic due to an absence of control. Neither the private sector nor citizens can take over the policy process, due

to the lack of capacity in them to do so. This condition will be even more risky and probably bring the nation to dire situations such as bankruptcy or government failure. Such a policy process will not be able and credible enough for ruling the whole nation.

The absence of credible policies would also affect the relationship between the private sector and the citizens. In this kind of situation, even private sector and citizens may both reject any policy enacted by the government. This is not because of the absence of the communication channel. The problem results more from the unequal power between the state and its counterparts. To some extent, this model has approximately similar characteristics to a market-driven model. Roughly, we can apply a market approach to this situation. However, even in the market-driven society, where the market takes control of many things, rules and regulations should be established in advance. Meanwhile, chaotic situations may be getting bigger when the policy control is taken over by society. Such situations might be roughly similar to what happened in the post-Soviet era. Even though the trend may lead to a similar situation, the society would not be able to take over such control directly. Instead, the society would be transformed into the form of a strong state, and finally end up ignoring the society itself.

Hence, we understand that public-sector organizations may exist at four levels (see Figure 2.2):

1. International (multistate entities or partnerships)

2. National (an independent state)

3. Regional (a province/state within a national state)

4. Local (a municipal-level body such as a city or a county)

While most public-sector organizations are associated with national or local institutions, those at the international level are less recognized. Indeed, the productivity goals of a country should not ignore the international context and thus the country should combine all levels (local, regional, national, and international) to maximize the country's productivity.

FIGURE 2.2

PRODUCTIVITY CREATED FROM VARIOUS LEVELS OF PUBLIC-SECTOR INSTITUTIONS.
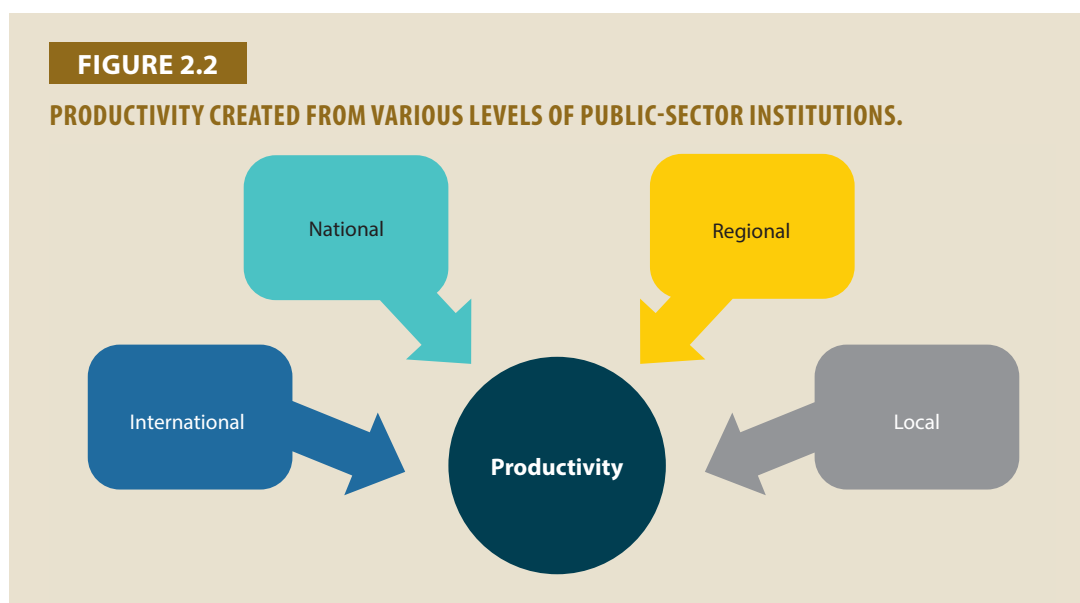
The issues related to global governance should be global and affect more than one country or a certain region (e.g., ASEAN or the EU), or the whole world (the UN or the World Bank). Accordingly, international institutions involve more players in addressing certain important economic, security, health, and environmental issues than the ones in national-level governance.

Unit 2: Understanding the Role of Public Sector in Promoting Productivity

While public-sector organizations exist at four levels (international, national, regional, and local), the public sector generally consists of at least three types of organizations:

1. **Core governments:** These consist of a governing body with a defined geographic authority. Core governments include all departments, ministries, or branches of the government that are integral parts of the structure, and are accountable to and report directly to the central authority, i.e., the legislature, council, cabinet, or executive head.

2. **Agencies:** These consist of public organizations that are clearly a part of the government and deliver public programs, goods, or services. However, they exist as separate organizations in their own right, possibly as legal entities, and operate with a partial degree of operational independence. They often, but not necessarily, are headed by a board of directors, commission, or other appointed body.

3. **Public enterprises:** These are agencies that deliver public programs, goods, or services, but operate independently of the government and often have their own sources of revenue in addition to direct public funding. They also may compete in private markets and may make profits. However, in most cases the government is the major shareholder, and these enterprises partly follow the acts and regulations that govern the core government.

The public sector plays a crucial role in the economic development. The World Bank Report of 1997 [20] argued that the state is central to economic and social development not as a direct provider of growth but as a partner, catalyst, and facilitator.

Public-sector organizations could be classified according to the service sector to which they belong. Frequently, service provision cuts across organizational types and there will be established relationships between the various organizations within a particular sector. A complete sectorial analysis is difficult to produce but some examples are shown in Table 2.4.

Outside of these three, there are two types of organizations that might or might not be part of the public sector. State businesses are government owned and controlled businesses that sell goods or services for profit in the private market. Although they do not deliver what would be considered public programs, goods, or services, they might be considered part of the public sector. The second one is public contractors and non-governmental organizations that are legally independent entities outside the government that receive public funding, under contract or agreement, to deliver public programs, goods, or services as their primary business. Primarily due to their limited public control, these organizations usually would be classified as not-for-profit or private sector entities.

Despite these boundaries, a theory about public-sector management would have to start from the following distinction between basic tasks in the public sector:

TABLE 2.4

SOME EXAMPLES OF PUBLIC-SECTOR ORGANIZATIONS (THE UK MODEL).

Sector	Organizations
Education	Department for Education and Employment
	Further and Higher Education Funding Councils
	Education Local education authorities
	Further and high education institutions
	Grant-maintained schools
Health	Department of Health
	Health authorities
	Health
	NHS trusts
	Local authorities (environmental health)
Economic development	HM Treasury
	Department of Trade
	Department of Environment
	Economic development
	Regional development agencies
	Training and enterprise councils
	Local authorities (economic development units)
Law and order	Lord Chancellor's Department
	Home Office
	Law and order (police authorities)
	Magistrates' courts
	Probation services

Source: Prowle [15].

FIGURE 2.3

ASPECTS OF PUBLIC-SECTOR MANAGEMENT.
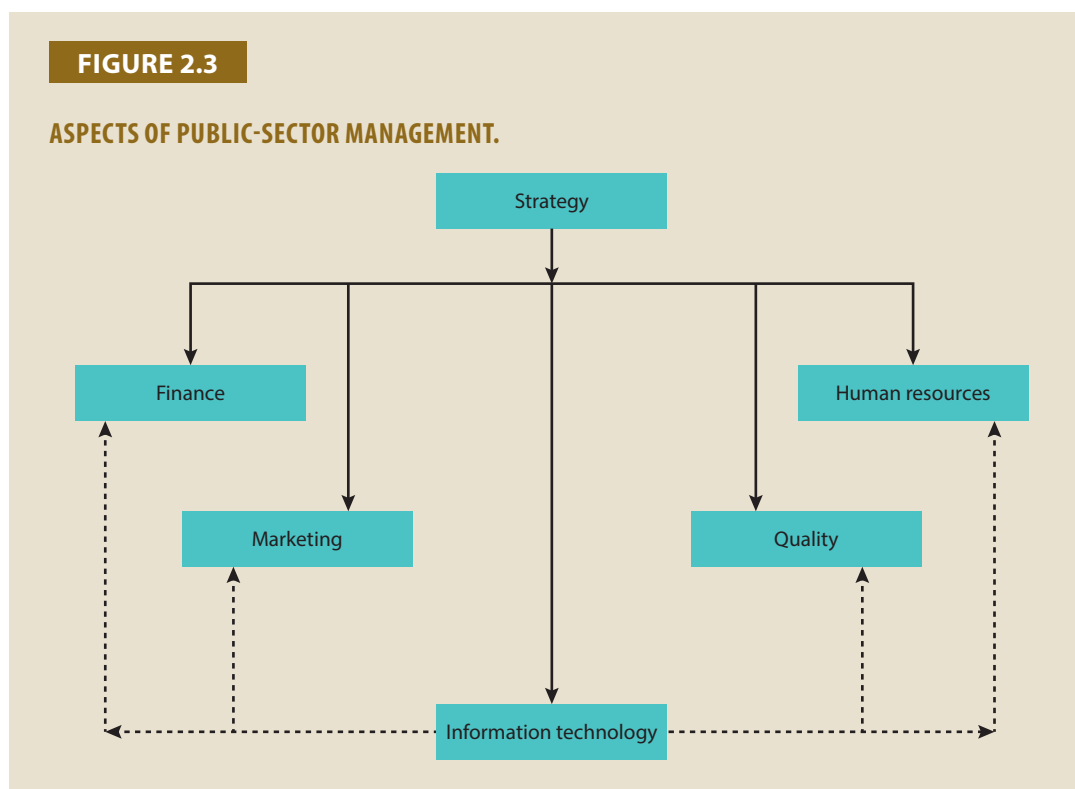
1. Allocation, or the provision of goods and services

2. Income maintenance, or the handling of transfers

3. Regulation, or the creation and monitoring of economic rules, primarily for the private sector but increasingly also commonly for the public sectors and society

Public-governance theory is a set of theories about how government can get things done. Thus, it is not primarily a framework for the analysis of how government makes decisions in political arenas, because it theorizes how government arranges for the provision of services in a society.

Public-sector management (see Figure 2.3) is an instrument for realizing the productivity of the public sector. Productivity is often used as a measure of efficiency in public sector. The concept of productivity refers to how well resources are used optimally to produce output or maximum output. In the organization of the public sector, productivity has a broad spectrum that spans the entire range of public issues including aspects of quantity and quality of public services. Public-sector productivity is basically concerned with how public organizations can achieve their objectives as efficiently and effectively as possible in utilizing their resources.

Thornhill [16] has identified three main reasons why public-sector productivity is crucial:

•   First, the public sector is a major employer.

•   Second, the public sector is a major provider of services in the economy, particularly business services (affecting cost of inputs) and social services (affecting labor quality).

•   Third, the public sector is a consumer of tax resources.

Many experts use performance review as an instrument of public-sector productivity analysis. Performance is about keeping public and nonprofit organizations up-to-date, vibrant, and relevant to the society. It is about ensuring that agency programs and policies connect with the important challenges that people, communities, and the nations face [1–2]. The level of achievement of public-sector performance shows how public-sector productivity is realized. Public-sector performance can be seen from some indicator such as efficiency, effectiveness, accountability, and people satisfaction.

In relation to this, Berman [1–2] identified the importance of performance improvement, which should consider external relations, management, marketing and fund raising, and volunteerism. The external relations consist of increasing trust with external stakeholders, getting organizations to be more responsive to clients, improving communications with citizens and elected officials, and increasing the ability to effectively partner with other organizations. Meanwhile, management in this regard includes

1. increasing the effectiveness of services;

2. choosing better goals and targets;

3. reducing administrative overhead costs;

4.   decreasing errors and mistakes;

5.   improving accountability;

6.   increasing efficiency or cost savings;

7.   improving employee motivation and commitment;

8.   increasing the advantages from information technology;

9.   getting employees to take responsibility for skill upgrading;

10. making work teams more productive; and

11. improving the climate of trust in organizations.

Marketing and fund-raising, on the other hand, consist of increasing yields from fund-raising efforts, identifying new client groups for services, improving the effectiveness of marketing efforts, and improving the yield from grant proposals. Lastly, improving the productivity of volunteers is done by reducing turnover among volunteers, identifying new groups of volunteers, reducing complaints from supervisors and volunteers, and reducing training time for volunteers.

However, to achieve high public-sector productivity is not easy, especially when it comes to the issue of efficiency. As Curristine, Lonti and Joumard [4] have declared, there is no blueprint for enhancing public-sector efficiency. OECD countries have thus adopted diverse approaches to reforming key institutional arrangements, which include increasing devolution and decentralization; strengthening competitive pressures; transforming workforce structure, size, and HRM arrangements; changing budget practices and procedures; and introducing results-oriented approaches to budgeting and management. Although the majority of OECD countries have engaged in some institutional reforms, the empirical evidence of their impact on efficiency is so far limited due to the lack of resources to conduct evaluations; the lack of pre-reform measures of performance; the complexities in measuring efficiency in the public sector; and the problem of isolating the effects of specific institutional reforms on efficiency from other external influences.

Things that can be a barrier or obstacle to increase productivity in the public sector include the following:

1.   **The wrong-headed problem:** Frederickson [7] challenged the 1990s efforts to reinvent government through TQM, reengineering, and so on, as being misplaced. He believed that most problems were political rather than administrative or managerial.

2.   **Leadership:** Almost all productivity improvement strategies require some level of management support, and many require top management support. When such support is not forthcoming, important decisions cannot be made and productivity efforts flounder. Authority, legitimacy, and resources matter. Short-term time horizons are also mentioned as a barrier to productivity.

3.   **Human resources issues:** Civil service regulations and other human resource practices, such as limitations on performance bonuses, are also frequently mentioned as barriers. It

is said to be especially difficult to reward competence and to punish incompetence in the public sector.

4. **Resources:** The lack of resources is also a frequently mentioned barrier. Many improvement productivity strategies require resources for training and other purposes. The lack of resources stymies implementation, even though, paradoxically, the lack of resources, also gives rise to the need for productivity. Resources are needed for training, creating new units, reorganization, computer purchases, pilot projects, hiring, and so on. The lack of monetary rewards is also mentioned as a barrier. However, incentives may be offered in other forms, such as superior assignments and promotions.

5. **Personal:** Personal barriers to productivity are also mentioned. Some managers are cynical about new strategies or fearful of losing their job security. Other managers are set in their ways (i.e., they will resist any change), lack necessary skills, or have adopted unproductive personal habit (e.g., lack of time management, poor interpersonal skills, and tunnel vision). These barriers are hard of overcome when individuals are unable or unwilling to make necessary changes, as noted by Berman [1, 2].

The public sector should have sufficient financial resources. These resources can be used in financing the social and economic overhead capital projects and introducing inventions. Innovations and improvements in various sectors will stimulate enterprise and initiative in the private sector.

Public-sector investment is largely directed at the creation and strengthening of the economic and social infrastructure, like transport and communications, and other public utilities, like health, education and other social facilities and eradication of poverty and increasing labor efficiency.

The role of the public sector, in economic development is multidimensional. This role can broadly be categorized into direct and indirect roles. However, this distinction in roles is not of an absolute nature because the direct role may in some instances become an indirect role and vice versa. The direct role of the public sector for instance involves engaging itself directly in productive activity by performing a multitude of functions to boast the economy and increase social welfare. These functions include the provision and maintenance of social and economic overheads, which entails large investments and is beyond the capacity of the private sector.

The basic services, like electricity, transport, telecommunication, irrigation works, health, education, water supply and sanitation, recreation facilities, and roads and bridges are provided by the public sector to raise the standard of living and the quality of life. The public sector develops basic infrastructure to facilitate the growth of agriculture and industry and hence accelerates the pace of development. It also makes arrangements to enlarge the size of the market and encourages the private sector by establishing the financial institutions and extending loans to them to enhance the capacity of the economy.

The indirect role of the public sector is not of less importance. It may act as a protector of the private property, regulate various businesses, provide security and advise the community and private sector to adopt appropriate strategies to increase productivity and social welfare. Through legislation, the public sector acts as a referee and forbids any foul play. It prohibits all cheating, sale of adulterated foods and drugs, establishes quality standards, and defines qualifications for providing various services. It influences the working force by providing educational and health

facilities, supplying relevant information, and encouraging habits of honesty and hard work. It promotes full employment of resources through appropriate fiscal and monetary measures and encouraging the production of the right type of goods, leveling inequalities of distribution of income, subsidizing consumers, rationing of essential commodities, and helping in the conservation of natural resources, e.g., conservation of soil, forests, water, fish, mineral deposits, etc.

It is now recognized that in the underdeveloped areas, the vicious cycle of underdevelopment can be broken only by a bold intervention by the government in the form of public-sector enterprises [6]. The role of the public sector in developing countries, for instance, can be identified as including

- promotion of the agriculture sector;

- building the industrial base;

- capital formation;

- optimum allocation of resources through formulating better strategies;

- balancing regional disparities between rural and urban areas;

- enlargement of employment opportunities; and

- supporting private enterprises.

In the case of transforming an agrarian society into an industrial society, the public-sector initiatives, in the form of irrigation and power facilities, improved seeds and pesticides, farm, fertilizers, and warehouses are highly important and helpful for development.

The public sector allocates a lot of financial resources in its annual budget each year to build economic and social overheads and infrastructure, but keeping in view the vastness of the task, this results in a very small amount relative to the need. Physical capital in an area is the economic infrastructure which is a prerequisite to accelerate growth and development, at least in the initial stages. It includes services from public utilities such as power, telecommunication, piped water supply, sanitation, sewerage, solid waste collection and disposal, and piped gas; public works such as major dams and canals works for irrigation and drainage; roads and other transport such as ports, water ways, and airports. According to Husain [11], infrastructure can contribute to economic growth and economic development, poverty alleviation, and environmental sustainability, but only when it provides services that respond to public demand and does so efficiently.

Finally, the role of the public sector in economic development is crucial. A careful strategy is required to promote the social and economic well-being of the people through efficient and effective public-sector management. The process of development can be accelerated through the development of basic infrastructure, the development of agriculture sector, and by raising the standard of living of people, through major changes in social, economic, and physical infrastructure, and by strengthening of public-sector institutions.

Many countries have transformed themselves from purely agrarian societies into industrialized societies. The establishment of agro-based industries, livestock production, and small-scale cottage

industries are very important for the overall development. Rural development is highly desirable because in the early stages of development the society is predominantly rural and majority of the population resides in rural areas. Improvement in skills of rural population through better education, increasing the productivity, efficiency, and income of agriculture labor; better organizations of production; development of means of transport and communications; growth of financial institutions; improvement in the standards of health, education, life expectancy, leisure, and recreation facilities; and the widening of mental horizon of people are the key elements that are required to achieve sustainable development. All these elements will improve the quality of life for citizens.

National and International Institutions to Promote Public-sector Productivity

In Asia, 19 countries, from IR Iran to Japan, have created national institutions to promote public- and private-sector productivity. These include government organizations like the Development Academy of the Philippines, and the Malaysia Productivity Corporation.

The Asian Productivity Organization (APO), established in 1961 is an intergovernmental organization that supports its member countries in achieving higher levels of productivity, as shown in Figure 2.4.

FIGURE 2.4

FIVE KEY ROLES OF THE APO.
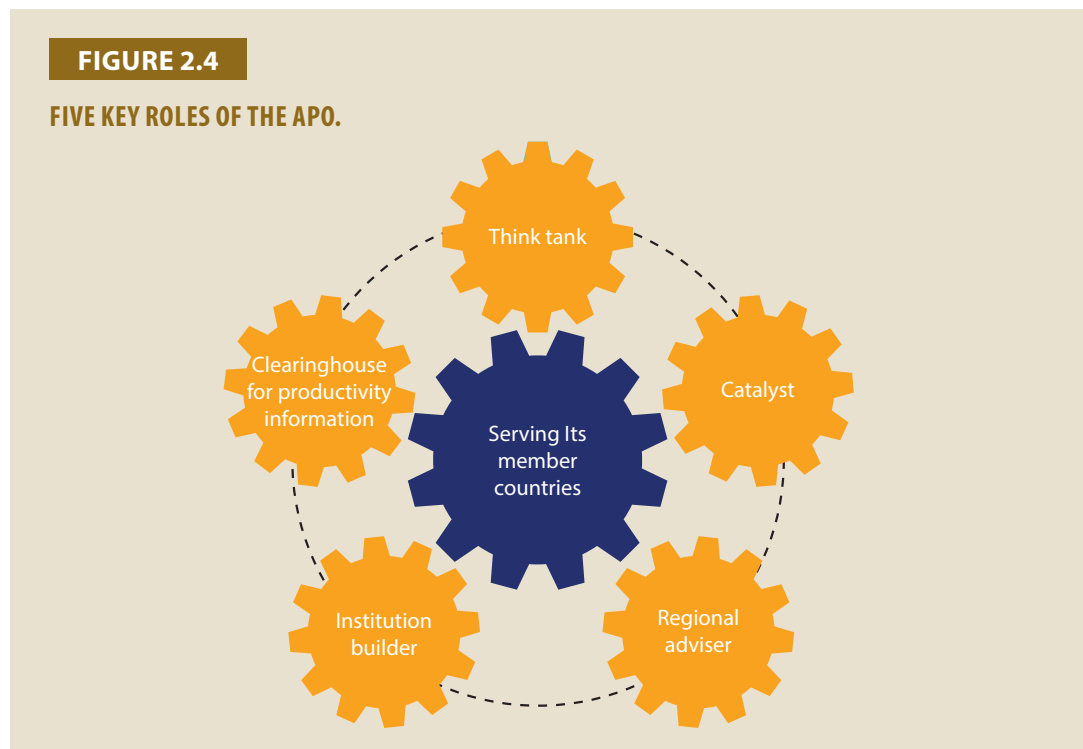
The five roles through which the APO helps improve productivity throughout the region include the following:

Think tank: The APO conducts research on emerging needs of members for their follow-up and for determining appropriate assistance to them.

Catalyst: The APO promotes bilateral and multilateral alliances among members and between them and others outside the APO region for collaboration in productivity-related activities for mutual benefit.

Regional adviser: The APO surveys the economic and development policies and performance of each member and assists in formulating strategic changes for enhanced productivity and competitiveness.

Institution builder: The APO strengthens the capability of the National Productivity Organizations (NPOs) and other institutions to provide productivity promotion, training, and consultancy services to the public and private sectors.

Clearinghouse for productivity information: The APO facilitates the dissemination and exchange of information on productivity among its members and other stakeholders.

Learning Methodology (Case studies/exercises/lectures/role play)

To understand how productivity and the global context work in practice, some cases can be useful to describe it. In recent years, among the most well-known issues in Indonesia, were natural disasters such as tsunami waves, earthquakes, volcano eruptions, and even floods that struck many parts of Indonesia. Earthquakes, followed by huge waves of tsunami, in Aceh in 2004 amounted to one of most devastating natural disaster in modern history. The disaster caused hundreds of thousands of deaths and numerous injuries, loss of materials, and a long lasting socioeconomic human tragedy. Other types of disaster also strike Indonesia, like the most recent one in late 2010 involving the Merapi volcano eruption in Central Java, which forced more than 200,000 people to move from their homes and villages to safer places. It is also reported that there was large-scale destruction of public facilities like hospitals, elementary schools, traditional markets, and houses.

One of the criticisms of the public sector from either media or other civil society elements was to the slow reaction from the government and the responsible institutions in responding to the disaster. In order to handle such catastrophes, the central government has to coordinate with the local government where the disaster has occurred. On the other hand, the coordination within central government institutions is also another problem in itself. As a matter of fact, according to the Indonesian Law of Disaster Management No 24 Year 2007, the government institutions, which are in charge of handling natural disaster, are divided into two: central and local government. This kind of hierarchical bureaucratic system creates its own difficulties, particularly when a natural disaster is taking place and swift and coordinated action is required.

In the face of the Indonesian natural disasters, the international community has shown its strong commitment to providing some help, not only in the forms of financial aid, but also in the form of technical assistance as well as direct involvement. Regrettably, the government (both at the central and local levels) found it difficult to manage all these offers of assistance due to reasons such as administrative processes and other formal procedures that international communities should go through.

Some indicators have shown that the degree of involvement of nongovernment actors in managing natural disaster in Aceh was comparatively higher than the government actors. According to the report from National Coordination Board of Natural Disaster management (Bakornas PBP), at the domestic or national level, central and local governments provided only Rp 250 billion for the recovery of Aceh. Meanwhile, the aid from nongovernment organizations reached Rp 327 billion. Surprisingly, in terms of goods and financial aids, international communities had provided aid up to Rp 450 billion. This data is just an example of how international communities, beyond traditional government actors, could provide better and greater help in overcoming such issues than the government itself.

Such influence by the international community on the Indonesian government has not only appeared in natural disaster issues, but also in the wider social and economic development field. Domestic economy and politics are obvious areas in which the international community with its agenda and interest has strongly played a significant role. For example, the World Bank and the IMF took action to prevent the spread of Asian crisis by assisting the crisis-afflicted country's government with some economic recovery programs and funds as well. These two financial institutions' plans were welcomed and implemented.

References

[1]   Berman E.M. Performance and Productivity in Public and Nonprofit Organizations. London: Routledge; 2006.

[2]   Berman E.M. Productivity in Public and Non-Profit Organizations: Strategies and Techniques. Thousand Oaks, London; New Delhi: Sage Publications; 1998.

[3]   Bevir M. Governance as Theory, Practice, and Dilemma. The SAGE Handbook of Governance. London: Sage Publications; 2011.

[4]   Curristine T., Lonti Z., Joumard I. Improving public sector efficiency: Challenges and opportunities. OECD Journal on Budgeting 2007; 7(1), 1D.

 [5]   Denhardt J.V., Denhardt R.B. The New Public Service: Serving, not Steering. Fourth edition, London: Routledge; 2015.

[6]   Dewett K.K. The Role of Public Sector in the Economic Development. In: Modern Economic Theory. Delhi: Shyam Lal Charitable Trust; 1966, pp. 410.

[7]   Frederickson G.F. Comparing the Reinventing Government Movement with the New Public Administration. Public Administration Review, vol. 56, No. 3. May–June 1996, pp. 263–70.

[8]   Grugel J., Nicola P. Critical Perspective on Global Governance: Rights and Regulation in Governing Regimes. London: Routledge; 2007.

[9]   Kjaer A.M. Governance. Malden, MA: Polity Press; 2004.

[10]   Kooiman J. Social-Political Governance: Overview, reflections and design. Public Management: an International Journal of Research and Theory, vol. 1; 1999.

[11]   Husain I. Pakistan, The Economy of An Elitist State. Karachi: Oxford University Press; 2000, pp. 243.

[12]   Martin N.B., Croxson K., Dohrmann T., et al. The Public-Sector Productivity Imperative. McKinsey & Company; 2011.

[13]   Nielson L. Classifications of Countries Based on Their Level of Development. Washington: International Monetary Fund Working Paper; 2011.

[14]   Osborne D., Ted G. Reinventing Government: How the Entrepreneurial Spirit Is Transforming the Public Sector. Reading, MA: Addison-Wesley; 1992.

[15]   Prowle M. The Changing Public Sector: A Practical Management Guide. Burlington Vermont, USA: Gower Publishing Limited; 2000.

[16]   Thornhill D. Productivity Attainment in A Diverse Public Sector. Paper Presented at the Institute of Public Administration Seminar on Promoting Productivity in a Diverse Public Sector, Institute of Public Administration (Ireland) Dublin, 2006.

[17]   UNDP. UNDP and Governance: Experience and Lessons Learned. New York: Management Development and Governance Division, United Nations Development Program; 2002.

[18]   Weiss T.G., Takur R. Global Governance and the UN: An Unfinished Journey. Bloomington and Indianapolis: Indiana University Press; 2011.

[19]   Weiss T.G. Governance, Good Governance and Global Governance: Conceptual and Actual Challenges. Third World Quarterly, vol. 21, No. 5. October 2000, pp. 795–814.

[20]   World Bank. World Development Report 1997. Oxford: Oxford University Press; 1997.

MODULE 2
PERFORMANCE MANAGEMENT

At the end of this module, participants will be able to

1. understand public accountability,

2. discuss results-based management,

3. relate performance management with productivity improvement,

4. appreciate the importance of performance measurement as a tool to raise productivity, and

5. identify suitable frameworks for performance excellence.

This module consists of four units:

Unit 1: Understanding Public Accountability

Unit 2: Results-based Management

Unit 3: Performance Measurement and Management

Unit 4: Performance Excellence Frameworks

Unit 1: Understanding Public Accountability

Learning Objectives
At the end of this module, participants will be able to

1. understand the meaning of accountability,

2. describe the types of accountability,

3. explain accountability in the public domain,

4. differentiate the levels of public accountability, and

5. situate productivity and performance management in the context of public accountability.

Introduction
Public office is a public trust, which entails the duty to protect the interests of the public and the obligation to refrain from using public office for private benefit or narrow interest. Holders of public office are accountable to citizens. While the elected officials are accountable for the authority granted to them, the appointed officials are accountable for their conduct and the responsibilities delegated to them.

According to Staplehurst and O'Brien [14], the accountability process ensures that actions and decisions taken by public officials are subject to scrutiny in order to guarantee that government activities meet their stated objectives and respond to the needs of the community. Steffek [15] sates that the accountability exercise also concerns the review of conduct of those in the public sector with the aim to prevent abuse of power or misuse of public office.

Evolution of the Notion of Accountability

Professor Mark Bovens in his analysis of accountability arrangements in the public domain [3], contends that accountability is historically and semantically related to accounting. He says that this stemmed from the practice of account-giving, way back in the twelfth century for the purpose of administrative kinship and taxation with "sovereigns holding their subjects to account." However, in the late twentieth century, the use of the term shifted from financial bookkeeping to a much broader form of public accountability as "authorities themselves are being held accountable by their citizens." Accordingly, the shift occurred in parallel to the introduction of New Public Management in the UK and to the Reinventing Government reforms in the USA, which strongly advocated, among others, the use of performance indicators and benchmarks to evaluate the efficiency and effectiveness of public agencies.

In present times, the meaning of the term accountability has expanded such that accountability now implies good governance. Often, accountability is used as a synonym to transparency, equity, democracy, efficiency, productivity, effectiveness, responsiveness, and integrity, and as a general term for any mechanism that makes institutions answerable to their respective publics.

What is Public Accountability

In the World Bank Institute paper on Accountability in Governance, authors Stapenhurst and O'Brien state that "accountability exists when there is a relationship where an individual or body, and the performance of tasks or functions by that individual or body, are subject to another's oversight, direction or request that they provide information or justification for their actions" [14].

The authors further state that the concept of accountability involves two distinct stages: answerability and enforcement. Answerability refers to the obligation of the government, its agencies and public officials, to provide information about their decisions and actions and to justify these to the public and to the institutions of accountability tasked with providing oversight. Enforcement, on the other hand, means that the public or the institution responsible for accountability can sanction the offending party or remedy the contravening behavior [14].

Bar Cendón states that accountability "refers to the obligation that public officials have of providing information, explanations and/or justifications to a superior authority – internal or external – for their performance in the execution of their functions" [2].

Bar Cendón cites, "Public officials, who should take responsibility for all that is done in the name of the public (responsibility as capacity), should also be accountable to external bodies for what they have done or failed to do while in public office (responsibility as accountability) and should be liable, legally and morally, for correcting or compensating for their wrongdoing as judged internally or externally (responsibility as liability)" [2].

In Bovens' view, accountability is a "relationship between an actor and a forum, in which an actor has an obligation to explain and to justify his or her conduct, the forum can pose questions and pass judgment, and the actor can be sanctioned"[3]. The core elements of accountability are reiterated

in Figure 3.1. When any of these elements is missing, it cannot be construed as a form of accountability. Hence, these factors must be considered in performance management.

According to Bovens, "This implies a relationship between an actor, the accountor, and a forum, the account-holder, or accountee." When demanded, "explanations and justifications are not made in a void, but vis-à-vis a significant other. This usually involves not just the provision of information about performance, but also the possibility of debate, of questions by the forum and answers by the actor, and eventually of judgment of the actor by the forum. Judgment also implies the imposition of formal or informal sanctions on the actor in case of malperformance or, for that matter, of rewards in case of adequate performance." [3]

FIGURE 3.1

CORE ELEMENTS OF ACCOUNTABILITY.

Accountability as a social relation
A relationship qualifies as a case of accountability when
1. there as a relationship between an actor and a forum,
2. in which the actor is obliged,
3. to explain and justify,
4. his conduct,
5. the forum can pose question,
6. pass judgement, and
7. the actor can be sanctioned.

Source: Bovens [3].
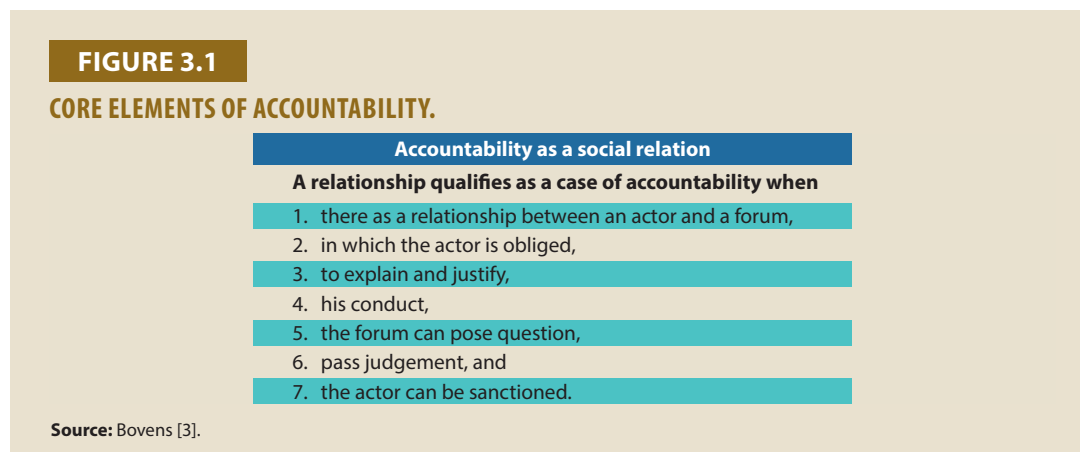
Bovens [3] refers to this as narrow accountability or responsibility-as-accountability, because actors are held to account by a forum, ex post facto, for their conduct. Nonetheless, this is typical of the relationship when accounting public organizations for their performance. Of course, there are several dimensions of accountability and this will be elaborated in the next section.

What is Public about Public Accountability

According to Bovens, "Public accountability is accountability in and about the public domain." The reference here is to more than one aspect [3].

First, "public should be understood to mean openness." This means, accounting is made open to the general public. In effect, it is required that "the information provided about the actor's conduct is widely accessible, hearings and debates are open to the public and the forum broadcasts its judgment to the general public."

Second, "public refers to the object of the account to be rendered." As more commonly understood, "public accountability mainly regards matters in the public domain, such as the spending of public funds, the exercise of public authorities, or the conduct of public institutions."

However, public accountability is not limited to public organizations only. It "can extend to private bodies that exercise public privileges or receive public funding. Public accountability implies the rendering of account for matters of public interest, i.e., an accounting that is performed with a view to the judgment to be passed by the citizens" [3]. In this module, performance management is a means to emphasize accomplishment of obligations in the delivery of commitments, use of public resources as well as the execution of functions, and conduct of civil servants and public-sector organizations.

ACCOUNTABILITY, ACTOR, FORUM, RELATIONSHIP, OBLIGATION, AND SANCTION

Accountability will here be defined as a relationship between an actor and a forum, in which the actor has an obligation to explain and to justify his or her conduct, the forum can pose questions and pass judgment, and the actor can be sanctioned. This relatively simple definition contains a number of elements that need further explanation. The actor can be either an individual, in our case an official or civil servant, or an organization. With public accountability, the actor will often be a public institution or a government agency. The significant other, the accountability forum, can be a specific person, such as a superior, a minister, or a journalist; or it can be an agency, such as parliament, a court, or the audit office. It can also be a more virtual entity such as, in the case of public accountability, the general public.

The relationship between the forum and the actor will often have the nature of a principal-agent relation, with the forum being the principal, e.g., parliament, which has delegated authority to a minister, i.e., the agent, who is held to account himself regularly about his performance in office. This is particularly the case with political forms of accountability [18].

However, as we will see, in many accountability relations, the forums are not principals of the actors. For example, courts in case of legal accountability or professional associations in case of professional accountability. The obligation that lies upon the actor can be formal or informal. Public officials will often be under a formal obligation to render account on a regular basis to specific forums, such as supervisory agencies, courts, or auditors. In the wake of administrative deviance, policy failures, or disasters, public officials can be forced to appear in administrative or penal courts or to testify before parliamentary committees. The obligation can also be informal, as in the case of press conferences and informal briefings, or even self-imposed, as in the case of voluntary audits.

The relationship between the actor and the forum in the actual account giving usually consists of at least three elements or stages. First, it is crucial that the actor is obliged to inform the forum about his conduct, by providing various sorts of data about the performance of tasks, outcomes, or procedures. Often, particularly in the case of failures or incidents, this also involves the provision of explanations and justifications. Second, there needs to be a possibility for the forum to interrogate the actor and to question the adequacy of the information or the legitimacy of the conduct. Third, the forum may pass judgement on the conduct of the actor. It may approve of an annual account, denounce a policy, or publicly condemn the behavior of an official or an agency. In passing a negative judgement, the forum frequently imposes sanctions of some kind on the actor. These sanctions can be highly formalized, such as fines, disciplinary measures, civil remedies or even penal sanctions, but they can also be based on unwritten rules, as in the case of the political accountability of a minister to parliament, which can call for the minister's resignation.

Source: Bovens [3].

Types of Accountability

In line with his definition, Bovens [3] identified several types of accountability. He categorized them based on the nature of the forum; the nature of the actor; the nature of conduct; and the nature of the obligation. (See Figure 3.2).

FIGURE 3.2

TYPES OF ACCOUNTABILITY.

Based on the nature of the forum	Based on the nature of the actor
• Political accountability • Legal accountability • Administrative accountability • Professional accountability • Social accountability	• Corporate accountability • Hierarchical accountability • Collective accountability • Individual accountability
Based on the nature of the conduct	**Based on the nature of the obligation**
• Financial accountability • Procedural accountability • Product accountability	• Financial accountability • Procedural accountability • Product accountability

Source: Bovens [3].

The following discussion on the types of accountability is adapted directly from Bovens [3].

There are five types of public accountability based on the nature of the forum, namely, political, legal, administrative, professional, and social:

1. **Political accountability:** This concerns the elected representatives, political parties, voters, and media. Under this category, accountability is exercised along the chain of principal-agent relationships, as per Strom, 2000, cited in Bovens [3]. Voters delegate their sovereignty to popular representatives, who in turn, at least in parliamentary democracies, delegate the majority of their authorities to a cabinet of ministers. The ministers subsequently delegate many of their authorities to their civil servants or to various largely independent administrative bodies. The mechanism of political accountability operates precisely in the opposite direction to that of delegation.

2. **Legal accountability:** This concerns the courts. Legal accountability is usually based on specific responsibilities, formally or legally conferred upon authorities. The legal scrutiny is based on detailed legal standards, prescribed by civil, penal, or administrative statutes, or precedents.

3. **Administrative accountability:** This concerns the auditors, inspectors, and controllers. It includes a wide range of quasi-legal forums such as ombudsmen and audit offices to independent supervisory authorities, inspector generals, and anti-fraud offices exercising independent and external administrative and financial supervision and control. The intent is to scrutinize not only the probity and legality of public spending, but also its efficiency and effectiveness as per Pollitt and Summa, 1997, cited by Bovens [3], and may include the overall productivity of the organization.

4. **Professional accountability:** This concerns professional peers, and implies accountability relationships with professional and disciplinary bodies. Professional bodies lay down codes with standards for acceptable practice that are binding for all members. These standards are monitored and enforced by professional supervisory bodies through peer reviews.

5. **Social accountability:** This concerns interest groups, charities, and other stakeholders. It is about making public agencies or individual public managers feel obliged to account for their performance to the public at large or, at least, to civil interest groups, charities, and associations of clients [3].

There are four types of accountability based on the nature of the actor, namely, corporate, hierarchical, collective, and individual.

1. **Corporate accountability:** Here, the organization is seen as the actor. Many public-sector organizations are corporate entities with independent legal status, and thus could be held accountable accordingly. For instance, instead of identifying and verifying individual actors, such as the designated officials, the organization is held accountable for the collective outcome in the event of an organizational deviance.

2. **Hierarchical accountability:** Here, the overall responsibility lies with the head of the organization. This is the official venue for political accountability in most public-sector organizations. Underlying the hierarchical strategies of accountability is a "pyramidal image" of complex organizations. Calling to account starts at the top, wherein the head of the organization, when dealing with the outside world, assumes complete responsibility. In turn, the head of the organization can hold answerable the lower levels of the organization regarding questions of internal organizational accountability.

3. **Collective accountability:** Here, the accountability is shared by all. Public organizations are collectives of individual officials. For instance, in the case of an organizational misconduct, every member of the organization can be held accountable, though it has problems with moral appropriateness. A collective accountability strategy will only be appropriate and effective in specific circumstances, for example with small, collegiate public bodies.

4. **Individual accountability:** Here, the accountability is singular. An individual official is held proportionately liable for his personal contribution to the unlawful or inappropriate conduct of the organization, including his unproductive activities. This approach is also characteristic of determining professional accountability [3].

Based on the nature of conduct, there are three types of accountability: financial, procedural, and product. While financial accountability focuses on financial propriety and procedural accountability on the process, product accountability focuses on the product itself or its contents.

When it comes to the nature of obligation, there are three types of accountability, namely, vertical, diagonal, and horizontal:

1. **Vertical accountability:** This refers to the situation where the forum formally wields power over the actor, perhaps due to the hierarchical relationship between the actor and the forum, as is the case of the executive organization that is accountable to a minister or to the parliament.

2. **Horizontal accountability:** This is exercised when giving account to various stakeholders on a voluntary basis with no intervention on the part of a principal. Here, the obligation felt by agencies to publicly account for themselves is moral in nature, and not based on legal requirements.

3. **Diagonal accountability:** When there is no direct hierarchical relationship such as between an ombudsman, an auditor or an inspectorate and the public-sector organization, the accountability is described as diagonal, because of the fact that it constitutes an intermediate form, namely that of accountability in the shadow of the hierarchy [3].

Bovens' [3] comprehensive categorization of accountability is useful in understanding the context and full range of accountability. In relation to performance management in public-sector organizations, we highlight the following four types of accountability, or forms of accountability as per Bar Cendón [2] of European Institute of Public Administration (EIPA):

1. Political accountability

2. Administrative accountability

3. Professional accountability within the framework of administrative accountability

4. Democratic accountability

Bar Cendón [2] reiterates here that political accountability takes place in two dimensions, vertical and horizontal. In its vertical dimension, political accountability is a relationship that links those in the high positions of the administrative structure, i.e., those officials who are appointed and removed on the basis of political confidence. Examples include the prime minister or the president; ministers; and other top positions in public organizations. In its horizontal dimension, political accountability is a relationship that links the government with the parliament, including some of the positions at the top of the administrative hierarchical ladder that are reporting and giving account directly of their individual performances or those of their respective administrative units.

Likewise, administrative accountability has vertical and horizontal dimensions. In its vertical dimension, administrative accountability is a relationship that links inferior administrative positions with superior political or administrative ones. In its horizontal dimension, administrative accountability links the individual administrator and the public administration as a whole with the citizen as a concrete subject or user of the service, and with other external organs of supervision and control established to this purpose, such as oversight bodies, audits, comptrollers, ombudsmen, etc. [2].

Professional accountability refers to a special type of relationship of accountability that takes place primarily in the professional world. Professional accountability takes place within the general framework of administrative action and accountability due to entrance, in the administrative structure, of a great number of professionals of high qualification and the development of numerous administrative activities of a professional character [2].

Democratic accountability requires administrative units and individual officials themselves to be directly accountable to citizens for the management and results of their administrative activities. Democratic accountability also focuses its attention on the results of administrative actions in their

impact in social and economic life, i.e., in their general innovative effectiveness. Nonetheless, administrative performance must also be inspired by the attainment of the highest possible satisfaction of citizen needs and interests.

Table 3.1 summarizes the characteristics of these forms of public accountability in terms of their basic operational principle, internal and external accountability, subject, criteria, mechanisms, and consequences.

TABLE 3.1

CHARACTERISTICS OF THE DIFFERENT FORMS OF ACCOUNTABILITY.

	Political accountability	Administrative accountability	Professional accountability	Democratic accountability
Basic operational principle	• Acting following the political and programmatic provisions adopted by the government	• Acting in full compliance with the legally established rules and procedures	• Acting in full compliance with the technical rules and practices of the profession	• Acting according with the needs and interests of social groups or society as a whole
Internal accountability, to whom?	• Superior political authority	• Superior political authority • Superior administrative organ or authority	• Superior professional organ or authority (technical evaluation) • Superior administrative organ or authority (administrative evaluation)	
External accountability, to whom?	• Parliament	• External organs of supervision and control • Citizen as subject • Courts of justice	• External organs of supervision and control (technical or administrative)	• Social groups • Society as a whole
Subject matter	• Results of the administrative performance	• Forms and procedures followed by the administrative action	• Professional rules and practices followed • Results of the professional performance	• Results of administrative performance
Criteria	• Political criteria • Technical or objective criteria	• Formal criteria: compliance with established rules and procedures	• Professional criteria: compliance with established rules and practices of the profession	• Social impact of administrative performance
Mechanisms	• Internal supervision and control mechanisms (internal responsibility) • Parliamentary mechanisms of control (external responsibility)	• Internal supervision and control mechanisms • External supervision and control mechanisms • Administrative claims judicial procedures	• Internal supervision and control mechanisms (technical or administrative) • External supervision and control mechanisms (technical or administrative)	• Mechanisms of civic participation • Media and instruments of expression of the public opinion • Information technology
Consequences	• Political criticism or recognition • Resignation or dismissal	• Revision of the administrative act (confirmation, modification annulment) • Sanction or recognition of the official involved • Compensation for the citizen	• Sanction or recognition of the official involved	• Adoption of administrative act • Revision of administrative decision • Democratic legitimization of administrative performance

Source: Bar Cendón [2].

Note that results of administrative performance, which is the focus of performance management, are the key subjects of political and democratic accountability.

Levels of Public Accountability

In an earlier section, we discussed the corporate and collegial types of accountability, wherein organizations are made answerable as a whole for transgressions and malperformance or what is construed as a collective outcome. Osborne & Plastrick, however, argue that we cannot hold everyone accountable for outcomes that are far outside their control [11]. Ideally, heads of government agencies translate the broad policy outcomes that policy makers (elected officials) want into appropriate program outcomes, outputs, and process goals at each level of the organization. We therefore recognize that there are different levels of public accountability:

1. **Policy accountability:** Selection/non-selection of policies

2. **Program accountability:** Achievement of outcomes and effectiveness

3. **Performance accountability:** Achievement of efficiency and economy

4. **Process accountability:** Adequacy of procedures and measures to implement

5. **Probity and legal accountability:** Compliance with laws and regulations and established ethical standards

Policy accountability is answerability for selection or non-selection of particular public policies, and is the responsibility of elected officials. Program accountability is answerability for the achievement of program outcomes and the effectiveness in doing so, and is the prime responsibility of senior officials, e.g., ministers, department secretaries or in short, members of the political leadership's cabinet. Performance accountability is answerability for achievement of efficiency and economy in execution/implementation of programs, and is the main responsibility of implementing agencies and their delivery units. Process accountability is answerability with respect to the adequacy of procedures and measures to implement and produce outputs, and is the responsibility of work teams. Probity and legal accountability are answerability for compliance with laws and regulations and established ethical standards, and are individual responsibilities. Table 3.2 provides a summary of the characteristics of the different levels of accountability.

TABLE 3.2

LEVELS OF PUBLIC ACCOUNTABILITY.

Public accountability	Who should be accountable?	For what?
Policy accountability	Elected officials	Policy outcomes
Program accountability	Department heads (Cabinet members)	Program or strategy outcomes
Performance accountability	Implementing agency executives	Program or strategy outcomes and outputs
Performance accountability	Delivery units and their managers	Unit outputs
Process accountability	Work teams	Processes and their outputs
Probity and legal accountability	Individuals	Individual outputs; compliance with laws, regulations, ethical standards

Source: Modified from Osborne & Gaebler [10].

In conclusion, productivity and public accountability (including ethics) are interrelated concepts. To quote Wilson, as cited in Bowman and Williams [4].

"Productivity, doing things right, and ethics, doing right things, are reciprocally integral to success: together they mean doing right things right."

Unit 2: Results-based Management

Learning Objectives
At the end of this unit, participants will be able to

1. define results-based management the meaning of accountability,

2. describe the levels of results-based management, and

3. explain the principles and elements of RBM systems.

Introduction
The introduction to results-based management is taken from these key sources:

1. APCP–MDfR report titled "Framework for Results-Based Public Sector Management and Country Cases" which, according to authors, is a reflection of what Asian countries covered by the study are doing (these countries include APO member countries Cambodia, Indonesia, ROK, Malaysia, Philippines, and Sri Lanka).

2. Lecture notes of Dr. Saldanha and Dr. Shin Kim during the APO Workshop on Results-based Management for NPOs and Public-sector Organizations on 7–10 October 2014 in Manila, Philippines

Different Approaches to Management
It is said that there are different approaches to management. These are

1. rule/regulation-based management (compliance focus),

2. activity-based management,

3. budget-based management, and

4. results (performance)-based management [13].

By design and because of the various regulations and mechanisms instituted to check on the potential abuses and to ensure vertical and horizontal accountability of public-sector organizations, the management approach that has become a default was rule based. Planning is basically budget based, while performance is accounted for by activities. It is quite recent that the focus has shifted to results.

We will discuss in Unit 4 the evolution of performance management.

What is Results-based Management?
Results-based management is a paradigm that shifts accountability for performance from inputs and activities to outputs and outcomes. Saldanha [13] elaborates on results-based management as follows.

Results-based management emphasizes upon "the explicit focus on the achievement of public program objectives and their alignment with government policies, evidenced by a) greater use of performance targets, and b) the production and use of a distinctively wide variety of performance information throughout the budget system." Often, this requires a public-sector organization to have clearly defined performance indicators of its intermediate and major final outputs in support of sectorial outcomes, which in turn contribute to the achievement of desired societal outcomes.

Results-based management also refers to "new institutional arrangements that often create a network of structured performance agreements, which provide incentives for the public sector to move beyond a compliance focus toward a performance culture." Having performance scorecards for senior officials, and civil servants is no longer unheard of. Performance agreements are secured at different levels: organizational level, delivery unit level, and individual level. These agreements become the basis for performance evaluation and grant of incentives (or disincentives) as is the case in a number of countries in Asia.

To be able to do so, according to Saldanha [13], the results-based management approach "emphasizes on holding senior officials accountable for deliverables, often with an accompanying change in the nature of expenditure controls, away from detailed line item input controls to one where managers are held accountable for both results and the use of inputs."

Core Result Attributes of Public-sector Management

One notable framework to promote results-based management in the public sector is the Asia Pacific Community of Practice on Managing for Development Results (APCP–MfDR). Here, accountable public-sector management consists of results-based planning, results-based budgeting, results-based implementation, results-based monitoring, and results-based evaluation, as illustrated in the Figure 3.3.

Results-based planning involves rigorous analysis of intended results cascaded down from macro-level impacts, such as increased employment, to specific sectoral outcomes, such as increased literacy. These results must be clearly defined within a budget envelope, with indicators and targets, and with relevant monitoring and evaluation frameworks such as APCP–MfDR [1].

Results-based budgeting ensures that the budget is formulated to deliver the results specified in planning. Results-based budgeting systems ideally produce multiyear budgets, consistent with the medium-term expenditure framework, to align with the planning time horizon as per APCP–MfDR [1].

Results-based implementation means that the people, policies, and processes are effective, efficient, and economic in delivering the intended activities and services [1].

Results-based monitoring means that specific parties are responsible for checking performance against the indicators specified in planning, using defined methodologies for data processing, analysis, and reporting [1].

Results-based evaluation involves specific parties and stakeholders in assessing the achievement of the targets set in planning, using defined methodologies [1].

Levels of Results-based Management

In the APCP–MfDR [1], there are multiple levels of results-based management (RBM) . The first is the whole of government or national level. The second level is sectors/ministries (sectorial). The

FIGURE 3.3

PUBLIC-SECTOR MANAGEMENT FOR RESULTS.

Source: APCP–MfDR [1].
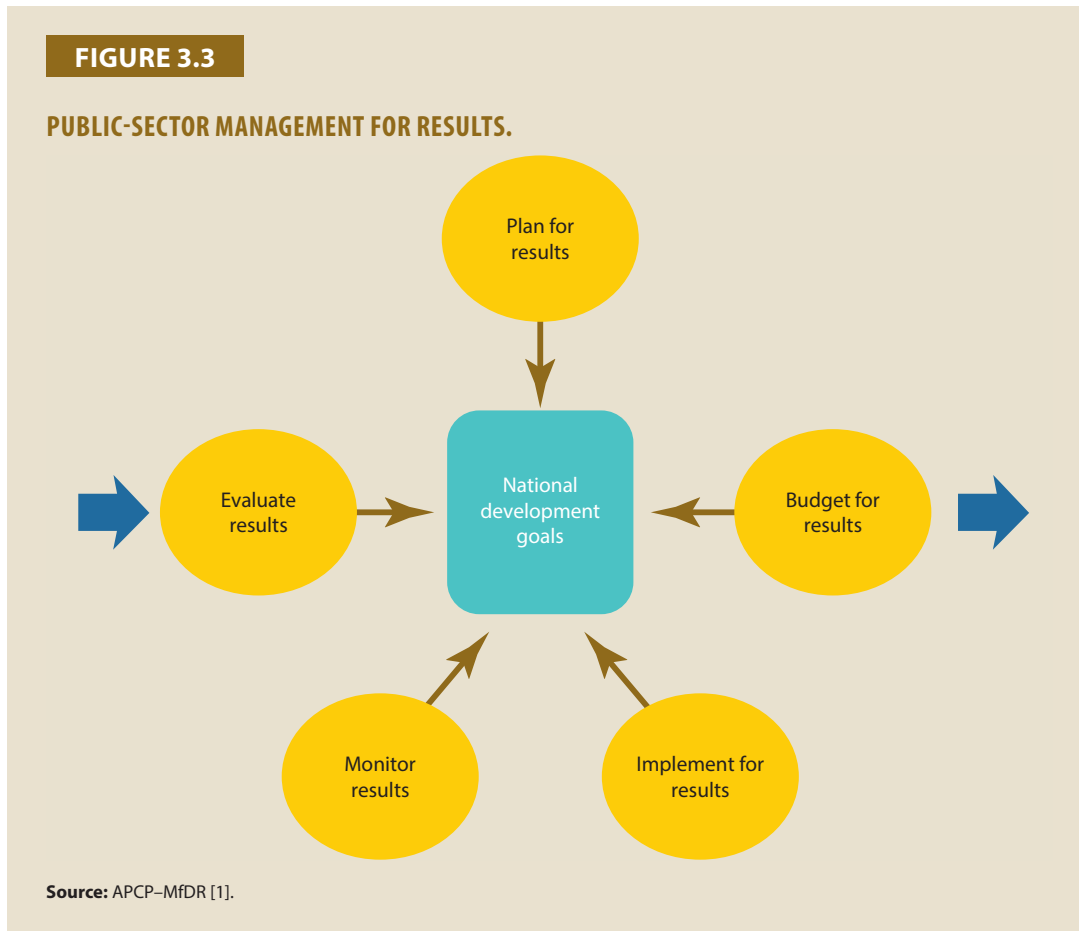
third level corresponds with the agency (organizational). Results-oriented management efforts at the national level must be linked with the results-oriented efforts of agencies at the national level, i.e., the national development goals must be translated into specific agency priorities, thus making all of these institutions collectively responsible for achieving results through effective coordination.

Subnational levels of government (regions, districts, provinces, etc.) also play a significant role in achieving country results. For this reason, results-oriented management efforts at the national level must be linked with those at subnational levels so that all levels of government contribute to delivering a common set of development results. This means that subnational governments must have the responsibility to develop and implement their own strategic plans within the overall national policy framework, and this responsibility must be matched with clear accountabilities, predictable resources, and sufficient fiscal authority to finance program delivery. These horizontal and vertical linkages (see Figure 3.4) enable better attribution and contribution to nationally defined results and ensure that initiatives in various agencies and at various levels of government complement each other [1].

What are the Benefits of RBM?
The stakeholders of public-sector organizations gain from this performance management approach. RBM promotes [9, 13]

- a focus on service and regulatory impacts and outcomes;

- increase in efficiencies;

FIGURE 3.4

HORIZONTAL AND VERTICAL INTEGRATION IN APCP–MFDR.
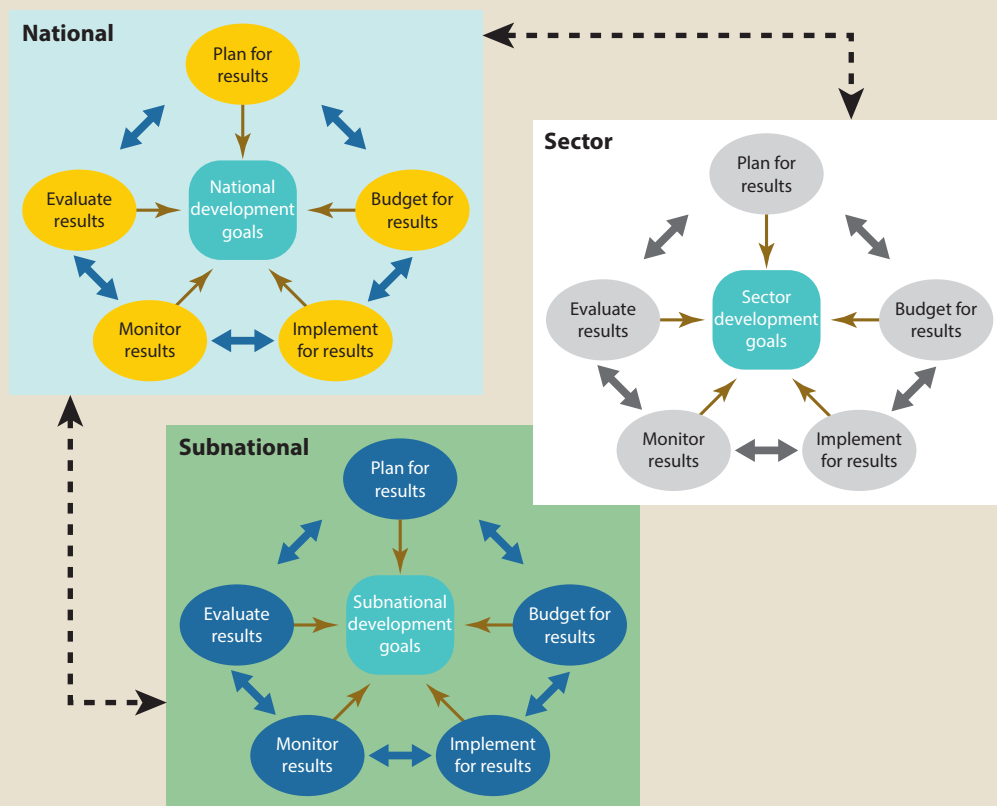
Source: APCP–MfDR [1].

- greater accountability to the public;

- transparency;

- linkages between budget and performance indicators;

- connection of the dots, i.e., linking of national policy and strategy with agency plans and budgets; and

- easier coordination among agencies.

Unit 3: Performance Measurement and Management

Learning Objectives

At the end of this unit, participants will be able to

1. define performance measurement and performance management,

2. discuss the purposes of performance measurement and management,

3.   describe the elements of a performance measurement system, and

4.   identify and measure results.

Definition of Performance Management

According to Van Doreen, Bouckaert, and Halligan, performance can be defined as outputs and outcomes, "Performance management is a type of management that incorporates and uses performance information for decision-making e.g. policy-making, budgeting, contract management, etcetera" [17].

Performance management has been used to improve public-sector performance since the 1990s. From cost accounting and scientific management approaches, the performance movement has evolved overtime from measuring inputs to measuring outputs and outcomes and lately, to focusing on use of performance information, as can be seen in Table 3.3.

TABLE 3.3

PERFORMANCE MOVEMENTS IN THE TWENTIETH CENTURY.

Period	Movement and its characteristics
1900s–1940s	• Social survey movement • Scientific management and the science of administration • Cost accounting
1950s–1970s	• Performance budgeting: shift from inputs to outputs and objectives • Social indicators
1980s–2000s	New Public Management Second generation performance budgeting (output-outcome budgeting system)
1990s–2010s	Evidence-based policy
2010s	Review and revision of performance management frameworks (focus on fiscal sustainability, use of performance information)

Source: Van Doreen, et al. [17].

Performance Management Logic

The most widely used conception of performance follows a logic of production. Performance management covers the whole chain from input to outcome. See Figure 3.5 and descriptions below which are taken from Van Doreen, et al [17].

> *The starting point is the socioeconomic situation, which induces a need for action by the public sector. Once the priorities are determined, these are translated into the objectives of the public-sector organization of program. The confrontation of the objectives of a policy with the needs allows assessing the relevance of the pursued policies.*

> *Inputs (e.g., financial, human) are allocated to organizations and programs in order to stage activities that yield outputs. Economy is the ration of the monetary input over another input. The ratio of the input over the outputs is efficiency. Outputs and efficiency are adequate conceptualization of performance in the private sector, but unsatisfactory in the public sector. The outcomes generated by the public sector are important.*

FIGURE 3.5

THE PRODUCTION MODEL OF PERFORMANCE.
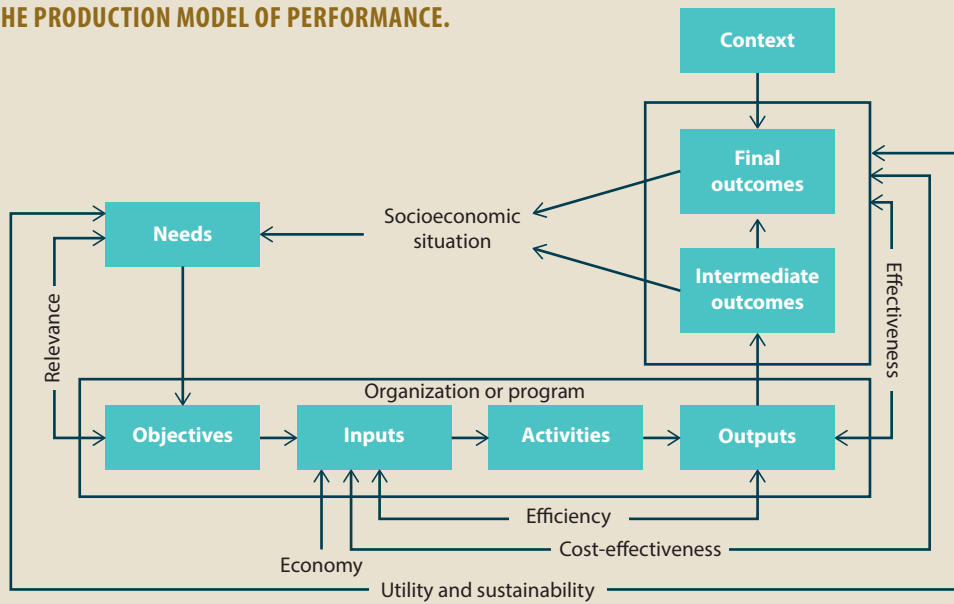
Source: Van Dooren, Bouckaert and Halligan, 2015.

The outcome of public services is either collective or consist of factors ("externalities") that are not taken into account by individual consumers. Outcomes can be intermediate (usually but not always in short term) or final (usually but not always in the long term). The final outcomes are influenced by the contextual factors such as socio-economic or ecological trends on which the organization or the program has limited or no impact.

The ratio of output over outcome is the effectiveness. The ratio of the input over the outcome is the cost-effectiveness. The outcomes of a program or the organization have to address the needs of the society. A confrontation of the needs and outcomes allows assessment of the sustainability and utility of the program or organization [17].

Strategies to Improve Performance

Since performance is a ratio between inputs and outputs (or outcomes), different strategies to improve performance can be followed (see Figure 3.6):

1. Doing more with less

2. Doing much more with more

3. Doing more with the same

4. Doing the same with less

5. Doing less with much less

FIGURE 3.6

PERFORMANCE IMPROVEMENT STRATEGIES.
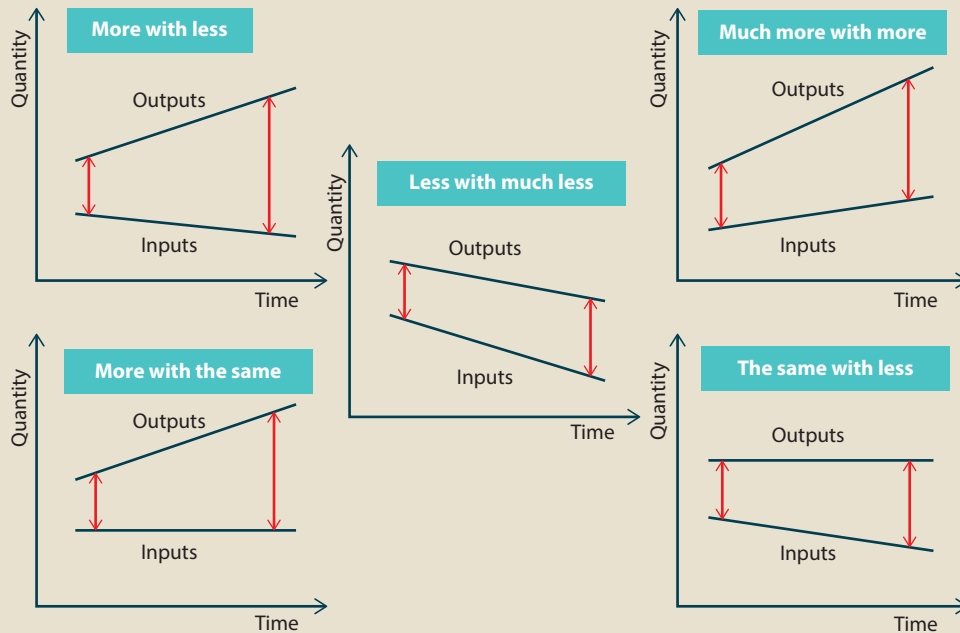
Source: Van Dooren, Bouckaert and Halligan [19].

The first scenario is doing more with less (e.g., a government that works better and costs less). The second scenario is to do much more with some more investments and expenditures. The third scenario, more output from the same input is expected (a common government strategy through cost reduction). The fourth scenario is the same level of performance with fewer resources (e.g., attrition of workforce without replacement). The fifth scenario, government expects less performance with much less inputs (e.g., budget cuts, austerity measures, diminishing performance rather than promising to more performance) [17].

Performance and Public Values

Public value refers to the value created by government through services, laws, regulations, and other actions [17].

Accordingly, there are three types of public values:

1. Values that keep the public sector lean and purposeful, e.g., frugality, efficiency, and effectiveness

2. Values that keep the government fair and honest, e.g., prevention of distortion, inequity, bias, and abuse of office

3. Values that keep the public sector robust and resilient, i.e., it continues to operate in adverse worst-case conditions and adapts rapidly in a crisis

Values and performance are distinct concepts, and all public values can lead to performance. Values form the frame of reference for the assessment of performance [17].

Power of Performance Measurement

We start this section with a quote from Osborne and Gaebler [10], authors of Reinventing Government in the USA, on the power of performance measurement: "What gets measured, gets done." (see Figure 3.7.)

FIGURE 3.7

QUOTES ON MEASURING PERFORMANCE.

"If you don't measure results, you can't tell success from faliure"

"If you can't see success, you can't reward it"

"If you can't reward success, you are probably rewarding faliure"

"If you can't see success, you can't learn form it"

"If you can't recognize faliure, you can't correct it"

"if you can demostrate results, you can win public support"

Source: Osbome and Ted [11].

Definition of Performance Measurement

Henry [8]: Performance measurement is the ongoing monitoring and reporting of program accomplishments, particularly progress towards pre-established goals.

Performance is differentiated from program evaluation, which is a systematic study to assess how well a program is working.

Performance measurement focuses on whether a program has achieved its measurable goals. Performance measurement is used mostly as an early warning system to managers should a program falter, and as a method for improving governmental accountability to the public. Performance measurement is also a powerful tool to detect corruption. Accordingly, if a program's productivity is low, e.g., the program is ill-conceived, unworkable, poorly managed, it is likely that the program has been corrupted.

Van Dooreen [17]: Performance measurement is the bundle of activities aimed at obtaining information on performance.

Osborne and Plastrick [11]: Performance measurement creates information about the results of public activities. This enables officials to hold organizations accountable and to introduce consequences for performance. It helps citizens and customers judge the value that government creates for them. And it provides managers and employees with the data they need to improve their performance.

Performance Measurement as a Means to Improve Productivity

In many parts of the world, initiatives to improve productivity in the public sector have focused on broad issues such as expenditure control, tax reduction, accountability with efficiency and

effectiveness as centerpieces. It is noteworthy to mention that the basis of the public sector's efforts to improve its efficiency and effectiveness is performance measurement [8, 12].

It is said, "Governments are inherently unable to attain the same levels of productivity found in the private sector. This is because the service-intensive character of government, by its very nature, inhibits gains in public productivity… Most government employees, such as teachers, social workers, police and firefighters, are direct, hands-on producers. Their services are, in effect, the final product, and the quality of that product is part and parcel of public productivity itself. Hence, it is extremely difficult to make teachers more productive by increasing their class sizes, to make social workers more productive by increasing their caseloads, or to make police and firefighters more productive by decreasing their numbers. In this instance, the quality of service inevitably suffers. The same might be said for playing a string quartet with two instruments: More productive, perhaps, but it's not the same thing" [8].

Considering this context of the public sector, Henry [8] thought that performance measurement and public program evaluation are attendant techniques to improve public productivity.

Objectives of Performance Measurement

According to the OECD, "The main objective of performance measurement in public organizations is to support better decision-making, leading to improved outcomes for the community, all other objectives are derived from this" [7].

In particular, performance measurement aids management in the following:

- Evaluation, or ascertaining the level of agency performance

- Control, or assuring that subordinates are doing the right thing

- Budgeting, or deciding on what programs and projects the public administrator should spend the public's money

- Motivation, or inspiring internal stakeholders to "do the things necessary to improve performance"

- Promotion, or convincing external stakeholders that the agency is doing a good job

- Celebration, or recognizing success

- Learning, or determining what is working and what is not

- Improvement, or ascertaining who should do what differently to heighten performance [8]

Permutations of Performance Measurement

There are five kinds of performance measures that are commonly used by governments, as per Henry [8]:

1. **Workload or output measures:** Calculate the amount of work performed or service provided, e.g., tons of trash collected.

2. **Unit cost or efficiency measures:** Assess the monetary expense per unit of output or workload, e.g., cost of trash collected per residence.

3. **Outcome or effectiveness measures:** Quantify the extent to which goals are attained, needs are met, and desired effects are produced, e.g., number of renovated homes in a neighborhood that is undergoing renewal.

4. **Service quality measures:** Do value-based assessments of management's responsiveness to clients' needs or expectations, such as timeliness, accuracy, and courtesy.

5. **Citizen satisfaction measures:** Assess the extent to which citizens feel their needs have been met by a program.

Types of Results

Using performance management, organizations measure results, establish standards or targets, reward good performance, and penalize poor performance [11]. There are five types of results:

1. Increase in the quantity of outputs produced

2. Increase in efficiency, which reduces the cost of work performed

3. Improvement in quality of services produced, such as their timelines, responsiveness, and accessibility

4. Improvement in the impact of an organization's work or its effectiveness

5. Reduction in the cost of producing that level of effectiveness, or cost-effectiveness

These factors can be measured at several steps in the process of producing results through improvements in

1. **processes:** the activities of production methods of employees, such as street sweeping;

2. **outputs:** the products of that work, such as miles of streets swept;

3. **strategy or program outcomes:** the direct results of the strategy or program used, such as cleanliness of streets just after they have been swept; and

4. **policy outcomes:** the longer-term results that citizens care about, such as clean streets, clean air, and low crime rates.

Elements of a Performance Measurement System

A performance measurement system consists of practices, procedures, criteria, and standards that govern the collection of data (input), the analysis of the data (throughput), and the compilation of results into quantitative or qualitative forms (output) [11].

In designing the instrument for performance measurement, the following points must be considered:

1. Organizational level at which performance is measured

2. Frequency of expected reports, the intervals between data collection efforts, and if necessary, the sampling procedures

3. The data to be collected and the data that constitutes the core of the report

4. Intended users and intended uses

5. Who is responsible for collecting the data, compiling the performance report, and disseminating the report to the intended users

Osborne and Plastrick say there are five components of performance measurement systems: policy outcomes, program or strategy outcomes, outputs, processes, and inputs [11]. The relationship is shown in Figure 3.8.

FIGURE 3.8

FIVE COMPONENTS OF PERFORMANCE MANAGEMENT SYSTEMS.

Inputs ➡ Processes ➡ Outputs ➡ Strategy/program outcomes ➡ Policy outcomes

Policy outcomes indicates the effectiveness of government policies in achieving the basic goals of a nation; a state, province, region, or county; or a community. For example, economic policy outcomes include unemployment rates, inflation rates, poverty levels, and trade balances. Environmental policy outcomes include public health, air and water pollution levels, soil erosion, and the like [11].

Typical policy outcome goals come in two varieties: long-term (10–20 years) outcome goals, and intermediate (2–5 year) outcome goals, which are intended to contribute to long-term goals. Citizens judge the elected officials on how well they deliver the policy outcomes. However, policy outcomes are shaped by many factors, some of which are outside the control of the government. Public leaders try to affect them by creating program-and-strategy outcomes. Program-and-strategy outcomes indicate the effectiveness of government programs, strategies, regulations, or other activities in achieving the desired policy outcomes (e.g., placing people in government training programs such that it contributes to the policy outcome goal of lowering unemployment). A public organization's success in creating program outcomes depends on the strategies it uses (e.g., street sweeping versus anti-littering campaign). Hence it is useful to measure both the strategy and program outcomes.

An organization's success in creating positive strategy and program outcomes depends on its outputs, i.e., the actual work products it produces. These outputs lead to program-and-strategy outcomes. Agencies can usually measure the quantity and cost of their outputs and the efficiency with which they are produced. They can also measure their quality (for example accuracy and timeliness) and their effectiveness (the degree to which they produce the desired outcomes). Government agencies usually have substantial control over outputs.

Outputs are created by processes, or activities. These are the production measures of government, i.e., the work that is actually performed. Performance measures for processes include efficiency (how much they cost to perform), quality (how much time they take), and effectiveness (how often they produce the right output) [11].

Processes depend on inputs, which refer to the resources that are required to create them. Here, quantity, cost, efficiency, and quality can be measured.

What should we measure about each of the elements? We should measure

- **quantity:** how much of an output is produced;

- **efficiency:** the cost per unit of process or output, or the ratio of inputs to outputs (productivity, which is the ratio of outputs to inputs, is a subset of efficiency);

- **effectiveness:** how successful the inputs and processes are at producing desired outputs, outputs are at producing desired program or strategy outcomes, and programs or strategies are at producing desired policy outcomes;

- **quality:** how well an activity or process is performed or an output is produced, e.g., how quickly it is performed, how helpful it is, or how satisfied are the people at the level of interaction; and

- **cost-effectiveness:** the ratio of inputs to outcomes, i.e., the level of outcomes achieved for the money spent (value for money).

Table 3.4 lists down examples of indicators.

TABLE 3.4

EXAMPLES OF INDICATORS OF POLICY OUTCOMES, PROGRAM OUTCOMES, OUTPUTS, PROCESSES, AND INPUTS.

Measures of	Quantity	Efficiency	Effectiveness	Quality	Cost-effectiveness
Policy outcome goals					
Clean air	Not applicable	Not applicable	Air pollution level	Not applicable	Air pollution level ÷ cost
Low crime rates	Not applicable	Not applicable.	Crime rate	Not applicable	Crime rate÷ cost
Skilled workforce	Not applicable	Not applicable	Percentage of workforce with high school and college degrees	Not applicable	Degree percentage÷ cost
Program/Strategy outcome goals					
Environmental department: reduction in industrial pollution	Not applicable	Not applicable	Volume of industrial emissions	Not applicable	Industrial emissions volume ÷ cost
Policy department: reduction in violent crime rate	Not applicable	Not applicable	Violent crime rate	Not applicable	Violent crime rate reduction ÷ cost
State colleges: Increase in percentage of college entrants who graduate	Not applicable	Not applicable	Percentage of college entrants who graduate in x number of years	Not applicable	Percentage of college entrants who graduate in x years ÷ cost

Measures of	Quantity	Efficiency	Effectiveness	Quality	Cost-effectiveness
Outputs					
Air pollution permits processed	Number of permits processed	Cost per permit processed	Volume of industrial emissions	Percentage of permits processed by deadline	Not applicable
Arrests made	Number of arrests	Cost per arrest	Percentage of convictions	Percentage of arrests thrown out by courts	Not applicable
Students graduated	Number of graduates	Cost per graduate	Percentage of college entrants who graduate in x years	Satisfaction level of graduates on survey	Not applicable
Processes					
Educating businesses; intake; permit review	Number of businesses advised; number of permits reviewed	Cost per business advised; cost per permit review	Percentage of businesses that complete permit application properly; percentage of permit decisions overturned on appeal	Satisfaction of business with advising process; number of complaints; average time required for permit review	Not applicable
Investigation, arrest, booking	Number of investigations, arrests, bookings.	Cost per investigation, arrest, booking	Percentage of investigations that lead to arrest	Error rate in booking	Not applicable
Registration; courses, advising	Number of courses; number of advising hours	Cost per course; cost per student advised	Percentage of students registered in classes desired; student ratings of courses	Student ratings of registration staff, faculty, advisors; percentage of students registered on time	Not applicable
Inputs					
Employees, salaries, equipment, overhead	Number of employees, cost of salaries, equipment and overhead	Cost per employee; percentage of indirect cost (overhead) to direct costs	Percentage of employees who have mastered required skills; percentage of equipment downtime	Employee satisfaction level; average performance evaluation rating of employee; employee ratings on equipment quality	Not applicable

Source: Osborne & Plastrick [11].

Incorporating Performance Information in Management Cycle

The Balanced Scorecard and various performance excellence frameworks such as the Baldrige Excellence Framework (USA), EFQM/Common Assessment Framework (EU), and Management Assessment Framework (Canada) are models that can be used as mental maps to guide incorporation of performance strategies in the organization. This will be discussed in Unit 4.

Unit 4: Performance Excellence Frameworks

Learning Objectives

At the end of this unit, participants will be able to

1. become acquainted with the global frameworks and models for organizational performance excellence [7];

2. understand the values and principles that guide organizations towards performance excellence,;

3. identify the common criteria for performance excellence, and explain how they apply in public-sector organizations; and

4. discuss how the performance excellence frameworks and models can be used as mental maps in incorporating performance and productivity improvement strategies in public-sector organizations.

Global performance excellence frameworks such as the Baldrige Excellence Framework in the USA [16], the EFQM Excellence Model [6], or its adaptation, the Common Assessment Framework [5], for the public sector, and various national quality awards based on similar frameworks can be used as mental maps to guide incorporation of performance management and improvement strategies in the organization.

Baldrige Excellence Framework

Established in 1987, the Baldrige Performance Excellence Framework is used as the criteria for assessing applicants to the Malcolm Baldrige National Quality Award (MBNQA), the highest level of national recognition for performance excellence in the USA. The Baldrige Excellence Framework is anchored on the following core values and concepts that characterize high-performing organizations [16]:

Systems perspective: This means managing all the components of the organization as a unified whole (as a system with interdependent operations) to accomplish its mission and achieve performance excellence. Organization-specific synthesis, alignment, and integration make the system successful.

Visionary leadership: This requires that senior leaders set a vision for the organization, create customer focus, demonstrate clear and visible organizational values and ethics, and set high expectations for the workforce to balance the needs of all stakeholders.

Customer-focused excellence: This considers customers as the ultimate judges of the performance and quality of outputs/services. Thus, the organization must consider all output and service features and characteristics as well as all modes of access and support that contribute to value for the customers.

Valuing people: This means committing to the engagement, development, and well-being of the workforce. The organization's success depends on an engaged workforce that benefits from meaningful work, clear organizational direction, the opportunity to learn, and accountability for performance.

Organizational learning and agility: This requires continual learning and agility to enable the organization to face the challenges of a fast-changing environment. Agility requires a capacity for rapid change and for flexibility in operations. Organizational learning, which needs to be embedded in the way the organization operates, includes both continuous improvement of existing approaches and significant change or innovation.

Focus on success: This requires understanding of short-term and long-term factors that affect the success of the organization. These factors include new opportunities, potential crises, changing economic conditions, workforce capacity and capability needs, technological developments, changing societal expectations, etc. A focus on success includes developing leaders and workforce, succession planning, creating environment for taking intelligent risks and encouraging innovation, and anticipating societal responsibilities and concerns.

Managing for innovation: This means making meaningful change to improve the organization's outputs, services, programs, processes, and operations, with the purpose of creating new value for stakeholders that leads the organization to new dimensions of performance.

Management by fact: This requires the organization to measure and analyze performance, both inside the organization and with respect to some benchmarks, using both quantitative and qualitative data and information. Performance indicators should include measurement of factors that lead to improved customer, operational, financial, and societal performance.

Societal responsibility: This requires that leaders should stress upon responsibilities toward the public and the consideration of societal well-being and benefit, e.g., public health, safety, protection of the environment, etc.

Ethics and transparency: This requires organizations to stress upon ethical behavior in all stakeholder transactions and interactions.

Delivering value and results: This means delivering value to key stakeholders. Results should include service and process results, customer satisfaction, financial results, workforce satisfaction and engagement results, societal performance, etc.

The Baldrige Excellence Framework represents the elements of a performance system, which consists of leadership, strategy, customer, workforce, operations, and results and its foundation (measurement, analysis, and knowledge management) corresponding to the MBNQA criteria categories [16]. These categories define the processes and the results to be achieved. In the Baldrige framework, performance excellence requires strong leadership and is demonstrated through outstanding results. Integration at the center of the figure emphasizes that all the elements of the system are interrelated. The categories of leadership, strategy, and customers are referred to as the leadership triad. The leadership triad emphasizes upon the importance of leadership focus on strategy and customers. The categories of operations, workforce, and results are referred to as the results triad. The results triad includes the key operational processes, workforce-focused processes, and the performance results they yield. The measurement, analysis, and knowledge management system is critical to effective management and to a fact-based, knowledge-driven, and agile system for improving performance.

Figure 3.9 illustrates the systems perspective of the Baldrige categories for performance excellence.

The Baldrige Excellence criteria can be used for self-assessments to identify strengths and opportunities for improvement, even if organizations have no intention to vie for awards. It is thus useful to quickly review the items examined in each category of MBNQA [16]:

Leadership: This category examines how senior leaders' personal actions guide and sustain the organization, the governance system, and how the organization fulfills its legal, ethical, and societal responsibilities.

Strategy: This category examines how the organization develops strategic objectives and action plans, implements them, changes them if circumstances require, and measures progress.

Customers: This category examines how the organization engages its customers for long-term success, including how the organization listens to the voice of the customer, builds customer relationships, and uses customer information to improve and identify opportunities for innovation.

Measurement, analysis and knowledge management: This category examines how the organization selects, gathers, analyzes, manages, and improves its data, information, and knowledge

FIGURE 3.9

MBNQA CRITERIA FOR PERFORMANCE EXCELLENCE.
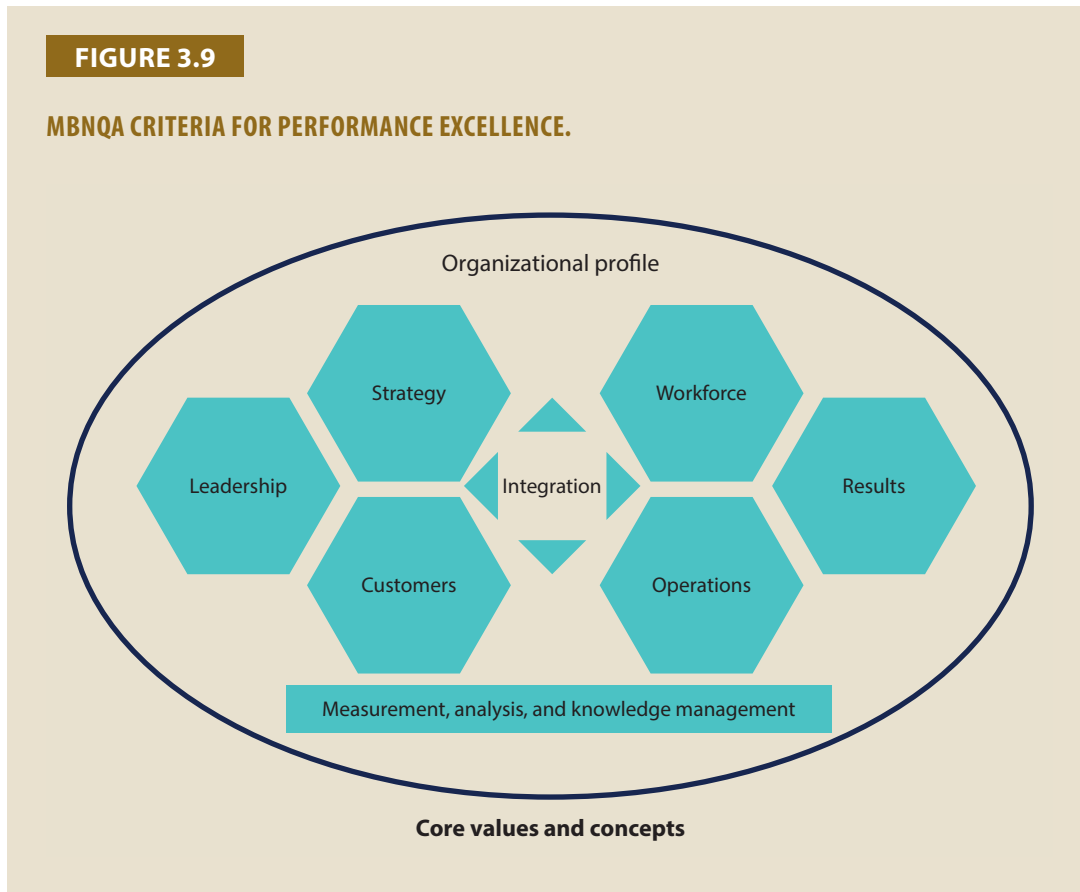
assets; how it learns; how it manages information technology; and how it uses review findings to improve its performance. Much of what was discussed in previous units on performance measurement is under this category. The notes for assessment are instructive. First, performance analysis includes examining performance trends; organizational, industry, and technology projections; and comparisons, cause-effect relationships, and correlations. It must draw on all types of data. Second, comparative data and information are obtained by benchmarking and by seeking competitive comparisons with organizations providing similar products and services. Third, the results of performance analysis and review should inform strategy development and implementation. Fourth, the performance data and information should be used to support fact-based decisions that set and align organizational directions and resource use.

Workforce: This category examines how the organization assesses capability and capacity needs of the workforce and builds an environment conducive to high performance; how the organization engages, manages, and develops its workforce to utilize full potential in alignment with organizational needs.

Operations: This category examines how the organization designs, manages, improves, and innovates its products and work processes and improves effectiveness to deliver customer value and achieve organizational success.

Results: This category examines the organization's performance and improvement in all areas encompassing product and process results, customer-focused results, workforce-focused results, leadership and governance results, and financial and market results.

The EFQM Excellence Model

Introduced in 1992, the European Foundation for Quality Management (EFQM) Excellence Model [6] is used as a management approach towards achieving performance excellence, and as the framework for assessing applications for the European Quality Award (see Figure 3.10). The framework is widely used in Europe by both public and private organizations and has been particularly adapted by the European Institute for Public Administration as the Common Assessment Framework (CAF) for the public sector [5].

FIGURE 3.10

THE EFQM EXCELLENCE MODEL.

Source: European Foundation for Quality Management [6].
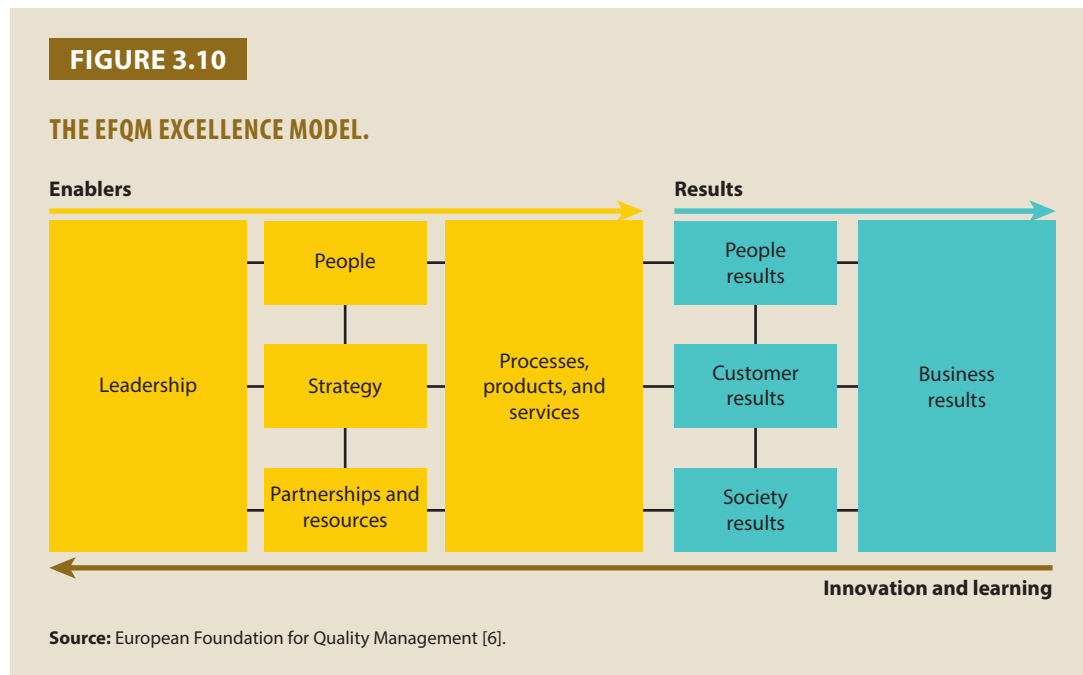
The EFQM Model is underpinned by the below listed fundamental concepts that embody excellence (Although these concepts look fewer compared to the Baldrige, the values are almost the same. In the Baldrige framework, the systems perspective, ethics and transparency, and focus on success are highlighted):

Results orientation: This requires the organization to focus on achieving results that satisfy all of its stakeholders, namely, the authorities, citizens/customers, partners, and people working in the organization.

Citizen/customer focus: This requires the organization to focus on the needs of both, present as well as potential citizens/customers, and involve them in the development of outputs and services as well the improvement of its performance.

Leadership and constancy of purpose: This requires visionary and inspirational leadership, with constancy of purpose in a changing environment, who establish a clear mission as well as vision and values, and create and maintain the internal environment in which people can become fully involved in realizing the organization's objectives.

Management by processes and facts: This takes off from the perspective that the organization could achieve desired results more efficiently when related resources and activities are managed as a process and effective decisions are based on the analysis of data and information.

People development and involvement: This requires the organization to maximize the contribution of employees through their development and involvement; the creation of a working environment of shared values; and a culture of trust, openness, empowerment, and recognition.

Continuous learning, innovation and improvement: This requires the organization to challenge the status quo and effect change by continuous learning to create innovation and improvement opportunities.

Partnership development: This emphasizes upon the need to develop and maintain value adding partnerships to achieve the objectives of the organization.

Social responsibility: This exhorts public-sector organizations to assume social responsibility, respect ecological sustainability, and try to meet the major expectations and requirements of the local and global community [5].

Compared with the Baldrige framework with seven categories, the EFQM Model has nine criteria, namely, leadership; strategy; people; partnership and resources; processes, products and services; people results; customer results; society results; and business results.

The first five criteria are "enablers," which refer to what an organization does, while the next four are "results," which refer to what an organization is able to achieve. A cross-cutting dimension is learning, creativity, and innovation.

The CAF Model

Inspired by the EFQM Excellence Model, the CAF is a total quality management tool developed for the public sector specifically for member countries of the EU.

The CAF Model uses the eight concepts of excellence in the EFQM Excellence Model but translates them to the public-sector context in order to help public-sector organizations improve performance with orientation towards total quality [5].

The CAF is based on the premise that excellent results in organizational performance, citizens/customers, people, and society are achieved through leadership driving strategy and planning, people, partnerships, resources, and processes. The CAF for the public sector also identified nine main aspects to consider in organizational performance analysis, which are aligned with the nine criteria of the EFQM.

As seen in Figure 3.11, the CAF criteria 1–5 deal with the managerial practices of an organization, referred to as the enablers, which determine what the organization does and how it approaches its tasks to achieve the desired results. CAF criteria 6–9 are the results achieved in the fields of citizen/customers, people, social responsibility, and key performance, which are determined by perception and performance measurements (note the modifications of criteria 6 and criteria 9):

Leadership: This criterion examines what the organization's leadership does to provide direction for the organization; manage the organization, its performance and its continuous improvement; motivate and support people and serve as a role model; and effectively manage relationships with political authorities and other stakeholders.

Strategy and planning: This criterion examines how the organization gathers information on the present and future needs of the stakeholders; develops a strategy and a plan using the information

FIGURE 3.11

THE COMMON ASSESSMENT FRAMEWORK (CAF) MODEL.

Source: European Institute of Public Administration, CAF Centre [5].
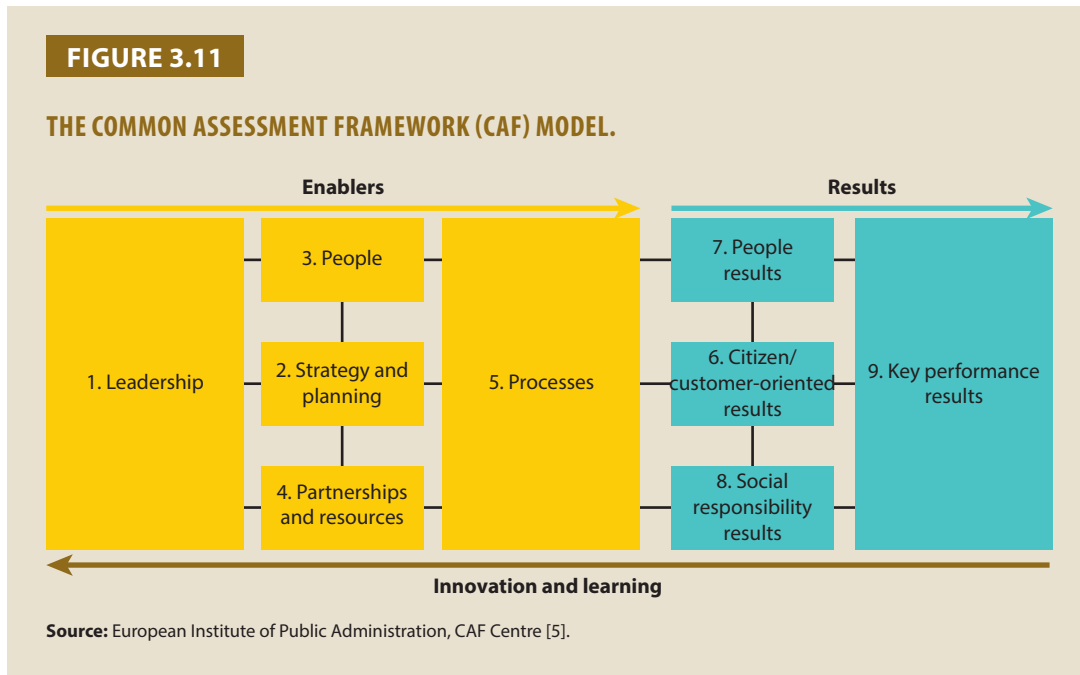
gathered; communicates and implements strategy and reviews it on a regular basis; and plans, implements and reviews innovation and change.

People: This criterion examines how the organization plans, manages and improves human resources transparently with regard to strategy and planning; identifies, develops and uses competencies of people aligning individual and organizational goals; and involves employees and supports their well-being.

Partnership and resources: This criterion examines how the organization develop and manage partnerships with relevant organizations; develop and implement partnership with citizens/customers; and manage resources such as finances, information, knowledge, technology, and facilities.

Processes: This criterion examines what the organization does to identify, design, manage, and innovate processes on an ongoing basis, involving stakeholders; develop and deliver citizen/customer-oriented services and products; coordinate processes across the organization and with other relevant organizations.

Citizen/customer-oriented results: This criterion examines what the organization has achieved to meet the needs and expectations of customers and citizens through the results of perception and performance measurements.

People results: This criterion examines what the organization has achieved to meet the needs and expectations of its people through the results of perception and performance measurements.

Social responsibility results: This criterion examines what the organization has achieved regarding its social responsibility through the results of perception and performance measurements.

Key performance results: This criterion examines results being achieved by the organization in relation to external results (outputs and outcomes) and internal results (level of efficiency).

In the CAF, the external results represent the measures of the effectiveness of the organization's strategy in satisfying expectations of external stakeholders. It reiterates that a public-sector organization should assess to what extent its key activity goals are achieved, as defined in the strategic plan in terms of outputs (services and products) and outcomes (impact of the organization's core activities on external stakeholders and on society).

The internal results, on the other hand, are related to the efficiency, effectiveness of internal processes, and the economic measures as the organization perform its functions. It covers process management (e.g., productivity, cost effectiveness or defectiveness), financial performance (effective use of financial resources and conformity with the budget), effective use of resources (partnerships, information, and technology), and the capacity to involve the stakeholders in the organization, including the results of the internal inspections and audits.

The CAF Centre has developed a 10-step journey that enables public-sector organizations to undertake self-assessment and plan and implement improvement action plans in areas where there are performance gaps. As a guide, the CAF has exemplified managerial approaches and improvement actions appropriate to each criterion (see Figure 3.12). Some of these recommended improvement actions are elaborated in other modules.

For more information, the CAF assessment guide may be downloaded from the EIPA website [6].

FIGURE 3.12

THE CAF MODEL IMPROVEMENT ACTIONS.

Source: European Institute of Public Administration, CAF Centre [5].
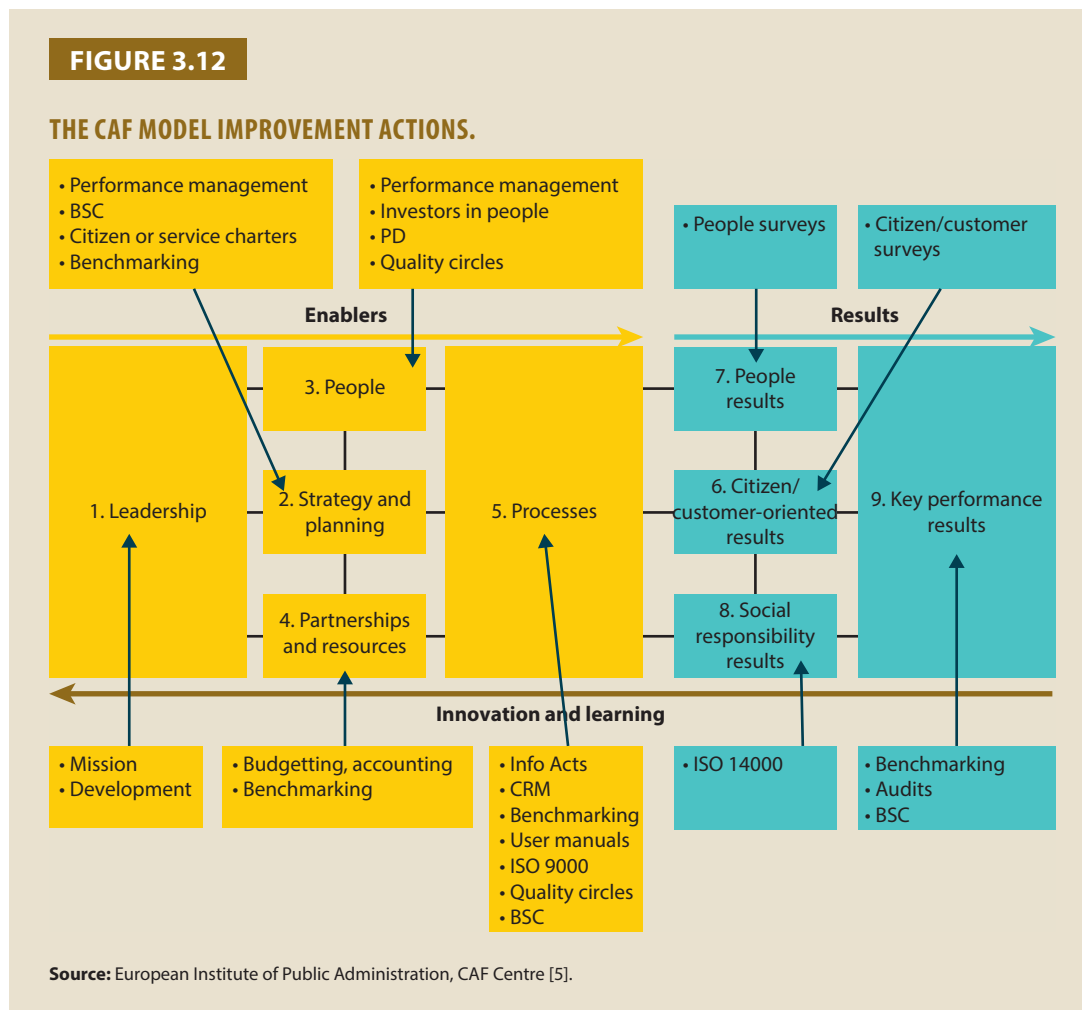
References

[1]   Asian Development Bank. Asia-Pacific Community of Practice on Managing Development Results. Framework for Results Based Public Sector Management and Country Cases. Asian Development Bank; 2011.

[2]   Bar Cendón A. Accountability and Public Administration: Concepts, Dimensions, Developments. United Nations Public Administration Network, undated. Downloaded from http://unpan1.un.org/intradoc/groups/public/documents/nispacee/unpan006506.pdf.

[3]   Bovens M. Public Accountability: A framework for the analysis and assessment of accountability arrangements in the public domain. Draft paper for CONNEX, Research Group 2: Democracy and Accountability in the EU, 2005. Downloaded from http://www.qub.ac.uk/polproj/reneg/contested_meanings/Bovens_Public%20 Accountability.connex2.doc.

[4]   Bowman J.S., Russell L.W. Productivity and Ethics: The Leadership Challenge. In: Holzer M., Lee S., eds. Public Productivity Handbook (Second Edition, Revisited and Expanded); 2004.

[5]   CAF Resource Center. CAF 2013: Improving Public Organizations through Self-Assessment. Maastrict, Netherlands: European Institute of Public Administration and European Union Public Administration Network; 2013.

[6]   European Foundation for Quality Management. http://www.efqm.org.

[7]   Halachmi A., Geert B., eds. 1996. Organizational Performance and Measurement in the Public Sector: Toward Service, Effort and Accomplishment Reporting. Connecticut, USA: Quorum Books; 1996.

[8]   Henry N., ed. Public Administration and Public Affairs (Tenth Edition). New Jersey, USA: Pearson Prentice Hall; 2007.

[9]   Kim S. Framework of RBM Systems. Lecture notes during the APO Workshop on Results-Based Management for NPOs and Public Sector Organizations in Manila, Philippines, October 7–10 2014.

[10] Osborne D., Gaebler T. Reinventing Government. USA: Addison-Wesley Publication; 1992.

[11] Osborne D., Plastrick P. The Reinventor's Fieldbook: Tools for Transforming Your Government. USA: Jossey-Bass; 2000.

[12] Peters B.G., Pierre J., eds. The SAGE Handbook of Public Administration. Los Angeles, California, USA: SAGE Publications; 2014.

[13] Saldanha C. Results-Based Management. Lecture notes during the APO Workshop on Results-Based Management for NPOs and Public Sector Organizations in Manila, Philippines, October 7–10 2014.

[14] Stapenhurst R., O'Brien M. Accountability in Governance. Washington DC, USA: World Bank Institute; undated. Downloaded from https://siteresources.worldbank.org/ PUBLICSECTORANDGOVERNANCE/Resources/AccountabilityGovernance.pdf.

[15] Steffek J. Public Accountability and the Public Sphere of International Governance. RECON Online Working Paper, 2008.

[16] US Department of Commerce. Baldrige Excellence Framework 2015-2016: A systems approach to improving your organization's performance. Gaithersburg, MD, USA: National Institute of Standards and Technology; 2015.

[17] Van Dooren W., Bouckaert G., Halligan J. Performance Management in the Public Sector. Abingdon, NY: Routledge; 2015.

[18] Strom K. Delegation and Accountability in Parliamentary Democracies; 2000.

MODULE 3
MEASURING PUBLIC-SECTOR PRODUCTIVITY

At the end of this module, participants will be able to understand

1. the concept of measuring public service, along with an explanation;

2. measuring productivity of public services, the challenges and developments in methodology;

3. observed international experience in measuring public-sector productivity;

4. the development of methodology in measuring public sector, including examples of successful measurement by the Office of National Statistics;

5. the established productivity frameworks and its relationship to measuring public-sector productivity;

6. the use of logical framework to understand public service programs, activities, and its relationship with input, output, and outcome;

7. the theoretical background in measuring public-sector productivity using ESA/SNA and OECD international guideline, along with an explanation;

8. the theoretical concept in measuring productivity using index number approach;

9. methodological guidance on how to compute public service output index;

10. methodological guidance on how to compute public service input index; and

11. methodological guidance on how to compute and analyze public-service productivity at sectorial and organization level.

This module consists of six units:

Unit 1: Overview and Introduction to Measuring Public-service Performance

Unit 2: Key Principles and Concepts to Measure Productivity

Unit 3: Measuring Public-service Output

Unit 4: Measuring Public-service Input

Unit 5: Measuring Total Public-service Productivity

Unit 6: Linking Macro Productivity Measures and Quality of Performance Measures

Unit 1: Overview and Introduction to Measuring Public-service Performance

Learning Objectives

At the end of this unit, participants will be able to understand and reinforce reason for better measurement of public-service output.

Conceptual Context of the Public-service Process in a Productivity Perspective

The service process is a key element of performance information analysis. In terms of public policy, the public services are supported by their public program objectives, and are made up of inputs, processes, and outputs, as shown in Figure 4.1. Generally speaking, inputs are related to the resources needed for carrying out an action. For instance, these coincide with the factors of the economy, namely, land, labor, and capital. However, in some services, knowledge itself is a factor as it allows some technology-based services to be executed. The service process is the economic activity carried out to transform inputs into outputs. The process refers to the technology in which a service is delivered or generated. As the services are consumed at the same time they are produced, outputs are highly related to consumption.

FIGURE 4.1

PUBLIC SERVICE PROCESS.
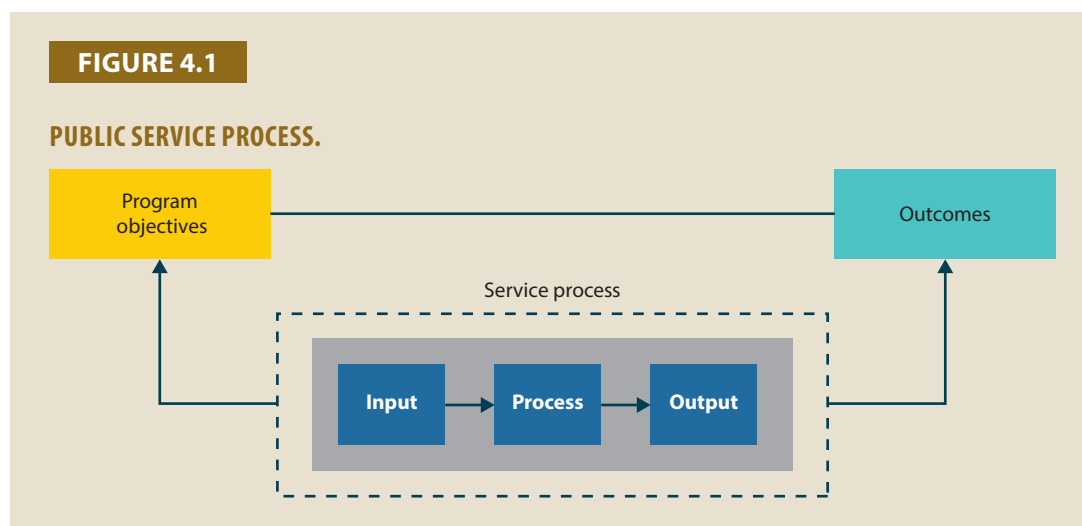
The previous characteristic refers to a services principle known as the inseparability of the service's production and consumption Additionally, as services can't be stored, since services are intangible (pure services are not expected to be stored, seen or even held), the output will emerge at the same time as the service process is carried out, with no chance that any of these services could be stored for later consumption. Along with external influences such as the economy and the social environment, just after the service has been consumed some outcomes will become visible. Generally speaking, outcomes are related with a public program objective fulfillment through which the social welfare is improved.

The Service Process

The service process provides the general framework to analyze the public function production and is a simple tool to evaluate the performance of public services. Seen within a wider spectrum, outcomes and inputs will be used to measure the effectiveness of the service process, while the input-output relationship will be used to estimate the technical efficiency through a productivity-based calculation. In other words, this last approach refers to the way in which government transforms inputs into outputs. In a way, that measures the government technology used to generate services.

Leaders emphasize that there is no single lens through which to consider public-sector productivity. While there has been some criticism of the public sector's tendency to prioritize spending reductions to increase productivity, project contributors have noted that sometimes efficiency needs to be the focus. At the same time, other experts suggest that the focus should be more on the effectiveness or quality of outcomes. It can be difficult to measure the bottom line in the public sector because even if governments are as efficient as possible, there are often competing objectives unrelated to cost savings.

The public sector has an obligation to serve the greater good, and in these instances, a different, more balanced kind of productivity lens should be applied. The main challenge therefore in the public service is in using both the lenses and not prioritizing one or the other to achieve an unbalanced outcome.

CHALLENGES IN MEASURING PUBLIC SERVICE PRODUCTIVITY

The total volume valuation of outputs for a firm or an industry can be derived by multiplying the numbers of the outputs (units of goods and services produced and successfully marketed to customers) by the prices for which each has been sold. Price here automatically controls for the variations in the value of different products within and across firms. This allows us to derive a price weighted measure of overall output that is then divided by a measure of total inputs to obtain a productivity ratio.…

But we do not have anything equivalent to a price for (most of) the many different services and goods that government departments and agencies produce. Public service outputs are generally supplied to citizens, firms or other stakeholders for free, or at highly subsidized prices. In many cases…the consumption of public sector outputs is often made mandatory or imposed on citizens.

Until quite recently public-sector productivity was thought to be constant, based on the assumption that values of public sector outputs are in equilibrium with the costs of producing them—that is, with 'inputs.' It was also assumed that placing concrete values on the diverse range of public sector outputs governments generate was not feasible; thus, no effective measure of the volume of outputs (at the national level) could be achieved.

In short, this approach provided a simple, straightforward solution to the challenge that non-market outputs—the kind typically produced by the public sector—do not have intrinsic, quantifiable prices (values) in the manner private sector (market) outputs do. Thus, measuring outputs in the public sector was done "by valuing the inputs that went into producing them—that is, by simply entering the costs of the government staff employed, and the materials and procurements and capital used up in their production .

Source: Dunleavy and Carrera, in their book, Growing the Productivity of Government Services [6].

Lessons from International Experience in Measuring Public-sector Productivity

Comparative studies focus on three main aspects of productivity measurement in the public-sector productivity, including cross-national assessments of public-sector efficiency and performance; national and sectorial public-sector productivity measurement initiatives; and a more micro-level

examination of productivity measurement, looking at organization-based and bottom up initiatives to measure public-sector productivity. Let us review a few significant studies.

Comparative Cross-national Assessments of Public-sector Productivity and Performance

For the OECD Government at a Glance project [10], the Public Governance Committee of the OECD has mandated the Public Governance and Territorial Development Directorate to assess the feasibility of developing comparable data and indicators of good government and efficient public services. This project, titled Management in Government: Comparative Country Data, aims to provide empirical data and indicators of good government performance. The intention is to move, on a phased basis, to the production of a publication titled Government at a Glance, which will mirror the OECD's Education at a Glance publication and show comparative cross-national data on an annual basis.

An initial assessment of available data has been undertaken, alongside a detailed literature review. The focus is on several types of measures: inputs, processes, outputs, outcomes, and antecedents or constraints that put government efficiency in context. The intention is to first produce a working paper, mostly concerned with inputs and processes, as these are the most readily available data. Data concerning outputs and outcomes are seen as more difficult to gather, but the intention is to gradually improve coverage in these areas.

National and Sectorial Public-sector Productivity Measurement Initiatives

At a national level, progress has been made in the UK, Finland, Sweden and Australia in measuring national and sectorial productivity.

Organization-based and Bottom-up Initiatives on Public-sector Performance Measurement

Organization level productivity measurement is likely to be a feasible and useful tool for those organizations that have clear, identifiable outputs that can be linked to inputs used. These measures do not necessarily need to cover the whole organization and may be indicators of productivity for discrete parts of the organization. Bottom-up/service user measurements of performance, such as the time and cost associated with setting up a new business, are being developed in a number of places. While they are not productivity measurements in the strict sense (as they focus on the outputs and broad performance of public-sector organizations rather than linking this data to inputs in a direct manner), they do help provide a picture of what value is being delivered by public services in return for the expenditure supports provided.

Learning Methodologies
- Lecture and case examples

- Exercises: identifying the key performance indicators your organization used to improve performance; research report on performance management for public-sector organizations

- Atkinson Review: Interim report, Measurement of Government Output and Productivity for the National Accounts [3]

- Government at a Glance [10]

- World Bank Doing Business

- Government Efficiency Indicators in World Competitiveness Yearbook (WYC)

Unit 2: Key Principles and Concepts for Measuring Productivity

Learning Objectives

At the end of this unit, participants will understand why measure public-service productivity and the principles to measure public-sector productivity.

Conceptual Definition

According to the OECD, "Productivity is commonly defined as a ratio of a volume measure of output to a volume measure of input use," i.e., outputs divided by inputs. Productivity estimates should be distinguished from performance measures [9].

Productivity estimates provide insight into the drivers of efficiency in government service by breaking down growth into growth of inputs, growth of output, and changes in productivity. Change in productivity, or change in the ratio of output to inputs, is one of many indicators that may be of interest to those wanting to understand the efficiency of the government sector in utilizing resources when delivering public service.

Overview of Productivity Measures

There are many different measures of productivity growth. The choice between them depends on the purpose of productivity measurement and, in many instances, on the availability of data. Broadly, productivity measures can be classified as

- single-factor productivity measures (relating a measure of output to a single measure of input), and

- multifactor productivity (MFP) measures (relating a measure of output to a bundle of inputs).

Table 4.1 uses these criteria to enumerate the main productivity measures. The list is incomplete insofar as single-factor productivity measures can also be defined over intermediate inputs, while multifactor productivity can, in principle, be evaluated on the basis of gross output. However, in the interest of easy comprehension, Table 4.1 was developed to provide a simple overview.

TABLE 4.1

OVERVIEW OF MAIN PRODUCTIVITY MEASURES.

Type of output measure:	Type of input measure			
	Labor	Capital	Capital and labor	Capital, labor, and intermediate inputs (energy, materials, services)
Gross output	Labor productivity (based on gross output)	Capital productivity (based on gross output)	Capital-labor MFP (based on gross output)	KLEMS multifactor productivity
Value added	Labor productivity (based on value added)	Capital productivity (based on value added)	Capital-labor MFP (based on value added)	–
	Single-factor productivity measures.		Multifactor productivity (MFP) measures.	

Gross Output and Value Added

Every productivity measure, implicitly or explicitly, relates to a specific producer unit: an establishment, a firm, an industry, a sector or an entire economy. The goods or services that are produced within a producer unit and that become available for use outside the unit are called (gross) output. Output is produced using primary inputs (labor and capital) and intermediate inputs.

Gross output-based MFP growth is positive when the rate of volume gross output rises faster than the rate of combined inputs. This is an intuitively plausible way of describing productivity change in a producer unit and can, with some simplifying assumptions, be interpreted as an empirical approximation to the rate of disembodied technical change, (i.e., of advances in technology that are not embodied in new machinery and equipment). However, the gross output-based approach (see Table 4.2) tells one very little about the relative importance of a firm or an industry for productivity growth of a larger (parent) sector or of the economy.

Value-added Growth

Here, productivity is measured as the ratio of deflated (volume) value added divided by a ratio of combined primary (labor and capital) inputs. Value added takes on the role of the output measure, and is gross output corrected for purchases of intermediate inputs. Value added-based MFP growth will be positive if volume value added grows faster than combined primary inputs. The advantage of the value-added measure is that aggregate value-added growth is a simple weighted average of value-added growth in individual industries, and so is the value added-based MFP growth. To stay with the above example, value added (at current prices) of an integrated shoe and leather industry is simply the sum of value added in the shoe and the leather industry. A 1% growth of value added-based MFP in both the shoe and leather industry translates into 1% productivity growth of the shoe and leather industry.

> **TABLE 4.2**

VALUE ADDED AND GROSS OUTPUT-BASED PRODUCTIVITY MEASURES.
AN EXAMPLE MACHINERY AND EQUIPMENT INDUSTRY, FINLAND.

	Averages of annual percentage rates of change		
	1990–98	**1990–94**	**1994–98**
Gross output (deflated)	10.1	4.2	16.0
Values added (deflated)	9.5	3.3	15.8
Labor input (total hours)	1.6	-3.7	6.9
Capital input (gross capital stock)	3.0	1.5	4.5
Intermediate inputs (deflated expenditure)	10.4	4.8	16.1
Share of value-added in gross output (current prices)	37.0	38.9	33.4
Gross output-based productivity (KLEMS MFP)	2.7	2.1	3.3
Value-added based productivity (capital-labor MFP)	7.8	5.7	9.8

Source: OECD, based on STAN database.

Multifactor Productivity

This is the measure of labor and capital productivity, either in the form of capital-labor MFP, based on a value added concept of output, or in the form of capital-labor energy-materials MFP (KLEMS), based on a concept of gross output. Value-added-based labor productivity is the single-most frequently computed productivity statistic, followed by capital-labor MFP and KLEMS MFP. Similar to the market sector, public-service productivity is defined as the ratio of outputs to inputs. The measurement of non-market government output and of government expenditure on the inputs used to produce the output. Productivity growth is the change in this ratio over time. All public-service productivity measurement is MFP measurement.

Development of Best Practices in Measuring Public-service Productivity

Much progress has been made recently globally in improving measures of non-market output. However, little specific attention has been paid to non-market inputs, despite the fact that markets

for the inputs do exist (although there is a debate about the impact on labor markets of monopsony employers, for example) and prices that are more or less market prices are available. Accordingly, the measurement issues for constructing estimates of non-market inputs are no more difficult than those for the market sector. Over recent years, various publications have incrementally improved the guidance available to those wanting to construct estimates of non-market outputs. Table 4.3 presents a list of the publications with international guidance on the measurement of non-market output and productivity. The following Table 4.4 explains the output and government expenditure by classification of functions of the government (COFOG) for government services.

TABLE 4.3

INTERNATIONAL GUIDANCE ON MEASURING NON-MARKET OUTPUT AND PRODUCTIVITY.

Publication	Organization(s) responsible	Type of guidance on measurement of government output	Status
System of National Accounts SNA (1993), new version SNA 2008 under preparation	UN, OECD, World Bank IMF, and European Commission Document prepared by Inter-secretariat Working Group on National Accounts Approved by UN Statistics Commission	High-level guidance	International standard
European System of Accounts ESA (1995)	Eurostat	Fully consistent with SNA 1993, more focused on the circumstances and data needs of the European Union	A legal basis to ensure strict application, providing harmonized statistics
Eurostat Handbook on Price and Volume Measures in National Accounts (2001 edition)	Eurostat	Expansion of ESA 1995 guidance, distinguishing activities, outputs and outcomes Introduces A/B/C score for methods of Member States	Develops ESA 1995 to ensure harmonized price and volume data
OECD Productivity Manual (2001)	OECD	Comprehensive guide to productivity measurement	No formal status, but indicates desirable properties of productivity measures
Atkinson Review: Final report Measurement of Government Output and Productivity for the National Accounts (2005)	Sir Tony Atkinson	Comprehensive guide to measuring output and productivity for non-market government services	Accepted by the UK's National Statistician, the basis for Eurostat and OECD thinking on how to measure non-market output

Source: Modified from Table 3.1 of Atkinson Review: Final Report.

Estimate of Productivity Change Using Statistical Methods

Having defined the elementary level of aggregation, the price and volume indices available at that level have to be weighted together to obtain the price and volume measures of all national accounts aggregates. Therefore, the choice of the index formula to be used for this purpose is critical.

TABLE 4.4

EXPENDITURE BY CLASSIFICATION OF FUNCTIONS OF THE GOVERNMENT (COFOG) FOR GOVERNMENT SERVICES.

COFOG		Local government	Central government
01	General public services	Output volume measures are deflated expenditure figures for pay, procurement of goods and services, and consumption of capital.	
02	Defense		Output volume measures are deflated expenditure figures for pay, procurement of goods and services, and consumption of capital.
03	Public order and safety	Output volume measures are deflated expenditure figures for pay, procurement of goods and services, and consumption of capital.	Output volume measures are deflated expenditure figures for pay, procurement of goods and services, and consumption of capital.
03.1	Police	Output volume measures are deflated expenditure figures for pay, procurement of goods and services, and consumption of capital.	
03.2	Fire	Output volume measures for fire service are measured directly using number of fires attended and numbers of other services.	
03.3	Courts	Magistrate courts are measured directly using caseload weighted by average costs.	Output volume measures for crown and county courts are measured directly using caseload weighted by average costs.
03.4	Prison		Output volume measures are measured directly using total number of prisoners.
03.5	Probation		Output volume measures are workload hours and number of people under supervision.
04	Economic affairs	Output volume measures are deflated expenditure figures for pay, procurement of goods and services, and consumption of capital.	
05	Environmental protection	Output volume measures are deflated expenditure figures for pay, procurement of goods and services, and consumption of capital.	
06	Housing and community amenities	Output volume measures are deflated expenditure figures for pay, procurement of goods and services, and consumption of capital.	
07	Health	Output volume measures are measured directly using • hospital treatments (operations, A&E, outpatient); • GP consultations; • number of prescribed drugs, • dental care; and • ophthalmic care.	Output volume measures are measured directly using • hospital treatments (operations, A&E, outpatient); • GP consultations; • number of prescribed drugs; • dental care; and • ophthalmic care.
08	Recreation, culture, and religion	Output volume measures are deflated expenditure figures for pay, procurement of goods and services, and consumption of capital.	
09	Education	Output volume measures are deflated expenditure figures for pay, procurement of goods and services, and consumption of capital.	
10	Social protection Personal social services	Output volume measures are measured directly using number of adults in care and home help; and number of children in care.	
	Administration of social security	Output volume measures are measured directly for administration and social security using number of housing benefit cases.	Output volume measures are measured directly for administration and social security using number of new benefit claims and maintaining existing benefit claims.

Measuring Productivity: Index Number Approach

Productivity measures attempt to capture the ability of inputs to produce output, usually over time. In general, a productivity index is defined as the ratio of an output quantity index to an input quantity index:

$$A_t = \frac{Q_t}{X_t}$$

for $t = 0,\ldots,T$ and where A_t is a productivity index, Q_t is an output quantity index and X_t is an input quantity index. Each index represents accumulated growth from period 0 to period t.

When X_t comprises a single input, for example, labor or physical capital, A_t is a partial productivity index. The two well-known partial productivity measures are labor and capital productivity. A limitation of partial productivity measures is that changes in productivity may reflect the impact of omitted inputs. For example, increases in labor productivity may be due to increases in the available amount of physical capital (one of the omitted inputs in the measurement of labor productivity) per worker, rather than increases in the underlying productivity of labor.

Index Number Formula

When constructing productivity indices, it is not immediately apparent which weighting procedure should be used to weight output and input quantities when forming output quantity and input quantity indices and on what basis the weighting structure should be chosen. There are numerous index formulae that can be used to construct output and input indices. The Laspeyres, Paasche, Fisher and Törnqvist indices are some of the more widely used index formulae.

Suppose information on the price and quantity of M outputs is available for period $t = 0,\ldots,T$. Denoting the output price and quantity vectors in period t as $p_t \equiv (p^1,\ldots, p^M)$ and $q_t \equiv (q^1,\ldots, q^M)$, the Laspeyres output quantity index (Q_t^L) is defined as follows:

$$Q_t^L = \frac{\sum_{m=1}^{M} p_0^m q_t^m}{\sum_{m=1}^{M} p_0^m q_0^m}$$

$$= \sum_{m=1}^{M} w_0^m \frac{q_t^m}{q_0^m} \qquad (2)$$

Where $w_t^m = \frac{p_t^m q_t^m}{\sum_{m=1}^{M} p_t^m q_t^m}$ is output m's nominal output share. Note that equation (2) shows the

Laspeyres output quantity index is the period 0 share-weighted sum of quantity ratios.

The Paasche output quantity (Q_t^P) index is defined as follows:

$$Q_t^P = \frac{\sum_{m=1}^{M} p_t^m q_t^m}{\sum_{m=1}^{M} p_t^m q_0^m}$$

$$= \left[\sum_{m=1}^{M} w_t^m \left(\frac{q_t^m}{q_0^m} \right)^{-1} \right]^{-1} \qquad (3)$$

The Paasche output quantity index uses period t prices as the weights, in contrast with the Laspeyres output quantity index that uses period 0 prices as weights.

Numerical Example using Different Index Number Formulae

Use the index formulae in equations (2) to (3) above to form productivity measures using hypothetical price and quantity data.

Consider a situation in which an economy produces two outputs, q_t^Y and q_t^Z, using two inputs x_t^Y and x_t^Z, where both output prices (p_t^Y and p_t^Z) and input prices (c_t^Y and c_t^Z) are exogenously determined. Furthermore, suppose information on the prices and quantities of outputs and inputs is available for three periods $t = 0, 1, 2$. This information is presented in Table 4.5.

TABLE 4.5

PRICES AND QUANTITIES OF OUTPUTS AND INPUTS.

	Prices and quantities of outputs				Prices and quantities of inputs			
	p_t^Y	q_t^Y	p_t^Z	q_t^Z	c_t^Y	x_t^Y	c_t^Z	x_t^Z
$t=1$	3	6	3	5	2	6	3	7
$t=2$	3	7	4	6	3	5	3	10
$t=3$	4	8	6	8	6	4	4	14

Learning Methodologies

- Lectures

- Exercise: To understand the types of index formula and address non-additivity problem

Unit 3: Measuring Public-service Output

Learning Objective
At the end of this unit, participants will understand the key principles used to measure public-service productivity and the methodology to it.

Development and Challenges in Methodology
Analysis of public-service productivity, like any other productivity calculation, requires accurate measurements of input and output. Obtaining these for the public sector, however, is much less straightforward than in other sectors. For this reason, this unit focuses on measures of public-sector output (Unit 4 will discuss measures of public-sector input and productivity issues for the sector). The inadequacy of the 'output = input' approach led to recommendations from international bodies such as the UN and Eurostat [7] for the development of measures of non-market output using methods that are independent of expenditure on inputs. Both the System of National Accounts 1993 (SNA93) and European System of Accounts 1995 (ESA95) include recommendations to move toward direct volume measurement (DVM) of non-market outputs for many services, including health and education. In effect, this was the simple solution to the main problem that non-market output, unlike market output, does not have prices that would typically be used to give weight of importance in a growth measurement index. Using this 'output = input' approach, therefore, meant that productivity growth had been assumed to be constant over time. However, recommendations in the SNA93 proposed moving away from this convention of 'output = input' and, consequently, Office for National Statistics (ONS) of the UK changed its approach. In doing so, the UK made faster progress with the post-SNA93 agenda than did most other national statistical institutes.

Understanding Public-service Goods and Services Provided by Government
Government output can be categorized as individual or collective services. Individual services are those provided by the government and consumed by households individually, e.g., school education, social services, and healthcare treatments. Some of these services can also be collective in nature, however, for example, general education and health advice to the population as a whole.

Collective services, on the other hand, are those provided to the society as a whole, such as defense and law and order, where individual households cannot be excluded from the benefits of those services. (Although again, some law and order activities could be classified as individual services, for example, criminal justice interventions for individuals.) Public-service output, whether individual or collective in nature, should be estimated as a volume measure, similar to that for market output in the national accounts. However, the volume measure of public-service output comprises two separately observable characteristics, namely, the quantity of a good or service and the quality of the good or service. For example, two schools may produce the same volume of graduates, but the quality of education in one school may be far superior to the other. The same can be said of healthcare: the volume of operations in two hospitals may be the same, but the quality of the healthcare may be quite different between the two.

CURRENT TREATMENT OF PUBLIC-SERVICE OUTPUT IN NATIONAL ACCOUNTS

In light of the recommendations in the SNA93, European System of Account 1995 (ESA95) and the Eurostat Price and Volume Manual from 1998, the UK National Accounts broke away from the traditional approach of measuring government output. Rather than setting it equal to the expenditure used to produce it, ONS instead introduced direct methods for certain components, in particular health and education. The Atkinson review followed and further changes were made.

At present, General Government Final Consumption Expenditure (GGFCE) is calculated using direct measures for some classifications of the functions of government (COFOG) categories while for others it basically uses deflated inputs. GGFCE is a component of the expenditure measure of GDP and equates to approximately 20% of the total value.

Approximately 63% of GGFCE is calculated using some form of direct measurement and these categories include
- health;
- education;
- social protection (adult social services, children's social services);
- courts;
- fire service;
- prisons; and
- probation.

The remaining output of government, including military defense and central and local government administration, is calculated differently.

Pay for military defense and central government administration is calculated using number of employees, which makes a volume method. For local government administration, pay is deflated using a pay index. Military defense, central government, and local government procurement expenditure is deflated using mainly producer price indices.

Determining Public-service Output

To begin with, it is useful to clarify what is meant by inputs, activities, outputs, and outcomes (see Table 4.6), The Eurostat Handbook on Price and Volume Measures in National Accounts [7] offers

four conceptual approaches by which the volume of public services can be measured: The simple definitions for these terms follow:

- **Inputs** are simply the resources such as labor, goods and services, and capital used to produce activities, output, and outcomes.

- **Activities** describe the processes of producing public-services outputs. These are the goods or services produced by the government. Activities involve the process of producing the public-sector services and measure what the government is doing with the inputs for which it spends money. For example, activities in the healthcare sector include heart and lung operations, physiotherapy sessions, and other interventions. Activities in the education sector include lessons taken by teachers while in the case of the police force, these include the number of patrols carried out. Activities can therefore be a very close measure to output, but nevertheless are not output.

- **Outputs** are the goods or services produced by the government. In the case of public service, services are the main output. A service can be defined as the physical or mental change brought to a good or a person by the activity of the public service provider.

- **Outcomes** are the ultimate goals or objectives sought by the government and the individuals in consuming the public services. For example, improvements in exam results can be regarded as an outcome of education services in the sense that pupils have gained knowledge and human capital. Likewise, a healthier population is an outcome of health services. However, outcomes will also be influenced by external factors that have nothing to do with the government service provided. For example, improvements in exam results may be influenced by greater use of the internet, better health services, better public libraries, or more support from parents.

TABLE 4.6

SECTOR-SPECIFIC EXAMPLES FOR INPUTS, ACTIVITIES, OUTPUTS, AND OUTCOMES.

Public service	Inputs	Activities	Outputs	Outcomes
Health	• Labor and skill of doctors and nurses • Prescription drugs and other medical supplies • Hospitals, clinics, and other buildings	• Operations carried out • Drugs administered • Advice given	Healthcare: a change in physical capability or additional health knowledge, proxied by health treatments	• Better quality of life (more social interaction, mental well-being, etc.) • Longer life • Enhanced employment prospects
Education	• Labor and teaching skills of teachers and support staff • Teaching aids, gas, and water • Buildings and computers	• Lessons taught • Homework marked • Guidance given	Additional knowledge and skills imparted, proxied by full-time equivalent number of students effectively attending lessons	• Better job/earning prospects • Improved citizenship • Enhanced life skills • Enhanced health and nutrition knowledge
Social care	• Labor of staff processing claims, welfare officers • Stationary and meals • Buildings and equipment	• Accommodation provided • Cleaning and catering services • Equipment provided • Advice given and assessments made	Social care: a change in physical or mental state, proxied by care weeks	• Better quality of life (more social interaction, safer mental wellbeing)

The new direct measures implemented to measure public services are cost-weighted activity measures. Examples of direct output measures currently used to measure volume output of public services include the following:

- Health volume output measured by cost weighted activity index of public hospital activities (e.g., the number of emergency room consultations or the number of operations), and family health services (e.g., the number of physician consultations, prescriptions, sight tests, or dental treatments)

- Education volume output measured by pupil attendance adjusted for quality by a fixed factor of 0.25%

- Administration of social security volume output, measured by the number of benefit claims for the 24 largest benefits

- Volume output of fire services measured by number of fires, number of incidences attended (special services), and fire prevention, which is indirectly measured using the input method

Volume Measure of Output

Government output is not traded in the market but is provided either free of charge at the point of delivery (and paid indirectly via taxes), or at a nominal price that is not intended to cover the full cost of production. The lack of a market environment where the price mechanism operates to match demand and supply of output creates problems in measuring the volume, quality, and value attached by consumers to public-sector services. The absence of prices for non-market output, however, should not imply that consumers do not value government services or that such services do not add to consumers' and society's welfare. In the absence of market prices, broadly speaking there are therefore only two options for measuring government output in constant volume terms:

- The indirect volume method: deflating inputs (the outputs = inputs method)

- The direct volume method: counting the outputs

Indirect Output Volume Method

The input method is the 'indirect method of measuring output. Prior to 1998, the indirect method had been the traditional approach used in the national accounts of many countries. It is the 'output = inputs' convention, where it is assumed that the output of public service is equal to whatever was spent by government and public authorities. The convention had been adopted because of the complexity of measuring output directly.

Direct Output Volume Method

International guidelines now favor the adoption of direct output methods as the most preferred approach to measuring the volume of government output. This is the recommendation of the SNA93, the Eurostat Handbook [7], and most recently the UK's Atkinson Review (see later sections for details from the Review) [3–4]. The guidance from the Eurostat Handbook was reinforced by a European Commission decision in 2002 that has the force of law in Europe. It requires all member states to have moved to direct measurement of output for individual services by the time of the national accounts covering 2006. The Eurostat Handbook classifies the different methods of public-sector output according to what are termed as A, B, and C methods (see Table 4.7):

- A methods are the most appropriate.

- B methods are methods that can be used where it is not possible to apply an A method.

- C methods are methods that should not be used.

TABLE 4.7

EUROSTAT HANDBOOK RECOMMENDATIONS FOR GOVERNMENT OUTPUT.

Type of service	A/B/C method
Individual services such as education, health, social security, recreation, and cultural services	**A methods:** These use an output indicator approach where the indicators satisfy the following criteria: a. They should cover all services provided. b. They should be weighted by the cost of each type of output in the base year. c. They should be detailed as possible. d. They should be quality adjusted. **B methods:** These use an output indicator approach where the criteria are not fully satisfied. For example, the level of detail could be improved or the measure does not take into account changes in quality. **C methods:** These methods apply if input, activity or outcome is used (unless outcome can be interpreted as quality-adjusted output) or if coverage of output method is not representative.
Collective services such as general public administration, defense, police, and research and development	The approach is broadly the same as in the case of individual services, but for the following: **B methods:** Input methods are B methods, as are the use of volume indicators of activity. If input methods are used, they should estimate the volume of each indicator separately, taking quality changes of inputs into account. Applying productivity or quality adjustments to the sum of the volume of inputs is not recommended. **C methods:** The use of a single input volume indicator is not a B method.

Measuring the Quality of the Volume of Public-service Outputs

Volume measure for any good or service consists of two components, quantity and quality. A high-quality service is clearly worth more than a low-value service, and vice versa. In addition to measuring the quantity changes of output over time, the public services need to be adjusted for changes in quality over time. Quality measurement is an important but challenging component of public-service volume output measurement.

Adjusting Quality Change in Products

One technique to deal with quality change in products is to group them such that only products of the same specification are compared over time or in space. Such grouping or matching ensures that only prices or quantities of products of the same or very similar quality are compared. The idea is that products of different qualities are treated as different products. Examples for such grouping in education are establishments that provide different services in addition to education, such as boarding schools as opposed to day-time schools. In healthcare, examples are hospitals with different levels of non-medical services. The conceptual understanding of quality changes is explained in the box below.

TECHNIQUE OF DEALING WITH QUALITY CHANGE

A straightforward technique of dealing with quality change in a price or volume index is to match models, i.e., to compare only prices or quantities of products that are tightly specified. In other words, products are treated as different products whenever their characteristics are different. The more specific the characteristics of a particular products, the less likely it is that a modification of the product goes unnoticed and that a change in quality is not recognized as such. Such implicit quality-adjustment is well adapted when the set of products observed is stable and when it is representative for the universe of products. It may, however, be insufficient, when products change, when there are substitution processes between new and old products, and when there are no markets or when existing markets operate imperfectly. This is best illustrated by way of an example. A quantity index is used here but the same points could also be made by way of a price index that is subsequently used to deflate values.

Suppose, there are two treatments for a disease, traditional surgery and laser treatment, and assume that laser treatment is introduced in period 1. In addition, as may well be the case, the unit cost of laser treatment is lower than the unit cost of traditional surgery. The total number of interventions in each period remains the same.

	Traditional surgery			Laser surgery		
	Period 0	Period 1	Period 2	Period 0	Period 1	Period 2
Unit cost	100	100	100	-	90	90
Number of interventions	100	40	5	0	10	45
Total cost	5,000	4,000	500	0	900	4,050

Now consider a simplified matched-model approach towards calculating a volume change from period 0 to period 1. In the simplest case, the volume index is given by the quantity changes in the two treatments, each weighted by the cost share it occupies in period 0. As laser surgery does not yet exist in period 0, it receives a zero weight, so the volume index of treatments is simply the change in the number of traditional surgery inventions, or $(40/20-1) = -20\%$. Between periods 1 and 2, the corresponding volume index equals $\{(s_T(5/40)+s_L(45/10)\}-1=7.1\%$, where $s_T=82\%$ and $s_L=18\%$ are the period 1 cost shares of the traditional and laser treatments, respectively. This approach treats the two treatments as different products. The sharp drop in the total volume index in period 1

reflects the 'new good' problem that arises when new products enter the sample that cannot be compared with quantities in the base period. The implicit assumption in this model is that consumer valuation of the two products is captured by the relative unit costs, so if laser surgery is cheaper than traditional surgery, the method implicitly quality-adjusts downwards the quantity of laser surgery when combined with tradition-al surgery. In a perfect market, the price of the traditional treatment would see an instantaneous downward adjustment, bringing consumer valuation of the two process-es in line.

A different result arises when it is considered that the two treatments are perfect substitutes, i.e., they are in fact the same product. In this case, no cost weighting is applied between the two treatments and the number of treatments is simply added up. As there are 50 interventions in each period, the result is a volume index that shows zero growth and a declining price index, reflecting the drop in average unit costs of treatment.

The previous method is justified if consumers are indifferent to the two treatments. If that is not the case, and they prefer laser over traditional surgery because the former is less intrusive or requires fewer days of recovery, an explicit quality-adjustment is needed. Such an adjustment can be applied to the quantity measures, either by scaling up the quantity of laser treatments or by scaling down the quantity of traditional treatments. Whichever way this is done, the implication is always that one treatment is expressed in equivalents of the other, and the ratio should in some way reflect consum-er preferences. Alternatively, prices or unit costs could be rescaled before constructing a price index. Suppose the adjustment factor is 1.1, i.e., each laser treatment is the equivalent of 1.1 traditional treatments. Then, expressed in 'traditional surgery-equiva-lents,' the number of treatments is 50 in period 0; 40+10*1.1=51 in period 1; and 5+45*1.1=54.5 in period 2. The resulting volume index is +2% in period 1 and +6.9% in period 2. Obviously, the difficulty lies in determining the adjustment factor which should 1) reflect consumer preferences; and 2) be unidimensional. Much of this Hand-book is actually devoted to the identification and measurement of such adjustment factors. (Note that the above example is simplified to make the central point about substitution. The result of −20% is actually only a lower bound to the Laspeyres Index because strictly speaking the volume index is undefined.)

Steps in Capturing Quality Change

The first step toward capturing quality change is the correct stratification, i.e., the comparison of products with the same or at least similar characteristics. However, matching of services has its limits when comparable products do not exist in comparison periods. Care must be applied in defining products to be compared so as to capture effects of substitution (see Box) without, however, treating goods or services as substitutes that are in fact different products (such as health treatments specific to particular parts of the population). Second, for the process of quality adjustment of the quantities or prices of output, it may be necessary to invoke outcomes, because characteristics that matter for consumers have to be identified for quality adjustments. Thus, it may be necessary to look beyond the strict national accounts production boundary if one wants to deal with quality change in health and education services.

THE MEANINGS OF 'OUTCOME'

Outcome has been used in different ways in the relevant literature on health services. Two usages are common:

In the healthcare literature, outcome is typically defined as the resulting change in health status that is directly attributable to the healthcare received. Triplett [8] indicates this usage in the cost-effectiveness literature and quotes Gold, et al., who define a health outcome as the end result of a medical intervention, or the change in health status associated with the intervention over some evaluation period or over the patient's lifetime. Employed in this sense, some authors suggest that the output of the healthcare industry be measured by outcome.

Among national accountants, outcome is typically used to describe a state that consumers value, for example, the health status without necessarily relating the change in this state to the medical intervention. For example, Eurostat (2001) gives as examples of 'outcome indicators' the level of education of the population, life expectancy, or the level of crime. Atkinson [3] has the same usage of the word. Understood in this sense, outcome in itself cannot be a useful way to measure output or the effectiveness of the health or education system. In terms of national accounts semantics, the 'marginal contribution of the healthcare industry to outcome' is the equivalent to the notion of 'outcome' as used in the healthcare literature.

As long as a particular definition is used consistently, the substance of the argument is of course unaffected and the only question is the usefulness of one definition or the other. As the present handbook follows in the line of Eurostat [7] and the Atkinson Review [3], it also employs the term 'outcome' in the sense of the national accounts literature.

Quality Adjusted Volume Measures of Output

For government services, a proper measurement of volume output changes requires capturing changes in quantity as well as quality. In the context of measuring output volume, it is useful to refine the broad distinction between inputs, outputs, and outcomes in two ways. First, outputs are broken down into two components: activities or processes and the quality adjustment applied to them.

Next, outcomes can be broken down into direct and indirect outcomes, the distinction being that direct outcomes are closer to the act of service provision than indirect outcomes. However, in line with the discussion above, neither direct nor indirect outcomes are measures of services. For example, in the case of education, a direct outcome is the state of knowledge of a population of pupils, estimated by scores or degrees achieved. The indirect outcomes associated with education are employment possibilities and enhanced real earnings due to better education, or GDP growth as a consequence of enhanced human capital. Indirect outcomes associated with health services are fewer working days lost due to diseases, or individual wellbeing. These distinctions between activities, quality adjustments, and direct and indirect outcomes are shown in Figure 4.2. The figure also depicts the scope of national accounts measures which are defined via the production boundary. However, as explained above, information about outcomes, in particular about the contribution of health and education services to health and education outcomes, can provide a tool for explicit quality adjustment of processes or activities.

FIGURE 4.2

INPUTS, OUTPUTS, AND OUTCOMES.
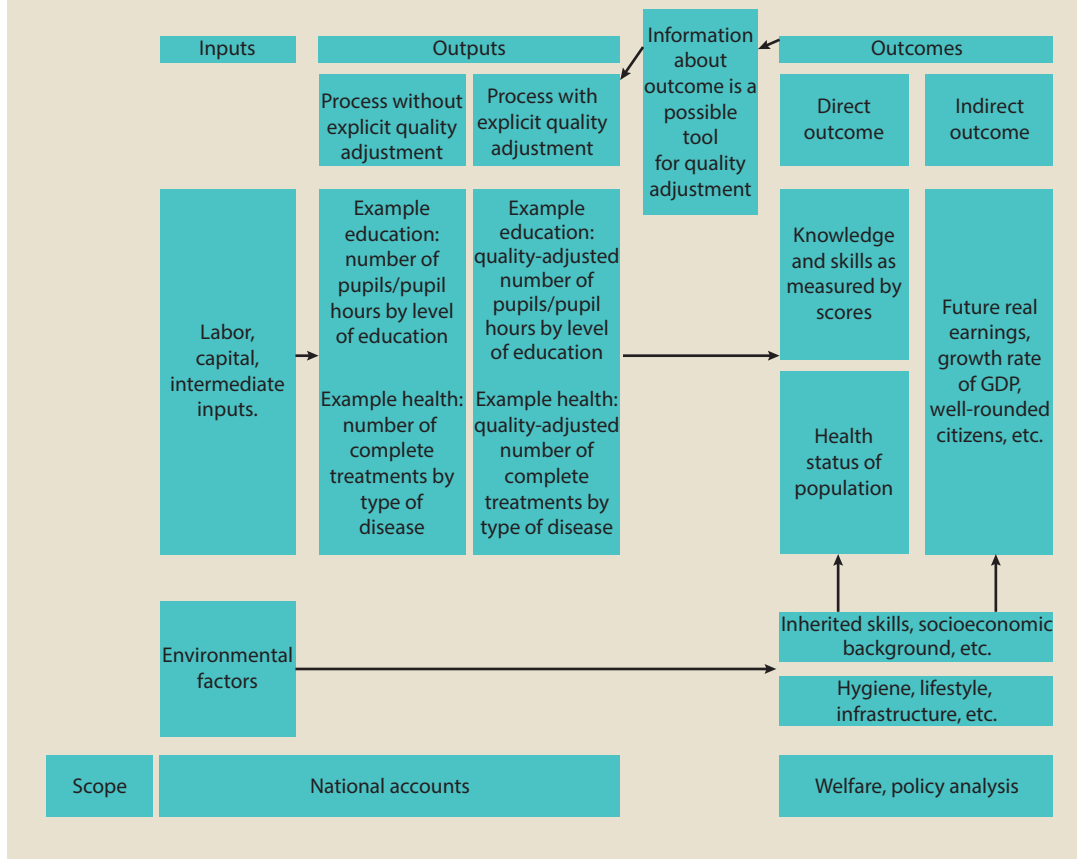
Linking Output and Outcome

Thus, one possibility to deal with the aggregation problem is to subsume several characteristics into a single indicator that reflects the contribution of the product to outcome. For example, in case of healthcare, Triplett [8] suggests quality-adjusted life years (QALYs) as a single dimensional measure that could be used for the quality-adjustment of different treatments.

The box below illustrates the use of exam results for quality change in education.

USE OF EXAM RESULT TO INCORPORATE QUALITY CHANGE IN EDUCATION

The most frequently invoked explicit quality adjustment to pupil hours or to the number of pupils taught is on the basis of exam scores. The applicability of this method of quality adjustment will depend on the level of education. For example, there is little point in recommending the use of exam scores for the quality adjustment of pre-primary education. For tertiary education, several possibilities exist, including the use of scores and the use of future real earnings. For secondary education, an important quality component of the output is how much a school can be expected to contribute toward attaining knowledge and skills. Also, data on exam scores may provide a conceptually correct and empirically feasible option for explicit quality adjustment.

Volume Output Index: Aggregating all Output

To calculate the total output of a particular functional measurement area of the government, for instance healthcare (See Table 4.8), the volume outputs of various health services have to be measured at a disaggregated level and then added up. Adding up quantities in volume terms would require complete homogeneity of services or products, which is not possible even within functional areas, let alone across different functional areas. For example, the quantity of heart operations and physiotherapy sessions in a government healthcare service cannot be added together for the simple reason that they are not like for like. For this reason, heterogeneity of outputs as a weighting mechanism is required to aggregate the different output quantities together. The market sector also faces the same issue in aggregation. For example, measuring the output of the automobile industry requires a weighting mechanism to aggregate the volume of all the various models of cars together.

TABLE 4.8

ONS PROGRAM OF DIRECT GOVERNMENT OUTPUT MEASURES.

Function	Percentage of government spending in 2000	When were output measures introduced	Main components of existing output indicator
Health	30.3	1998	Department of Health Cost-weighted activity index
Education	17.1	1998	Pupil numbers with 0.25% quality adjustment
Social protection: social security administration	2.7	1998	Number of benefit claims for 12 largest benefits
Public order and safety: prisons, courts, and probation	3	2000	Number of prisoner nights, number of court cases and cost-weighted activity index for probation
Public order and safety: fire	1.1	2001	Number of fires attended of different types; other special service
Social protection: personal social services	7.4	2001	Number of adults and children in care Number of hours of home help

Source: Atkinson [3].

The purpose of a weighting mechanism is to convert the different output quantities into the same value units (which can then be aggregated) in a way that accounts for the economic importance of the good or service. In the market sector, the prices of the goods or services are used to weight the volume of the non-homogeneous commodities together. In the non-market case, prices are not available and the method recommended by the Eurostat Handbook is to use the unit costs to weight the outputs together. Use of unit costs leads to producer valuation of public services as opposed to valuation by recipients or society.

Weighting Mechanism: Cost Weights

Productivity measurement theory favors cost weights for output measures and there are also pragmatic reasons for this choice. Cost shares have the significant advantage of greater measurability than utility-based weights. In addition, using the cost shares as an imputation for the revenue shares of non-market output implies that the equality of total costs and total revenues at current prices is kept during every accounting period. This is in line with a principle of national accounts for the measurement of non-market output that stipulates that the value of non-market production equals the value of its inputs. If a different valuation of outputs were used, the total value of non-

market production would not in general equal total costs. While this may not be a problem as such, particularly when non-market production is viewed from a pure welfare perspective, it poses a practical issue of dealing with an additional item in the national accounts, called 'social surplus' or 'social loss' arising from non-market production.

PRICE INDICES, UNIT COST INDICES AND VOLUME INDICES

When a volume change has to be measured, this can in principle be achieved in two ways, by dividing the change of a value by a price index (deflation) or by directly constructing a volume index. A volume index is a weighted average of quantity changes of individual (homogeneous) products where the amount spent on each service provides the weight. In practice, statisticians lean towards deflation methods because the sampling for a price index is easier to undertake than for a volume index (prices tend to follow more similar trends than volumes) and because it is easier to deal with exiting and entering products.

In a non-market context, things are more complicated. Price indices may not exist or may not be meaningful for deflation when there are no economically significant prices. Also, value measures of output are typically the sum of costs. In such a case, direct volume indices constitute a valid option and have been used in statistical practice. Alternatively, unit cost (costs per unit of output) can be constructed for purposes of deflation. In this case, unit costs or the total costs of a particular product divided by the number of products of the same type become a substitute for prices. Note that applying a unit cost index to a change in the value of non-market production (which equals total costs) is equivalent to constructing a volume index directly. The present handbook uses the expressions 'unit cost index' and 'quasi price index' interchangeably.

Learning Methodology

1. Exercise: compute output index

2. Overview of countries' practices measuring education and healthcare output

3. Methodology notes: annual chain-linking, ONS

Unit Technical Resources

1. How to Measure Government Productivity: A Review Article on 'Measurement of Government Output and Productivity for the National Accounts' (The Atkinson Report)

2. The Eurostat Handbook (Handbook on Price and Volume Measures in National Accounts, 2001)

3. Towards Measuring the Volume Output of Education and Health services – A Handbook, OECD

4. UK Centre for the Measurement of Government Activity: Total Public Service Output, Inputs and Productivity, UK Office of National Statistics [4, 5]

Unit 4: Measuring Public-service Input

Learning Objectives

At the end of this unit, participants will understand and know how to create volume input index to measure public-sector productivity.

Introduction

Inputs are composed of labor, procurement of goods and services, and capital inputs used in delivering public services.

Different Methods for Creating an Inputs Volume Index

There are three main methods that are used to create volume inputs:

1. The first method involves collecting aggregate raw expenditure data and then deflating this by a gross domestic product (GDP) deflator. This is the simplest method for calculating inputs as it only requires two pieces of information and does not require broken down information. However, it is not a desirable method as it violates several criteria for a good deflator (as outlined in Atkinson Review), so is in turn less likely to yield accurate results. In particular, there is no disaggregation in this method, which means all components of inputs are deflated by the same deflator even if they are different.

2. The second method is more complex and involves collecting expenditure data broken down by areas such as labor, goods and services, and capital, and then deflating this data by specific deflators related to both the service area and input components. This allows a better fulfillment of Atkinson's homogeneity criteria as it splits the service area into categories that encompass similar things. It allows the deflators to be tailored more closely. For example, labor can then be deflated using a pay deflator such as the index of labor cost per hour or wage index.

3. The third method involves collecting direct labor inputs, which is the most complex of the three methods. Direct labor inputs require that actual workforce numbers and average salaries are collected for a detailed breakdown of staff types, which means that deflators aren't needed as the data accurately represent the volume change in labor inputs in the sector. This method is used in education and healthcare. This is often difficult to do in practice as many service areas don't have a compulsory collection of staff numbers and salaries broken down into separate categories.

Why Deflate

Deflation is vital when calculating productivity as it removes the price effect from the calculation of input volumes. As we use expenditure data when calculating inputs, it means that price changes and volume changes are both present in the raw data. Deflation ensures that productivity change is driven only by changes in the volumes rather than price changes.

Application of a Deflator

We apply a deflator to raw expenditure data. The first step is to convert the raw expenditure data into an index then ensure that the deflator is also in index form. The next step is to divide the expenditure data index by the deflator index to give a volume index of inputs at constant prices. In our education processing, the team uses a slightly different method that involves using the growth rates of the deflators and expenditure weights to construct a productivity index as this helps to overcome an issue with the year in which the deflators are based.

Quality of a Deflator

The Atkinson Review suggested nine components of quality when looking at government deflator, as shown in Table 4.9.

TABLE 4.9

NINE COMPONENTS OF A DEFLATOR QUALITY.

Criteria	Description
Comprehensiveness	The set of deflators should cover all components of expenditure to be deflated.
Coverage	The individual deflator should relate to all expenditure on the individual item to be deflated.
Relevance	The deflator should correspond to the expenditure item to be deflated.
Sustainability	The deflator should be available for the foreseeable future, and for a reasonable number of periods in the past.
Homogeneity	Deflation should be carried out at a level of disaggregation that maximizes homogeneity of items within a category.
Timeliness	The deflator should be available in good time after the end of the reference period.
Periodicity	The deflator should be available on a quarterly basis.
Quality change	Where changes in characteristics of a good/service occur, price indices should reflect pure price changes only.
Availability of cost weights	Corresponding weights (of the same periodicity) for deflators should also be available.

However, these criteria create tradeoffs when deciding on a deflator to use for productivity estimates. This is illustrated in the differences between national annual total public-service productivity estimates and quarterly public-service productivity estimates. For example, some annual measures prioritize coverage and homogeneity to ensure that the most accurate and representative estimates of productivity are produced. On the other hand, some quarterly estimates focus on the timeliness of deflators to allow the data to be published with only a two-quarter lag compared to the much longer lag associated with the annual figures.

Different Types of Deflators

There are three different types of deflators as outlined below.

1. The first type of deflator is an implied deflator. An implied deflator is one that is calculated by dividing current price expenditure by constant price expenditure data. This type of deflator is used for most of our capital calculations and is also used as an overall deflator for the defense service area. Using an implied deflator is not a favored method as it requires a constant price series to already exist which is often not specific to the service or expenditure type.

2. The second type of deflator is constructed from a variety of price indices. This is used in the police goods and services deflators. When constructing a single deflator index, this method combines many individual indices using matched expenditure shares by allowing deflators for specific goods and services consumed to be accounted for. This improves the value of the deflator when compared to Atkinson's criteria for a quality deflator.

3. The third type of deflator is when a single price index is used for deflation. An example of this is the index of labor costs per hour (ILCH), which is used in areas such as children's social care, social security administration, and public order and safety, when deflating the raw expenditure data for labor in these service areas.

Capital Measurement
Capital Consumption Measures
Capital consumption usually accounts for a small proportion of overall expenditure within the individual service sectors. For example, the majority of the UK Government expenditure data relating to capital is taken from the national accounts perpetual inventory model. However, in calculating education, the UK Government uses the volume index of capital services and healthcare using HM Treasury Public Expenditure Statistical Analyses (PESA) data. Also, the UK does not disaggregate defense or other, so information on the measures of specific capital volume inputs do not apply to them. In the UK Government statistical measures, there is also no capital component for children's social care where the capital element is assumed to be zero, meaning there is only measurement for labor and goods and services (see Table 4.10).

TABLE 4.10

THE UK GOVERNMENT STATISTICAL MEASURES.

	Labor	Goods and services	Capital
Health	Direct labor inputs used so no deflation	Health Services Cost Index (ONS adjusted by subtracting some capital items and converting to Paasche index) and Price Cost Index (converted to Paasche index)	Implied deflator
Education	Direct labor inputs used so no deflation	Uses a variety of SPPIs, PPIs, RPIs and internal ONS data matched to expenditure data to deflate at a low level	Volume index of UK capital services
Adult social care	Weighted yearly pay increase for LA covering adults	"Other: CPI Independent: Independent Sector Social Care Price index (Index 4 from DH)"	Implied deflator
Children's social care	Index of Labor Costs per Hour (ILCH)	Constructed index using the same deflators used in Police but with children's social care specific expenditure data	Capital assumed to be zero so no deflator necessary
Social security administration	ILCH	RPIx	Implied deflator
Public order and safety	ILCH	RPIx	Implied deflator
Police	Police service full time equivalent (FTE) workers multiplied by Average pay (mean). This creates a price index that allows us to map the changes in police salaries	Constructed index using PPIs, SPPIs, GDP, and RPI, split into appropriate groupings, e.g., SPPI for print services and stationary are grouped together, matched to expenditure data	Implied deflator
Defence	Not disaggregated, Final consumption expenditure deflated using an implied deflator		
Other	Not disaggregated, final consumption expenditure deflated by GDP		

Deflators for Capital Consumption

The UK Atkinson Review specifies that due to the small expenditure on capital consumption for each function, specific deflators were unavailable. So, for capital consumption, a generic implied deflator for central and local government was used. An implied deflator is a deflator that is calculated using the current price and constant price or chained volume measure expenditure data to create a deflator. This method is not recommended where viable deflators that are unrelated to the expenditure values are available. This is because implied deflators mean that productivity will appear constant across the series due to circularity within the data. However, as capital contributes such a small proportion of overall productivity growth, then using an implied deflator is deemed acceptable. Another reason why implied deflators are deemed appropriate for capital is because of the difficulty of finding a suitable deflator for each service area due to the variety of things within capital.

Compiling the Estimates of Capital Stocks and the Consumption of Fixed Capital

Estimates of capital stocks and the consumption of fixed capital are based on gross fixed capital formation (GFCF) estimates, which come from sample surveys and administrative sources. All estimates are calculated using the Perpetual Inventory Method (PIM), an economic model that enables balance sheets to be calculated from the associated investment flows. It does this by accumulating past purchases of assets over their estimated service lives to estimate a gross capital stock measure. The PIM uses constant price (KP) GFCF data to estimate the value of capital stocks and is in use in the UK Government. As the capital stock in a particular time period is a cumulative sum of investment over many time periods, the effects of price changes must be removed from the GFCF estimates before summing over the time periods, which is why the PIM uses KP GFCF data. Chain volume measures (CVMs) are not used in the PIM, as these are not additive, except from the reference year onwards.

No asset will last forever, so estimates of the average life length of each asset are used to determine when assets should be removed or retired from the capital stock. This provides a good estimate of the levels of capital stocks in the economy over time and the amount of consumption of fixed capital each year.

Assets also depreciate in value over their lifetime. In the UK Office of National Statistics PIM, assets are assumed to depreciate at a constant rate, until their value is zero at the end of their life. However, in practice, assets will not be available for use for this exact period of time, as some assets will not last as long as the average life length, while others will last longer.

Table 4.11 shows the inputs to the PIM function and how they have changed since the previous publication. ONS plans to fully review the PIM and its inputs as part of a project that commenced in 2014.

Calculating the Volume of Input

Figure 4.3 shows how gross stocks are calculated using the PIM. The cumulative sum of net investment in assets (GFCF), i.e., the capital stock is calculated by adding investment in this period to the capital stock in the previous period and subtracting the value of assets that have reached the end of their useful life or that have been scrapped as a result of bankruptcy. The PIM replicates this process for each industry and asset combination for every year of data in the model.

Figure 4.4 shows how net stocks are calculated. This is also a stock measure and estimates the value at the end of the year. The same process that is used for the estimation of gross stocks is used.

TABLE 4.11

INPUTS TO THE PIM (UK GOVERNMENT EXAMPLE).

Input	Explanation
Gross fixed capital formation (GFCF)	Estimates of net (i.e. the cost of acquisitions less the proceeds from disposals) investment in assets used in the production process for at least a year
Life length mean	Estimates of the average (mean) life length for each year's investment; that is an estimate of how long, on average, an asset is expected to be used in the production process
Life length coefficient of variation (cv)	Estimates of the cv of the life length for each year's investment (used to normally distribute retirements of an asset around its average life length), i.e., to account for the natural variation of asset life lengths around the mean value
War adjustment	A series containing a war adjustment factor to 1942 data
Bankruptcy	The percentage of companies that went bankrupt each year
Scrappage	Estimates of the percentage of assets prematurely scrapped each year because they could not be sold following bankruptcy

FIGURE 4.3

GROSS STOCK CALCULATION.

GFCF this period $+$ Last year's gross stock $-$ Assets at end of life $-$ Loss from scrappage $=$ Gross stock

However, an additional component for depreciation, for example, from wear and tear, is subtracted from the gross value. This can be thought of as the quantity of assets 'used up' in a year. At the end of an asset's service life, its whole value has been 'used up,' and it no longer contributes to the net (or gross) stock level.

FIGURE 4.4

NET STOCK CALCULATION.

GFCF this period $+$ Last year's gross stock $-$ Assets at end of live $-$ Loss from scrappage $-$ Amount of assets used up $=$ Net stock
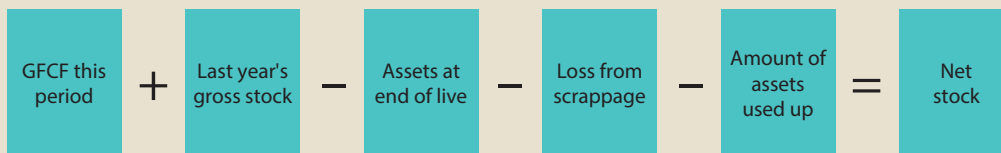
The consumption of fixed capital is an estimate of a 'flow.' It represents the change in the value of assets during the year. Figure 4.5 shows that it is made up of the sum of transfer costs (costs associated with purchasing or disposing of an asset) from GFCF, the depreciation or loss in value

of assets due to usual wear and tear as well as the value of assets lost when companies go bankrupt. This value is calculated for each year within the model.

FIGURE 4.5

CONSUMPTION OF FIXED CAPITAL CALCULATION.

GFCF: Transfer costs	**+**	Amount of assets used up	**+**	Assets lost due to scrappage	**=**	Consumption of fixed capital
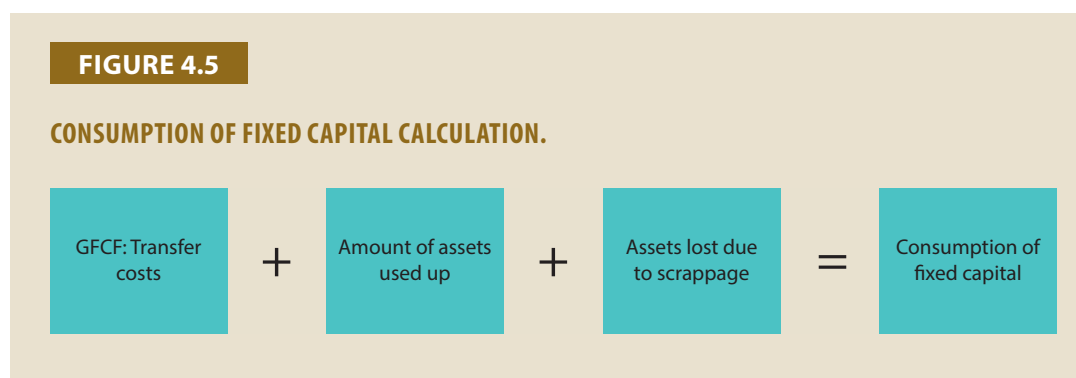
Definition of Terms

The System of National Accounts 1993 (SNA1993) and the European System of Accounts 1995 (ESA1995) manuals provide formal definitions of terms used within the national accounts. The Measuring Capital 2009 manual also describes some of the terms below. The following terms are used within the article:

1. **Capital stocks** represent the value of all fixed assets used in production in the economy that are still in use, such as machinery, dwellings, and intangible fixed assets such as software.

2. **Economic assets** are a store of value representing the benefits the economic owner will get by holding or using the asset over a period of time.

3. **Fixed assets** are non-financial items, which are used repeatedly in the process of production for more than one year. Examples include a machine on a production line or software used in production.

4. **Gross capital stocks** tell us how much the economy's assets would cost to buy again as new, or their replacement cost. All of the fixed assets in the economy that are still productive and in use are added up to calculate this, regardless of how old they are or how much they may have deteriorated since they were first used. This measure shows the value at the end of the quarter or year. This is mainly calculated as an intermediate step towards net capital stocks but individually provides a broad indicator of the productive capacity of a country.

5. **Net capital stocks** show the market value of fixed assets. The market value is the amount that the assets could be sold for, which will be lower than the value of gross capital stocks. This reflects the fact that the assets would have had some wear and tear compared to a new asset. This measure shows the value at the end of the quarter or year. This measure is used in preference to gross capital stocks as it provides a valuation of assets in the economy after depreciation has been removed.

6. The **consumption of fixed capital** is the decline in the value, or depreciation, of fixed assets in the economy over a time period. The decline in value can be due to wear and

tear, assets no longer being used, or normal accidental damage. It can also be described as the quantity (or value) of the capital stocks, which is used up in that period. While these data are interesting, their primary purpose is to move from various gross measures of economic flows to the corresponding 'net' variable, in particular for production and income (net domestic product, net value added) and a number of demand variables such as net investment.

7. **Gross fixed capital formation** (GFCF) is the acquisition minus disposals of produced fixed assets, i.e., assets intended for use in the production of other goods and services for a period of more than a year. Acquisition includes both purchases of assets (new or second-hand) and the construction of assets by producers for their own use. New buildings and dwellings, and major improvements to buildings and dwellings are included in GFCF, but the acquisition and disposal of existing buildings are not.

Learning Methodologies

• Lectures

• Good practice examples

• Exercises: compute and analyze the use of three types of input deflators methods

Additional Resource

See [12] under References.

Unit 5: Measuring Total Public-service Productivity

Learning Objectives

At the end of this unit, participants will understand and know how to measure and analyze public-service productivity.

Total Productivity Growth in Public Service

The productivity index is derived by dividing the index of output by the index of inputs and multiplying by 100. Productivity change is then calculated using the periodic growth in this index. These estimates provide information relevant to the measurement of the efficiency with which public services are provided. However, they do not provide direct information on how far, if at all, public-service productivity is below best practice (which would require systematic quantitative measures of best practice), or on how much of any productivity change is due to changes in the way services are provided (which would require an estimate of what would have happened if the changes had not been made).

Contributions to Growth

As with output, the fastest growing individual services do not necessarily make the biggest differences to the total inputs growth of all the services, because they may only account for a small share in the total.

A Recent Look at UK Public-sector Productivity Trends

Since 2008, the UK Office of National Statistics has documented a strong increase in public-sector productivity, as show in Figure 4.6 [3, 11].

FIGURE 4.6

UK PUBLIC SECTOR'S PRODUCTIVITY TRENDS.
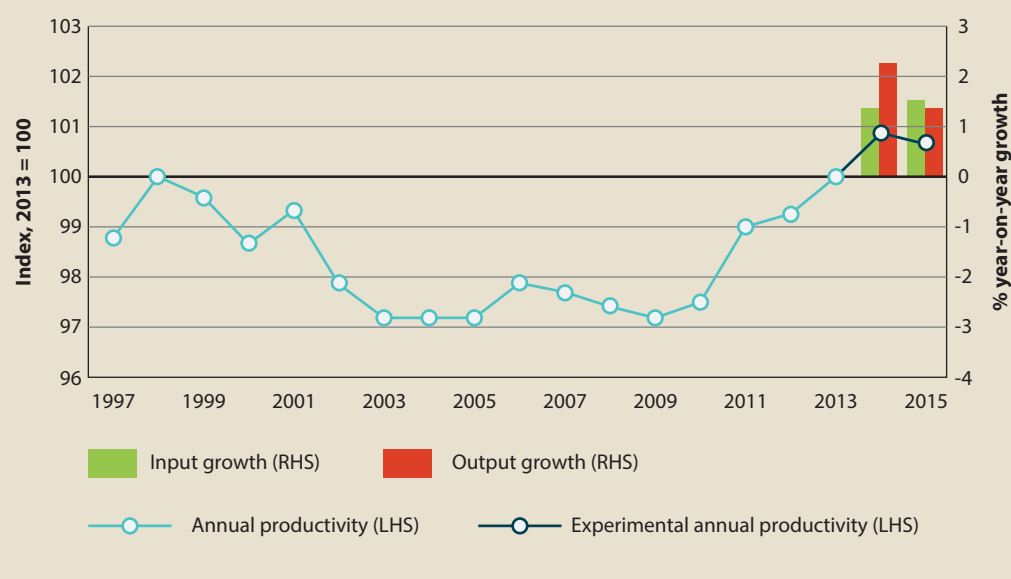
Productivity Growth Varies by Service

Table 4.12 shows the index of productivity for each service and for total public services. The last row of the table shows the annual growth rates over the whole period.

TABLE 4.12

INDEX OF PRODUCTIVITY BY SERVICES.

	Healthcare	Education	Adult social care	Social security admin.	Children's social care	Public order and safety	Police	Defence	Other	Total
1997	100	100	100	100	100	100	100	100	100	100
1998	99.5	101.7	101.7	103.3	113.4	105.8	100	100	100	100.9
1999	100	104	97.7	95.1	115.7	97.9	100	100	100	100.7
2000	99.5	104.1	96.6	88.9	123.7	90.8	100	100	100	100.2
2001	100.6	101.5	96.1	98.5	130.1	94.6	100	100	100	100.5
2002	98.6	99.3	95.3	97.3	128.4	88.2	100	100	100	99.1
2003	97.1	99.1	91.5	79.4	122.4	85.8	100	100	100	97.7
2004	97.1	97.5	89.4	88.5	116.4	79.6	100	100	100	97.1
2005	97.1	96.8	89.8	80.8	114.7	78.6	100	100	100	96.7
2006	98.6	96.5	90.8	93.6	107.9	80.6	100	100	100	97.4
2007	98.3	96.8	89.7	102.3	108.5	81.9	100	100	100	97.5
2008	97.7	95.7	84.7	107	101.9	81.4	100	100	100	96.7
Mean %	−0.2	−0.4	−1.5	0.6	0.2	−1.9	0	0	0	−0.3

An analysis of Table 4.12 indicates that

- productivity rose slightly in children's social care, by 1.9%, an annual average rise of 0.2%, solely on the basis of what has happened in the looked-after children's sector, because the rest is indirectly measured and has a neutral effect on productivity;

- productivity in social security administration rose by 7% over the period, an annual average rise of 0.6%;

- healthcare productivity fell by 2.3%, an annual average fall of 0.2%;

- education productivity fell by 4.3%, an annual average fall of 0.4%;

- adult social care productivity fell by 15.3%, an annual average fall of 1.5%;

- public-order-and-safety productivity fell by 18.6%, an annual average fall of 1.9%; and

- for police, defense and 'other' services, productivity was unchanged since 'output=inputs.'

Contribution to Growth

Productivity of a government service can be analyzed by the type of the service's contribution to public-service growth. Figure 4.7 illustrates how much each service contributed to the total change in productivity between 1997 and 2008, taking account of both how much productivity in the service itself has changed and how important the service is in the total:

- Adult social care accounted for the largest share of 1% to the overall fall of 3.3%, though this may reflect the fact that the measure is not quality adjusted.

- Public order and safety contributed 0.9%. Again, the existing measures in this area are relatively undeveloped and some of this fall may reflect the difficulties in constructing the output measures.

- Education contributed a fall of 0.8%, more or less in line with its expenditure share.

- Healthcare contributed a fall of 0.7%, less than in proportion to its share of expenditure, reflecting the fact that healthcare productivity has fallen less than the public-service average.

- Children's social care, using the new measure makes no difference to overall productivity.

- Social security administration offset the overall fall by 0.1%. Its small share in spending offsets the rather larger percentage rise in productivity.

Police, defense, and others all make no contribution to overall productivity change because, by definition, productivity in these areas cannot change.

A Close Look at Healthcare Service

Healthcare makes up the largest part of the UK Government expenditure and both inputs and output have risen substantially over the period. Inputs increased particularly rapidly in 2002 and 2003 (by 7.4% and 7.1%, respectively). Output also grew quickly in these years (5.2% and 5.5%, respectively), but not as quickly as inputs. These movements are illustrated in Figure 4.8. Note that output growth exceeded the public service's whole-period average every year. The lowest growth, in 1999 at 3.4%, was still above the public-service average of 2.9%. Input growth was, however, similarly high. Only in 2006, when inputs grew by 1.9%, was input growth in healthcare below the whole-period public-service average of 3.2%.

FIGURE 4.7

INDIVIDUAL SERVICE'S CONTRIBUTION TO PUBLIC-SERVICE GROWTH.

Healthcare	Education	Adult social care	Social security admin.	Children's social care	Public order and safety	Police	Defence	Other	Total
−0.7	−0.8	−1.0	0.1	0.0	−0.9	0.0	0.0	0.0	−3.3
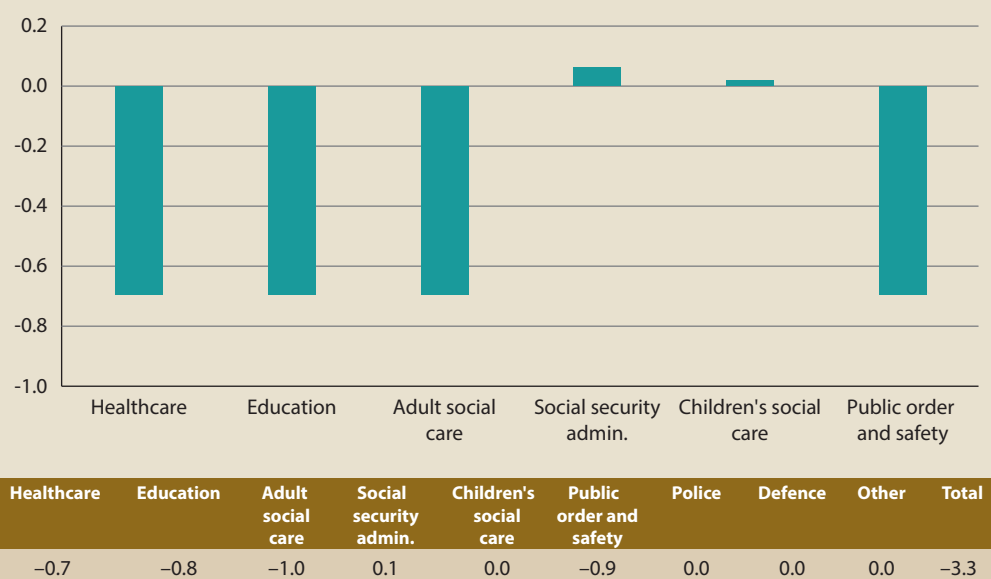
FIGURE 4.8

MOVEMENTS OF INPUT, OUTPUT, AND PRODUCTIVITY IN HEALTHCARE SERVICE.

Index numbers 1997 = 100 and annual percentage change

Percentages
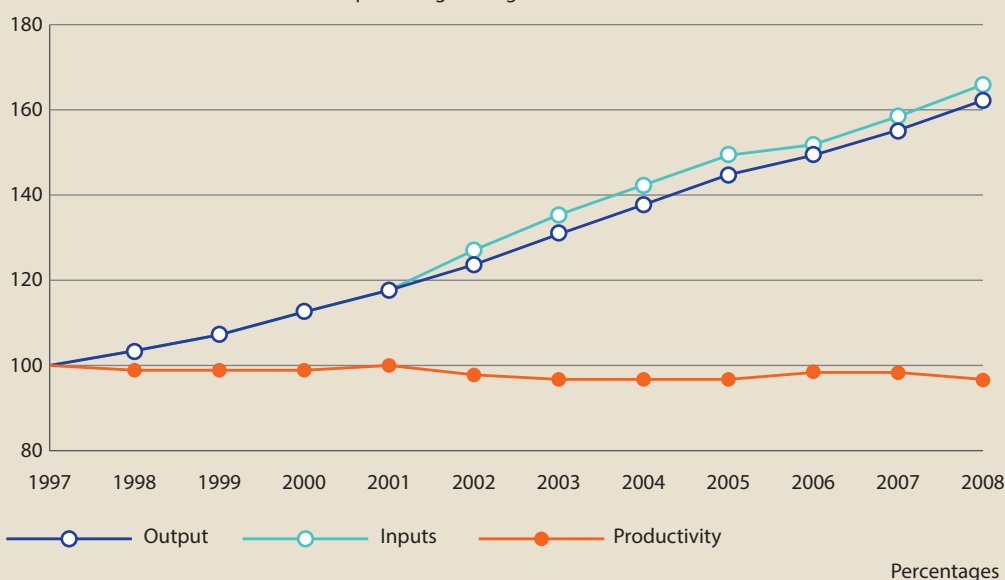
	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	Mean
Output	3.9	2.9	4.9	5.4	5.2	5.5	4.9	5.0	3.6	3.9	4.2	**4.5**
Inputs	4.4	2.9	5.3	4.2	7.4	7.1	4.9	5.0	1.9	4.2	4.9	**4.7**
Productivity	−0.5	0.5	−0.5	1.2	−2.0	−1.6	0.0	0.0	1.6	−0.3	−0.6	**−0.2**

The main factors in the overall rise in output were: more patient treatments in hospital and community healthcare services; a large increase in drugs prescribed by GPs; and a small rise in the quality of healthcare (based on short-term survival, health gain following treatment, waiting times and patient experience) from when it was first measured in 2001.

The main factors underlying the overall increase in inputs used to deliver healthcare were high growth in the volume of goods and services. Some of the increase relates to greater expenditure on non-NHS procurement, which includes contracted-out services and private finance initiatives (PFIs), but the main contribution to growth came from other 'goods and services' procured within the NHS. This category includes items ranging from bedding and bandages to electricity and water increases in the volume of labor, of just over 40% over the whole period.

The increase in healthcare productivity in 2006 rose from substantially reduced inputs growth (1.9%) combined with reduced but still strong growth in output (3.6%). Input growth picked up again in 2007 and 2008 (to 4.2% and 4.9%, respectively) and output growth also picked up in those years (to 3.9% and 4.2%, respectively), but not enough to prevent productivity from falling slightly.

Healthcare productivity is now the subject of an annual article, the most recent of which is Penaloza et al. (2010) . This includes a fuller discussion, for example, providing a breakdown of healthcare into family health services and hospital and community services. Note that its results began in 1995. For consistency with other areas, results are presented only as far back as 1997.

Learning Methodologies

- Lectures

- Good practice examples of Malaysia in the education sector

- Exercises to measure and analyze education service productivity

Exercise

What are the approaches to planning and measuring public-service productivity in your country? How do they compare with best practices in OECD or in such countries as the UK?

Unit 6: Linking Macro Productivity Measures and Quality of Performance Measures

Learning Objectives

At the end of this unit, participants will understand how to conduct productivity measurement at an agency level, including efficiency measurement, service satisfaction measurement, and program effectiveness measurement.

As we saw in Module 1, the broad objectives of performance measurement in the public sector require us to measure and improve productivity in both quantitative and qualitative ways. Earlier in the module we outlined the importance of measuring the quality of government programs in terms of their outcomes, not just in terms of efficiency measures. For example, in health services, we want to know the success rate of hospital surgeries, not just their number. And in education, we want to know not just the number of graduates from a school, but how well their education prepared

them for success in the economic marketplace. In fire services, we want to know how well the service prevents fires, not just the number of fires the service attended.

In Module 1, we introduced a graphic (see Figure 4.9), which showed that in the public sector, we need to know how well government programs are achieving their objectives, and at what cost.

FIGURE 4.9

PERFORMANCE OF GOVERNMENT PROGRAMS IN THE PUBLIC SECTOR.
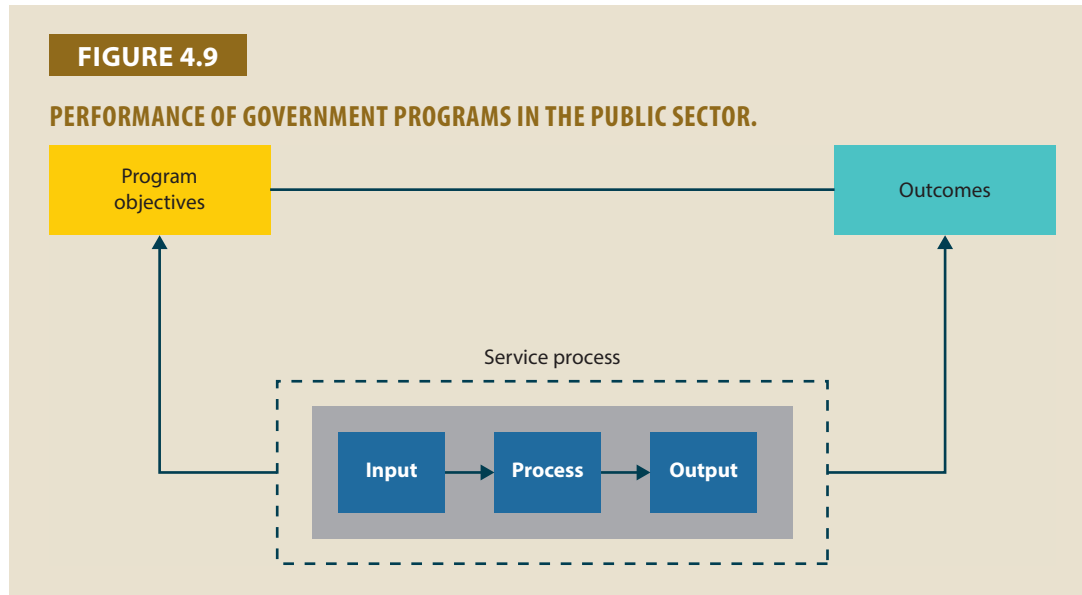
We also noted that in this context there are several key performance indicators that are important for governments and their agencies to measure in the broad context of government productivity improvement efforts. These are

- efficiency,

- effectiveness,

- value for money (cost-effectiveness), and

- economy.

The APO, in its publication, Handbook on Productivity [1], explains the connection between productivity and effectiveness in the public sector:

> *"Productivity is the relationship between the quantity of output (goods and services produced) and the quantity of input (i.e., resources such as labor, materials, machinery, and energy) that are used in production."*

> *"Productivity = Output/Input. Productivity is concerned with how efficiently goods and services are produced and the value created by the production process. If a product is made at the lowest cost with high quality and can be sold competitively in the market at a price higher than its cost of production, then its productivity level is considered high. The objective of productivity is to maximize output and minimize input."*

"Productivity = Efficiency + Effectiveness. The other element of the productivity equation is effectiveness. This relates to the attainment of the desired goals or outcomes set by the producer of a product or service. If the customers are highly satisfied in using the product or service, this could mean higher revenues and repeat orders for the product or service. It could also mean higher return on investments for investors and even a better image or reputation for the company or organization."

Figure 4.10 explains this relationship in an analogous way.

FIGURE 4.10

A FRAMEWORK FOR UNDERSTANDING PUBLIC-SECTOR PRODUCTIVITY.

Effectiveness = Outcomes / inputs

Inputs → Processes → Outputs → Outcomes

Productivity = Outputs / inputs
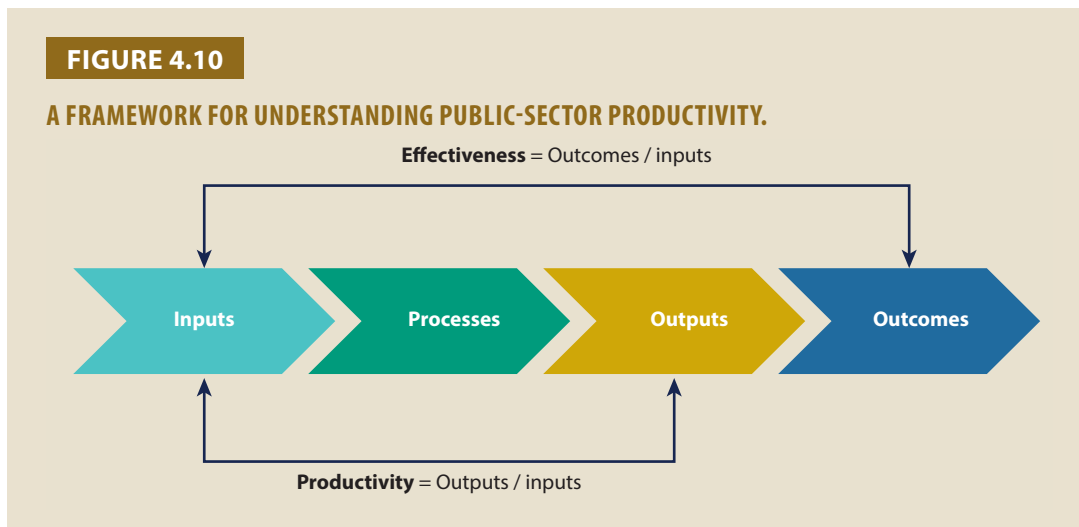
Based on this simple framework, we can see that in addition to measuring output/input productivity, government departments and agencies also need to measure outcome/input productivity, which is sometimes called cost-effectiveness. Measures of cost-effectiveness are particularly important in the public sector, in order to determine whether policies and programs are achieving government objectives, and also to identify most cost-effective programs and policies to achieve specific government objectives.

For example, if a government or health department sets an objective of reducing annual dengue fever deaths by half, it needs to know the most cost-effective way of achieving that objective. Is it by spraying insecticide to reduce the mosquito population or by a public health education campaign? Is it by introducing mosquito predators into the ecosystem or by providing better treatment facilities for dengue fever cases. Or, is it by using a combination of these programs?

By measuring the cost-effectiveness of each program (with effectiveness of the outcome measured as the reduction in the number of dengue fever deaths per annum and cost being measured by the total government and societal costs of achieving that level of outcome), governments can determine the best use of scarce resources to achieve the intended result.

A more detailed model of performance measurement in the public sector has been developed by the APO as outlined in Figure 4.11.

This APO model clearly explains the difference between cost effectiveness and program effectiveness and provides the applied example of reducing the loss of life from fires through fire service programs.

FIGURE 4.11

PERFORMANCE MEASUREMENT MODEL DEVELOPED BY APO FOR THE PUBLIC SECTOR.
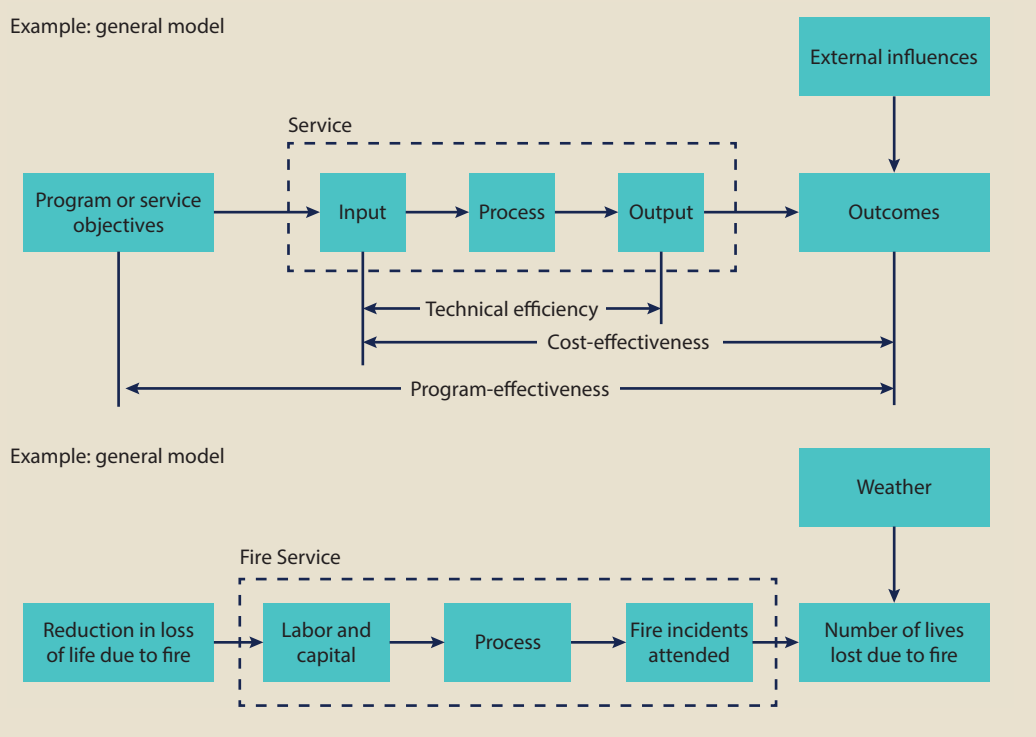
More details on how to measure and improve public-sector performance in programs such as tax services and passport services is found in the APO publication titled Measuring Public-sector Productivity in Selected Asian Countries [2].

Also, further details on how to measure cost-effectiveness performance in the public sector are found in other modules of this Handbook.

References

[1]   APO. Measuring Public-sector Productivity in Selected Asian Countries. Tokyo: APO; 2015.

[2]   APO. Handbook on Productivity. (available online at: www.apo-tokyo.org/publications/ebooks/handbook-on-productivity.) Tokyo: APO; 2015.

[3]   Atkinson T. Atkinson Review: Final Report: Measurement of government output and productivity for the National Accounts. Basingstoke, Palgrave: Macmillan; 2005.

[4]   Baird A., Rowlinson A. Measuring the Output of the Probation Service. Office for National Statistics; 2010 (available at: www.statistics.gov.uk/cci/article.asp?ID=2454).

[5]   https://www.ons.gov.uk/employmentandlabourmarket/peopleinwork/labourproductivity/articles/quarterlypublicserviceproductivityexperimentalstatistics/jantomar2016#understanding-public-service-productivity

[6]   Dunleavy Pck., Leandro Carrera L. Growing the Productivity of Government Services. Cheltenham, U.K., and Northampton, MA: Edward Elgar; 2013.

[7]   Eurostat. Handbook on Price and Volume Measures in National Accounts. (https://ec.europa.eu/eurostat). Luxembourg: Eurostat; 2001.

[8]   Triplett J. Handbook on the Quality Adjustment of Price Indices for ICT Product (2002). Handbook on Hedonic Indexes and Quality Adjustments in Price Indexes- Special Application to Information Technology Products. Paris: OECD; 2006.

[9]   OECD. Measurement of Aggregate and Industry level Growth. In: Measuring Productivity, OECD Manual. Paris: OECD; 2001. https://doi.org/10.1787/9789264194519-en.

[10]   Schreyer P. "Towards Measuring the Volume Output of Education and Health Services: A Handbook". OECD Statistics Working Papers, Paris: OECD; 2010/02.

[11]   UK Office of National Statistics, . ONS Productivity Handbook- A Statistical Overview and Guide. Palgrave, London: Macmillan; 2007.

[12] Economic & Labour Market Review, vol. 2, No. 9, September 2008. https://link.springer.com/journal/volumesAndIssues/41318.

TOOLS FOR IMPROVING THE PRODUCTIVITY OF PUBLIC-SECTOR ORGANIZATIONS

At the end of this module, participants will be able to

1. understand the basic productivity improvement concepts,

2. recognize the typical productivity problems of public-sector organizations,

3. describe the management tools and techniques to improve productivity in public-sector organizations,

4. select appropriate tools and techniques to address productivity issues and improvement areas, and

5. discuss the implementation process of productivity improvement program.

The module consists of six units:

Unit 1: Diagnosing Productivity Problems in the Public Sector

Unit 2: The 5S System for the Workplace

Unit 3: Suggestion Systems

Unit 4: Basic Problem Solving Tools

Unit 5: Management Tools for Problem Solving and Decision Making

Unit 6: Lean Management

Unit 1: Diagnosing Productivity Problems in the Public Sector

Learning Objective

At the end of this unit, participants will be able to

1. understand PDCA as a basic productivity improvement process,

2. explain the factors that influence productivity performance of public-sector organizations,

3. identify the typical productivity problems of public-sector organization, and

4. relate the productivity problems to possible solutions and effective managerial approaches.

FIGURE 5.1

PLAN, DO, CHECK, ACT (PDCA).
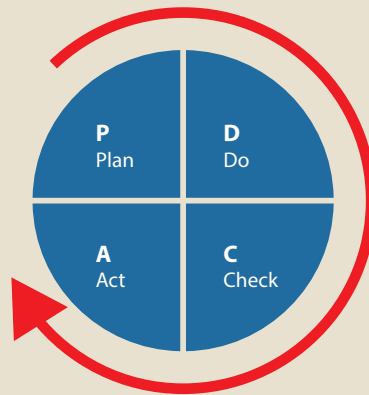
Diagnosing the productivity issues and defining the productivity problem are important preliminary steps to productivity improvement. The PDCA cycle (see Figure 5.1) progresses as follows:

Plan: Situation analysis or diagnosis of the problem is presumed, along with the setting of improvement goals/targets and identification of strategies/tactics and activities to achieve them, including the selection of appropriate productivity tools and techniques.

Do: The plan is executed.

Check: The results of implementation and assessing accomplishment of goals/targets are evaluated.

Act: Good practices are standardized and/or corrective measures are performed on deficiencies. The results are fed back and become inputs for the next cycle.

Like the PDCA management cycle, productivity improvement is an interactive and ongoing process. Most productivity interventions run in a number of phases. This is outlined in Prokopenko and North [18] as below:

- Initial study phase: Diagnosing the key problems and agreeing on the approach

- Detailed investigation and recommendation phase: Working with those who will have to live with the solutions to develop the program and put the systems in place

- Implementation phase: Doing what has been agreed

- Review and integration phase: Assessing what has/has not been achieved and agreeing on the way ahead

It should be noted here that the first two phases are part of the 'plan' step. The third phase refers to 'do.' The fourth phase corresponds with 'check.' It is presumed that management undertakes the appropriate 'action' on the basis of agreements on the way ahead.

The productivity diagnosis complements the productivity performance analysis through productivity measurement as discussed in the previous modules. The main difference between the two is that productivity measurement deals with measurable productivity factors while productivity diagnosis focuses on qualitative factors such as organizational culture, management styles, and related attributes of the 'soft' systems of the organization.

Factors that Influence Productivity Performance

Prokopenko and North [18] offer four broad categories of factors that influence productivity performance of organizations: technology, methodology/systems, competence of people, and operational climate. Other productivity experts determined two principal sources of productivity: technological progress, and efficiency.

Technological progress means improvements in technological knowledge to produce larger quantity from the same level of input. Advancement in technology can transpire through research and development. Efficiency is defined as the effectiveness within which the physical inputs and technology are combined. Efficiency gains can be obtained from organizational and management improvements, competition, scale economies, incentives, etc.

Technology: In the public sector, the technology problem would generally refer to the design of the service that the public expects the government to provide (e.g., licensing and sanitation) and the process used to deliver that service. The better the technology, the higher the potential for easier access and faster, transparent, and less costly delivery of services to greater number of people, thus leading to higher productivity.

Methodology/systems: This refers to the procedures that organizations use to manage and control their affairs, i.e., how things should be done, how to control functional performance, and how to integrate effort and provide management information. Good systems contribute to productivity.

Competence of people: This refers to the ability of all employees to do their jobs effectively. It is a fundamental requirement for the productivity of organizations. Competent employees know what is expected of them; have the knowledge, skills, and attitudes necessary to do the job; and are motivated to achieve.

Organizational climate: This refers to the environment in which people work and is reflected in the attitudes of employees and the organization's style of management. Organizational climate affects the engagement of employees, and the effectiveness of the three factors cited earlier. Example include the motivation of employees to do their jobs well, contribute ideas, and participate in productivity improvement activities.

Figure 5.2 shows an example of the factors affecting productivity of the public-sector organizations.

Focus Areas for Productivity Improvement

Rosen [19] in her book, *Improving Public Sector Productivity,* identified several focus areas for productivity improvement. These include

- productivity improvements that focus on the work process,

- improvements that focus on the worker's motivation and skill, and

FIGURE 5.2

DIMENSIONS OF ORGANIZATIONAL PRODUCTIVITY.
EXAMPLE FROM PHILIPPINE PUBLIC SECTOR

Management Leadership, mandate, plan, programs, budget, policies, procedures	**Structural system** Formal structure, informal structure, linkages, decision ladders
Delivery system Process, technology, tools, scope of operational decision-making authority	**Behavioral system** Remuneration, incentives, work environment, ethical standards, public perceptions
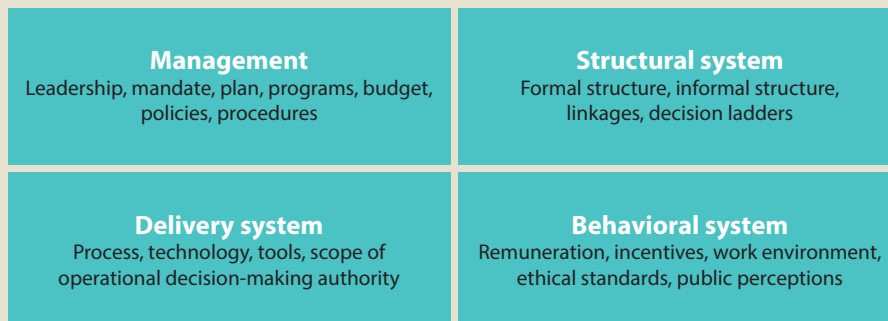
- productivity improvements achieved by employing effective managerial approaches to optimize resources and by exploiting alternative options for producing better service.

Productivity improvements that focus on the work process concern the work itself in terms of technology, management, and methods. Example focus areas are: how the work proceeds; patterns of fluctuation in the amount of work to be done; how much of a worker's time is spent on which tasks; how long a unit of work takes from beginning to end; and what resources are needed to make the work flow seamlessly.

The work process refers to the way operations are structured and conducted. It includes such elements as organization, technology, routines, schedules, and work assignments. This kind of effort represents a technical, engineering or management science approach to determine the optimal match of organizational capacity to demand, and of labor and skills to the needs of the work. It seeks to streamline workflow, minimizing waste and delay. The object is to produce the services promptly, reliably, and economically.

The discussion below is drawn from Rosen [19].

How can opportunities for improvement in work process be recognized? They manifest in observable symptoms of idleness, slowness, delays, and bottlenecks. Some problems can be recognized through accidents and danger, and periodic or chronic overload, of individual workers or of the entire system.

Improvement in the work process can be achieved through a number of approaches: reorganization, demand analysis, work study, and technological change.

Consciously applied reorganization becomes a means of deploying limited resources to better effect. The possibilities include redesigning jobs, redistributing work, changing the number of levels of units, centralizing or decentralizing operations, and changing work shifts.

Demand analysis is a technique based on measuring and charting the level of demand for service to ascertain any regular patterns of trends, i.e., ups and downs or variations by hour of the day, day

of the week or time of the year; section; or jurisdiction. From productivity improvement perspective, demand analysis is particularly useful as a technique for providing good service while making optimal use of human resources, i.e., having workers available when needed but not idle when the demand is low.

Deliberate, careful observations of how work proceeds and how long it takes to complete tasks are useful instruments for eliminating wasted effort. However, time and motion studies may have limited applicability to public-sector operations, because public agencies generally operate under conditions of variety and change. For instance, no two arrests or trials are the same. Further, various agencies deal with heterogeneous clienteles and changing realities (e.g., social service, health, education, environmental protection, and housing). However, while such conditions and routines may be uncertain, they are certainly not random. These operations can be managed better with systematic rather than the traditional tools of experience, intuition, and impression.

By far the most familiar and attractive option for improving the work process is changing the technology. 'Changing the technology' means more than computerizing or automating or buying equipment. Technology includes all methods and knowhow by which work is done and various technological innovations are made to speed up transaction, manipulate data quickly and accurately, eliminate need for personal contact, improve control, facilitate access, enhance transparency, and achieve better efficiency and quality.

Improvements that focus on the worker's motivation and skill concern the competence and motivation of the employees, i.e., staff morale, employee commitment, training, participation, and other management innovations to engage employees such as suggestion systems, team-based problem-solving activities, etc.

Government services are produced by people and often delivered in person, face-to-face. According to Canadian, British, and New Zealand Government research, the client's perception of the government employee's knowledge, competence, commitment, understanding, and efficacy contributes to public satisfaction or dissatisfaction with government services [7, 14–17, 29]. If employees are poorly trained, simply performing routines, and powerless to make improvement, then they will retreat emotionally. If they see themselves competent, in command of resources, part of a team doing meaningful work, able to use discretion and influence change, then they become engaged in their work. However, satisfaction does not in itself lead to increased productivity, and neither does commitment. Accordingly, there has to be added some creative tension in the form of a climate in which productivity matters and is measured and in which rewards are related to performance. To the extent that individual competence and dedication can be improved, productivity can be improved.

Lack of knowledge manifests itself in errors, poor decisions, poor quality of work, and complaints. Lack of motivation manifests itself in feelings of low morale, alienation, lack of ideas, hostility and resistance, as well as in mediocre performance. Some devices to enhance competence of the employees are personnel processes, training, motivation, and empowerment:

Personnel processes: These have often been a barrier to productivity. Narrow job classifications provide little scope for job enlargement or enrichment. Compensation scales reward everyone equally, regardless of performance. Inadequate appraisal systems make it difficult to certify true merit. Tests and training have often lacked job relevance. Promotions and layoffs are often based

only on seniority. Improvements in personnel processes can include good recruitment and selection procedures, e.g., attracting a large pool of candidates who already possess or have the aptitude to master requisite knowledge, skills, and attitudes. Also, flexible job classifications through broabending of job classifications give managers greater freedom to deploy personnel efficiently and provide workers the opportunity to develop additional skills, making it easier to promote and reward merit.

Training: This is important for helping workers to understand and commit to the organization mission, gain familiarity with innovations, upgrade present skills, add new skills, and prepare for career advancement. Training is also intended to change behavior. Training could be formal or informal, and may range from orientation to on-the-job training, coaching, retraining, or cross-training.

Motivation: This is undoubtedly a major key to improvement in public-sector productivity. Aside from rewards systems that are effective only if they are contingent on performance, the opportunity to participate in decision making is a particularly rewarding experience for most workers, and many productivity improvement techniques focus on participative management or employee engagement [3, 19, 22].

Empowerment of the worker proceeds from the belief that there is a work ethic and a desire to serve, that team building and a sense of ownership raise morale and improve performance, and that workers have a valuable contribution to make, if only allowed by the authority to do so [19]. This is made possible by management innovations to promote participation such as suggestions systems, team-based problem solving, cross-functional teams. and the like.

Typical Productivity Problems

Table 5.1 provides common productivity problems.

TABLE 5.1

TYPICAL PRODUCTIVITY PROBLEMS IN WORK PROCESSES.

Category	Some examples of check points	Possible work process improvement
Idleness	Does a computer, a garbage truck, or a piece of special equipment sit unused several hours a day or several days each month?	Relocate the computer so it can be shared; initiate a preventive maintenance program for the garbage truck; or "contract in" additional work from another agency.
	Is a building utilized only 8 hours a day or only 10 months a year?	Consider a flexitime schedule, creating a longer day by permitting some workers to start and end the day earlier and allowing others to arrive and stay later; or make the school building available to other departments during the school break.
	Are there workers idle at mid-day because of the nature of their work (e.g., drivers, mail sorters)?	They can be given other tasks during their idle period.
Delays	Do clients complain about how long it takes to get service?	Rearrange the work process.
	Do backlogs of unfinished work build up?	Reassign the tasks.
	Are there perceptible "bottlenecks" where everything gets slowed down (awaiting supplies, transport or approval)?	Use application of new technology to hasten the process.

Category	Some examples of check points	Possible work process improvement
Danger	Are there hazardous tasks causing threats to safety and security of employees e.g., bullets, fumes, etc.?	Provide protective devices and clothing. Consider automation so that employee can be removed from a dangerous situation.
Overload	Does work flood in at certain times of the day, certain days of the week, or certain months of the year? Do some workers carry more than their share of the burden? What is the common condition in which the demand simply exceeds the capacity of the organization?	Chart the pattern of demand for service and use the data to design changes. Use clear system of prioritization.
Lack of knowledge of workers	• Errors • Poor decisions • Shoddy quality of work • Complaints	Conduct training.
Poor motivation	• Low morale • Alienation • Lack of ideas • Hostility • Resistance • Mediocre performance • Other indicators (grievances, absenteeism, turnover, withdrawal)	Conduct organizational climate surveys. Encourage participative management. Run employee engagement programs.

Source: Constructed based on discussion in Rosen [19].

Other symptoms of productivity problems based on the factor inputs are listed in Table 5.2.

TABLE 5.2

OTHER SYMPTOMS OF PRODUCTIVITY PROBLEMS.

How and where time is wasted	How and where space is wasted
• Unnecessary talking and visiting	• Poor layout
• Tardiness/late start	• Poor housekeeping
• Slowing down towards end of working hours	• Improper piling
• Failure to follow instructions	• Collecting scrap in improper places
• Disorganized workplace	• Storing materials that should be scrapped
• Taking more time than needed to fill out forms	• Keeping unnecessary supplies
• Repeated work due to errors/defects	• Scattering/placing tools, supplies, portable
• Unsystematic work habits	equipment in aisles or passages
• Waiting for equipment, tools, materials, other people	• Failure to use vertical space
How and where materials are wasted	**How and where equipment is wasted**
• Defective workmanship	• Improper operation
• Failure to understand the money value	• Overloading
• Careless handling	• Inappropriate use
• Indiscriminate use	• Failure to keep clean
• Unsystematic piling and storage	• Lack of maintenance
• Failure to protect from elements	• Makeshift repair
• Requisitioning/copying more than what is needed	• Loss or theft of small parts/tools
• Failure to return unused/excess items	• Failure to protect from elements
	• Underutilization

Productivity Improvement

Productivity improvement in the public sector could be achieved using two approaches: first is the gradualist approach known as Kaizen and the other is the great leap approach via innovation [13, 24]. Sometimes, this is also called transformation.

Kaizen means improvement. Though the impact of each improvement could be small, most employees can contribute. It generally requires no cost or low investment. Accumulation of incremental improvements is the target.

Innovation is more dramatic. It is more challenging and requires higher degree of creativity but may require more resources or higher investment to implement.

While Kaizen is a continuous process, innovation is generally a one-shot phenomenon.

To implement Kaizen, simple techniques and schemes are needed, e.g., 5S, problem solving activities, suggestion system, work simplification, and lean management.

Exercise: Diagnosing Productivity Problems

Divide class into small groups. Give instructions to select a public-sector organization. Using the list of symptoms given above, ask groups to identify the common productivity problems and discuss what approaches may be applicable to improve productivity in those areas.

Unit 2: The 5S Principles for the Workplace

Learning Objectives

At the end of this unit, participants will be able to

1. understand the concept and general principles of 5S,

2. recognize the 5S practices that enhances productivity,

3. describe how 5S is applied in office work and decision making,

4. discuss the steps and considerations in implementing 5S, and

5. conduct a simple 5S situation appraisal.

Concepts and Principles of 5S

A clean and organized workplace is high in productivity and ensures quality of work. The most basic approach to realize this is through 5S.

5S is a systematized approach to organize work areas, keep rules and standards, and maintain the discipline needed to do the job. 5S is an acronym for five Japanese words for workplace organization, all starting with 'S.' These are: *Seiri* (sort), *Seiton* (systematize or organize), *Seiso* (sweep or clean), *Seiketsu* (standardize), and *Shitsuke* (self-discipline).

The constant practice of 5S develops positive attitude among employees and cultivates an environment of efficiency, effectiveness, and economy.

5S is easy to implement and its results are immediate. Through 5S

- workplace becomes clean and better organized,

- work becomes easier and safer,

- quality of work is enhanced,

- results are visible to everyone,

- visible results trigger generation of more and new ideas,

- people are automatically disciplined,

- people become proud of their workplace, and

- resultant good image of the organization generates positive inspiration to the public.

5S utilizes the principles of work study [8], motion analysis, and work improvement to make work easier, faster, cheaper, safer, and more effective. The principles behind each 'S' are summarized in Table 5.3.

TABLE 5.3

PRINCIPLES OF 5S.

Seiri	• Waste elimination • Satisfaction management • Dealing with causes
Seiton	• Functional storage • A place for everything • Search elimination
Seiso	• Cleaning as a way of purifying the spirit • Cleaning as inspection • Elimination of minor problems
Seiketsu	• Visual management • Standardization
Shitsuke	• Habit formation • Disciplined workplace • Autonomation

Seiri (sort) means to remove unnecessary items and dispose them properly.

Unnecessary items should be disposed of when identified. It is essential to simultaneously determine the factors, which caused them to occur in order to devise and implement measures to prevent recurrence. Quantities of unnecessary items that do not contribute to the formation of an output mean quantities of waste in many ways. Eliminating this waste contributes significantly to improvement in productivity.

Seiri makes work easy by eliminating obstacles. It eliminates the need to take care of unnecessary items by preventing the accumulation of unnecessary items and removes the chance of being disturbed with unnecessary items. Without the unnecessary items, the space can be more economically utilized.

Following are the broad categories of physical items for *Seiri*:

1. Files, materials, equipment, and furnishings not used in the past twelve months

2. Dilapidated equipment, materials, furnishings, tools, stationery (including those that seem beyond repair)

3. Outdated materials that are expendable

4. Books and other printed materials that are unworthy as references

5. Excess copies of documents and files

6. Obsolete documents, periodicals, and catalogs

7. Large junk objects and other unused items

The *akafuda* operation (or red tagging) is a good Seiri practice. *Akafuda* is concocted from two Japanese words *akai* (red) and *fuda* (tag). Akafuda operation thus suggests putting disposal or red tags on items that seem to be unnecessary. (This operation is like the 'sale' in a departmental store when old items in stock are tagged for sale at bargain prices.) Before the operation is conducted, it is necessary to prepare disposal tags, sorting and evaluation criteria, disposal procedure, and the like. Figure 5.3 shows how to classify items into things needed versus things that are not needed. In general, the unnecessary items can be evaluated based on their potential use. Items with no

FIGURE 5.3

STRATIFICATION MANAGEMENT.
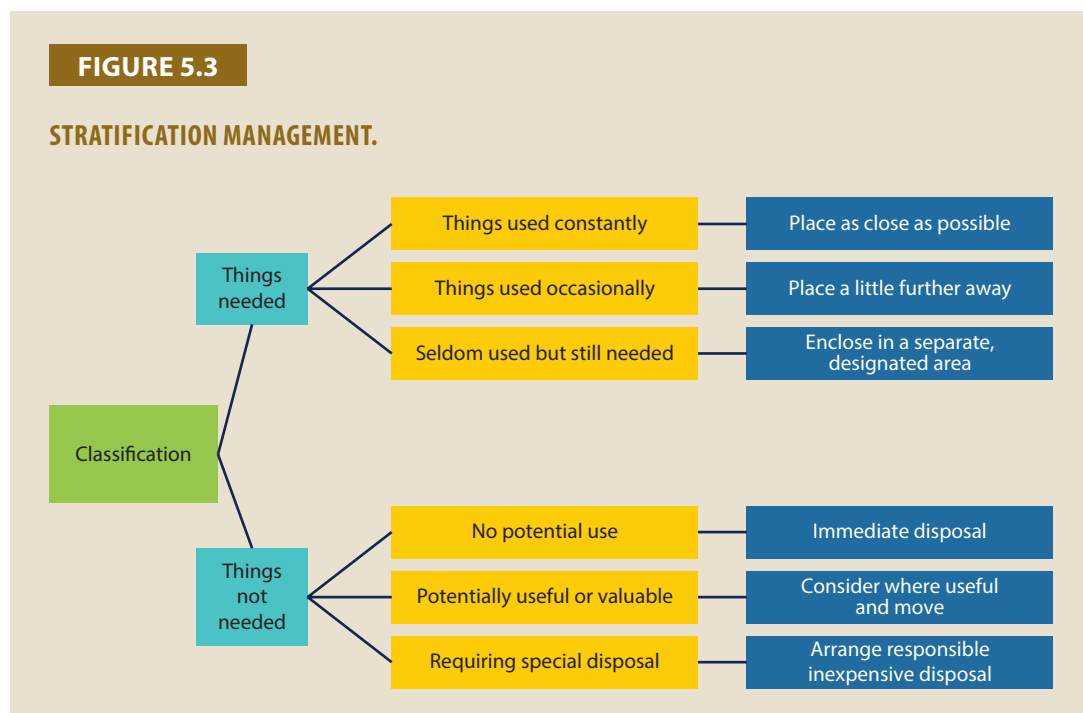
potential use are disposed of immediately. Items that require special disposal are also segregated and disposed of according to set policies. Those that are potentially useful as well as the needed items become the subject of next step, *Seiton*.

Seiton (systematize) means to arrange necessary items in good order so that they can be easily picked up for use. The main purpose of *Seiton* is to prevent loss and wastage of time due to searching by making it easy to find and pick up necessary items. *Seiton* makes workflow smooth and easy and ensures that the first-come-first-served rule is observed.

In arranging items, the general guide is based on frequency of use. Things that are used frequently should be put as close as possible. Things used occasionally are put further away. Things seldom used but needed are enclosed and stored in a designated area.

Following are the key principles of *Seiton*:

1. Follow the first-in-first-out rule in storing items.

2. Assign each item a dedicated location.

3. All items and their locations should be indicted by systematic labeling.

4. Place items so that they are visible to minimize search time.

5. Place items so that they can be reached or handled easily.

6. Separate exclusive tools from common ones.

7. Place frequently used tools near the user.

In sum, *Seiton* translates into the saying "Have a place for everything and put everything in its place." Figure 5.4 illustrates an application of *Seiton* principles when storing items.

Seiton demands the application of motion economy and creativity; the goal is to reduce to minimum (if not totally eliminate) the time it takes to search for, retrieve, carry, and return items. In doing do, productivity improves.

Seiso (loosely translated as sweep) means to clean one's workplace completely, make items free from dust, dirt, and deterioration. A clean workplace is safe and easy to work. When items are clean, it is easy to check abnormalities. While cleaning equipment, inspection could also be done, which assists in preventing facilities and equipment from deterioration.

It is said, "Cleaning is a means of purifying the spirit." Cleaning one's workplace is part of one's job. In the workplace, cleaning is the beginning of quality consciousness and mindfulness of others. The first success of 5S is when employees acquire the habit of cleaning daily.

The standard in *Seiso* is that neither dirt nor stains should be seen with the naked eye or felt by touch. Measures can be adopted to reduce the effort in cleaning and prevent the accumulation of dust, dirt, and other causes of deterioration.

FIGURE 5.4

SEITON PRINCIPLES APPLIED TO STORAGE.

A1	A2	A3	A4	A5	A6
B1	B2	B3	B4	B5	B6
C1	C2	C3	C4	C5	C6
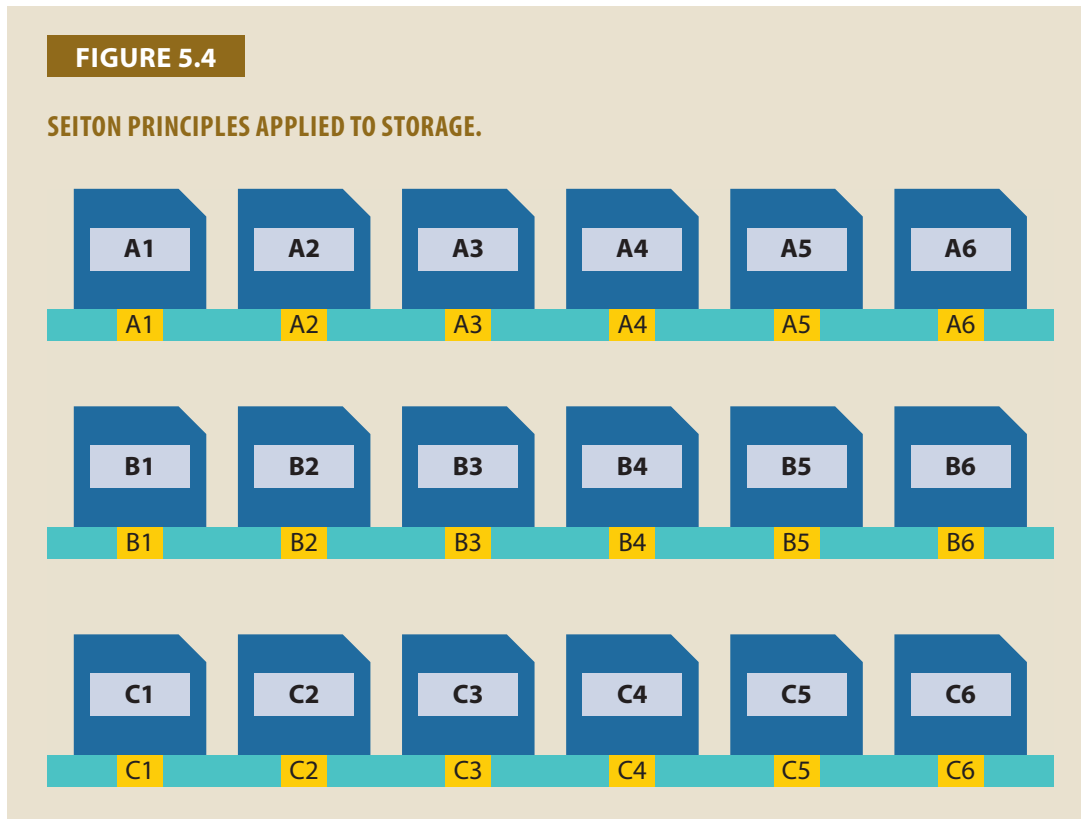
Below are some *Seiso* practices:

1. Big *Seiso* (clean-up) Day

2. 3–5 minutes of cleaning daily

3. Assign owner to each machine

4. Combine cleaning with inspection

5. Make daily maintenance points clear by providing visible instructions

6. Provide necessary tools for critical points of cleaning

7. Prevent causes of dirt and dust

Seiketsu (standardize) means to maintain high standards of housekeeping and workplace organization at all times. When *Seiri, Seiton,* and *Seiso* are repeatedly practiced, the state of *Seiketsu* is achieved.

Seiketsu is a condition when

*   cleanliness and orderliness are maintained,

*   misoperation is prevented,

- abnormality is easy to detect, and

- good practices are standardized.

Below are some notable *Seiketsu* techniques:

1. Visual control signs

2. Foolproofing (poka-yoke) to prevent mistakes

3. Responsibility labels

4. Wire management to avoid accidents

5. Inspection marks to facilitate checking

6. Maintenance labels to make routine maintenance easy

7. Prevention of dust, dirt, noise, and vibration

8. 'I-can-do-it blindfolded' to show efficient storage

9. One-point lessons

The use of visual control is important if the intended *Seiketsu* condition is to be attained. Visual control is a technique to enable people to make the rules easy to follow, differentiate normal and abnormal situations, and act accordingly, with the use of visual aids. Some examples of visual control include

1. displays to help people avoid making operating errors,

2. danger alerts,

3. indicators of where things should be put,

4. equipment designation,

5. cautions and operating reminders,

6. preventive maintenance [12] displays, and

7. instructions.

Shitsuke (self-discipline) means to do things spontaneously, i.e., observing good work habits and workplace rules, without being told or ordered. The emphasis is to form the desired habits to maintain the discipline and conditions needed to do a good job. *Shitsuke* is demonstrated in autonomous management activities and in behavioral changes that enhance productivity and quality consciousness of employees.

Some of the expected behavioral changes due to practice of 5S are

- clearing up so that unnecessary items don't appear,

- organizing so that things never get disordered,

- cleaning so that things don't get dirty and deteriorate easily,

- standardizing to a stage that mess becomes impossible, and

- self-initiating 5S activities.

The next level of 5S is 'Preventive 5S' to achieve 5S objectives with minimal effort. This requires organizations to do the following:

1. Create a system with no waste and excess.

2. Create a system in which each item has its own address, thus eliminating the need to return items.

3. Create a system so that items don't get dirty and deteriorate.

4. Create a system for preventive clearing up, preventive organizing, and preventive cleaning.

5. Create a system of mistake proofing.

Office 5S

Although the 5S program has come in wide use in manufacturing companies, its concepts and principles are applicable in office work and environment. To be sure, office work and environment in public-sector organizations differ much from the shop floor.

Below are some of the characteristics of office work:

- Great individual differences

- Many administrative works are not standardized

- Difficult for other people to fill in

- A lot of manual work

- Many documents and files

- Lots of tools

- Difficult to tell if a good job is being done or not

In office work, the inputs primarily come in the form of information. The processes are largely knowledge work. The outputs are, oftentimes, also in form of information. Thus, the focus of Office 5S is not just physical but organizational and information processing as well.

Key Areas of Office 5S

1. **Physical and psychological aspect:** This includes communication, handling of documents, materials and equipment, movement of personnel, and improvement of office environment.

2. **Organizational aspect:** This covers the effectiveness of organizational units based on their inputs and outputs, restructuring of office activities by means of combination, elimination, rearrangement of operation sequence, simplification, and the like.

3. **Information processing aspect:** This concerns enhancing quality, response time and cost effectiveness, efficiency improvement through office automation, upgrading productivity consciousness, and working skills.

These aspects are detailed in Table 5.4.

TABLE 5.4

CONTENT OF OFFICE 5S.

Item	Physical	Organizational	Processing
Seiri (sort)	• Remove unnecessary private and organizational items.	• Eliminate input/output which has no value added.	• Eliminate unnecessary work or procedures.
Seiton (systematize)	• Arrange facilities, materials, data in good order with virtual indices. • Layout office to economize movement of personnel.	• Restructure office activities to make work more efficient and effective.	• Systematize routine work and special activities. • Rearrange procedures to make them more efficient Specify manning allocation.
Seiso (sweep)	• Clean office environment. • Repair interiors, machines, and equipments.	• Polish up office activities. • Clarify checkpoint for process and result.	• Upgrade manual processing with appropriate office automation and information technologies.
Seiketsu (standardize)	• Centralize necessary file, data and materials for common use • Standardize maintenance procedure and provide visual control	• Standardize functional check.	• Standardize work processes and procedures. • Make information visible.
Shitsuke (self-discipline)	• Do things spontaneously • Keep rules and standards	• Enhance cross-functional coordination for activities.	• Upgrade productivity consciousness and working skills. • Develop multiple skills. • Observe office procedure.

To introduce 5S in the office, the activities below may be a good start:

1. Reduce the number of ledgers, forms, and tools.

2. Provide better storage to get anything needed in 30 seconds or less.

3. Keep things in just one place.

4. Have just one form for things.

5. Eliminate the idea that everyone has to have his/her copy of everything.

6. Shift from individual-based to group-based work.

7. Standardize and create manuals detailing office procedures.

8. Provide mechanism to evaluate what is happening at any time.

9. Maintain cleanliness and orderliness of office environment.

The One-is-Best Campaign (see Figure 5.5) promotes a high degree of efficiency and productivity that benefit both employees and customers.

FIGURE 5.5

ONE-IS-BEST CAMPAIGN.

One-page memos
One-hour meetings
One-copy filing
One-file projects
One-minute calls
One-day processing
One-tool work
One-location
One-window transaction
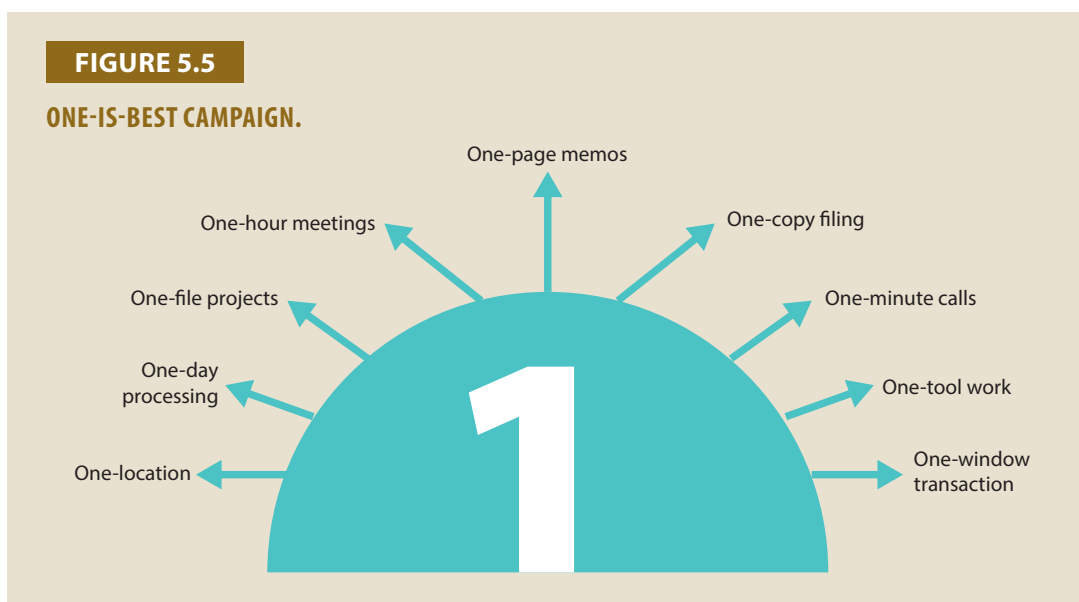
Implementing 5S: Key Steps

1. Management Commitment

- Top management has commitment to 5S implementation.

- 5S committee is created to plan, promote 5S, and do orientation.

- Management officially announces implementation of 5S.

2. Situation Appraisal and Red Tagging

- Organize *Akafuda* operation for unnecessary items.

- 5S committee can lead the red tagging of unnecessary items.

- Fixed point photography: 5S committee should record the "before 5S" situation.

3. Big Cleaning by All

- Organize a Big *Seiso* Day.

- Everybody participates in the big cleaning activity.

4. Seiton and Seiso Activities

- Do stratification management of items for disposal.

- Identify areas for improvement using *Seiton* and *Seiso*.

- Standardize good practices.

5. Periodic 5S Audit

- Conduct 5S evaluation and inspection regularly.

- Fixed point photography: 5S committee should record "after 5S" situation (Figure 5.6).

6. Continuing Training and Promotion of 5S Activities

- Provision for 5S competition and recognition of good practices.

- Carry out benchmarking against other organizations implementing 5S.

- Do preventive 5S.

Key points in implementation are as follows:

1. Start small and easy, and proceed slowly but steadily.

2. Start with the most suitable 'S.'

3. Only 1 or 2Ss are enough for the initial practice, not all 5Ss.

4. Set simple, achievable, and step-by-step targets.

5. Everyone's participation is important.

6. Management should take leadership of the 5S implementation.

7. Record improvements for comparison.

8. Devise schemes to stimulate awareness and sustain enthusiasm.

Exercise: 5S Situation Appraisal
Divide class into small groups. If feasible, groups can walk around an office or facility to undertake simple appraisal of opportunities for improvement, based on principles of 5S. Groups can take snapshots/photos of the "before 5S" situation using their own cameras and cellphones. After the tour, groups can discuss the suggestions for improvements and show the envisioned "after 5S" illustration. If the tour is not feasible, groups can be provided ready "before 5S" photographs for discussion.

FIGURE 5.6

FIXED-POINT PHOTOGRAPHY: BEFORE AND AFTER 5S.

Picture before 5S

Picture after 5S

Comments:
Date:

Comments:
Date:
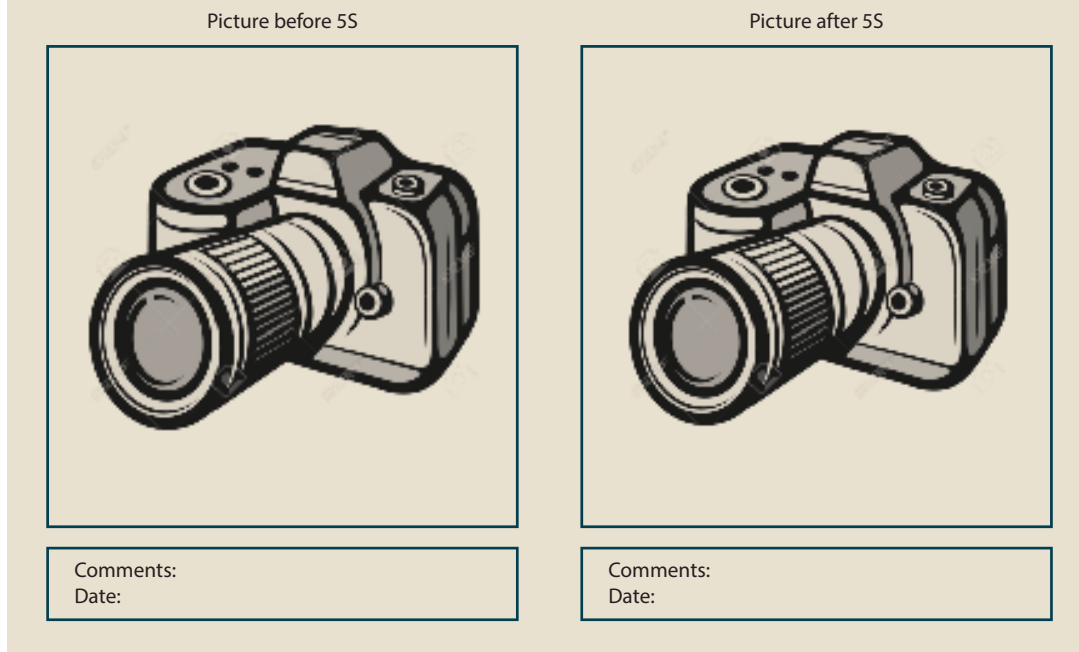
Unit Resources
See [5, 8, 9, 26, 28, 30] under References.

Lecture Notes of Tsuchiya-sensei, 1996.

Unit 3: Suggestion Systems

Learning Objectives
At the end of this unit, participants will be able to

1. know how suggestion system can be used to improve productivity,

2. understand the key elements of a suggestion system,

3. explain how to plan and implement a suggestion system,

4. identify measures to engage and sustain interest of employees to generate innovative ideas, and

5. recognize the factors that affect successful suggestion systems.

What is a Suggestion System?
A suggestion system is a means to solicit innovative ideas or suggestions for improvement from employees. The key principle behind it is that employees have valuable contributions to make, if only they are allowed to do so. The suggestion system unlocks creativity and harnesses the

knowledge of employees to solve work-related problems and in the process enhance themselves and the overall performance of the organization. Suggestions are generally rewarded with monetary and non-monetary incentives.

How a Suggestion System Improves Productivity

Ordinary people can beat a genius! A Japanese guru once said that for every 100 ideas of a genius, 99 are good. While for every 100 ideas of an ordinary person, only one is good. But if there are 100 ordinary persons with 100 ideas each, they'll be able to generate 100 good ideas, thus beating the genius. This is the power of suggestion systems.

More importantly, high performing organizations adopt suggestion systems or its equivalents because of the known benefits. A suggestion system

- engages and empowers employees to improve their own work and environment,

- creates a sense of ownership among employees and promotes trust in management,

- fosters two-way communication between employees and management, and

- contributes to higher performance of the organization through actual productivity gains derived from employee suggestions.

The suggestion system [27, 32] helps improve communication by giving the employees the opportunity to be heard by the management through their proposals and suggestions for improvement. In many public-sector organizations, communication is often characterized as one-way, as seen in Figure 5.7. Since the policies, objectives, and targets are already set by management, employees are generally expected to perform their tasks and simply follow the orders and directives. The result may be token compliance or involuntary obedience.

FIGURE 5.7

COMMUNICATION AS A ONE-WAY SYSTEM.
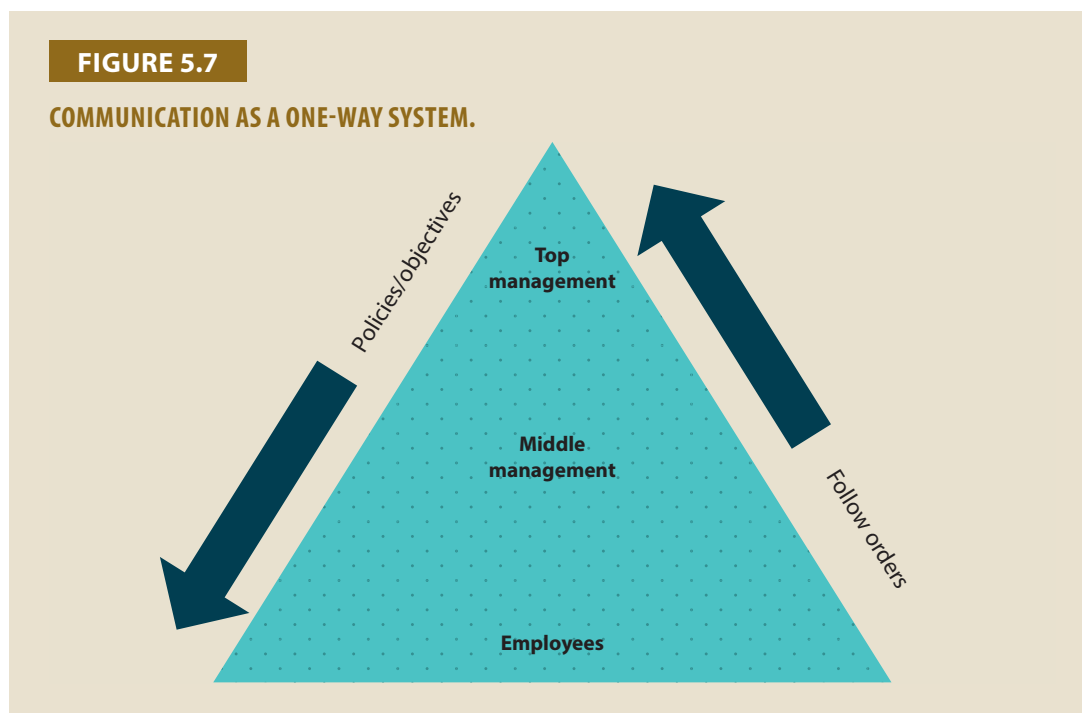
Another concern in big organizations is the blockage of communication between top management and employees by the middle management, although this may not be deliberate or intentional (see Figure 5.8). Middle managers have the responsibility to cascade and communicate the policies and directives of top management. But even if they are very sincere, there could still be doubts and questions in the minds of employees which they would want to directly convey to top management.

FIGURE 5.8

COMMUNICATION BLOCKED BY MIDDLE MANAGEMENT.
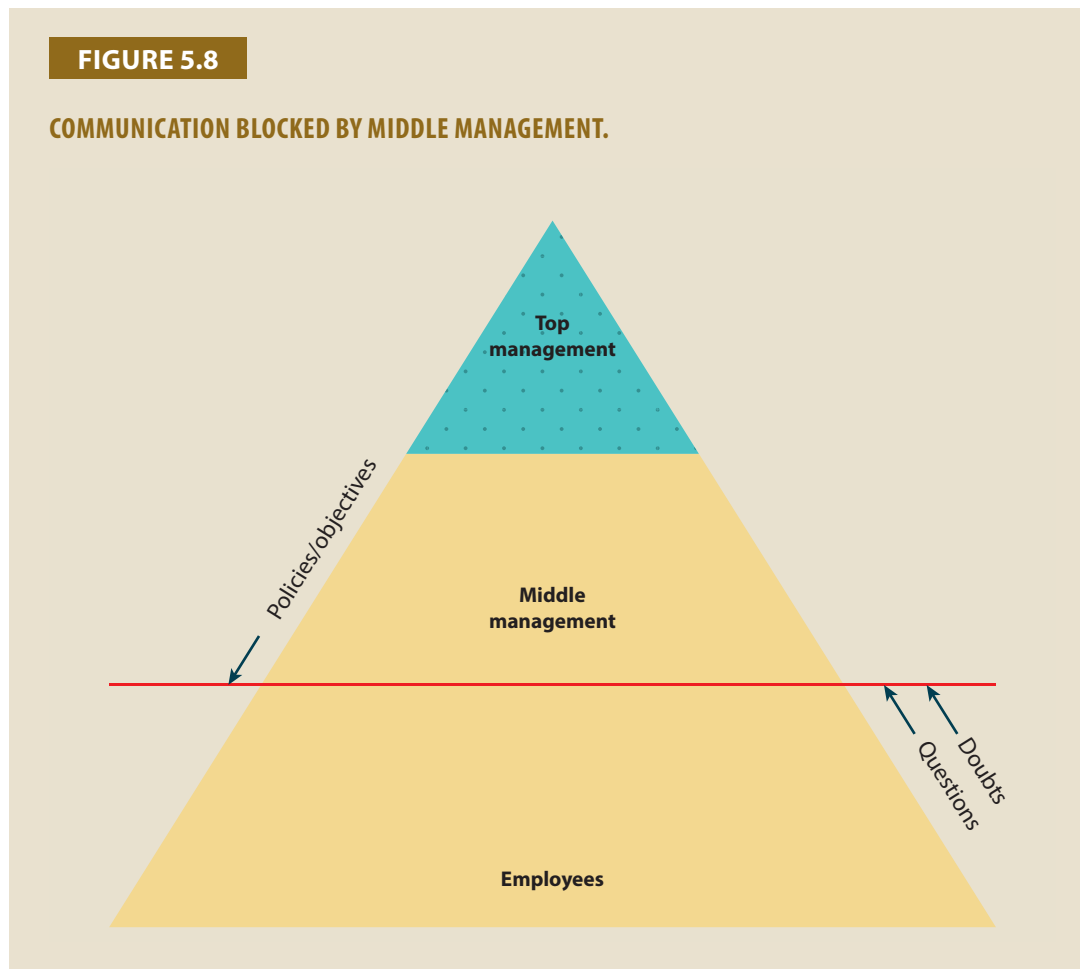
Through the suggestion system, two-way communication happens (see Figure 5.9). Employees are provided the venue to float their ideas and get recognized for their contribution while top management is able to obtain clues on areas requiring improvement. In addition, the suggestion system gives employees an opportunity to regularly talk to their supervisors and managers as well as among themselves. Through the interactions, managers and supervisors are also able to help the employees deal with work-related problems.

The suggestion system strengthens employee motivation and skills, which is key to improving productivity. The opportunity to make suggestions and participate in improvement activities is a particularly rewarding experience for employees.

Key Elements of a Suggestion System
A suggestion system is not the same as simply putting a suggestion box for people to drop their comments and suggestions. A good suggestion system has clear guidelines and procedures, and organizational and promotional strategies.

FIGURE 5.9

TWO-WAY COMMUNICATION.
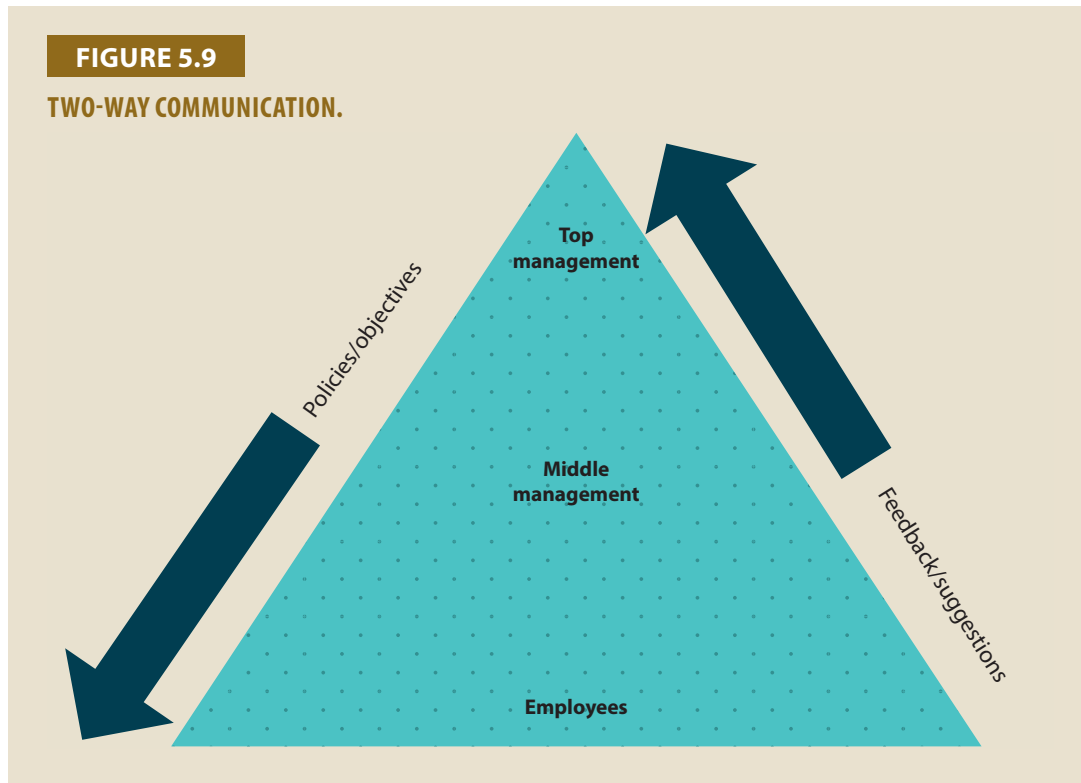
Among others, the guidelines should clearly indicate eligibility, types of acceptable suggestions, criteria for evaluation, and awards, including forms.

Eligibility defines who are eligible to participate and who is entitled to receive an award. In most suggestion systems, only individuals and teams of employees are eligible to join the scheme, not the managers.

What suggestions would be acceptable? Suggestions can cover a wide variety of subjects with the aim of making transactions faster and jobs easier, while improving quality and saving time and cost. Below is an example list of acceptable suggestions:

- Improvement in one's own work

- Reduction of processing time.

- Improvement in quality of service

- Conservation and better use of energy, supplies, facilities, and equipment

- Improvement in work environment, safety, and security

The following items, however, are not allowed:

- Grievance/complaints or demands directed to management

- Repetition of subjects that have already been settled or implemented in the workplace

- Statements of well-known facts and practices

- Policies

- Salaries and benefits

- Collective bargaining agreements/collective negotiation agreement

Management must clarify that there are other venues to discuss these issues, outside of the suggestion system.

A suggestion form is necessary to capture the ideas of employees. Employees may be discouraged to participate if the form requires too much information and details about the suggestion. Thus, a simple form is recommended, basically capturing the information about the employee, the description of the suggestion and the expected benefits (not necessarily monetary) if the suggestion will be implemented. It is important to track the exact date and time of submission as this information becomes vital when evaluating similar suggestions.

The guideline should also specify the mode of submitting the suggestions. In most cases, the practice is to submit directly to the administrators of the suggestion system. Ideally, suggestions are evaluated immediately so that timely feedback can be given to the originator. In some schemes, there is a predetermined amount of incentive given to employees upon submission, as an encouragement to participate. Subsequent and more rigorous evaluation is done to assess the merits of the suggestion. When initiating a suggestion system, it is advisable to clarify the main intention of the program and set the criteria based on the goal. Usually, the goal in the initial attempt is to encourage employees hence the target may be focused on the quantity of suggestions. At some point in time, the goal may shift to quality of suggestions. Selected criteria that may be used for evaluation are: creativity or originality; effort in trying out a new method; replicability; indirect effect to productivity and quality; and economic effect, i.e., direct contribution to shortening the process, saving in time and resources, etc. It is a good practice to include immediate feedback systems for employees in case their suggestions cannot be accepted or implemented so that they would understand why.

For recognition, various awards could be introduced. Suggestions are generally rewarded financially, but in-kind rewards and other non-monetary incentives may also be considered. The awards could be based on calculable savings or lump sum payment. In case the amount of savings cannot be immediately ascertained, management could give first the initial award and after careful deliberation, grant a final award.

The persons in charge of running the suggestion system should be formally organized and designated. They include the individual or secretariat responsible for receiving the suggestions and registering them, the evaluation committee, and those who will handle the promotions.

The guideline should also specify the regulation in case an employee forwards a suggestion that may be patented or an idea that would lead to new methods or patentable inventions. Management could also specify the mechanism to use in case employees have concerns on fairness of evaluation.

Promotion is very important to encourage participation of employees, sustain the interest of everyone, and ensure the continuous flow of suggestions. This could include production of posters

and other information materials, launching activity, competition, awarding ceremonies, publicity, and the like. Top management presence in various events sends a strong message of sincerity of management and sponsorship of the program.

Setting up the System
Following steps may be considered in establishing the suggestion system:

- Form a suggestion committee.

- Set the policies and guidelines.

- Prepare the information, communication, and education plan.

- Kickstart the program.

  - Orientation for management

  - Orientation for employees

  - Launch

- Administer the scheme.

  - Formalize receipt of suggestions.

  - Evaluate suggestions.

  - Provide feedback.

  - Award accepted suggestions.

  - Sustain IEC campaign.

- Review the system for fine-tuning and enhancement.

Facilitating and Hindering Factors
The experience in running suggestion system is mixed: Some organizations are able to realize the tremendous benefits while others fail. Some of the factors that may hinder success include

- having a passive system, e.g., suggestion box;

- limited participation of employees;

- long process to evaluate suggestions;

- lack of feedback;

- long time to realize the results of suggestions;

- resistance from immediate supervisors due to fear that the suggestions may give top management an indication of their inadequacies;

- too much focus on monetary rewards; and

- inadequate recognition.

The above mentioned factors can be mitigated by having

- a proactive system, with adequate administrative and management support;

- good promotion and advocacy to generate interest and participation;

- training for employees to enable them to come up with better ideas;

- timely feedback and transparent evaluation of suggestions;

- less emphasis on economic impact of suggestions (the focus initially should be on encouraging participation and quantity of suggestions, and later, on the quality of suggestions);

- a supportive role of supervisors and managers (management has to make clear that suggestions are not regarded as implied criticisms of the supervisors/managers within whose field of responsibility the suggestion falls); and

- rewards that consider both monetary and non-monetary incentives.

Exercise

Divide participants into three small groups. Assign each group to take the role of the designers of a suggestion system. The first group should devise the general guidelines and rules of the suggestion system to be introduced in a public-sector organization. The second group can set the criteria and evaluation process. The third group should propose promotional strategies. Groups should be given instructions to make a creative presentation of their outputs.

The facilitator should comment on the good points and areas for improvement of the proposals made by the small groups and reiterate the important elements of a suggestion system that may have been missed by the groups. Table 5.5 provides an employee suggestion template.

Unit 4: Basic Problem-solving Tools

Learning Objectives

At the end of this unit, participants will be able to

1. review the problem solving and decision-making process,

2. describe basic problem-solving tools, and

3. use selected tools when working on productivity improvement projects.

TABLE 5.5

EMPLOYEE SUGGESTION TEMPLATE.

Reference Number: _____

Employee information

Employee name _____
Position _____
Name of office _____
Name/position of immediate superior _____

Reason for suggestion

Why is this suggestion required? What is the current situation?
_____
_____
_____

Suggestion

Briefly describe the suggestion here. Use illustrations as appropriate.
_____
_____
_____

Expected effects of suggestion

Please describe what would be the benefits/impact if the suggestion is implemented
_____
_____
_____

Signature of employee   Date

Name and signature of receiver   Date

The classic model of problem solving and decision making typically involves

- defining the problem,

- gathering data about the problem,

- generating ideas or alternate courses of action for problem resolution,

- implementing the solution or decision, and

- evaluating the results.

The PDCA cycle [34], also known as the Deming cycle, provides a systematic approach to problem solving and productivity improvement. As noted earlier, 'P' stands for plan, 'D' means do or execute the plan, 'C' means check or evaluate and confirm the results, and the second 'A' means to make the good result a new standard and take corrective measures for deficiencies. When improving

systems and taking managerial action, Dr. W. Edwards Deming proposed that it should be done in a rational and conscious manner by careful application of plan, do, check, and action. The concept emphasized by Dr. Deming is the constant turning of the PDCA cycle to realize continuous improvement (see Figure 5.10).

FIGURE 5.10

PDCA CONTINUOUS IMPROVEMENT.
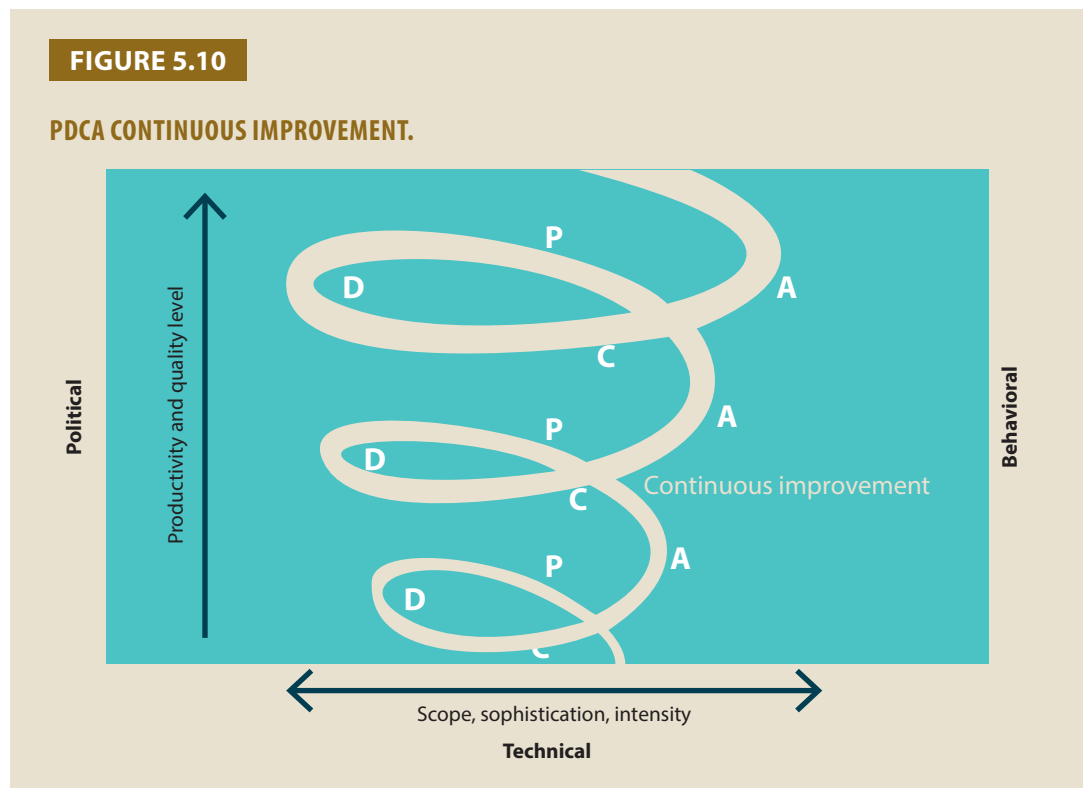
There are two scenarios in problem solving and decision making. The first scenario is when data are available and the main task is to analyze the data in order to solve the problem. Most productivity problems in the workplace fall under this scenario. The seven tools used by the famous Japanese quality circles are handy in this case. The second scenario is when data is not available, as is often the case in management, e.g., designing a new service, devising new methods for better productivity, etc. There are seven additional management tools available for the 'design approach' to problem solving. which will be discussed in the next unit.

The Problem-solving Process

Before discussing the tools, it is good to recall the problem-solving process typified in Japanese quality circles pioneered by Dr. Kaoru Ishikawa and similarly used in team-based problem-solving activities, known as the QC Story (see Figure 5.11).

When identifying a theme for team-based problem solving for productivity improvement, brainstorming technique could be employed. Brainstorming is a method to generate a large number of ideas from a group of people in a short period of time, without judgment or restriction. The ground rules are simple:

• Ask each member to speak.

• Only one idea will be shared per turn.

FIGURE 5.11

THE QC STORY.

1	Select theme/grasp the problem areas
2	Establish the objectives/target
3	Organize team and plan the activity
4	Analyze the present situation of the problem
5	Examine the improvement methods
6	Implement the improvement plan
7	Confirm the effectiveness and maintain action
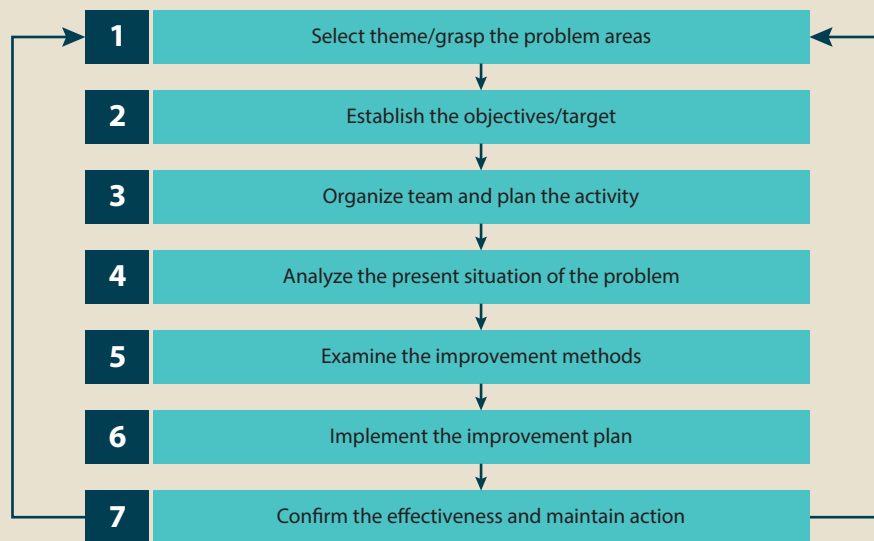
- Freewheeling discussion is encouraged.

- Wild ideas are welcome.

- Criticism is not allowed.

- Team should aim for quantity of ideas, not quality.

- Every idea will be evaluated subsequently.

The consensus technique can then be employed to select the problem area that the team will work upon. The consensus technique is a means of finding an idea or proposal acceptable enough that all members can support it. In this process, each member's concerns are heard and understood. The free and open exchange of ideas continues until agreement is reached. While the conclusion may not reflect exact wishes of each person, it does not violate the deep concerns of everyone. The consensus technique is applicable in other stages of the problem-solving process.

To have rigorous analysis of the situation and get to the focal point of improvement, it is necessary to collect data and information from various sources and use the seven tools, as appropriate, to analyze the problem and its causes.

When collecting data, the following points should be considered:

- Data to be collected should be relevant to a particular problem.

- Method of collection should be objective.

- Data should be collected on a record form.

- Data should preferably be collected personally to ensure reliability.

- Data collected should cover 5W2H, i.e., what, why, who, where, when, how, and how much.

- Method to summarize the data should be determined.

The Basic Seven Tools

The seven tools are basically statistical and analytical tools. These include check sheets; histogram; Pareto diagram; graphs; control charts; cause-and-effect diagram, also known as Ishikawa fishbone diagram; and scatter diagram. The main uses and features of these tools are summarized in Figure 5.12. As indicated, check sheets, histogram, and Pareto diagram are generally applied to investigate the distribution of the characteristics of the item or situation being studied. Graphs and control charts are useful to note changes that have occurred over a period of time. The cause-and-effect diagram and scatter diagram are used to investigate the causes of dispersion.

FIGURE 5.12

BASIC SEVEN TOOLS.

Investigate the distribution of the charactristics of the item or situation being studied	**1** Checksheets	• Show how often certain events happen
	2 Histogram	• Consolidates data to show an overall picture of the process under study
	3 Pareto diagram	• Indicates problem areas • Prioritizes problem
Note changes that have occurred over a period of time	**4** Graphs	• Show trends
	5 Control charts	• Show if process is in control • Show what changes have taken place and what improvements must be done
Investigate causes of dispersion	**6** Cause and effect diagram	• Identifies causes of problem • Organizes relationship of casual factors
	7 Scatter diagram startification	• Determines correlation between two kinds of data

1. **Check sheet:** A check sheet is a form used to observe how often certain events happen. They are designed to tabulate data based on routine checking.

2. **Pareto diagram:** A Pareto diagram shows which, among various items, is the biggest and most influential. In problem solving, the Pareto diagram is used in classifying problems according to cause and phenomenon. The items or causes are diagrammed according to priority using a bar graph format, with 100% indicating the total value. Using the Pareto principle of vital few, it is easy to identify and prioritize the predominant cause of the problem, the problem that should be solved first, and the effect that could be expected after implementing the solution.

3. **Cause-and-effect diagram:** A cause-and-effect is used to analyze the characteristics of a problem or a situation and the factors that contribute to them. It is also referred to as Ishikawa fishbone diagram, after Dr. Kaoru Ishikawa popularized its use in QC problem-solving activities [10]. The schematic diagram shows the logical relationship between a problem or result and its causes.

4. **Graphs:** There are many kinds of graphs that can present data in visual form, depending on the shape desired and the purpose of analysis. Bar graphs compare values via parallel bars, while line graphs are used to illustrate variations over a period of time. Circle graphs indicate the categorical breakdown of values, and radar charts assist in the analysis of previously evaluated items. Readily available computer software like Microsoft Excel aids in to creating various graphs automatically.

5. **Control charts:** In statistical process control, two types of variations may be observed, namely, the inevitable variations that occur under normal conditions and those that can be traced to a cause. The latter are referred to as 'abnormal.' Control charts serve to detect abnormal trends with the help of line graphs. These graphs differ from standard line graphs in that they have control lines at the top and bottom levels. Sample data are plotted in dots on the graph to evaluate process situations and trends. In the public sector, control charts may find limited application as they are most often used in process controls.

6. **Scatter diagram:** The scatter diagram is a chart used to show the relationship between two variables.

7. **Histogram:** A histogram is a chart used to put a dispersion shape in a graphical form, also known as the frequency distribution chart. It is used to consolidate data to show an overall picture of the situation under study.

Exercise 1: Check Sheets

Divide the class into small groups. Give instruction to groups to select a problem area and determine and discuss the data needed to clarify the situation. The specific instructions below on how to make a check sheet should be discussed with the class beforehand:

• Indicate the purpose of data collection.

• Identify the items to check.

• Decide on how to collect data (5W2H).

• Estimate the amount of data needed.

• Prepare the format of the check sheet.

• Try and use the check sheet.

• Obtain approval to gather data.

• Collect data consistently and honestly.

Exercise 2: Pareto Diagram

Give participants a set of data to work on. Discuss the steps in preparing a Pareto table, as follows:

- Arrange the data items from highest to lowest frequency.

- Compute the percentage of each data item.

- Compute the cumulative frequency.

- Compute the cumulative percentage.

Once the participants have completed the Pareto table, give instructions on how to draw the diagram:

- Draw the bar graph in the order of highest to lowest frequency.

- Enter the title of each data item under the horizontal axis.

- Draw the cumulative curve using the cumulative frequency.

- Put labels on the diagram.

Exercise 3: Cause-and-effect Diagram

Show sample of a completed cause-and-effect diagram: Divide the class into small groups. Ask each group to select a problem to analyze. Remind the groups to use a negative statement of the problem, e.g., long queues in securing licenses, low budget utilization, high energy consumption, etc.

Give the following instructions on how to construct a cause-and-effect diagram:

- Write the effect on the right most part and connect it into the spine.

- Identify the major causes of the effect. Write them into the large bones.

- Identify the other causes under each major cause by asking 'why' five times.

- Write each cause into the middle and small bones.

- Review the cause-and-effect relationship.

Exercise 4: Scatter Diagram

Provide sample data (at least 30 pairs of x, y), e.g., age of persons and frequency of errors in filling up forms. Give instructions on how to prepare a scatter diagram:

- Arrange the data (x,y) in a table.

- Find the maximum and minimum values for both x and y axes. Whole numbers are preferred to facilitate scaling.

- Draw horizontal axis (x) and vertical axis (y). Make the two scales approximately equal.

- Plot the data. If the values overlap, make concentric circles or plot the second point in the immediate vicinity of the first.

- Label all items, e.g., title of the diagram, time interval (collection period), number of pairs of data, title and units of each axis, and the name of the person who prepared the diagram.

- Analyze the pattern.

If participants have access to computer, they can use it to automatically create the scatter diagram.

Exercise 5: Histogram

Give participants at least 50 or more samples of data to work on. Give the instructions below on how to prepare a histogram:

- Confirm that there are at least 50 or more samples of data.

- Find the highest and lowest values.

- Determine the range R where R = (highest value – lowest value).

- Determine the number of classes k where k = $\sqrt{N}$ or use Table 5.6.

TABLE 5.6

HISTOGRAM TABLE.

No. of data (N)	No. of classes (k)
50–100	6–7
100–250	7–12
More than 250	10–20

- To get the class size h, divide the range R by the number of classes k, where h = R/k.

- Determine the class boundaries or end points, where
  lower end point = lowest value – measuring unit/2
  higher end point = lower end point + h

- Construct a frequency table (see Table 5.7)

TABLE 5.7

FREQUENCY TABLE.

Class No.	Class boundaries	Mid-value	Frequency	Total
Total				

- Construct the histogram. Put the frequency in the vertical axis and the class boundaries in the horizontal axis.

• If specification limits are available, indicate them on the graph.

• Analyze the patterns. Show the various type of histograms (see Figure 5.13) and analysis derivable from the shape of distribution.

FIGURE 5.13

VARIOUS TYPES OF HISTOGRAMS.

Bell shaped: The normal pattern

Double peaked: Suggests two distributions

Skewed: Look for other processes in the tail

Truncated: Look for reasons for sharp end of distribution or pattern

Ragged plateau: No single clear process or pattern
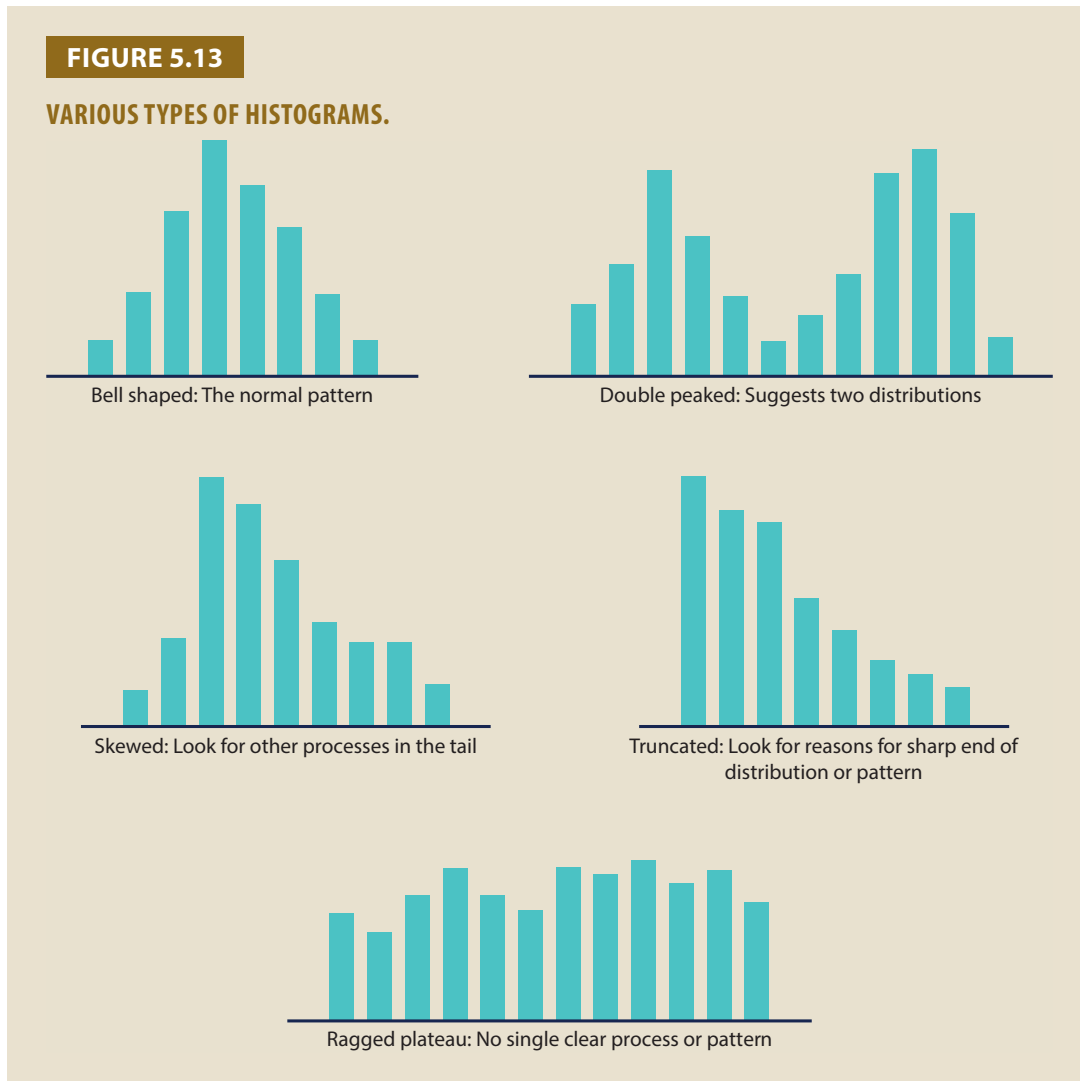
Unit Resources
See [35, 36] under References.

Unit 5: Management Tools for Problem Solving and Decision Making

Learning Objectives
At the end of this unit, participants will be able to

1. review the problem-solving and decision-making processes,

2. describe the seven management tools, and

3. use selected tools when working on productivity improvement projects.

In the unit, Basic Problem-solving Tools, two scenarios in problem solving and decision making were discussed: when data is available and the main task is to analyze the data in order to solve the problem; and when data is not available, as is often the case in management decision making and in 'design approach' to problem solving.

The Management Tools/Techniques

For 'design approach' to problem solving, there are additional management tools: affinity diagram, relations diagram, matrix diagram, matrix data analysis diagram, tree diagram, arrow diagram, and process decision program chart. These tools for managers (and even employees) assist in assimilating descriptive data (fact, opinion, and idea) as well as technical information to structure productivity ideas and in developing specific productivity improvement plans creatively. Figure 5.14 specifies their uses in structuring problem, investigating or analyzing causes, and developing strategies. The affinity diagram and relations diagram are appropriate when sorting out complexity and defining the problem. The matrix diagram and the tree diagram are handy when developing strategies to solve the problem. The arrow diagram and the process decision program chart are helpful when formulating the specific course of action and coming up with a sequencing plan.

FIGURE 5.14

THE SEVEN MANAGEMENT TOOLS.

Planning step 1. Sort out complexity and confusion and define the problem	Affinity diagram — Relations diagram → Cause-and-effect diagram
Planning step 2. Develop strategies to solve the problem	Matrix diagram — Tree diagram
Planning step 3. Formulate a specific action plan by sequencing the strategies	Arrow diagram — Process decision program chart
Do	Data analysis: Pareto diagram, checksheet, histogram, scatter diagram, control chart, graphs ← The six remaining conventional QC tools

1. **Affinity diagram:** Derived from the KJ Method developed by Dr. Jiro Kawakita, affinity diagram is a technique used to clarify a chaotic or indeterminate situation (e.g., future events, unknown circumstances or new experience) and generate ideas by arranging descriptive data according to their mutual or natural affinities. The affinity diagram is an effective tool for cutting through confusion and bringing the problem or opportunity for improvement clearly into view. This tool is applicable in problem identification,

development of policy, designing new programs, formulation of promotional campaigns, and similar tasks. Figure 5.15 provides the structure of an affinity diagram.

FIGURE 5.15

STRUCTURE OF AN AFFINITY DIAGRAM.
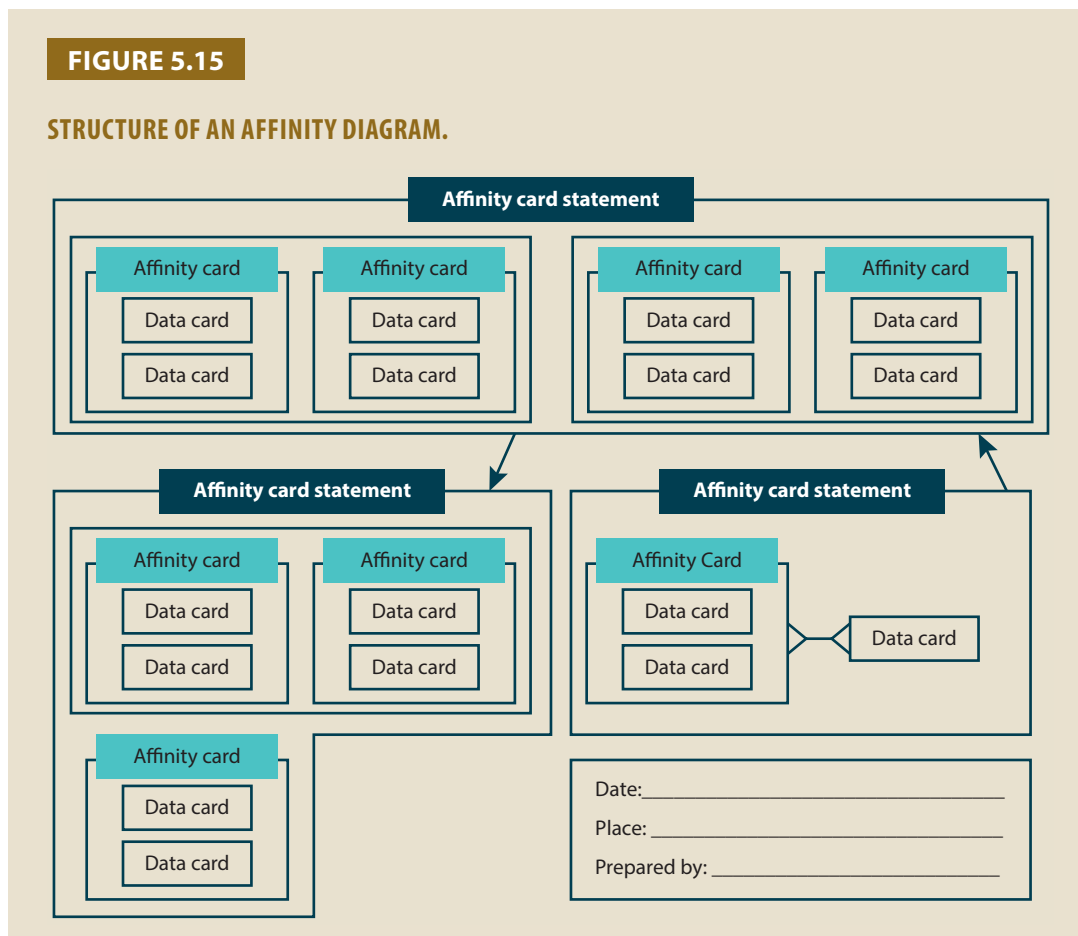
2. **Relations diagram:** The relations diagram (see Figure 5.16) is a technique used to clarify relationship of tangled issues or intertwined causes or effects. It is used to resolve complicated issues by sorting out the logical connections among intertwined causes and effects or objectives and strategies. Through this technique, the problem becomes recognizable and priorities could be identified accurately. The cause-and-effect diagram is a variation of relations diagram, though it is simpler in form, i.e., there is no crisscrossing of interconnections between causes and effects.

3. **Tree diagram:** This is a tool used to search and find out the most adequate means to accomplish a purpose or a target. Originally developed for function analysis in value engineering, this technique facilitates systematic and logical development of strategies to solve a problem or to identify measures to achieve a target. It eliminates the possibility of omissions. The method starts by setting an objective, i.e., a target, goal or result and goes on to develop a succession of strategies for achieving the goal as illustrated in Figure 5.17.

Here, it is possible to identify more than one measure or strategy to achieve the target or objective. As the target or measure is cascaded, several specific measures could be identified. Hence, once completed, the diagram will appear like a tree.

FIGURE 5.16

STRUCTURE OF A RELATIONS DIAGRAM.
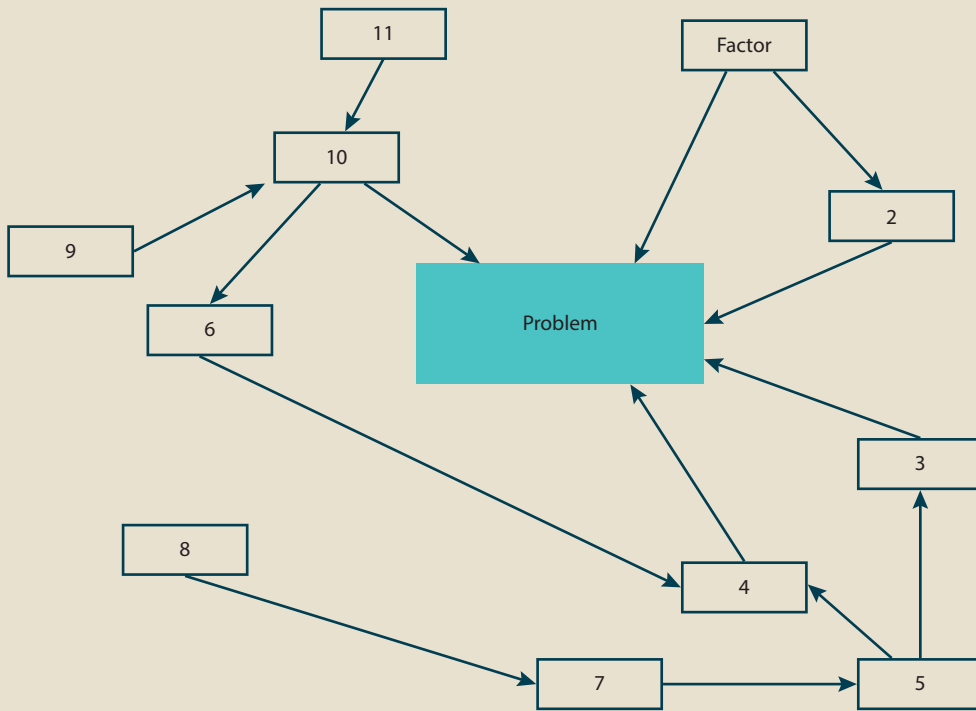
FIGURE 5.17

STRUCTURE OF A TREE DIAGRAM.
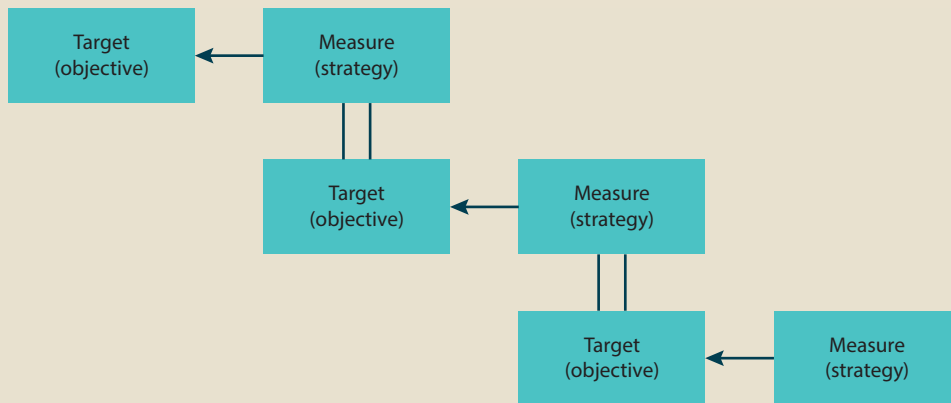
4. **Matrix diagram:** This technique is used to structure a problem and examine the relationship between two or more sets of factors (see Figure 5.18). It consists of a two-dimensional array of columns and rows whose intersection is examined to determine relationships, though it is also possible to make an analysis with several dimensions using this tool. The matrix diagram is useful in setting priorities and highlighting significant items through multi-dimensional thinking. The various types of matrix diagram are

- L-type, which shows relationship of two elements;

- T-type, which is a combination of L-type diagram with one common element or dimension;

- Y-type, which is a combination of L-type matrix diagram with three dimensions; and

- X-type, which is a combination of four L-type matrix diagrams with four dimensions.

FIGURE 5.18

EXAMPLE OF A MATRIX DIAGRAM.

5. **Matrix data analysis:** A related technique is matrix data analysis. It is used when the matrix diagram is unable to provide sufficient information on relationship of factors. This method arranges the data presented in a matrix diagram such that a large array of numbers can be easily seen and comprehended. Here, items are arranged in a column-row format, with the degree of correlation entered in relevant column using symbols or numerical values. This is the only method among the seven management tools that is based on data analysis and provides numerical results. Nowadays, bigger amount of data can be easily analyzed in this manner using available software.

6. **Arrow diagram:** This is a technique used to present the relationship between and among essential activities for proper sequencing and schedule control (see Figure 5.19). It is

also known as precedence diagram or project evaluation review technique (PERT). Through the arrow diagram, it is possible to clarify the overall process involved in the execution of a project and identify possible problems or bottlenecks before the actual execution of plan.

FIGURE 5.19

STRUCTURE OF AN ARROW DIAGRAM.
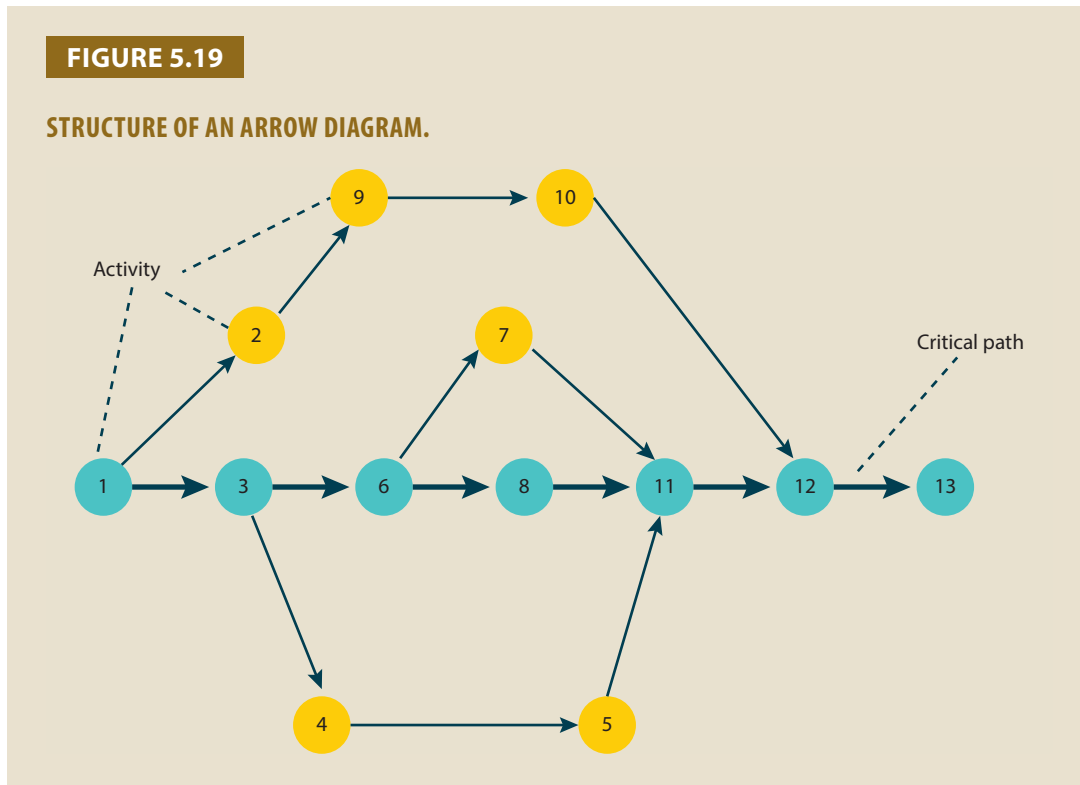
Project management software is available to facilitate the preparation of an arrow diagram or PERT. Nonetheless, it is necessary to identify which activity takes precedence over another as such thinking or decision cannot be relegated to the computer.

7. **Process decision program chart:** The process decision program chart (PDPC) is a technique used to plan for various contingencies or alternative courses of action in anticipation of a problem or an undesirable event in the future. Developed by Jiro Kondo of University of Tokyo when the university was faced with a campus revolt in 1968, it is a tool to get activities back on track as quickly as possible and steering events in the required direction whenever unexpected problems force a process off course since the alternative courses of action are already identified beforehand.

To make a PDPC (see Figure 5.20)

• write down the implementation activities considering the case where there is no obstacle,

• list all the undesirable events (potential problems) that could happen for each implementation item, and

• make countermeasures and implementation plan.

FIGURE 5.20

A SIMPLE PROCESS DECISION PROGRAM CHART.

The PDPC will benefit from people with rich knowledge (tacit and explicit) on the subject, either related to process or content.

Exercise 1: Affinity Diagram
Divide the class into small groups. Issue the below instructions on how to make an affinity diagram:

1. Decide the theme.

2. Make data cards.

3. Group raw data cards.

4. Make affinity cards.

5. Repeat card gathering.

6. Layout the diagram.

7. Summarize and label the diagram.

Emphasize to the groups that ideally, the theme should be phrased in a question form, e.g., "What characteristics of service are important to the client/citizens?" to facilitate the generation of idea cards. Other instructions are as follows:

1. Write cards using simple sentences and concrete words.

2. Write one descriptive data per card.

3. Set aside cards of the same sentence.

4. Put together two cards at a time.

5. Do not simply add the contents of data cards in making an affinity card; try to capture their essence.

6. When you cannot find any card with affinity to a card, leave it alone. This is called the 'lone wolf.'

Exercise 2: Relations Diagram

Divide the class into small groups. Give instructions on how to make a relations diagram as follows:

1. Choose a problem theme and put it in the center of a paper. Clarify the assumptions such as from whose standpoint will the problem be analyzed.

2. Make cause cards.

3. Arrange cause cards.

4. Decide primary causes and connect to the theme with tentative arrows.

5. Connect the cards according to cause-and-effect relationship, then search for the causes until you grasp the status of the problem.

6. Review the causal relationship.

7. Identify major cause/s.

8. Summarize conclusions and label the diagram.

Some checkpoints to consider are given below:

1. Express the problem in the form of a 'why.'

2. Write one cause per card.

3. Write concrete sentences with subject and object.

4. Avoid writing cause cards ending with results.

5. Review the cause and effect relationship repeatedly by asking 'why-why.'

6. Arrange cards so that arrows will not cross each other.

7. If a loop appears in the diagram, cut where the relation is most weak.

Exercise 3: Tree Diagram
Divide the class into small groups. Give the following instructions on how to make a tree diagram:

1. Write the basic objective on a card and place it on the far-left side of a paper.

2. Make second measure cards and deploy.

3. Make third measure cards and deploy.

4. Continue deployment until the measures become concrete.

5. Confirm the relationship between the target and the measures.

6. Connect the objectives and measures with lines.

7. Write upper objective and limitations, label the diagram.

Additional checkpoints should be following:

1. Don't forget to write the upper objective in the diagram.

2. Write limitations, if any.

3. Leave the first set of measures.

4. Write only one idea per card.

5. Make the measures concrete and implementable.

6. Stick to the basic objective.

7. Confirm the objective-measure relationship starting from the lowest level.

Exercise 4: Matrix Diagram
Divide the class into small groups. Give the following general instructions on how to make a matrix diagram:

1. Confirm the theme/problem to be evaluated.

2. List the elements of the problem.

3. Establish the degree of relationship between elements.

4. Evaluate alternatives.

5. Summarize result and label the diagram.

To focus the exercise, groups can be guided to evaluate measures identified from a previous output of the tree diagram exercise. More specific instructions such as the following could be given:

1. Write the final-level measures from the tree diagram in rows.

2. Decide the evaluation categories and write them under the evaluation column.

3. Identify the organization units that will be involved in implementing the measures and write them under responsibility column.

4. Put a remarks column on the right hand side.

5. Examine each intersection and note the evaluation.

6. Determine the score for each combination of symbols.

7. Define responsibilities and fill out remarks.

8. Summarize, record the meaning of symbols used, and label the diagram.

The checkpoints are following:

1. Measures/elements should be concrete.

2. Weights of items to be evaluated should be equal.

3. Responsibilities should not be divided among too many people.

4. Objectivity should be maintained in assessing the strength of relationship.

Exercise 5: Process Decision Program Chart
Divide the class into small groups. Give instructions on how to prepare a PDPC:

1. Decide the starting point and the target.

2. Write down the implementation items considering the case where there is no obstacle.

3. List all the undesirable events (potential problems) that could happen for each implementation item.

4. Make countermeasures and implementation plan.

5. Check for inconsistencies and missing items.

6. Identify the most desirable path so that it stands out from others and separately highlight the undesirable events.

7. Summarize and label the diagram.

Additional check points are following:

1. Decide the target with basic objective in mind.

2. Avoid crisscrossing of arrows.

3. Make implementation items clear and concrete.

4. Don't be too optimistic.

5. Make clear the most desirable path.

Unit Resource
See [11] under References.

Unit 6: Lean Management

Learning Objectives
At the end of this unit, participants will be able to

1. appreciate the development of lean thinking,

2. understand the concepts of lean management,

3. discuss the principles of lean management, and

4. discuss how to implement lean management.

Definition of Lean
According to Eaton [4], 'lean' is an approach for improving organizations that focus on the needs of customers and considers everything that is neither delivering value to customers nor ensuring the safety and security of the organization and its staff as waste and therefore a target for elimination. In public-sector organizations, lean management would mean "doing more with less" (higher productivity), e.g., delivering good quality services to the public using lesser time, cost, manpower, and other resources.

Development of Lean Thinking
Lean management is based on the Toyota Production System popularized by Toyota Motor Company, which espouses value creation through total elimination of wastes. Two academics, James P. Womack of the Massachusetts Institute of Technology and Daniel T. Jones of the University of Cardiff in Wales, after studying this revolutionary concept, coined the term 'lean manufacturing' to describe the Toyota System and brought the concept of 'lean' into public domain.

Although its early application was in production, lean concepts and principles are useful in other fields, especially where there is interest in "understanding what the customers want and redesigning

the way things are done to ensure that these expectations are delivered in the most cost effective, timely and safe way possible"[4].

To appreciate the development of the concept and the thinking behind lean, it is useful to recall its evolution.

HISTORY OF LEAN

1473 the Venetian Arsenal developed a continuous flow process based on mass-produced and standardized items that enabled them to produce an entire ship in less than an hour.

1776 Lieutenant General Jean-Baptiste de Gribeauval, Inspector of Artillery in France, reduced the diversity of artillery and replaced it with a more standardized range of weapons that used a form of interchangeable parts and manufacture.

1799 Eli Whitney, inventor of the Cotton Gin, perfected the process of designing interchangeable parts, which enabled the process to be divided up and standardized.

1894–1912 Frederick W. Taylor published *The Principles of Scientific Management* being published in 1911, with details of how to eliminate many of the inefficient practices existing in industry at the time and advocated standardized work and division of labor to improve efficiency.

1905–21 Frank and Lilian Gilbreth published work on improving efficiency through time and motion study.

1910 Henry Ford and Charles Sorensen created the first moving assembly line, thus reducing production times by a further 75 per cent.

1924–39 Walter Shewhart developed the concept of statistical control of processes, which was adapted by W. Edwards Deming. Deming's work formed the basis of Six Sigma, a cousin of Lean.

1943 Taiichi Ohno created the Toyota Production System (TPS).

1983 Robert Hall publishes *Zero Inventories*, which is seen as the first broad description of the Toyota Production System by an American author.

1988 John Krafcik first used the word Lean in association with the Toyota Production System in his article 'Triumph of the Lean Production System'

1990–96 Jim Womack, Daniel Roos and Dan Jones produced *The Machine that Changed the World* (Simon & Schuster, 1990). Womack and Jones go on to write *Lean Thinking* (Simon & Schuster, 1996) bringing the term Lean into the public domain and defining the five principles.

Source: Eaton [4].

Lean Concepts

The concept behind lean [6] was largely based on the Toyota Production System. Hence, it is useful to review the key concepts and features of this system.

The main intention of the Toyota Production System was to establish a process that is capable of delivering required outputs as smoothly, flexibly and free of stress as possible, utilizing the minimum amount of resources. This is realized through the elimination of the three 'mu's: muda or waste, muri or overstrain, and mura or unevenness.

The Toyota Production System consists of two pillars. The first pillar is just-in-time (JIT) which refers to the concept of producing only what is needed, when it is needed, and in the amount needed. The second pillar is *Jidoka*, a Japanese term which means quality should be built into the process (see Figure 5.21).

These pillars are supported by *heijunka*, a Japanese term that means smoothing out the unevenness; standardized processes; visual management through 5S; and a philosophy called the Toyota way (customer first; people are the most valuable resource; kaizen; and shop floor focus).

FIGURE 5.21

LEAN PRODUCTION SYSTEM.

Goals: highest quality, lowest cost, shortest lead times

Involvement

Just in time
• Continuous flow
• Takt time/pace
• Pull system
• Triggers

Jidoka
• Separate man and machine work
• Identify abnormal conditions
• Poka yoke

Heijunka   Standardized work   Kaizen

Stable manufacturing process
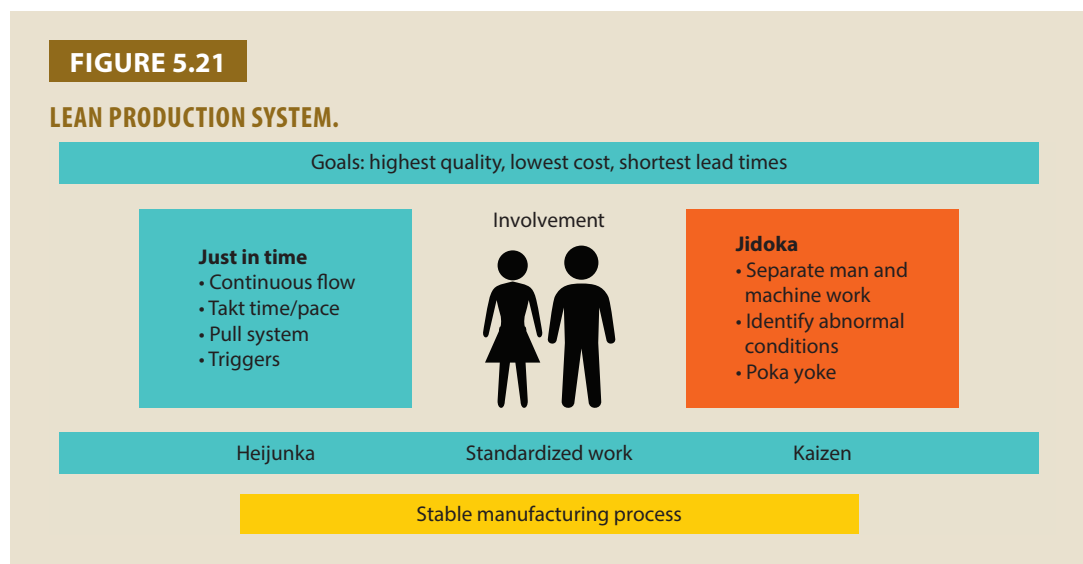
Productivity Improvement and the Three *Mu*s

In lean management, increases in productivity can be realized through the elimination of non-value adding activities. Lean identified three types of these non-value adding activities which contribute to poor performance. These are the same as the three *mu*s of Toyota, namely, *muda, mura,* and *muri*.

Muda means waste. It refers to a thing or activity that does not add value to the customer. *Muda* increase organizational costs and lead times while also increasing the possibility of errors. They are typified by Toyota's seven wastes. Table 5.8 illustrates examples of these wastes.

Mura (unevenness) refers to variation or inconsistencies due to some form of imbalance. The *mura* creates problems that make people stop one job if it is not yet completed and start another or rush what they are doing or simply stop because they can't proceed to the next process. Queues and bottlenecks are manifestations of unevenness, which can be attributed to poor planning and unbalanced workload.

TABLE 5.8

ILLUSTRATION OF TOYOTA'S SEVEN WASTES.

Toyota's Seven Wastes	Example of wastes in non-manufacturing environment
1. Waiting	Waiting for information, people, materials or anything else to arrive
2. Overproduction	Producing outputs more than what is required
3. Rework	Having to undertake remedial work of any kind because not everything was done correctly the first time
4. Unnecessary motion	Unnecessary movement of human beings like searching, carrying very heavy items
5. Transport	Movement of information, materials, and equipment without creating any value
6. Over-processing	Performing additional processes or activities that do not add value to the output
7. Inventory	Oversupply or stocking of excess supplies, producing extra sets of materials

Muri (overstrain) means unnecessary stress or burden on people, material or equipment. *Muri* is associated with unreasonable activities such as asking people to undertake more work than they are capable of doing in a finite period or requiring equipment to function beyond what it is designed to do. For instance, it has been established that the ideal working hours per day is eight. Hence, working beyond eight hours is considered overstrain and the person working overtime may no longer be as productive.

Principles of Lean Management

Lean management has five key principles: value, value stream, flow, pull, and perfection.

First Principle: Define 'Value' from Customer's Perspective

Value as defined by Womack and Jones [25] is a "capability provided to customer at the right time at an appropriate price, as defined in each case by the customer."

Value in the context of lean means doing something that the customer thinks has value, however that value is defined. A value adding activity is one that transforms the product or service and increases its worth for the customer. An activity is value adding if customers would be willing to pay for it, or if they don't pay in monetary terms, they would be happy to invest time and resources in it. A value adding task in a service or public-sector environment is one for which customer is not directly paying but would be willing to pay for if asked [4].

The voice of the customer is very important. The customer is the only person who can define whether something is value adding or not.

To determine if a task has added value, ask the following:

- Does the customer experience the activity?

- Does the customer want the activity to occur?

- Does it occur correctly the first time?

- Will the customer care if you significantly change the activity?

Second Principle: Understand the Value Stream used to Deliver Value Currently

The value stream is defined by Womack and Jones [25] as the set of all the "specific activities required to design, order, and provide a specific product, from concept to launch, order to delivery, and raw materials into the hands of the customer." In the public sector, Rosen [19] states that the value stream is simply all of the steps involved in delivering value in a process.

To create a value stream, one has to describe what happens to a product at each step in its production, from design to order to raw material to delivery. Accordingly, there are three types of activities in the value stream. The first kind are activities that unambiguously create value. The second are *muda* activities that create no value but seem to be unavoidable. The third are *muda* activities that create no value and are immediately avoidable. Some examples of *muda* are mistakes that require rectification, downstream activity waiting on an upstream activity, or outputs/services that don't meet the needs of the customer.

Other authors like Eaton [4] modified the categories. Accordingly, the three types of activities that any process will experience are: the *runner*, the *repeater,* and the *stranger*. The *runner* makes up 70–90% of the total activity; the *repeater* makes up 10–20% of all activities within the process; and the *stranger* make up 5–10% of all activity, generally without a pattern. When doing a value stream, multiple scenarios or combinations of these three types of activities occur [25].

Third Principle: Creating Processes that Flow

The principle of flow is defined as the "progressive achievement of tasks along the value stream so that a product proceeds from design to launch, order to delivery and raw materials into the hands of the customer with no stoppages, scrap or backflows" [25]. This translates into a directive to abandon the traditional batch-and-queue mode of thinking that seems commonsense to most.

Having understood the value stream, the focus moves on to understanding how to make the value flow by eliminating bottlenecks, delays, detours, waiting, and rework. This means moving steps closer together both physically and in terms of the time taken from one step ending to the next step starting. There some important concepts involved in helping processes flow, much of which are concerned with balancing work between stages in the process and reducing the size of any batch of work [19].

Fourth Principle: Trigger Activity when the Customer 'Pulls'

The fourth lean principle of pull is defined by the authors as a "system of cascading production and delivery instructions from downstream to upstream in which nothing is produced by the upstream supplier until the downstream customer signals a need" [25]. This is in contrast with pushing products through a system, which is unresponsive to the customer and results in unnecessary inventory buildup.

Fifth Principle: Aim for Perfection

The fifth and final lean principle is perfection, defined again by the authors as the "complete elimination of *muda* so that all activities along a value stream create value" [25]. Lean is not as a one-off process but as a process of continuous improvement. The complete elimination of *muda* is more of a desired end-state that is a truly achievable goal.

How to Implement Lean

The 5S and standardized work are two fundamental elements of lean management, which could also be the trigger of its implementation. Just-in-time and Jidoka techniques could then be introduced.

Just-in-time means producing the right amount and quality of things at the right cost at the right time. JIT employs 'pull' rather than 'push' systems of producing outputs. That means the work is triggered by the demand of the customer. JIT requires smoothing out and stabilizing processes in order to achieve a continuous flow, like a stream. This means proper planning, balancing workload, and designing layout of workstations that removes unnecessary transport movements and facilitates flow of work, etc.

Jidoka means autonomation or having things with 'human touch.' The purpose of Jidoka is to develop processes that trigger alert when mistakes are made or prevent mistakes from taking place in the first place. An example of this is source inspection wherein the employees are certain that the output they are passing on to the next process is of acceptable quality [20, 23]. This means that employees are given the means to do inspection at the source. Illustrations of established standards are visible tools that can be provided for the purpose. Moreover, process documentation showing the requirements for quality inspection for each stage or workstation could also be developed. Mistake proofing (poka-yoke) is another tool that is commonly used. A poka-yoke device is a mechanism that prevents a mistake from being made or makes the mistake obvious at a glance.

Standardization means establishing precise procedures for each employee's work in a process, based on three elements to smoothen the process flow and meet the demanded output on time. These are the takt time, the precise work sequence, and the standard inventory. The takt time is the standard time or the rate at which a task or component must be performed to complete the final output of a process. The work sequence specifies the precise set of tasks that the employee must perform given the takt time. The standard inventory refers to the supplies and tools, including equipment required to keep the process operating smoothly.

Kaizen is employed to promote continuous improvement of the value stream or a process to further lessen wastes, raise productivity, and create more value for the customers. Kaizen of the value stream is for the management to do. Kaizen of a process can be undertaken by employees or work improvement teams through autonomous problem-solving activities.

Annexure: *Handbook on Productivity*, 2015

In 2015, the APO published a short *Handbook on Productivity* [1], edited by the President of the Development Academy of the Philippines, Antonio D. Kalaw Jr. It is recommended that this handbook be used as a supplementary resource and reference on productivity tools for this module. Figure 5.22 shows the book cover of the handbook.

FIGURE 5.22

HANDBOOK ON PRODUCTIVITY, 2015.
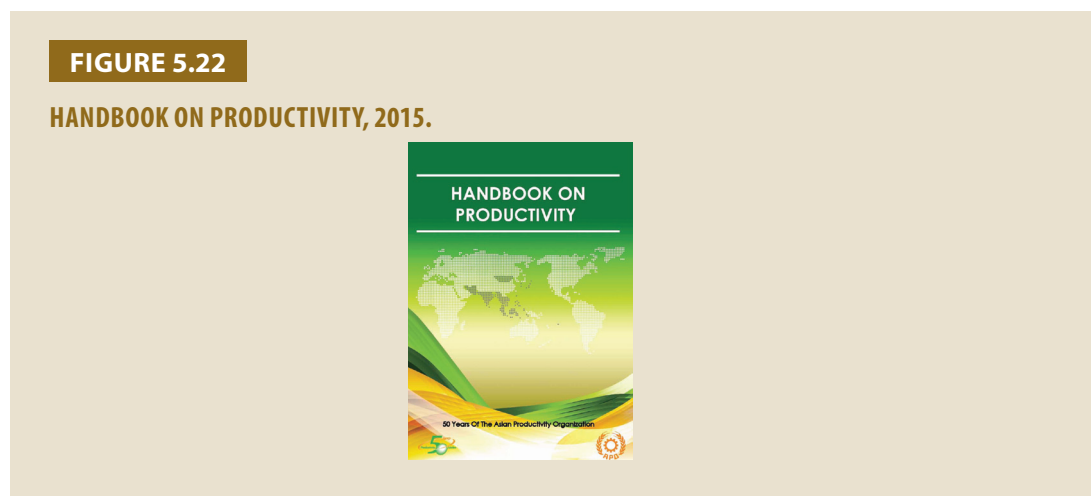
This handbook contains a description of additional productivity tools and concepts that will be useful to public-sector managers. A sampling of some key productivity concepts and tools provided in the handbook is shown in Table 5.9 and Figures 5.23.

TABLE 5.9

LIST OF PRODUCTIVITY ENHANCING INITIATIVES INCLUDED IN THE HANDBOOK.

Productivity-enhancing initiatives	Impact area			
	Product	Process	People	Policy
Cross-cutting				
1. 5S/Good housekeeping	★	★	★	★
2. 7 Wastes	★	★	★	★
3. Benchmarking	★	★	★	★
4. Green productivity	★	★	★	★
5. Kaizen	★	★	★	★
6. Knowledge management				
7. Quality circles/work improvement teams	★	★	★	
Product				
8. 3Rs: reduce, reuse, recycle	★			
9. Customer Satisfaction Index	★			
10. Eco-design	★			
11. Hazard analysis and critical control points (HACCP)	★			
12. Niche marketing	★			
13. Quality management system	★			
14. Supply chain management	★			
Process				
15. Business process reengineering		★		
16. Just-in-time production system		★		
17. Preventive/productive maintenance		★		
18. Six Sigma		★		
People				
19. Employee suggestion schemes			★	
20. Lean (Toyota) Management System			★	
21. OHSAS 18000			★	
22. Social accountability (SA) 8000			★	
23. Workplace cooperation			★	
Policy				
24. Balanced Scorecard				★
25. Business Excellence Framework				★
26. Corporate social responsibility				★
27. Energy conservation/management				★
28. Environmental management system				★
29. Global Agricultural Practices (GAP)				★
30. ISO 9000 Quality Management System				★
31. National Quality Award				★

FIGURE 5.23

PRODUCTIVITY IMPROVEMENT FRAMEWORK.

Organization-level entry points for productivity-improving initiatives

Economy-level benefits of productivity improvements
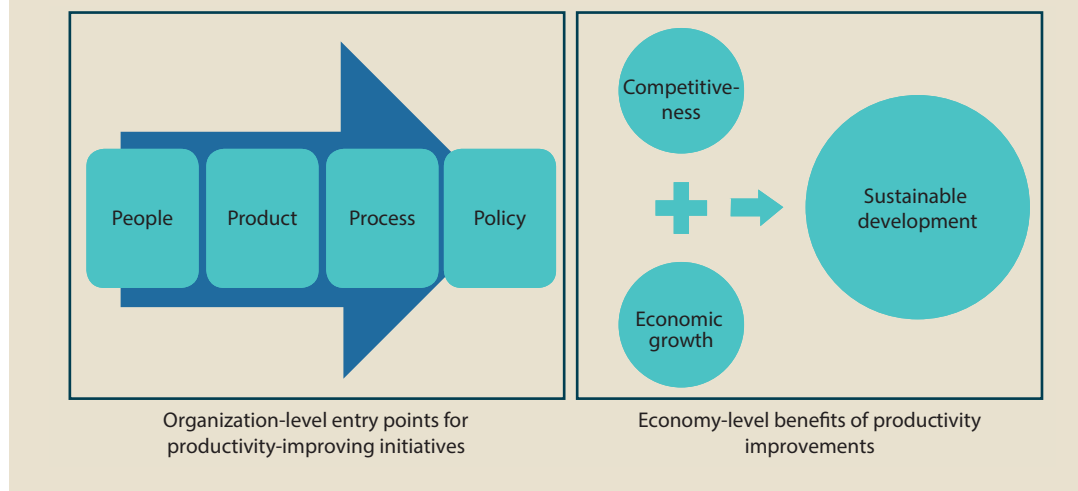
Unit Resources

See [2, 21, 31, 33] under References.

References

[1]   Asian Productivity Organization. Handbook on Productivity. Tokyo, Japan: APO Publications; 2015.

[2]   Baird R. The Four Components of a Fast-Paced Organization: Going Beyond Lean Sigma Tools. USA: CRC Press; 2014.

[3]   Cohen G., Higgins N.J. Employee Engagement: The secret of highly performing organizations. Journal of Applied Human Capital Management, vol. 1, No. 2007.

[4]   Eaton M. The Lean Practitioner's Handbook. London, Great Britain: Kogan Page Limited; 2013.

[5]   Hirano H. Putting 5S to Work: A Practical Step-by-Step Approach. Tokyo, Japan: PHP Institute, Inc.; 1993.

[6]   Hobbs D.P. LEAN Manufacturing Implementation: A Complete Execution Manual for Any Size Manufacturer. USA: J. Ross Publishing, Inc. and APICS; 2004.

[7]   Holzer M., Lee S.-H., eds. Public Productivity Handbook (2nd edition). CRC Press; 2004.

[8]   International Labor Organization. Introduction to Work Study. Geneva, Switzerland: ILO Publications; 1992.

[9]   Japan Productivity Center. Introduction to the Roles of Productivity Facilitators. Tokyo, Japan: JPC Overseas Technical Cooperation Department; 1988.

[10]   Karatsu H., Toyoki I. Mastering the Tools of QC: Learning Through Diagrams & Illustrations. Tokyo, Japan: PHP Institute, Inc.; 1987.

[11]   Mizuno S., ed. Management for Quality Improvement: The 7 New QC Tools. Cambridge, Massachusetts, USA: Productivity Press; 1979.

[12]   Nakajima S., ed. TPM Development Program: Implementing Total Productive Maintenance (Originally published by Japan Institute of Plant Maintenance). Portland, Oregon, USA: Productivity Press.

[13]   Nonaka I., Hirotaka T. The Knowledge-Creating Company. New York, USA: Oxford University Press; 1995.

[14]   Neo B-S., Chen G. Dynamic Governance: Embedding Culture, Capabilities and Change in Singapore. Singapore: World Scientific-Publishing Co. Pte. Ltd.; 2007.

[15]   Osborne D., Gaebler T. Reinventing Government. USA: Addison-Wesley Publication; 1992.

[16]   Osborne D., Plastrick P. Reinventors' Fieldbook: Tools for Transforming Your Government. USA: Jossey-Bass; 2000.

[17]   Guy B.P., Pierre J., eds. The SAGE Handbook of Public Administration. Los Angeles, California, USA: SAGE Publications; 2014.

[18]   Prokopenko J., North K., eds. Productivity and Quality Management: A Modular Programme. Geneva, Switzerland: International Labour Office, and Tokyo, Japan: Asian Productivity Organization; 1996.

[19]   Rosen E.D. Improving Public Sector Productivity: Concepts and Practice. California, USA: SAGE Publication; 1993.

[20]   Straker D. A Toolbook for Quality Improvement and Problem Solving. London, UK: Prentice Hall: 1995.

[21]   Teeuwen B. Lean for the Public Sector: The Pursuit of Perfection in Government Services. USA: Productivity Press; 2010.

[22]   Tripati J.P. Sharma S. The Key to Improve Performance: Employee Engagement. IOSR Journal of Business and Management (IOSR-JBM) e-ISSN: 2278-487X, p-ISSN October. 2016, vol.18, Issue 10. ver. IV., 2319–7668.

[23]   Van der Wagen L. Building Quality Service with Competency-Based Human Resource Management. Mumbai, India: Jaico Publishing House; 2005.

[24]   McNabb D.E. Knowledge Management in the Public Sector: A Blueprint for Innovation in Government. New York, USA: M.E. Sharpe, Inc.; 2006.

[25]   Womack J.P., Jones D.T. Lean Thinking. New York: Simon & Schuster; 1996.

[26] Anderson S. To 5S or Not to 5S. Quality Digest 27 February 2012: http://www.qualitydigest.com/inside/quality-insider-column/5s-or-not-5s.html#. Accessed on 28 July 2016.

[27] Incomes Data Services. "Implementing a suggestion scheme" in HR Study. December 2005; 812. http://www.slideshare.net/marcoperocco/implementing-a-suggestion-scheme. Accessed on 27 October 2016.

[28] Kaizen Institute. About 5S. https://www.kaizen.com/knowledge-center/what-is-5s.html. Accessed on 28 July 2016.

[29] Kelleher J. Hong Kong's E-Government Strategy: to make service delivery more efficient and bring greater quality of life to citizens. Open Gov. http://www.opengovasia.com/articles/7015-hong-kongs-e-government-strategy-to-make-service-delivery-more-efficient-and-bring-greater-quality-of-life-to-citizens. Accessed on 29 July 2016.

[30] Lean Manufacturing Tools Org. What is 5S; Seiri, Seiton, Seiso, Seiketsu, Shitsuke. 2012. http://leanmanufacturingtools.org/192/what-is-5s-seiri-seiton-seiso-seiketsu-shitsuke/. Accessed on 27 July 2016.

[31] Lean Manufacturing Tools Org. Lean Manufacturing Tools, Principles, Implementation. 2014. http://leanmanufacturingtools.org/. Accessed on 28 July 2016.

[32] Reference for Business. Suggestion Systems. http://www.referenceforbusiness.com/encyclopedia/Str-The/Suggestion-Systems.html. Accessed on 28 July 2016.

[33] Lean Production. Total Productive Maintenance. http://www.leanproduction.com/tpm.html. Accessed on 28 July 2016.

[34] APO. https://www.apo-tokyo.org/publications/p_glossary/pdca-cycle-2/

[35] https://www.usaidassist.org/sites/assist/files/styles/content-large-cropped/public/types_of_histograms.jpg?itok=PqOvU-UK.

[36] Operational Excellence Consulting. Effective Staff Suggestion System. http://www.slideshare.net/oeconsulting/planning-implementing-an-effective-staff-suggestion-system-kaizen-teian?next_slideshow=1.

DEVELOPING A PRODUCTIVITY IMPROVEMENT PLAN

A performance improvement plan is the foundation for systematic continuous performance improvement for both governments and individual public-sector organizations. Its main stages include scanning, planning, implementing, monitoring, evaluating, and continuous improvement.

At the end of this module, participants will

1. know how to create an effective and integrated productivity improvement plan for public-sector organizations,

2. know how to undertake an effective organizational diagnosis and readiness assessment,

3. know how to establish clear objectives for the improvement plan,

4. understand the basic components of an improvement plan,

5. know how to effectively implement the organization's improvement plan, and

6. know how to create a culture and systems for continuous performance improvement within an organization.

This module consists of three units:

Unit 1: Types of Quality and Productivity; Improvement Initiatives

Unit 2: Developing Productivity Improvement Plans Using a Business Excellence Framework

Unit 3: Implementing a Targeted Quality and Productivity Improvement Plan

Unit 1: Types of Quality and Productivity; Improvement Initiatives

Learning Objectives
•   At the end of this module, participants will be able to describe the main types of quality and productivity improvement plans.

Introduction
Given the very large tax-funded expenditures, public-sector organizations around the world are under pressure to improve their performance by reducing costs and by improving efficiency, service quality and the cost-effectiveness of government programs and regulations.

The APO assists its member organizations and member governments in achieving these performance improvement objectives. The APO has developed a public-sector productivity framework to guide these efforts, as shown in Figure 6.1.

FIGURE 6.1

APO PUBLIC-SECTOR PRODUCTIVITY PROGRAM FRAMEWORK.

Internal environment
(organizational structure and culture, personnel, resources)

Thematic areas
• Service quality
• Innovation leadership
• E-government
• Regulatory reform
• Citizen-centered service

Targets
• Central government
• Local government
• Public service agencies
• Public enterprises

Methods
• Center of excellence
• Best practice manual
• Training
• Observational study mission
• Development of NPOs
• Seminar
• Workshop
• Research
• Study meeting
• Adoption of P&Q tools

Results
• Citizen satisfaction
• Public trust
• Cost-effectiveness
• Competitiveness
• Quality of life

External environment
(economic, social, cultural, political, demographic)

The major result improvements to be achieved are: improved citizen satisfaction with government programs and services; improved public trust in government and public-sector organizations; improved cost-effectiveness of government programs and services; improved economic competitiveness of the nation; and improved quality of life for citizens. These five results areas are pursued through promoting the performance improvement initiatives on the left side of the graphic in Figure 6.1: service quality, innovation leadership; e-government, regulatory reform, and citizen-centered service.

The other modules in this manual outline how to improve the performance in areas such as service, e-government, regulatory reform, leadership and human resource management. This module will outline how to plan and implement quality and productivity performance improvement initiatives.

Conceptual Definition

Performance improvement planning refers to the process of setting measurable performance improvement objectives and establishing the strategies and methods for: achieving those objectives; successfully implementing the plan; and measuring actual against planned results. Performance improvement planning draws on the subjects of strategic planning and management; project planning and implementation; and performance measurement; change management; and innovation and benchmarking.

Performance improvement initiatives may be either comprehensive in nature (the entire organization in all its components) or may be targeted to improving specific organizational functions such leadership, innovativeness, knowledge management, service delivery, employee engagement, or program and smart regulation.

Comprehensive Organizational Performance Improvement Planning

The APO and many of its member countries promote the Business Excellence Model which provides public-sector organizations with a comprehensive and systematic approach to improving all aspects of the organization's performance. The Baldrige Excellence Award Model used in the USA is one such model, as shown in Figure 6.2. Originally developed for the private sector, variants of this model are now also used for the public sector.

The APO has adapted the private sector excellence model to the public sector [2], as shown in the next section.

FIGURE 6.2

BALDRIGE CRITERIA FOR PERFORMANCE EXCELLENCE FRAMEWORK.
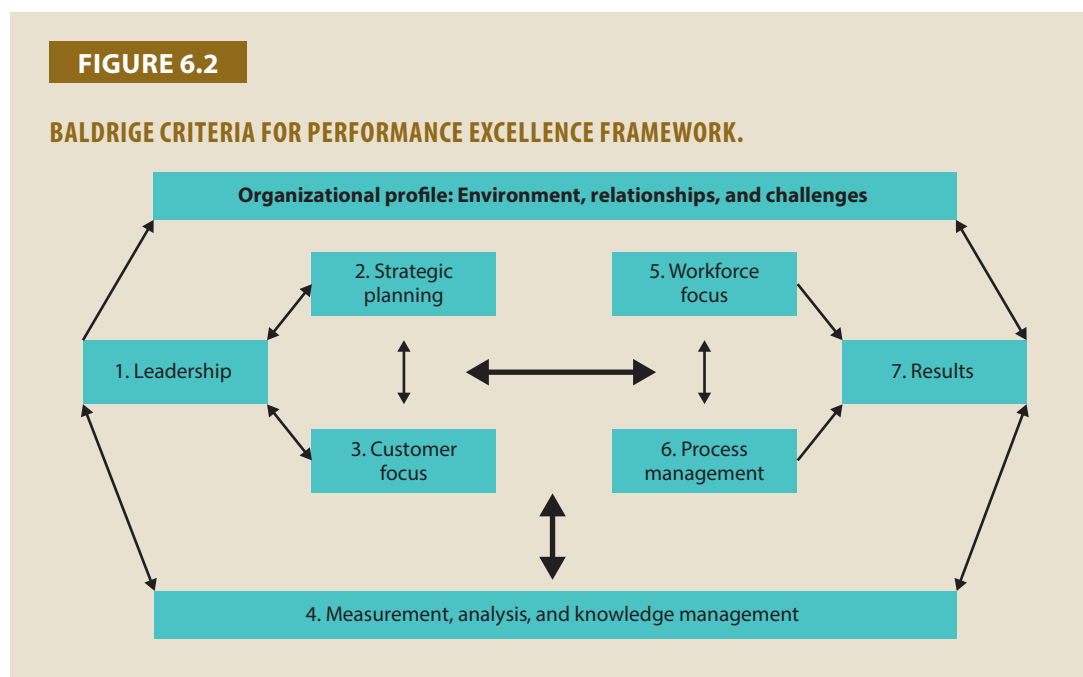
Another example of a business excellence model adapted to the public sector is the Common Assessment Framework developed by the European Institute of Public Administration for the European Union Ministers of Public Administration. Figure 6.3 shows the CAF Model, which is very similar to the Baldrige Excellence Model, and the business excellence models used by Asian countries for their national quality awards programs.

The EU's Common Assessment Excellence Framework

According to the European Institute of Public Administration: "The CAF is a free tool to assist public-sector organizations across Europe in using quality management techniques to improve their performance [14]. The CAF is a total quality management (TQM) tool which is inspired by the major total quality models in general, and by the Excellence Model of the European Foundation for Quality Management (EFQM) in particular [5]. It is especially designed for public-sector organizations, taking into account their special characteristics. The model is based on the premise that excellent results in organizational performance, citizens/customers, people and society are

achieved through leadership driving strategy and planning, people, partnerships, resources and processes. It looks at the organization from different angles at the same time; provides a holistic approach to organization performance analysis."

FIGURE 6.3

THE CAF MODEL.
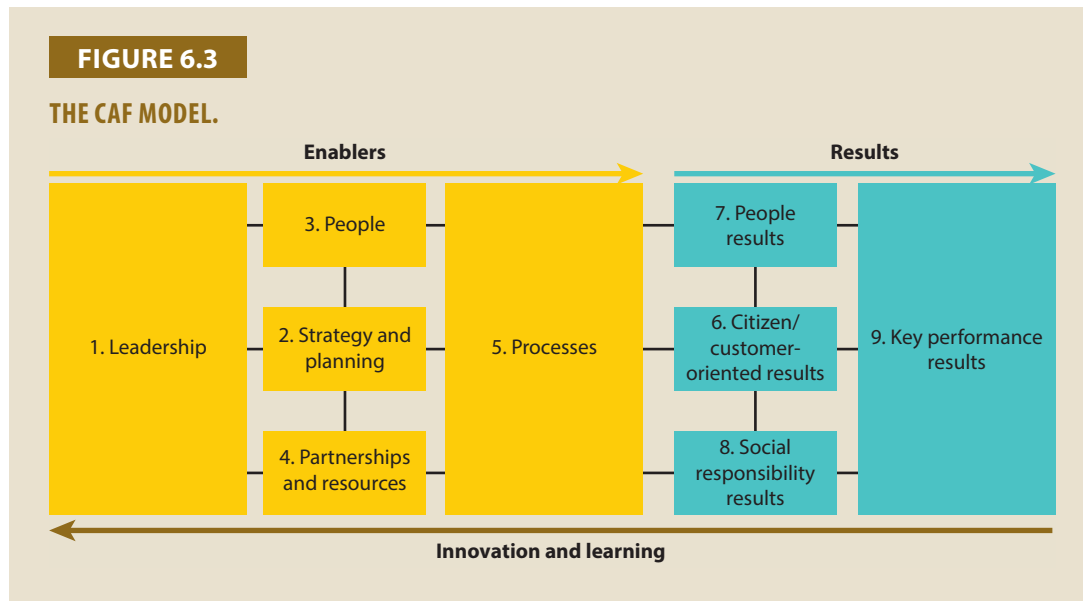
According to the UIPA, over 2,000 public organizations in Europe have used CAF to assess and improve organizational performance.

Targeted Performance Improvement Initiatives

A second form of performance improvement planning involves a focus on certain specific aspects of the organization's performance such as service satisfaction improvement, program cost-effectiveness improvement, employee engagement improvement, and public trust improvement. For example, the governments of Canada [9, 10] and New Zealand have focused on improving citizen and business satisfaction with government services, and employee engagement, while countries such as the Netherlands and the Republic of Korea (ROK) have focused on improving regulatory performance and citizen engagement. Likewise, Australia and Canada have launched initiatives to improve values and ethics accountability and performance in government.

According to the *Public Sector Service Value Chain Model* (see Figure 6.4), a number of separate areas of public management are actually linked to each other in a performance chain. For example, employee engagement performance is linked to client service satisfaction performance; and service and management performance drives public trust performance [6].

This module will outline how to successfully implement both types of performance improvement initiatives: comprehensive Business Excellence Model initiatives, as well as those initiatives that target improved performance in certain specific areas of the organization's activities such as the public-sector service value chain; service performance improvement; employee performance improvement; public trust performance improvement; values and ethics performance improvement; and productivity performance improvement. The module will also provide information for public managers on undertaking environmental scans; assessing current performance and organizational readiness; applying tools and techniques for performance improvement; implementing performance improvement measurement; as well as best practices identification and performance benchmarking.

FIGURE 6.4

PUBLIC SECTOR SERVICE VALUE CHAIN MODEL.

The Public Sector Service Value Chain concept proposes that
these three aspects of public management are linked:
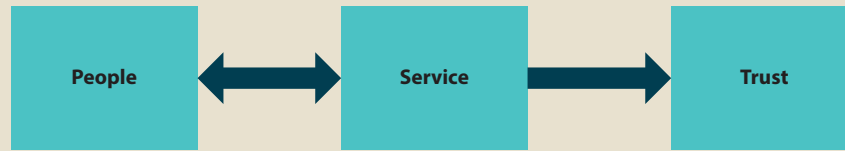
Link 1
Engaged employees provide better service, and in the other direction
good service to clients results in proud and engaged employees.

Link 2
Excellent service is one important factor (along with good management)
that helps build trust and confidence in public institutions.

Source: Heintzman and Marson [6].

Learning Methodology

- Lecture

- A short video tutorial on the European Common Assessment Framework [15]

- A 30-minute movie showing case studies of organizational performance improvement
though the application of the European Common Assessment Framework for public
organizations: In this movie, seven organizations from six different European countries
tell us how they started and implemented the quality approach with CAF, which
improvements were put into place, and how this was appreciated by both internal and
external users of their services [15].

Unit 2: Developing Productivity Improvement Plans Using a Business Excellence Framework

Learning Objective
At the end of this module, participants will understand the main stages in planning and implementing
quality and productivity performance improvement Plans and will know how to create a performance
improvement plan.

Introduction
To achieve improved organizational results, public-sector organizations must implement a carefully
designed planning and implementation process that involves the following stages:

Stage 1. Assessing the organization's current environment and current level of performance and
readiness for improvement

Stage 2. Developing an improvement plan

Stage 3. Effectively implementing the performance improvement plan

Stage 4. Measuring the results achieved

Stage 5. Identifying the lessons learned in order to promote the knowledge and capacity for continuous performance improvement

The APO has developed some useful guides to assist organizations to understand and implement the Business Excellence Model as a foundation for performance improvement. These include: Handbook on Productivity; Understanding Business Excellence; Business Excellence Models and Awards for the Public Sector; and Implementing Business Excellence [1–3], as well as an Australian publication outlining the performance improvement experience of eight Australian municipalities titled Applying the Australian Business Excellence Model. This unit will draw extensively from these APO publications.

Conceptual Definitions

- **Performance improvement:** It is about measuring the output of business processes or procedures, then modifying the processes or procedures to increase the output, increase efficiency, and/or increase the effectiveness of the process or the program.

- **Performance improvement planning:** It is the process by which an organization measures its current performance levels, identifies strategies for measurable performance improvement, and implements those strategies to achieve improved organizational results.

- **Continuous quality improvement (CQI):** CQI refers to an ongoing effort to increase an agency's approach to manage performance, motivate improvement, and capture lessons learned in areas that may or may not be measured as part of accreditation. It is an ongoing effort to improve the efficiency, effectiveness, quality, or performance of services, processes, capacities, and outcomes.

- **Quality assurance (QA):** QA refers to a broad spectrum of evaluation activities aimed at ensuring compliance with minimum quality standards. The primary aim of quality assurance is to demonstrate that a service or product fulfills or meets a set of requirements or criteria. QA is identified as focusing on 'outcomes,' while CQI is identified as focusing on 'processes' as well as 'outcomes.'

- **Program effectiveness** is a measure.

The Planning Objective: Improved Organizational Performance

As we saw earlier in this module, the purpose of a quality and productivity improvement plan is to achieve better results in key areas of the organization's performance, such as employee commitment, efficiency, service satisfaction, and program effectiveness. As noted above, the APO has developed several guidebooks to assist managers to implement comprehensive organizational performance improvement through the use of business excellence models. The APO publication on public-sector excellence models includes an excellence framework for use by public sector managers as shown in Figure 6.5 [2]. As seen in Unit 1, this model is similar to the Baldrige Excellence Model, the European CAF, and also numerous Asian private sector business excellence models.

FIGURE 6.5

BUSINESS EXCELLENCE MODELS AND AWARDS FOR THE PUBLIC SECTOR.

The **leadership** triad (**leadership, strategy and customers**) emphasizes the importance of a leadership focus on strategy and customers.

The **organizational profile** sets the context for your organization. It serves as the background for all you do.

The **results** triad (**workforce, operations, and results**) includes your workforce-focused processes, your key operational processes, and the performance results they yield.

Organizational profile

Strategy

Workforce

Leadership

▲ Integration ▶

Results

Customers

▼ Operations

Measurement, analysis, and knowledge management

Core values and concepts

The **system foundation** (**measurement, analysis, and knowledge management**) is critical to effective management and to a fact-based, knowledge-driven, agile system for improving performance and competitiveness.

The basis of the criteria is a set of **core values and concepts** that are embedded in high-performing organizations.

All actions lead to **results**, which is a composite of product and process, customer-focused, workforce-focused, leadership and governance, and financial and market results.

The **performance system** consists of the six categories in the center of the figure. These categories define your processes and the results you achieve.

Performance excellence requires strong **leadership** and is demonstrated through outstanding **results**. Those categories are highlighted in the figure.

The word **integration** at the center of the figure shows that all the elements of the system are interrelated.

The **central horizontal arrowheads** show the critical linkage between the leadership triad (categories 1, 2, and 3) and the results triad (categories 5, 6, and 7) and the central relationship between the leadership and results categories.

The **central vertical arrowheads** point to and from the system foundation, which provides information on and feedback to key processes and the organizational environment.

Designing a comprehensive organizational improvement process using the Business Excellence Model involves three planning stages:

1. Assessing organizational readiness

2. Assessing the organization's current environment and current level of performance

3. Developing a performance improvement plan and action plan

These stages are followed by the implementation and results measurement phases, which will be discussed in the next unit.

The APO describes a seven-step model for organizational performance improvement (see Figure 6.6).

FIGURE 6.6

SEVEN-STEP MODEL FOR ORGANIZATIONAL PERFORMANCE IMPROVEMENT.

Step 1: Understand organizational profile

Step 2: Assess current performance

Step 3: Identify area for improvement and set improvement goal(s)

Step 4: Develop an action plan

Step 5: Implement actions

Step 6: Monitor progress and evaluate performance

Step 7: Continuously improve organizational performance

Planning Performance Improvement using Business Excellence Framework

1. Assessing Organizational Readiness: the APO Self-Assessment Framework

Is your organization ready to initiate a quality and productivity improvement initiative?

The APO has developed a self-assessment tool shown in Table 6.1 to help organizations ensure that all the factors are in place to for a performance improvement plan using the Business Excellence Framework to be successful.

If your organization disagrees or highly disagrees with any statement, then consider how to improve your score. Here are some potential actions that APO Business Excellence experts have advised organizations to consider [7]:

Leading Change

- There should be an intensive executive briefing on the significance and relevance of business excellence (BE) to organizational performance. There has to be a buy-in by senior leaders to make it a reality in the organization.

- Make each senior leader responsible for improving performance in one category of BE, e.g., leadership, strategic planning, customer focus, measurement, analysis and knowledge management, workforce focus, and operations focus.

- Ensure senior leaders organize and lead regular meetings to focus on how systems and performance can be improved.

- Get the CEO to deliver a short presentation on the importance of BE at all improvement related training sessions.

TABLE 6.1

SELF-ASSESSMENT TOOL FOR PERFORMANCE IMPROVEMENT PLANNING.

Indicate with a tick (√) your level of agreement with the statements below	Highly disagree	Disagree	Agree	Highly agree	Action (if disagree or highly disagree)
Initiating change					
Leading change					
We have designated senior leaders who will champion business excellence (BE).					
Our senior leaders will provide the time, passion, and focus needed to start the BE journey.					
Our CEO is fully supportive and ready to lead the BE journey by example.					
Creating a shared need					
We have spoken to BE organizations and our local BE administrative body on how to start the BE journey.					
Our senior managers can explain the 'reason' for BE and why they support the need for change.					
Our senior managers fully understand what is BE and their roles to make it happen.					
Implementation					
Implementation readiness					
We have a clear plan on how to embed the "Core Values and Concepts of BE" into our organization.					
We have identified our training needs and considered BE self-assessments as part of the implementation plan.					
Sustaining change					
Making change last					
All in our senior management team are going to be held accountable for implementing at least some part of the BE plan.					
We have meaningful indicators and assessment methods in place to assess our organization's progress in BE.					

Creating a Shared Need

- Find out which organizations in your local area have won a BE award and arrange a visit to learn from them.

- Conduct a team-building session with an emphasis on visioning, i.e., to project what the organization wants to achieve within a particular period of time; for example, 3–5 years from now. Project what the organization can achieve with and without BE in place.

- Organize meetings to discuss BE and what it means for each person, department and the organization as a whole.

- Give all senior managers a copy of the APO's booklet titled "Understanding Business Excellence: An awareness guide for SMEs."

Implementation Readiness

- Have a brainstorming meeting and consider whether the core values and concepts are relevant to your organization and if so, what needs to be done to embed them.

- Ensure that your self-assessment process (which identifies your organization's strengths and opportunities for improvement) and action-planning process have been planned. Include a large proportion of your organization's stakeholders such as senior managers, middle managers, employees, customers, and suppliers, as necessary. This will lead to greater buy-in of business excellence.

Making Change Last

- Recognize and reward senior managers and project teams that are successful with BE projects. Celebrate success with thank you notes, team dinners, and bonding activities.

- Track all projects and actions that stem from the BE journey. Most importantly, record all costs/benefits per action or project, collate them together, and share the information with all staff.

- Create and designate a BE corner in one of the conspicuous areas in the office with bulletin boards of information and graphs showing the results achieved. This is a simple yet effective way to motivate and engage staff as they can follow all the BE activities and projects being undertaken and the impact these are having on organizational performance. Ideally, the senior management team will be fully supportive of business excellence and will be ready to work together to take the organization forward. However, in situations when this is not the case, you can still consider starting your business excellence journey in a department or a certain part of the organization.

2. Conducting an Environmental Scan and PEST and SWOT Analyses

Environmental scanning is a process of gathering and analyzing information about an organization's internal and external environment for strategic planning purposes [4, 11, 12, 13]. The environmental scanning process entails obtaining both factual information on the social, political, technological, and economic environments in which a government or public organization is operating. Organizations have to be aware of what is happening in the environment generally because the environment impacts their challenges, strategies, and operations.

PEST analysis: Political, economic, social and technological (PEST) analysis is an analytical framework of macro-environmental factors used in the environmental scanning component of strategic management. It is part of an external analysis when conducting a strategic analysis and gives an overview of the different macro-environmental factors to be taken into consideration. It is an important strategic tool for understanding the organization's current position, potential, and direction for future operations.

For public-sector organizations, a PEST analysis (see Figure 6.7) can identify the main issues in the organization's environment, such as government policies and priorities, government and agency fiscal circumstance, legal requirements, social pressures, and technological challenges and opportunities.

FIGURE 6.7

THE FOUR COMPONENTS OF A PEST ANALYSIS.
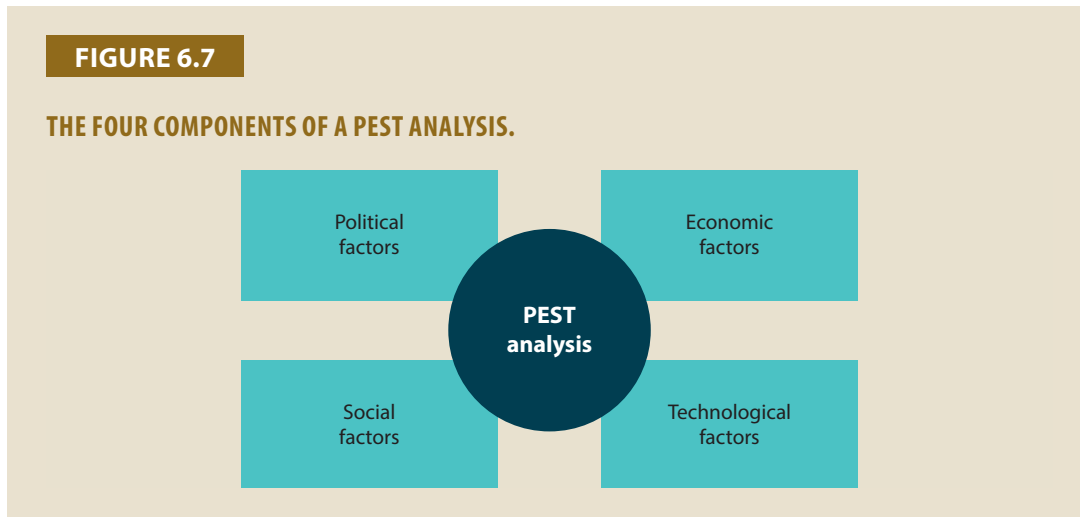
SWOT analysis: Another useful system for analyzing the organization's environment is SWOT analysis (see Figure 6.8). SWOT is an acronym for 'strengths, weaknesses, opportunities, and threats,' and is used to identify the internal strengths and weakness of the organization, and the external opportunities and threats facing the organization. Managers can use the results of the analysis to build on the strengths and opportunities and to address the internal weaknesses and external threats.

Steps to Implement a SWOT Analysis

1. Identify suitable people to be involved in the SWOT analysis, such as a person who knows the organization very well as he/she has been with the organization for many years, a critical and analytical person who can analyze the situation faced by the organization, and a person who is well-versed with the industry and the competitors.

2. Set up a meeting/workshop to carry out the SWOT analysis.

3. Identify and/or brainstorm key strengths, weaknesses, opportunities, and threats based on relevant and updated data.

4. Based on the SWOT analysis, now consider the top critical success factors.

If you're struggling to find those critical success factors, take a five-year perspective and consider your top strengths, weaknesses, opportunities, and threats such as:

• What issues affect your ability to carry out your mission?

• What product and service features or new products or services are customers likely to want in future?

• What will you do if the government changes, and/or reduces your budget?

• If you do not change anything, where will you be in five years?

Discuss, analyze, and report the findings.

FIGURE 6.8

A SWOT ANALYSIS FRAMEWORK.

	Positive	Negative	
	Strengths (S) What does your Organization do well?	**Weaknesses (W)** What could be improved in your organization? What does your organization do poorly?	**Internal factors**
	Opportunities (O) What are the situations/factors that can be exploited to the organization's advantage?	**Threats (T)** What obstacles does your organization face?	**External factors**
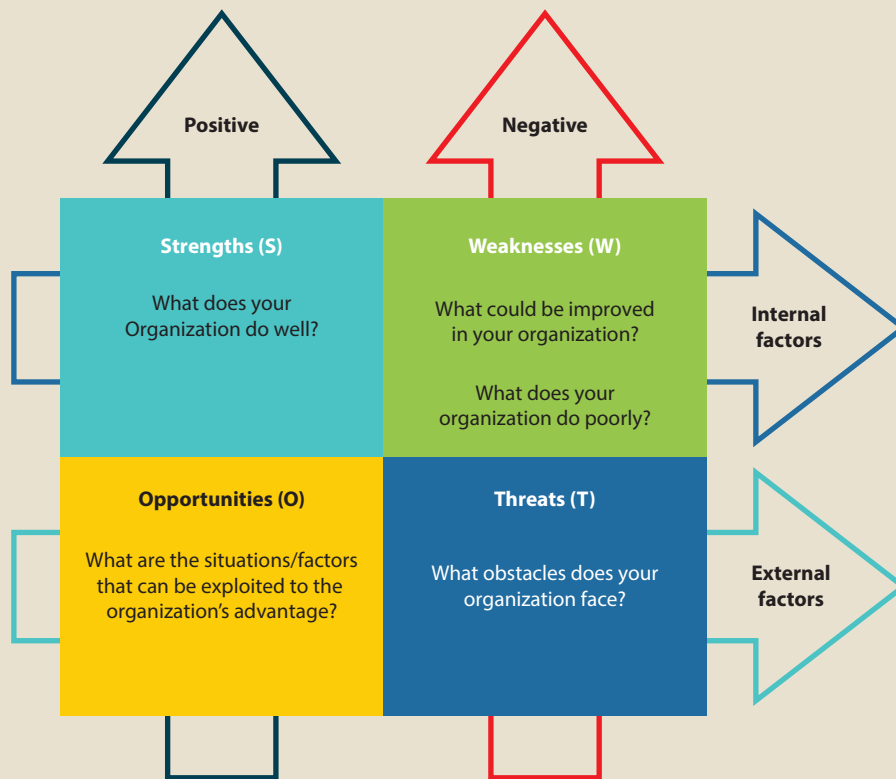
Source: APO.

3. Conducting Surveys of Customers, Staff, and Stakeholders

Another important step in assessing the organization's current level of performance is to undertake consultative surveys and satisfaction surveys with employees, customers and stakeholders.

Typically, these surveys will answer the following types of performance questions:

Customers/clients
- How satisfied are you with our services?

- What are the priority areas for service improvement?

Employees
- How committed are you to the organization's goals? How satisfied are you with your job?

- How satisfied are you with the organization's leadership and management?

- What are the priorities for improving the workplace culture and climate?

Stakeholders and Delivery Partners
- How satisfied are you with the performance of our organization?

- What needs to be improved?

The information obtained from these surveys provide an objective baseline from which to measure future organizational performance improvement.

The APO has developed a detailed self-assessment tool to help organizations measure how customer-focused they are [7].

4. Conducting a Baseline Assessment of Current Performance using the Business Excellence Framework

A key step in preparing an organizational performance improvement plan is to conduct an assessment of the organization's current performance using a business excellence framework. The following case study illustrates how a government organization in France conducted its baseline performance evaluation using the CAF business excellence framework, and then used that assessment to begin a process of annual performance improvement.

Case Study (Aquitaine, France)

The Regional Directorates for Industry, Research and the Environment in Aquitaine (DRIRE), France used the European Union's Common Assessment Framework to plan for and achieve improved results. DRIRE is a government regulatory agency which ensures the safety of vehicles, as well as industrial worksites and nuclear plants. It employs over 160 safety inspectors.

The CAF self-evaluation and planning process: Using the Common Assessment Tool Process, an evaluation team of employees is established, then a CAF consultant explains the self-assessment process, following which the team conducts the evaluation and submits recommendations to management for improving the organization's performance [5]. DRIRE employs a process where it first develops its baseline performance assessment and then develops a series of recommendations from staff for initiatives to measurably improve performance in specific areas, especially in areas of identified weaknesses. The Aquitaine DRIRE achieved significant performance improvement results by self-evaluating its performance, using the CAF to guide the planning and improvement process.

By identifying priority areas for improvement and by implementing the recommended plans for improvement, all aspects of the organization's performance showed dramatic improvement over a period of four years, including better citizen satisfaction, better staff satisfaction, and better regulatory performance results. The DRIRE performance improvement table shows the quantitative performance improvement in each key area of the CAF model (see Table 6.2).

The self-assessment in year one showed very low scores in most of the seven categories in the CAF framework. After four years of continuous improvement, DRIRE's self-assessment scores had dramatically improved in each category and organizational performance had been enhanced.

The CAF self-assessment process: A team of evaluators is chosen by the leader from across the organization to undertake the performance self-assessment.

Preparation: The preparation involves a half-day workshop led by CAF consultants and involves explaining each criterion and what performance evidence is to be collected for each one.

Self-evaluation: Each self-evaluator on the team completes the evaluation form independently using the DRIRE framework.

Report and feedback sessions: The leader compiles the report from the input provided by self-evaluators. The report is then provided by the leader to the CAF consultants, who then convene a full-day feedback meeting where the results are reviewed, and improvement priorities are identified.

Follow-up and improvement plan: The leader and the self-evaluators identify paths to organizational improvement in priority areas, then the leader integrates these actions into an improvement plan, which is then submitted to the management team of the organization for review and approval.

TABLE 6.2

DRIRE'S FOUR-YEAR PERFORMANCE IMPROVEMENT TRENDS.

Criterion	Score			
	2001*	2002	2003	2004
1. Leadership	2	1.9	1.7	3
2. Policy and strategy	1.6	1.7	2	2.9
3. Human resource management	1.5	1.3	1.8	2.7
4. Partnerships and resources	2.1	1.8	2.7	3
5. Process and change management	1.4	1.8	2.1	3.6
6. Citizen/customer results	0.4	0.8	0.9	2.5
7. People results	0.4	1.2	1.4	2.5
8. Society results	1.1	1.4	1.4	1.5
9. Key performance results	0.9	1.8	2.3	2.3

The DRIRE example demonstrates how organizational excellence models like CAF and the APO Business Excellence Model can be used to dramatically improve public-sector performance in a systematic way over a relatively short period of time. The DRIRE case study also demonstrates that achieving improved results depends on a well-designed planning and implementation process.

Case Study 2 (USA Government's HRSA Agency's Quality Improvement Planning)
The Health Resources and Services Administration (HRSA), an agency of the U.S. Department of Health and Human Services, is the primary Federal agency for improving healthcare to people who are geographically isolated, or economically or medically vulnerable. HRSA programs help those in need of high-quality primary healthcare, people living with HIV/AIDS, and pregnant women and mothers. HRSA also supports the training of health professionals, the distribution of providers to areas where they are needed most, and improvements in healthcare delivery. As of 30 September 2016, it staffed 1,996 employees and had a funding USD10.5 billion in FY 2016 [16].

Key elements of the HRSA's quality improvement plans: The HRSA's quality improvement (QI) plans includes the following five major elements:

1. A description of purpose, priorities, policies and goals of the QI program

2. A description of the organizational systems needed to implement the program, including QI committee structure and functions, descriptions of accountability, and roles and responsibilities

3. The process for gaining customer/client input

4. Core measures and measurement processes

5. A description of the communication and evaluation plan

Leadership: According to this US Government Agency, for a quality improvement effort to be successful, it requires support and buy-in from the organization's leadership. Leadership plays an important role in improving quality by setting priorities, providing structure to support the improvement effort, modeling core values, promoting a learning atmosphere, acting on recommendations, advocating for supportive policies, and allocating resources for improvement.

A board of directors or management committee provides leadership in QI process by

• supporting and guiding implementation of QI activities;

• reviewing, evaluating, and approving the QI plan annually; and

• providing/approving necessary resources to execute the QI plan.

Resources to support QI activities: It is important to determine what is needed to achieve your QI priorities: people, funding, equipment, space, and training and development. Adequate resources should be allocated to staff time; ongoing training of employees; technical assistance; materials or equipment; and technical support, such as management information systems. As organizations develop their QI plans, they should consider the environment including national quality measurement and reporting systems. It will be important to develop strategies to organize and standardize QI measures and efforts across the healthcare organization.

Educate the staff about QI tools and techniques and about the importance of QI and provide them with skills and tools needed to be involved in QI activities.

Tools and techniques: The following are some CQI tools and techniques made available to HRSA employees to assist them in the QI planning and implementation process (A good reference guide to the wide range of quality tools and techniques is the APO Handbook on Productivity, 2015) [1]:

A flow chart is used to identify the actual flow or sequence of events in a process. It can be used in early stage of a QI project to help team members gain a better understanding of how processes are actually happening (see Figure 6.9). Once problems are identified, a second flow chart can be created to show how a process should be performed.

Brainstorming is used to generate a large number of ideas for issues to tackle, possible causes, approaches to use, or actions to take through the interaction of a group of people. It is used in a group setting to bring out ideas to find possible solutions and causes for a problem/issue.

THE QUALITY IMPROVEMENT PROCESS.
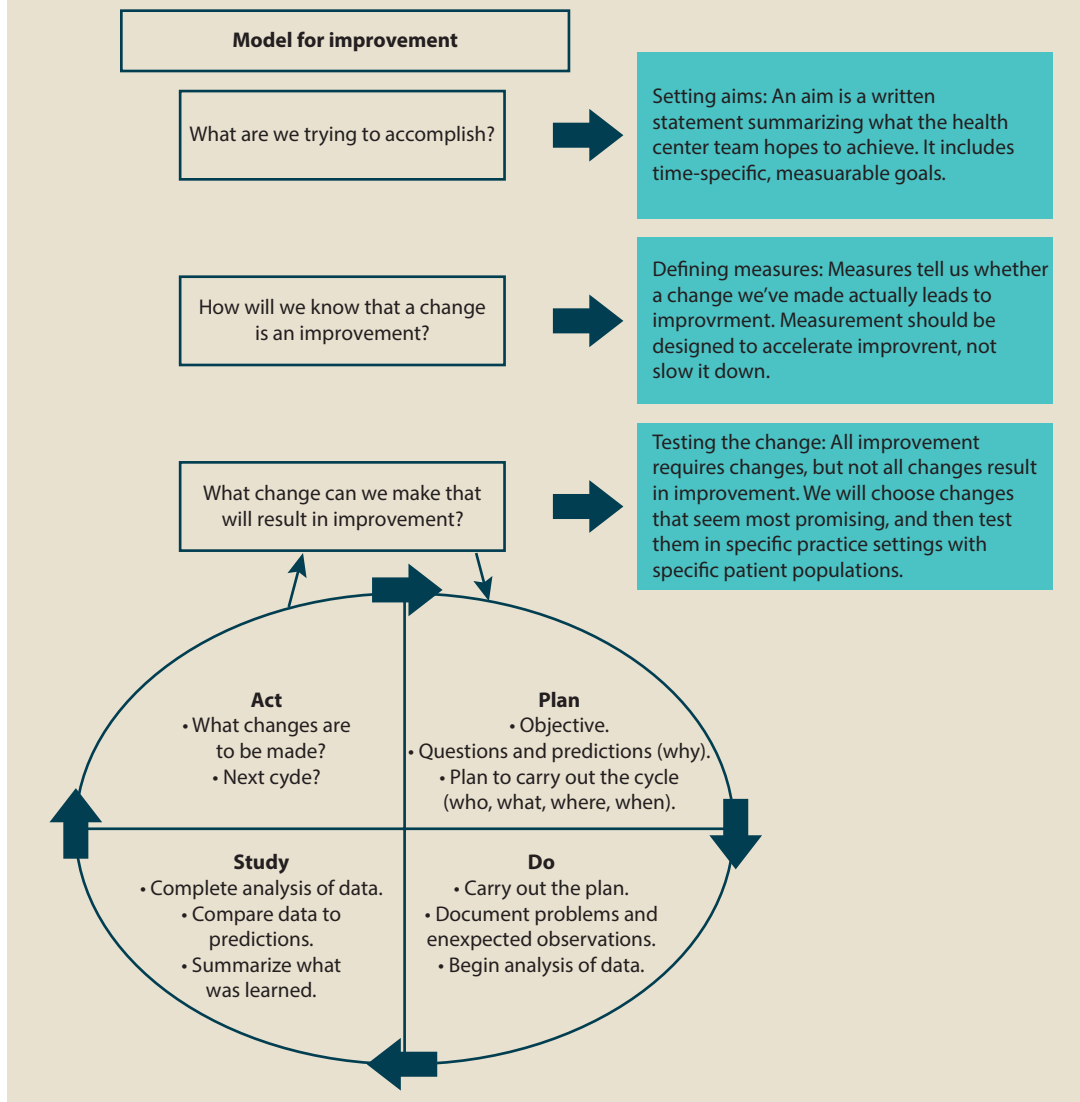
An *affinity diagram* is used to gather large number of ideas, issues or opinions and organize them into groupings based on their natural relationship. You can use this tool to group ideas generated by brainstorming with your team and to sift through large volume of data/information.

A c*ause-and-effect/fishbone diagram/Ishikawa* is used to identify and graphically display all possible causes of a certain effect. This tool helps team members to think in a systematic way and understand a problem and all the factors and root causes associated with the problem/cause/effect.

A *histogram* is a bar chart used to recognize and analyze patterns in a large set of data that are not apparent simply by looking at a table of data, or by finding the average or median.

A *Pareto chart* can be used to display categories of problems graphically so they can be properly prioritized. You can use this tool when communicating to others about your data. It can be used

when analyzing data about the frequency of problems or causes in a process or when there are many problems or causes and you want to focus on the most significant problem.

A run chart is used to study observed data (a performance measure of a process) for trends and patterns over a specified period of time. This tool helps you to see changes in performance over time and understand variation in process performance. It can be used to report data to senior staff or team members.

A control chart is used to monitor, control, and improve process performance over time by studying variation and its source. This tool is used to study how a process changes over time. Data are plotted in time order. A control chart has a central line for the average, an upper line for the upper control limit (UCL), and a lower line for the lower control limit (LCL). This information can be used to identify opportunities to improve performance or measure the effectiveness of a change in a process, procedure or system.

Benchmarking involves comparing characteristics of different entities for the purpose of understanding the performance of other similar organizations and improving one's own performance. Benchmarking enables entities to improve their position competitively by helping clarify consumer needs and modern technologies and/or processes necessary to meet those needs.

A story board is a useful communication tool for effectively presenting a team's work to a variety of audiences.

A dashboard is a visual tool that highlights an organization's performance in a number of designated areas of quality. It includes response actions and desired changes in system, education, and compliance/competency behaviors.

The Main Components of the HRSA Quality Improvement Plan

1. **Purpose:** This section of the plan describes the purpose of the QI plan, including the organization's mission and vision, policy statement, and the types of services provided.

2. **The QI plan and the organizational system:** This section describes the organizational structure, roles and responsibilities, timelines for reporting findings and improvement strategies, and training/support provided for project staff. It describes how leadership will provide support to QI activities:

   • Organizational structure is a formal, guided process for integrating the people, information, and technology of an organization, and serves as a key structural element that allows organizations to maximize value by matching their mission and vision to their overall strategy in quality improvement. Implementing a QI plan requires a clear delineation of oversight roles and responsibilities, and accountability. The QI plan should clearly identify who is accountable for QI processes, such as evaluation, data collection, analysis education, and improvement planning.

   • The specific organizational structure for implementing a QI plan can vary greatly from one organization to another. Generally, responsibility for quality begins with board that authorizes the executive director to provide resources to support quality program and assigns responsibility for QI program to lead staff. A quality coordinator is assigned to support the medical director/chair of the committee and for day-to-day activities.

- Depending on the size of the organization, who participates in QI activities may vary. For example, in small organizations most of the staff members are involved in all aspects of QI work. In larger organizations, usually a quality committee is established that includes senior management, designated QI staff if there are any, and other key players in the organization with the expertise and authority to determine program priorities, support change, and if possible, allocate resources. The main role of this group is to develop an organizational QI plan, charter team, establish QI priorities and activities, monitor progress towards goal attainment, assess quality programs, and conduct annual program evaluation.

3. **Key areas for improvement:** These include listing and prioritizing of QI projects in the QI plan. QI projects may be identified through self-assessment, customer satisfaction surveys, or formal organizational reviews that identify gaps in services. Staff from all levels should be included to brainstorm and develop a list of changes that they think will improve the process. Consumer input on the experience of care delivery is extremely important to identify areas that need improvement. The QI projects that are selected and prioritized should show alignment with the organization's mission.

4. **Setting the QI plan's annual goals and objectives:** The Plan should define the key program goals and objectives for the current year.

   This list should be tailored to the program and include specific objectives that need to be accomplished to successfully achieve the goal. The objectives for each of the selected goals need to be specific, measurable, achievable, relevant, and time-framed (SMART) so that you will be able to clearly determine whether the objectives have been met at the end of the year by using a specified set of QI tools. For example, consider this:

   By 29 December 2018 (time bound), increase the number of training sessions given for QI staff on "QI concepts and tools" (specific and relevant) from 6 to 10 (measurable and achievable).

   Generally, the QI Committee identifies and defines goals and specific objectives to be accomplished each year. Progress in meeting these goals and objectives is an important part.

5. **Performance measurement:** The plan should describe how the quality program is measured, and how data is collected, monitored and analyzed:

   - Performance measurement is used to monitor important aspects of an organization's programs, systems, and processes; compare its current performance with the previous year's performance as well as benchmarks; and identify opportunities for improvement in management, client services, and support services. The basic steps are to

     1. determine performance measures and develop indicators to measure performance,

     2. define the population to be measured,

     3. describe the data collection plan as well as data collection method such as interviews, and

     4. develop a measurement and data analysis plan.

- Some of the measures that organizations may elect to use include program and process efficiency and effectiveness measures, program outcome measures, and customer/client experience (e.g., customer satisfaction) measures.

6. **The QI initiative methodology and QI tools to be used:** The QI plan identifies the QI methodology and the quality tools/techniques to be utilized throughout the organization. The plan describes the process as below:

   - The purpose of a QI initiative is to improve the performance of existing programs and services or to plan new ones. Strategies for improvement in the existing process can be identified by using QI tools such as benchmarking, fishbone diagrams, root-cause analysis, etc.

   - The plan-do-study-act cycle (see Figure 6.10) is one of the widely used QI methodology for testing a change on a small scale, by planning change and collecting baseline data, testing the change and collecting data, observing the results and analyzing the data, and acting on what is learned. If the change did not result in improvement in the process, try another strategy. If the change resulted in improvement, adopt the change, monitor the process periodically, and implement the change on a larger scale.

FIGURE 6.10

THE PDCA CYCLE.

What now?
- Review
- Project revision
- Standardization
- Share learnings
- Further improvement

Act

What focus?
- Project goals/measures
- Set up team
- Map process
- Measure process
- Identify key problems
- Find root causes
- Identify solution
- Plan for implementation

Plan

Check
- Measurement
- Assessment
- Analysis

What happened?

Do

What action?
- Prepare for implementation
- Training
- Communication
- Implement improvement
- Change managament
- Project management

   - A number of other QI approaches can be used. Based on your organizational priorities, the QI committee can choose a preferred approach, such as the following:

     ○ Six Sigma's define, measure, analyze, improve, and control

     ○ Focus, analyze, develop, execute, and evaluate (FADE)

7. **The communication strategy:** The QI Plan should describe how the quality improvement plan is communicated throughout the organization on a regular basis.

   Once a QI initiative is launched, it is important to have regular communication on quality improvement to all staff including the executive and stakeholders. Regular updates on how the QI plan is being implemented, training activities being conducted, and improvement charting are important parts of any communication plan. The progress in QI projects can be documented using activity logs, issue identification logs, and meeting minutes. Improvement efforts can be communicated through various methods such as kick-off meetings or all-employee meetings; story boards and/or posters displayed in common areas; sharing organization's annual QI plan evaluation; e-mails, memos, newsletters, and handouts; and informal verbal communication.

8. **Approval of the QI plan and the annual evaluation process:** A QI plan should describe how evaluation will be done, when it will be done, who will be responsible for developing it, how the results will be documented and communicated; and who will be responsible for reviewing and approving it.

   The QI plan should be evaluated on an annual basis for effectiveness in achieving the goal. A QI committee should annually review the results and make suggested revisions to the QI plan. Based on an ongoing review, priorities will be set and opportunities for improvement identified for the next year. A report summarizing review process, findings, QI initiatives taken, suggested modifications, projects in progress, and recommendations for changes, should be compiled and forwarded to the board for review.

Note: More information on the HRSA Quality Improvement Planning Process and quality tools can be accessed at the HSRA website [17]:

Unit 3: Implementing a Targeted Quality and Productivity Improvement Plan

Learning Objective
Based on the information and tools provided in this unit, participants will know how to successfully implement a performance improvement plan for their organization.

Introduction
In the previous unit, we learned how to

- assess the organization's readiness to implement a performance improvement initiative;

- undertake a baseline environmental scan, a client survey, and a SWOT analysis;

- measure the current level of organizational performance; and

- develop a performance improvement/quality improvement plan.

In this unit we will examine the implementation phase of performance improvement.

Implementing the Performance Improvement Plan, and Monitoring and Measuring Results

We saw in Unit 2 that the improvement plan contains a series of initiatives to improve various elements of the organization's performance, such as employee commitment, efficiency of processes, introduction of IT solutions, service improvement, and program effectiveness improvement.

Each of the key quality and productivity initiatives must be assigned to a lead manager for implementation, time targets set, and progress in implementing the productivity improvements monitored and reported quarterly to the management.

The PDSA cycle discussed earlier can also be used as an implementation and evaluation method. Below are the four basic steps that can be followed while implementing a quality improvement plan:

- **Plan:** Develop the QI plan based on the organization's priorities, mission and goals, population and services provided, external requirements (HRSA, accreditation), and measures.

- **Do:** Implement the QI plan and use it as a roadmap for implementing an integrated quality program systemwide. Identify and document problems and unexpected observations that you came across while implementing the plan.

- **Study:** Evaluate the QI plan and address the following questions: Did you do what you said you were going to do? Why? Why not? What were the results? How can next year be better? What modifications should be made?

- **Act:** Act on the lessons learned to revise the QI plan for the next year. Monitor the plan regularly to determine whether the plan remains successful over time. Evaluate the QI plan annually.

Successful implementation of QI in an organization requires an infrastructure that supports ongoing QI activities. Therefore

- review and update the QI plan annually;

- monitor the QI plan on a quarterly basis and evaluate its effectiveness;

- prioritize quality goals and projects so that key areas are addressed;

- get commitment from leadership and senior management staff to support the program, allocate resources, and celebrate its successes;

- get input from staff and consumers/patients;

- communicate results to relevant individuals and groups, as regular feedback regarding improvement projects is critical to success in sustaining improvements over time; and

- provide education and training to all levels of staff, including senior leadership regarding QI, tools, and techniques for continuous improvement.

The APO has a series of recommendations for organizations wanting to successfully implement their action plans for productivity improvement:

- Make senior managers responsible for overseeing the implementation of actions. In particular, assign senior managers as category leaders with overall responsibility for one or more business excellence categories. The category leaders will then assign individuals to be responsible for the implementation of actions.

- Select and train the right people and teams to implement the actions.

- All the people involved in implementing the action who will be impacted by it should understand the following:

  1. What is the action?

  2. Why are they doing it?

  3. What are the benefits of doing it?

  4. What are they supposed to do?

  5. How can they balance the implementation of the action with their daily jobs?

Measuring Performance Improvement: The SMART Model

As noted in Unit 3, to be successful, performance improvement plans need to have measurable and achievable quantitative targets attached to them. A first step is to choose goals that are clearly defined. As seen in Figure 6.11, goals and outcomes should be specific; measurable; achievable; relevant; and time-bound (SMART).

FIGURE 6.11

THE SMART MODEL.

S	**Specific** Well defined Clear to anyone that has a basic knowledge of the project
M	**Measurable** Know if the goal is obtainable and how far away completion is Know when it has been achieved
A	**Achievable** Agreement with all the stakeholders what the goal should be Make sure this is possible for all levels whinin group
R	**Realistic** Within the availability of resources, knowledge and time
T	**Time bound** Enough time to achieve the goal Not too much time, this can affect project performance

An example of the SMART model is shown in Table 6.3:

TABLE 6.3

AN EXAMPLE OF SMART PERFORMANCE IMPROVEMENT MODEL.

Activity	Quantitative one-year improvement target
Employee commitment	Improve employee commitment from 60% to 70%.
Employee job satisfaction	Improve employee satisfaction from 70% to 80%.
Customer/client service satisfaction	Improve from 60% to 70%.
Internal service satisfaction	Improve from 45% to 60%.
Citizen trust in the organization	Improve from 55% to 60%.
Service delivery efficiency	Reduce service delivery costs by 5% per transaction.
Program cost/effectiveness	Increase program cost effectiveness by 5%.

As we saw in the previous unit, this type of comprehensive measurement system requires that the organization establishes baseline measures before the improvement plan is implemented. By establishing the performance measures as well the methodology for measuring improvement, and by allocating the responsibility for the measurement process, we can implement a reliable performance improvement measurement system. An American public-sector organization with extensive experience in implementing quality improvement plans, provides the following recommendations to its QI teams on measurement, monitoring, and performance reporting:

"You will need to work with the QI team to develop a standard template for the performance report and identify the time period for reporting. You will also need to assist them in identifying the staff needed to prepare the reports and the time they will need to accomplish this task. You will also need to help them train staff on these tasks.

A QI dashboard or data wall can be a useful tool for QI teams to help them track progress toward key improvement goals. QI dashboards or data walls are one- to three-page summary reports that provide a graphic summary of progress toward key process and outcome metrics. Often they include a "stoplight" system of red, yellow, and green color coding to signal that an activity or performance metric is on track, partially off track, or having serious problems. The report will create a written record of the team's progress and help increase ownership and accountability in the QI team and practice for follow-through on improvement work. It also can help you identify QI teams that have hit a roadblock and may need some additional assistance." [18]

Implementing a Six Sigma Quality and Productivity Plan

"Six Sigma is viewed as a systematic, scientific, statistical, and smarter (4S) approach for management innovation which is quite suitable for use in a knowledge-based information society. The essence of Six Sigma is the integration of four elements (customer, process, manpower, and strategy) to provide management innovation" [8].

FIGURE 6.12

THE SIX SIGMA MODEL.

Customer
process
Manpower
strategy

Six Sigma

Management innovation

Systematic and scientific approach
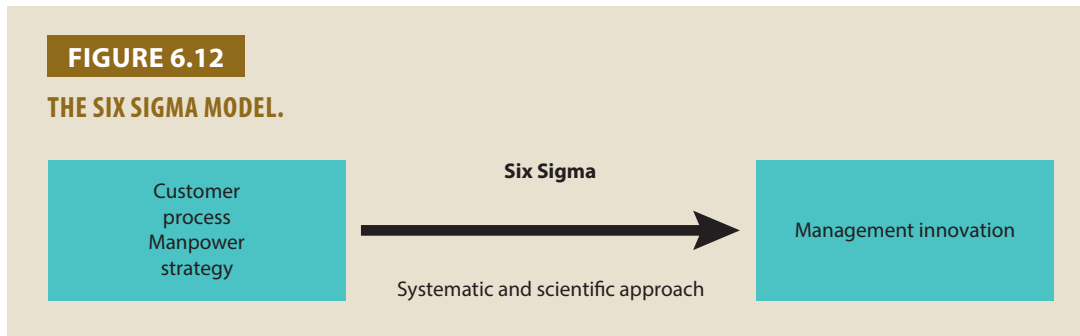
Six Sigma is a very popular system for improving productivity and customer satisfaction through process improvement (see Figure 6.12). The roadmap for implementing a Six Sigma initiative has seven steps, as follows:

Step 1: Set up the long-term vision of Six Sigma.

Step 2: Identify core processes and key customers.

Step 3: Define customer requirements and key process.

Step 4: Measure current process performance.

Step 5: Improve process performance.

Step 6: Design/redesign process if necessary.

Step 7: Expand and integrate the Six Sigma system.

More detail on these steps can be found in the APO Six Sigma manual [8].

Implementing a Systematic Service Improvement Plan
Another common system for improving productivity and service satisfaction is the implementation of service improvement plans. The Institute for Citizen Centred Service in Canada has developed a four-step implementation process as shown in Figure 6.13. The Institute has also prepared a Guidebook for public managers wishing to use this improvement model [6].

The application of this model is demonstrated in the following New Zealand Police case study.

Continuous Improvement in Performance: The New Zealand Police Case Study
In 2007, the New Zealand Police embarked on the performance improvement process that focused on the twin objectives of

•   improving citizen satisfaction with New Zealand Police services, and

•   improving public trust in the New Zealand Police.

Note that these are two of the five performance improvement outcomes included in the APO Public-sector Productivity Framework (see Figure 6.14).

FIGURE 6.13

THE ICCS FOUR-STEP IMPLEMENTATION PROCESS.

Where are we now? — **Measure clients' satisfaction**

Where do our clients want us to be? — **Measure clients' expectations and priorities**

How will we get there? — **Set targets and set service improvement plan**

How do we make it happen? — **Implement, monitor, measure, and ensure accountability**

Staff involvement
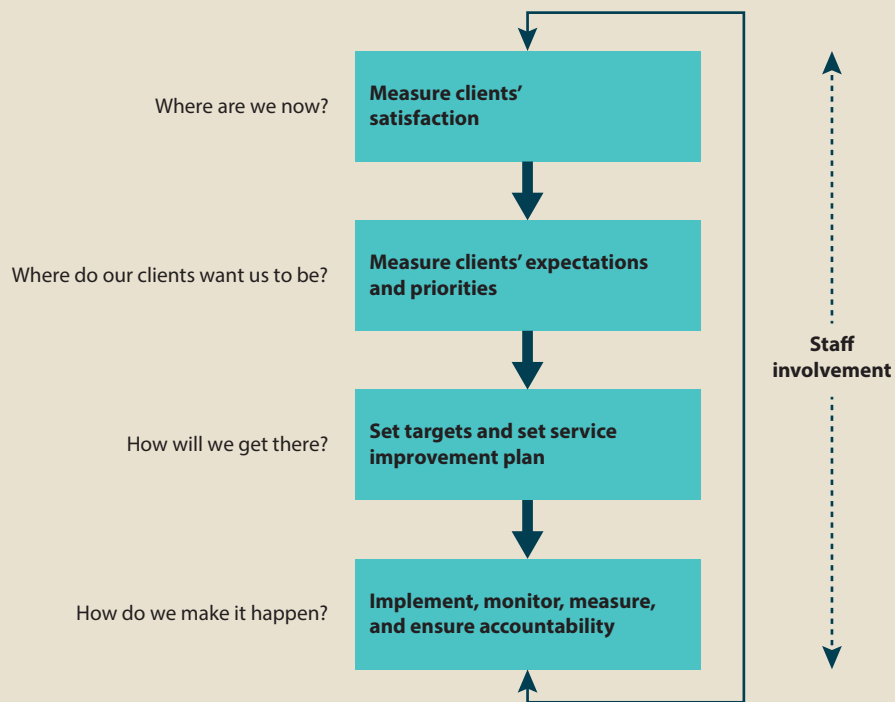
FIGURE 6.14

THE FIVE PERFORMANCE IMPROVEMENT OUTCOMES.

Citizen satisfaction

Cost effectiveness

Competitiveness

Quality of life

Public trust

The New Zealand Police Performance Improvement Goals (2007–present)

- Provide citizen-centered policing services that meet or exceed citizens' expectations.

- Improve citizens' satisfaction.

- Improve public trust and confidence in the New Zealand Police.

- Listen to the public.

- Make every contact count.

- Provide consistent service.

The New Zealand Police Annual Performance Measurement: Results Achieved

Each year the New Zealand Police (NZ Police) contracts with an independent research company to undertake a survey of over 9,000 citizens to determine how well the police are performing in the eyes of citizens, to track the NZ Police's performance against the goals, and to identify areas that need further improvement [19]. These were the results of the 2012 citizen survey:

- 90% of people who had recent contact with police said their expectations were met or exceeded.

- 82% of people were 'satisfied' or 'very satisfied' with the quality of service from NZ Police.

- 77% of people have 'full' or 'quite a lot of' trust and confidence in the NZ Police.

- The NZ Police scored over 90% for their competence and fair treatment.

The diagram used by the NZ Police (see Figure 6.15) to improve performance is called an Important-Performance Matrix and allows an organization to measure not only satisfaction levels, but also to determine the service factors that are most important to citizens. The priorities for improvement in the next year are those 'very important' factors that receive lower satisfaction scores.

The bar chart in Figure 6.16 documents the continuous improvement of the New Zealand Police in improving citizen satisfaction with police services for the period 2008 to 2014.

The NZ Police's continuous performance improvement example demonstrates that even challenging public-sector regulatory and compliance services such as policing can achieve remarkable performance improvements utilizing the quality and productivity performance improvement methodology discussed in this module [19].

Assessing the Lessons from Performance Improvement Planning and Implementation

'Learning organizations' like the New Zealand Police reflect on their experience in order to improve their performance in the future. Thus, the final stage of performance improvement planning and implementation involves the organization's reflection on the lessons learned, so that these lessons can be incorporated into the next rounds of performance improvement. This may involve a formal report by quality improvement teams with recommendations of improvements to the planning and improvement process for the future.

FIGURE 6.15

IMPORTANT-PERFORMANCE MATRIX USED BY NZ POLICE TO IMPROVE PERFORMANCE.
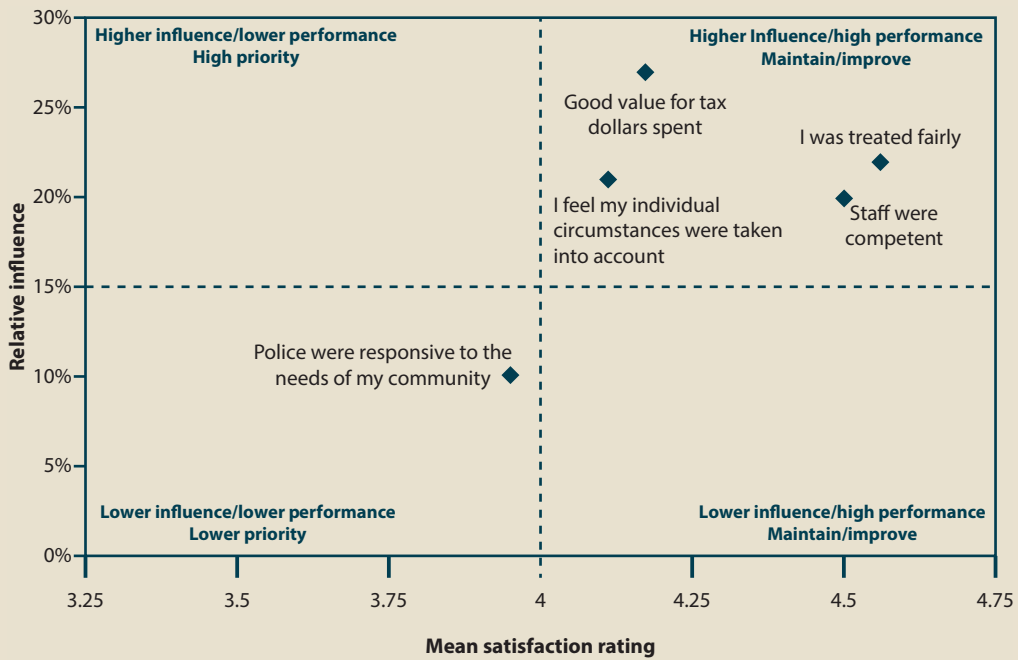
FIGURE 6.16

CITIZENS' SATISFACTION SURVEY 2013–14.

FY 2008–09   FY 2009–10   FY 2010–11   FY 2011–12   FY 2012–13   FY 2013–14
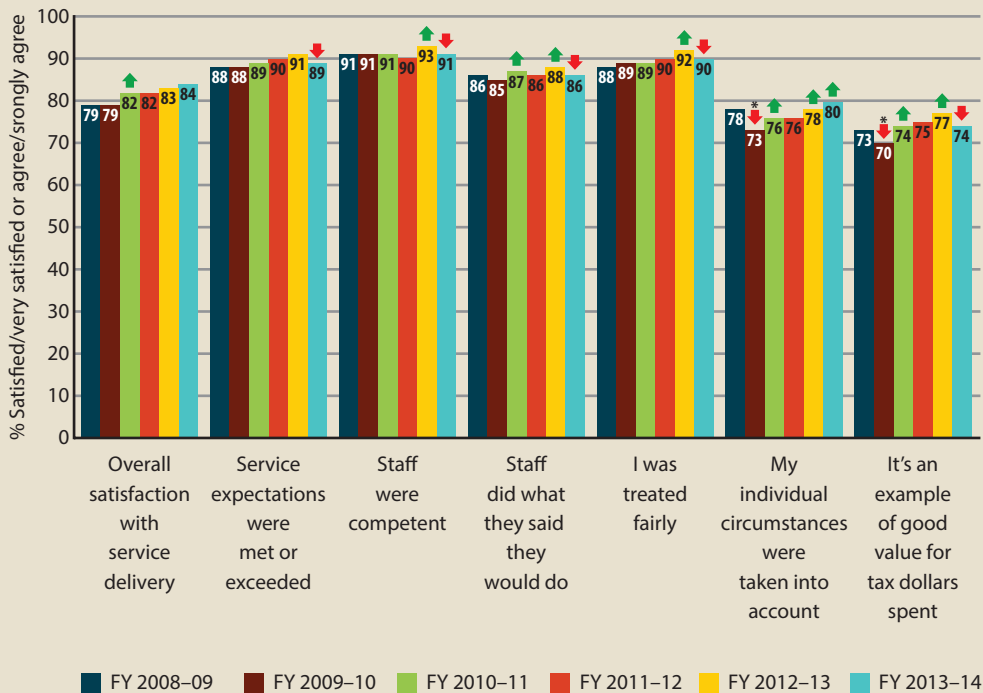
Concluding Note

Performance Improvement across the public sector promotes the achievement of national development goals.

Improving an organization's quality and productivity is directly important for clients, employees, and taxpayers. But more importantly, improving the service and regulatory performance of the public sector contributes strongly to the achievement of a nation's good governance goals and its social and economic goals. The APO has outlined this linkage in Figure 6.17 [1].

FIGURE 6.17

CITIZENS' SATISFACTION SURVEY 2013–14 (DRIVERS OF SATISFACTION NATIONAL RESULTS, %).

People | Product | Process | Policy

Organization-level entry points for productivity-improving initiatives

Competitive-ness

Economic growth

Sustainable development

Economy-level benefits of productivity improvements
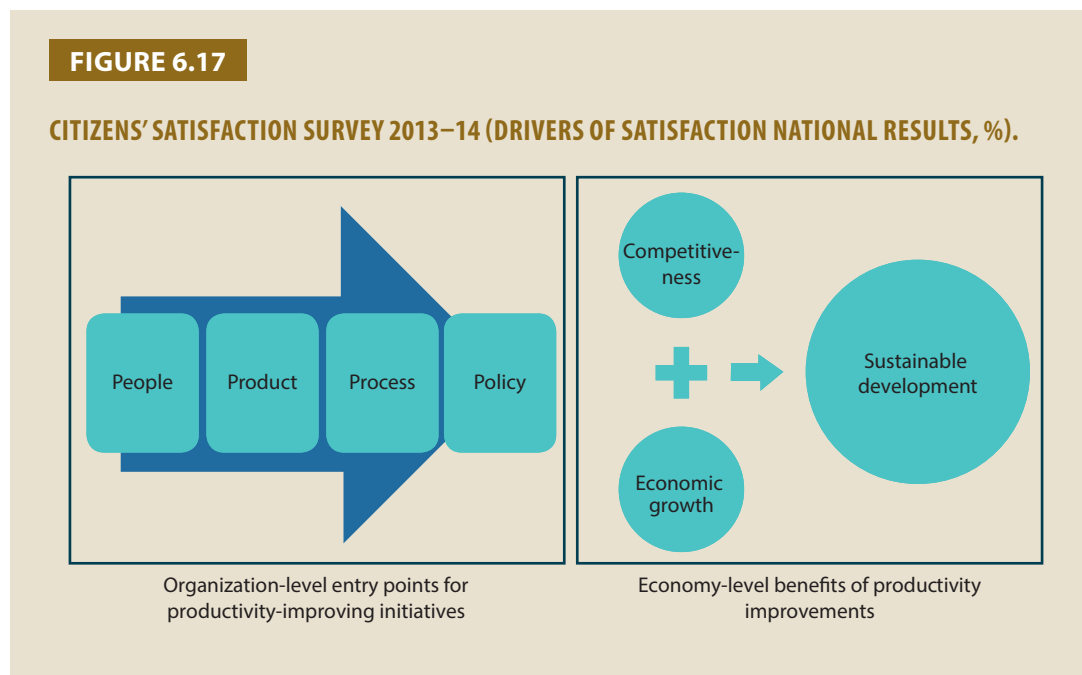
Thus, whether we use quality and productivity tools to improve people management, product and program quality, process efficiency, or policy effectiveness, in each instance we are also directly contributing to the social and economic development of the nation.

Learning Methodology

- Lectures, case studies, and exercises

- Assignment: Develop a self-assessment of your organization's readiness for a quality and productivity improvement plan using the APO Readiness Self-assessment Tool.

- Exercise 1: Based on the Business Excellence Model for the Public Sector, which three areas of the model are priorities for performance improvement in your agency?

- Exercise 2: What performance measurement systems does your organization have in place to measure client satisfaction and employee satisfaction? What additional measurement systems and methodologies are required, based on best practices shown in this module?

- Exercise 3: How could the New Zealand Police continuous measurement and improvement strategy be adapted to your organization to improve citizen service satisfaction and trust?

References

[1] APO. APO Handbook on Productivity. Tokyo: APO; 2015.
http://www.apo-tokyo.org/publications/?s=handbook+on+productivity&post_type=ebooks.

[2] APO. Business Excellence Models and Awards for the Public Sector. Tokyo: APO; 2016.
http://www.apo-tokyo.org/publications/ebooks/business-excellence-models-and-awards-
for-the-public-sector-a-guidebook-for-national-productivity-organizations/.

[3] APO. Understanding Business Excellence. Tokyo: APO; 2016.
www.apo-tokyo.org/coe/files/Understanding-Business-Excellence.pdf.

[4] Bryson J. Strategic Planning for Public and Nonprofit Organizations: A Guide to Strengthening
and Sustaining Organizational Achievement. San Francisco: Jossey-Bass; 2011.

[5] Dearing E., Staes P., Prorok T. CAF Works - Better Service for the Citizens by Using CAF,
Vienna: Austrian Federal Chancery and the EIPA; 2006.

[6] ICCS. A How-to Guide for Service Improvement Initiatives. Toronto: Institute for Citizen
Centred Service; 2007. www.iccs-isac.org/library/2012/06/ICCS-How-To-Guide.pdf.

[7] Sung P.H. Implementing Business Excellence-A guidebook for SMEs. Tokyo: APO; 2003.
www.apo-tokyo.org/coe/files/Implementing-Business-Excellence.pdf.

[8] Sung P.H. Six Sigma for Productivity and Quality Promotion. Tokyo: APO; 2003. https://
www.apo-tokyo.org/publications/wp-content/uploads/sites/5/ind-09-ss.pdf.

[9] Dantzer R. Organizing for Deliberate Innovation: A Toolkit for Teams. Canada School
of Public Service; 2002. http://www.publications.gc.ca/collections/Collection/SC94-94-
2002E.pdf.

[10] Government of Canada. Organizational Project Management Capacity Assessment Tool
http://www.tbs-sct.gc.ca/hgw-cgf/oversight-surveillance/itpm-itgp/pm-gp/doc/ompca-
ecogp-eng.asp.

[11] Balanced Scorecard Institute. Strategic Planning Basics. https://balancedscorecard.org/
Resources/Strategic-Planning-Basics.

[12] US Government. Strategic Planning for Organizations. http://r.search.yahoo.com/_
ylt=AwrTccSlu5NXTuMA82TfSQx.;_ylu=X3oDMTByN2lydWw3BHNlYwNzcgRwb3MD
OARjb2xvA2dxMQR2dGlkAw--/RV=2/RE=1469328422/RO=10/
RU=http%3a%2f%2fwww.whitehouse.gov%2fsites%2fdefault%2ffiles%2fomb%2fassets%
2fa11_current_year%2fs230.pdf/RK=0/RS=O6d.xdAOslfy0qQ6ipvzifuCaU4-.

[13] World Bank. 10 Step Guide to Strategic Planning. http://r.search.yahoo.com/_ylt=A86.
JySlvZNXQ2kAz67fSQx.;_ylu=X3oDMTByaTNkOWxlBHNlYwNzcgRwb3MDNwRjb2x
vA2dxMQR2dGlkAw--/RV=2/RE=1469328933/RO=10/RU=http%3a%2f%2fsiteresources.
worldbank.org%2fINTAFRREGTOPTEIA%2fResources%2fmosaica_10_steps.pdf/RK=0/
RS=CpkgPTKUSBqKFMT0mm47PgpT7QI-.

[14]   EIPA. http://www.eipa.eu/en/topic/show/&tid=191.

[15]   EIPA. http://www.eipa.eu/en/pages/show/&tid=100.

[16]   HRSA. https://www.hrsa.gov/about/index.html.

[17]   HSRA. https://www.hrsa.gov/quality/toolbox/methodology/
developingandimplementingaqiplan/part4.html.

[18]   Agency for Healthcare Research and Quality. https://www.ahrq.gov/professionals/
prevention-chronic-care/improve/system/pfhandbook/mod14.html.

[19]   New Zealand Police. https://www.police.govt.nz/about-us/publication/citizens-satisfaction-
survey-reports.

COLLABORATION FOR PERFORMANCE IMPROVEMENT

At the end of this module, participants will

1. understand the definition and value of collaborative styles of governance;

2. know ways to initiate, negotiate, manage, and sustain collaborations;

3. know how to utilize collaboration for performance improvement; and

4. be able to analyze cases and suggest ways to improve collaboration for performance.

This module consists of three units:

Unit 1: Introduction to Collaborative Governance

Unit 2: Ways to Collaborate

Unit 3: The Relationship between Collaboration and Performance

Unit 1: Introduction to Collaborative Governance

Learning Objectives

1. Understand the definition and value of collaborative styles of governance.

2. Know the difference between collaborative style of governance and other paradigms.

3. Be able to articulate when it would be appropriate to use collaborative styles.

Introduction

This session provides an overview of 'collaborative governance,' including its definition and differences with other ways of governing.

The idea of collaboration in public management is not new. Ever since bureaucracies were established, regardless of country, many government agencies were fragmented, and infamous for working in silos. Thus, the field of public management has long investigated ways for public agencies to better coordinate and collaborate. Initial studies focused on intergovernmental relations. Often problems are caused by power struggle over resources, turf protection, authority, and credit for performance. However, it is only within the past decade that the idea of collaborative governance has taken root and evolved into studies of multiorganizational settings, public-private partnerships, networks, and collaborations [1, 5, 7]. This idea, as opposed to the command-and-control style of management, offers new ways for the public sector to get things done. It focuses on the ability to work across sectors and agencies to provide public services, essentially breaking the silos.

Conceptual Definition

The overarching concept of *collaboration* refers to the process of operating in multiorganizational arrangements, including both vertical (across government bodies) and horizontal (across organizational and sectorial boundaries) relations, to solve problems that cannot be solved by single organizations.

Collaboration is based on the value of reciprocity and can include the public sector, the private sector, and non-profit organizations, and citizens in general [1] [7]. Collaborative governance emphasizes participation by stakeholders and members of the collaboration in joint decision making [7, 10].

O'Leary [9] points out that collaborative management is paradoxical in that it requires managers to be autonomous yet interdependent, and they need to be participative and authoritative at the same time. Collaboration involves a willingness of parties and stakeholders involved to enhance one another's capacity for mutual benefit. According to Himmelham [4], the parties share risks, responsibilities; and rewards; invest substantial time; share common turf; and have high levels of trust. Collaboration can be analogized as cooperating for a mutual goal, achieving individual ends with an additional outcome that is shared separate from the individual ends (e.g., for better social outcomes and better coordination of services) [11, 14].

Table 7.1 shows the four main paradigms of public administration. These are Ancient Public Administration (APA), Traditional Public Administration (TPA), New Public Management (NPM), and New Public Governance (NPG). These paradigms have differing policy tools, roles of government, characteristics, accountability mechanisms, and goals. This entire section is adapted from Poocharoen [11]).

TABLE 7.1

THE FOUR PARADIGMS OF PUBLIC ADMINISTRATION.

	Ancient Public Administration	Traditional Public Administration	New Public Management	New Public Governance
To whom	Subjects	Voters	Customers	Citizens
Policy tool	Minimal provision	Direct provision	Contract out	Coproduction
Role of government	Rule	Row	Steer	Facilitate
Characteristic	Royal, autocratic style	Post-autocratic, bureaucratic style	Post-bureaucratic competitive style	Post-competitive, collaborative style
Accountability	Leader-driven	Hierarchy-driven	Market-driven	Network-driven
Goals and focus	Loyalty, obedience	Law binding, rule-based	Results, performance targets	Relationships, social capital

Ancient Public Administration

Existing western-oriented literature usually do not mention the first paradigm of Ancient Public Administration (APA). In many parts of Asia, however, the reminiscence of emperors, monarchs, sultanates, and other types of royal dynasties is still an important factor that helps to explain intricacies of public administration in each country. Certain elements of ancient public administration can be found today in Brunei, Malaysia, Thailand, Cambodia, Nepal, Bhutan, Oman, Saudi Arabia, and United Arab Emirates. By elements, the reference is to distinct practices such as governance culture, language in governance, ceremonial aspects of governance, and symbols in governance related to the monarchies or royal institutions. The monarch holds absolute power in only a handful of these countries. Coexisting with other paradigms, the APA paradigm comprises only one component of the political and administrative landscape of most countries that have royal institutions. For instance, Brunei combines a traditional monarchic system with western-style

bureaucracy using performance management rhetoric akin to the NPM paradigm. Another example is Bhutan, which only in 2008 became a constitutional monarchy and is advocating strongly for participatory approaches to governance.

Traditional Public Administration

Most countries in the world today have modernized their public-sector system based on the Traditional Public Administration (TPA) paradigm. The most crucial element in this paradigm is bureaucracy, which includes the setting up of professional bureaucrats, introduction of merit-based recruitment processes, lifetime employment for civil servants, careful documentation of work, and clear chain of command and control. Hierarchy is the modus operandi and strong focus is put on laws, regulations, official guideline, and rules. After World War II, many governments in this paradigm gradually grew larger and larger in terms of manpower, budget, scope of work, and authority. Ministries and departments sprawled quickly to provide all kinds of services and goods ranging from health, education, and security to agriculture, trade, science, and others. Many governments started state-run enterprises ranging from large-scale investment-intensive infrastructure such as railways, airlines, industrial estates, and telecommunication to smaller monopolies such as cigarette companies and others. While such an approach served many countries well for most of the 20th century, during the time leading to the fall of the Berlin Wall and the end of the Cold War, it became apparent that this traditional bureaucracy model had deep problems such as excessive red tape, abuse of power, rigidity, and permanency.

New Public Management

As a counter to overgrown bureaucracy, this New Public Management (NPM) paradigm involves marrying private sector style of management and market principles to the public sector. Many countries, such as Australia, New Zealand, the UK, the USA, and Malaysia implemented such reforms during the period 1980s to 2000s. These reforms include privatization of state-owned enterprises and corporatization of government-run businesses, including universities and hospitals. Many public services were contracted out to the private and non-profit sectors. In this paradigm, results and performance are emphasized over rules and regulations. Public organizations are encouraged, or in some countries forced, to establish performance management systems that have to include performance indicators, targets, and monitoring mechanisms. People are referred to as customers, whom the government must satisfy. Efficiency and responsiveness are the driving public values. Public agencies are exposed to market competition in the hopes that they would be more cost-effective [3, 6].

Many countries in Asia went along this wave of reform, especially after the Asian Financial crisis in 1997. Malaysia, Singapore, Japan, the ROK, and even PR China are such examples. NPM encouraged the entrepreneurial spirit where problems are to be solved and not theorized. Thailand's administrative reform experience in the past 10 to 15 years of privatization, corporatization, and performance management fits into this paradigm. Some noteworthy reforms include the setting up of the Office of Public Sector Development Commission, the attempt to rebrand provincial governors to be CEOs, the excessive usage of strategic planning tools, SWOT analysis, the bonus and remuneration reforms, and the introduction of innovation awards for public agencies and local governments [2, 10, 13].

New Public Governance

The fourth paradigm is called New Public Governance (NPG) where the concept of *collaborative governance* belongs. Based strongly on democratic values, this paradigm elevates citizens and non-

governmental organizations to be on par with public agencies and the private sector. Citizens and non-profits have the capacity to coproduce public goods and services with the government. Especially due to the proliferation of telecommunication technology and education level of people, bureaucrats no longer monopolize technical expertise and competence. Citizens also have access to information and, in certain domains, have much better local knowledge and wisdom than technicians.

This paradigm allows us to see connections in the world and challenges scholars and practitioners to harness such connections for public goods and services. Thus, in addition to hierarchy and market, this paradigm acknowledges that network is an alternative mechanism to get things done and deliver public services. Network actors can be anyone: domestic and international actors; local and central actors; governmental and nongovernmental actors; and organizational and individual actors. Relationships are usually horizontal rather than vertical. Power is often shared rather than centralized.

In this paradigm, the government is no longer the central actor for governance. Government, politicians, and bureaucrats included, are merely part of the complex myriad of actors that interact with each other through hierarchy, market, or network mechanisms. Citizens, nongovernmental organizations, and private entities are accepted as partners in governance. The ultimate goal of this paradigm is to build strong social capital where there is high trust between actors, and respect for one another is upheld.

Lastly, in relation to this paradigm, we are witnessing an extremely rapid change in technology that not only allows us to communicate much more efficiently and effectively but also allows us to collect and analyze data at a phenomenal scale. The cloud technology now allows for multiple analysts around the world to study on the same public problem simultaneously. Some governments in advanced economies are using public information on Facebook and other types of social media to better understand the preference of citizens. More importantly, online coproduction with citizens is gaining momentum. For instance, there are the concepts of 'citizen sourcing' and 'do-it-yourself government' in the USA, which are part of the shift from 'e-government' to 'we-government.' [8].

Learning Methodologies

- Lecture

- Group discussion based on country experiences

- Small group presentations on government reform and examples of tools used that resembles collaborative governance styles

Unit 2: Ways to Collaborate

Learning Objectives

1. Know tools and methods to collaborate with others.

2. Be able to use strategic management techniques to manage collaborations.

Introduction

There are many ways in which public agencies can collaborate with other agencies. This session introduces some possible methods and offers opportunities for participants to uniquely design collaborative arrangements.

Conceptual Definition

Collaboration is defined as a mode of relation between two or more organizations to achieve a common goal.

FIGURE 7.1

COLLABORATION AS A MEANS TO ACHIEVE PERFORMANCE BY WORKING WITH OTHERS.

Organizations

Co-governance

Co-management

Planning — Production

Co-consultation

Co-production

Individuals

Source: Poocharoen and Ting [12].
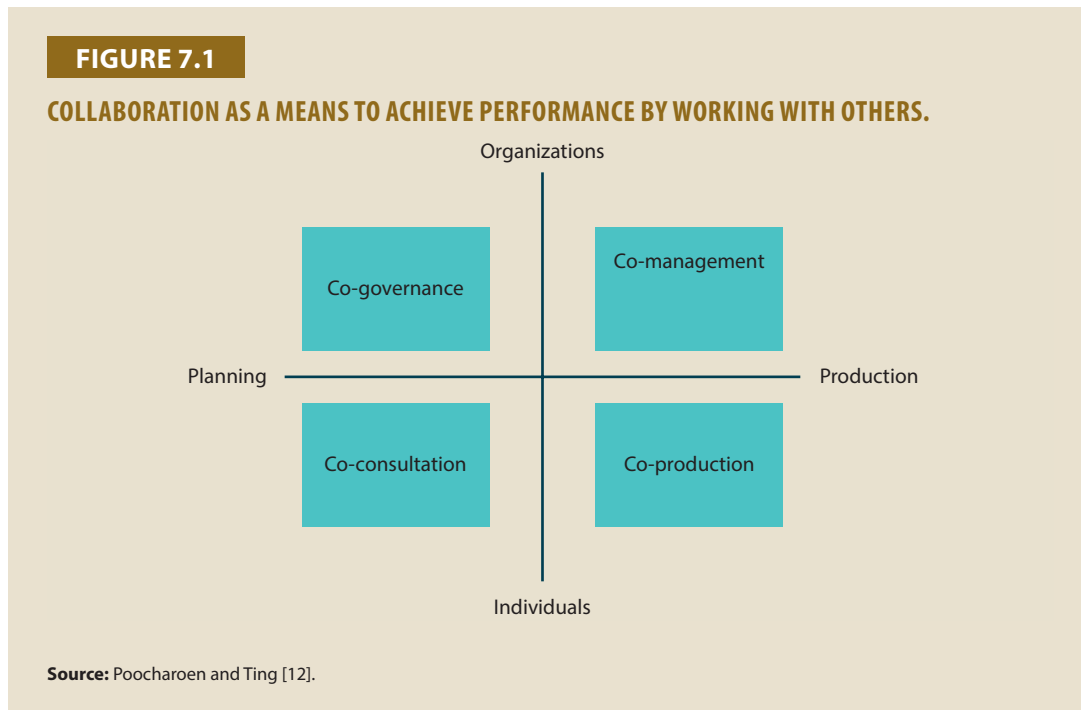
Organizations can collaborate with others at different stages of the project, program, or policy cycle. The diagram in Figure 7.1 shows a spectrum from planning stage to production stage (from left to right). For example, a local public health clinic may choose to collaborate with local schools at the initial planning stage to design promotional programs to raise awareness about infectious disease among youths. The diagram also shows, vertically, that the collaboration can occur with organizations, groups, or individuals. For example, at the production stage (after the program has been designed), the doctors may work with students to make brochures for promoting awareness and have older students speak on different platforms for younger students. The idea is for the government or public agencies (health clinics in this instance) to deliver services or achieve performance by collaborating with others, rather than to do everything on its own.

In collaborating, leaders and managers do not have authority to control others. Rather, skillful leaders and managers usually try to empower others to get things done. They cannot command

FIGURE 7.2

KEY CHARACTERISTICS OF A COLLABORATIVE MANAGER.

• Enforce	• Empower
• Control	• Coordinate
• Rule-based	• Objective-based
• Principal agent	• Collaborators
• Hierarchies	• Horizontal ties

others but rather coordinate with others (see Figure 7.2). Each collaborator focuses on the objective or end results of the collaboration. In addition, most collaboration is about long-term commitment that translates into strong horizontal ties among stakeholders.

Learning Methodologies

• Case method; small group discussion

• Suggested case: "Going it Together: Coventry's Community Safety Partnership" (KSG Case)

The following questions are to be used:

1. What were the innovations or new arrangements that the alliance came up with?

2. What did Stella do to demonstrate collaborative leadership?

3. What were the strategies used to overcome challenges to the collaboration?

Unit 3: The Relationship between Collaboration and Performance

Learning Objectives

1. Be able to articulate the need to link performance systems among collaborators.

2. Be able to design performance measures that foster collaborations.

Introduction

Public leaders find it challenging to manage for performance in collaborative settings due to several reasons. First, they no longer have full control of the resources used as inputs. Second, they no longer have full control over the goals and agendas of the programs, due to the need to align and accommodate partners' goals. Third, they need to rely on performance information collected and sometimes interpreted by the partners or third parties. Fourth, since the work is done in collaboration, they find it more difficult to link rewards to performance or punishment of accountable parties. Lastly, they need to spend more time communicating and building relationships on top of doing the actual work. Thus, there is a practical need to fully understand how performance management can be and should be viewed in collaborative settings.

Conceptual Definition

Performance management is defined as a way to manage where focus is more on results than on processes. This approach requires leaders or managers to set goals, objectives, and targets as key performance indicators (KPIs). KPIs are often time-bound and tangible (observable and countable) items. For instance, the waiting time for patients in hospitals, the number of children who are in schools, or the volume of tourists who pass through an airport. In certain cases, they can also be intangible but still measurable using proxy indicators. For example, we can survey levels of satisfaction among users of a public park and use it as an indication of 'livable city.'

Collaboration can be categorized into dependent collaboration and interdependent collaboration. The former is when one partner is reliant on the other; for instance, an NGO needing to rely on government funding. The latter is when there is equal partnership where the partners rely on each other for their respective expertise and resources to get things done. In the dependent case, most

of the time, the dominant organization would have exclusive power to set performance indicators and systems. On the other hand, for interdependent collaborations, usually, the partner organizations would go through a shared process of setting up the performance indicators, targets, and systems.

The public manager can separate out at least four components of performance management when working in collaborative settings. They are:

1. choosing performance indicators,

2. collection of performance data, and

3. use of performance information.

Other factors include role division and modes of communication. The partners in a collaboration can determine which components would be best to collaborate and which should not be used.

Learning Methodologies

- Case method

- Suggested reading [12]

References

[1]   Agranoff R., McGuire M. Big questions in public network management research. Journal of Public Administration Research and Theory 2001; 11: 295–326.

[2]   Dixon G. Thailand's Quest for Results Focused Budgeting. International Journal of Public Administration 2005; vol. 28, 355–70 pp.

[3]   Dunleavy P., Hood C. From Old Public Administration to New Public Management. Public Money and Management 1994; 14: 9–16. http://dx.doi.org/10.1080/09540969409387823

[4]   Himmelham A. On Coalitions and the Transformation of Power Relations: Collaborative Betterment and Collaborative Empowerment. American Journal of Community Psychology April 2001; vol. 29, Issue 2.

[5]   Hodge G.A., Greve C. Public–Private Partnerships: An International Performance Review. Public Administration Review 2007; vol. 67(3): 545–58 pp.

[6]   Kettl D. The Global Public Management Revolution. Brookings Institution Press; 29 July 2005.

[7]   Koliba C., Zia A., Meek J., et al. Governance Networks in Public Administration and Public Policy 1st Edition. London: Routledge; 2010.

[8]   Linders D. From e-government to we-government: Defining a typology for citizen coproduction in the age of social media. Government Information Quarterly October 2012; 29(4): 446–54.

[9]   O'Leary R., Bingham L.B., eds. The Collaborative Public Manager, Washington DC: Georgetown University Press; 2009.

[10] Painter M. Thaksinisation or Managerialism?, Reforming the Thai bureaucracy. Journal of Contemporary Asia 2006; vol. 36, Issue 1, 26–47 pp.

[11] Poocharoen O.-orn, Bernard T. Collaboration, co-production, networks: Convergence of theories. Public Administration Review April 2015; vol. 17, Issue 4, 587–614 pp.

[12] Poocharoen O.-orn, Wong N. H.-L. Performance Management of Collaborative Projects: The Stronger the Collaboration, the Less Is Measured. Public Performance & Management Review 2016; 39: 3, 607–29.

[13] Suehiro A. "Technocracy and Thaksinocracy in Thailand: Reforms of the Public Sector and the Budget System under the Thaksin Government." Southeast Asian Studies August 2014; vol. 3, No. 2, 299–344 pp.

[14] Thompson A.M., Perry J.L. Collaboration Processes: Inside the Black Box. Public Administration Review November 2006; vol. 66, Issue 1.

CITIZEN-CENTERED SERVICES

At the end of this module, participants will be able to

- define citizen-centered services and innovation for global transformation,

- share and discuss innovation in service delivery to provide citizen-centered services,

- gain observed experience of selected economies in modernizing service delivery,

- develop methodology to measure service delivery impact to provide citizen-centered services at macro and program levels, and

- discuss and share tools to understand business and citizen needs and to identify priorities for improvement.

The module consists of four units:

Unit 1: Introduction to the Concept of Citizen-centered Service Delivery

Unit 2: Providing Citizen-centered Service Delivery

Unit 3: Measuring Government Service Delivery Performance

Unit 4: Understanding Business and Citizen Needs and their Expectations and Priorities for Improvement

Unit 1: Introduction to the Concept of Citizen-centered Service Delivery

Learning Objectives
At the end of this unit, participants will be able to understand the concept and reinforce their understanding of citizen-centered service delivery.

Introduction
Citizen-centered service incorporates citizens' concerns at every stage of the service design and delivery process, i.e., citizens' needs become the organizing principle around which the public interest is determined and service delivery is planned, as per the definition by the Deputy Minister Task Force on Service Delivery Models, Government of Canada.

Most governments are using technology as a new platform to deliver programs and services; and as an enabler to make services available, integrated, and accessible to citizens through all modes of delivery channels. They are building the capacity to offer services to citizens based on citizens' particular needs, while working collaboratively across departments and jurisdictions to provide services in an integrated fashion. The objective is that citizens and businesses can access services

through one simple and convenient entry point into government without having to find their way through the complex web of departments and agencies (Figure 8.1).

The Global Transformation of Public-sector Services

Global trends such as rising customer expectations, budgetary constraints, global competition for investment, public-sector reform programs and changing demographics have transformed the environment in which the public sector operates.

Driven by changing realities and expectations, the public sector is increasingly required to redefine its role, strengthen its customer focus, and build integrated service delivery models -focused on meeting customer needs more efficiently and effectively.

FIGURE 8.1

CITIZEN-CENTERED SERVICE IS A ONE-STOP SHOP FOR ALL INFORMATION AND TRANSACTION NEEDS FROM GOVERNMENT.

4

Multichannel access
Service information, application, and delivery are enabled through multiple channels. These could include walk-in centers, online, contact centers, mobile/SMS, kiosks, and drive-throughs.

3

One-stop shopping
Getting information and applying for services is done in one place without having to visit multiple locations, websites or calling different toll-free numbers.

5

Integrated government
Government entities work in collaboration to provide integrated services across multiple ministries reduce duplication, and drive efficiencies across the whole of government. General information and transactions are handled by one service entity, and complex cases are handled by the ministry.

1

Customer-centric design
Customers are categorized in segments that have different needs and expectations in term of information, service standards and offerings. Examples could be ethnicity, citizen status, and special needs.

2

Bundled offerings
Customers' needs are reflected in life event bundles. These bundles group related services from multiple entities and are mutually exclusive in terms of services required.

Source: Institute for Citizen Centred Service [5].

Figure 8.2 outlines the Gap Framework for modernizing public-sector services. Depending on the gaps identified, there are specific improvement strategies that can help governments in their quest to be more citizen centric. This model is based on research from good practices in service improvement globally. The model has several components:

- Knowing what citizens expect in terms of public-sector service, including how citizens want to be engaged and what their priorities are for service improvement

- Measuring progress in closing the service gap using a variety of tools and ensuring accountability for the results

- Improving the capacity of public organization to provide the service that citizens expect

FIGURE 8.2

THE GAP FRAMEWORK FOR MODERNIZING PUBLIC-SECTOR SERVICE.

Citizen expectations of government service
- Citizen engagement
- Citizen involvement in service design
- Citizen evaluation of government service
- Citizen priorities for improvement

Government service improvement toolbox
- ASO/APO
- Partnership
- Single window
- Reengineering
- TQM
- Benchmarking
- Innovative practices
- Technology
- Cost saving

Close gap

Service delivery gap

Close gap

Monitor and measure performance and accountability

Government delivery of services
- Integrated front-line delivery and innovation
- Service culture
- Service systems
- Leadership

Federal

Provincial

Municipal

Other sectors

Source: Institute for Citizen Centred Service [5].

The Gap model was originally developed by the Canada School of Public Service in the Citizens First study of citizens' needs and expectations, and places the focus on identifying the gaps between citizens' service expectations, and the actual government performance in delivering services [1], then finding ways to close the gap between citizen/business expectations and service performance. The model notes that there are many tools available to help improve service performance and to manage public expectations.

Figure 8.3 outlines the key drivers enabling innovation in services delivery and in shaping the future of public-sector service delivery.

FIGURE 8.3

KEY DRIVERS ENABLING INNOVATION IN SERVICES DELIVERY.

1	Customer experience strategy	The shift away from individual touchpoints in favor of a full spectrum of customer journeys that are highly tailored and maximize the level of integration between the physical and digital world
2	Government access across channels	Increasing focus on ensuring services are delivered in the simplest, most user-friendly, and efficient way for the citizen
3	Privacy protection	The adoption of secure account technology, consent models, and new cyber security tactics to mitigate emerging privacy threats
4	Technology enablers	Leveraging the latest analytic, cloud computing, and social networking tools to improve service delivery capabilities
5	Service staff culture	The establishment of new ways of recruiting, training, organizing, and developing service-focused professionals
6	Fostering solution-oriented innovation	Fostering a culture of innovation by bringing together a diverse set of stakeholders to rapidly prototype and scale new customer-centric ideas
7	Government collaboration	The evolving role of government from a passive service provider to a collaborator and facilitator
8	Outcomes by design	Changing the service delivery focus from inputs, activities, and outputs towards outcomes, thus making services more impactful and meaningful for customers

Source: Deloitte.

According to global research conducted by Deloitte, the eight drivers above appear to have become a focus for leading governments.

Learning Methodology: Class Exercise

In your group, please take five minutes to start discussion by asking participants about the following service challenges their organization face in providing citizen-centered service:

- The current citizens'/clients' pain points in accessing government services

- The key challenges they face in improving their organization's service delivery from the clients' perspective

Unit 2: Providing Citizen-centered Service Delivery

Introduction

Leading governments around the world are focusing on citizen-centered services (Figure 8.4). World-class administrations are using information that already exists within government, such as

birth certificates and taxation data to automatically grant benefits to citizens as they become eligible, eliminating the need to complete forms or even apply for benefits.

FIGURE 8.4

LEADING GOVERNMENTS AROUD THE WORLD ARE FOCUSING ON CITIZEN SERVICES.

	Mission	Vision
Service Canada	• To provide secure, knowledgeable, one-stop, personalized service to Canadians	• To achieve better outcomes for Canadians through service excellence
Centrelink giving you options	• Serving Australia by assisting people to become self-sufficient and supporting those in need	• Help meet citizens' expectations for improved service and, in particular, to improve the management of social security and employment services
Ontario	• Our job is to make things easier for you	• To be recognized for meeting or exceedibg customer expectations with our service, solutions, leadership, and people; every time.
UNITED ARAB EMIRATES MINISTRY OF CABINET AFFAIRS	• Bringing government to you.	• Be one of the leading nations in theworld by 2021, putting 'citizens first' to promote a lean, forward looking, accountable and innovative government

Efficiency and effectiveness are the objectives

Source: institute for Citizen Centred Service [6].

Strategies to Provide Successful Citizen-centered Service Delivery

By engaging and seeking input from citizens, services can be tailored, based on real understanding of what people want and need. One of the most important aspects of the citizen-centered government is delivering quick wins, for example, by removing a known bottleneck, while also considering the emerging needs of citizens and the private sector, their changing expectations, and new market dynamics. A delicate balance must be struck between the need to provide high-quality services and the need to reduce expenditures. Both cost reductions and service improvement can be accomplished in part by innovative and transformative approaches to the delivery of government services. The sharing of service innovations across the world has consequently become much more important.

According to Marson and Heintzman [7], Canada has become a world leader in some areas of public-sector service delivery and is among the world leaders in several other areas. Areas where Canada has innovated include the following:

- **Service research,** including documenting citizens' and businesses' service needs and expectations through the use of such instruments as Citizens First, Taking Care of Business and the Government of Canada Internet Panel [10]

- **Measuring and benchmarking service satisfaction** using standardized tools such as the Common Measurements Tool and the Institute for Citizen Centred Service's benchmarking center

- **Institutionalized collaboration among jurisdictions** including the Public Sector Service Delivery Council, the Public Sector Chief Information Officer Council, and the joint relationship between technology executives (CIOs) and service executives (public-sector service professionals)

- **Professionalization of service training** through such initiatives as the Service Canada College and the Institute for Citizen-Centred Service's Certification Programs

- **The development and application of the Public Sector Service Value Chain,** which documents the linkages between employee engagement, citizen service satisfaction, and trust in public organizations

Types of Innovation: The 'What' of Service Delivery

Public-sector service delivery has become a complex and multi-faceted enterprise. The scope of this enterprise is manifest in Figure 8.5, adapted from Kernaghan [6], which identifies the major areas in which improved service delivery can be fostered. Most elements of the broad field of service delivery outlined in Figure 5 aimed at ensuring and improving citizens' access to information and services. Enhancing access is a significant consideration in several of the other categories of service delivery, including, for example, personalization, transparency, and channel management.

FIGURE 8.5

MAJOR AREAS IN WHICH SERVICE DELIVERY CAN BE IMPROVED.

Service delivery trends found Internationally and within Canada's provinces and territories

FROM	TO
Individual channels	Multichannel integration and management, including increased use of the mobile channel (UK, Australia, Singapore)
Tightly controlled and limited access to government information	Open and transparent government, published and reusable government data (USA, UK)
One size fits all, reactive government services	Personalized and proactive services (Denmark, Belgium, Quebec, Ontario)
Traditional, direct from government to client/citizen	Collaborative, citizen engagement partnerships and co-production (USA, New Brunswick, Australia, UK)
Multiple data collection standards	Interoperability and information sharing (Australia, Netherlands)
Department-specific HR practices	Professionalization of service staff to deliver complex service delivery situations (ICCS, State of Georgia, UK)
Fragmented multiple services across varying levels of government	Service integration, bundling of services (UK, Australia, Ontario, Quebec, Manitoba)
Economic stability with increasing operational budgets	Improved services and better outcomes with the same or decreased resources (UK, Australia, Wales)
Red tape, complex processes, and administrative burden	Cost-savings, improved access and service simplification (Portugal, France, Ontario)

Principles of Citizen-centered Services

This section focuses on innovations designed to enable citizens to access services in a rapid, simple, convenient, and equitable manner which are link to the four principles, policies, and improvements in existing processes to provide citizen-centered service delivery (Figure 8.6). For each aspect of access discussed here, reference is made to innovative initiatives drawn from countries across the world. This framework is drawn from Duggan [2] at the IBM Curam Research Institute.

FIGURE 8.6

FOUR PRINCIPLES OF CITIZEN-CENTERED SERVICES.

Source: Duggan [2], The IBM Curam Research Institute.
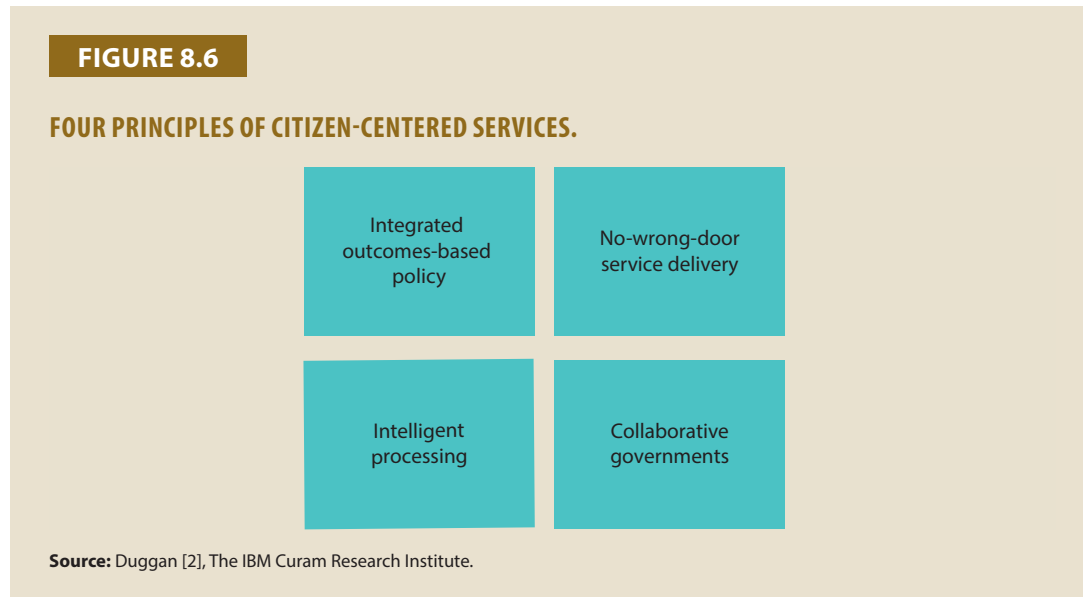
Providing citizen-centered services delivery demands a whole-of-government approach, requiring public services agencies to work across portfolio boundaries towards achieving a shared goal and an integrated government response to particular issues.

For example, Malaysia introduced the Government Transformation Program (GTP), an ambitious, broad-based program of change to fundamentally transform the government into an efficient and citizen-centered institution. The National Blue Ocean Strategy (NBOS) was introduced to be the focal point for the government's transformation efforts and serves as the backbone of integration and synthesis for 10th Malaysia Plan (10MP), the Economic Transformation Program (ETP), the Government Transformation Program (GTP), and National Transformation 2050 (TN50).

The main elements in NBOS were

- producing creative and innovative ideas;

- collaboration between ministries, departments, and agencies;

- involving minimal cost;

- enhancing the government's delivery system to the people;

- utilizing existing resources; and

- high-impact results.

Integrated Service Delivery (One-stop Services)

Integrated service delivery refers to a number of service agencies working together to collaborate and coordinate their support, services, and interventions to clients.

Key approaches to achieving improved outcomes include the following:

- Improving communication between agencies to monitor client progress and changes, and to be more responsive to these

- Identifying areas of duplication, working at cross-purposes, or what is creating confusion for clients about who is doing what

- Developing one plan for the client, which includes the work being done by/with all agencies, and actions and responsibilities the client agrees to do

- Building the understanding and capacity between the agencies, such as sharing practice frameworks and legal and funding limitations, so that they can work together more effectively and support each other for service delivery

- Identifying systematic issues that create problems for clients, and for services in their efforts to meet client needs. This may include identification of client groups or needs that 'fall between the gaps'

- Developing streamlined processes that can provide more efficient and seamless services to clients, such as a common referral or common assessment process

The urban transformation centers (UTC) and rural transformation centers (RTCs) form the best practices of Malaysia's one-stop multi-service center strategy, making access easier and saving time for citizens and businesses, who now no longer have to go to multiple government buildings in different locations. The UTCs (see Figure 8.7) provide a wide range of core services such as,

FIGURE 8.7

AN URBAN TRANSFORMATION CENTER OR 'GOVERNMENT DEPARTMENT STORE' IN MALAYSIA.

My-Kad registration, driving licence renewal, and business advisory services. They also provide extended hours of service year round.

The rural transformation centers (RTCs) are sites to implement integrated service initiatives to enhance the knowledge, skills, and abilities of rural residents to increase revenue, improve job opportunities, and raise living standards.

Denmark's Online Citizens' Portal, www.borger.dk, takes an innovative approach to bundling services according to life events. Based on a survey of citizens, the government has developed a set of 12 different 'personas,' each representing a particular segment of Danish society in terms of life stages and life situations. Information relevant to each persona can be added to the website incrementally. Think of Peter, one of the personas, who is a 33-year old Dane living in an apartment in Copenhagen with his wife Anne. Peter uses MyPage and borger.dk to obtain an overview of his financial situation. These personas are made available to other Danish public authorities as reference models.

Singapore's 'my Central Provident Fund' (CPF) has won several awards for innovative excellence in relation to services for life events, bridging digital divides and personalization. The CPF is a comprehensive social security savings plan that provides for citizens' retirement, healthcare, and housing needs. CPF programs and services are packaged according to citizens' life events, e.g., starting work, reaching the age of 55. Citizens are shown how the decisions they make at each life event can affect their overall retirement savings [6, 12].

'No Wrong Door' Service Delivery

A model of integrated and coordinated service delivery based on the premise that every door in the government's service system should be the right door. It represents a philosophy whereby service providers are committed to actively ensure that citizens receive appropriate and adequate support for their needs, regardless of their initial entry point. 'No wrong door' makes sure that wherever the citizen goes, they can get access to all the services they need. Among the core characteristics behind the 'no wrong door' service delivery are the concepts of being location independent and channel independent.

Location Independent

Traditionally, each government department had its own offices where citizens could apply for benefits and services. It was not uncommon to find three or more different departments and levels of governments, all with their own offices, serving in the same geographic area. One-stop service centers provide citizens and businesses with a single 'door' for accessing a variety of public-sector services.

Channel Independent

The second characteristic is channel independence. A service channel is about "how citizens can apply for and receive government services and benefits." All service delivery channels (for example, telephone channel, office channel, or internet channel) need to be designed to enable a citizen to either apply for or receive some service or benefit via the channels of their choice.

The 'no wrong door' concept is exemplified in the community link offices in New Zealand. Originally sponsored through the Ministry of Social Development Work and Income service, other government and community groups are invited to colocate in the one-stop office to address all the inhibitors of getting people back to work.

Likewise, Malaysia's government services are being made even more convenient to access through the 1Malaysia One Call Centre (1MOCC), where multiple ministries and agencies can be reached at one, easy-to-remember phone number (see Figure 8.8). Through this service, the citizen can access information on relevant government services without having to think about which department they need to contact for a particular enquiry, and the distance between the providers and the users of government services is being reduced. This service takes a low-cost approach by consolidating the customer service infrastructure of different agencies. The 1MOCC approach to customer services offers low call rates for the public and enables cost saving through a centralized efficient and accurate communication system. It provides a one-stop solution center for people to ask questions, lodge complaints, or make suggestions on improving public service. It is a single point of contact to respond to any public enquiry, complaint, suggestion or feedback. This initiative results in optimizing resources and an effective collaboration between ministries in providing services.

FIGURE 8.8

1MALAYSIA ONE CALL CENTRE.

Complementary to the theme of 'telling government just once' is 'asking government just once.' The Ask Just Once theme is the focal point of the Government of South Australia's strategy to use technology to transform service delivery so that both citizens and businesses only have to ask once to get the service they require [6]. To implement this strategy, the government has established four priorities:

1. Coordinate service delivery channels and improve access to services.

2. Provide front-line service delivery staff with better tools.

3. Ensure the success of shared services.

4. Align organizational and technology capability with service delivery.

Also, South Australia has created a new organization called Service South Australia to provide a wide range of government services through SSA offices, a website, and a multi-service call center.

Likewise, The Government of Western Australia provides an online service [13] allowing citizens to simultaneously notify several government agencies about changes in personal details relating to change of address, birth, death, and change of name. Work is in progress to add other life events and increase the number of participating agencies. The Republic of Korea (ROK) has announced plans to implement a similar system for ten life events, beginning with bereavement and gradually including such events as birth, marriage, moving, and education [6].

For the business sector, Malaysia has introduced the one-stop Business Licensing Electronic Support System (BLESS) portal, providing a standardized format for all application forms, online payment options, and feedback mechanism. BLESS was established in 2009 to simplify the procedures of all licensing permits and approvals involving multiple government agencies.

Intelligent Processing

The third concept of citizen-centered service delivery is intelligent processing. Today, almost every government in the world collects significant amount of information that already exists somewhere else in the 'system.' There are three characteristics that make up intelligent processing:

1. **Priority:** This is about understanding what priority to put on an application or a family circumstance. In child welfare, formal decision-making models, such as structured decision making from the Children's Research Center, exist to support this prioritization.

2. **Complexity:** Today, in many social enterprises, the same process is usually used for all applications, irrespective of the relative complexity. In reality, a proportion of claims for benefits are relatively straight forward, yet they are usually treated in the same way as complex ones. The application from a repeat benefit recipient is usually treated the same as if they were seeing the system for the first time. At Worksafe BC17 and WorkcoverSA, IBM Cúram has implemented systems that enable a significant proportion of all claims to be automated, enabling the case workers to focus on the cases that need the most help.

3. **Risk:** The approach that is often seen is to try to identify the most-risky claimants and apply more controls to them. However, the current reality of many systems is that they are designed to detect and prevent fraud and abuse in all applications, as described earlier, thus being part of the problem for the honest majority.

Collaborative Government

The fourth concept of citizen-centered service delivery is collaborative governments. If one accepts the premise that 'integrated outcomes based policy' looks at all the services and benefits to achieve an outcome, and one accepts that 'no wrong door' means looking at service delivery channels that are not just owned by the social enterprise that owns the service offering, then it is a given that governments and providers need to work together in new ways. The Malaysia Global Innovation and Creativity Centre (MaGIC), launched in April 2014 by the then Prime Minister Mohd. Najib Tun Abdul Razak and the then President of the USA, Barack Obama

- created a full-service ecosystem to support both local and international entrepreneurs;

- serves as a one-stop shop for entrepreneurs; providing access to a full spectrum of support, including training, mentoring, access to funding, and a physical hub for entrepreneurs to meet and network; and

- provides support tailored for different entrepreneurs (e.g., coding classes are offered for entrepreneurs engaged in tech start-ups).

The center has enhanced satisfaction and reduced confusion. Before this initiative, many different agencies and organizations competed to support entrepreneurs, providing funding, training, and mentoring; and encouraging people from all walks of life to embrace the spirit of entrepreneurship. Now, risk usually associated with entrepreneurship is minimized and the centre creates new demand, by providing something that is valuable to entrepreneurs, while also keeping its costs low.

Exercise

The presenter should link the four principles of citizen-centered service to policies and improvements in existing processes to provide citizen-centered service delivery using the case study, 'The Role of One Stop Center (OSC) in Urban Governance in Malaysia: A Case Study of the Approval Process of Planning Permission in Penang Island' [3].

The presenter should ask the group questions such as the following:

1. What data is needed to enable better planning to improve outcomes of the services offered?

2. What can be done to improve existing service coordination and delivery?

Unit 3: Measuring Government Service Delivery Performance

Learning Objective

In this unit, participants will learn how to implement a process within their organizations and to monitor and measure service improvement from the clients' perspective.

Introduction

A 'citizen journey' is the entire experience that a person has when seeking a government service. The journey has a discrete beginning and end, and because it is typically multitouch and multichannel, it is also cross-functional in nature. A citizen journey is anchored in how people think about their experience, not in how government agencies do. Combining customer-satisfaction information with operational data (call-center volumes and number of in-person visits, for instance) can yield additional insights, beyond what citizens state explicitly via surveys and other feedback channels. Many governments have made efforts to improve service delivery through online portals or one-stop shops like centralized call centers, but find they are still unable to meet the public's expectations. Citizens tell public-sector officials, as also confirmed via a survey conducted by the McKinsey Center for Government, that they continue to feel frustrated by cumbersome or confusing websites and find that it is often still necessary to speak with multiple parties before their question is answered or their request is completed. As a result, governments face not only low rates of citizen satisfaction and eroding levels of public trust, but also increasing costs associated with delivering services across multiple channels.

FIGURE 8.9

SERVICE QUALITY SCORE OF PUBLIC SERVICES VS PRIVATE SECTOR.
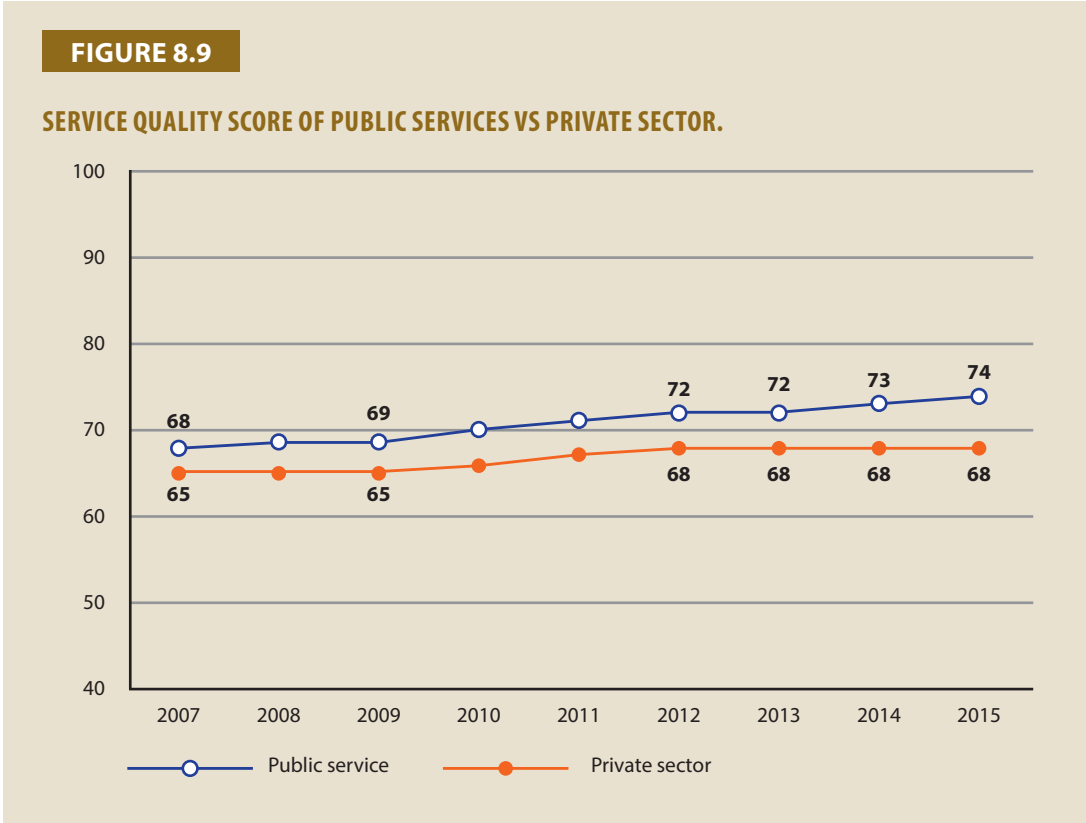
A service improvement initiative is a key means of achieving significant, quantifiable improvement in client satisfaction with government services. Figures 8.9 and 8.10 show continuous improvement in citizen satisfaction with government service in New Zealand [9].

Both New Zealand and Canada have demonstrated that the levels of satisfaction with government services can be significantly improved. Canada has been a pioneer when it comes to measuring and understanding citizens' and businesses' service needs, and then transforming its government services to meet the citizens' expectations. Achieving measurable improvement in citizen/client satisfaction involves several key elements. In New Zealand, these include

FIGURE 8.10

USE OF SURVEYS TO IMPROVE SERVICE DELIVERY.

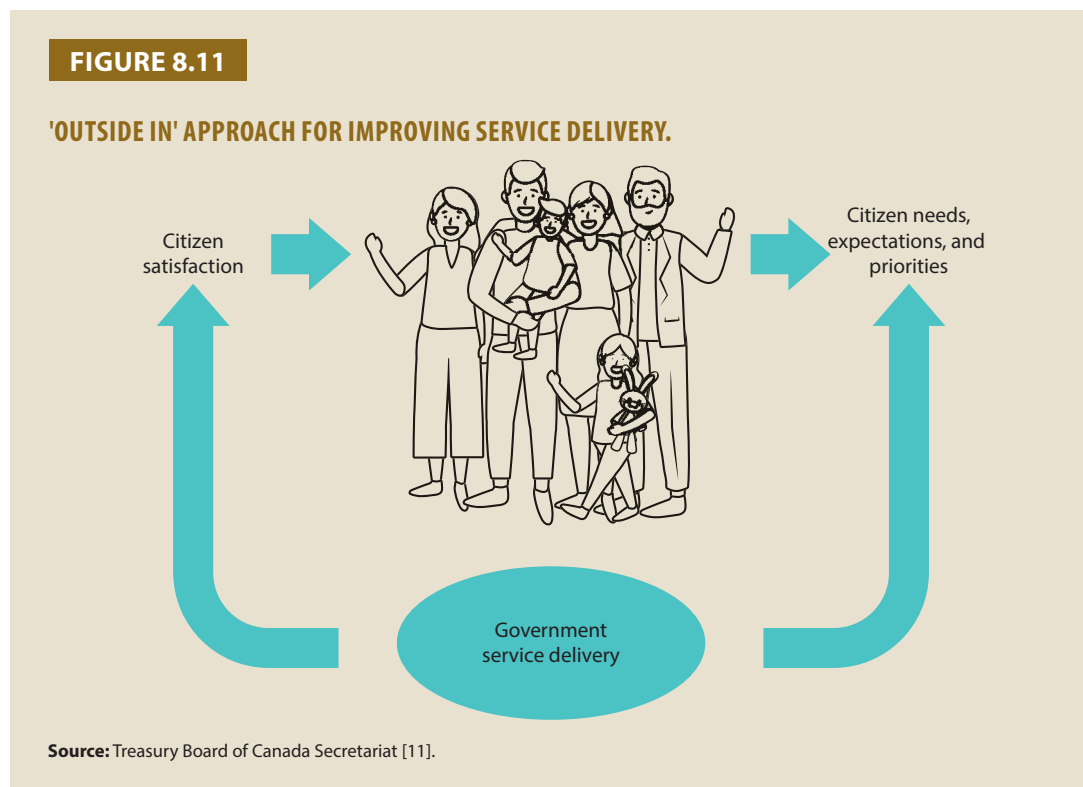**Source:** New Zealand State Services Commission.
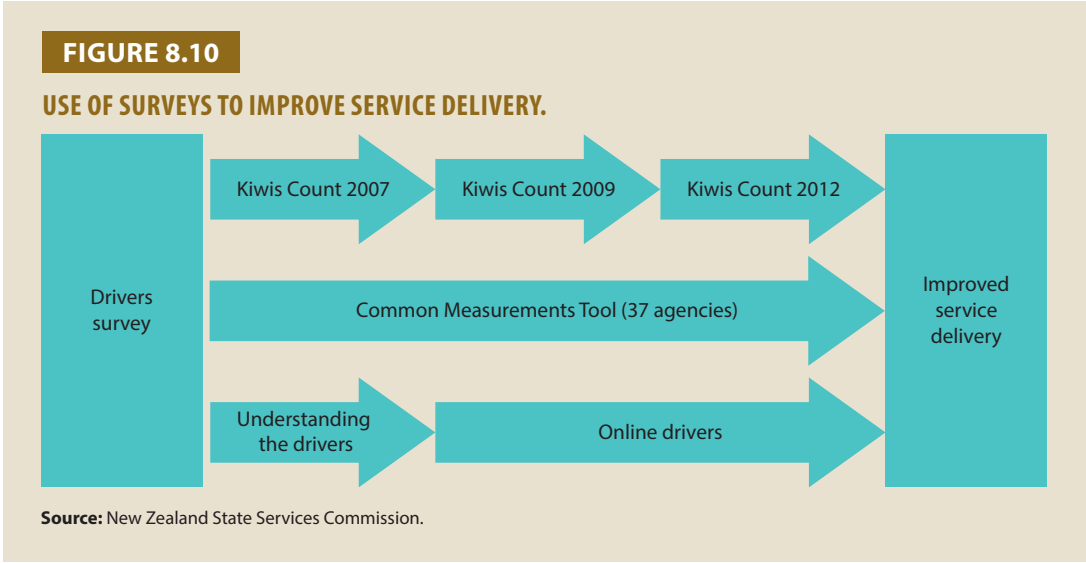
- undertaking research on factors such as courtesy, timeliness, and outcome, which drive service satisfaction for citizens and businesses (this includes documenting citizens' expectations for service standards, such as waiting times);

- using a standard instrument for measuring and benchmarking citizen/business service satisfaction; and

- regularly surveying citizens and businesses to understand their current levels of service satisfaction, and their priorities for achieving service improvement.

An 'Outside in' Approach

Successful service management requires a visible and sustained strategic leadership that is animated by a vision of citizen-centered service and that comes from both the political and public-service sides of the government. The increasing scope and complexity of service delivery in public governance and management argue strongly for central leadership and guidance from a whole-of-government perspective. This would enable service management to be carried out within an integrated, or at least a coherent, coordinated, and collaborative, set of policies and structures.

The Canadian Government's Common Measurements Tool (CMT) is a survey designed to measure the service expectations and experience of clients in the public sector. Users are guided/assisted through the four steps of design, implementation, analysis, and action using the tools developed by the intergovernmental Institute for Citizen Centred Service (ICCS) to assist with each step [8].

Over the past decade, governments have been gradually moving from an 'inside out' approach, i.e., basing service delivery on what the organization saw as important, to an 'outside in' approach (see Figure 8.11).


FIGURE 8.11

'OUTSIDE IN' APPROACH FOR IMPROVING SERVICE DELIVERY.

Citizen satisfaction

Citizen needs, expectations, and priorities

Government service delivery

Source: Treasury Board of Canada Secretariat [11].

Tools to Evaluate Customer Satisfaction

Public organizations and their managers need a methodology to generate accurate, actionable insights for transforming service delivery by understanding citizens' needs and priorities. Tools that allow comparative analysis at macro level are Customer Satisfaction Index and Standardized Survey Instruments.
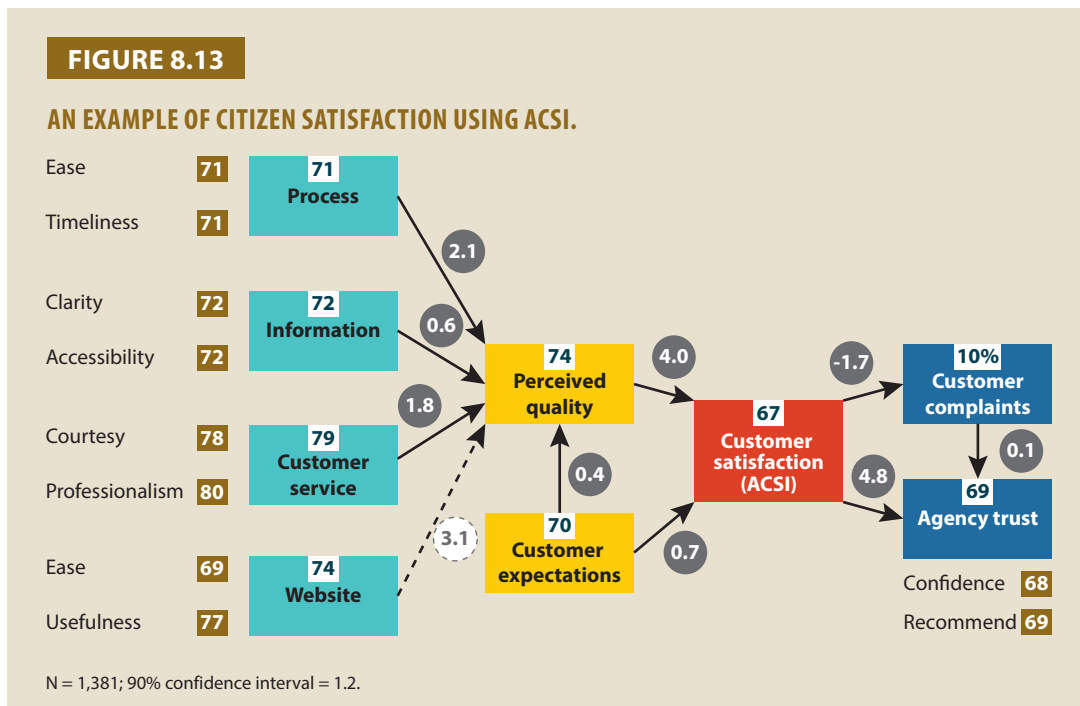
The American Customer Satisfaction Index

The American Customer Satisfaction Index (ACSI) [14] uses a cause-and-effect model with indices for drivers of satisfaction on the left side (customer expectations, perceived quality, and perceived value); the satisfaction index in the center; and outcomes of satisfaction on the right side (customer complaints and customer loyalty, including customer retention and price tolerance). The Index score is calculated as a weighted average of three survey questions that measure different facets of satisfaction with government services. ACSI researchers use proprietary software technology to estimate the weighting for each question.

The ACSI uses two interconnected methods to measure customer satisfaction, namely, interviewing and structural equation modeling (see Figure 8.12). The methodology combines survey inputs. Customer interviews are conducted telephonically and face-to-face. Interviewers are guided by structured questionnaire, completed either telephonically or using face-to-face interviews. Results of the survey enable government service providers to evaluate citizen trust in the government and hold agencies accountable for results. This helps improve program operating performance.

FIGURE 8.12

ACSI FRAMEWORK TO MEASURE CITIZENS' SATISFACTION OF GOVERNMENT DELIVERY.
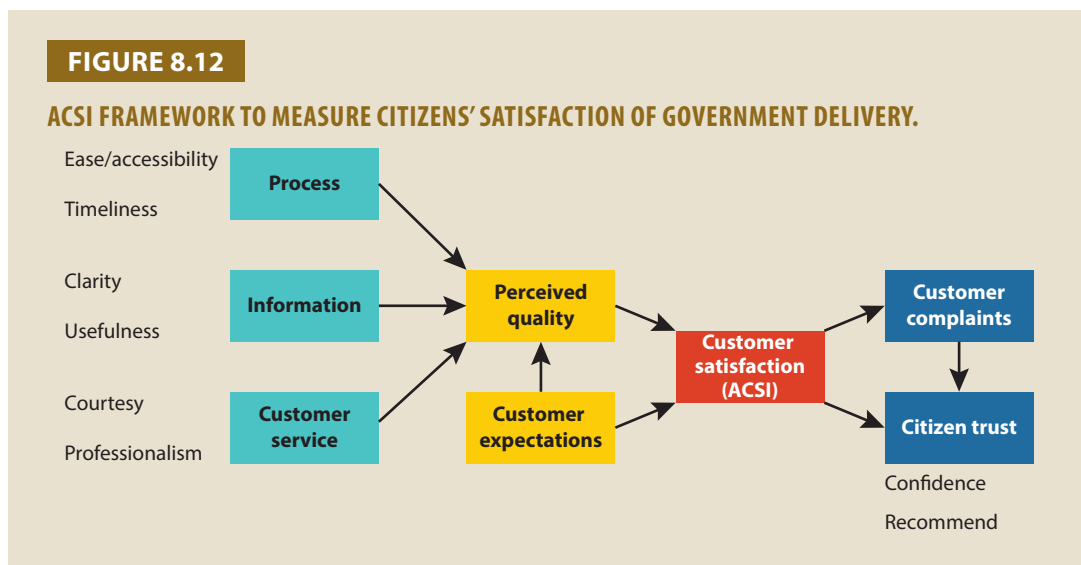
A number of countries have used the ACSI to measure customer satisfaction, particularly in the private sector. In Asia, these include Japan, Singapore, Malaysia, and Hong Kong SAR. In Singapore, for example, the Singapore Management University uses the ACSI to create an index of overall national customer satisfaction with services [15]. The SMU measurement system also includes a few public-sector organizations.

On a national basis, if used by the public sector, the ACSI tool also provides analysis or findings on overall trend government service performance monitored over the years in meeting the objectives to provide citizen-centered services (see Figure 8.13). This is the case in the USA where the ACSI is used at the federal government level to measure and track service performance:

FIGURE 8.13

AN EXAMPLE OF CITIZEN SATISFACTION USING ACSI.

N = 1,381; 90% confidence interval = 1.2.

"In addition to its extensive coverage of the private sector, the American Customer Satisfaction Index (ACSI) benchmarks citizen satisfaction for a multitude of federal agencies and departments, as well as two high-usage services of local governments (police and solid waste management)" [14].

In a recent ACSI survey, some of the agencies that received high scores were the Passport Offices (83%), the National Weather Service (83%), the Internal Revenue Service (Online Tax Filers 76%), and the State Department Consular Affairs Call Center (89%) [16].

The US Government departments and agencies are able to track and benchmark their performance over time using the ACSI measurement system. Overall, since 2009, the average score for all departments has varied from 64% to 72%.

Standardized Survey Instruments: Common Measurements Tool

To develop common measures using standardized survey instrument such as the Common Measurements Tool (CMT), participants need to identify the primary elements of the service delivery process and the impact these elements have on client satisfaction. The internal and external variables of the service delivery process that should be measured are

1. client expectations,

2. perceptions of service experience,

3. level of importance,

4. level of satisfaction, and

5. priorities for improvement.

A 'service gap' is defined as the disparity between a client's expectations of a service and their perception of the service experience. These are called 'drivers of client satisfaction.' Cross-analysis of satisfaction and importance variables will identify priorities for improvements and thus promote efficient allocation of resources.

The Canadian Public Service-designed CMT is aimed at providing client feedback to any public organization [4]. To ensure that all aspects of client service are considered, the CMT was conceived around five key elements: client expectations, perceptions of the service experience, satisfaction levels, levels of importance, and priorities for service improvements.

Understanding the Common Measurement Tool

- This survey tool supports public-sector service improvement widely in Canada and internationally.

- Managers can understand drivers, assess gaps in performance, and identify service improvements.

- It measures key drivers of satisfaction with public services.

- It can be shaped to measure different channels or multichannel services.

- Is a highly reliable way to capture client feedback on key dimensions of the service experience.

- It supports benchmarking. The ICCS Benchmarking Service enables comparisons against peer organizations, identification of best practices, and sharing of lessons learned.

Applying the Common Measurement Tool

The CMT is for the operational use of organizations wanting to improve service to their clients and encourages more public organizations to engage in client surveys. The CMT prescribes that information be collected to assess levels of satisfaction against areas of importance. In doing so, it is possible for organizations to more accurately identify what needs to be fixed. Using the CMT, public-sector managers are able to assess client satisfaction, understand client service quality expectation, and identify services.

The Institute for Citizen Centred Service (ICCS) developed the CMT survey to measure the service expectations and experience of clients. Users are guided with question bank, user guide, workbooks, and service improvement guide to assist in each of the four steps, namely, design, implementation, analysis, and action. A comprehensive item bank provides over 150 questions from which users can select the questions that work best for their organization (see Figure 8.14).

Exercise

Based on the eight steps below, design a customer survey. Participants can use the CMT Workbook as a reference to design a CMT survey based on the following steps:

Step 1. Identify your need to know.

Step 2. Determine specific services you want.

hihe

hi

hi

FIGURE 8.14

QUESTION BANK FOR CITIZEN SATISFACTION USING ACSI.
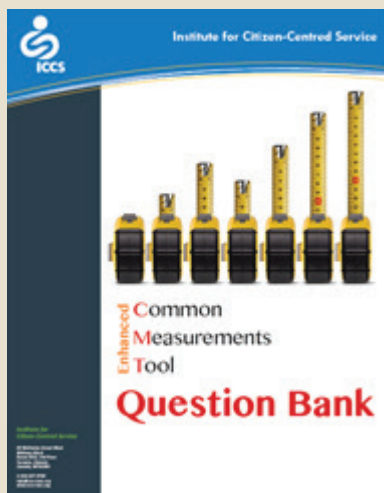
Source: Institute for Citizen Centred Service [10].

Step 3. List the various channels client can use to access these services.

Step 4. List all elements of the service experience.

Step 5. Select actionable questions and attributes.

Step 6. Include appropriate contextual questions.

Step 7. Consider language issues and respondent literacy levels.

Step 8. Organize your questions and attributes into a survey framework.

Unit 4: Understanding Business and Citizen Needs and their Expectations and Priorities for Service Improvement

Introduction

A service improvement initiative is a key process for achieving significant, quantifiable improvement in client satisfaction with public services. The CMT is designed for the operational use of organizations wanting to improve services to the citizens and encourages more public organizations to engage in client surveys. Public-sector managers are able to assess their clients' satisfaction, understand service quality expectation, identify service gaps, recognize priorities for improvement, and define service standard (see Figure 8.15). The Institute for Citizen Centred service has prepared a service improvement guide for program managers to follow at each step of the implementation.

Designing a CMT Client Satisfaction Survey

Implementing a CMT survey starts with the sampling process of defining your population of interest, define a sampling frame, determining the sampling method, and selecting an appropriate sample size. The following points can serve as guidelines in constructing the sample design:

FIGURE 8.15

ICCS SERVICE IMPROVEMENT CYCLE.
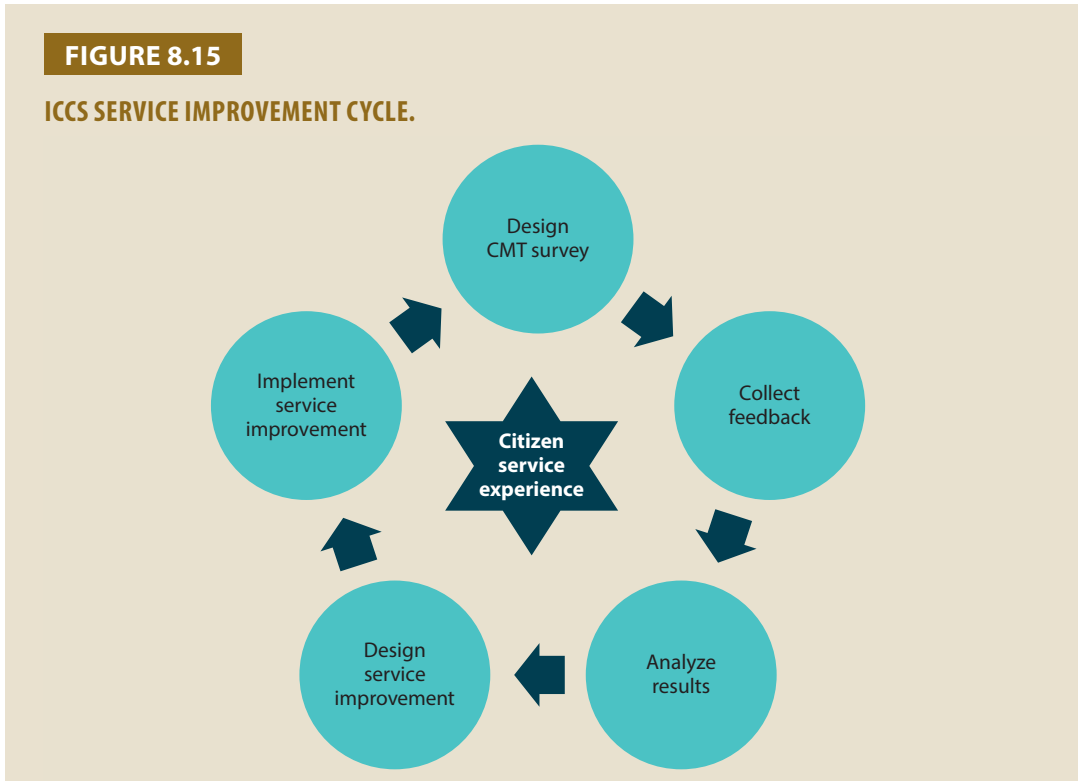
- Deciding on the best approach for assessing customer satisfaction

- Deciding on the data collection method

- Deciding on the sample

- Table comparison of feedback methods

- Determining the sample size

- Developing the questionnaire

- Constructing the questionnaire

- Determining the method of data collection

- Mail surveys

- Telephonic surveys

- Pretesting

Data Collection Method

On completion of survey design and before implementation of the survey to collect feedback, public organizations need to establish a sampling process and select the data collection method. Data collection can be implemented through various methods as follows:

- Focus groups

- Mail surveys

- Telephonic surveys

- Electronic feedback

- Online focus groups

Table 8.1 outlines factors to be considered in choosing the data collection methodology.

TABLE 8.1

FACTORS TO BE CONSIDERED IN CHOOSING THE DATA COLLECTION METHODOLOGY.

Factor	In-person survey	Mail-back form	Mail-out survey	Telephone survey	Electronic, via internet
Cost	High	Low	Moderate	Moderate	Low
Convenience for customer to complete	Moderate	High	High	Moderate	High
Length of survey	Up to 1½ hours	Very short	Up to 12 pages	12–15 minutes	5–7 minutes
Size of recommended sample	Small	Large	Large	Moderate	Large
Ability to encourage customer to participate	High	Low	Moderate	High	Low
Need for accurate list of telephone numbers or addresses	Yes	No	Yes	Yes	No
Ability to get quick response	Moderate	No	Moderate to low	Yes	High
Response rates	High	Low	Moderate to low	Moderate	Moderate to low
Extent of likely bias between customers who choose to participate and those who decline	Low	High	Some	Low	High
Ability to generalize results	Moderate to high	Low	High	High	Low

Analyzing Data and Results

CMT benchmarking results for each question enables organization to identify problem areas as well as areas of strength and areas to improve for service experience (see Figure 8.16).

Designing Service Improvements

For designing a service improvement plan (see Figure 8.16), participants must include the following elements:

- Priorities for service improvement

- Actions linked to each priority

- Sub-actions linked to each action

FIGURE 8.16

CMT BENCHMARKING RESULTS.
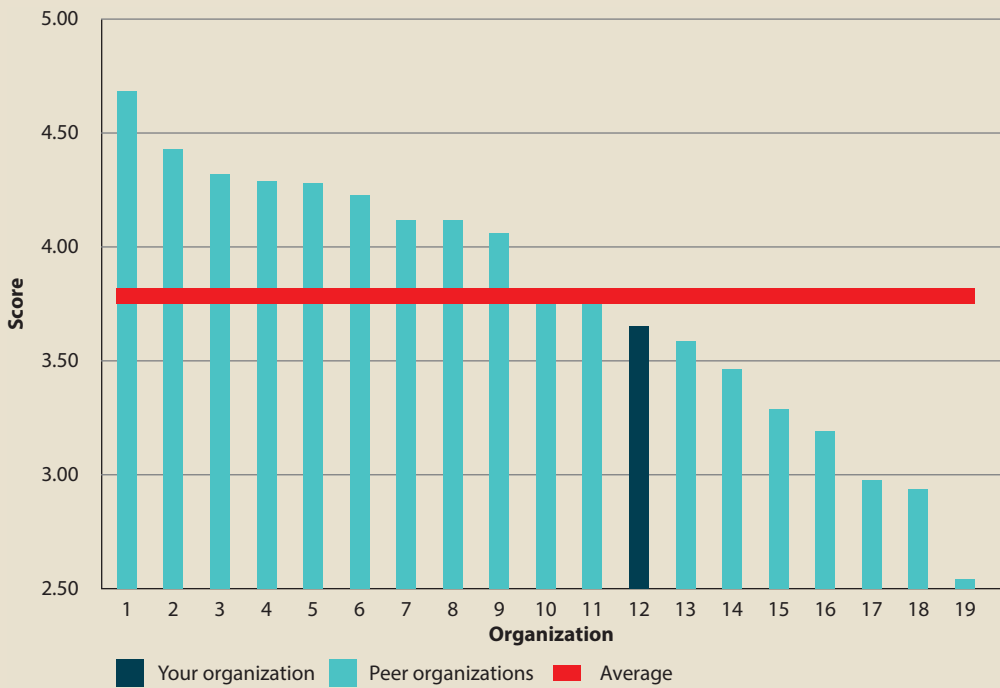
*Group 2	Survey ID	Average	Percent	Percentile	Rank
Top performers	1220407	4.70	94	100	1
	1190108	4.44	93	94	2
	1420306	4.33	86	89	3
Your organization	1421035	3.82	71	52	10a
Lowest	1300301	2.55	39	5	19

Overall average 3.83

- Responsibility assigned for each action and sub-action

- Timeframes for each action and sub-action

- Required results for each action and sub-action

- Measurements of each action and sub-action

- Framework for monitoring and accountability (see Figure 8.17)

Documenting the Priorities for Service Improvement

Figure 8.18 shows an example of data transfer into an impact-and-performance matrix to determine priority action by service category for improvement. Actions are linked to each priority.

Key drivers of citizen satisfaction for a service area are determined through correlation of overall satisfaction score with specific aspects of the service, as shown in Table 8.2. The service provider is able to identify aspects of service delivery that have the greatest impact on citizen satisfaction.

FIGURE 8.17

SERVICE IMPROVEMENT PLAN FRAMEWORK.

Improvement priorities based on the five key drivers of citizen satisfaction

The service channels that are impacted by the improvements

The time frame for implementing the actions and sub-actions

The method by which the results will be measured

Improvement objective for satisfaction driver

The specific actions needed to meet the objective

Priority areas for improvement: Example

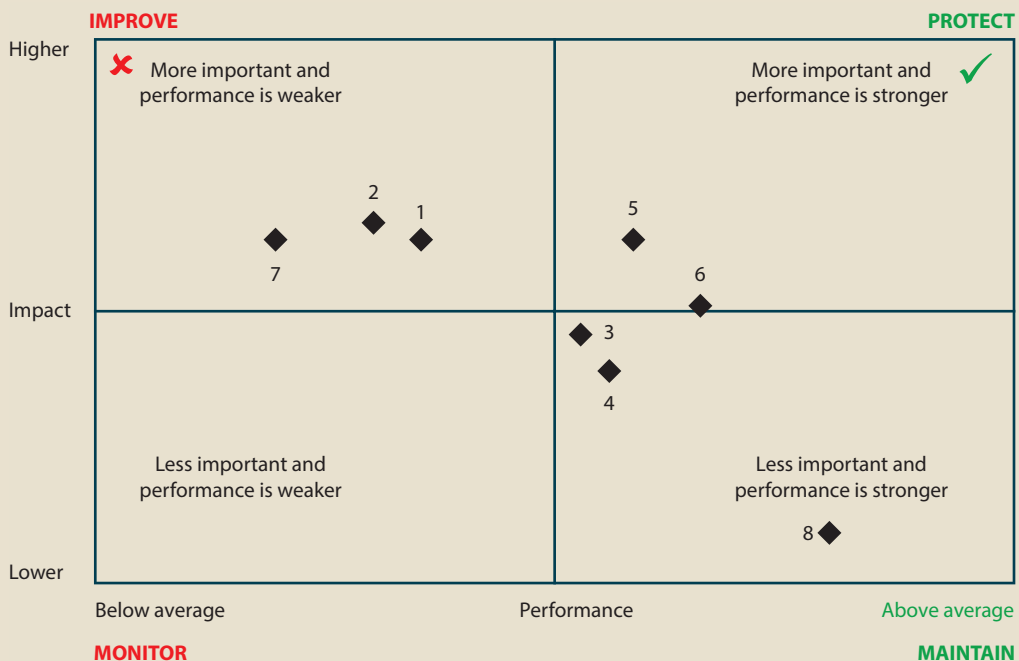| Priorities for improvements	Objectives/actions	Service channels					Responsibility	Timeframe	Results	Measurement
		Phone	In Person	Mail	Electronic	Other				
Based on client and citizen priorities, identify improvement priorities on which actions should be taken	Which action(s) will be taken to address client priorities for service improvement?						Who is (are) responsible for taking action?	When will this be undertaken (U) and finished (f)	What result(s) is/are expected?	How are progress and results measured?
Improve service access	Objective 1: facilitate the identification of points of service									
	Action 1.1: installing new signage inside and outside building	x					Director of Administrative Services	U: June 2005 F: October 2005	Increased client satisfaction with signage	Measured through the client satisfaction survey
	Action 1.2: review of "blue pages" x information in telephone directories	x	x				Director of Communications	U/F: September 2005	Increase client satisfaction with accessibility by telephone	Measured through the client satisfaction survey
	Objective 2:									
	Action 2.1:									
Improve service imelines										
Improve staff competency/ knowledge										
Improve service fairness										
Improve service staff courtesy										
Improve staff satisfaction										

The person who is responsible for implementing the action

The intended results of the action

FIGURE 8.18

IMPACT VERSUS PERFORMANCE MATRIX.

IMPROVE PROTECT

Higher

✖ More important and performance is weaker

✔ More important and performance is stronger

2 1

5

7

6

3

4

Impact

Less important and performance is weaker

Less important and performance is stronger

8 ◆

Lower

Below average   Performance   Above average

MONITOR   MAINTAIN

TABLE 8.2

USING IMPACT SCORES TO DETERMINE KEY DRIVERS OF A SERVICE AREA.

Ranking	Attribute	Impact score
1	Timeliness	0.56
2	Access	0.40
3	Knowledgeable staff	0.29
4	Fairness	0.26
5	Confidentiality	0.23
6	Communication	0.23
7	Competent staff	0.21
8	Outcome	0.20
9	Information	0.16
10	Extra mile	0.15

Implementing Service Improvement

The key steps in implementing a service improvement plan include

- project management,

- leadership support, and

- visible signs of progress,

- verification of responsibilities,

- making supporting changes,

- supporting the human dimension,

- supporting creativity,

- having fun, and

- adjusting and enhance the plan.

Monitoring

Statements on how the service improvement plan will be monitored and reported by the organization must be formed. Also, statements on who in the organization is accountable for the service improvement plan, the frequency and content of reports, and to whom the reports are sent must be prepared. Client-centered service standards and client satisfaction targets must be set, keeping the following in consideration:

- Service standards are published and openly accessible.

- Service standards are based on client priorities and expectations, reflecting available resources.

- Satisfaction improvement targets are sufficiently challenging so that achieving them will result in a noticeable reduction in the satisfaction gap, yet realistic enough that they can be achieved.

- Measurement and performance reporting is done against the service standards and satisfaction improvement targets.

Recognizing Success

Successful implementation of service improvement must be formally and informally recognized within the organization to reinforce success.

Exercise

Encourage participants to refer to ICCS for a case study discussion of how to improve service within their organization and/or government [4, 5]. The New Zealand version can be found online [8].

References

[1]   Canadian Centre for Management Development. *Citizens First.* Ottawa: CCMD; 1998. http://publications.gc.ca/site/eng/9.695885/publication.html

[2]   Duggan M. Citizen Centred Service Delivery. New York: IBM Curam Research Institute; 2013.

[3]   Firdaus R. The Role of One Stop Center (OSC) in Urban Governance in Malaysia: A Case Study of the Approval Process of Planning Permission in Penang Island. Master's Thesis http://www.landentwicklung-muenchen.de/master/master_thesis/Thesis_2011_2013/Firdaus.pdf.

[4]   Institute for Citizen Centred Service. Common Measurement Tool Case Study at: https://iccs-isac.org/resources-tools/common-measurements-tool/cmt-case-studies. https://iccs-isac.org/resources-tools/common-measurements-tool/about-the-cmt.

[5]   ICCS. Towards Citizen Centered Service Delivery – A How to Guide for Service Improvement Initiatives. Toronto: Institute for Citizen Centred Service; 2007.

[6]   Kernaghan K. International Innovations in Public Sector External Service Delivery. Toronto: Institute for Citizen Centred Service; 2010.

[7]   Marson B., Heintzman R.. From Research to Results- a Decade of Results Based Service Improvement in Canada. Toronto: IPAC; 2011.

[8]   New Zealand State Services Commission and the Institute for Citizen Centred Service. A Guide to Using the Common Measurements Tool. Wellington: State Services Commission; 2011. https://www.ssc.govt.nz/common-measurements-tool.

[9]   New Zealand State Services Commission. *Kiwis Count 2018 Report- New Zealanders' Satisfaction with State Services*. Wellington: NZ State Services Commission; 2019.

[10]   The Institute for Citizen Centred Service. www.iccs-isac.org.

[11]   Treasury Board of Canada Secretariat. A policy framework for service improvement in the government of Canada. Ottawa: Government of Canada; 2001. http://publications.gc.ca/site/eng/9.662389/publication.html

[12]   Central Provident Fund Board. https://www.cpf.gov.sg/Members/AboutUs/about-us-info/cpf-overview.

[13]   Government of Western Australia. www.lifeevents.wa.gov.au.

[14]   ACSI. http://www.theacsi.org/industries/government.

[15]   Singapore Management University. https://www.smu.edu.sg/news/2019/03/27/national-customer-satisfaction-level-reaches-record-high.

[16]   ACSI. https://www.theacsi.org/index.php?option=com_content&view=article&id=653&Itemid=1150.

MODULE 8
E-GOVERNMENT

At the end of this module, participants will

1. know how the use of information and communications technologies (ICT) can improve the productivity and quality of public-sector programs, regulation, and services;

2. know how ICT can be used to improve the program effectiveness of government programs, regulations, and services;

3. know how ICT can be used to improve citizen empowerment and engagement;

4. know how ICT can be used to improve the transparency of government decision making and government operations and reduce the potential for corruption;

5. know how ICT can be used to improve the accountability of public organizations and governments;

6. know how ICT can be used to improve and integrate all delivery channels of government, including the internet, telephone, and counter service channels;

7. know how to effectively apply ICT to improve the performance of governments and individual public organizations;

8. understand best practices in ICT across the public sector, including successful international examples, as well as issues and problems encountered;

9. know how to create an effective ICT plan to achieve an agency's client engagement, productivity, and service improvement objectives; and

10. understand the key success factors in successful ICT project planning and implementation.

This module consists of six units:

Unit 1: The Definitions of E-government and E-governance

Unit 2: The Performance Objectives of E-government and E-governance

Unit 3: The Three Modalities of E-government

Unit 4: Applying E-government at the Local and National Levels

Unit 5: Implementing E-government in a Global Perspective

Unit 6: E-government Maturity Models

Unit 1: The Definitions of E-government and E-governance

The application of computer-based technologies in government can dramatically improve both productivity and service in the public sector and can also improve the communication channels between citizens and their governments. In fact, the application of these technologies has been perhaps the most important driver of performance improvement in the government in recent years. The use of these computer and internet-based technologies to improve many aspects of public-sector performance is called e-government.

The OECD and UN Definitions of E-government

There are multiple definitions of e-government among researchers and experts, but most of them define it as the government's use of ICT to offer citizens and businesses the ability to interact and conduct business with the government by using different electronic media such as telephone, touch pad, fax, smart cards, self-service kiosks, and e-mail/internet. E-government is also about how governments organize and manage themselves internally, by using ICT to improve the efficiency of their processes for internal service delivery, such as financial management, payroll, purchasing, and buildings management systems across government.

According to OECD,

> "Electronic government refers to the use of information and communication technologies, and particularly the Internet, as a tool to achieve better government."

The UN defines e-government as follows:

> "E-Government refers to the use of information and communications technologies (ICT) to improve the efficiency, effectiveness, transparency and accountability of government. E-Government can be seen simply as moving citizen services online, but in its broadest sense it refers to the technology-enabled transformation of government - governments' best hope to reduce costs, whilst promoting economic development, increasing transparency in government, improving service delivery and public administration, and facilitating the advancement of an in E-Government is focused in creating a SMART (Simple, Moral, Accountable, Responsive and Transparent) Government."[1]

The World Bank has a very broad view of e-government's potential contribution to productivity:

> "E-Government refers to the use of information and communications technologies (ICT) to improve the efficiency, effectiveness, transparency and accountability of government. E-Government can be seen simply as moving citizen services online, but in its broadest sense it refers to the technology-enabled transformation of government - governments' best hope to reduce costs, whilst promoting economic development, increasing transparency in government, improving service delivery and public administration, and facilitating the advancement of an information society." [11]

Defining the Related Concept of E-governance

The term e-governance is somewhat broader than e-government and focuses on the use of technology to improve the way countries are governed (promoting good governance), to improve democratic processes, to facilitate citizen engagement and e-voting, and to improve the systems by which governments improve their accountability to citizens for their performance.

According to UNESCO, enhancing good governance is the central purpose of e-governance:

> "The purpose of implementing e-governance is to enhance good governance. Good governance is generally characterized by participation, transparency and accountability. The recent advances in communication technologies and the Internet provide opportunities to transform the relationship between governments and citizens in a new way, thus contributing to the achievement of good governance goals. The use of information technology can increase the broad involvement of citizens in the process of governance at all levels by providing the possibility of on-line discussion groups and by enhancing the rapid development and effectiveness of pressure groups. Advantages for the government involve that the government may provide better service in terms of time, making governance more efficient and more effective. In addition, the transaction costs can be lowered and government services become more accessible." [12]

In academic literature, e-government and e-governance are seen as a means of improving both government service delivery and the way nations are governed.

E-government can be an internet or a non-internet infrastructure. Non-internet infrastructure utilizes technologies such as telephone, SMS, biometric identification, TV, and radio.

Sub-categories of e-government are mobile government (m-government). Here, mobile technologies such as cellular phones connect users to the internet. So, information technology (IT) is used as a platform to exchange information and services for citizens, businesses, and governments. It is also important to note that an e-government project allows the government to improve public service and citizens' trust. This is accomplished by

1. improving collaboration(s) with the government,

2. enhancing ICT efficiencies,

3. streamlining man-machine interfaces,

4. optimizing audience participation through understanding of cultural sensitivities, and

5. strengthening good governance [13].

Unit 2: The Performance Objectives of E-government and E-governance

The application of e-government tools can dramatically improve the performance of the public sector in the following and other different ways:

- **Reducing costs:** One of the most important uses of ICT in government is to reduce costs and improve efficiency. Putting government services online can substantially decrease the costs of providing services to citizens and businesses compared with the traditional model of services provided from government offices. Providing government services over the internet also reduces the costs for clients, since they may no longer need to travel to a number of different government offices to transact their business or obtain a service. An example would be the registration of a new business: instead of it taking several weeks

and visits to multiple government offices, now in advanced Asian countries such as Singapore a new company can be registered online in one or two days, thus reducing service costs for both the government and its clients.

Efficiency and cost reduction can also be attained by streamlining internal processes such as purchasing, payroll, and personnel systems, and by enabling faster and more informed management and policy decision making. In many countries these back-office systems are being computerized, consolidated, and integrated using ICT in order to reduce the costs of providing these internal services. This may be supported by the creation of one-stop IT centers to provide for integrated internal administrative services, as in the Government of Canada.

- **Improving service delivery:** By putting government services online, e-government improves the quality of services in terms of time, convenience, and accessibility. For example, in countries such as the Philippines, through e-government, a citizen can request and pay for a copy of his birth certificate online and receive it by courier rather than the traditional system of waiting in line twice at a government office for both the application and the delivery. Moreover, citizens can conduct this kind of transaction 24 hours a day, seven days a week from the convenience of their homes. This can lead to dramatic improvement in productivity and citizen satisfaction with government service delivery. For example, clients of the US Internal Revenue Service who file their income taxes by mail leave only a 58% service satisfaction rating, whereas those who file their tax return online give a 76% service satisfaction rating [14].

- **Promoting economic development:** Governments across Asia are focused on achieving high rates of economic growth to improve the quality of life for their citizens. This includes competing for direct investment by international companies that can create jobs in the domestic economy. In this context, many governments have created special incentives and economic zones to promote economic growth. Technology enables governments to create improved business climates by simplifying and streamlining relationships with businesses and by reducing the steps needed to comply with regulatory obligations. Technology can also be used for the government procurement of goods and services to promote economic development in the country. Through the use of e-procurement systems, governments can create wider competition and develop more participants in the public-sector marketplace.

- **Improving public administration:** In order to provide services and market regulation, governments maintain large internal systems for managing government finances, administering personnel and payroll functions, and buildings management and procurement functions. Through e-government, these administrative functions can be streamlined, costs reduced, and services and their efficiencies improved. Also, once these functions are computerized, improved data analysis and management controls can be employed. These improvements may include better management of expenditures and revenues, control of expenditure, improved talent management and human resources management, and improved audit.

- **Improving citizen participation and engagement:** E-government and e-governance increase the ability of governments to communicate with and consult with citizens and stakeholder groups using internet and mobile phone technologies. This may involve online surveys, online consultations, online citizen panels, feedback options on government internet sites, as well as e-voting. Thus, ICT can improve public-sector communication in two directions, i.e., from the government to citizens, and from citizens to the government.

In Canada, for example, all federal government policy consultations are posted online, allowing citizens to provide their inputs [15].

Likewise, in the Philippines, the Philippine Commission on Women uses Facebook and Twitter to communicate proposed legislative initiatives to citizens, and also to seek comments from Philippine women on their priorities for government policy action. For example, #BilangBabae is an online advocacy initiative of the Philippine Commission on Women for the National Women's Month Celebration. It aims to gather women netizen's perspectives on two things: the changes that they want to see relative to women's issues and concerns, and how they see themselves contributing to make these changes happen. The initiative used Facebook as a platform using the hashtags #BilangBabae and #PartnerForChange [16].

An excellent example of using the Internet to obtain citizen input is the New Zealand Government's 'Kiwis Count' program which uses the Internet for quarterly surveys of citizens to measure their satisfaction with a range of government services and to identify areas requiring improvement [17].

- **Improving government transparency and accountability:** One of the many important contributions of e-government is to improve the transparency of government decision-making processes by making information accessible. This involves publishing government debates and decisions online, providing live streaming of legislative debates via the internet, publishing performance and financial management data online, and providing transparency in government hiring and procurement decisions, as well as by making audit reports accessible to citizens.

- **Reducing corruption:** According to the UN, putting government services online reduces the opportunity for individuals in government to use their positions to exact bribes from citizens and businesses [18].

  According to the UN, "E-government reduces corruption in several ways. It takes away discretion, thereby curbing opportunities for arbitrary action which often results in corruption. It increases chances for exposure by maintaining detailed data on transactions making it possible to track and link the corrupt with their wrongful acts. By making rules simple and more transparent, e-government emboldens the citizens and businesses to question unreasonable rules and procedures. and their arbitrary applications."

- **Promoting ICT in the broader business and civil society:** One of the main benefits of an e-government initiative consists of the promotion of ICT usage in other sectors, such as the private and non-profit sectors. The technological and management capacities required for e-government administration encourage, in turn, the development of new training courses and modules in schools and universities to supply the required skills and capabilities to the market. For example, the Philippines now has one of the largest IT and business process outsourcing industry in the world, having generated an estimated USD25 billion in annual revenue in 2016.

  According to Wikipedia, "From 101,000 workers in 2004, the labor force in the industry has grown to over 930,000 in just the first quarter of 2014. Growth in the BPO industry continues to show significant improvements with an average annual expansion rate of 20%. Figures have shown that from $1.3 billion in 2004, export revenues from BPO has increased to over $13.1 billion in 2013. The IT and Business

Process Association of the Philippines (IBPAP) also projects that the sector will have an expected total revenue of $25 billion in 2016.This growth in the industry is promoted by the Philippine government. BPO is highlighted by the Philippines Development Plan as among the 10 high potential and priority development areas. To further entice investors, government programs include different incentives such as tax holidays, tax exemptions, and simplified export and import procedures." [19].

In other words, a government's own e-government knowledge and systems can inform the nation's broad economic development strategy, including the expansion of ICT training in colleges and universities to provide the necessary ICT skills for both public and private sectors.

In conclusion, e-government (and e-governance) has a wide range of applications in improving government performance, including better service delivery, improved productivity, and strengthened democratic processes, as well as the promotion of innovation and better national economic performance. It may be the most important tool we have in current times to simultaneously improve the many aspects of public-sector service and productivity, while also encouraging greater citizen engagement, trust, and confidence in public institutions. In the next unit, we will examine some of these relationships in more detail.

Unit Resources
See [10, 11, 30] under References.

Unit 3: The Three Modalities of E-government (G2C, G2B, and G2G)

According to the UN, in the implementation of e-government across the public sector, we can distinguish three types of relationships where ICT can improve government performance:

- Government to citizen (G2C) refers to the relationship between government and citizens. This can also be citizen to government (C2G).

- Government to business (G2B) involves the transactions between the government and private sector businesses.

- Government to government (G2G) refers to the relationship between different government units. A subset of G2G is government to employees (G2E). This involves the two-way transactions between government and the public service [20].

Government to citizen (and citizen to government): This involves the two-way relationship between government and citizens. Through e-government, G2C helps citizens to access government information and services instantly and conveniently from everywhere, through multiple channels, with ICT providing common and consistent databases across all channels (including in-person, telephone, and internet). As noted above, this is a two-way relationship, so it may also be described in some situations as C2G. In other words, e-government facilitates and improves two-way communication and transactions between governments and citizens.

In one direction, e-government enables public organizations to better inform citizens about policies, programs, and performances, as well as to provide better services. Better services include the development of one-stop service centers where citizens can obtain a wide variety of public-sector

services in one location. These centers and their online equivalents are facilitated by integrated ICT systems, which are essential components of service integration.

Another example is the use of G2C to provide important and timely information to citizens. A number of Asian countries are now using SMS messages to communicate with citizens about urgent matters such as natural disasters or weather emergencies. In the Philippines, which is prone to typhoon emergencies, the government passed a Free Mobile Disaster Alerts Act in 2014, requiring mobile phone companies to issue government-provided emergency information to subscribers in the threatened areas [21].

In the other direction of C2G, e-government allows citizens to have a greater say in public-sector decision making with respect to government policies and programs, as well as governance arrangements and service delivery improvements and budget allocation decisions. For example, the Government of Canada has experimented with online citizens panels that allow government departments to consult with a representative panel of citizens about everything from proposed new policies to the design of government websites. In the USA, the municipal sector uses online consultations to help allocate annual budgets among competing priorities [22].

RECENT DEVELOPMENTS IN WHOLE-OF-GOVERNMENT SERVICE DELIVERY

Whole-of-government service delivery, enabled by e-government technology, can offer people services from various public agencies bundled together as a single, joined-up service in a one-stop shop. For people, it means that interacting with public administration becomes much simpler. Achieving such an integrated approach to public service delivery depends on the following:

- The use of a common organizational and technical platform to ensure back-office integration, so that internal processes are coordinated and run smoothly together

- Robust interoperability (i.e., each system is compatible and works with other systems)

- An infrastructure that supports the use of electronic identity cards and signatures (some countries have successfully implemented such a service)

Source: United Nations E-Government Survey 2016.

Government to business (and business to government): This consists of two-way e-interactions between the government and the private sector. The opportunity to conduct online transactions with the government can reduce red tape and opportunity for corruption, and simplify and coordinate regulatory processes, thus helping businesses to become more competitive nationally and internationally. As with G2C transactions, this can be a two-way process. On one hand e-government tools enable governments to better communicate policies, regulations, and processes to the business sector, as well as to provide better services via the internet and mobile phone technologies. ICT also helps the government to provide one-stop services to businesses by making it easier for multiple departments and agencies to collaborate via one-stop service centers or via integrated one-stop websites and call centers. On the other hand, the e-government channel also allows businesses to better communicate and engage with government organizations with respect to proposed legislation and proposed policies, as well as to recommend specific services, regulatory improvements, and red-tape reductions.

Government to government: Governments often depend on multiple departments and levels to effectively deliver services and allocate responsibilities. In promoting citizen-centric service, a one-stop service (a single access point to government) is often the goal, for which cooperation between different governmental departments and agencies is necessary. The use of ICT for G2G transactions facilitates the sharing of databases, thus enhancing the efficiency and effectiveness of the integrated one-stop service systems.

G2G can be either horizontal or vertical in nature. Horizontal G2G involves collaboration among several government departments using e-government tools to enable the collaborative activity. An example would be the use of ICT to facilitate collaboration among government departments to provide one-stop business registration services online. In this case, several departments involved in business registration would collaborate via a one-stop website, call center and/or a one-stop office providing a range of services to businesses in one place. Examples include the Malaysian Investment Development Agency (MIDA) [23] and Singapore's BizFile initiative [24], where ICT systems provide the backbone for the provision of integrated one-stop services for businesses from several departments and agencies.

Vertical G2G refers to the use of ICT to facilitate intergovernmental collaboration and integrated service delivery collaboration by multiple levels of government. For example, in Canada, the Ontario211 one-stop service organization for health and social services provides a single point of access for citizens seeking a range of services provided by the three levels of government, as well as by the non-governmental social service and health organizations [25]. In this case, ICT provides the platform for both the collaborative one-stop call center and for the collaborative one-stop health and social services website. Without the e-government system supporting Ontario211, this type of service collaboration would not be possible. Citizens generally appreciate easy access and one-stop services and the clients of Ontario 211 give the service a satisfaction rating of 92%, which is an extraordinary achievement for a public-sector service.

In conclusion, we can see that there are several specific types of public-sector relationships (G2C, G2B, G2G, and G2E) where e-government can significantly improve public-sector performance.

G2C is a web portal allowing individuals to interact with local/central government. Examples of G2C services are online land records including archiving, property registration, and online record handling. G2C may also take the form of a one-stop online service allowing citizens to retrieve information such as tourism details or payment of income taxes online. Another type of G2C is e-democracy where elected representatives interact with citizens through e-voting.

G2B is also a web portal allowing commercial businesses to interact with local/central government.

G2E serves employees by automating workflow, tracking files, managing human resource, assets, and projects, and promoting e-learning.

Within these domains, either information is pushed down from the government to the outside constituents, or a two-way communication is initiated between outside constituents using online forums.

Also, e-governance provides

1. G2C (the opportunity to host one-stop-point services),

2. G2B (the opportunity to utilize better technology to reduce government's burden on businesses), and

3. G2G (the opportunity to facilitate better communication when reporting and partnering in projects).

Unit 4: Applying E-government at the Local and National Levels

To illustrate e-government and e-governance in practice, this module presents actual cases studies that demonstrate how local and national governments are using e-government tools and techniques to improve government performance, to achieve good governance, to promote economic development, and to strengthen citizen trust in public institutions.

Case Study 1: Implementing E-government in a City Government (Seoul, ROK)
This case study has been approved for use in the APO Manual [26].

The city of Seoul (see Figure 9.1), the Republic of Korea (ROK) has won numerous awards for its innovative approaches in using e-government and e-governance tools and techniques to improve service delivery, to promote citizen engagement, and to promote economic development:

Creating online services: In its efforts to become the top e-government of the world, the city of Seoul, ROK, has been investing in digital technologies in its public office, and has ranked 1st in the UN's eGovernance survey several years running. Seoul's journey started in 1999, when the metropolitan government appointed its first chief information officer. After that, the government implemented a series of e-government projects, most notably the creation of a single online portal for citizens, which brought together government web pages that had previously only existed in silos. By 2006, the government started pushing forward with its strategy of citizen-led smart governance with a range of e-government policies.

FIGURE 9.1

A TOP VIEW OF THE CITY OF SEOUL, ROK.

Citizen engagement through e-government: First was the creation of Oasis, an online public proposal system that collects citizens' ideas on issues affecting the city. Every month, a handful of suggestions are put forward to a board and the best ones are interpreted to form policies. Since its launch, 565 ideas from citizens have been reflected in policies, from the designated no-smoking zones around the city to the building of Sebit-seom, the world's first floating building that houses conferences, art galleries, and music concerts.

Developing the mobile channel: Once the smart phone technology took off in the city (90% of Seoul's citizens have smart phones), the government looked to exploit it to boost citizen engagement, creating its mVoting system. Similar to Oasis, the mVoting system is a communication platform where policies can be shared with citizens. With 813 voting agendas, around 70,000 citizens participate in voting via an app. To support this, the government has created 3,590 free public Wi-Fi spots across the city.

Developing data analysis: Meanwhile, Seoul's government has been bolstering the use of big data to improve the efficiency of public services. For instance, it is working with telecommunications group KT to analyze traffic and phone data to identify popular bus routes. By looking at the locations of calls made between midnight and 5 am, as well as the patterns of the floating population, the government was able to identify which routes were used the most. This allowed it to optimize a number of late-night bus routes across the city, now used by 7,000 citizens every day.

Promoting citizen-driven innovation: The government also wants to encourage citizens and businesses to innovate. A recent report from consultancy company McKinsey estimated that better use of open data across just seven industries could generate an additional USD3 trillion to the world economy every year. To harness this potential, the Seoul metropolitan government created an Open Data Plaza, a publicly available online repository that holds more than 4,000 datasets across 10 different categories. The aim is to encourage citizens to develop the services they really need. And the idea seems to have worked, with the online repository being accessed around 670,000 times a day.

Embracing the internet of things: In its vision to becoming the world-leading digital city by 2020, the Seoul metropolitan government has been investing in internet of things technologies around its communities, which it hopes will help improve transportation, safety, and tourism across the city. Take the traditional Korean village of Bukchon, which attracts more than 85,000 visitors a month. The village's popularity causes significant inconveniences for locals, with increased littering, parking, and noise pollution. In response, the government invited 30 tech startups to pilot IoT sensor technologies around the area. And the idea worked: take the integrated parking information system, which allows citizens to know the location of parking lots and real-time parking information through smartphone applications, helping reduce congestion around popular areas of the city. Building on the success of these projects, the government is planning on rolling out IoT infrastructure to 99 more locations across the city by 2020.

Promoting economic development: Seoul sees this rollout as a crucial part of its Digital 2020 plan, and it is being driven by the foundation of specialized IoT academies and hackathons. The government hopes it will help foster 615 more startups across the city. Discussing the Digital 2020 plan, Seoul Mayor Park Won-soon recently said that, soon, through better use of digital technologies, citizens (the beneficiaries of public digital services) would establish most policies. "Plus, through a new digital industry, our city will create jobs, which will stimulate the economy, and solve various

urban problems," he said. Seoul's rapid urbanization and development over the past 50 years brought with it a myriad of socioeconomic problems, which have put significant strain on public services. These pressures are sure to increase with further economic development. It is only through innovative e-government solutions like these that Seoul will be able to maintain its global competitiveness as one of the world's leading smart cities.

Case Study Questions
- Which e-government tools has Seoul used to improve city government services to citizens and businesses?

- What are some of the objectives of Seoul's e-government strategy?

- How has Seoul used e-government tools to increase the empowerment and participation of citizens in decision making?

- How has Seoul used e-government tools to promote innovation in the public sector?

- How has Seoul used the mobile phone channel to improve services and better connect the government and the citizens?

- What is open data and how has the Seoul city government used it to promote citizen-driven innovation?

- What is internet of things and how has Seoul used the technology to overcome urban problems?

- How has Seoul used ICT to promote economic development?

Case Study 2: Singapore's E-government Strategy

Introduction

Along with the ROK, Singapore has consistently ranked as the number one country in Asia (and among APO member countries) for its success in implementing e-government. In 2016, it was ranked fourth in the world and first in Asia in e-government world rankings.

The source of this case study is Ministry of Finance of Singapore [27].

Singapore's E-government Vision and Strategy

Vision: "To be a Collaborative Government that Co-creates and Connects with Our People." Singapore eGov2015 was about building an interactive environment where the government, the private sector, and the people work together seamlessly, through the enabling power of e-government technologies. The vision of a collaborative government was designed to be achieved through three strategic thrusts (see Figure 9.2):

- Cocreating for greater value

- Connecting for active participation

- Catalyzing whole-of-government transformation

FIGURE 9.2

THE THREE STRATEGIC THRUSTS OF SINGAPORE'S E-GOVERNMENT.

For greater value
Customers are empowered
to cocreate new e-service
with the government

For active participation
Citizens are informed and involved
to engage government
on national policies

Co-creating

Connecting

**Collaborative
government**

Catalyzing

Whole-of-government transformation
Whole-of-government collaboration is enhanced through
innovative and sustainable technologies

Cocreating for Greater Value

Today in Singapore, citizens and businesses can access more than 1,600 online services and more than 300 mobile services provided by the government. Besides continuing to improve the diversity and quality of public services, the focus of eGov2015 was to empower citizens and businesses to cocreate new e-services with the government:

Government as a service provider: Recognizing the internet as an important channel for the direct delivery of information and services to the public, the government aims to continue to improve the information and services delivered through government websites. The Singapore Website Transformation Strategy seeks to provide customers with a seamless and integrated web experience across all government websites, while developing standards, common tools, and capabilities to support government agencies in improving their websites.

Building on the high smart phone usage in Singapore, the government is also driving the next phase of the mobile government (MGov) program to deploy better and more innovative mobile services. Customers will experience an improved mobile experience while accessing information from, and transacting with, the government on the move.

With the desire to improve e-service delivery, the government is constantly exploring the creation of useful e-services, including personalized e-services offered at the whole-of-government level. Toward this end, the government is deploying a one-stop trusted platform called OneInbox for the delivery of government electronic correspondences to individuals and subsequently, to businesses.

Government as a platform provider: With the rising popularity of social networking, the Singapore Government can more easily tap into the collective intelligence of the crowd. As such, the government can go beyond its traditional role as a service provider, to also serve as a platform

provider to encourage greater cocreation of new e-services. For instance, members of the public will be able to readily look for and download publicly available government data from data.gov.sg, which can be used for research purposes, as well as to encourage the development of innovative and high impact applications.

Connecting for Active Participation

E-citizen engagement: Today, more and more Singaporeans are logged onto the internet, with faster broadband connections and increased smart phone usage. Singaporeans are also increasingly going online to express their personal views on many issues. Popular social media platforms include Facebook, Twitter, and YouTube as well as blogs and discussion forums.

The eGov2015 Masterplan builds on the iGov2010 efforts in raising awareness and engaging the citizens in the policy-making process. The government aims to widen and deepen the e-engagement efforts and experiment with new ways to tap into the wisdom and resources of citizens.

Consulting the public: Public consultation is a critical tool that government agencies can leverage when shaping public policies or developing new initiatives and schemes.

Since the formation of the Feedback Unit in 1985, the government has consulted extensively with the public. In 2010 alone, on an average two to four public consultation exercises were launched every month. Under eGov2015, the focus continues to be on raising the awareness of government's e-engagement efforts by keeping citizens informed and linking up citizens who are keen to provide views on the formulation of public policies with government agencies.

The Reaching Everyone for Active Citizenry@Home (REACH) portal is being further enhanced as the official channel for news and updates on all government consultation exercises. New features, such as alerts on new e-consultation exercises for citizens via social media channels and mobile applications will be introduced. To encourage participation, simpler ways for citizens to provide feedback (e.g., via quick polls) will also be considered. Guidance to government agencies will also be provided to facilitate the adoption of best practices in e-consultation exercises.

Inviting ideas from the public: Beyond public consultation exercises, the government will also look at new ways of engaging citizens and tapping on their views and ideas. New platforms for engaging citizens, such as crowd sourcing tools, will be explored for inviting ideas and initiatives that will contribute towards a better Singapore. Crowdsourcing tools could be used to engage citizens in areas such as enhancing community relations and improving neighborhood amenities.

Catalyzing Whole-of-government Transformation

At the heart of a collaborative government is an effective and innovative workforce operating in an environment that supports interagency collaboration empowered by ICT. To achieve this, the government will build on the foundation established by past e-government efforts to transform the public-sector ICT infrastructure, services, and capabilities:

Transforming public-sector infrastructure and services: To keep pace with new technological developments, the Singapore Government has designed the next-generation whole-of-government infrastructure to enhance cross-agency collaboration. This will harness Singapore's high-speed Next Generation Nationwide Broadband Network, and leverage cloud computing and energy-efficient technologies.

The government has invested in a government private cloud (G-Cloud) to provide a strong and secure ICT environment, where government agencies may purchase computing resources on demand and pay based on actual usage, allowing them to flexibly scale up or downsize operations, based on changing needs. This will change the way government agencies design, develop, and deploy applications and services in future.

To ensure continued alignment of ICT to business goals and strategies, a central Singapore Government Enterprise Architecture repository provides an aggregated view of government data, applications, and technologies. This helps identify potential new shared services and possible cross-agency integration, while increasing data sharing opportunities. In transforming its ICT infrastructure, the government recognizes that ICT is a large energy consumer and one of the contributors of carbon emissions. To signal the Singapore Government's commitment towards international sustainable development goals, government agencies are encouraged to incorporate sustainability planning and adopt sustainable ICT practices.

Transforming public-sector workplace and capabilities: The public-sector workplace will also be transformed to promote closer collaboration and improve productivity. Public officers will be empowered to proactively share knowledge, and work smarter and faster together, across agencies, to serve customers better. A key capability that the government will develop is in business analytics.

With the growing volume of digital data collected through computerization over the years, equipping public officers with the right tools and competencies in business analytics will allow them to generate intelligent insights to enhance agencies' performance and improve service delivery and policy formulation.

To support an increasingly sophisticated workforce, a blueprint for the future ICT workplace is being developed to spearhead governmentwide adoption of innovative workplace technologies, analytics-enabled processes, and automated solutions.

Examples of E-government Service Initiatives in Singapore

Singapore was an early pioneer in putting government services to citizens (G2C) and government services to businesses (G2B) online, as well as using ICT within government to streamline internal operations among departments and services to employees (G2G and G2E).

Like other governments, one of Singapore's early initiatives was to create a whole-of-government web portal, now called 'E-Citizen,' where citizens and businesses can obtain a wide range of government information and undertake transactional services online 24/7 (see Figure 9.3).

This one-stop e-citizen portal is linked to a second government portal, www.gov.sg, which is designed to provide information about the activities of the government itself (see Figure 9.4).

Singapore's Citizen Connect Centers

The Singapore Government has established a network of over 25 one-stop citizen connect centers across the city (see Figure 9.5), where citizens who don't have computers or don't know how to use them can get help connecting to government services online.

Citizens and visitors can seek help from the officer at the citizen connect center if they do not know how to transact with or find government services and information online. At a citizen connect

FIGURE 9.3

SINGAPORE'S WHOLE-OF-GOVERNMENT WEB PORTAL.

FIGURE 9.4

THE PORTAL PROVIDES INFORMATION ABOUT THE ACTIVITIES OF THE GOVERNMENT ITSELF.

center, citizens can get help to perform the following online transaction with the government and some non-government agencies:

- Apply for employment pass and work permit.

- Register for new business or renewal of business registration.

- Apply or renew season parking tickets.

- Pay traffic police vehicle fines.

- Apply or reset SingPass.

- Register and pay for community center/club courses and activities.

- Book Singapore Sports Council sport facilities.

- Other online services and information.

FIGURE 9.5

SINGAPORE'S CITIZEN CONNECT CENTERS.

Singapore's One-stop Online Business Registration: BizFile

The Accounting and Corporate Regulatory Authority (ACRA) is the national regulator of business entities, public accountants, and corporate service providers in Singapore [28]. ACRA also facilitates the development of business entities through its online BizFile e-government application.

BizFile is ACRA's online filing and information retrieval system (see Figure 9.6). It offers more than 400 e-services and serves as a one-stop facilitator for businesses.

Singapore usually ranks near the top of the international competitiveness rankings and recently ranked number two in the World Bank's Ease of Doing Business rankings, also because of the efficiency of government service and regulation in Singapore, which in turn is driven in part by its G2B e-government initiatives for businesses [29].

FIGURE 9.6

THE BIZFILE ONLINE FILING AND INFORMATION RETRIEVAL SYSTEM.
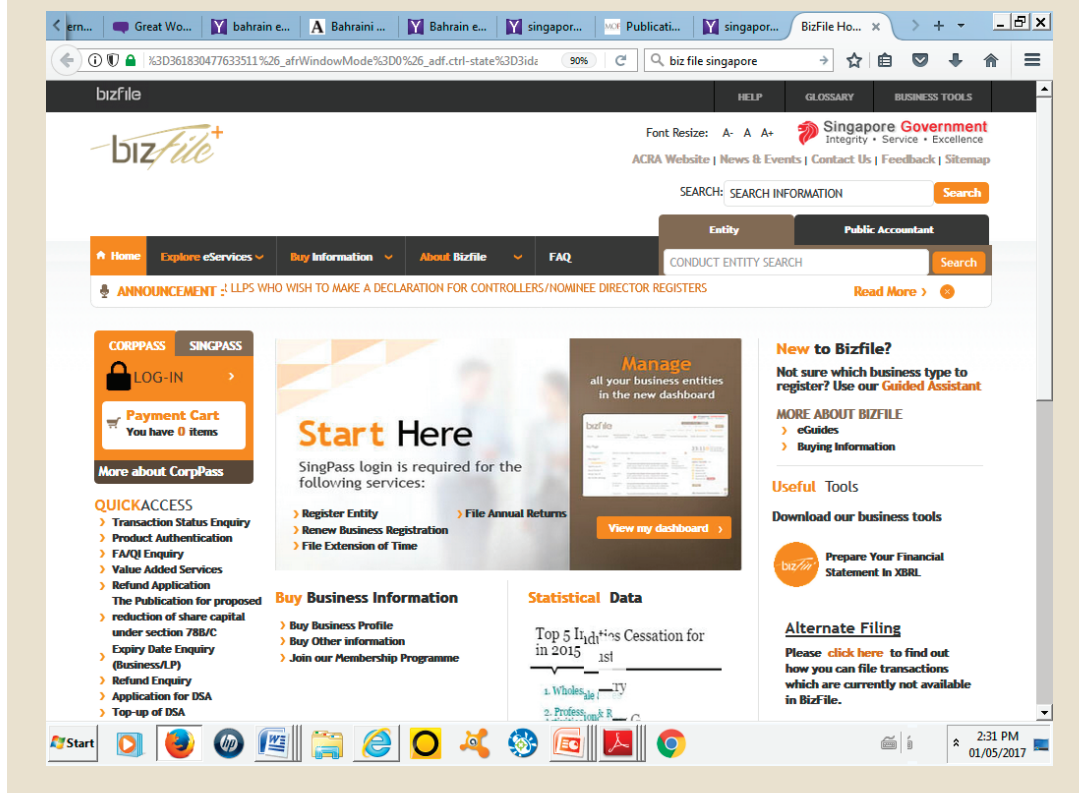
Through BizFile, it is possible to register a new business online in one or two days, whereas in many countries it takes several weeks to accomplish.

Conclusion

Singapore has maintained its position as a global leader in e-government for almost two decades through a comprehensive implementations strategy that has improved government services to citizens and businesses while making the government more efficient, more consultative, and more connected to citizens.

Case Study Questions

- Which e-government tools has the Government of Singapore used to improve government services to citizens and businesses?

- What are the three strategic thrusts of Singapore's e-government strategy?

- How has the Government of Singapore used e-government tools to increase the participation of citizens?

- How has Singapore used ICT to make it easier to start a business in Singapore?

- How has Singapore used the citizen connect centers to overcome the digital divide for those citizens who are not computer literate?

Unit 5: Implementing E-government in a Global Perspective

In the previous unit, we made reference to the international e-government rankings conducted by the UN. This unit will examine the rankings as well as some more of the best-practice countries in both e-government and e-participation.

Every two years, the UN publishes a report on progress in implementing e-government throughout the world and ranks countries by their stages of e-government development. The E-Government Survey (see Figure 9.7) documents the trends in the development of e-government in countries across the globe [10]. In the earlier, 2016 UN E-Government Report [9], the trends were identified as follows:

FIGURE 9.7

THE UN E-GOVERNMENT SURVEY REPORT.

- "There has been a sharp rise in the number of countries that are using e-government to provide public services online through one-stop platforms – an approach that makes it easier to access public services. In 2003, only 45 countries had a one-stop-platform, and only 33 countries provided online transactions. According to the 2016 Survey, 90 countries now offer one or more single entry portal on public information or online services, or both, and 148 countries provide at least one form of online transactional services."

- "More countries are making an effort through e-government to ensure that public institutions are more inclusive, effective, accountable and transparent. Many governments across the globe are opening up their data for public information and scrutiny. The 2016 Survey shows that 128 countries now provide datasets on government spending in machine readable formats."

- "Enabled by the easy access to social media, an increasing number of countries are moving towards participatory decision-making. While developed countries, especially European countries, are among the top 50 performers, many developing countries – especially lower-middle income countries – are making good progress. Enhanced e-participation can support the realization of the SDGs by enabling more participatory decision making."

- "There have been increased efforts to utilize advanced electronic and mobile services for the benefit of all. Fixed and wireless broadband subscriptions have increased unevenly across regions, with Europe leading and coming closer to market maturation, while Africa is still lagging behind. The overall availability of broadband has increased, but substantial regional disparities and a growing divide persist. All countries agreed, in SDG 9, that a major effort is required to ensure universal access to internet in the least developed countries."

With respect to the use of e-government tools for policy and service, there is a strong trend towards the use of ICT to facilitate one-stop service [8], as noted in the previous unit:

One-stop service: "A new trend in e-government has been the evolution towards the provision of integrated public services online through, among others, one-stop platforms allowing to access a range of public services. This approach makes it easier for people to interact with public administration and get adequate and holistic responses to their queries and needs. Progress is being made towards delivering public services in such an integrated way. For example, 98 countries require a digital ID for online and mobile public services. Efforts are being made to ensure privacy and security of personal data. But challenges remain. Some relate to the technical difficulties associated with ensuring interoperability of systems. Proliferation of technologies, while positive, makes it difficult to provide integrated e-health services. It also remains difficult to ensure integration of services across sectors." [8]

Policy integration: Along with integrated services, e-government may increasingly support policy integration and encourage the efforts of various government institutions to work more closely together. It can provide governments with increased insights to help revisit existing decision-making processes and workflows. Although there are examples of successful integration of policies within the social area, integrating policies and services across the economic, social, and environmental areas remains difficult.

Challenges: Efforts to promote whole-of-government service delivery and policies have to be accompanied with efforts to ensure that organizational cultures, coordination mechanisms, and financial and accountability systems support collaboration among public institutions.

International E-government Performance Rankings by Country

As Table 9.1 shows, Singapore, the ROK, and Japan are currently the Asian leaders in e-government [8]. In the 2016 UN Global Rankings, the top APO member countries were: Singapore, the ROK, and Japan. In the global rankings, the ROK and Singapore ranked number three and number four, respectively, while Japan was ranked number eleven in the world. Thus, three APO member countries are among the world leaders for implementing e-government across their public sectors. This suggests that there are many e-government best practice examples in APO member countries, as we saw with the case study of Seoul, ROK, in an earlier unit.

E-participation and the UN E-participation Index

Jayashree [6] notes: "While e-government is defined as a mere delivery of government services and information to the public using electronic means, e-governance allows citizen direct participation of constituents in political activities going beyond government and includes E-democracy, E-voting and participating political activity online. So, most broadly, concept of E-governance will cover government, citizens' participation, political parties and organizations, Parliament and Judiciary functions."

TABLE 9.1

TOP 10 COUNTRIES FOR E-GOVERNMENT IN ASIA.

Country	Region	Sub-region	OSI	HCI	TII	EGDI	EGDI level	2016 rank
ROK	Asia	Eastern Asia	0.9420	0.8795	0.8530	0.8915	Very high	3
Singapore	Asia	South-Eastern Asia	0.9710	0.8360	0.8414	0.8828	Very high	4
Japan	Asia	Eastern Asia	0.8768	0.8274	0.8277	0.8440	Very high	11
Israel	Asia	Western Asia	0.8623	0.8619	0.6175	0.7806	Very high	20
Bahrain	Asia	Western Asia	0.8261	0.7178	0.7762	0.7734	Very high	24
UAE	Asia	Western Asia	0.8913	0.6752	0.6881	0.7515	Very high	29
Kazakhstan	Asia	Central Asia	0.7681	0.8401	0.5668	0.7250	High	33
Kuwait	Asia	Western Asia	0.6522	0.7287	0.7430	0.7080	High	40
Saudi Arabia	Asia	Western Asia	0.6739	0.7995	0.5733	0.6822	High	44
Qatar	Asia	Western Asia	0.6739	0.7317	0.6041	0.6699	High	48

According to the 2016 UN Report on E-Government, new technologies are being used in many countries to enable e-participation in decision making and to strengthen democratic processes in a number of countries [8]:

> "E-participation is expanding all over the world. With growing access to social media, an increasing number of countries now proactively use networking opportunities to engage with people and evolve towards participatory decision-making. This is done through open data, online consultations and multiple ICT-related channels. While developed countries, especially European countries, are among the top 50 performers, many developing countries are making good progress as well; especially lower-middle income countries."

> "A growing number of e-participation applications and tools are put in place in various sectors with the objective of responding to the needs of various communities. This can contribute to the development of new forms of collaborative partnerships between government bodies and people and reinforces the focus on people's needs. The largest share of these initiatives relates to the central government and local authorities giving access to public-sector information and public consultation via e-tools. But there has been a growing focus on mobilizing contributions to policy-making, even though progress has been modest so far. Making progress in participatory and democratic decision-making will increasingly be the criteria against which the success of e-participation will be assessed."

The UN E-Participation Index (EPI) is a supplementary index to the UN E-Government Survey. It extends the dimension of the survey by focusing on the use of online services to facilitate provision of information by governments to citizens (e-information sharing), interaction with stakeholders (e-consultation), and engagement in decision-making processes (e-decision making).

The UN's E-participation Framework
- E-information: Enable participation by providing citizens with public information and access to information without or on demand.

- E-consultation: Engage citizens in contributions to and deliberation on public policies and services.

- E-decision-making: Empower citizens through codesign of policy option and coproduction of service components and delivery modalities.

Conclusion

The UN measures of national performance in both e-government and in e-governance provide a reliable indicator of how well governments are using ICT to improve government performance and to strengthen democratic processes. The UN Rankings also provide helpful information on the global and regional leaders in applying e-government tools and strategies, thus identifying best practices that can be adapted in other countries at a similar stage of development.

Exercises

1. Where does your country rank globally in the most recent UN rankings? What is your country's most recent ranking in Asia?

2. Is your country improving its ranking, maintaining it, or seeing a decline in its ranking in recent years?

3. What are the areas of e-government that need most improvement in the UN ranking system?

4. How well is your country performing on the E-participation Index? What could it do to improve its ranking?

5. Which countries could be e-government benchmarking models for your own country?

Unit Resources

See [6, 9, 10] under References.

Unit 6: E-government Maturity Models

> *"e-government cannot be thought of as a one-step process or implemented as a single project. It is evolutionary in nature, involving multiple stages or phases of development."*
>
> *The United Nations Public Administration* Network

According to studies by the UN and by academic experts, the implementation of e-government can be seen as passing though several distinct stages on the way to e-government maturity. Many countries begin with the creation of government websites and e-mail systems, then move on to the online delivery of transactional government services, then to one-stop integrated services, and perhaps then to promoting e-participation, as we saw in the Unit 4 case studies.

Such models that outline the various stages of e-government and e-governance can provide useful frameworks for government managers developing e-government strategies and for assessing where a country or a public organization is along the road towards the full development and application of e-government tools and strategies (e-government maturity).

E-government Maturity Models and their Characteristics

Over the past two decades, several e-government maturity models [3, 5] have been proposed by academics and international management consultants. Perhaps the earliest e-government maturity model to appear in the academic literature was Layne and Lee's four-stage model [7], as shown in Figure 9.8:

1. **Catalog stage:** This stage delivers some basic information about government and government services through websites.

2. **Transaction stage:** This stage enables citizens to do some simple online transactions such as filling out and submitting government forms.

3. **Vertical integration stage:** This stage initiates the transformation of government services rather than automating its existing processes. It focuses on integrating government functions at different levels, such as those of local governments and state governments.

4. **Horizontal integration stage:** This fourth stage focuses on integrating different functions from separate systems so as to provide internal and external users a unified and seamless service.

FIGURE 9.8

LAYNE AND LEE'S FOUR-STAGE MODEL OF E-GOVERNMENT.
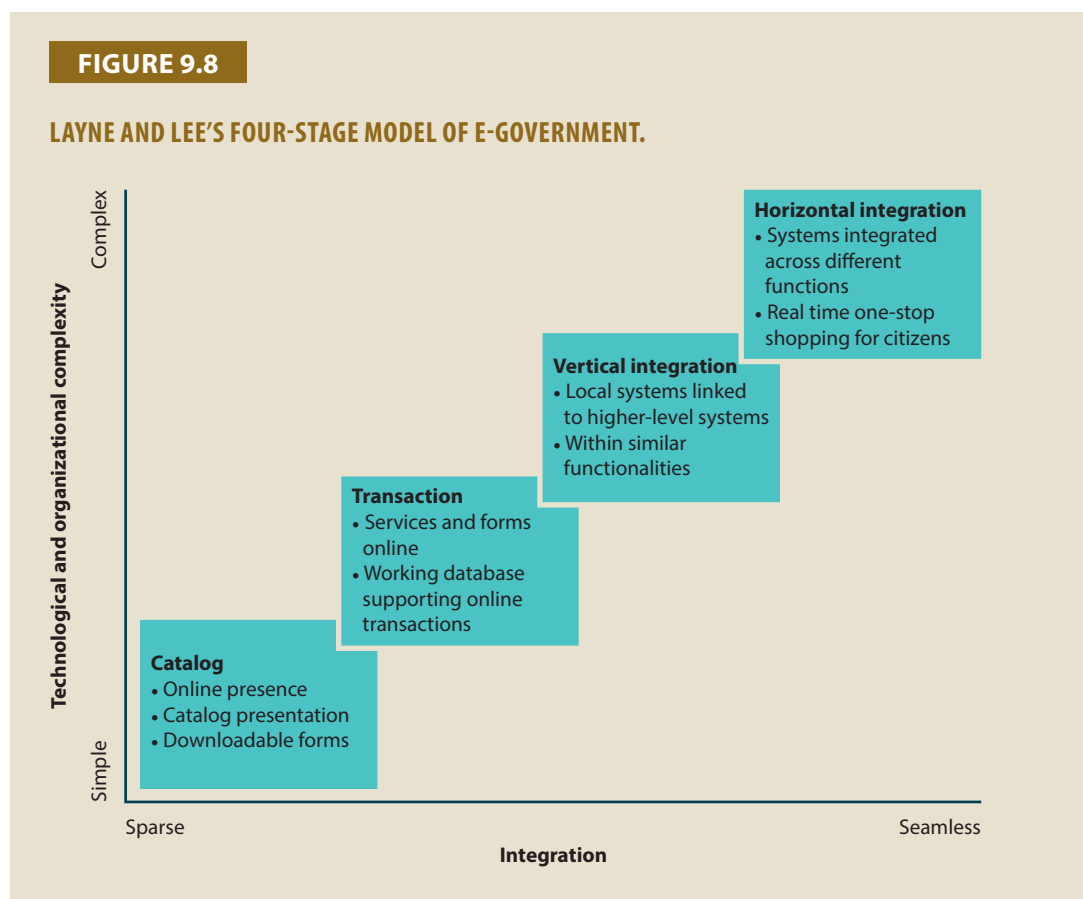
Building on the Layne and Lee Model, in 2006, Andersen and Henriksen [2] proposed a more citizen-centric evolution of e-government (see Figure 9.9), as opposed to Layne and Lee's techno-centric perspective.

In the Andersen model, e-government should be based on the needs of the customer, not on the technology. This citizen-centric approach to e-government, building on the concept that technology should serve the needs of the citizen, has become the dominant model in the public-sector literature in recent years.

FIGURE 9.9

THE ANDERSEN AND HENDRICKSEN MODEL.

Phase IV: Revolution
Data mobility across organizations
Application mobility across vendors
Ownership to data transffered to customers

Phase III: Maturity
Abandoning of internet
Accountability + transparent processes
Personalized web-interface for customer processes

Phase II: Extension
Extensive use of internet
Personalized Web-interface for customer processes

Phase I: Cultivation
Horizontal and vertical integration within government
Front-end system
Adoption and use of Internet

Customer-centric — General, widely applied / Exception, sparse

Activity-centric applications — Few, rare / Widely applied

Source: Andersen and Hendricksen [2].

Another important e-government maturity model, developed by Moon in 2002 involved five stages, including an added e-governance dimension called political participation. Thus, it captures both e-government and e-governance [8]:

- **Simple information dissemination (one-way communication):** This is the most basic form of e-government, which disseminates information by simply posting it on the websites.

- **Two-way communication (request and response):** Interaction occurs between governments and users. This is also known as the synchronous and asynchronous communication theme.

- **Service and financial transaction:** Transactions occur both between governments and individuals (e.g., obtaining visa) and between governments and businesses (e.g., ordering office facilities).

- **Vertical and horizontal integration:** This stage refers to integrating separate systems at different levels (vertical) and from different departments (horizontal).

- **Political participation:** Promotion of political participation through services such as online voting and surveys.

The Integrated E-government Evolution Model

In 2010, after a review of the various models developed during 2001–06, Jayashree and Marthandan [6] proposed an integrated model of e-government evolution and maturity. Their model comprises five stages, culminating into the development of the 'e-society,' where both personal and citizen-government interactions are electronic, and lead to efficient, effective, and flexible government. The five stages in the Jayashree–Marthandan Integrated Model (see Figure 9.10) are as follows:

Web presence: The government marks its presence by offering information to citizens, which was hitherto available only at the designated places and at designated times. However, the citizens are not empowered to respond to the government at this stage. They are considered as mere information consumers at this stage.

Interaction: From the static stage, the government enters into the dynamic stage. Simple interaction between the government and the citizen starts at this stage. From being a mere consumer of information, the citizen is now able to respond to government actions and reactions.

Transaction: At this stage, users are matured enough to transact with the government in the form of paying taxes and duties, filing of returns, obtaining licenses, etc. The security and privacy part of the government and citizens are taken care of at this stage.

Integration: This stage involves both internal and external integration. For external interfaces, governments build a single and unified portal providing integrated and seamless services instead of separate and distributed services. To achieve this aim, governments should initiate an internal integration to reengineer existing processes by reducing bottlenecks and intermediaries.

E-society: The integration process, when it is reaching its maturity, leads to the emergence of an e-society. The e-society can be broadly defined as one that uses digital media in most relationships: peer to peer (personal communications, business to business purchases, etc.); government to other

FIGURE 9.10

THE JAYASHREE–MARTHANDAN INTEGRATED MODEL OF E-GOVERNMENT EVOLUTION.

Source: Jayashree and Marthandan [6].
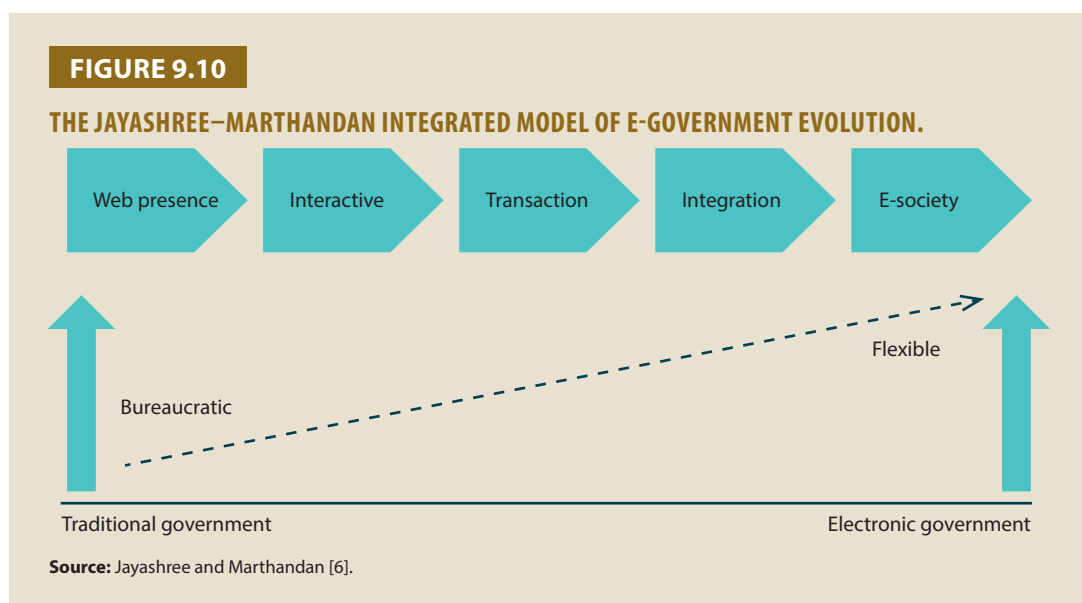
(government online); other to government (voting, governance); and peer to other (business to consumer, etc.). Electronic government is very flexible when compared to the traditional government which is highly bureaucratic in nature and leads to undue delays. So, e-society would be ideal for people with better ways provided by e-government with the use of ICT in public administration, combined with organizational changes and new skills that help improve the public services and democratic processes.

In the Jayashree–Marthandan Model, the ultimate e-society may include e-business, e-health services, e-payments, e-procurement, e-education, e-banking, e-democracy, e-parliament, e-ministries, e-billing, etc. E-business is the processes that deal with the relationship between governments, markets, and the private sector. E-citizens define the relationship between governments and citizens and also the relationship between countries and International institutions. Broadly speaking, transformation initiatives actually contribute to good governance. They go beyond G2C and even C2G interactions and they also encompass C2C vis-à-vis their governments and the governance processes. In this vision of the future of e-government, both e-government and e-governance merge into a wider concept of the e-society, where both person-to-person and citizen-government interactions are conducted electronically.

Stages of Digital Maturity within Individual Public Organizations

"Digital maturity refers to the extent to which digital technologies have transformed an organization's processes, talent engagement, and citizen service models.... governments are at very different stages in their journey of digital transformation. A small percentage are what we consider "maturing," but the overwhelming majority are still in the early or developing stages of this journey."
Deloitte: The Journey to Government's Digital Transformation, 2015

In the UN e-government reports that we examined earlier in this module [9, 10], the focus of the analysis was on the implementation strategies of national governments like Singapore and the ROK. But for many public managers, the challenge of implementing e-government is to apply e-government and e-governance tools within their own organizations or within their own part of a public organization. So, in this section, we will look at e-government maturity more from the perspective of individual public-sector organizations. In this context, the international management consulting company Deloitte has conducted regular global surveys of e-government implementation for many years and has identified three levels of digital maturity (see Figure 9.11).

Through interviews with public managers from around the globe, Deloitte [4] identified five important factors that drive the successful implementation of e-government initiatives. These are, strategy, leadership. workforce development, user focus, and culture. They also grouped public-sector organizations into three stages of digital maturity (see Figure 9.12):

1. Early

2. Developing

3. Maturing

According to the Deloitte Global Survey, most public-sector organizations are in the early and developing categories, so they still have considerable progress to achieve in applying ICT to improve organizational productivity and performance.

FIGURE 9.11

THE DELOITTE MODEL OF E-GOVERNMENT MATURITY IN INDIVIDUAL ORGANIZATIONS.

	Early	Developing	Maturing
Strategy	Aimed at cost reduction	Aimed at improving customers experience and decision making	Aimed at fundamental transformation of processes
Leadership	Lacks awareness and skills	Digitally aware	Digitally sophisticated
Workforce development	Insufficient investment	Moderate investment	Adequate investment
User focus	Absent	Gaining traction	"Central" to digital transformation
Culture	Risk averse, disintegrated	Risk tolerant accommodates innovation and collaboration	Risk receptive, fosters innovation and collaboration

FIGURE 9.12

THREE STAGES OF DIGITAL MATURITY OF ORGANIZATIONS.

26%	60%	13%
Early	Developing	Maturing
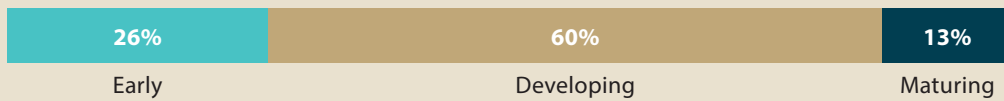
Source: Deloitte [4].

Performance Driver 1: Digital Strategy

The study concluded that in stage one of strategy, public organizations focus on efficiency gains, while in the second stage they focus on improving customer service (see Figure 9.13). In the maturing phase, organizations use ICT to transform the organization's way of doing business. Transformation can include transformation of core processes and/or transformation of the entire service/program delivery model.

FIGURE 9.13

STAGE-WISE DEVELOPMENT OF PERFORMANCE.

Efficiency → Customer experience → Process transformation
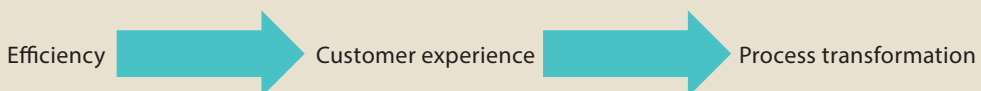
Source: Deloitte [4].

Performance Driver 2: Leadership

Effective leadership of e-government implementation has two components: the level of knowledge of the leaders about digital technology and trends; and the level of skills of the leaders in being able to effectively lead the organization's digital strategy.

Performance Driver 3: Workforce Skills Development

When implementing e-government strategies, typically the staff will be asked to adopt new technologies to improve efficiency and customer service. Without appropriate skills training in the use of new technologies, employees and managers will be unable to effectively master the new systems and processes. So systematic skills training is essential to a successful adoption of new ICT systems for the improvement of organizational performance.

Performance Driver 4: Citizen/Customer Focus

Organizations at a mature level of digital transformation indicate that their efforts are driven by the demand from citizens for e-services and e-consultation, and there is a strong organizational focus on responding to citizens' needs and expectations through the use of technology.

Performance Driver 5: Building a Culture of Innovation and Collaboration

Traditional bureaucratic and silo-based cultures transform into innovative and collaborative organizational cultures as the organization progresses towards digital maturity.

> *"Digitally mature organizations are characterized by a culture that favors digital transformation. The nurture innovation, foster collaborative work environments, and are more adept at taking risks."*
>
> Deloitte [4]

Attention by public managers to these five key aspects of e-government implementation can accelerate an organization's progress towards 'digital maturity' and reap maximum benefits from the technology to improve organizational performance.

Exercises

1. Using the Jayashree–Marthandan Model of E-Government, what has your government or your organization done to apply e-government tools at each of the five stages in the evolution towards the e-society? Which of the five stages need most attention and improvement at present?

2. Using the Deloitte Digital Maturity Model, assess your own organization's current stage of digital maturity along the five key dimensions. Which of the five strategic drivers needs most improvement in your organization?

References

[1] Almarabeh T., Ali A.A. A General Framework for E-Government: Definition, Maturity Challenges, Opportunities, and Success. European Journal of Scientific Research 2010; vol. 39, No. 1: 29–42 pp.

[2] Andersen K.N., Henriksen H. e-Government Maturity Models: Extension of the Layne and Lee Model. Government Information Quarterly December 2006; 23(2): 236–48.

https://www.researchgate.net/publication/222658012_e-Government_Maturity_Models_
Extension_of_the_Layne_and_Lee_Model.

[3]   Baum C., Di Maio A. Gartner's four phases of e-government model. 2000;
        http://www.gartner.com/DisplayDocument?id=317292.

[4]   Deloitte. The Journey to Government's Digital Transformation. Deloitte Insights; 2015.
        https://dupress.deloitte.com/dup-us-en/topics/digital-transformation/digital-transformation-
        in-government-summary.html.

[5]   Abdoullah F.-A. E-Government maturity Models, E-Government Maturity Models: A
        Comparative Study. International Journal of Software Engineering and Applications 2014; vol. 5.

[6]   Jayashree S., Marthandan G. Government to E-government to E-society. Journal of Applied
        Sciences 2010; 10: 2205–10.

[7]   Layne K., Lee J. Developing fully functional E-government: A four stage model, Government
        Information Quarterly, Volume 18, Issue 2, Summer 2001, Pages 122–136

[8]   Moon M.J. 2002. The evolution of E-government among municipalities: Rhetoric or reality.
        Public Administration Review, 62: 424–33.

[9]   United Nations. United Nations E-Government Survey 2016. New York: UN; 2016.
        https://publicadministration.un.org/egovkb/en-us/Reports/UN-E-Government-Survey-2016

[10]   United Nations. United Nations E-Government Survey 2018. New York: UN; 2018.
        https://publicadministration.un.org/egovkb/en-us/Reports/UN-E-Government-Survey-2018.

[11]   World Bank. https://www.worldbank.org/en/topic/digitaldevelopment/brief/digital-
        government-for-development.

[12]   UNESCO. http://portal.unesco.org/ci/en/ev.php.

[13]   https://www.academia.edu/1553405/Bahraini_Government_and_the_e-Government_
        Initiative_an_Assessment

[14]   ACSI. American Customer Satisfaction Index surveys of US Federal Government service.
        http://www.theacsi.org/index.php?option=com_content&view=article&id=563&Itemid=1026.

[15]   Government of Canada. https://www1.canada.ca/consultingcanadians/.

[16]   Philippine Commission on Women. http://www.pcw.gov.ph/event/bilangbabae-online-
        advocacy-initiative.

[17]   State Services Commissioner, NZ. http://www.ssc.govt.nz/kiwis-count.

[18]   United Nations Public Administration Network. unpan1.un.org/intradoc/groups/public/
        documents/unpan/unpan:035963.pdf.

[19]   Wikipedia. https://en.wikipedia.org/wiki/Business_process_outsourcing_in_the_Philippines

[20]   UN. unpan1.un.org/intradoc/groups/public/documents/apcity/unpan045348.pdf.

[21]   http://www.gov.ph/2014/06/20/republic-act-no-10639

[22]   UN. https://publicadministration.un.org/egovkb/en-us/Reports/UN-E-Government-Survey-2016.

[23]   Malaysian Investment Development Authority. http://www.mida.gov.my/home/.

[24]   Business Filing Portal Of ACRA. https://www.bizfile.gov.sg/.

[25]   Ontario 211 Services. https://211ontario.ca/about-211-ontario/what-is-211-ontario/.

[26]   The National Improvement Service for Local Government of Scotland. http://www.improvementservice.org.uk/lessons-from-seoul-how-egovernment-can-drive-citizen-engagement.html.

[27]   Ministry of Finance of Singapore. http://www.mof.gov.sg/Policies/e-Government.

[28]   ACRA. https://www.bizfile.gov.sg/.

[29]   World Bank. http://www.doingbusiness.org/rankings.

[30]   Lee Kuan Yew School of Public Policy, National University of Singapore. lkyspp.nus.edu.sg/wp-content/uploads/2014/12/Business-Process-Outsourcing-in-the-Philippines.pdf.

MODULE 9
REGULATORY REFORM

At the end of this module, participants will

1. understand the concept and categories of regulation,

2. understand the definition and stages of regulatory reform,

3. understand the OECD approach to regulatory framework, and

4. explain the relationship between regulation and productivity.

The module consists of four units:

Unit 1: What is Regulation?

Unit 2: What is Regulatory Reform?

Unit 3: Regulatory Framework

Unit 4: Regulation and Productivity

Unit 1: What is Regulation?

Learning Objective
At the end of this unit, participants will be able to

1. understand the concept of regulation,

2. identify the diverse categories of regulations,

3. learn the ten principles of regulatory quality, and

4. practice how to ensure the regulatory quality.

Introduction
Governments seek to meet the policy objectives of societal well-being in a wide variety of ways, including through policies aimed at macroeconomic stability, increased employment, improved education and training, equality of opportunity, promotion of innovation and entrepreneurship, and high standards of environmental quality, health, and safety. Regulation is an important tool that has helped governments make impressive gains in attaining these and other desirable public policy goals.

Governments have long used economic, social, and administrative regulations to better align the public and private interests in markets. Regulations will continue to be an important tool for

preserving and advancing public interests. There is a real risk, however, particularly in a time of profound and rapid changes in economic and social conditions, that regulations can become an obstacle to achieving the very economic and social well-being for which they are intended.

Regulations that impede innovation or create unnecessary barriers to trade, investment, and economic efficiency or cause duplications between regulatory authorities and different layers of the government, and even among governments of different countries, are part of the problem. Likewise, regulations that allow the influence of vested interests seeking protection from competition or the ones that are outdated or poorly designed to achieve their intended policy goals are undesirable.

Conceptual Definition

There is no generally accepted definition of regulation applicable to the very different regulatory systems in OECD countries.

In the OECD work, regulation refers to the diverse set of instruments by which governments set requirements on enterprises and citizens.

Regulations include laws, formal and informal orders, and subordinate rules issued by all levels of government, as well as rules issued by non-governmental or self-regulatory bodies to whom governments have delegated regulatory powers.

Categories of Regulations

- **Economic regulations** intervene directly in market decisions such as pricing, competition, and market entry or exit. A reform aims to increase economic efficiency by reducing barriers to competition and innovation, often through deregulation and use of efficiency-promoting regulation, as well as by improving regulatory frameworks for market functioning and prudential oversight.

- **Social regulations** protect public interests such as health, safety, environment, and social cohesion. The economic effects of social regulations may be secondary concerns or even unexpected but can be substantial. A reform aims to verify that regulation is needed, and to design regulatory and other instruments, such as market incentives and goal-based approaches, that are more flexible, simple, and cost effective.

- **Administrative regulations** are paperwork and administrative formalities (the so-called 'red tape') through which governments collect information and intervene in individual economic decisions. They can have substantial impacts on private sector performance. A reform aims at eliminating those that are no longer needed, streamlining and simplifying those that are needed, and improving the transparency of their application.

Quality of Regulations

Under pressure to regulate more effectively but at lower costs, governments are slowly building capacities for quality control of regulatory decisions. As part of these reform programs, several governments have developed principles for good regulatory decisions.

Regulatory principles necessarily differ from country to country, since issues of concern will arise from specific economic, social, and political environments and values. Within that diversity of

needs, however, regulatory management officials agree that regulators and other responsible officials should consider a number of key principles as they determine whether and how to regulate.

Such principles should be flexible enough to apply to regulatory decisions in all or most areas of policy; yet, should also provide practical guidance on the design of high-quality regulations. Whether they are codified in administrative procedure laws, or are issued as recommendations by ministers or governments, their role is to set quality standards for regulations.

Ten regulatory principles, based on the principles used in OECD countries, are given below [1–12]:

Principle 1: The problem to be solved should be precisely stated, giving clear evidence of its nature and magnitude, and explaining why it has arisen (identifying the incentives of affected entities).

Principle 2: Government intervention should be based on clear evidence that the government action is justified, given the nature of the problem; the likely benefits and costs of action, based on a realistic assessment of government effectiveness; and alternative mechanisms for addressing the problem.

Principle 3: Regulators should carry out, early in the regulatory process, an informed comparison of a variety of regulatory and nonregulatory policy instruments, considering relevant issues such as costs, benefits, distributional effects, and administrative requirements.

Principle 4: Regulatory processes should be structured so that all regulatory decisions rigorously respect the rule of law. In other words, responsibility should be explicit for ensuring that all regulations are authorized by higher-level regulations and consistent with treaty obligations, and comply with relevant legal principles such as certainty, proportionality, and applicable procedural requirements.

Principle 5: Regulators should choose the most appropriate level of government to take action, or, if multiple levels are involved, should design effective systems of coordination between the levels of government.

Principle 6: Regulators should estimate the total expected costs and benefits of each regulatory proposal and of feasible alternatives, and should make the estimates available in accessible format to decision makers. The costs of government action should be justified by its benefits before the action is taken.

Principle 7: To the extent that distributive and equity values are affected by government intervention, regulators should make transparent the distribution of regulatory costs and benefits across social groups.

Principle 8: Regulators should assess whether rules will be understood by likely users, and to that end should take steps to ensure that the text and structure of rules are as clear as possible.

Principle 9: Regulations should be developed in an open and transparent fashion, with appropriate procedures for effective and timely inputs from interested parties such as affected businesses and trade unions, other interest groups, or other levels of government.

Principle 10: Regulators should assess the incentives and institutions through which the regulation will take effect, and should design responsive implementation strategies that make the best use of them.

The OECD Reference Checklist for Regulatory Decision Making

1. Is the Problem Correctly Defined?

The problem to be solved should be precisely stated, giving clear evidence of its nature and magnitude, and explaining why it has arisen (i.e., identifying the incentives of affected entities and their consequent behaviors). Properly done, problem definition will itself suggest potential solutions, and eliminate others that are clearly not suitable. Many problems are multi-faceted, affecting a variety of groups in a variety of ways. In these cases, regulators should document the full scope of the issue, drawing particular attention to supporting and opposing linkages between groups and their incentives. Regulators reviewing existing regulations should assess whether the nature or scope of the problem has changed since the regulation was adopted in ways that require changes in the regulation itself.

2. Is Government Action Justified?

Government intervention should be based on clear evidence that a problem exists and that government action is justified, given: the values at stake and current government policies; the likely benefits and costs of action (based not on 'perfect' government, but on a realistic assessment of government effectiveness); and alternative mechanisms for addressing the problem. Markets should always be considered as an alternative to government action, and the capacity of the private sector and individuals to deal with the problem should be assessed.

3. Is Regulation the Best Form of Government Action?

The decision about 'how' to intervene may be as important as the decision 'whether' to intervene. Governments can choose from a variety of regulatory and nonregulatory policy instruments with very different implications for results, costs, distribution of benefits and costs, and administrative requirements. Considerable work in OECD countries suggests that a skillful use of alternatives can reduce costs and increase the effectiveness of a government action.

4. Is there a Legal Basis for Regulation?

Restrictions on private action should be based on valid legal authority, and should be exercised only by those who are properly authorized. This implies that regulatory processes should be structured so that they rigorously respect the rule of law. At the highest level, this may involve examination of constitutional authority to act, while at lower levels, it involves systematic scrutiny of consistency with higher-level regulations and with treaty or other international obligations.

5. What is the Appropriate Level of Government for this Action?

This question is both legal and pragmatic in nature. In some cases, competencies are designated by higher-level regulations, and regulators have no discretion. But in many cases, governments can choose who should act. In these cases, the question is, given the nature of the problem, what level, or system of cooperation between levels, of government can regulate most efficiently? This issue is raised under many policies, including decentralization, federalism, subsidiarity, internationalization. As they distribute regulatory competencies, governments are choosing more carefully today between subnational, national and international levels of government.

6. Do the Benefits of Regulation Justify the Costs?

A clear assessment of total costs and benefits, including those to businesses, private citizens, and administrations, likely to be realized in practice is crucial information for decision makers.

These estimates are needed to make judgements about the reasonableness of a regulation and its practicality for those who will comply; to design an approach with the lowest costs and highest benefits; and to assess its effectiveness in solving the problem. Their objective is to enable policy and political officials to ask the right questions and reach confident judgments that a regulation is, on net, beneficial. Yet regulators in most OECD countries do not assess the economic costs of new regulations, nor do they assess the magnitude or value of expected benefits.

7. Is the Distribution of Effects Across the Society Transparent?

To the extent that distributive and equity values are affected by government intervention, regulators should make transparent the distribution of regulatory costs and benefits across social groups. Often, costs are not imposed on the same segment of the society that benefits from regulation. Labor regulations, for example, may benefit workers with jobs, but make it harder for the unemployed to find jobs. There may be disproportionate effects on particular groups, such as small- and medium-sized enterprises, or on certain regions. Such effects may not mean that action is undesirable for society as a whole, but, rather, that policy officials should consider the issue explicitly to determine, for example, if compensation is needed for disadvantaged groups.

8. Is the Regulation Clear, Consistent, Comprehensible, and Accessible to Users?

Regulators should assess whether rules will be understood by likely users, and to that end take steps to ensure that the text and structure of rules are as clear as possible. This step in the decision-making process can improve not only the text of regulations but can also reveal unexpected ambiguities and inconsistencies. Clear and precise language also reduces the costs of learning about rules, minimizes disputes during implementation, and improves compliance. Regulators should also examine regulations for consistency of language and format with other regulations, the logical sequence of drafting, and the adequacy of definitions. Use of technical jargon should be minimized. Regulations incorporated by reference should be easily available. Finally, the strategy for disseminating the regulation to affected user groups should be considered.

9. Have all Interested Parties had the Opportunity to Present their Views?

Regulations should be developed in an open and transparent fashion, with appropriate procedures for effective and timely input from interested parties such as affected businesses and trade unions, wider interest groups such as consumer or environmental organizations, or other levels of government. To gain the benefits of public consultation, administrations should make available to the public as much information as is feasible, including proposed texts, explanations of the need for government action, and assessments of the benefits and costs. Such transparency is particularly important when regulations have effects on international trade or on international treaties or other cooperative agreements.

10. How will Compliance be Achieved?

Even after the most rigorous decision-making process inside the administration, regulation has yet to pass the most demanding test of all, i.e., the public must agree to comply with it. Yet implementation, consisting of strategies such as education, assistance, persuasion, promotion, economic incentives, monitoring, enforcement, and sanctions, is very often a weak phase in the regulatory process in OECD countries, who tend to rely too much on ineffective punitive threats and too little on other kinds of incentives.

Learning Methodology

Class Discussion and/or an Individual Paper

In your country, how well has the OECD checklist been applied in regulatory reform?

What are the three areas of the OECD checklist that need most attention in your country?

Unit 2: What is Regulatory Reform?

Learning Objective

At the end of this unit, participants will be able to

1. understand the concept of regulatory reform,

2. understand the context of regulatory reform,

3. identify the roots of regulatory problems,

4. learn the three stages of regulatory reform,

5. apply the strategies for successful regulatory reform, and

6. learn about successful cases of regulatory reform.

Introduction

All governments have a continuing responsibility to review their own regulations and regulatory structures and processes to ensure that they promote efficiently and effectively the economic and social wellbeing of their people. A growing number of countries have embarked in recent years on ambitious programs to reduce regulatory burdens and improve the quality and cost-effectiveness of regulations that remain.

The difficulties and complexities have sometimes been greater than expected and there are many questions about the risks and costs of further reforms, as well as continued strong opposition from vested interests. Yet, much has been learned about how to reform, and it is clear that the risks and difficulties of not reforming are often greater.

The goal of regulatory reform is to improve national economies and enhance their ability to adapt to change. Better regulation and structural reforms are necessary complements to sound fiscal and macroeconomic policies. Continual and far-reaching social, economic, and technological changes require governments to consider the cumulative and interrelated impacts of regulatory regimes, to ensure that their regulatory structures and processes are relevant and robust, transparent, accountable, and forward-looking. Regulatory reform is not a one-off effort but a dynamic and long-term multidisciplinary process.

The concept of regulatory reform has changed over the last few decades. The focus in the 1990s was on steps to reduce the scale of government, often carried out in single initiatives. Isolated efforts cannot take the place of a coherent, whole-of-government approach to create a regulatory environment favorable to the creation and growth of firms, productivity gains, competition, investment, and international trade. Removing unneeded regulations, notably in sectors that meet public needs, is still

important, but does not tell the whole story. When governments turn elsewhere for provision of services, regulation is necessary to shape market conditions and to protect the public interest. 'Regulatory quality and performance' captures the dynamic, ongoing whole-of-government approach to implementation.

Conceptual Definition of Regulatory Reform

Regulatory reform is used in the OECD work to refer to changes that improve regulatory quality, i.e., enhance the performance, cost-effectiveness, or legal quality of regulations and related government formalities.

Reform can mean revision of a single regulation, the scrapping and rebuilding of an entire regulatory regime and its institutions, or improvement of processes for making regulations and managing reform. Deregulation is a subset of regulatory reform and refers to complete or partial elimination of regulation in a sector to improve economic performance.

Context of Reform

In the last few decades, different stages have characterized the development of regulatory reform. The role of the state in relation to the economy and society is in transition. Even if the 20th century saw a rapid growth in the role and presence of the state, efforts started some decades ago to 'roll back the frontiers of the state' in order to free up market economies and to redefine the relationship of the state with the economy and citizens.

The reduction of direct state intervention in the economy, i.e., through privatization of state ownership of enterprises, the reduction of price controls and licenses, etc., implied a change in the mode of intervention. In terms of regulatory policy, this has given rise to the concept of the 'regulatory state.' This means that the State is still strategically responsible for the economy and society, but with a more arms-length relationship with citizens and the economy. The public sector is still a major issue, since it constitutes a very large part of the economy of advanced countries and of most developing countries.

The first efforts of deregulation were driven by economic downturns and based on the view that regulation was impeding the economy by strangling innovation and entrepreneurialism. These early attempts to reduce regulatory inflation were only partially successful. Deregulation gave way in the 1980s and 1990s to regulatory and management reform and, more recently, to the development of a comprehensive regulatory policy agenda.

In response to technological innovations, consumer demand for better services, the evolution from manufacturing towards service economies, and interdependencies in regional and global markets, governments have faced a transition to market-led growth to maintain economic performance. These shifts have necessitated supply-side reforms that stimulate competition and reduce regulatory inefficiency. Thus, regulatory reform has become increasingly central to economic policy agendas.

The Roots of the Regulatory Problem

The history of regulatory reform is not one of coherent government strategy, but rather of reactions to changing crises and opportunities across countries, industries, and policies. Oil shocks in the 1970s, currency volatility and declining tariffs, growing awareness of the complexity of environmental degradation, and rapid regulatory inflation have revealed the previously hidden costs of outdated, rigid, and expanding regulation. Yet, in all of these cases reform was delayed or blocked:

- The complexity of reform and uncertainty about its consequences has blocked progress. This is in part due to policy fragmentation in the structure of government. Governments have often lacked the coordination and planning capacities necessary to move forward with coherent packages of policies and reforms.

- Vested interests have often been able to install regulations that benefit them, and to block needed reforms even when broad or longer-term benefits are vastly larger than concentrated costs. In some countries, a 'regulatory culture' has emerged, as businesses have come to look to government protection for survival rather than to their own performance. Lack of transparency is a key problem here. Vested interests are strengthened by opaque decision-making processes and unaccountable administrative discretion.

- Incentives inside regulatory bureaucracies have not encouraged effective and accountable use of discretion. Incentives have too often favored vocal rather than general interests, short-term gains over long-term views, pursuit of narrow mission goals at any cost, and use of detailed and traditional controls rather than flexible and innovative approaches. Most regulators are neither equipped to assess the hidden costs of regulation nor to ensure that regulatory powers are used cost-effectively and coherently.

- Good regulation can become bad regulation over time. Governments give too little attention to reviewing, updating, and eliminating unnecessary or harmful regulation. Many regulations currently on the books date from periods earlier in this century when economic and social conditions were very different from what they are today. Governments must find means of responding more quickly to changing environments.

- Controlling regulatory and legislative inflation is essential. The volume and complexity of laws, rules, paperwork, and administrative formalities now reach an all-time high in OECD countries. This is overwhelming the ability of regulators in implementing the total load, of the private sector in complying, and of the elected officials in monitoring action. Too often, legislators issue laws as symbolic public action, rather than as practical solutions to real problems. Regulatory inflation erodes the effectiveness of all regulations, disproportionately hurts SMEs, and expands scope for misuse of administrative discretion and corruption.

- All these problems risk being exacerbated where different layers of government can impose duplicative, conflicting, or excessive regulations.

Three Stages of Regulatory Reform

Regulatory reform is evolving rapidly. As experience accumulates, so does the understanding of the problems and how they might best be solved. As a result, reform now embraces a much wider range of instruments, processes, and institutions than in the early days of simple deregulation strategies. Regulatory reform is evolving in three general stages in OECD countries (see Figure 10.1), although with much variation from country to country.

Deregulation

The deregulation strategies that began to emerge in the late 1970s and early 1980s were first prompted by economic slowdown and business complaints about rising regulatory burdens. Simultaneously, it was becoming clear that regulations restricting competition and consumer prices had enormous costs with respect to efficiency and innovation.

FIGURE 10.1

STAGES OF REGULATORY REFORM.

Purposes
• Total management
• Basic framework
• System flexibility

Regulatory management

Characteristics
• System-based
• Proactive

• Regulatory quality
• Decision-making process
• Accessibility improvement

Regulation
Better regulation
Smart regulation

• Instrument-based
• Proactive
• Regulatory alternatives

• Removal
• Softening
• Simplification

Deregulation

• Instrument-based
• Reactive

These perceptions unleashed a wave of deregulation, initially in the USA, the UK, and Canada, which focused on industries such as transport, telecommunications, media, and energy, and which continues today in a widening range of countries.

Removal of economic regulations, i.e., those that set prices, block entry, or establish quotas, has brought major benefits. However, general deregulation is neither feasible nor desirable in many rapidly growing areas of 'social regulation,' i.e., regulation that aims to achieve goals like health, safety, or environmental standards. Here a different strategy is required to control regulatory costs without compromising on voters' wishes for improved standards of protection. New, more sophisticated regulation can also help promote competitive outcomes in some recently privatized industries, especially as a transitional strategy while new markets develop.

Better Regulation: Reregulation, Smart Regulation

The next step in the evolution of this thinking is focused on producing better regulation or achieving the chosen objectives at minimum cost. It involves both the systematic review and reform of existing regulation and the improvement of policy processes and capacities for creating new regulation of high quality.

Regulatory reform is more forward-looking but is still targeted at individual regulations and fails to meet the deeper problems that arise from the nature of regulatory systems themselves. These include regulatory inflation complexity, lack of coherence, unanticipated interaction between rules, and transparency and accountability.

Regulatory Management

Regulatory management addresses the capacity of governments to implement and sustain general reform, to direct the longer-term evolution of the national regulatory system, and to strengthen links with other areas of governance.

Increasing prominence is being given to the issue of total regulatory costs in the USA and the UK. In Australia, specific targets for cost reduction have been adopted. In Canada a 'Federal Regulatory Plan' notifies the public well in advance of forthcoming regulatory initiatives, and therefore assists consultation, coordination, and consistency between areas of regulation.

In these and other ways, regulatory management is developing in a few countries into a routine element of the central-management functions of government. This movement parallels the development of central budgeting agencies, now universal in industrial countries, in the early part of this century. Both the initiatives aim at establishing broad perspectives and improved administrative responses to political direction.

Strategies for Successful Reform

Political Leadership is Essential.

Skillful political leadership is needed to improve the capacity for change in the absence of crisis, and to design and implement strategies for reform to reduce the cost of lost opportunities and the pain of transition. Reform is not, however, a task only for governments; other stakeholders such as firms and workers also have roles in helping to build support for reform and in sharing information across borders.

The Need for Reform must be Communicated.

A crucial stage in reform, before it starts, is about communicating and selling the reform to an often-skeptical citizenry. The public needs to be informed as to why reform is considered so important to their and their children's future wellbeing. Open dialogue and communication involving all major stakeholders on the benefits and costs of reform can improve understanding on all sides of short- and long-term effects of action and non-action, and on the distribution of costs and benefits. In most countries, a reform would benefit from wider and more informed debates less dominated by concentrated interests who stand to lose the most.

Comprehensive Reform Works Better than Piecemeal Reform.

Comprehensive reform is based on a complete and transparent package of reforms (aimed at a single policy area, sector, or multiple sectors) designed to achieve specific goals on a well-defined timetable. Comprehensive reform does not mean that all changes occur immediately; rather, it is consistent with sequencing strategies and transitional steps as long as they are temporary, and steps and timing are clear.

Carefully Consider Sequencing, but don't give up Opportunities while Waiting.

There is much debate on how reforms can be sequenced, and how important sequencing is. The optimal sequencing from an economic point of view, in the sense of reducing transition costs and achieving benefits quickly, may differ from the optimal sequence from a political perspective, in the sense of maximizing the political momentum of reform. Most countries have approached sequencing very pragmatically, since waiting for the optimal sequence of reforms can delay reforms for a long time.

International Cooperation and Coordination can Promote Reform.

All governments have a significant stake in regulatory reform and the benefits it can bring, including increased trade and investment. Selling reform is easier today, thanks to a growing body of evidence and experiences from many countries, and the impact of international benchmarks in highlighting the need for reform. Such information can reassure people that the risks of moving in unfamiliar directions are acceptable, given demonstrated benefits.

Case Studies

1. Comprehensive Regulatory Reform: New Zealand

New Zealand abolished virtually all support to agriculture in the mid-1980s. Price stabilization measures and input subsidies were eliminated, tariffs reduced and restrictions on imports removed. The reforms were provoked by serious economic imbalances, adverse developments in international trade for New Zealand's agricultural exports, and a foreign exchange crisis. The result was a realignment of farm product prices with world market prices.

After an initial rise in farm profits due to a 20% devaluation, there was a substantial decline in the profitability of farming as exchange rates recovered. The decline in farm profitability was accompanied by a drop of more than 20% in the average sale price of farm land, a reduction in agriculture's contribution to GDP, adjustment in farm enterprise mixes, closing down of some businesses related to agriculture, and the loss of jobs, with employment in the agro-food sector declining by more than 10%.

Adjustments in upstream and downstream sectors have also been substantial. The government provided limited assistance during the period of adjustment, including changes in general economic policies (with the 20% devaluation), a write off of the deficit in price stabilization accounts, and assistance to some farmers with debt restructuring and servicing.

The general government welfare program was used to provide income support to some farm families. Under intense pressure to become more efficient and innovative in order to survive, farmers diversified into new products and non-farming activities; meat processors were forced to seek efficiencies and add value; and product development in the dairy industry and new crops resulted in a much wider variety of products, exported to new markets.

Currently, the agro-food sector is internationally competitive, more responsive to international market changes and opportunities, and operates with very little government support. A decade on, agriculture's contribution to GDP exceeds its pre-reform peak; employment in the agro-food sector has almost recovered to pre-reform levels; quality has improved; variety of products has increased; average land sale prices have rebounded to exceed pre-reform levels; and generally farmers have improved farm equity and profitability.

2. Regulatory Review in Australia

From 1996 to 2000, Australian federal and state governments undertook a comprehensive review of regulations to eliminate unjustified anti-competitive effects. This review was unprecedented in its scope and ambition in OECD countries. A 1993 Report on National Competition Policy found that Australia was facing major challenges in reforming its economy to enhance national living standards, and recommended "the reform of regulation which unjustifiably restricts competition." Since competition law could not itself correct regulatory barriers to competition, many of which stemmed from other laws, a new mechanism was required, including the following:

- There should be acceptance by governments of the principle that any restriction on competition must be clearly demonstrated to be in the public interest.

- New and existing regulations should be subject to increased scrutiny, and significant restrictions on competition should lapse after five years, unless reenacted after scrutiny through a public review process.

- Reviews of regulations should take an economywide perspective to the extent practicable.

In April 1995, the Council of Australian Governments signed the Competition Principles Agreement embodying these recommendations, except that regulations restricting competition will undergo review every ten years rather than automatically lapse. Review schedules were agreed to in 1996 and the process has commenced.

Financial incentives for reform were built into the agreement, which was expected to increase federal tax revenues by AUD6 billion per year. The Commonwealth Government made 'Competition Payments' to each state, unless the state failed to meet deadlines for regulatory review and 'effective implementation' of other commitments in the agreement, such as deregulation of gas, electricity, water, and road transport industries.

Learning Methodology: Questions

Which elements of the New Zealand and Australian regulatory reform cases could be applied to your country?

What are the implementation lessons from these cases? Which are the 'Three Stages of Economic Reform' and at which stage is your own country?

Unit 3: Regulatory Frameworks

Learning Objective

At the end of this unit, participants will be able to

1. understand the essence of regulatory frameworks,

2. understand the importance of regulatory policy,

3. learn the institutional context of regulations,

4. learn diverse regulatory tools, and

5. understand key issues of regulatory impact analysis.

Introduction

Progress has been made in developing stronger conceptual frameworks for regulatory quality. In the beginning, initial conceptions of regulatory reform as the process of simply eliminating some rules and revising others evolved toward an understanding of the procedural, institutional, and finally the profound cultural transformations that were required in many areas, in both public and private sectors. This revealed a difficult, complex and multifaceted reform agenda; but most reformers did not have the influence or the tools to carry out that task, and sometimes the reform agenda was ill-suited to the political cycle.

Confronted by internal and external pressures, governments had no choice but to press on. New environments with low-quality regulatory systems increasingly penalized citizens. Regulatory failures eroded trust in the government. The increasing internationalization of the world's economy underlined these trends. Traditional economic management tools based on monetary and fiscal policies seemed not to work well anymore, and regulatory reform offered new hope to economic policy officials faced with high unemployment, low productivity, and new demands to be internationally 'competitive.'

Regulatory reform was also part of a more profound economic and social transformation. As countries faced, and still face, the urgent and difficult task of moving forward with the transition to a market-driven economy in order to maintain economic performance, regulatory reform has played an increasingly important role. In response to technological innovations, changes in consumer demand, and interdependencies in regional and global markets, supply-side reforms to stimulate competition and reduce regulatory inefficiencies have become central to effective economic policies.

Thus, the reform agenda began to broaden to include the adoption of a range of explicit overarching policies, disciplines and tools, tending to be more permanent than episodic in nature. At the broadest level, this shift has meant providing explicit policy support for the regulatory reform agenda, by adopting a reform policy at the whole-of-government level, often with timelines, targets, and evaluation mechanisms.

Conceptual Definition

Regulatory framework refers to a mechanism in which regulations and regulatory regimes are efficient in terms of cost, effective in terms of having a clear regulatory and policy purpose, and transparent and accountable.

The OECD experience on regulatory quality confirms that an effective regulatory framework needs to be made up of three pillars which are mutually reinforcing: policies, institutions, and tools.

Regulatory Policies

Regulatory policy may be broadly defined as an explicit, dynamic, continuous, and consistent whole-of-government policy to pursue high-quality regulation.

It needs to be supported at the highest political level. The country reviews overall demonstrate that regulatory policy still needs recognition as a field in its own right. The scope and quality of regulatory policies across the OECD [15] remains uneven.

Although some countries have made considerable progress, many countries still only have fragmented elements of a regulatory policy in place, some dating back to many years. To be effective and influential, regulatory policies need to link up a range of issues and processes. They should incorporate explicit goals or targets with regular reporting requirements.

Key principles should be articulated, notably the broad scope of regulatory quality to support social welfare and public policy goals, not just sectional interests (when confined to the latter, regulatory policy is vulnerable to capture). Resources must be allocated to promote a regulatory policy, for example to central oversight bodies, which need adequate authority for their tasks such as the formal oversight of regulatory impact analysis (RIA). Measures must be built in to ensure compliance with regulatory quality processes and tools, including sanctions.

Implanting an effective regulatory policy is complicated by the fact that it is a horizontal policy that cuts across other policies, and often comes up against a traditional 'stovepipe' institutional architecture for policy-making, that is, one in which horizontal connections between different ministries are relatively undeveloped. It can therefore often generate incomprehension, if not resistance. Competition from other, more established, easily identifiable, and understandable policies (fiscal or environmental policy, for example) can blur its importance.

Most importantly, in relation to long-term impacts, regulatory policies are usually some way from integrating fully the concepts of dynamism and continuity. In order for this to happen, they need to incorporate two dimensions: managing the flow of rules (appraising new rules); and also, crucially, regularly appraising the stock of rules (ensuring that rules remain relevant). The need for regular review and renewal of regulation is a fundamental lesson that remains largely unlearnt to date, at least at the practical level.

Regulatory Institutions

The institutional context for implanting regulatory quality is complex, and remains fragmented, with particular areas of difficulty such as the relationship between trade policy and domestic regulatory institutions. Approaches need to be tailored to different country contexts. Institutional and legal systems across OECD countries range from systems adapted for small societies with closely knit governments that rely on trust and informality, to large federal systems that must find ways of dealing with high levels of autonomy and diversity.

Central Oversight Bodies

The relationship between an effective, comprehensive regulatory policy and the existence of a central oversight body appears to be strong. They are mutually supportive, and where one exists, the other is also usually present. Central bodies going beyond improved coordination between existing bodies are therefore probably essential in some shape or form. These bodies help to ensure that regulatory quality principles are successfully applied.

They can perform a number of different functions to that end: an advocacy role, a challenge function (the critical assessment of RIA), and practical and technical support for the application of regulatory tools. The market openness analysis highlights the fact that quality control of regulations needs improvement, through enhanced challenge and oversight functions.

At the same time, a careful balance needs to be struck. Too much concentration of responsibility, authority, and expertise in one place may undermine interest, commitment, and responsibility in the different parts of government that occupy the regulatory 'frontline.'

Independent Regulators

The rise of independent regulators is a relatively new development for many countries. The term covers not just economic regulators for the network industries, but also other types of regulators such as those set up to support civil liberties and foster administrative transparency.

Their main functions vary significantly across countries and between regulators in the same country. Very broadly speaking, they tend to be concerned with rule enforcement and the application of sanctions for noncompliance with rules relating to their areas of competence and authorizations for the issue of license and permits.

Independent regulators have proved to be an important step forward for better regulation of sectors and issues, for a number of reasons. They help to prevent political interference and the influence of special interests. They contribute to the improvement of regulatory quality, transparency, stability, and expertise.

Not the least, they are a necessary institutional development for marking out the separation of the state's roles of policy-making and regulation, which is especially important in countries that have

chosen to maintain a significant number of state-owned enterprises. They can also be powerful advocates for further and more effective reform.

Regulatory Tools

There are six key types of regulatory tools:

1. Administrative simplification

2. Regulatory impact analysis (RIA)

3. Transparency and communication

4. Alternatives to regulation

5. Compliance and enforcement

6. Tools to support administrative justice and accountability, which are important for the effective implementation of rules

Regulatory tools are on the whole more developed (at least in principle) than policies and institutional architecture, but there are gaps and weaknesses. Further research on applying cost-benefit analysis (CBA), self-assessment, alternatives to regulation, and not the least, evaluating the performance of regulatory tools, would be useful.

Though tools such as RIA offer a much broader and deeper scope for improving regulatory quality, many countries still focus much of their effort on administrative simplification. Overall, not enough use is made yet of the potential for deploying other tools.

Administrative Simplification

Administrative simplification probably remains the most commonly used regulatory tool. Few regulatory reforms are more popular than promises to simplify government 'red tape,' and one of the most common complaints from businesses and citizens in OECD countries is the number and complexity of government formalities, processes, and paperwork.

Administrative simplification has been highlighted as an important contribution to product market competition, which in turn feeds into enhanced economic performance. Reducing administrative burdens helps businesses, especially SMEs. Burdensome administrative regulation raises company costs, impedes market entry and innovation, and hurts competitiveness. Reducing administrative burdens, permits, and licenses can also help create a political constituency for reform, especially among SMEs, and can support subsequent deeper regulatory reform.

Regulatory Impact Analysis

Regulatory impact analysis (RIA) is perhaps the most important regulatory tool available to governments, as its aim is to ensure that the most efficient and effective regulatory options are chosen. Most of the items in the 1995 OECD checklist relate to RIA good practice. It remains a highly valid reference [13, 17].

RIA is a challenging process that needs to be built up over time, an issue that is confirmed by the most recent country evidence. Existing RIA guidelines are not always applied, or are applied

ineffectively or inconsistently, despite the fact that the use of RIA has become widespread if not universal, with initial efforts dating back to the 1970s and 1980s in some countries.

There is a wide variation between countries too in terms of how far RIA is embedded in the regulatory process. It is firmly entrenched in some countries (which does not necessarily mean it is well applied), but others are still at a much earlier stage.

Transparency and Consultation

Transparency is one of the central pillars of effective regulation and a fundamental determinant of market openness for both domestic and foreign participants. The ability of businesses to fully understand the regulatory environment in which they are operating, and to have a voice in regulatory decision making, go hand-in-hand in ensuring effective quality of market access.

Many countries offer valuable insights into the mechanisms for promoting transparency [8]. They also confirm that it is a challenging task, involving standardized processes for making and changing regulations, consultations with interested parties, effective communication of the law and plain language drafting, publication and codification, controls on administrative discretion, and effective implementation and appeals processes.

Alternatives to Regulation

The use of a wide range of mechanisms for meeting policy goals, not just traditional regulatory controls, helps to ensure that the most efficient and effective approaches are used. Approaches include green taxes and subsidies, voluntary agreements, information programs such as eco-labelling, self-regulation, permit trading schemes, and performance-based regulation (where a sector or industry must comply with a standard, but can broadly choose how to meet it).

These developments reflect a changing relationship between the state and businesses/citizens and support the 'light touch' needs of market economies. However, alternatives are often poorly developed and are still mainly used in the environmental context.

Compliance and Enforcement

Compliance and enforcement are the poor relations in the regulatory toolkit. Adoption and communication of a regulation set the framework for achieving a policy objective. However, effective implementation, compliance, and enforcement are essential for actually achieving the objective. There is not much point having regulation with a low rate of compliance. Inadequate compliance may also be a major cause of regulatory failure.

Countries, perhaps not surprisingly, find it easier to focus on the first issue (adoption and communication of a rule), rather than on the second (ensuring that it is respected). This is a particular problem in the transition economies and wherever an informal economy takes hold.

Administrative Justice and Accountability

The relationship between the regulators and the regulated needs to be balanced. Regulators must apply and enforce regulations systematically and fairly, and regulated groups or individuals must have access to administrative and judicial review of regulators' actions that affect them.

Access to review processes ensures that regulators are held accountable for their actions. Accountability is a necessary corollary to transparency, which is about making clear the processes

by which regulatory powers will be deployed by the authorities, and also making clear the rights and protections for businesses and citizens.

Some Key Issues with RIA

Omissions: RIA is not applied yet to all rules, and to all rule makers. The use of RIA remains partial, with large parts of the regulatory structure in most countries not subject to its disciplines at all. These often include the local governments, especially in federal states, and independent regulators. Quasi regulation is an issue.

Whole regulatory regimes: RIA is relevant not just for individual rules but also for whole regulatory regimes, such as for the network industries. Assessing individual rules out of context may undermine the potential of RIA towards better rule making.

Evaluation: How well is the regulation likely to achieve its objective? There are important weaknesses in the use of quantification methods, CBA techniques, and evidence-based justifications to support evaluation which need further deployment and development.

Compliance: This is often poor, with a lack of sanctions, and a lack of resources for enforcement. Poorly prepared regulations that do not conform to process rules may remain unchallenged.

Complexity and fragmentation: Too many checklists exist in some countries, which can cover a range of issues, such as social and economic impacts, gender, regions, and business environment.

Targeting: To avoid overload, RIA needs to be targeted at regulations with the largest potential impacts and the best prospects for changing outcomes.

Integration with consultation: RIA is often separate from or not included in consultation processes, thus reducing the scope for generating the data needed to maximize RIA's effect on decision making and undermining its acceptance by stakeholders. This slows down the cultural changes needed to ensure that it becomes a key part of the decision-making process.

Learning Methodology: Class Discussion or a Written Assignment

- Does your country use a system of regulatory impact analysis (RIA)?

- How could RIA be introduced or improved in your country?

- Which are the important regulatory institutions in your country?

- Which regulatory tools are underutilized in your country?

Unit 4: Regulation and Productivity

Learning Objectives
At the end of this unit, participants will be able to

- understand the effects of regulatory reform, and

- learn the OECD Guiding Principles for regulatory quality and performance [14].

Introduction

A fundamental objective of regulatory reform is to improve the efficiency of national economies and their ability to adapt to changes and remain competitive. Reform that sharpens competitive pressures provides powerful incentives for firms to become more efficient, innovative, and competitive.

These improvements can boost the productivity of entire industries and often bring sharp and swift price reductions and improvements in the quality and range of products and services, to the benefit of consumers and user industries.

For example, in the USA, reform in several sectors is providing annual benefits of USD42–54 billion to consumers and producers. The European single market, by promoting competition and replacing many separate national requirements with single Europe-wide requirements, is estimated to have increased European GDP by up to 1.5% between 1987 and 1993. In Japan, efficiency gains from deregulation are estimated to boost consumer income by about 0.3% per year, or USD36 billion annually.

Reform that reduces business burdens and increases the transparency of regulatory regimes supports entrepreneurship, market entry, and economic growth. This, in turn, should produce high-paying, high-quality jobs. Reform that reduces 'red tape' and paperwork burdens for ordinary citizens, particularly in their role as taxpayers, frees up valuable time and individual initiative.

In turn, more productive, innovative, and flexible economies are in a better position to meet other public interests and to help governments deal with issues such as social cohesion, environmental quality, and the rapid ageing of populations.

Regulation and Doing Business: World Bank

To document the regulation of business and investigate the effect of regulation on such economic outcomes as productivity, unemployment, growth, poverty, and informality, the 'Doing Business' team collected and analyzed data on many topics [16].

Does cumbersome business regulation matter? Yes, and particularly for poor people. In much of Africa, Latin America, and the former Soviet Union, excessive regulation stifles productive activity (see Figure 10.2). The government does not focus on what it should, i.e., defining and protecting property rights. These are the regions where growth stagnates, few new jobs are created, and poverty rises.

Not any job will lead out of poverty. If it were simply a matter of creating jobs, the companies would need to adjust to new market conditions and seize opportunities for growth. However, all too frequently this flexibility is taken away by cumbersome regulation. Productive businesses thrive where the government focuses on the definition and protection of property rights. In countries where the government regulates every aspect of business activity heavily, businesses operate in the informal economy. Regulatory intervention is particularly damaging in countries where its enforcement is subject to abuse and corruption (see Figure 10.3).

Regulation in poor countries is more cumbersome in all aspects of business activity (see Figure 10.4). Another important variable in explaining different levels of regulatory intervention is their legal origin. Together, income and legal origin account for more than 60% of the variation in regulation. While the country's wealth has long been recognized as a determinant of the quality of

FIGURE 10.2

CUMBERSOME REGULATION IS ASSOCIATED WITH LOWER PRODUCTIVITY.

Labor productivity, USD1,000 per worker

Countries ranked by procedures to start a business, quartiles
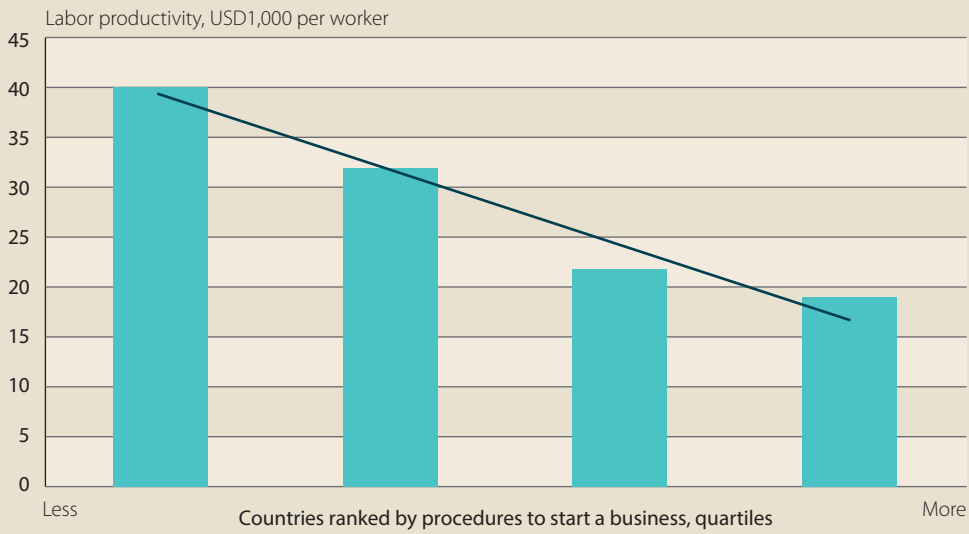
Source: Doing Business Database; World Development Indicators 2003.

FIGURE 10.3

HEAVIER REGULATION IS ASSOCIATED WITH INFORMALITY AND CORRUPTION.

Informal economy, % income per capita

Countries ranked by employment-law index, quartiles

Corruption

Countries ranked by procedures to register a business, quartiles
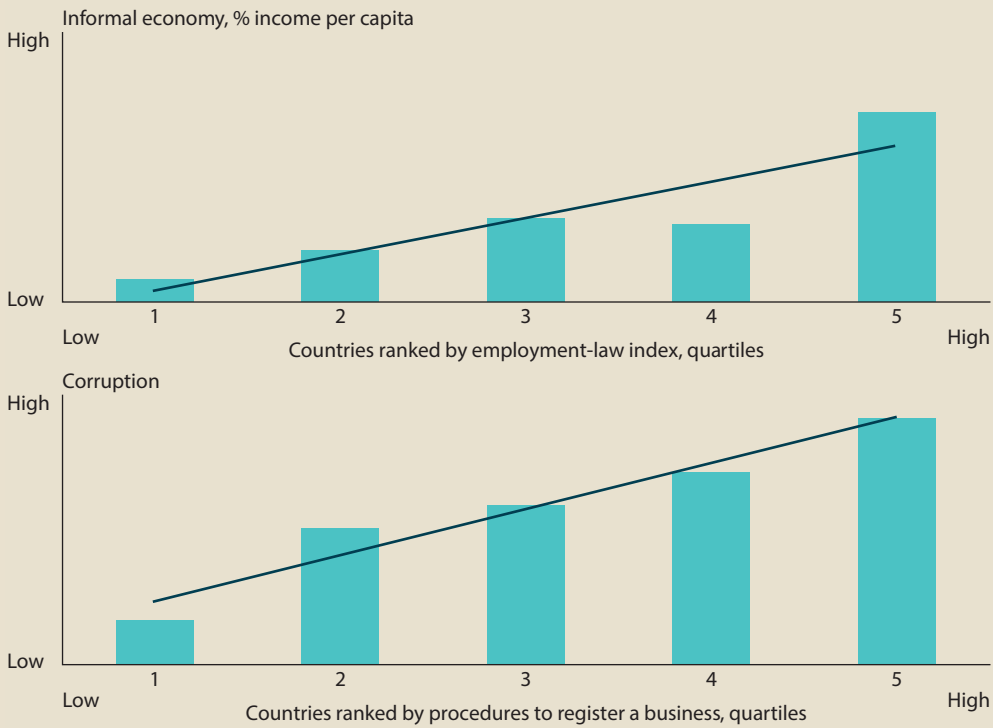
Source: Doing Business Database; Schneider 2002; Kaufmann and Mastruzzi 2003.
Note: The correlations shown in the figures control for income. Relationships are significant at the 1% level.

FIGURE 10.4

POOR COUNTRIES REGULATE BUSINESSES THE MOST.

Source: Doing Business Database.
Note: The indicators for high-income countries are used as benchmarks. The average value of the indicator is shown above each column.
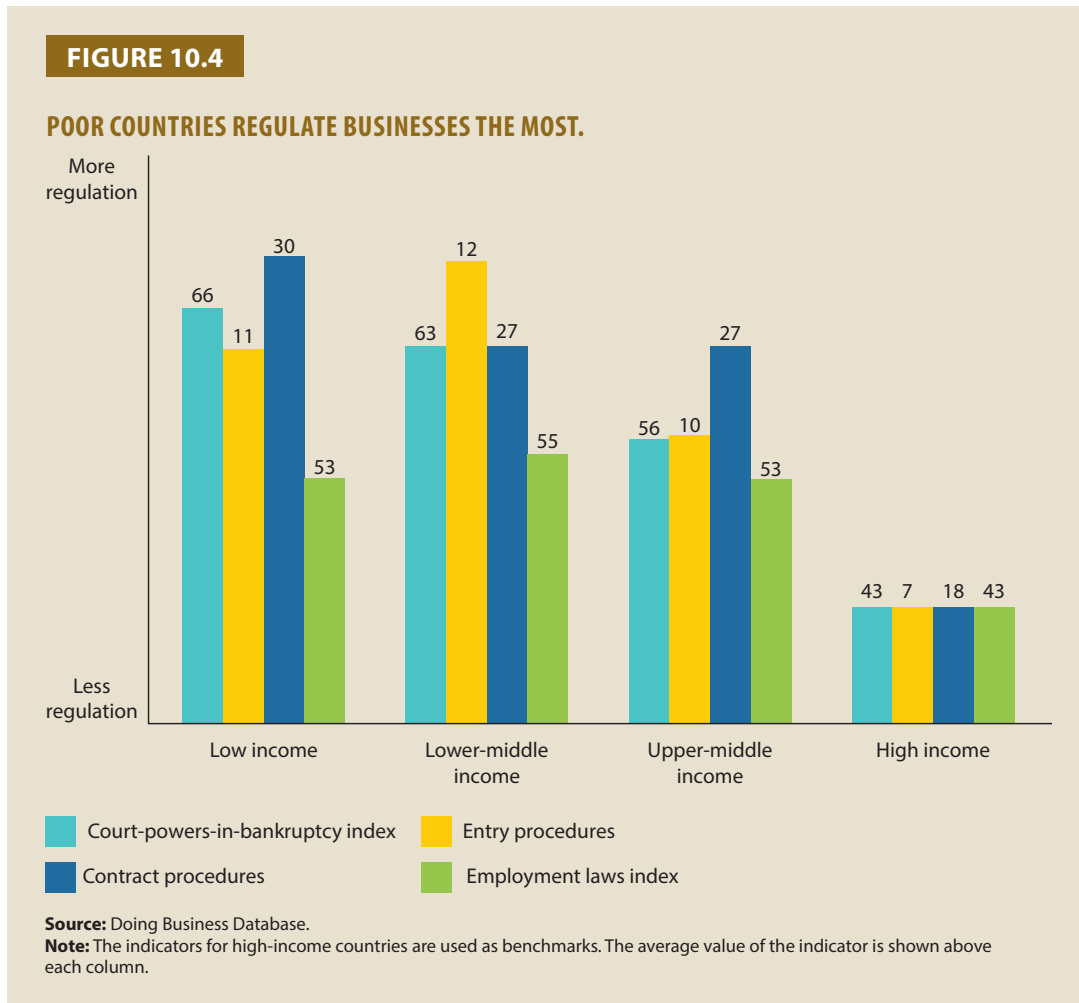
institutions, the importance of legal origin has only recently been investigated. The regulatory regimes of most developing countries are not indigenous and have been shaped by their colonial heritage. When the English, French, Spaniards, Dutch, Germans, and Portuguese colonized much of the world, they brought with them their laws and institutions. After independence, many countries revised legislation, but in only a few cases have they strayed far from the original. These channels of transplantation bring about systematic variations in regulation that are not a consequence of either domestic political choice or the pressures toward regulatory efficiency. Common law countries regulate the least. Countries in the French civil law tradition, the most.

Heavier regulation is generally associated with more inefficiencies in public institutions, e.g., longer delays and higher costs (see Figure 10.5), and more unemployment, corruption, less productivity, and investment, but not with better quality of private or public goods.

The countries that regulate the most (poor countries) have the least enforcement capacity and the fewest checks and balances in government to ensure that regulatory discretion is not used to abuse businesses and extract bribes. In developing countries, regulation is rarely enforced and plays no role in the conduct of everyday business. Good regulation does not mean zero regulation. In all countries, the government is involved in various aspects of control of business. The optimal level of regulation is not zero but may be less than what is currently found in most countries, and especially the poor ones.

FIGURE 10.5

MORE REGULATION IS ASSOCIATED WITH HIGHER COSTS AND DELAYS.

Cost, % income per capita

Number of procedures to start a business

Time to go through insolvency, years

'Court powers' index in insolvency
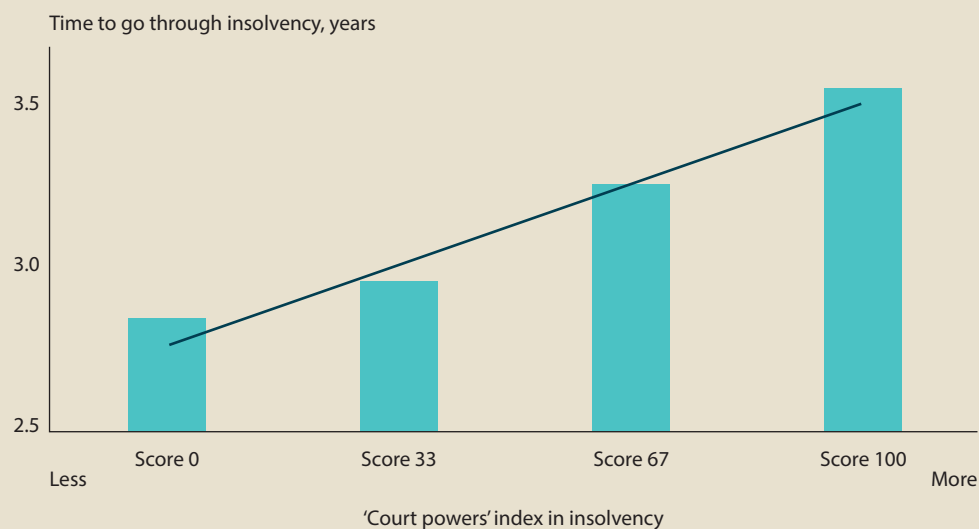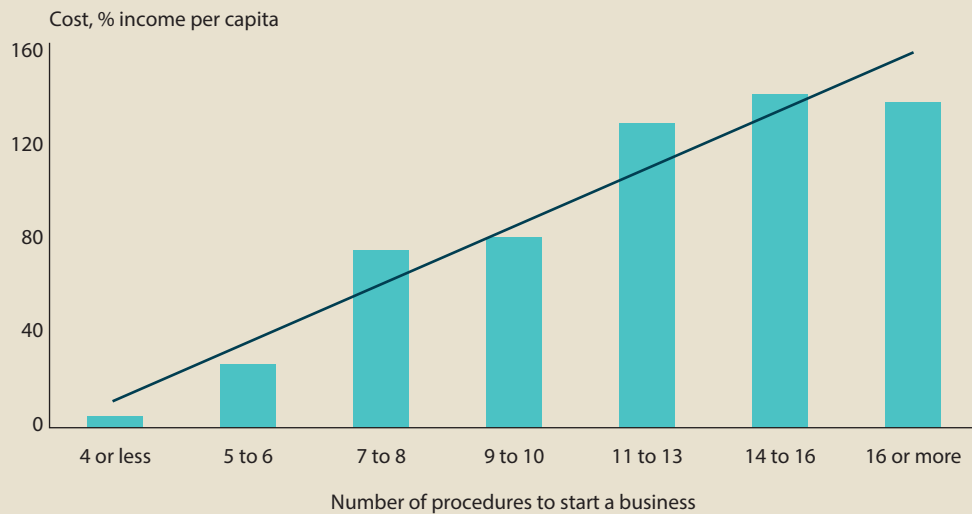
Source: Doing Business Database.
Note: The correlations shown in the figures are significant at the 10% level.

Product Market Competition and the Link of Productivity

Product market competition affects the level and growth of productivity through four main channels:

1. **Innovation:** The attempt to acquire a competitive edge on rival firms often results in a stronger innovation effort, for instance, through increased expenditure on R&D and patenting. Procompetitive regulations are often found to have a positive impact on innovation activity in empirical research.

2. **Diffusion:** Competitive pressures provide strong incentives for firms to reach the technological frontier, mainly due to the threat of losing market shares vis-à-vis

competitors. Investment in ICT has been higher in countries with a more competitive domestic environment. Also, countries that underwent extensive product market reforms also found it easier to translate such investment into productivity improvements in crucial ICT-using sectors, thus increasing its contribution to aggregate productivity growth.

3. **Efficiency:** Competitive markets force management to reduce slack in the use of labor and capital resources (the so-called x-inefficiency).

4. **Capital spending:** Policies promoting competition are also shown to stimulate investment in sectors that are large users of new technologies, and encourage foreign inward direct investment (FDI), a major channel for technology transfer. Recent OECD analysis suggests that open and competitive business environments have made some OECD countries more attractive to FDI.

The OECD Guiding Principles for Regulatory Quality and Performance

The OECD recommends applying the following seven Regulatory Reform Principles [12]:

1. Adopt at the political level broad programs of regulatory reform that establish clear objectives and frameworks for implementation.

2. Assess impacts and review regulations systematically to ensure that they meet their intended objectives efficiently and effectively in a changing and complex economic and social environment.

3. Ensure that regulations, regulatory institutions charged with implementation, and regulatory processes are transparent and non-discriminatory.

4. Review and strengthen where necessary the scope, effectiveness, and enforcement of competition policy.

5. Design economic regulations in all sectors to stimulate competition and efficiency, and eliminate them except where clear evidence demonstrates that they are the best way to serve broad public interests.

6. Eliminate unnecessary regulatory barriers to trade and investment through continued liberalization and enhance the consideration and better integration of market openness throughout the regulatory process, thus strengthening economic efficiency and competitiveness.

7. Identify important linkages with other policy objectives and develop policies to achieve those objectives in ways that support reform.

Learning Methodology: Class Discussion or Individual Assignment

- How does your country perform on the World Bank "Ease of Doing Business" Rankings?

- In which areas does your country need to improve the most?

- How could regulatory reform play a role to improve the ease of doing business in your country?

References

[1]   OECD. Improving the Quality of Laws and Regulation. Paris: OECD; 1994.

[2]   OECD. Recommendation of the Council of the OECD on Improving the Quality of Government Regulation. Paris: OECD; 1995.

[3]   OECD. OECD Report on Regulatory Reform: Synthesis. Paris: OECD; 1997.

[4]   OECD. OECD Report on Regulatory Reform, Vol. 2, "Regulatory Quality and Public Sector Reform." Paris: OECD; 1997.

[5]   OECD. Regulatory Impact Analyses: Best Practices in OECD Countries. Paris: OECD; 1997.

[6]   OECD. OECD Report on Regulatory Reform, Vol. 2, Thematic Studies, S. Jacobs et al., "Regulatory quality and public sector reform." Paris: OECD; 1997.

[7]   OECD. Regulatory Reform in Korea, "Background Report on Government Capacities to Assure High Quality Regulation." Paris: OECD; 1998.

[8]   OECD. Good Governance and Regulatory Management. Paris: OECD; 2001.

[9]   OECD. Administrative Simplification Initiatives: Best Practices in OECD Countries. Paris: OECD; 2002.

[10] OECD. Regulatory Policies in OECD Countries; From Interventionism to Regulatory Governance. Paris: OECD; 2002.

[11] OECD. Taking Stock of Regulatory Reform. Paris: OECD; 2005.

[12] OECD. Guiding Principles for Regulatory Quality and Performance. Paris: OECD; 2005.

[13] OECD. Introductory Handbook for Undertaking Regulatory Impact Analysis (RIA) Version 1.0: October 2008

[14] OECD. Measuring Regulatory Performance. Paris: OECD; 2012.

[15] OECD. OECD Regulatory Policy Outlook. Paris: OECD; 2015.

[16] World Bank. Doing Business in 2004. Washington D.C.: World Bank; 2004.

[17] OECD. http://www.oecd.org/regreform/regulatory-policy/ria.htm.

LEADERSHIP FOR PRODUCTIVITY IMPROVEMENT

After studying this module, you will be able to:

1. understand what is meant by leadership and management, and the basic differences between the two;

2. analyze how leadership and management can engage in a mutual effort to achieve improved performance and effective results;

3. criticize and evaluate the roles of leadership and management that were practiced by some assumed great leaders and managers; and

4. understand how effective leadership is required to achieve high levels of public-sector performance.

The module consists of three units:

Unit 1: The Roles of Leaders and Managers

Unit 2: Competencies for Innovative Managers and Leaders

Unit 3: Training and Development

Introduction

Leadership is an age-old concept, as old as early human beings started to interact with each other to develop civilizations. It is a narrower concept than management. History tells us stories of a number of great leaders from all over the world who have been inspiring current generations. For decades, leadership theories and concepts have been the objects of extensive research, in particular those categorized within the government context. Yet, it remains a complex term and concept that researchers and scholars grapple with.

Indeed, the leader and the manager pertain to two distinctive roles within an organization that can be played either separately or combined together by a single actor. An official position held by an individual or a member of an organization can make him/her a manager, but not necessarily a leader. Any organization in both public and private domains needs to separate the two roles in order to achieve an effective and efficient improvement in organizational performance. In this case, public administration needs not only to understand how and when a manager or a leader should play their roles in running an organization, but also how leadership and management should be combined in pursuing the goal(s).

This module is aimed at developing awareness on what is meant by leadership, management, and the basic differences between the two, as well as to identify the basic competencies that a leader and a manager should have; analyze how to train and nurture leadership in improving performance; and create an environment in supporting great leaders and effective knowledge management.

Unit 1: The Roles of Leaders and Managers

Conceptual Definition

Leaders and managers are clearly different from each other. Although in many cases, the two cannot be easily separated from one another, there is a need to tell them apart. This section is intended to define what constitutes a leader and a manager.

Leadership can be defined in many ways. There are numerous definitions that are frequently used in order to understand what leadership actually is. A number of definitions are outlined below:

Bass [2] defines leadership as:

> "... an interaction between two or more members of a group that often involves a structuring or restructuring of the situation and the perceptions and expectations of members… Leadership occurs when one group member modifies the motivation or competencies of others in the group. Any member of the group can exhibit some amount of leadership."

This definition implies that leadership involves the use of influence by a leader on other members' behaviors and performance of the group. Even impersonal relationships can involve leadership. The definition stresses upon the importance of a leader being a change agent in the organization where he/she is placed.

In line with this, Gibson, et al [13] suggest that leadership is an attempt at influencing the activities of followers through the communication process and toward the attainment of some goal or goals. From the definition, the elements of influence, a leader and followers are clearly mentioned here, but the word goal(s) is another important keyword that is added. Leadership is about achieving predetermined goal(s) of an organization.

Lastly, Bertocci [3] defines leadership as the combination of characteristics or personality traits in an individual that compels the person to inspire others to achieve goals that, without the leader's motivation, would not normally be accomplished. The keywords from Bertocci's are inspiration and motivation that a leader could create in leading people. Followers would likely listen to what their leader(s) tell them to do when they are inspired and motivated.

From these definitions, we may conclude that leadership has certain preconditions to fulfill, like an influencing role, a change agent, predetermined goal(s), the art of leadership as well as inspiration and motivation. A clear vision from a leader can shape the future of the organization. Yet, leadership is not the only factor that organization needs. A structure that provides resources is needed too. Figure 11.1 shows how leadership and management are combined together to produce performance.

This is partly inspired by Jeffrey D. Zients, an American CEO, who in his statement before the budget committee of the USA's senate, in 2009, wrote:

FIGURE 11.1

THE LEADERSHIP-MANAGEMENT PERFORMANCE FRAMEWORK.
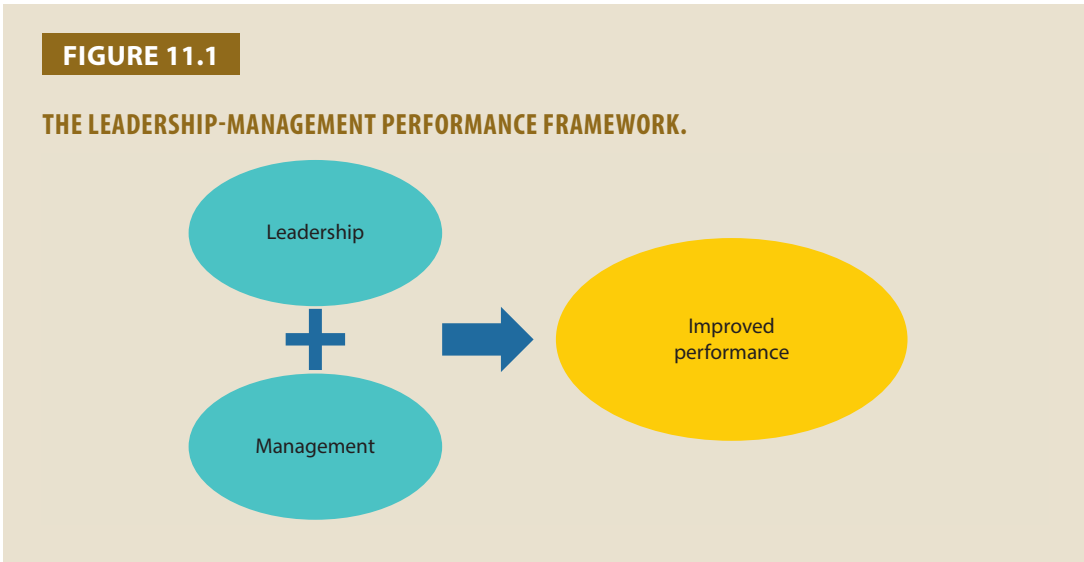
> "During my 20 years in the private sector as a CEO and advisor to CEOs, I found that leadership, measurement, and a motivated workforce create the foundation for good performance. I am confident that the same is true in government."

This module brings about the ideas of combining leadership and management style in order to help improve the performance of the organization where a leader/manager works. The central interest of the module is to help participants to understand how to lead and manage at the same time in order to achieve better performance as well as to accomplish organizational goal(s).

What Leaders and Managers do

This unit is aimed at making participant clearly understand what makes leadership concepts separate from management ones, and what makes leaders different from managers, or otherwise. There is a massive literature discussing leadership theories, and how leadership should operate with the management.

The Differences

Leaders do what managers don't, though the two are intertwined and overlapping subjects. In simplest terms, leaders are understood to do the right things, while managers do things right.

So, what makes leaders different from managers? Table 11.1 shows features that leaders and managers typically have.

TABLE 11.1

THE DIFFERENCE BETWEEN LEADERS AND MANAGERS.

Leaders	Managers
1. Leaders have followers	1. Managers have subordinates
2. Charismatic, transformational style	2. Authoritarian, transactional style
3. People and results focus	3. Work and process focus
4. Seek risk	4. Risk aversion

Leaders do not have so-called subordinates, while managers do. Yet leaders may have subordinates, only because they are also managers. Whenever a leader is about to lead, he/she has to give up formal authoritarian control, because to lead is to have followers, and following is always a voluntary activity. Meanwhile, by definition, managers have subordinates, unless their title is honorary and given as a mark of seniority, in which case the title is a misnomer and their power over others is other than formal authority.

Furthermore, leaders are considered more charismatic and ought to be transformational since leadership of organizations requires change and continuous improvement in organizational performance. Followers are likely to stop what they are doing when they are told by charismatic leaders. According to Gibson et al [13], transformational leaders on the other hand, make major changes in the firm's or unit's mission, way of doing business, and human resource management to achieve their vision and to attain improved organizational performance. Individuals like Lee Kuan Yew (Singapore), Soekarno (Indonesia), or King Bhumibol (Thailand) possessed an attractiveness and strong character that enabled them to make difference(s) with citizens, employees and followers. Their leadership approach is referred to as charismatic.

In addition, through his research, Bass [2] suggests five factors that describe a transformational leader:

1. **Charisma:** The leader is able to instill a sense of value, respect, and pride; and articulate a vision.

2. **Individual attention:** The leader pays attention to followers' needs and assigns meaningful projects so that the followers grow personally.

3. **Intellectual stimulation:** The leader helps followers rethink rational ways to examine a situation. He encourages them to be creative.

4. **Contingent reward:** The leader informs followers about what must be done to receive the rewards they prefer.

5. **Management by exception:** The leader permits followers to work on the task and doesn't intervene unless goals aren't being accomplished in a reasonable time and at a reasonable cost.

If we take a look at these five factors, the first three apply to transformational leadership while the last two apply to transactional leadership. Many managers are authoritarian and most of the time are practical and transactional. Subordinates work for managers and largely do as they are told. A manager may or may not engage in leadership. This is partly because a manager does not necessarily interact with other individuals in an organization and thus has no need to influence the behavior of his/her subordinates. Gibson, et al [13] wrote that transactional leaders will adjust goals, direction, and mission for practical reasons.

The third difference is that leadership focuses on goals, strategies and people, while management focuses on work and existing work procedures. Despite many leaders having a charismatic style to some extent, management work does not require a strong personality. This does not mean that leaders do not pay attention to tasks; in fact, they are often very achievement focused. What they do realize, however, is the importance of motivating others to work towards their vision and the related performance goals. Managers, on the other hand, are paid to get things done. Their subordinates also

do their jobs based on payment, and thus are nonvoluntary. They may also operate often within tight constraints of time and money, and thus naturally pass on this work focus to their subordinates.

Leaders appear as risk-seeking, while managers appear as risk-averse. When pursuing their visions, both consider it natural to encounter problems and hurdles that must be overcome along the way. They are thus generally comfortable with risk and will see routes, which others avoid, as potential opportunities for advantage and will break rules in order to get things done.

What Brings Them together?

While leaders and managers are distinctively recognized, Fairholm [11] suggests five perspectives to understand leadership in relation to management. The first is leadership as (scientific) management, where emphasis is placed on how to promote and maintain productivity through the well-known planning, organizing, actuating, and controlling (POAC) approach. The second is leadership as excellence management, which focuses on systematic quality improvement. The third is leadership as a values-displacement activity where the leader and the followers work based on shared values. The fourth perspective is leadership in a trust culture, where the leader and the led interact based on trust. The last perspective is called whole-soul (spiritual) leadership where displacing values and maintaining trust are at the heart of leadership. These perspectives offer a wide range of ways looking at how leadership operates with the management.

In some cases, both leadership and management can be played by a single actor. Bertocci [3] wrote that some leaders are very good managers and some managers are very good leaders. This implies that regardless the difference(s) that exist between the two, both can be played by a single individual at the same time.

The framework in Figure 11.2 from Gibson, et al [13] is quite helpful for those who study leadership in understanding how a leader's traits shape his/her behavior, affected by situational variables to accomplish effective results.

FIGURE 11.2

APPROACHES FOR STUDYING LEADERSHIP.

The leader's traits
Abilities
Personality
Motivation

The leader's behavior
Task-oriented
Person-oriented
Initiating structure
Consideration
Transactional
Transformational

Situational variables
Follower's needs
Task structure
Position power
Leader-follower trust
Group readiness

Effective results
Production
Quality
Efficiency
Satisfaction
Competitiveness
Devlpoment
Survival

Source: Gibson, et al [13].

Having understood what leaders and managers do and don't do, the framework in Figure 11.2 shows the way leaders reach effective results. From the beginning, leaders (and managers too) start their leadership from their respective levels of ability, personality, and motivation. Indeed, the potential importance of traits is endless. Effective leaders share certain abilities and skills that enable them to do their jobs, although the exact importance of a particular ability cannot be known with certainty.

These personal traits shape a leader's behavior, which can be either task- or people-oriented, and be transactional at times and transformational when needed. Transformational leadership may influence followers' organizational identification and aims to develop followers' full potential into leaders. It has a positive relationship with followers' psychological empowerment and organizational identification and insists on the leader's efforts to increase followers' development [24, 27, 31]. Other characteristics of transformational leadership are summarized as follows:

1. It promotes performance information usage [30].

2. It increases organizational goal clarity, encourages a supportive organizational culture, and asks followers to look beyond self-interest [25].

3. It ponders over the needs of the organization and focuses on the employees toward collective outcomes as well as on innovation [24].

4. It may foster innovation and performance, has direct effects on both goal clarity and developmental culture, and can observe an indirect role in organizing the success of outstanding management processes [24].

5. It raises employees' awareness of the relevance of organizational values and outcomes [37].

6. It functions as a role model, building employee confidence and pride in the organization, and intellectually stimulates followers to impugn old assumptions about organizational problems and practices [28].

7. It motivates employees about the relevance of their work and connects employees' work with organizational targets and employees' values [29].

The leader's behavior is more or less affected by situational variables such as followers' needs, task structure, position and power, leader-and-follower trust, and group readiness. Finally, the engagement of leadership and management will result in a high level of productivity, quality, efficiency, satisfaction, competitiveness, development, and survival.

The Leadership Component of the Business Excellence Model for Improving Productivity

Many APO member countries utilize the Business Excellence Model [42] to promote performance improvement in their private and public-sector organizations, as well as to recognize performance excellence through a program of national awards.

Most Business Excellence Models are based on the Malcolm Baldrige Award framework, first developed in the USA. The Baldrige Excellence Model includes leadership as one of its most important components, as shown in Figure 11.3.

FIGURE 11.3

THE BALDRIGE EXCELLENCE MODEL.

Organizational profile

Strategy

Workforce

Leadership

Integration

Results

Customers

Operations

Measurement, analysis, and knowledge management

Core values and concepts
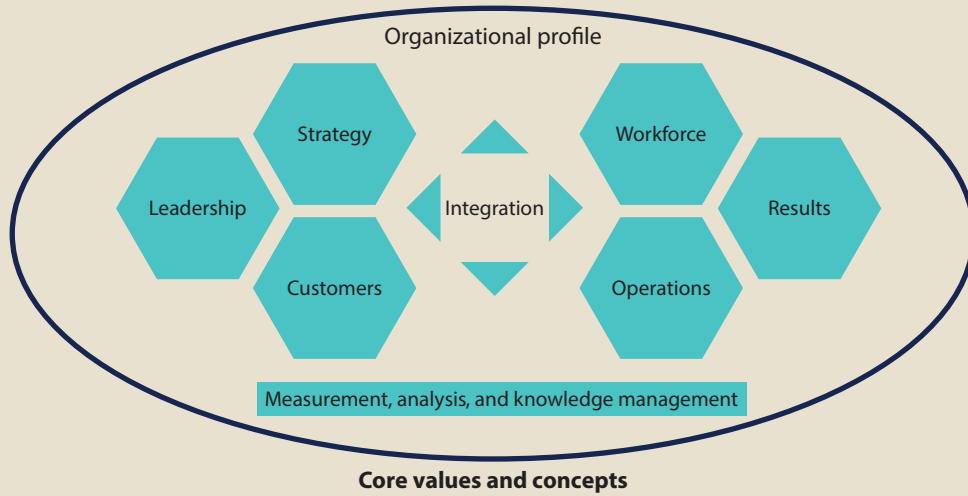
Source: Gibson, et al [13].

According to the Baldrige Model, effective senior leaders have the following roles [43]:

Senior leaders in central roles: "Senior leaders play a central role in setting values and directions; communicating, creating, and balancing value for all stakeholders; and creating an organizational focus on action, including transformational change in the organization's structure and culture, when needed. Success requires a strong orientation to the future; an understanding that risk is a part of planning and conducting operations; a commitment to improvement, innovation, and intelligent risk taking; and a focus on organizational sustainability. Increasingly, this requires creating an environment for empowerment, agility, change, and learning."

Senior leaders as role models: "In highly respected organizations, senior leaders are committed to establishing a culture of customer engagement, developing the organization's future leaders, and recognizing and rewarding contributions by workforce members. They personally engage with key customers. Senior leaders enhance their personal leadership skills. They participate in organizational learning, development of future leaders, succession planning, and recognition opportunities and events that celebrate the workforce. Development of future leaders [19] might include personal mentoring, coaching, or participation in leadership development courses. Role-model leaders recognize the need for transformational change when warranted and then lead the effort through to full fruition. They demonstrate authenticity, admit to missteps, and demonstrate accountability for the organization's actions."

Learning Methodology

This section is aimed at making the participants involved in a further learning process by actively participating in the class activity. The trainer/facilitator has to encourage all participants to take part in this session by dividing participants into several groups. Each group will be assigned a task.

Having learnt about what leaders and managers actually do and don't do, let us take a look at a number of well-known persons who are globally recognized for their leadership successes in their

respective fields. These are only examples for the purpose of the module. The participants will be asked to analyze the leadership characteristics of these individuals and critically decide whether they are examples of great leaders or great managers (why or why not).

1. Lee Kuan Yew

Read the Wikipedia article about the life of Lee Kuan Yew [44].

- How important was President Lee Kuan Yew's leadership to the economic, social, and civic development of Singapore?

- What were some of the main leadership attributes (values, competencies, and knowledge) that made him an effective leader?

2. Park Chung-hee

Park Chung-hee (14 November 1917–26 October 1979) was President and a military general who led the ROK from 1961 until his assassination in 1979. Park seized power through a military coup d'état that overthrew the Second Republic of South Korea in 1961 and ruled as a military strongman at the head of the Supreme Council for National Reconstruction until his election and inauguration as the President of the Third Republic of South Korea in 1963. In 1972, Park declared martial law and recast the constitution into a highly authoritarian document, ushering in the Fourth Republic of South Korea. After surviving several assassination attempts, including two operations associated with North Korea, Park was assassinated on 26 October 1979 by Kim Jae-gyu, the chief of his own security services. He had led the ROK for 18 years. [45]

3. Larry Page

Lawrence Edward Page (born 26 March 1973) is an American computer scientist and an Internet entrepreneur who cofounded Google Inc. with Sergey Brin in 1998. Page is the CEO of Google's parent company, Alphabet Inc. After stepping aside as Google's CEO in August 2001 in favor of Eric Schmidt, he reassumed the role in April 2011. He announced his intention to step aside a second time in July 2015 to become CEO of Alphabet, under which Google's assets would be reorganized. Under Page, Alphabet is seeking to deliver major advancements in a variety of industries. As of November 2016, he was the 12th richest person in the world, with an estimated net worth of USD36.9 billion. Page is the inventor of PageRank, Google's best-known search ranking algorithm. Page received the Marconi Prize in 2004 [46].

4. Jefff Bezos

Jeffrey Preston Jorgensen (born 12 January 1964) is an American technology entrepreneur, investor, and philanthropist. He is the Founder, Chairman, and CEO of Amazon.com, which became the world's largest online shopping retailer. The company began as an internet merchant of books and expanded to a wide variety of products and services, and most recently into video streaming and audio streaming. Amazon.com is currently the world's largest internet sales website [47].

Instructions

1. Ask the participants to share their views on these selected persons, based on both leadership and management perspectives.

2. Ask the participants to name other global figures from their own countries who can be considered as great leaders or managers. What qualities do they demonstrate as leaders?

3. Alternatively, ask participants to identify the most effective leader (or manager) they have worked with during their careers, and to identify the qualities that made them effective leaders and managers, as well as describe the improved organizational results they achieved.

4. Divide the participants into several groups and ask them to tell the story of the chosen person(s). Each group will have only five minutes to present their findings and analysis. Other groups should be given a chance to respond or raise questions.

Unit 2: Competencies for Innovative Managers and Leaders

Learning Objectives

After the completion of this unit, participants will be able to

1. understand the conceptual framework of the competencies that are needed by innovative leaders and managers, and

2. develop the competencies of leaders and managers in various fields to effectively meet all the needs of the organization.

Introduction

An effective manager must have specific competencies that include knowledge, skills, and ethics. A manager must understand the business processes and have knowledge of the managerial field to be able to run the organization well. Besides knowledge, a manager must have the skills both in technical fields (business, policies, and processes of the organization) and in managing the organization. In addition to knowledge and skills, a manager is also required to have professional ethics in running the organization according to laws, rules, and regulations.

Each level of management requires different knowledge and skills. Top managers need more conceptual abilities than technical abilities. Middle managers need conceptual and technical capabilities that are balanced, while the lower-level managers require more technical and operational skills. All three levels of managers require human relationship skills, since they all manage people vertically and horizontally. With good skills, manager are able to carry out their duties properly, so that organizational goals stated in the vision and mission can be achieved with a high degree of efficiency and effectiveness.

Managers today must be wise leaders who can effectively build and lead a harmonious and high-performing organization. Managers must be able to motivate the staff to work towards the organization's mission and goals, consistent with the organization's stated values. Managers must be able to encourage, empower, and give strength to the staff to effectively achieve the plans, goals, and targets of the organization. For that, a manager must have competencies and expertise in various fields, so that he or she can help meet all the needs of the organization. Here are four competencies that must be mastered by managers in order to achieve these goals:

1. Empowering Employees

Essentially, the empowerment of employees is needed by any individual, group, or organization to achieve maximum performance and productivity. Public organizations who wish to achieve high levels of performance and serve the community well must be flexible, and easily adapt and adjust to the changing needs of the environment.

This flexibility requires employees to be empowered. Employees are empowered not suddenly but over time. Public organizations need to build a management mindset that provides ample opportunities for its personnel to grow and develop to their potential, talent, and key competencies. As a result of empowerment, employees feel trusted and valued, and every employee feels a sense of job satisfaction. In this context, employee strive hard to achieve the goals of the organization and commitment to work is no longer a problem. In the long term, empowered employees will work hard and also provide innovative ideas and initiatives for the organization to resolve any problems faced. Organizational pride, awareness, commitment, and a sense of belonging are evident among the employees, and employees contribute ideas that promote higher levels of organizational performance.

2. Innovation

The public sector today is facing complex challenges that are difficult to overcome without making continuous efforts to be innovative. Public-service innovation [33] has become a means of public-administration reform. Various efforts have been made by governments, such as the streamlined government regulation, improved training and human resources services management, as well as improved processes and mechanisms of service delivery. Notwithstanding this significant progress, citizens continue to expect improved public-sector efficiency, better service delivery, and greater responsiveness to their needs. Faced with such conditions, governments around the world are applying quality and productivity tools to achieve continuous improvement in public-sector performance, whether in policy, service delivery, or regulatory activity.

Managers should support local heroes, by freeing up some of the innovator's time, providing a modicum of financial resources, and listening with an open mind to his or her proposals. Recognition is also needed when the innovation has been implemented. Other recommendations are to protect public servants associated with unsuccessful innovations and to support communities of practice and other initiatives to promote interorganizational dialogue. Also, support performance management systems because they encourage innovative problem solving. For a further study on promoting innovation, see Sandford Borins' Harvard University research on public-sector innovators [48].

3. Networking and Partnering

In this era of globalization, it is a fact that no one entity is able to be independent from other entities. Broadly speaking, public organizations urgently need networks (networking) and partnerships to achieve their goals. Although in the modern era, where everything can be controlled by cutting-edge technology, the success of a public institution or organization is still very dependent on the success of creating collaborative networks. In other words, social relationships at both organizational and the interpersonal levels are important.

4. Organization Resource Allocation

All organizations have at least four types of resources that can be used to achieve their desired goals, namely financial resources, physical resources, human resources, and technological resources. Effective resource management will ensure a successful implementation strategy for the organization's programs, within the resources provided.

The Conceptual Definitions of Competency

Competency is a fundamental characteristic of an individual, which is associated with effective performance. According to Spencer and Spencer [38], "A competency is an underlying characteristic

of an individual that is causally related to criterion-referenced effective and/or superior performance in a job or situation" [38]. The 'underlying characteristic' means that the competency is part of one's personality and that it has been ingrained and is longstanding and can predict behavior in a variety of tasks and work situations. 'Related causes' (causally related) means that the competency is causing or predicting the behavior and performance [14, 16, 18]. 'Reference criteria' implies the actual competency of predicting who is doing something good or bad, as measured by specific criteria or standards. Competency thus embodies a number of characteristics that are embodied in a person and indicate their ways of acting and thinking in the long term.

The competency of 'employee empowerment' is the competency of managers in granting authority to employees to plan, control, and make decisions about the work that they are responsible for, without having to obtain explicit authorization from the manager. Through their empowered employees, organizations strive to improve employee commitment to strategic and operational goals, promote employee commitment, and promote innovation.

The competency of 'networking and partnering' is the competency of managers in building partnerships with various stakeholders to form a mutual bond in certain business sectors or for a particular purpose so as to obtain better results.

The competence of 'innovation' is the ability of managers to create and convey an idea, practice, or object that is considered new. The manager is able to perform activities covering the whole process of creating and offering services or goods that are either new, better, or cheaper than previously available. An innovation may be a new product or service, a new production process technology, a new system structure, a new organizational structure, or a new plan.

The competency in 'allocating organizational resources' is the ability of the managers of public organizations in effective allocation and management of resources. To achieve the best results, the manager must have a strategy that is used to allocate existing resources. This resource allocation strategy plays an important role because if not planned properly it will be difficult to achieve organizational goals.

Competencies for Public-sector Performance Excellence
Employee Empowerment

Empowering employees means to enable and provide an opportunity for employees to perform some of the normally centralized management decision functions at their own level, either individually or in groups. Empowering employees is considered to be an important part of a modern human resource management system. Through the empowerment of employees, the organization will be able to optimally utilize its human resources and improve productivity as well as overall organizational performance.

Giving individuals the opportunity to carry out some management functions such as planning, implementation, control, and evaluation helps to develop employees' leadership skills and competencies. In this way, empowerment also creates a pool of employees who can become future leaders and managers. An empowered organization will be filled by people who have a commitment towards achieving organizational goals and can help achieve flexible and, responsive customer service in a challenging business environment. According to management expert Ken Blanshard, empowerment is a way to encourage internal entrepreneurship, a sense of ownership, employee engagement, and employee commitment to organizational goals.

Empowerment is the art of encouraging employees to work optimally. Empowerment is also related to organizational values. Empowerment requires a high level of honesty, openness, and integrity by the top management. Thus, empowerment is not simply about managers delegating authority to employees below, but also the value system the organization has adopted. The values of honesty, openness, integrity, and togetherness provide a bridge between the leader and subordinate leaders in the implementation process of empowerment for the organization. If employee empowerment is not based on the values of the organization, then providing opportunities and empowering employees may lead to feelings of injustice among members of the organization.

According to Dessler [9], employees who have the capability, willingness, and opportunity should be given space to autonomously implement their responsibilities. In addition, employees should also be involved in planning, organizing, and managing the work more effectively and efficiently.

Basically, employees within an organization will feel empowered when they are able to obtain information that is complete and correct; their authority and responsibilities are clearly understood; and understand the problems given to them to solve.

Johnson and Redmond [22] point out that the process of empowering the employees of an organization has five stages:

1. The process of information dissemination (informing)

2. The process of consultation (consulting)

3. The process of collecting ideas (sharing)

4. The process of delegation (delegating)

5. The process of empowerment (empowering)

This five-stage empowerment process is described in more detail in Table 11.2.

TABLE 11.2

THE FIVE STAGES OF AN EMPOWERMENT PROCESS.

Stage	Goal (objective)
Dissemination of information (informing)	Communicate everything related to the duties and responsibilities of employees and the things that determine such information: problems and changes that may occur, tactics and strategy of the company, targets to be achieved, and the current condition of the company.
Consultation (consulting)	Address various problems faced by employees in connection with their duties and responsibilities that are not readily understood by managers such as, provision of wages, salary conditions, working conditions, and performance evaluation results.
Ideas collection (sharing)	Share opinions or ideas about the relationship between the job and the performance problems that occur in relationships, the idea of innovation, change, and sharing in decision making.
Assignments (delegating)	Clearly define the duties and responsibilities, the decision-making authority, and opportunities for self-actualization.
Empowerment (empowering)	Consider employees as embodying intellectual capital that can promote excellence through high commitment to their tasks and responsibilities.

Source: Johnson and Redmond [22].

Empowerment [5, 7, 12] in an organization involves two interested parties, namely managers and subordinates, or managers and employees. Leaders and managers therefore have the responsibility to empower specific employees.

In the past, organizations placed managers at the top of the pyramid, with all the authority invested in them, so that employees were positioned as a mere means of production. On the other hand, in modern organizations every person becomes a leader (leadership from everybody). Through the establishment of the mindset that everyone is a leader at one's own level, employees are encouraged to develop their own talents of leadership. With the concept of 'everyone as a leader,' it becomes easier to develop quality, competence, and commitment in every employee. Moreover, it is easier to align all employees with the organization's vision and goals.

Poorly performing organizations are generally characterized by

1. the lack of a clear vision and clear goals articulated by the leader;

2. lack of support and commitment from subordinates/followers;

3. lack of financial and stakeholder support;

4. the emergence of organizational conflict vertically or horizontally; and

5. a dysfunctional organizational culture that is not offset by the creation of systems, structures, and a shared mindset that support the success of the organization.

Poor leadership leads to poor organizational capacity and poor performance.

The absence of support from subordinates/employees in leadership is often due to the lack of attention and appreciation given by the manager to employees, and the lack of opportunity for employees to empower themselves in order to exploit all their capabilities and skills. When employees are engaged and empowered, benefits accrue for individuals and working groups, and even more, for the organization.

The spirit of employees in expressing ideas, innovations, and concepts in the workplace should be guided by the provisions of a strong and clear organization vision and mission. This is important because the vision explains the organization's hopes, desires, values, and future goals. It should be understood by all members of the organization in order to align the work of employees with the successful achievement of the vision and goals, as well as the way or working together. Leaders who are not able to formulate a vision, mission, goals, and a clear strategy will experience constraints communicating the vision and mission to employees. In short, employees need to know exactly what the vision and goals are and should be empowered by leaders and managers to help achieve them.

When a leader is not able to communicate the vision, mission, and goals of the organization comprehensively, there will be a tendency towards confusion and internal conflict, followed by the development of dysfunctional working conditions. A leader is successful, when he or she is able to lead effectively and efficiently in a way that it can be the source of strength for the organization.

In the early 1980s, we began to see both internal and external changes in the organizational environment, e.g., technology, rising public expectations, a more educated workforce, and globalization that have

had a significant impact on both private and public-sector organizations in terms of achieving long-term sustainable success. Therefore, there is a challenge for the present generation of leadership to handle, plan, and implement change successfully. Management experts have highlighted the role of leadership as a strategic asset that organizations need to address and deal with the challenges of fast-changing business and government trends. In this context, management experts have highlighted the important role of visionary leadership, strategic management, change management, and constant innovation as key components to successfully manage organizational change and still achieve continuous performance improvement.

Networking and Partnering

Networking is essentially a process of building a communication or relationships to share ideas, information, and resources on the basis of mutual trust and mutual benefit between parties, and is often manifested in a memorandum of understanding or a partnership agreement to achieve mutual success. Managers of public organizations in building networks should pay attention to some of the following fundamental requirements for establishing successful networks and partnerships:

1. There are two or more parties in organizations/institutions.

2. They have a common vision in achieving the goals of their organizations.

3. There is mutual agreement/understanding.

4. There is mutual trust and mutual need.

5. There is a joint commitment to achieve greater performance levels through collaboration.

In addition, managers of public organizations should also consider the following principles in building the network/partnership as follows:

Common vision and mission: Partnerships should be built on the basis of a common vision, mission, and goals of organizations. The similarity in the vision and mission provides the motivation and adhesive patterns of partnership. Two or more institutions can work together to achieve the same goal.

Trust: Once there is a common vision and mission, the next principle which is no less important is the need for trust between the parties that partner. Therefore, trust is the basic capital to build networks and partnerships. A partnership must be based on trust and upheld though honesty and integrity.

Mutually beneficial: The principle of mutual benefit is a strong foundation in building partnerships. If a partner feels aggrieved, and is not feeling a benefit, it will disrupt the harmony in working together. Partnership between the parties should each contribute according the respective roles and no partner should feel disadvantaged.

Efficiency and effectiveness: By synergizing multiple sources to achieve the same goal, we can expect to increase efficiency, and effectiveness and reduce costs through collaboration. Efficiency improvement should also be matched by improvements in the quality of the process and results. Goal attainment can be higher if we work in collaboration with a partner. Partnership agreements help clarify the respective roles of the partners in achieving improved performance for both the partners.

Communication reciprocity: Mutual communication on the basis of mutual respect for each other is the foundation of building cooperation. Without mutual communication, there will be the dominance of one over the other that could damage relations that have been built.

A strong commitment: Network cooperation will achieve success firmly and permanently if there is a commitment towards each other to fulfill the agreements made together.

In order to provide optimal benefit in building a network [23], the manager needs to follow the below mentioned steps in building effective networks:

1. **Map:** Every organization needs to prepare a map of those institutions/organizations that might be invited to cooperate in partnership agreements for mutual benefit. The mapping should be based on the characteristics and needs of each organization.

2. **Dig for and collect relevant information:** Once the mapping is done, the next step is to dig up information about the organization's objectives, scope of work (cultivated fields), and vision. This information is useful to explore the possibility of establishing networks and partnerships. The collection of information can be done with a personal approach, both informal and formal.

3. **Analyze information:** Based on the data and information collected, one should analyze and establish or assess a list of potential partners relevant to the problems and opportunities that the organization is facing.

4. **Assess the potential for cooperation:** Following the results of the analysis of data and information, there should be a more in-depth assessment and intense discussion with parties about potential collaboration. Assessments can be done by way of presentations on the profile, mandate, and goals of your organization, and through identification of programs that are candidates for cooperation, both formal and nonformal.

5. **Prepare the cooperation plan:** If several parties have agreed to cooperate, then the next step is the preparation of a plan of cooperation. The planning should involve the parties that will partner so that all the aspirations and interests of each party can be identified and agreed.

6. **Make a deal:** For parties that want to partner it is necessary to formulate the roles and responsibilities of each party with respect to the activities that will be carried out, as outlined in a memorandum of understanding (MOU).

7. **Signing the cooperation agreement:** The MOU that has been formulated and agreed among the parties is subsequently formally signed by the partners.

8. **Implement the activities:** This stage is the implementation of the cooperation plan that has been prepared jointly in order to achieve defined goals. Implementation of activities is undertaken in accordance with the agreed responsibilities and roles of each partner as defined in the MOU.

9. **Monitor and evaluate:** During the implementation of the cooperation agreement, it is necessary to monitor and evaluate actual versus planned performance. The purpose of

monitoring is to assess the progress of implementation of activities so as to prevent the occurrence of devotions from the objectives to be achieved. In addition, monitoring of the implementation allows for the identification of solutions to the problems that arise in the implementation. Monitoring of results can be used as a basis for evaluation of the success of the partnership agreement. Results should be evaluated together with the partnership between the parties to determine which objectives have been achieved and which have not, and what problems or weaknesses have arisen that hinder the achievement of the mutually agreed goals.

10. **Make improvements:** The results of the evaluation by the partners should be used as basis for further improvement and decision making, whether the cooperation will be continued in the next year or not.

11. **Plan for the next phase:** If the parties consider it important to continue the cooperation, then they need to re-plan the activities that will be implemented in the next planning period. Subsequent planning needs to consider the results of the evaluation and reflection before the next phase is developed. Also, it may be deemed necessary to extend the existing partnership contract with or without changes to the MOU.

Two common types of partnerships in the public sector these days are, public-private partnerships [49], and one-stop service partnerships among several government agencies [50].

Innovation

Recent developments indicate progress in the use of continuous innovation in the field of public administration. In countries such as the ROK, the concept of innovation has even replaced the concept of reform. Korean experience shows that the application of innovation in the country has been improving the quality of governance at the local level. The Canadian public sector has also promoted innovation as a tool for improving government policies, services, and administration. Likewise, innovation across the government bureaucracy has been very conducive to the development of PR China's economy and technology.

More recently, the OECD has developed an international innovation network for public officials to share their innovations with each other. All this shows that the importance of innovations as a driver of improved public-sector performance. According to UNDESA reports on innovation [40], the public sector must innovate for several reasons:

- **Democratization:** The phenomenon of democratization has spread around the world, beyond the limits of sovereignty, ideology, and politics of nations.

- **International agreements/globalization:** International treaties as a consequence of globalization and the interaction among nations in the framework of cooperation.

- **Brain drain:** The phenomenon of human capital flight that occurred from developing countries to developed countries, resulted in an imbalance of distribution of human resources between them. As a result, the political, social, and economic gaps between the developed and developing countries has widened.

- **The post-conflict countries adopting democratic reforms and economic transition:** Some countries have just emerged from a period of conflict and political instability as a

result of war or domestic political friction. The post-conflict period offers opportunities for public-sector innovation.

- **The need for moral and ethical public servants:** Morality and strong professional public-service values and ethics have become important drivers of implementing good governance principles and structuring a better performing and more accountable bureaucracy.

- **New sources of competition (privatization and outsourcing):** Privatization and outsourcing are organizational phenomenon that have penetrated the public sector for several decades. This resulted in structural changes, new management challenges, and changes in workplace culture as well as the dynamic environment of public organizations.

According to the Australian National Audit Office, the notion of innovation in the public sector may be described in the following way:

> "Innovation in the public sector context has been defined as the creation and implementation of new processes, products, services, and methods of delivery which result in significant improvements in the efficiency, effectiveness or quality of outcomes."

The definition of public-sector innovation by the UNDESA and the UN Habitat shows that the innovation involves new ideas and their effective application to achieve better performance. From the Australian National Audit Office definition, we can conclude that the public-service innovation is not limited to creative ideas, but also to their application to improve either or all of the public sector's efficiency, effectiveness, and quality of public services.

Innovation is the process of thinking about and implementing an idea that has elements of both novelty and expediency. Following that, there are four important points or prerequisites to initiate innovation in the public sector:

1. First, maximizing the intellectual capital of a new employee through an integrated and transparent process based on the merit system

2. Second, designing the organization's activities such that they are open to and cultivate feedback

3. Third, maximizing the idea of drawing on the experience of other countries, by working through agencies or other organizations in the fields of business or government, or through the use of experts to identify innovative practices

4. Fourth, developing a multidisciplinary team with people of different backgrounds in order to promote synergies in identifying innovative solutions to organizational problems or achievement of goals

By collecting a variety of innovative ideas, staff energy, and other resources, the manager will get a more holistic and integrated framework for a particular innovation. Also, the use of a multidisciplinary innovation team will better ensure the quality of innovation and avoid one-sided perspectives. Public-sector innovation should start with a map of the problems that exist within the public sector itself, namely by identifying the critical elements of the public sector's performance

framework. These elements are: procedures and policies; organizational structure; the culture of the organization, and the human resource capacity.

An innovative public sector is a crucial prerequisite in building a future high-performing public sector. In order for the public sector to operate efficiently and responsibly, it is necessary to create innovative systems for the performance of government tasks such as policy creation, service delivery, and regulation. Continuous innovation is required in an environment of constant change. In addition, continuous innovation requires an organizational culture that promotes and rewards innovation to support the innovators within the organization. Innovative public-sector managers need to adopt a systematic approach to the innovation process, by

1. identifying the goals of the innovation process (e.g., lowering costs, improving service delivery, and improving program effectiveness);

2. systematically and effectively implementing the innovations; and

3. measuring and evaluating their degree of success, as well as the lessons learned.

Innovative public officials also need to embody three basic ingredients, namely, leadership skills, including a high degree of curiosity and creativity; honesty; and a sense of ownership of the innovation process and its outcome. Without these three critical elements, innovation will not be done properly.

Other factors that influence innovation in public-sector organizations include the lack of accountability and transparency of information through the mass media so that people can easily obtain information quickly and efficiently.

The types of public-sector innovation and determination criteria are detailed below.

1. Process Innovation
This involves improved quality of work processes, both internally and externally, making them more efficient and simpler. Improvement of work processes that are slow, complicated, and convoluted are replaced by systems that are more efficient for employees and clients alike. This involves mapping existing forms and processes and finding ways to streamline them.

2. Methods Innovation
Implementation of new strategies and new techniques is done to achieve better results. The most common innovation method in modern times involves the use of information technology.

3. Product Innovation
The creation or modification of goods or services is done to improve the quality, image, and functionality of the goods or services. The product can be physical (goods) and nonphysical (services).

4. Conceptual Innovation
This involves a shift in perspective on the problem, so as to bring a solution to the problem. Conceptual innovation is innovation that starts at the mental level (cognition and imagination). A problem that has plagued organizations is viewed with different perceptions and perspectives that

are new, more positive, and innovative. An example might be a shift to a prevention strategy in dealing with major societal health issues.

5. Technological Innovation

This is about the creation or use of new technology that is more effective and is able to solve the problem. Technology is for the creation, modification, usage, and knowledge of tools, machines, techniques, skills, systems, and methods of organization to solve problems, improve the solutions that have been around, achieve goals, handle the input-output relationship, or perform a specific function.

6. Organizational Structure Innovation

This is about the adoption of a new organizational model that replaces the old models that do not fit the organization's development in a changing environment. How an organization is structured will greatly affect the performance, effectiveness, and success in achieving its goals. This can involve privatization or changing departmental structures into government corporations, or even the devolution of program delivery to other levels of government or the nonprofit sector.

7. Relationship Innovation

This involves forming new mechanisms in dealing with other parties to achieve common goals. Every organization, especially the public sector, must relate to outsiders. In order that the objectives are achieved more easily and resources are used more intelligently and effectively, organizations need to build and assemble a mechanism of relations with external parties in an innovative way, through mutual benefits and enablement. Partnerships are an important tool for carrying out innovations in organizational relationships.

8. Human Resources Development Innovation

Policy changes are used to improve the quality of the value and capacity of human resources (HR). HR is the main asset of an organization. With qualified HR, the organization will be empowered to achieve its vision and mission. Training, empowerment, talent management, and employee engagement initiatives are among the current types of HR innovation.

Resource Allocation

Resources are essential to supporting the activities of public organizations. In practice, every organization has the strategy and processes in place to allocate existing resources. This resource allocation strategy plays an important role because if not planned properly it will be difficult to achieve organizational goals.

The availability of resources will determine whether the organization's objectives can be implemented. Thus, the availability and allocation of the necessary resources to implement a policy or a program should be carefully considered by policymakers. So, it can be said that the allocation of resources is vital to the organization's performance. There are four types of resources: human resources, physical resources, financial resources, and technology resources. A strategic management of resources [17] ensures that programs can be implemented effectively to achieve the organization's priorities and objectives [6, 8].

Effective resource allocation does not guarantee a successful implementation strategy. Other factors must also be effectively managed, including the management of human resources, establishing effective controls, and organizational commitment. Some of the factors inhibiting

effective resource allocation are, the constraints on the use of certain resources, emphasis on short-term financial criteria, politics, an unclear strategy, lack of necessary knowledge, and risk aversion. When managers are given responsibility for the implementation of major new strategies, they need to overcome these kinds of obstacles and obtain a clear mandate and the necessary resources; create the appropriate organizational structure; create necessary support from stakeholders and staff; and implement the plan effectively. In general, the process of implementing the strategy of resource management effectively and efficiently is as follows:

1. Determine the strategy and communicate the objectives.

2. Establish the main tasks to be carried out by the manager.

3. Establish the duty and authority to the relevant parts of the organization and its structure.

4. Delegate authority.

5. Allocate resources to the business units and functional departments.

6. Establish working guidelines for the organization as a whole.

7. Describe the various goals to be achieved by the managers.

8. Establish a mechanism for the measurement of achievements.

9. Develop an information management system as the input source in order to conduct monitoring and evaluation.

10. Set up a mechanism of rewards and sanctions to reinforce the desired behavior.

11. Develop the skillsets of the managers, associated with the objective as well as imparting values and culture of the organization.

12. Ensure that the control mechanism operates well.

13. Evaluate the results and provide feedback to the whole organization.

The problem of resource identification, allocation, and management is very important because it is able to support or even hinder the process of implementing the strategy and the achievement of goals. In detail, the role of strategic planning at the various levels or for other parties involved, particularly in resource utilization, is illustrated in Table 11.3:

Equally important is that the resource allocation decisions should be linked to organizational goals and the strategies to achieve those goals. In other words, the allocation of resources should support rather than hinder the achievement of organizational goals.

Learning Methodology
The learning process will use several methods, namely case studies, exercises, and lectures. Here are some cases in employee empowerment:

TABLE 11.3

THE ORGANIZING STRATEGY AND PLANNING FOR RESOURCE ALLOCATION.

Organizing strategy	Planner and resource allocation
The top manager	Decides the allocation and management of the necessary resource
The business unit managers	Decide the respective roles and capacities of each business unit
Strategy planning organization	Provides advice relating to objectives and the allocation and management of resources
Governing board or minister	Gives consideration and approval for the strategic dimension
Management consulting services	Provide consultation on how the allocation of resources should be done

Case 1: Nordstrom

An employee at Nordstrom is willing to pay the customers for damaged goods they received. This employee received an award from the company for his courage to take a decision in order to satisfy the customers. Related customers wrote to management praising the employee who took this initiative.

This is a case that is often presented in textbooks about empowerment because it is a good example of how empowerment should be done and how it should respond to the empowerment of employees [5]. In this case, the employee gets satisfaction for his initiative because it is valued by the company, consumers are satisfied because the complaint is well received, and the company gets satisfaction by retaining customers, future sales, and improvement in the company's image in the marketplace and the community.

Case 2: United Airlines

Dave Carroll, a singer, was a passenger flying on United Airlines. After landing, one of his band members saw a United Airlines employee throw his USD3,500 guitar in a way that broke it. The guitar repair cost was as much as USD1,200. Dave Carroll asked for compensation from United Airlines and submitted a complaint via e-mail and telephone. These demands were ignored by United Airlines. Nine months later, Dave Carroll released a song called 'United Breaks Guitar,' which subsequently ranked as the number one Country and Western Song on the iTunes UK's Download Chart. United Airlines finally relented and offered compensation amounting to USD3,000, which was eventually donated to charity by Dave Carroll.

Delays in resolving the broken guitar complaint resulted in quite a fatal market damage for United Airlines. Four days after the video United Breaks Guitar exit, United Airlines shares fell by 10%, with nominal losses of about USD180 million.

In this case, there was no empowerment from management to employees. Employees are not motivated to provide the best service for consumers because there is no empowerment from the company. As a result, the company suffered financial losses and non-material damage to the company's market image.

Case 3: Joko Widodo, as Mayor of Solo District, Central Java

President of Indonesia, Joko Widodo (Jokowi), when he was a Mayor (2005–11) of Solo District in Central Java, took very different approaches in solving public problems [35]. His leadership style in addressing public issues in Solo can be used as an example of how leadership does not just rely

on the authority or power to execute decisions. This coercive approach, widely used by leaders, just considers that people who break a rule should be punished. For Indonesian local government, what Jokowi does can be seen as a creative breakthrough in public-policy implementation that considers the essential aspects of humanity, i.e., the need to have one's existence respected.

When Jokowi was a Mayor at Solo District, he adapted the Phronetic leadership style. According to him, Phronetic leaders practice moral discernment about what is good and act on it in every situation. Judgments must be guided by the individual's values and ethics. Without a foundation of values, executives cannot decide what is good or bad. Jokowi's ability to judge goodness can be seen when he rejected a proposal from the head of local civil service police to sweep away the PKL (a term used for street vendors in Indonesia) using a coercive approach. Furthermore, he replaced the male head of local civil service policy with a woman. To get closer to citizens, Jokowi changed the uniform of local civil service police from a military-style uniform to a traditional uniform, which comes across as more people-oriented and friendly.

Unit 3: Training and Development

Learning Objectives

After the completion of this study, participants will be able to

1. understand the importance of strategic training and development; and

2. evaluate, criticize, plan, and develop training methods that are needed to tackle the development of leaders and managers for the challenges ahead.

Introduction

Changes and developments in the strategic public-sector environment often demand a quick response. Global issues, such as advances in science and technology, competition between states, economic disparities between regions, climate change, environmental issues, urbanization, the energy crisis, and politics, are the real challenges faced by the world today. In various forms, these challenges form the reality faced by the public sector in the 21st century. The involvement of key stakeholders including government, the private sector, and civil society becomes imperative in realizing superior governance.

Governance systems must keep pace with these public-sector changes and challenges. Currently, public organizations in Europe, Asia and other regions are working hard to implement public-sector reforms to improve professionalism and performance, through organizational restructuring, revitalization of business processes, building values and organizational culture, as well as HR modernization. Programs of public-sector transformation are designed to realize the implementation of good governance, effectiveness, professionalism, and a high degree of accountability for performance.

The effectiveness of the public sector is highly dependent on the professionalism of public officials. In this context, the leadership of the public sector is the key factor to overcome the challenges and problems faced by the public sector. Public officials play a central role in the realization of governance that is responsive and adaptive.

There are a number of fundamental problems in managing the public sector, especially in the dimension of managing the human resources across the public sector:

1. Legislation in the field of HR management is often overlapping, inconsistent, unclear, and open to multiple interpretations.

2. The quantity, quality, and distribution of civil servants is not properly balanced by department and region. Also, there is often a low level of civil servants' productivity.

3. There may be irregularities and abuse of authority in governance processes.

4. The mindset and work culture of public officials may not fully support the creation of a bureaucracy that is efficient, effective, productive, and professional.

5. Public officials may not have developed the mindset of serving the people or achieving a better performance and may not be oriented to achieving results (outcomes).

To face these problems then is the great work of public organizations. In addition to solving external problems, the challenge must be to address the improvement of management and employee competence and to increase the professionalism of public employees. This challenge requires public leaders and managers to develop a strategic approach to training and development within public organizations and across the whole public sector.

Conceptual Definition

In the past, employee training was often not considered important by public-sector organizations. More attention was devoted to the activities of recruitment, selection, and placement as well as other aspects that tend to be routine HR management activities. Moreover, the training budget and HR development often became a victim of budget cuts in tight fiscal times. In such circumstances, when training and development programs are marginalized, improving the competence of public officials is difficult if not impossible.

In more recent times, the public sector has begun to realize that the training and development of public officials is the key answer to the many challenges of improving the productivity and overall performance of public-sector organizations. For example, countries in Asia such as Japan, the ROK, Singapore, and Malaysia have established training and development for public officials as a government priority, and have established training policies and public-sector training institutions to support and implement this priority.

Training

Michael Armstrong [1] defines, "Training is the use of systematic and planned instruction activities to promote learning." Armstrong emphasizes, "It involves the use of a formal process to impart knowledge and help people to acquire the skills necessary for them to perform their jobs satisfactorily." It is described as one of the several responses an organization can undertake to promote learning. For Armstrong, training is closely linked with the organization's efforts to improve learning for employees by providing the necessary knowledge and skills to achieve satisfactory levels of employee performance.

Reynolds [32] argues for a targeted approach to training, suggesting: "training has complementary role to play in accelerating learning: It should be reserved for situations that justify a more directed, expert-led approach rather than viewing it as a comprehensive and all pervasive people development solution. The conventional training model has a tendency to emphasize subject-specific knowledge,

rather than trying to build core learning abilities." Thus, according to Reynolds, a targeted training approach is needed, including the careful selection of the instructors and experts who conduct the targeted training programs.

Armstrong [1] states that there is justification for the implementation of a formal training when

- the work requires skills that are best developed by formal instruction;

- different skills are required by a number of people, which have to be developed quickly to meet new demands and cannot be acquired by relying on experience;

- the tasks to be carried out are so specialized or complex that people are unlikely to master them on their own initiative at a reasonable speed;

- critical information must be imparted to employees to ensure they meet their responsibilities; and

- a learning need, common to a number of people, has to be met, which can readily be dealt with through a training program (example include, induction into the organization or onboarding, and development of essential IT and communication skills).

Effective training programs use a systematic approach, which documents the skills required by employees as the main basis for designing training programs. The purpose of the training must be clear in terms of the knowledge and skills to be mastered and the expected performance outcomes. The skills and knowledge to be imparted and the ultimate performance goal of training form the basis of evaluation of the effectiveness of the training. In this case, the training program for public officials should be formulated as precisely as possible because the type of employment and occupation in the public sector is very varied.

Conceptually, there are a number of ways to create effective training programs, as proposed by Armstrong [1]:

- The content of the training should be related to the work contexts of the participants. Ideally, their work should be made a central feature of the subject matter. Every opportunity should be taken to embed learning at work.

- The training techniques used should be appropriate to the purposes of the course and to the characteristics of participants, i.e., their jobs, learning needs, previous experience, level of knowledge and skills, and how receptive they will be in being taught (motivated to learn).

However, before a training program is designed, it is very important to complete a training needs analysis (TNA). There is general agreement that the analysis of training needs is a best practice as a first step in a systematic approach to training. Menzel and Messina [26] have outlined the benefits of implementing a TNA as: the alignment of employee competencies with the organization's strategic plan; increased productivity and employee performance; improved quality of knowledge and skills; and improved behavior, attitude, motivation, leadership, and communication.

Menzel and Messina [26] define TNA as a review of the learning and development needs within an organization. It considers the skills, knowledge, and behaviors that people need, and tells how to develop them effectively. A TNA is considered to be the foundation of all training activities. In order to deliver appropriate and effective training that meets the needs of individuals as well as the organization and represents value for money, a TNA is essential.

Thus, in public organizations, a systematic approach to identify training needs will ensure that public officials who obtain training opportunities will learn efficiently and effectively. Menzel and Messina [26] state that a systematic approach to developing training programs includes a number of steps including the following basic elements:

- Determining the training need

- Choosing and designing the appropriate methods to address the identified need

- Planning and developing the training courses/programs

- Implementing the training program

- Evaluating the results of the training

Training Methods

Public-sector organizations must establish a number of key variables that should be considered when designing and implementing a training program. Some of these variables are as follows:

- In what way and by whom should training be presented?

- How often and how long should training sessions last?

It is generally assumed that training programs with longer time intervals between the program segments will have more impact than those with segments that are bunched together. This is especially true for supervisory training, where some form of behavior modification is the ultimate objective. Shafritz, Hyde, and Rosenbloom [36] state that almost all formats for training public-sector officials will fall into one of the following general categories:

1. **Skills training or demonstration:** This encompasses training to teach specific craft or equipment skills, either in-house or through an outside contractor, where the employee receives initial or refresher instruction about specific processes or skills.

2. **Coaching or on-the-job training:** This uses direct personal instruction, usually in the work setting, where an expert oversees initial work efforts by a learner and provides corrective advice and continual monitoring of work output.

3. **Formal-informal lectures or classroom instructions:** A variety of classroom methods are available to organizations whereby they can assemble and instruct groups of employees in-house or at nearby academic institutions. Organizations can and often do provide tuition reimbursement for outside course work that can be shown to be job-related.

4. **Job rotation programs:** This technique can be established on a number of levels and is designed to provide employees with varying work tasks and assignments in order to

increase and broaden their experience. Some offices have developed limited versions of this concept, usually called cross-functional training, where each job in the office is learned by each employee. More formal systems also exist, in which new employees are rotated through different offices to facilitate organizational familiarity or develop more general work skills.

5. **Special conferences and seminars:** These are special meetings of employees to discuss and exchange ideas about processes, problems, and techniques. The great advantage of this conference or retreat concept lies in assembling employees away from day-to-day operations to focus on a specific agenda that is usually change-oriented.

6. **Modeling, gaming, and simulation training:** A plethora of simulated real-life situations have been developed to provide individuals with various contrived experiences. Many 'games' involve extensive applications of role playing which afford participants the opportunity to view, analyze, and practice behavior patterns and related outcomes.

7. **Exchange and sabbatical programs:** The concept of getting the individual out of the organizational environment and into a totally different one for a substantial period of time up to two years represents the most advanced training concept. Exchange programs are worked out between different organizations to send their professionals to work in new positions, while sabbaticals involve sending an individual off to an academic/research program.

Since Shafritz, Hyde, and Rosenbloom [36] documented these training methods some years ago, computer and internet-based training programs have become increasingly important modes of systematic training. The advantage of online training programs is that they may be cheaper to implement and the employees can take the training programs at times that are convenient to them. Today, even university degree programs are available online via packaged training programs or live presentations by faculty using distance education platforms such as Skype. It is expected that online training will become a more and more important learning modality for public organizations and their employees in the years to come.

Strategic Human Resource Development
In addition to implementing training programs that are effective in improving the competence and actual performance of public officials, public organizations also need to implement comprehensive human resource development strategies.

Walton [41] states that strategic human resource development (HRD) involves introducing, eliminating, modifying, directing, and guiding processes in such a way that all individuals and teams are equipped with the skills, knowledge, and competencies they require to undertake current and future tasks required by the organization. A more explicit explanation of the importance of strategic HRD has been outlined by Armstrong [1] as: the fundamental aim of strategic HRD is to enhance resource capability in accordance with the belief that the human capital of an organization is a major source of competitive advantage. HRD is therefore focused on ensuring that the right quality people are available to meet present and future organizational needs. This is achieved by producing a coherent and comprehensive framework for developing people.

Armstrong [1] adds that the specific objectives of strategic HRD are to develop intellectual capital and promote organizational, team, and individual learning by creating an environment in which

employees are encouraged to learn and develop and in which knowledge is managed systematically. Public organizations need to adopt the concept of strategic HRD as part of organizational strategy to achieve higher levels of performance. Therefore, the organization's human resources should be acquired, developed, and managed systematically. Strategic HRD is a key management tool in the private sector and has similar importance in the public sector.

Armstrong has outlined a model of the Components of Strategic HRD as shown in Figure 11.4.

FIGURE 11.4

COMPONENTS OF STRATEGIC HRD.

Source: Armstrong [1].
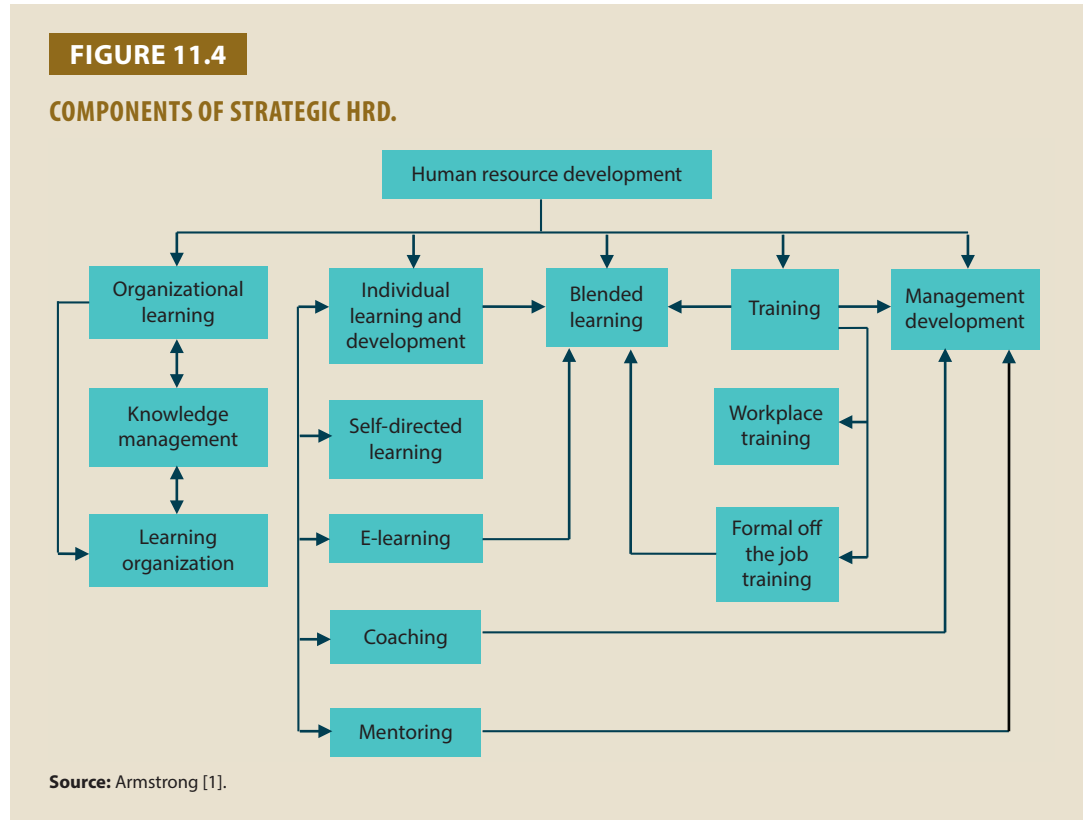
This model of training and development can be applied in public organizations to maximize the contribution of human resources to the achievement of the organization's goals. Systematic organizational learning and employee development and knowledge management are an absolute necessity for public-sector organizations today, if they are to achieve higher levels of performance.

Armstrong [1] quotes the Chartered Institute of Personnel and Development (CIPD), as follows:

> "The organizational process of developing people involves the integration of learning and development processes, operations and relationships. Its most powerful outcomes for the business are to do with enhanced organizational effectiveness and sustainability. For the individual they are to do with enhanced personal competence, adaptability and employability. It is therefore a critical business process in for-profit or not for profit organizations."

Elements of the learning and development process include the following:

- **Learning:** It is a relatively permanent change in behavior that occurs as a result of practice or experience.

- **Education:** It comprises the development of the knowledge, values, and understanding required in all aspects of life rather than the knowledge and skills relating to particular areas of activity.

- **Development:** This pertains to the growth or realization of a person's ability and potential through the provision of learning and educational experiences.

- **Training:** Training is the planned and systematic modification of behavior through learning events, programs, and instructions, which enable individuals to achieve the levels of knowledge, skill, and competence needed to carry out their work effectively.

Public-sector organizations need to manage the human resources using modern approaches that are realigned with the development and the needs of the organization. Public officials should have the professional competencies, values, and behaviors to achieve high levels of organizational performance in an increasingly global and changing world. Armstrong [1] proposed the overall philosophy of HRD as follows:

- HRD makes a major contribution to the successful attainment of the organization's objectives and investment in it benefits all the stakeholders of the organization.

- HRD plans and programs should be integrated with and support the achievement of business and HR strategies.

- HRD should always be performance-related and designed to achieve specific improvements in corporate, functional, team, and individual performances, and to make a major contribution to bottom-line results.

- Everyone in the organization should be encouraged and given the opportunity to learn, to develop the skills and knowledge to the maximum of one's capacity.

- Personal development processes provide the framework for individual learning.

- While we recognize the need to invest in learning and development and to provide appropriate learning opportunities and facilities, the prime responsibility for development rests with the individual, who will be given the guidance and support of his or her manager and, as necessary, members of the HR department.

Public-sector organizations must have the necessary organizational knowledge and the appropriate knowledge workers to deal with all the important tasks of the public sector. Peter F. Drucker [10] has noted the importance of the role of knowledge in the organization via a famous term, called 'knowledge workers.' This is the term for members of the organization for contributing significantly to organizational excellence based on their knowledge. Public organizations need knowledge workers to support appropriate decision-making process. If public officials take decisions that are wrong, it will trigger new problems for the government.

Boon-Siong [4] and Chen [28] conducted a study of strategic thinking in the Civil Service of Singapore. They identified three strategies for strategic thinking. First, 'thinking ahead,' is the ability to identify early trends that will occur in the future and have the potential to affect the field

work. Second, 'thinking again' is the ability and willingness to rethink the quality of knowledge that is used so that knowledge can work better. Third, 'thinking across' is the ability to learn from the experiences of others and adopt the good ideas of others.

Singapore understands that achieving the goal of making their public officials and public employees the best in the world cannot be achieved in a short time. To pursue its goal, Singapore has created a Civil Service College (CSC), which became the center of training and development of public officials in Singapore. Moreover, CSC Singapore also became a model for other countries that want to train and develop their human resources according to their needs. CSC provides training and development programs in such subjects as: economics, governance, human resource management, leadership and management, organizational development, personnel development, public finance, etc.

The UK also has a Civil Service College [20], with programs such as: accountability and governance, financial management and commercial skills, information digital and data management, law and legal awareness, leadership and management, professional development skills, policy skills, and customized in-house training.

In the case of the UK Civil Service College, instructors are highly competent, and their learning methods are continuously adapted to align with the best training practices in the world, supported by information technology as well as by excellent facilities. These factors make the UK Civil Service College an effective organization for training public sector officials and a good model for other governments to consider.

In recent years, the OECD has created a network of some 'national schools of government' to promote the sharing of knowledge, research, and training methods [34]. The objectives include linking the OECD and the experts from schools of government to share their experiences and knowhow, discuss emerging issues, and jointly identify possible solutions in implementing policy reforms and strengthening public-sector capacities as below:

- **Create** a professional community of practice by establishing an online OECD platform for information exchange.

- **Facilitate** policy dialogue between schools of government and the OECD.

- **Partner on** current capacity-building and skill development activities.

- **Monitor** in-research and country-specific activities.

Among the Asian members are national training institutions and universities from the Philippines, the ROK, India, Kazakhstan, Malaysia, and Singapore.

The priority areas identified for collaboration by OECD Network members are following:

- Embedding cutting-edge innovation in the public sector

- Strengthening employee engagement (motivation) and leadership

- Open, inclusive, clean, and accountable government for restoring trust

- The impact of technology on governance, public-sector decision making and key public servant competencies

- Strategies for improving the productivity and effectiveness of public services

- Evaluation and performance measurement (strategic enablers for driving government performance and accountability)

In addition to the in-house, government training institutions, lie the UK and Singapore CSCs. Many universities worldwide also conduct training programs in program administration and public policy in order to develop the competencies of current and future government officials.

A number of universities, institutes, and leading high schools in Asia, Australia, America, and Europe serve as other resources for the development of competent and effective public officials and their staff through degree and certificate programs. These institutions are

- Lee Kuan Yew School of Public Policy in Singapore,

- The Australia and New Zealand School of Government,

- Korean Development Institute (KDI) School of Public Policy and Management,

- John F Kennedy School of Government at Harvard University,

- Crawford School of Public Policy, Australian National University, and

- The University of Tokyo.

Leading for Improved Quality and Productivity: A Synthesis

After discussing the importance of leadership in public sector, this section moves forward to understand the roles of the leader and the manager in setting performance goals, creating a performance improvement plan, implementing the plans, and monitoring performance. This section could include a case study of how a leader improved the performance of his or her agency. For achieving learning outcomes, the section uses the UK Government Competency Framework as a guide [39]. The UK Government bases its training and development programs on its competency models. For example, the UK Leadership Model is based on the competency model shown in Figure 11.5.

This Competency Framework allows the UK Civil Service College to develop a very targeted approach to training and development, where specific competencies and values are imparted to improve the efficiency, effectiveness, and professionalism throughout the UK public sector.

Competencies are defined as skills, knowledge, and behaviors that should be performed by leaders. These competencies are grouped into three clusters: set direction, engage people, and deliver results. The framework is useful for preparing civil servants to be able to work professionally. It is made up of ten competencies distributed into clusters.

The first cluster, Setting Direction, is a strategic cluster, and comprises three competencies: seeing the big picture, changing and improving, and making effective decisions. 'Understanding the big

FIGURE 11.5

THE CIVIL SERVICE COMPETENCY FRAMEWORK.

Source: UK Government [39].
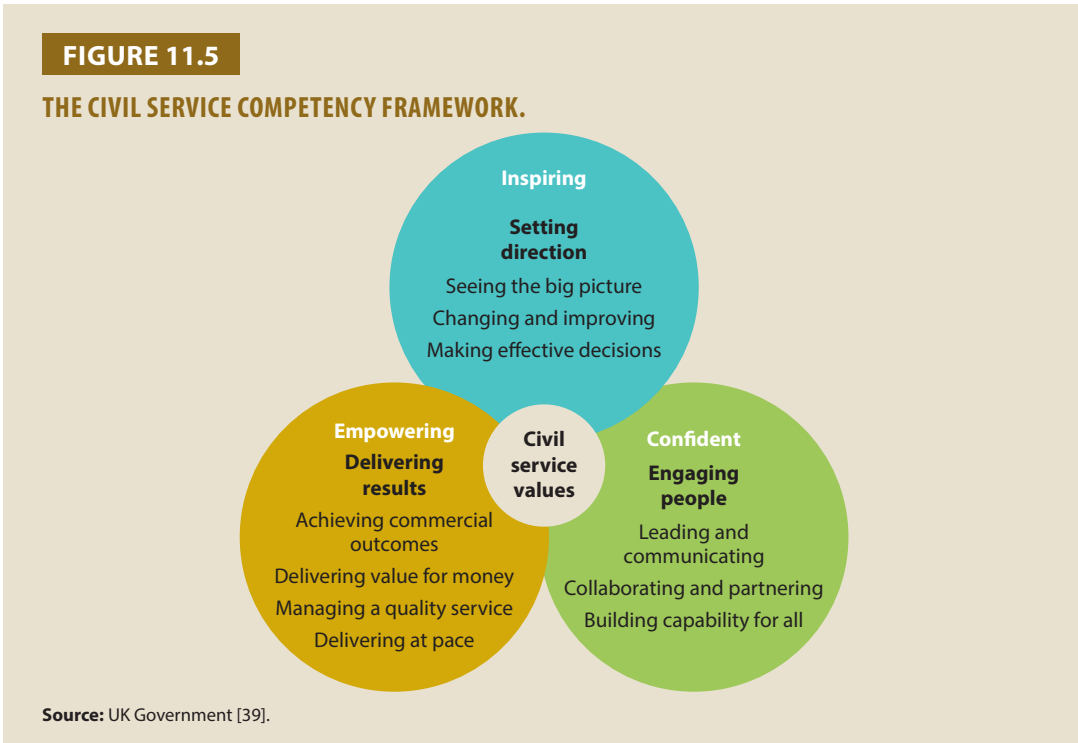
picture' is the first competency that should be mastered by civil servants. It refers to an in-depth understanding and knowledge of how the role of civil servant fits with and supports organizational objectives and the wider public needs and national interests. 'Changing and improving' is the next competency where initiative, innovation, and opportunities blend together, optimized by the civil servant in working place. The third competency refers to an effective decision making, based on sound judgement, evidence, and knowledge.

The second cluster (people cluster), which includes the leading and communicating competency where leaders are being visible, establishing a strong direction and persuasive future vision, as well as managing and engaging with people in a straightforward, truthful, and candid way. Leaders are also encouraged to collaborate and make partnership with people within organization. Lastly, leaders are effective when they take part in empowering others, developing capability of their own subordinates, and thus creating a learning and knowledge culture among organizational members.

The third cluster (performance cluster) is essential for an effective leader. In a public-sector organization, this can be translated into an effort towards pursuing public-sector outcomes. This includes delivering value for money, managing a quality service, and delivering at pace.

In brief, the roles that should be played by leaders in an organization can be summarized as shown in Table 11.4.

Each level of leadership in the organization would have specific behaviors that support these competencies, or otherwise. In terms of setting direction, each leadership level should deal with its respective environment. A top leader like a Director General, for example, should have a long-term vision and an understanding of strategic environment, while those in the lower levels deal with how to translate what has been decided by the upper level. All leaders must play their respective roles as are summarized in Table 11.5.

TABLE 11.4

THE ROLES OF LEADERS IN ORGANIZATIONS.

No	Cluster	Leaders' competencies	Impacts
1	Setting direction	1. Seeing the big picture 2. Changing and improving 3. Making effective decisions	Comprehensive understanding of the roles played in organization
2	Engaging people	1. Leading and communicating 2. Collaborating and partnering 3. Building capability for all	Leadership that involves people, not only in terms of participation, but also in order to empower people
3	Delivering results	1. Achieving outcomes 2. Delivering value for money 3. Managing a quality of service 4. Delivering at pace	Making the most of available resources to achieve both effectiveness and efficiency

Source: UK Government [39].

TABLE 11.5

COMPETENCIES AND ROLES REQUIRED AT DIFFERENT ORGANIZATIONAL LEVELS.

No	Cluster	Competencies	Leaders' roles
1	Strategic cluster: Setting direction	Seeing the big picture	Scanning the political context and taking account of wider impacts to develop long-term implementation strategies that maximize opportunities to add value to the citizens and support economic, sustainable growth
		Changing and improving	Creating and encouraging a culture of innovation and allowing people to consider and take informed decisions
		Making effective decisions	Reaching evidence-based strategies, evaluating options, impacts, risks, and solutions and creating a security culture around the handling of information
2	People cluster: Engaging people	Leading and communicating	Being visible, establishing a strong direction and persuasive future vision; managing and engaging with people in a straightforward, truthful, and candid way
		Collaborating and partnering	Being approachable, delivering business objectives through creating an inclusive environment, and welcoming challenge however uncomfortable
		Building capacity for all	1. Investing in the capabilities of people, to be effective now and in the future, as well as giving clear, honest feedback and supporting teams to succeed 2. Creating a learning and knowledge culture across the organization to inform future plans and transformational changes
3	Performance cluster: delivering results	Achieving commercial outcomes	Identifying economic, market, and customer issues and using these to promote innovative business models, commercial partnerships and agreements to deliver greatest value; and ensuring tight commercial controls of finance, resources, and contracts to meet strategic priorities
		Delivering value for money	Embedding a culture of value for money within their areas/functions
		Managing a quality service	Creating an environment to deliver operational excellence and creating the most appropriate and cost-effective delivery models for public services
		Delivering at pace	1. Building a performance culture where staff are given the space, authority, and support to deliver outcomes 2. Keeping a firm focus on priorities and addressing performance issues resolutely, fairly, and promptly

By defining the specific competencies needed by the organization to achieve its goals, a Competency Gap Analysis can be undertaken to serve as the foundation of the organization's recruitment, development, and training strategy, as shown in Figure 11.6.

FIGURE 11.6

COMPETENCY GAP ANALYSIS: LINKED TO ACHIEVING STRATEGIC ORGANIZATIONAL GOALS.

Step one: Strategy	Step two: Data collection	Step three: Data analyses	Step four: Implementation
Strategy assessment	**Environmental scan**	**Gap analysis**	**Gap-closing strategies**
Review strategy and operational plans for workforce implications	Conduct supply and demand analysis	Use a competency assessment to compare current talent to future talent needs	Competency model
Establish leadership commitment and resources, build teams plan communication	Project the workforce supply and demand	Identify staffing gaps and surpluses	Recruitment selection retention
Develop work plans and timelines	Identify required competencies knowledge, skills, abilities and behaviors	Identify competency gaps and surpluses	Performance management
			Professional development
			Succession planning

The first step of analysis is to assess strategy by reviewing strategy and operational plans for workforce implication. This includes how to establish commitment, resources, and plan communication as well as develop timelines. The second step is scanning the environment by analyzing supply and demand and identifying required competencies. The gap analysis as the third step is to use competency assessment to compare current versus future talent needs, as well as to identify gaps with the staff and their competencies. Finally, there are the gap closing strategies, where competency model is developed, recruitment/retention is designed, and performance management is conducted as well as professional development and succession planning is done.

In relation to creating value, leaders need to recognize the public-service value chain, where trust, service, and people are included. This is as a response to recognize the decline of public trust over public institutions, where performance and identity are in place.

Because the value chain in the public sector is derived from the private sector, there are some adaptations, in terms of how measuring is done for the bottom of the government. Figure 11.7 shows a value chain developed by Heintzman and Marson as follows [15]:

The potential drivers of employee satisfaction and commitment include career path, fair pay, value to citizens, work environment, perception of management, and others. The citizen/client service satisfaction is driven by ease of access, timeliness, competence, courtesy, fairness, and outcome.

FIGURE 11.7

THE PUBLIC-SECTOR VALUE CHAIN.

| Employee satisfaction and commitment | → | Citizen/client service satisfaction | → | Citizen trust and confidence in public institutions |

Source: Heintzman and Marson [15].
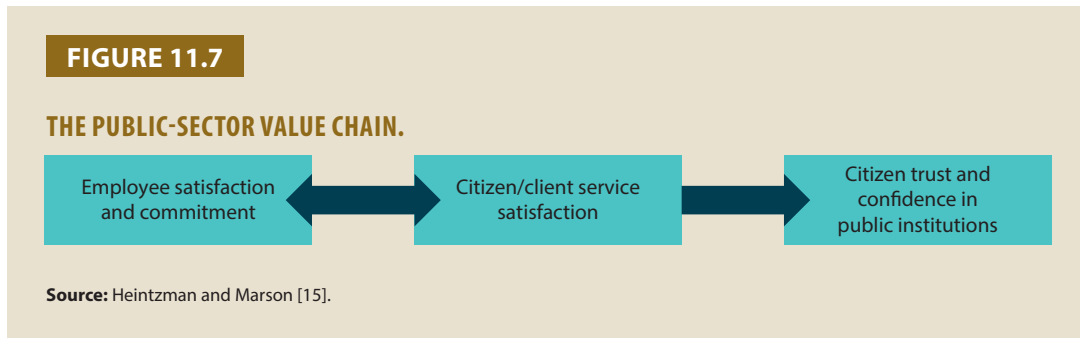
The first two points in the chain (employee engagement and service satisfaction) influence each other and result in the third point, which is public trust and confidence in public institutions. The third segment of the chain (trust in public institutions) is driven by service performance factors as well as by good management factors.

Lastly, training and development has a strategic value for the organization to create public-sector leadership that is effective, responsive, and professional. There are a number of attributes needed by leaders and public officials for present and future, including the following:

- **Competent and knowledgeable:** This requires that the leader has a high level of technical skill, is capable of executing public policy appropriately.

- **Attitude:** The leaders should be broadminded, imaginative, innovative, and visionary; open themselves to continue to learn; be able to absorb the information; and have a clear purpose and vision for the future.

- **Values:** They should have integrity and honesty, and be ethical, intelligent, and fair, while upholding the code of conduct.

Antony [21] suggested the analogy of leadership as follows:

"The only real training for leadership is leadership. You do not learn it by being an assistant or a deputy, only by being a boss. The advice Peter O'Toole gave to Michael Caine was that if he wanted to be a leading actor he must only play leading parts: much better to play Hamlet in Denver than Laertes on Broadway. In the same way, the best way to learn how to lead a big organization is by leading smaller ones."

Learning Methodology

1. Discuss how the three clusters of setting direction, engaging people, and delivering results, when combined, can create values.

2. Analyze the competencies needed in order to close the competency gap.

3. Ask participant to identify, discuss and develop the drivers and potential drivers of public-sector value chain in their respective sector.

4. Ask the participants to assess their respective organizational leadership and identify three areas for improvement using the Malcolm Baldrige Leadership Assessment Framework.

THREE AREAS FOR ORGANIZATIONAL LEADERSHIP IMPROVEMENT

VISION AND VALUES
Setting vision and values
How do senior leaders set your organization's vision and values? How do senior leaders deploy the vision and values through your leadership system, to the workforce, to key suppliers and partners, and to customers and other stakeholders, as appropriate? How do senior leaders' personal actions reflect a commitment to those values?

Promoting legal and ethical behavior
How do senior leaders' actions demonstrate their commitment to legal and ethical behavior? How do senior leaders promote an organizational environment that requires it?

COMMUNICATION
How do senior leaders communicate with and engage the entire workforce and key customers? How do they
- encourage frank, two-way communication, including use of social media, when appropriate;
- communicate key decisions and needs for organizational change; and
- take a direct role in motivating the workforce toward high performance and a customer and business focus, including by participating in reward and recognition programs?

MISSION AND ORGANIZATIONAL PERFORMANCE
Creating an environment for success
How do senior leaders create an environment for success now and in the future? How do they
- create an environment for the achievement of your MISSION and for organizational agility;
- cultivate organizational learning, learning for people in the workforce, innovation, and intelligent risk taking;
- create a workforce culture that fosters customer engagement;
- participate in succession planning and the development of future organizational leaders?

Creating a focus on action
How do senior leaders create a focus on action that will achieve the organization's mission? How do senior leaders
- create a focus on action that will improve the organization's performance;
- identify needed actions;
- in setting expectations for organizational performance, include a focus on creating and balancing value for customers and other stakeholders; and
- demonstrate personal accountability for the organization's actions?

Source: NIST [43].

References

[1]   Armstrong M. A Handbook of Human Resource Management Practice 10th Edition, London: Kogan Page; 2006.

[2]   Bass B.M., Stogdill R.M. Handbook of leadership, vol. 11. New York: Free Press; 1990.

[3]   Bertocci D.I. Leadership in organizations: There is a difference between leaders and managers. University Press of America; 2009.

[4]   Boon-Siong N., Chen G. Dynamic Governance. World Scientific Publishing; 2007.

[5]   Bowen D.E., Lawler D. The Empowerment of Service Workers: What, Why, How, and When. Sloan Management Review, Spring 1992; vol. 33, no. 3.

[6]   Certo S., Peter P. Strategic Management, New York: McGraw Hill; 1990.

[7]   Clutterbuck D. The Power of Empowerment. London: Kogan Page; 1994.

[8]   David F.R. Strategic Management: Concepts and Cases, 10th ed, New York: Prentice Hall; 2005.

[9]   Dessler G. Human Resource Management (11th Edition). New York: Prentice Hall; 2011.

[10]   Drucker P.F. Management Challenges for 21st Century. New York: Harper Collins; 2002.

[11]   Fairholm M.R. Different perspectives on the practice of leadership. Public Administration Review 2004; 64(5): 577–90. Retrieved from http://search.proquest.com/docview/19717024 2?accountid=63730.

[12]   Frey R. Empowerment or Else. Harvard Business Review; September–October 1993.

[13]   Gibson I.D., Ivancevich Jr J., Donnelly H.J., et al. Organizations: Behavior Structure and Processes (14th edition). New York: McGraw Hill; 2011.

[14]   Greenberg J. Managing Behaviour in Organizations. Fisher College of Business, The Ohio State University, New York: Pearson Prentice Hall; 2005.

[15]   Heintzman R., Marson B. People Service and Trust- is there a public service value chain? International Review of Administrative Sciences December 2005; vol. 71, issue 4: 549–75 pp.

[16]   Hersey P., Blanchard K. 1982. Management of Organizational Behavior. New York: Prentice Hall; 1982.

[17]   Hunger J.D., Wheelen T. Strategic Management (5th ed). New York: Addison Wesley; 1996.

[18]   Paul H., Blanchard K. Management of Organizational Behavior, New York: Prentice Hall; 1982.

[19] Hesselbein F., Goldsmith M., eds. The Leader of the Future. San Francisco: Jossey-Bass; 1997.

[20] https://www.civilservicecollege.org.uk/.

[21] Antony J. Management and Machiavelli: An Inquiry into the Politics of Corporate Life. New York: Holt Rinehart and Winston; 1967.

[22] Johnson R., Redmond D., The Art of Empowerment. Financial Times Pitman; 1998.

[23] Knoke D., Kublinski J.H. Network Analysis. Beverley Hills: Sage Publications; 1982.

[24] Ljungholm D.P. Transformational Leadership Behavior In Public Sector Organizations. Contemporary Readings in Law and Social Justice 2014; 6(1): 76–81. Retrieved from: http://search.proquest.com/docview/1550172326?accountid=63730.

[25] Mărășescu M.R., The Role of Hostile and Instrumental Aggression in Sport, Linguistic and Philosophical Investigations. 2014; 13: 170–75.

[26] Menzel K., Messina S. Training Needs Analysis (TNA), version 1. The Royal Australian and New Zealand College of Radiologists; 2011.

[27] Moynihan D.P., Pandey S.K., Wright B.E., Setting the Table: How Transformational Leadership Fosters Performance Information Use, Journal of Public Administration Research and Theory 2012; 22: 143–64.

[28] Boon Siong N., Chen G. Dynamic Governance, Embedding culture, Capabilities and Change in Singapore. World Scientific Publishing; 2007.

[29] Paarlberg L.E., Lavigna B., Transformational Leadership and Public Service Motivation: Driving Individual and Organizational Performance. Public Administration Review 2010; 70(5): 710–18.

[30] Peters M.A., Eurocentrism and the Critique of 'Universal World History: The Eastern Origins of Western Civilization, Geopolitics, History, and International Relations 2014; 6(1): 63–77.

[31] Rainey H.G. Leadership, Managerial Roles and Organizational Culture. In: Understanding and Managing Public Organization. San Francisco: Jossey-Bass; 2014, chapter 11.

[32] Reynolds J. Helping People Learn: Strategies for Moving from Training to Learning. Chartered Institute of Personnel and Development; 2004.

[33] Roger E.M. Diffusion of Innovation. New York: Free Press; 2003.

[34] OECD. http://www.oecd.org/gov/global-network-schools-of-government.htm.

[35] Sanusi A. Collaboration on City Planning: A Lesson from Mayor Joko Widodo (2005-2011), Knowledge Creation in Community Development: Institutional Change in Asia and Japan. Switzerland: Palgrave Macmillan; 2017.

[36]   Shafritz J., Hyde A., Rosenbloom D. Personnel Management in Government: politics and process. New York: Dekker; 1981.

[37]   Sorin D. "Welfare and Work: How and How Much Do TANF Cash Benefits Affect the Labor Supply of Single Parents?," Psycho-sociological Issues in Human Resource Management. 2014; 2(1): 34–50.

[38]   Spencer L., Spencer S. Competence at Work Models for Superior Performance. Wiley India Pvt. Limited; 2008.

 [39]   UK Cabinet Office. Competency Framework for the Civil Service. UK Government; 2012. https://www.gov.uk/government/publications/civil-service-competency-framework.

[40]   United Nations. Innovations in the Public Sector: Compendium of the Best Practices. New York: UNDESA; 2005.

[41]   Walton J. Strategic Human Resource Development. Prentice Hall; 1999.

[42]   APO. www.apo-tokyo.org/coe/files/Understanding-Business-Excellence.pdf.

[43]   https://www.nist.gov/baldrige/baldrige-criteria-commentary#leadership.

[44]   Wikipedia. https://en.wikipedia.org/wiki/Lee_Kuan_Yew.

[45]   Wikipedia. https://en.wikipedia.org/wiki/Park_Chung-hee.

[46]   Wikipedia. https://en.wikipedia.org/wiki/Larry_Page.

[47]   Wikipedia. https://en.wikipedia.org/wiki/Jeff_Bezos.

[48]   National Institute of Standards and Technology. http://www.businessofgovernment.org/report/persistence.

[49]   The Canadian Council for Public-Private Partnerships. http://www.pppcouncil.ca/.

[50]   Government of Canada. http://publications.gc.ca/site/eng/417379/publication.html.

CHANGE MANAGEMENT

At the end of this module, participants will

1.   understand the definitions of change in the public sector,

2.   know the various theories of change,

3.   know ways to manage organizational changes in the public sector, and

4.   be able to analyze cases of public-sector change and provide recommendations.

The module consists of the following three units:

Unit 1: Introduction to Change Management

Unit 2: Types of Change Management

Unit 3: Techniques and Leadership Skills for Change Management

Unit 1: Introduction to Change Management

Learning Objectives

1.   To articulate the essence of change management in the public sector

2.   To identify challenges to change management for public organizations

Introduction

Amidst rapid social, technological, and political changes in today's world, most if not all, public organizations must continuously change to stay relevant, competitive, and effective. This module focuses on change management in the public sector. It takes the perspective that leading a public organization is often about leading change [3]. If change is not part of the leadership goal, then it is more about administering or managing an organization rather than leading one. The challenge for many public leaders is that public organizations are often perceived as resistant to change. Some changes that do occur, are superficial and do not address deep-rooted values that permeate the organization.

One of the main obstacles to change is the inertia of bureaucracies. There is inherent tension between the rules-based culture and the entrepreneurial culture that is increasingly becoming more expected to come from within public organizations. To a certain extent, the tension grows from irreconcilable differences between process-oriented and goal-oriented groups of people. Bureaucracies often attract process-oriented individuals. The nature of bureaucracies is to preserve status quo and favor conformity to rules and processes, with the aim to ensure predictability, reduce discretionary-based decision making, and minimize public uncertainty and risk.

In addition, public officials in most Asian countries are accustomed to taking orders from superiors, making them reluctant to initiate change from the ground up. Hence, change management in the public sector has to address fundamental values that are deeply rooted in bureaucracies. In addition, resistance to change at the individual level frequently occurs due to fear, vested interests, limited resources, lack of trust, misunderstanding, and differing perceptions of a situation or context. The challenges to change can be overcome by carefully crafting and implementing the process of change. Hence, there is the need for training programs on change management in the public sector.

Furthermore, change is often expected when new leaders are appointed or elected to head the organization. Some leaders are successful at change management while many others are not. Many governments attempt to do large-scale administrative reforms, including dimensions related to budgetary processes, human resources management, decision-making procedures, performance evaluations, and structural change. Examples are plentiful in the New Public Management (NPM) era of the UK, the USA, and Australia. Some governments might take a more incremental approach by piloting change in selected organizations. Examples are such as autonomous universities and schools, and various types of quasigovernmental organizations. Some governments might be bold enough to make drastic changes such as abolishing entire ministries or merging some existing agencies to form a new one.

Successful change management means that the new policies, culture, or ways of doing things have stuck or taken root in the organization. In addition, the change should lead to better productivity and higher-quality services to the citizens.

Conceptual Definition

Change management is the act of directing an organization to adopt new ways of doing things and new ways of thinking that ultimately aims to improve productivity levels or to steer the organization on a new path. This can be in the form of producing new services or products, setting new missions for the organization, or establishing new values for members of the organization. Change management requires leaders to rethink the ways in which resources are utilized, work processes are designed, budgets are allocated, or decisions are made, and to imagine how it can all be improved significantly.

This section will provide a general understanding of change management and its significance in the public sector. Participants will debate how it is similar or dissimilar to normal management or managing for stability and continuity.

In this section, we will cover four topics regarding change management: magnitudes of change; drivers of change; outcomes of change; and the interconnectedness between 'change management' and 'reform' in the public sector.

1. Magnitudes of Change

In designing change for any organization, one must first consider the magnitude of desired change. The magnitude can be defined in several ways.

The first order of change focuses on the subsystems or structures of organizations. This level of change occurs within a part of the organization or its subsystem. It is usually considered an incremental change, when compared to the entire sector or large-scale reforms. For instance, setting up a new unit within an organization or abolishing an old one. It includes the act of changing certain procedures or processes.

The second order of change focuses on an entire organization. This magnitude of change is considered a type of transformational change. It comprises a shift in core organizational paradigms, which requires changes to the whole system. An example of such overhauling change is when the Singapore Prison Services changed their culture and mandate for prison guards to be guardians of lives or who work to help inmates change behaviors to become positive members of the society. Thus, the prisons guards were not focused on security and discipline, but on helping inmates lead better lives once they stepped out of the prison.

The third order of change focuses on sectoral reforms. This widest magnitude of change refers to large-scale reforms that require cross-organizational transformation and overhaul. The change would affect many organizations and that would change the conduct of industries or sectors. Examples include, nationwide public-sector reform projects such as privatization of state-owned enterprises, and the adoption of market-based mechanisms in government businesses or large-scale liberal welfare reforms.

For this module, our focus is the first and second orders of change. However, we have to bear in mind that sometimes the change at the organizational level is brought about due to the third order of change, which is initiated at a higher level of governance or externally by multilateral organizations such as the UN or the World Bank.

2. Drivers of Change

There are many sources of external drivers of change:

- New leadership (newly elected or appointed leaders)

- Political change (political systems, newly elected governments or political parties)

- Policy change, such as the introduction of new health funding system that affects all public hospitals, introduction of new public values, and new national strategies (e.g., Thailand 4.0 to boost the digital economy)

- Global pressures (socioeconomic forces, new emerging economies, shifts in world powers, wars and violent conflicts, or refugees and migrants)

- Financial pressures (financial crises, currency prices, oil prices, austerity measures, the emergence of digital currency, offshore markets, underground economies, etc.)

- Demographic change (aging society, Gen XYZ, migration, middle-class mobility)

- New technologies (robotics, internet of things, high speed computers)

- New power structures (complex stakeholder networks and new actors that emerge due to social mobility, new communication channels such as Facebook, and the congruence of related concerns or issues)

In a few cases, the change is driven from within the organization at the operational level. This can be due to the critical need to 'adapt or perish' for teams, units, and individuals. In order to determine sources of drivers of change (external or internal to the organization) a tool commonly used is strength, weakness, opportunity, and threat analysis (SWOT analysis).

Learning Exercise

Spend a few minutes to practice doing SWOT analysis by using the context of your respective organizations. Participants are to choose a familiar change scenario from their respective country contexts. They are to work in groups to identify the drivers of change and discuss the most critical drivers. This will take about 40 minutes.

3. Outcomes of Change

The ultimate outcome that public leaders expect of change management include better efficiency and higher effectiveness of the organization, which are pillars of higher performance and productivity. In addition, goals of change usually incorporate the aim to have happier people in the organization. This includes people with positive attitudes and constructive behaviors, which adds to overall good experiences for others in the organization. This is aligned with the understanding that higher organizational commitment, work satisfaction, and intrinsic motivation of employees are key factors to enhance organizational productiveness.

For the public sector, organizational productivity is an absolutely necessary goal because when public organizations are efficient and productive, citizens can receive timely and appropriate services for the best value. It proves that governments do work and can work.

4. Interconnectedness between Change Management and Reform

It is important to understand that many leaders of organizations are expected to manage change in their respective organizations due to larger attempts of public-sector reform. Public-sector reform refers to large-scale change attempts for the public sector. An example would be a nationwide civil service reform.

The Indonesian government is currently trying to reform human resources management of the public sector to be more performance-oriented as oppose to being seniority-based. This requires redesigning many components of the civil service system, including the level of scale pay, the appraisal process, and the appropriate links between policy/program key-performance indicators and individual performance indicators.

It might also be linked to performance-based budgeting, which requires a complete overhaul of how budgets are decided. It involves key agencies related to national-level planning, budgeting, public personnel, administrative matters, and in certain cases, agencies related to structural reform, or agencies (set up for reform) being directly answerable to the executive leader . In rolling out such large-scale complex reforms, each leading agency must first have change management strategies and plans to prepare the organization for new mandates, new ways of doing things, and new processes to follow. All other agencies in the government that belong to respective ministries will follow the reform strategy and implement changes in their respective organizations and subunits.

Another example would be a nationwide education sector reform. The Government of Thailand, for the past 10 years, has authorized many universities to be quasigovernment universities, thus allowing them to have higher degree of autonomy to take decisions on human resources, finances, and administrative procedures. At the same time, the government has pressured universities to compete in global university rankings with the aim of pushing universities to be more productive and responsive to societal needs. This set of complex reform strategy puts undeniable pressure for universities and their subunits to embrace the new direction and strive to manage the change successfully.

The last example would be of governments shifting their economies to be more integrated with the global economy. These include PR China, Myanmar, Vietnam, and others in the last decade. This shift from trade protectionist policy to global market-based trade policy requires a fundamental shift in mindsets of decisionmakers and employees of related agencies and bureaus. For instance, the immigration and customs authorities are required to facilitate faster, safer, and more efficient flow of goods at ports, borders, and checkpoints. Previous to this shift, they might have only focused on keeping goods out of the country and doing thorough checks on all items leaving the country. They now need to reorient their minds to redefine why they do what they do and how to do things differently when the 'why' has changed completely. The same applies to authorities who issue visas. Many governments that are competing for global capital, foreign investments, and investors, and that are keen to build better reputations for their countries, are focused on using technology and new modes of operation, such as contracting out, to streamline visa processes. Without such tangible change on how things are done, it would be impossible to achieve reform goals that aim to integrate with the global market.

Learning Methodology

A lecture for about 45 minutes will provide the introduction of change management and its linkages to wider government and administrative reforms. Under the drivers of change topic, we have a SWOT analysis activity. Participants will have time to debate and list out the elements of SWOT. From the activity, we will discuss the importance of detecting the drivers of change and the need to work with them rather than against them.

In the second half of the session, participants will be able to share experiences of their respective countries on national-level reform attempts that have succeeded and the ones that have failed. We will also discuss how those reforms have influenced the change that has occurred in their respective ministries or agencies. We will discuss those specific changes and compare our experiences.

At the end of this module, participants will be able to articulate different large-scale reforms and how they connect to change management at the organizational level. Participants will also be able to determine drivers of change and begin to identify challenges to change management.

Unit 2: Types of Change Management

Learning Objectives

- To explain models of change management

- To apply models of change management to real cases

Introduction

This section will narrow the focus to 'types of changes a leader can initiate.' There are many models and approaches to change management that have emerged from both private and public sectors. In this unit, participants will be exposed to seven approaches or types of change. These types help guide leaders and change agents in their visions and plans for the change process. The seven types of change are

1. incremental change,

2. radical change,

3. procedural change,

4. structural change,

5. cultural change,

6. dynamic change, and

7. continuous change.

The unit will cover these seven models of change. Cases and examples will be used throughout the section to illustrate the intricate details of these changes and their challenges. These changes, in real life, might be interlinked in certain situations. For instance, a structural change might be implemented to ultimately aim for cultural change.

Incremental Change

This model refers to changes that are taken in small steps and span over a long period of time, say, 5–10 years of small changes. This is the typical model of change that many managers choose to do. For instance, managers shifting 3% of budget from project A to project B in a given year and shifting another 3% in the subsequent year. They keep doing this for a number of years until enough resources have been moved for project B to succeed and project A to fold up. Eventually, after a number of years, the organization is known for project B rather than project A.

Another example is when leaders decide to focus on professional development of staffs. Training and development naturally take a longer time to implement and see tangible results, when compared with other initiatives such as establishing new teams. However, it is known to make the change stick better and maintain the morale levels among employees.

Radical Change

This model refers to changes that are major and rapid in nature. Examples include abolishing entire units of an organization together with the introduction of a completely new service or product, in conjunction with the appointment of a new team of leaders. This type of change can occur within a day or a week. The leader announces the change and the rest of the time is spent rolling out its implementation. Usually, this takes a swift move that does not allow for much immediate or short-term resistance.

Procedural Change

In this model, the focus of change is on procedural matters. Usually, the leader identifies the existing workflow processes and tries to improve them by making certain steps easier, faster, or more transparent. For instance, an immigration check point sets up a proper CCTV camera high on the ceiling of the check-point area of an airport. This allows for the immigration authorities to abolish the need to take photos of every visitor entering the country, which in turns helps reduce the waiting time to check passports and visas, thus increasing the productivity of the work.

Structural Change

In this model, the focus of change is on the structure of the organization. The leader might set up new units or restructure existing units.

For instance, the Thai government created the National Ombudsman Committee to ensure that citizens have a proper channel to air their grievances about public services. The Faculty of Political Science and Public Administration at Chiang Mai University, Thailand, set up a new Voice of Customer (VOC)

position. The VOC staff looks after all the data collected from customers, students, stakeholders, and employees, and makes recommendations for service improvements to the management team.

Cultural Change

This model of change focuses on the effort to shift organizational cultures. Every organization that has existed long enough, would form some sort of culture and subcultures within the organization. It is about how people think, communicate, act, and relate to each other, in addition to the non-verbal and material aspects of the organization. This model is most difficult to change because it is intangible and difficult to measure and monitor.

A good example is Singapore's Prison Services. As part of their major change effort, the prison guards were asked to shift their mindset to focus less on providing security to the public and disciplining inmates, and focus more on being 'Guardians of Lives.' The prison guards were expected to be more nurturing to the inmates, and provide them coaching and guidance to prepare them to reintegrate back into society.

Dynamic Change

This model of change refers to change occurring simultaneously in the different dimensions mentioned above. This means that certain parts of the organization might be changing rapidly, while certain other parts might be conducting an incremental change. On the other hand, some units might be experiencing structural and cultural changes at the same time. In reality, most change plans would be dynamic. Often it is more effective, especially for public agencies, to mix and match the above models of change and to accept the dynamic change model.

Continuous Change

This model of change applies when 'change' or 'improvement' becomes natural to the organization. It requires having proper knowledge management systems to help leaders make decisions for seamless continuous change. In well-functioning organizations, continuous change is achieved, because it is only the most natural thing to do to stay relevant and productive for the society. This is aligned with the concept of a learning organization [2], a place that continuously improves systematically.

Learning Methodology

- Deliver a lecture for 45 minutes, followed by Q&A.

- In the next 45 minutes, conduct a group discussion based on the countries' experiences to determine if the types of change models discussed above are found in their respective countries and organizations.

- For 90 minutes, use the case study 'Captain of Lives' (on Transformation of the Singapore Prison) as the anchoring story to discuss the type of change it was, the way it was led, and the lessons that we can draw from it.

Unit 3: Techniques and Leadership Skills for Change Management

Learning Objectives

- Participants will learn skillsets for change management.

- They will learn to identify resistance to change and ways to overcome such resistance.

Introduction

Leaders frequently start their positions with the ambition to change and to improve their unit or organization. Many fail to do so by the end of their term. Often, this is due to the lack of skillsets for managing change. There are many reasons why people resist change. Figure 12.1 captures some of the reasons. In this module, we will cover the steps of change and some key skillsets to manage organizational changes.

FIGURE 12.1

50 REASONS NOT TO CHANGE.

Public bureaucracies have high 'inertia' and are accustomed to only incremental changes. These inherent characteristics are reasons why the public sector takes longer time to change, and in some circumstances, is never willing to change. Unit 1 explains the definition of change and drivers of change. Unit 2 covers the types of change that leaders can plan for. Unit 3 covers the most important aspect, which is the techniques and skill sets needed for change.

According to Schein [6], a simple way to plan a change process is to divide the activities into the following three phases:

1. **Unfreezing:** The goal is to get participants in your organization to see and understand the need for change. You need to explain the potential benefits of change, which can include productivity levels, higher reputation, better satisfaction rates from customers, and higher trust from citizens and stakeholders. Resistance to change would naturally surface.

2. **Changing:** This process involves making the actual change, such as a new process, a new way of doing things, a new criterion, new structures, or new ways to think about things. Managing the change process includes managing the resistance to change.

3. **Refreezing:** This phase is about reinforcing the change implemented and to stabilize it. In this phase, participants should start to see positive outcomes of doing something new or doing something differently.

Change is best understood as a process of transition, from state A to state B. Picture 2 captures the sentiments of people, often found, in the process of change.

FIGURE 12.2

THE PROCESS OF TRANSITION.

© J M Fisher 1999/2012. Free for personal and organizational development use. Not to be sold or copied for general publication. A free resource from www.businessballs.com with permission of John M Fisher. See the theory and explanation at www.businessballs.com/personalchangeprocess.htm
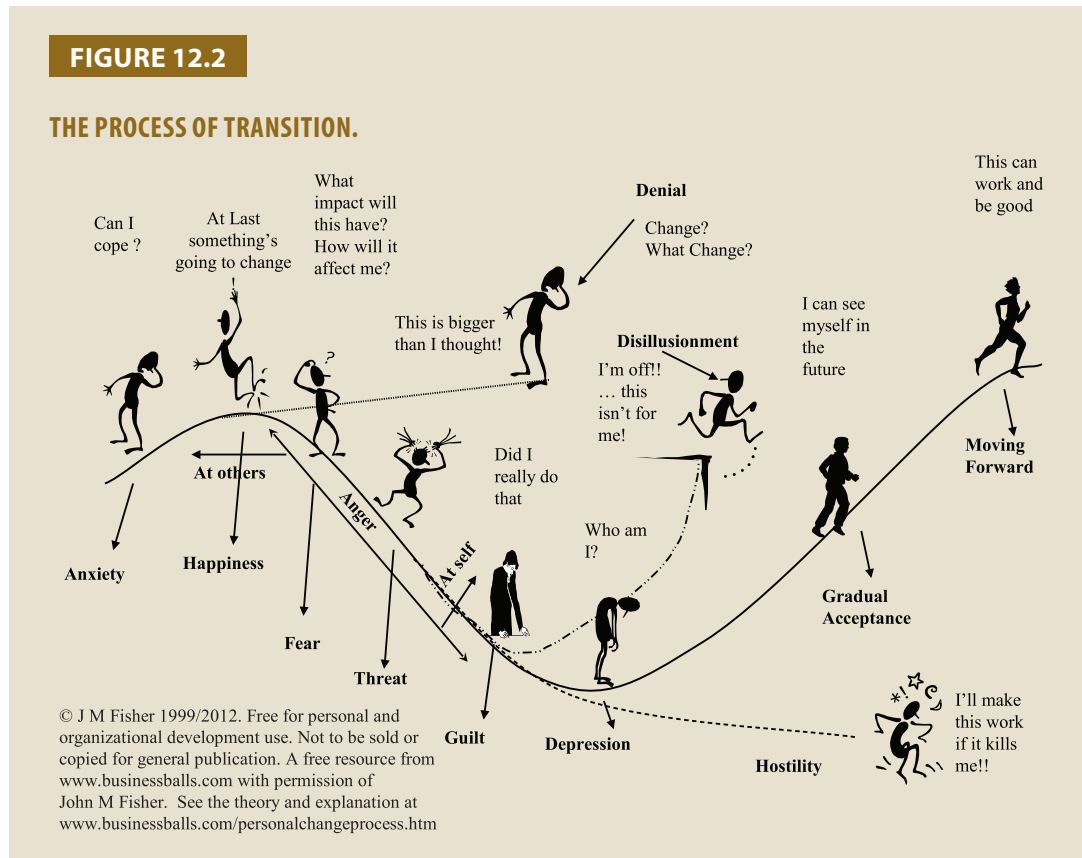
Exercise

- Participants will spend 20 minutes to reflect on the diagram shown in Figure 12.2, using the following questions: How much can you relate to these feelings? How can we be better leaders, now that we know the general feelings generated during the change process?

- Figure 12.3 provides a way to understand the change process and how it is linked to changes in individuals (will, skill, and commitment). Participants will spend some time to discuss how one can define the will, skill, and commitment needed for the change by using the case of 'Captain of Lives' Transformation of the Singapore Prison. This activity will take about 40 minutes.

In the next section, participants will be introduced to other more refined steps of change. There are at least two well-known models in this regard:

1. The eight-step model (see Figure 12.4) for transforming organizations from Kotter [4].

2. The 12-step change management process from Mento, et al. [5].

FIGURE 12.3

THE CHANGE PROCESS.
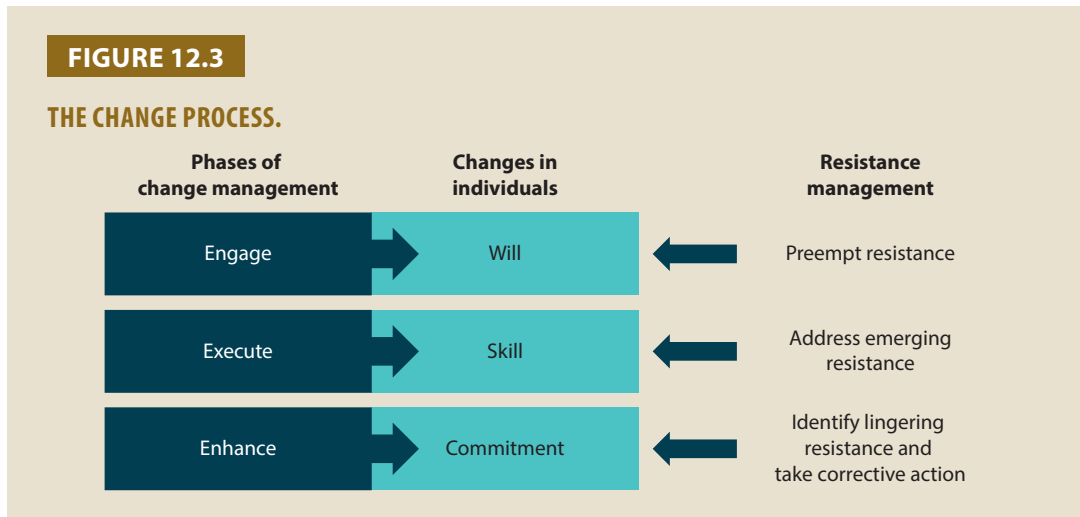
Kotter's eight-step model

1. Establish a sense of urgency.

2. Form a powerful coalition.

3. Create a vision.

4. Communicate the vision.

5. Empower others to act on the vision.

6. Plan for and create short-term wins.

7. Consolidate improvements and produce still more change.

8. Institutionalize new approaches.

Drawing from previous models of change and from actual experience, Mento, et al. [5] provide 12 steps to the change management process, as follows:

1. (State) the idea and its context.

2. Define the change initiative.

3. Evaluate the climate for change.

4. Develop a change plan.

5. Find and cultivate a sponsor.

6. Prepare your target audience, the recipients of change.

7. Create the cultural fit for making the change last.

FIGURE 12.4

KOTTER'S EIGHT-STEP MODEL OF CHANGE.
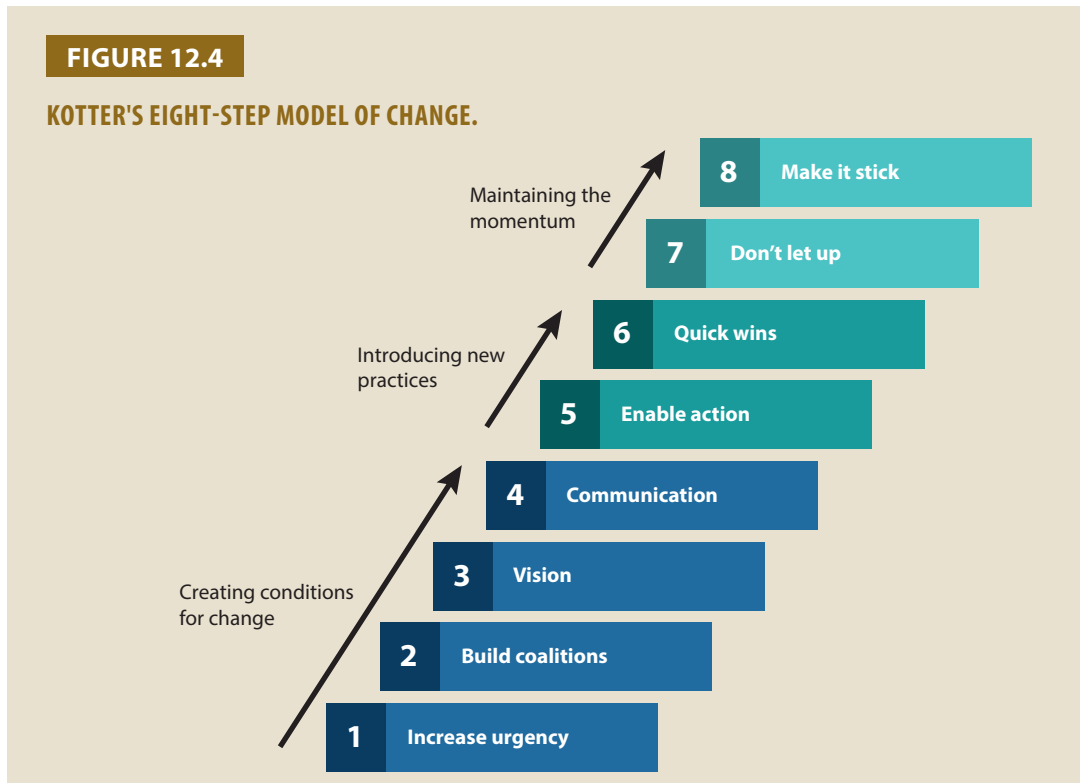
8. Develop and choose a change leader team.

9. Create small wins for motivation.

10. Constantly and strategically communicate the change.

11. Measure progress of the change effort.

12. Integrate the lessons learnt.

Now that participants are aware of the steps of change, the next section will focus on particular skillsets. It will help equip leaders with the necessary skillsets to initiate, manage, and sustain change in a public organization. As mentioned in the introduction, there are prescribed steps to change management. However, as change management is more of an art than science, leaders need to have certain skillsets, in order to achieve the prescribed steps.

There are eight types of skills [1] needed to lead and manage change. We will cover each skillset in this module. About 1.5 hours will be allocated to each skill set.

1. Stakeholder Analysis

Doing stakeholder analysis (see Figure 12.5) is crucial prior to implementing any change in an organization. It provides the leader or the team to understand the type and level of power of stakeholders, in addition to their interests.

> "…effective leadership and governance of policy domains becomes in large part the effective management of stakeholder relationships"

Exercise

Using the case of Transformation of Singapore Libraries [7], participants will practice in a stakeholder analysis.

FIGURE 12.5

A STAKEHOLDER ANALYSIS FRAMEWORK.

Create a stakeholder map

Power/Influence			
High	**Watch**	**Keep satisfied**	**Actively manage**
Some		**Keep on side**	
Little	**General communication**	**Keep informed**	
	Little	Some	High

Interest

Steps for stakeholder analysis

Identify the stakeholder	Create a stakeholder map	Identify stakeholder allegiance	Create a stakeholder management strategy

2. Dealing with Resistance to Change

There are a few ways to deal with the resistance to change. The leader must first analyze who would be resistant to change and why. The three top reasons are usually

1. uncertainty about the effects of change,

2. uncertainty about job performance, and

3. fear of change due to social consequences.

Also, the leader might not have communicated or planned properly. This amounts to

4. failure to prove that change is needed, and

5. failure to commit sufficient resources.

The leader can use the force-field analysis framework to determine the driving forces of change as well as the restraining forces. The leader must reinforce the driving forces and make efforts to

reduce the restraining forces (see Figure 12.6). Thus, the important task is to pinpoint the source of anxiety that people might feel. For instance, if the restraining forces are due to uncertainty about job performance, the leader must clarify how the change will make everyone better off (despite the fact that some might not make it in the new setting). It could also be the case that the leader has not proven enough why the change is needed. This requires careful articulation of the immediate need (e.g., to meet quality control standards, or to follow government orders) and the long-term benefits (e.g., for the general public, for the environment, the work-life balance of employees, and for the reputation of the organization).

FIGURE 12.6

DRIVING FORCES VERSUS RESTRAINING FORCES.
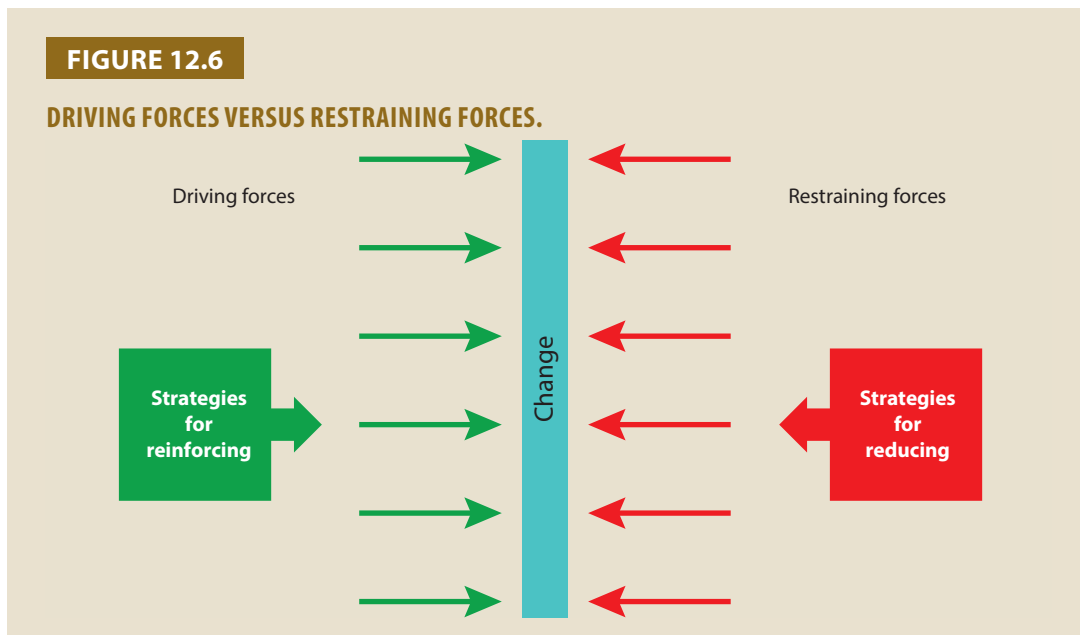
3. Value-based Management

Value-based management (see Figure 12.7) is one of the best ways to bring people together to achieve a common goal. This idea is based on the concept of public-sector values. (Examples will be shared with participants).

FIGURE 12.7

VALUE-BASED MANAGEMENT.
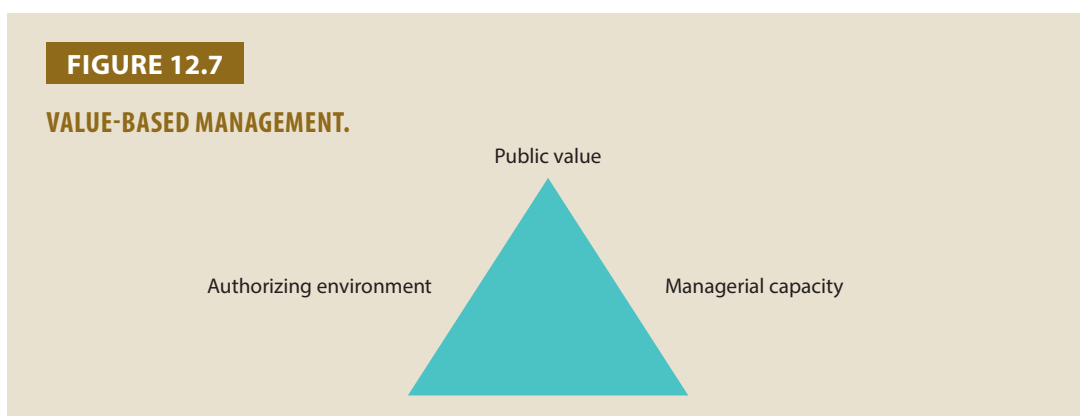
4. Visioning Exercise

Visioning exercise is a way to help team members design or redesign a common goal for the organization. Leaders can use a variety of tools such as a newsletter in the future that talks about the success of the organization. (Examples of materials, such as the newsletter, will be shared).

5. Change Communication Strategies

It is best to use all types of communication strategies where appropriate. Examples include meetings, presentations, e-mails, newsletters, face-to-face discussions, symbols and visuals, traditional documents, and so on.

6. Narratives to Support the Need for Change

As mentioned in the explanation of the force-field analysis, to strengthen the driver of change, it is best to have a set of stories, policies, and trends to support the need for change. These stories can be from within the organization, from higher authorities, from stakeholders, and from the vested public.

7. Measuring Change

It is very important to set up a system to monitor the change. Milestones should be designed into the change process. If possible, pretest and posttest surveys should be used. Teams usually feel better when they see positive changes and are more willing to continue the change efforts.

Learning Methodology

- The learning methodology will consist of a short lecture, case exercises, and a discussion or debriefing.

- The module will use existing change management cases to illustrate real-world challenges and work with participants to identify the skills needed. The case will be Transforming Singapore's Libraries (see Figure 12.8).

FIGURE 12.8

TRANSFORMING SINGAPORE'S LIBRARIES.

Why was change necessary?

Questions to the case

- Why did Singapore decide to change its libraries? What is the equivalent of this change for a for-profit company?

- How did the type of service delivered and the service levels change?

- What important elements were not changed? Why? Was it a failure?

- What were the key components of the change effort? Do they relate to one another?

- Was the order of which things happened important? Why or why not?

- Based on their own change management experiences, participants will articulate a strategy for change management. Participants are expected to implement the strategy upon completion of the course.

References

[1]   Abramson M.A. et al. Eight Essential Tools for Achieving Your Goals. Washington DC: IBM Center for the Business of Government; 2008.

[2]   Garvin D. Learning in Action: A Guide to Putting the Learning Organization to Work. Boston: Harvard Business School Press; 2000.

[3]   Kotter J.P. Leading Change. Cambridge: Harvard Business Review Press; 2012.

[4]   Kotter J.P. Leading Change: Why Transformation Efforts Fail. Harvard Business Review; January 2007; 96–103.

[5]   Mento A.J., Jones R.M., Dirnforfer W. A change management process: grounded in both theory and practice. Journal of Change Management 2002; vol. 3, no. 1: 45–59 pp.

[6]   Schein E.H. Organizational Culture and Leadership, 4th Edn. San Francisco, CA: Wiley; 2010.

[7]   Transforming Singapore's Public Libraries (Harvard Business Review Case Study). https://hbr.org/product/transforming-singapores-public-libraries/802009-PDF-ENG.

LIST OF TABLES

LIST OF FIGURES

LIST OF CONTRIBUTORS

Chief Expert
Dr. D. Brian Marson (Chief Expert)
Personal Consultant
Canada

National Experts
INDONESIA
Dr. Anwar Sanusi
Secretary General
Ministry of Village, Development of Disadvantaged Region, and Transmigration of Indonesia

REPUBLIC OF KOREA
Dr. Shin Kim
Director and Senior Research Fellow
Center for International Public Cooperation
Korea Institute of Public Administration

MALAYSIA
Rauzah Zainal Abidin
Former Director
Malaysia Productivity Corporation (MPC)

PHILIPPINES
Magdalena Mendoza
Senior Vice-President
Development Academy of the Philippines

THAILAND
Dr. Ora-orn Poocharoen
Dean
Faculty of Political Science and Public Administration
Chiang Mai University

ASIAN PRODUCTIVITY ORGANIZATION
Arsyoni Buana
Program Officer
Member Country Service Division
In-country Directorate

Bangladesh

Cambodia

Republic of China

Fiji

Hong Kong

India

Indonesia

Islamic Republic of Iran

Japan

Republic of Korea

Lao PDR

Malaysia

Mongolia

Nepal

Pakistan

Philippines

Singapore

Sri Lanka

Thailand

Turkey

Vietnam