ITIL

tutorialspoint

SIMPLY EASY LEARNING

www.tutorialspoint.com

https://www.facebook.com/tutorialspointindia

https://twitter.com/tutorialspoint

About the Tutorial

ITIL is a framework providing best practice guidelines on all aspects of end to end service management. It covers complete spectrum of people, processes, products and use of partners. Now a day's ITIL is being practiced by almost every company providing IT services to the customers.

Audience

This tutorial has been prepared for the students as well as professionals to ramp up quickly. This tutorial is a stepping stone to ITIL certification.

Prerequisites

Before proceeding with this tutorial you should know the basic terms such as Information Technology, Infrastructure, Services, and Service Level Agreements etc. Hence it is strongly recommended to go through ITIL Terminologies chapter before proceeding further.

Copyright & Disclaimer

© Copyright 2019 by Tutorials Point (I) Pvt. Ltd.

All the content and graphics published in this e-book are the property of Tutorials Point (I) Pvt. Ltd. The user of this e-book is prohibited to reuse, retain, copy, distribute or republish any contents or a part of contents of this e-book in any manner without written consent of the publisher.

We strive to update the contents of our website and tutorials as timely and as precisely as possible, however, the contents may contain inaccuracies or errors. Tutorials Point (I) Pvt. Ltd. provides no guarantee regarding the accuracy, timeliness or completeness of our website or its contents including this tutorial. If you discover any errors on our website or in this tutorial, please notify us at contact@tutorialspoint.com

Table of Contents

About the Tutorial ii
Audience ii
Prerequisites ii
Copyright & Disclaimer ii
Table of Contents iii
1. ITIL – Overview 1
Why ITIL is required? 2
ITIL Versions 2
ITIL Publications 3
Benefits of ITIL 3
ITIL V2 vs ITIL V3 4
2. ITIL – Terminologies 5
3. ITIL – Service Basics 9
Service 9
Services vs. Products 9
Service Management 9
Goals of Service Management 9
Achieving Service Management 10
Processes and Functions 11
4. ITIL – Service Lifecycle 11
SERVICE STRATEGY 13
5. ITIL – Service Strategy Overview 14
Strategic Assessment 14
Factors in Strategic Assessment 15
Value Creation 15
Service Assets 16

Service Provider Types 17

The Four Ps of strategy 17

Services Strategy Processes 19

6. ITIL – Service Strategy Roles 20

7. ITIL – Strategy Generation 22

Service Generation Sub processes 22

8. ITIL – Service Portfolio Management 23

Service Portfolios 23

Service Portfolio Management 23

Sub Processes 24

9. ITIL – Business Relationship Management 25

Relationship 25

Sub-Processes 25

10. ITIL – Demand Management 27

Strategical Level Demand Management 27

Tactical Level Demand Management 27

Challenges in Demand Management 28

Service Packages 28

11. ITIL – Financial Management 30

Benefits of Financial Management 30

Key decisions for Financial Management 30

SERVICE DESIGN 32

12. ITIL – Service Design Overview 33

Introduction 33

Service Oriented Architecture 34

Service Design Processes 34

13. ITIL – Service Catalogue Management 36

Service Catalogue ... 36

Service Catalogue Composition ... 36

Service Catalogue Aspects ... 37

SCM Activities ... 37

14. ITIL - Service Level Management ... 38

Overview ... 38

SLM Activities ... 38

Objectives ... 39

15. ITIL - Capacity Management ... 40

Capacity Management Activities ... 40

Objectives ... 41

Capacity Management Elements ... 41

16. ITIL – Availability Management ... 43

Objectives ... 43

Availability Management Process ... 43

Availability Management sub-processes ... 45

17. ITIL – Service Continuity Management ... 47

Objective ... 47

ITSCM Process ... 48

18. ITIL – Information Security Management ... 49

ISM Security Policy ... 49

ISM Framework ... 50

Key elements in ISM Framework ... 50

19. ITIL – Supplier Management ... 52

Objectives ... 52

Supplier Management Process ... 53

ITIL - SERVICE TRANSITION ... 54

20. ITIL – Service Transition Overview 55

Objectives 55

Service Transition Benefits 56

Service Transition Processes 57

21. ITIL – Project Management 58

Objectives 58

Planning an Individual Service Transition 59

Reviewing the Plans 59

22. ITIL – Change Management 60

Introduction 60

Objectives 61

Seven Rs of Change Management 61

Change Models 62

23. Service Assets and Configuration Management 64

Overview of Assets 64

Configuration Items (CIs) 64

CI Types 64

Configuration Management System (CMS) 65

24. ITIL – Release and Deployment Management 67

Key Points 67

Objectives 67

Release and Deployment Management Process 68

25. ITIL – Service and Validation Testing 70

Overview 70

SERVICE OPERATION 71

26. ITIL – Service Operation Overview 72

Key Points 72

Service Operation Processes 72

Service Operation Functions 73

Service Desk 73

27. ITIL – Event Management 75

Overview 75

Event Management Process 76

Benefits 76

28. Incident Management and Request Fulfillment 77

Overview 77

Incident Models 77

Incident Management Process 78

Incident Escalation 79

Request Fulfilment 79

29. ITIL – Problem Management 80

Key Points 80

Problem Management Process 81

30. ITIL – Access Management 83

Overview 83

Key Points 83

Value to Business 83

Access Management Process 84

CONTINUAL SERVICE IMPROVEMENT 85

31. CSI Overview 86

Objectives 86

Activities Supporting CSI 86

CSI Process Model 87

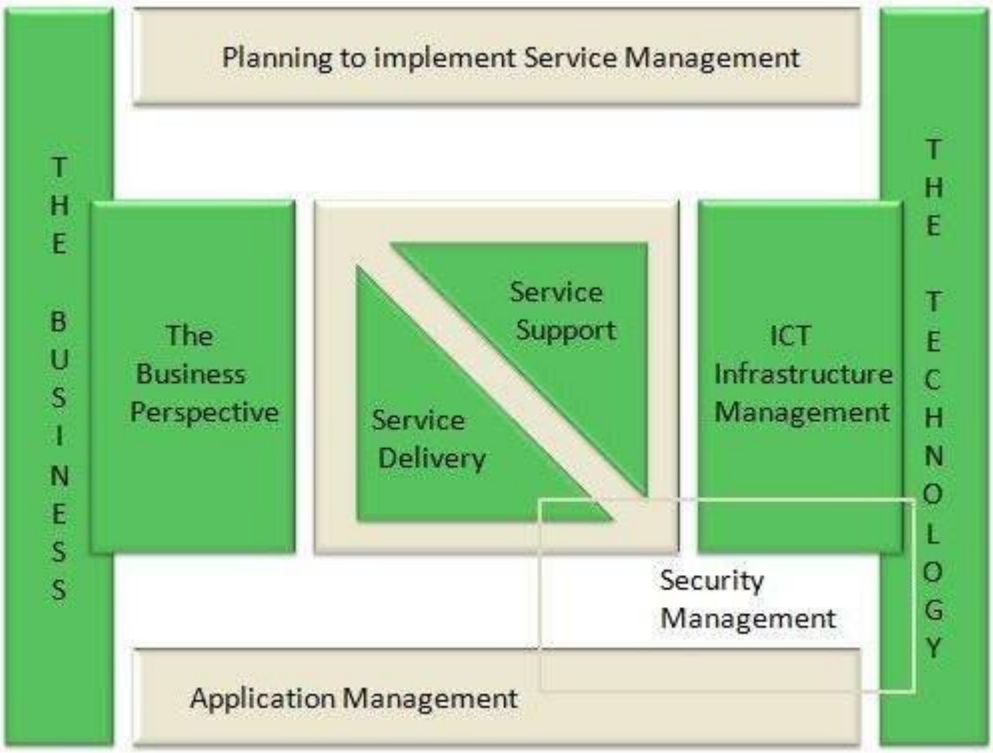
Perspectives of Benefits 88

32. ITIL – Service Reporting 89

1. ITIL – Overview

ITIL is a framework providing best practice guidelines on all aspects of end to end service management. It covers a complete spectrum of people, processes, products and use of partners.

Now a days, ITIL is being practiced by almost every company providing IT services to its customers.


Planning to implement Service Management
THE BUSINESS
The Business Perspective
Service Support
Service Delivery
ICT Infrastructure Management
THE TECHNOLOGY
Security Management
Application Management

ITIL Framework

The processes, tasks and checklists described in ITIL are not organization-specific, but can be implemented by any organization. It gives organization a framework to plan, implement and measure IT services.

ITIL was published in 1989 by **Her Majesty's Stationery Office (HMSO)** in **UK** on behalf of the **Central Communications and Telecommunications Agency (CCTA)**, now subsumed within the Office of Government Commerce (OGC).

Why ITIL is required?

ITIL helps business managers and IT managers to deliver services to the customers in an effective manner and hence gaining the customer's confidence and satisfaction. The areas where ITIL plays an effective role are as given below:

- IT and business strategic planning
- Integrating and aligning IT and business goals
- Implementing continuous improvement
- Acquiring and retaining the right resources and skill sets
- Reducing costs and the Total Cost of Ownership
- Demonstrating the business value to IT
- Achieving and demonstrating Value for Money and Return on Investment.
- Measuring IT organization effectiveness and efficiency
- Developing business and IT partnerships and relationships
- Improving project delivery success
- Managing constant business and IT change

ITIL Versions

In its first form, ITIL was a collection of books which covered all aspects of IT service management. Since then, ITIL underwent many changes and thus many versions of ITIL exist as given below:

ITIL V1

This is the first version of ITIL and comprised 31 books initially.

ITIL V2 (2000 to 2004)

The V1 was replaced with 7 books and gained much prominence during 2000 to 2004. Many companies across several countries currently are adopting this version and this has become an accepted version too.

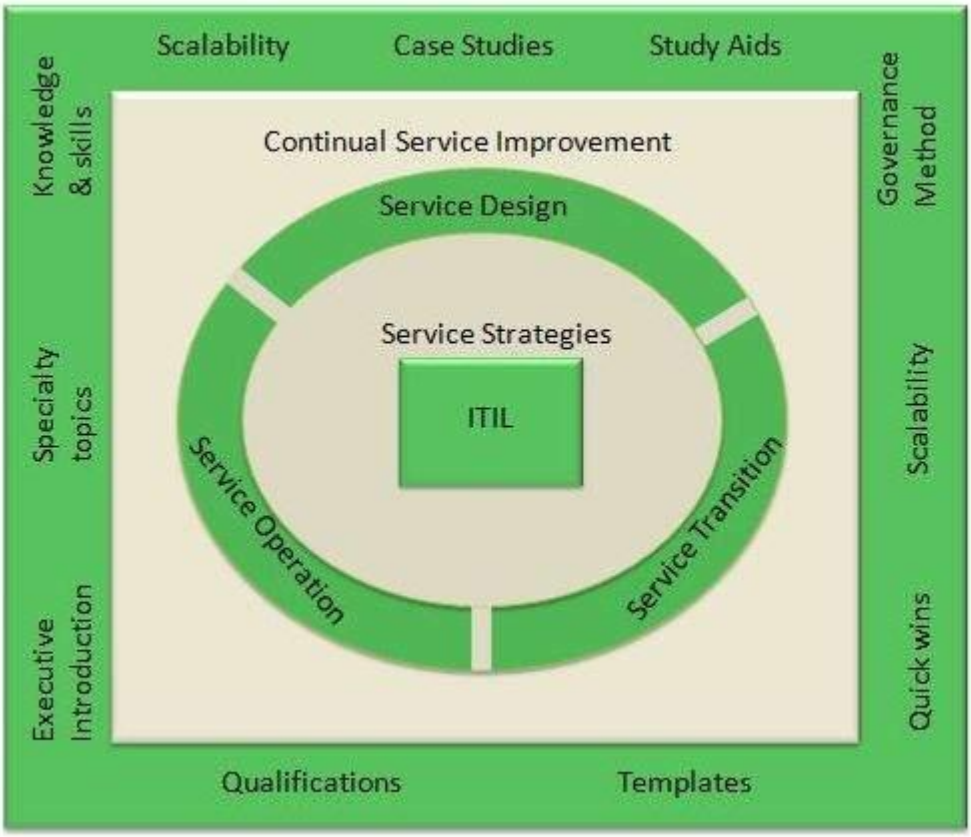
ITILV2 (2007)

This is yet another modified and consolidated version of the previous ITILV2 and this is called with 3rd version of ITIL, consisting of five core books covering the service lifecycle. ITIL V3 included **26 processes** and **4 functions.**

In 2011, the 2011 edition of V3 was published. It was an updated version released in 2007.

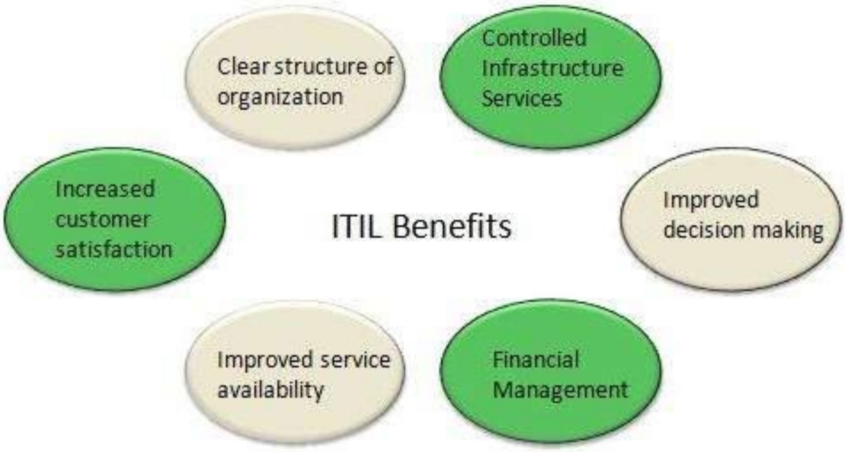
ITIL Publications

ITIL core publications include a set of five manuals – Service Strategy, Service Design, Service Transition, Service Operation and Continual Service Management.


Scalability
Case Studies
Study Aids
Knowledge & skills
Governance Method
Continual Service Improvement
Service Design
Service Strategies
ITIL
Specialty topics
Scalability
Service Operation
Service Transition
Executive Introduction
Quick wins
Qualifications
Templates

Benefits of ITIL

The following diagram shows the benefits that ITIL offers:


Clear structure of organization
Controlled Infrastructure Services
Increased customer satisfaction
ITIL Benefits
Improved decision making
Improved service availability
Financial Management

ITIL V2 vs ITIL V3

A comparison of ITIL V2 and ITIL V3 is shown in the following table:

ITIL V2	ITIL V3
Focused on product, process and people.	Focused on product, process, people and partner.
Process oriented approach	Lifecycle based approach.
Security management is part of evaluation	Security management is a separate process
Emphasizes on service design and service strategy	Equal attention to all processes
Comprises 10 processes and 2 functions	Comprises 26 processes and 4 functions.

2. ITIL – Terminologies

In this chapter, we will discuss some basic terminologies of ITIL that will help to understand the tutorial easily and quickly. The following table comprises all basic terminologies required to learn ITIL.

Sr.No.	ITIL Terminologies
1	**ITIL** **Information Technology Infrastructure Library** is a set of best practices practiced by most infrastructure service providers to deliver services to the customers to meet their business needs within desired cost and quality.
2	**Service** **Service** is a means of delivering value to customers by achieving customer's desired results while working within given constraints.
3	**Service Level** It is a measured and reported achievement against one or more Service Level Targets.
4	**Service Level Agreement** It is an agreement between service provider and customer. The SLA describes the IT Service, documents Service Level Targets and specifies the responsibilities of provider and customer.
5	**Service Strategy** **Service Strategy** helps to design, develop and implement service management as organizational capabilities and strategic assets as well. It enables a service provider to consistently outperform competitive

	alternatives over time, across business cycles, industry disruptions and changes in leadership.
6	**Service Model** **Service Model** is the high level description of the service and components required to deliver that service.
7	**Service Portfolio** **Service Portfolio** is the set of services provided by the service provider.
8	**Service Catalogue** **Service Catalogue** is the set of specific services being provided by service provider to a specific customer.
9	**Customer Portfolio** **Customer Portfolio** is used to record all customers of IT service provider.
10	**Demand Management** **Demand Management** is very important and critical process in service strategy. It helps to understand customer demand for services so that appropriate capacity can be provisioned to meet those demands.
11	**Pattern of Business Activity** **PBA** is an extremely important activity achieved by knowing customer how they operate and future requirement they might need.
12	**Service Design** **Service Design** provides a blueprint for the services. It not only includes designing of new service but also devises changes and improvements to existing ones.
13	**Operational Level Agreement (OLA)**

	OLA is an agreement between IT service provider and another part of same organization.
14	**Service Level Report** It gives an insight into a service provider's ability to deliver the agreed service quality.
15	**Service Level Requirements** It is a document containing the requirements for a service from the client viewpoint, defining detailed service level targets.
16	**Service Asset** **Service Assets** are the resources and capabilities owned by the service provider enabling it to deliver service to the customer.
17	**Configuration Item (CI)** **Configuration Item** is subset of service assets and have direct impact on delivering services. All servers, networks, applications that have an impact on production are known as configuration item.
18	**SACM** **Service Assets and Configuration Management (SACM)** deals with maintaining up-to-date and verified database of all assets and CIs which are also made available to other service management processes.
20	**Change** Change refers to modifying the existing services.
21	**Event** **Event** is defined as detectable occurrence that has significance for the delivery of IT service. Events are created by Configuration Item (CI) or monitoring tools.

22	**Incident** **Incident** is defined as any disruption in IT service. Incident can be reported either through the Service Desk or through an interface from event management to incident management tools.
23	**Service Request** **Service Request** refers to demand by the users. These requests can be regarding small changes, changing the password, installing additional software application, requesting information etc.
24	**Problem** In ITIL, a Problem is defined as unknown cause of one or more incident.
25	**Known Error** **Known Error** is well identified problem with its cause and resolution. It is stored in **Known Error Database (KEDB).**

3. ITIL – Service Basics

This chapter discusses the Service basics of ITIL in detail.

Service

Service is a means of delivering value to customers by achieving customer's desired results while working within given constraints.

Services vs. Products

The following table shows the comparison for services and products:

Services	Products
Services are not tangible.	Products are tangible.
Services are produced and consumed at same time.	Products are not produced and consumed at same time.
Services are inconsistent.	Products are consistent.
The user participates in the production of services.	The user doesn't participate in the production of products.

Service Management

Service Management refers to all aspects of the management of IT service provision. According to ITIL, Service management contains all organizational capabilities for the generation of added value to the customers as service.

Goals of Service Management

The main goals of Service management are:

- Make IT services adaptable towards the present and future requirements of an organization and its customers.
- Develop and maintain good and responsive relationship with the business.
- Make effective and efficient use of all IT resources.

- Optimizing the quality of delivered services.
- Reduction of long term cost of service delivery.

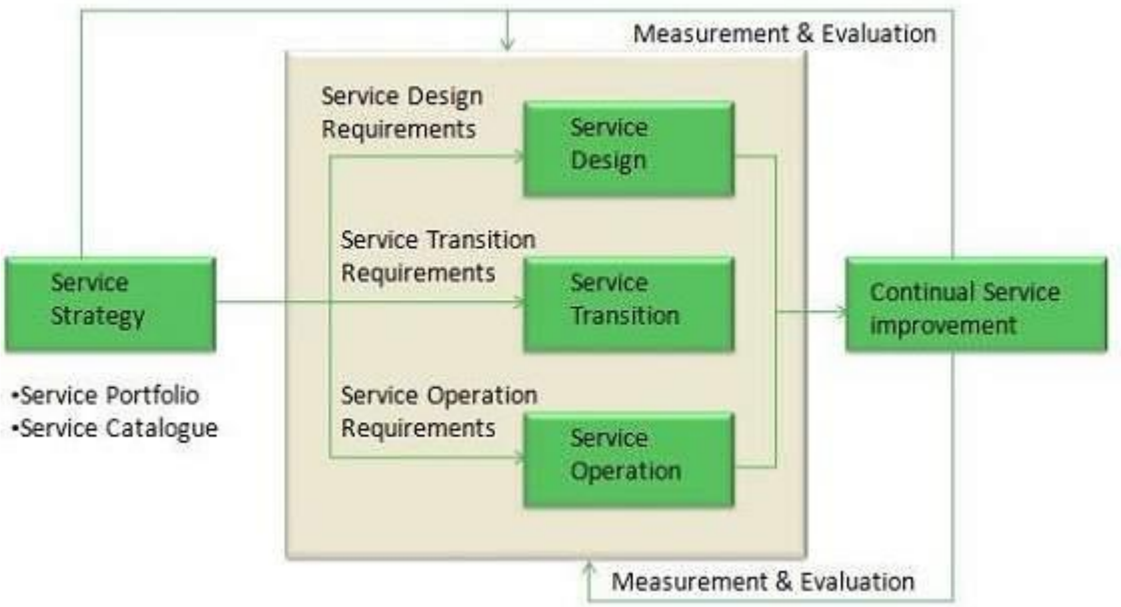
Achieving Service Management

The key activities needed to be performed in order to achieve business and customer's satisfaction are given hereunder:

- Documenting, negotiating and agreeing to customer and business quality targets and responsibilities in Service Level Agreements (SLAs).
- Regular assessment of customer opinion in customer feedback and customer satisfaction surveys.
- IT personnel taking the customer and business perspective and always trying to keep customer interactions as simple as possible.
- Understanding the ICT infrastructure.
- IT personnel regularly taking the customer journey and sampling the customer experience.

4. ITIL – Service Lifecycle

The complete framework of ITIL is based on service lifecycle. Each lifecycle defines certain processes for effective service management.


Measurement & Evaluation
Service Design Requirements
Service Design
Service Transition Requirements
Service Strategy
Service Transition
Continual Service improvement
•Service Portfolio
•Service Catalogue
Service Operation Requirements
Service Operation
Measurement & Evaluation

Service lifecycle helps to amplify the service management approach and to achieve a better understanding of its structure. In the coming chapters, we will be discussing all such lifecycles individually with their processes and functions.

Processes and Functions

There are 26 processes and 4 functions in ITIL V3. These processes and functions are discussed in detail with each service lifecycle in further chapters.

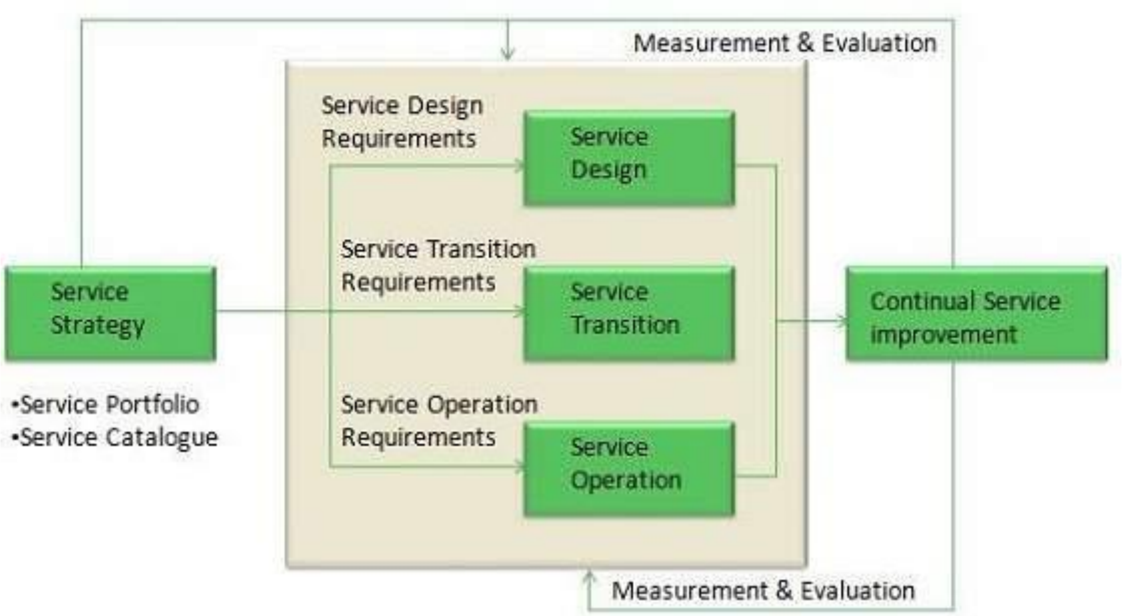
Process

A process defines policies, standards, guidelines, activities, and work instructions. It takes some defined inputs to produce desired results.

Functions

A function is defined as group of people or tools required to carry out one or more processes and activities.

The complete framework of ITIL is based on service lifecycle. Each lifecycle defines certain processes for effective service management.


Measurement & Evaluation
Service Design Requirements
Service Design
Service Transition Requirements
Service Transition
Service Strategy
Continual Service improvement
•Service Portfolio
•Service Catalogue
Service Operation Requirements
Service Operation
Measurement & Evaluation

Service lifecycle helps to amplify the service management approach and to achieve better understanding of its structure. In the coming chapters, we will be discussing all lifecycle individually with their processes and functions.

End of ebook preview

If you liked what you saw…

Buy it from our store @ **https://store.tutorialspoint.com**