



# CUSTOMER SERVICE SUPPLY CHAIN **MANAGEMENT**

Models for Achieving Customer  
Satisfaction, Supply Chain Performance,  
and Shareholder Value

**Alexandre Oliveira**  
**Anne Gimeno**

Customer Service  
Supply Chain  
Management

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Satisfaction, Supply Chain Performance,  
and Shareholder Value

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# Contents

	Preface . . . . .	xii
Chapter 1	Customer Service Environment . . . . .	1
Chapter 2	Customer Service Management Model . . . . .	17
	Customer Expectation Versus the Hired Service Level . . . . .	20
	Customer's Service Level Perception . . . . .	22
	Supplier's Process Performance . . . . .	25
	Customer Relationship Horizon . . . . .	27
	CSM Model Scenarios . . . . .	36
	Scenario Variations . . . . .	43
	Customer Service Processes . . . . .	49
	Pre-Transactional Elements . . . . .	49
	Transactional Elements . . . . .	55
	Post-Transactional Elements . . . . .	56
Chapter 3	Customer Service Strategies . . . . .	59
	Example: Managing Customer Service Interactions . . . . .	63
	Customer Service and Planning Logistics . . . . .	67
	Demand Planning and Forecasting . . . . .	67
	Stock and Inventory Control . . . . .	68
	Customer Service and Synchronous Operations . . . . .	69
	Distribution . . . . .	70
	Example: Working with Synchronous Operations . . . . .	73
	International Logistics . . . . .	74
	Customer Segmentation . . . . .	77
	Customer-Centric Culture . . . . .	79
	Customer Logistics Service Strategies . . . . .	81
	Business-Driven Customer Service . . . . .	86
	Expert's Opinion . . . . .	89
	Creating the "Resource-Lite" Supply Chain . . . . .	89
	Beyond the Carbon Footprint . . . . .	89

**Chapter 4 Managing the Service . . . . . 93**

- Efficient Consumer Response . . . . . 93
- Vendor-Managed Inventory and Continuous Replenishment . . . . . 94
- Collaborative Planning, Forecasting, and Replenishment . . . . . 96
- CPFR Business Case . . . . . 100
  - Current Situation . . . . . 100
  - Operation Design . . . . . 104
  - Project Results . . . . . 123
- Performance Indicators . . . . . 128
  - Customer Service Performance Indicator Examples . . . . . 139
- Governance . . . . . 147
  - S&OP Procedure: Example . . . . . 150
  - Customer Service Cycle (CSC) . . . . . 152

**Chapter 5 Customer Service Organization . . . . . 159**

- Business Case . . . . . 165
- Customer Logistics Positions . . . . . 172
  - Customer Service Analyst . . . . . 173
  - Customer Service and Logistics Manager . . . . . 175
  - Customer Supply Chain Director . . . . . 178

**Bibliography . . . . . 181**

**Index . . . . . 183**

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## About I.B.S.

The Brazilian Institute of Supply Chain Management Professionals, a leading regional professional association since 2007, benefits its members via technical events, courses, and an annual congress in São Paulo, Brazil.

I.B.S. promotes knowledge transfer with other knowledge centers around the world. The Committee for International Cooperation (CCI) is the structure that builds partnerships for technical cooperation and knowledge exchange with foreign institutions. Ideal partners are national or regional professional associations or universities.

You can find more information about I.B.S. at [www.ibpsc.net/](http://www.ibpsc.net/) IBS.

# Preface

This book presents the Customer Service Management Model, a dynamic mechanism developed to evaluate the interactions present in the customer service environment. This model considers several interactions:

- The balance between customer's service level expectation and the level of service actually hired from a given supplier
- The correlation that compares the customer's expectation in relation to the level of service that is to be delivered and the perception about the actual service level
- The difference between the official contracted level of service and the process performance actually delivered to the customers

To translate customer needs into a customer-centric business, it is necessary for the relationships between supplier and customer to have the maturity to promote change management and to review the balance of the following forces: product, customer, service and process. Customer-centric strategies offer the best solution based on personalized packages of products, service, support, education, and consulting.

Through *people* it is possible to manage knowledge, triggering the *virtuous cycle* that creates and sustains the value-added innovative environment that leads the business to its ultimate goal: delivering value to the shareholders and stakeholders. The balance between operational activities and strategic influence represents an organizational challenge because it requires people diversity within a small group of people. The customer service department tends to have few thinkers and innumerable operators. To address this reality, the

authors present the Customer Service Balanced Organization Model (CSBO Model), which is basically founded on two pillars: an order-management cell and a compliance cell.

## **Authors' Note**

Over the years, the common understanding of world-class operations has evolved from the simplistic, focused management of functional silos to a comprehensive approach of supply network management as the driver to deliver ultimate shareholder value. Although many commentators have tried to describe this evolution, most have failed to properly address the supply chain's fundamental building block: knowledge management. Therefore, their analyses also overlooked the only element that delivers long-term sustainable shareholder value: people.

We are writing five books for Pearson that cover the most important features of this evolutionary journey. These books will provide detailed roadmaps and models to diagnose, implement, and sustain world-class supply chain network management in organizations of all types:

- *A Guide to Supply Chain Management: The Evolution of SCM Models, Strategies, and Practices* (an e-book) introduces the core concept of knowledge management as the only strategy capable of steering supply chains networks management to successfully compete in highly competitive markets. This introductory work reviews supply chain practice from its earliest stages and presents reference models that support our view of this discipline as a business driver to deliver shareholder value.

This book introduces the *Supply Network Alignment Reference Model* (SNAR Model), which organizes the supply chain

networks into knowledge areas that enable accurate decision making from the strategic level to daily management decisions. This book also introduces the *Supply Network Knowledge Management Maturity Roadmap* (SKMap). Before the development of a supply network reference model, it was necessary to understand the intermediate evolutionary stages of knowledge management within the supply chain. The SKMap organizes and correlates several strategies and practices according to a unique structure that allows you to understand how to face the future challenges of managing supply chain networks in fluid and complex environments.

- *Supply Chain Management Strategy: Using SCM to Create Greater Corporate Efficiency and Profits* explores how supply chain management delivers shareholder value. The introduction covers topics such as the supply chain master plan, cash-management cycle, purchase-to-pay cycle, and manufacturing-to-revenue cycle. This book introduces the *Supply Network Business Value Model* (SNValue Model) and discusses the supply chain mechanisms that generate value for the business. It addresses the following topics: enabling sales volume growth, enabling market-share growth, reducing revenue cycle, reducing lost sales, supporting marketing and sales initiatives, enabling customer experience by improving customer perception, managing the cost to serve, offering differentiated service packages, enabling margin growth, reducing cost of sales, balancing asset management, and balancing service level and cost structure.

This book also presents the *Business Value Impact Chart* (BV Chart) and the *Balanced Control Panel* (BC Panel). The third part of the book covers how each of the SNAR Model knowledge areas can contribute to each of the factors that enable shareholder value. The tool used to establish these relationships is the BV Chart.

- *Executing the Supply Chain: Modeling Best-in-Class Processes and Performance Indicators* covers the supply network governance cycle and explains the mechanisms needed to understand the business through process mapping, risk analysis, and the definition and use of performance indicators for all areas directly or indirectly related to supply chain management. The second part of the book presents how each of the SNAR Model knowledge areas can be monitored and controlled by performance indicators. Other chapters present real-world metrics from companies of different sizes, sectors, and countries, and discuss benchmarking techniques.
- *Customer Service Supply Chain Management: Models for Achieving Customer Satisfaction, Supply Chain Performance, and Shareholder Value* focuses on the role of customer service as a strategic integrator for differentiated supply chain management. This book presents the *Customer Service Management Model* (CSM Model), a dynamic mechanism developed to evaluate the interactions present in the customer service environment. The model presents four pillars and provides a quantitative approach to understand the connection between them:
  1. Customer Service Level Expectation
  2. Supplier Service Level: Hired Performance
  3. Customer Service Level Perception
  4. Supplier Service Level: Delivered Performance

Although the book discusses some traditional customer service elements such as pre-transactional, transactional, and post-transactional service, the most important topics are customer service strategies, managing service levels, and customer service organization, respectively.



- *Managing Supply Chain Networks: Building Competitive Advantage in Fluid and Complex Environments* presents a solid roadmap for managing knowledge within organizations across all industries. You learn how to build, implement, and sustain long-term knowledge management as a consistent strategy to deliver business value through supply chain innovation leadership.

This book presents the *Supply Network Governance Diamond Model* (SNG Diamond) which is executed through...people! The SNG Diamond Model is a common governance structure focused on the long-term success of the entire supply network that connects knowledge management and risk management and reviews policies that promote the innovative environment required to face the challenges of managing fluid and complex supply networks.

# 1

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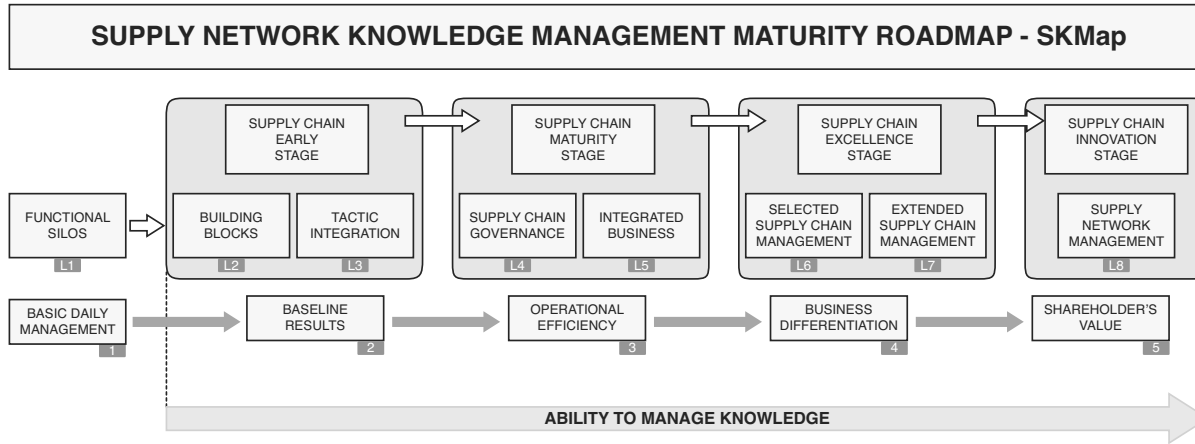
## Customer Service Environment

According to the Supply Chain Knowledge Management Maturity Roadmap (SKMap)<sup>1</sup>, illustrated in Figure 1.1, tactic integration is the first movement toward a solid supply chain governance structure. Once tactic integration has matured, leaders are capable of interpreting the signals generated within the organization and promoting a solid strategic alignment of the supply chain function with corporate governance. These connections are sustained by five pillars:

1. Customer service
2. Project planning
3. Human resources
4. Sustainability
5. Information technology

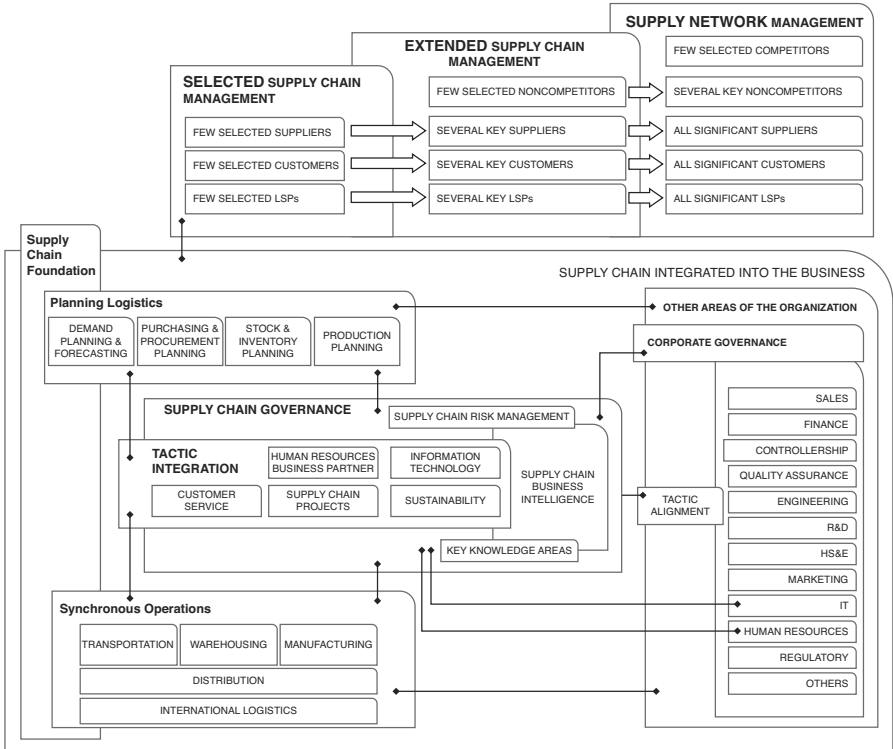
At the tactic integration level, the organization strengthens several functional areas and creates the architecture capable of aligning supply chain building blocks with major business objectives. According to the Supply Network Alignment Reference Model (SNAR Model), illustrated in Figure 1.2, these building blocks are planning logistics and synchronous operations (Oliveira and Gimeno, 2014).

<sup>1</sup> Oliveira, A. and Gimeno. 2014. *A Guide to Supply Chain Management: The Evolution of SCM Models, Strategies, and Practices*. New York: Pearson.



**Figure 1.1** Supply Chain Knowledge Management Maturity Roadmap (SKMap)

## Supply Network Alignment Reference Model – SNAR MODEL



**Figure 1.2** Supply Network Alignment Reference Model (SNAR Model)

Moving on to SKMap's fourth maturity stage (supply chain governance), three major targets complement tactic integration:

1. To establish and lead a supply chain risk management strategy
2. To define which key knowledge areas must be acquired
3. To synchronize supply chain strategies to corporate governance goals

Corporate governance is a complex discipline. A simple approach to understand the concept of governance lies on balancing performance, risk and cost. Usually when the organization maximizes either one of these elements, the others will not achieve minimum required standards. This balancing exercise is continuous because most businesses are constantly under pressure due to both permanent and changing factors.

Customer service plays a major role in the tactic-alignment dynamics. Most publications introduce customer service as a set of activities categorized into pre-transactional, transactional, and post-transactional. This approach induces the readers to believe there is only an operational level for customer service, when its contribution to the organization lies within the tactical and strategic levels.

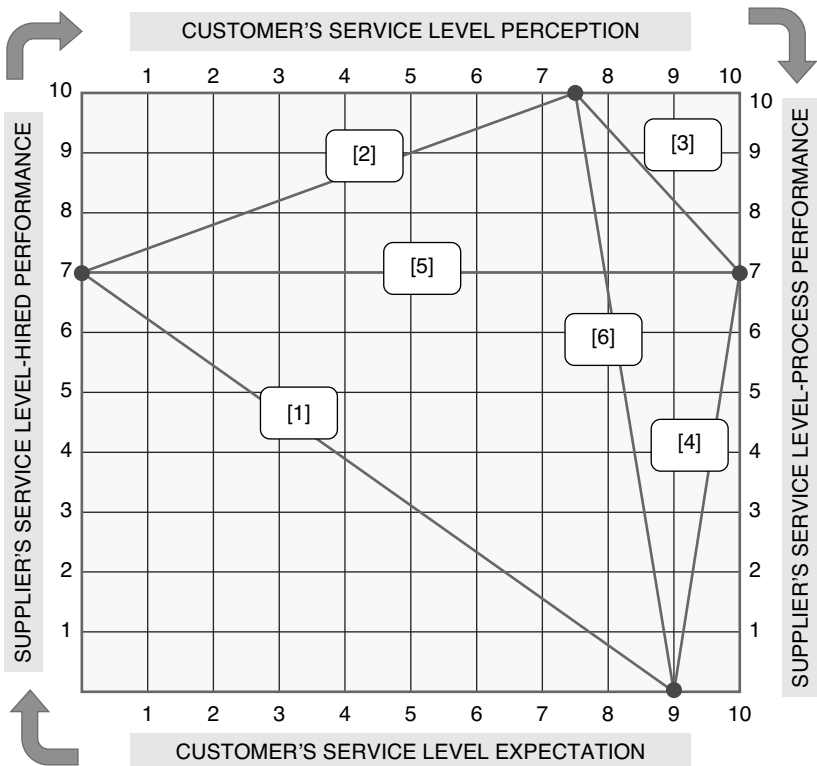
<b>Supplier's Customer Service Processes Grid</b>	PRE TRANSACTIONAL	TRANSACTIONAL	POST TRANSACTIONAL
STRATEGIC LEVEL			
TACTICAL LEVEL			
OPERATIONAL LEVEL			

**Figure 1.3** Customer service levels

This book introduces the Customer Service Management Model (CSM Model), a tool developed by the authors to evaluate the interactions present in the customer service environment. The model presents four pillars and provides a quantitative approach to understand the connection between them:

1. Customer's service level expectation
2. Supplier's service level (hired performance)
3. Customer's service level perception
4. Supplier's service level (delivered performance)

The following figure indicates that it is possible to assign scores to each pillar. The methodology used to classify each pillar should be jointly agreed between supplier and customer. It shows six correlations (1, 2, 3, 4, 5, and 6), which are analyzed more fully in Chapter 2, "Customer Service Management Model."



**Figure 1.4** CSM Model, correlation grid

Figure 1.5 illustrates the output of the CSM Model. It compares:

- If the customer hires the service level equivalent to its expectation
- If the customer’s perception of the service level is aligned to previous expectation
- If the supplier is delivering the service level as hired by the customer

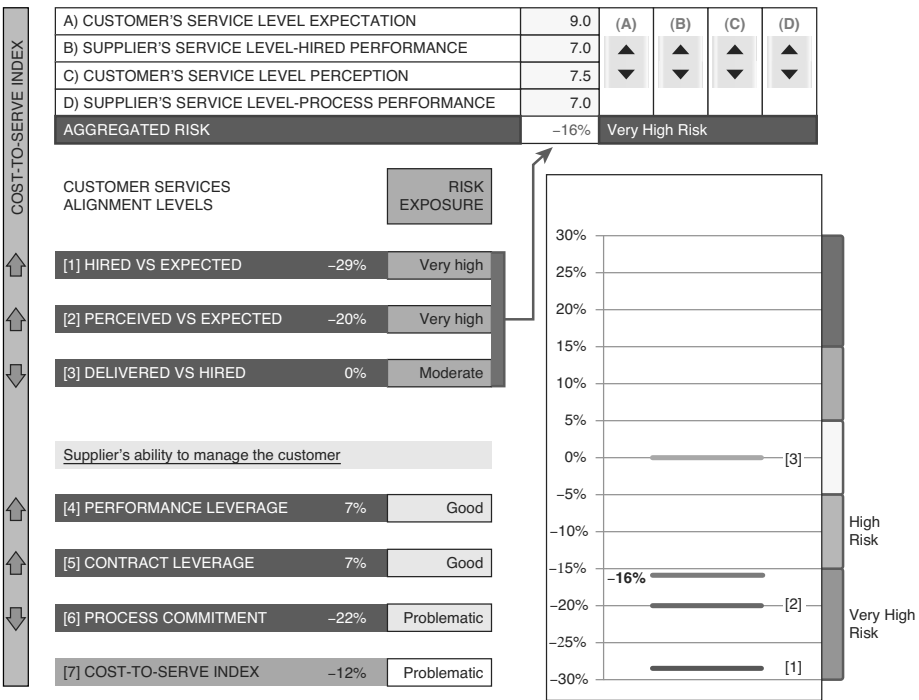
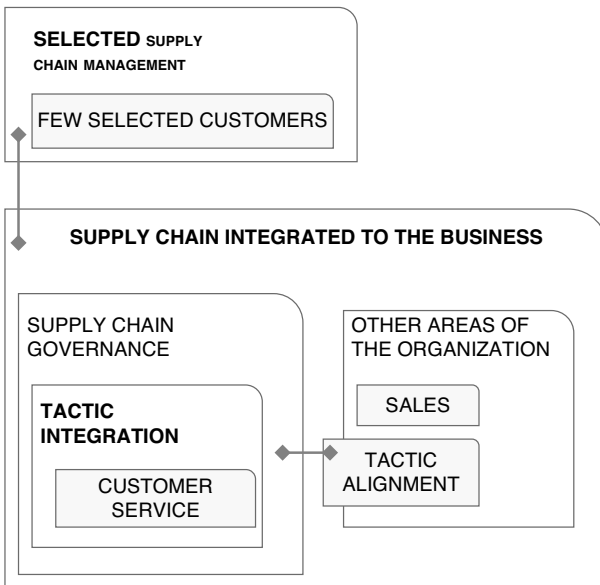


Figure 1.5 CSM Model, analysis panel

The combination of these factors defines an *aggregated risk* index. The lower this percentage, the higher the risk to which the supplier is exposed. The lower part of the panel classifies the supplier’s ability to manage the customer’s expectation. Once again, the fields are illustrated as lines 4, 5, and 6 in the correlation grid (see Figure 1.4).

The *performance leverage* compares customer's perception to actual process performance, and the *contract leverage* compares customer's perception to the actual hired service level. Finally, *process commitment* compares supplier's actual performance to the hired service level. The Customer Service Management Model is detailed in the following chapters.

These correlations interact dynamically and define the efficacy of customer service strategies. However, customer service should initially strengthen the connections with a few preferred customers and with commercial structures within its organization, known as the primary boundary.

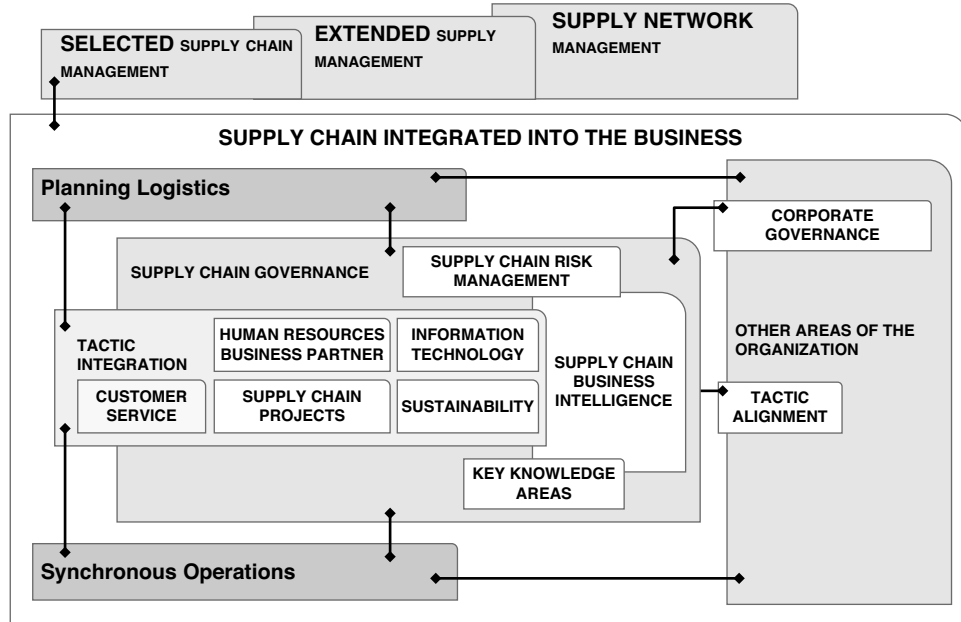


**Figure 1.6** Customer service primary boundary<sup>2</sup>

Despite the basic need of the primary connections, customer service only delivers long-term strategic benefits to the organization as it creates communications channels within various areas of the business.

<sup>2</sup> Adapted from the SNAR Model. Oliveira, A. and Gimeno. 2014. *A Guide to Supply Chain Management: The Evolution of SCM Models, Strategies, and Practices*. New York: Pearson.



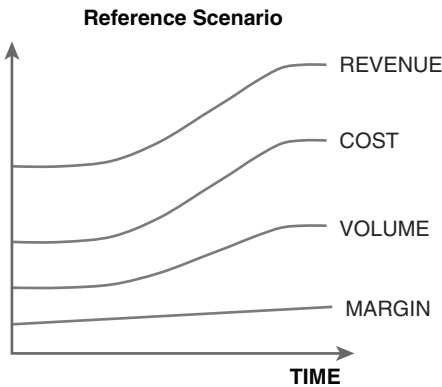


**Figure 1.7** Customer service maturity<sup>3</sup>

<sup>3</sup> Adapted from the SNAR Model. Oliveira, A. and Gimeno. 2014. *A Guide to Supply Chain Management: The Evolution of SCM Models, Strategies, and Practices*. New York: Pearson.

The ultimate goal of any organization is to deliver value to shareholders. A general model introduces three basic mechanisms that enable the creation of shareholder value: increase sales volume, increase sales revenue, reduce costs. The logical structure is quite simple:

- [1] Volume sold (quantity of products or service)
- [2] Amount paid per unit (product or service)
- [3] Revenue = [1] × [2]
- [4] Cost to serve
- [5] Profitability = [3] – [4]



**Figure 1.8** Profitability, basic mechanisms

Note that this basic algorithm has a few simplifications. For example, the cost-to-serve line aggregates all costs and expenses without segmentation. This includes imposts and taxes. We could use more sophisticated models; however, this format is well adapted to the objectives of this book.

The Supply Network Business Value Model (SNValue Model) suggests three building blocks to create shareholder value (Oliveira and Gimeno, 2014):

**1. Enabling sales volume growth.**

The main purpose of this mechanism is to increase the volume sold by the company. The volume increase generates increased revenues but the impact on profitability can vary greatly. If the strategy to increase volume defines equally increased costs, then operations profitability may reduce. However, so far when “enabling sales volume growth” is cited, the reader will only consider the number of units traded despite eventual cost consequences. The main policies of this strategy are as follows:

- Enabling market-share growth
- Reducing revenue cycle
- Reducing lost sales
- Supporting marketing and sales initiatives
- Enabling customer experience

**2. Enabling customer experience.**

The aggregate set of policies on “enabling customer experience” seeks to change customer perception positively. Customers who see greater value in the product or service offered to them are more likely to spend more, thus increasing revenue and profitability. The main policies of this strategy are as follows:

- Adding value to the customer
- Enhancing cost to serve
- Adjusting the right service at the right cost

**3. Enabling margin growth.**

The difference of this mechanism in relation to the two previous ones is in the focus given to cost reduction and elimination

of general expenses. The main policies of this strategy are as follows:

- Reducing cost of sales
- Balancing asset management
- Balancing service level and cost structure

The complete SNValue Model integrates all three mechanisms into a coordinated effort to maximize gains to the organizations. The simultaneous application of various policies has a diffuse effect on the final result. Therefore, companies often do not capture the exact correlation between the implementation of a specific action and its outcome. The quantification of the cause-effect relationship is very limited in most cases.

However, the organization may identify how each process will contribute in order to add value. A simple tool to support this exercise is the Business Value Impact Chart (BV Chart). The structure of the BVChart has four key elements; the first is the process identification according to the SNAR Model coding system (see Figure 1.9).

The second element consists of understanding how the selected process (for example, customer service, SNAR 01.03.01) influences each business value dimension. Although this analysis is business specific, there is some adherence within several different industry sectors.

**SNAR Model Coding System**

01	INTERNAL NETWORK	02	EXTERNAL NETWORK
<b>01.01</b>	<b>Planning Logistics</b>	<b>02.01</b>	<b>Preferred Supply Chain</b>
01.01.01	Demand Planning and Forecasting	02.01.01	Preferred Suppliers
01.01.02	Procurement & Purchase	02.01.02	Preferred Customers
01.01.03	Stock and Inventory Control	02.01.03	Preferred Service Providers
01.01.04	Production Planning	<b>02.02</b>	<b>Extended Supply Chain</b>
<b>01.02</b>	<b>Synchronous Operations</b>	02.02.01	Selected Suppliers
01.02.01	Transportation	01.02.02	Selected Customers
01.02.02	Warehousing	01.02.03	Selected Service Providers
01.02.03	Manufacturing	01.02.04	Preferred Noncompetitors
01.02.04	Distribution	<b>02.03</b>	<b>Supply Network Management</b>
01.02.05	International Logistics	02.03.01	All Significant Suppliers
<b>01.03</b>	<b>Tactic Integration</b>	02.03.02	All Significant Customers
01.03.01	Customer Services	02.03.03	All Significant Service Providers
01.03.02	Supply Chain Projects	02.03.04	Selected Noncompetitors
01.03.03	Information Technology	02.03.05	Preferred Competitors
01.03.04	Human Resources		
01.03.05	Sustainability		
<b>01.04</b>	<b>Other Departments</b>		
01.04.01	Sales		
01.04.02	Finance		
01.04.03	Controllershship		
01.04.04	Quality Assurance		
01.04.05	Engineering		
01.04.06	R&D		
01.04.07	HS&E		
01.04.08	Marketing		
01.04.09	IT		
01.04.10	Human Resources		
01.04.11	Regulatory		
<b>01.05</b>	<b>Supply Chain Governance</b>		
01.05.01	Key Knowledge Areas		
01.05.02	Supply Chain Business Intelligence		
01.05.03	Supply Chain Risk Management		

**Figure 1.9** SNAR Model coding system

**BUSINESS VALUE IMPACT CHART - SNValue Model**

Based on: SUPPLY NETWORK ALIGNMENT REFERENCE (SNAR) MODEL

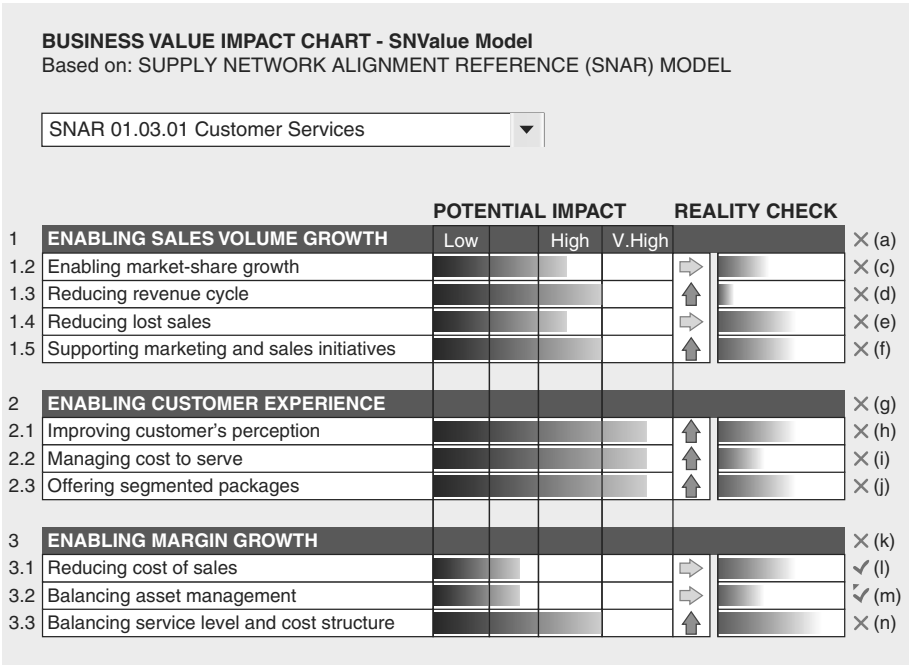
SNAR 01.03.01 Customer Services

		POTENTIAL IMPACT			
		Low	High	V.High	
1	<b>ENABLING SALES VOLUME GROWTH</b>				
1.2	Enabling market-share growth				→
1.3	Reducing revenue cycle				↑
1.4	Reducing lost sales				→
1.5	Supporting marketing and sales initiatives				↑
2	<b>ENABLING CUSTOMER EXPERIENCE</b>				
2.1	Improving customer's perception				↑
2.2	Managing cost to serve				↑
2.3	Offering segmented packages				↑
3	<b>ENABLING MARGIN GROWTH</b>				
3.1	Reducing cost of sales				→
3.2	Balancing asset management				→
3.3	Balancing service level and cost structure				↑

**Figure 1.10** BVChart for SNAR 01.03.01

The BVChart for customer service obviously has a tremendous potential impact on *enabling customer experience* despite the fact that this influence is mostly associated with the definition of strategies and policies. The customer service role is also to steer customer culture within the organization and facilitating or incentivizing other areas to perform accordingly.

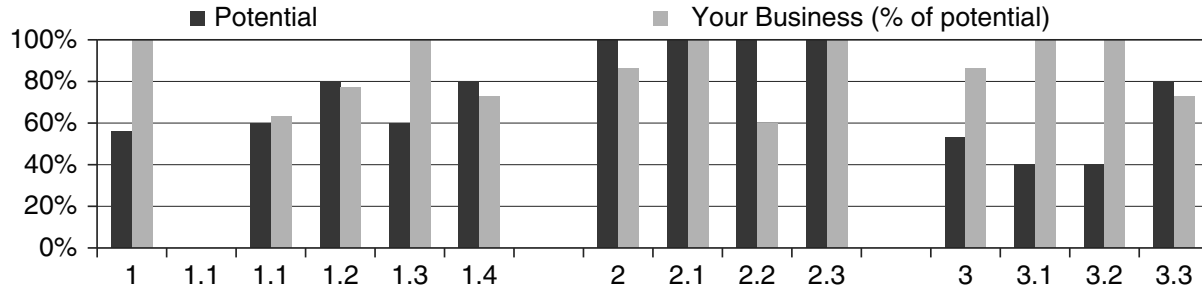
The third element is the internal evaluation (diagnosis) of the processes. To capture the real contribution requires maturity and represents the most difficult step within the methodology.



**Figure 1.11** BVChart, reality check

Each dimension of the SNValue Model has to be audited and evaluated against set expectations. The example illustrated in Figure 1.12 indicates that this company is fully delivering the potential benefits of the margin growth pillar while the benefits from both the sales growth and customer experience pillars are only partially delivered.

The last element in the BVChart is the graphical representation of the SNValue dimension. It compares the expectations to a real situation.



**Figure 1.12** BVChart graph



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# Index

## A

adaptability indicators, 135-138  
aggregated risk in CSM Model scenarios, 40. *See also* targeted aggregate risk  
amplification effect, 124-125

## B

balanced forces environment scenario (CSM Model), 37-43  
balancing customer- and product-centric cultures, 81-85  
business relationship knowledge areas  
  intensity categories, 67  
  list of, 61  
Business-Driven Customer Service Model, 86-88  
BVChart (Business Value Impact Chart), 11-14

## C

capability assessment, 100  
Christopher, Martin, 89  
CLI (contract leverage index), 41  
CLM (Council of Logistics Management), 93  
collaborative planning, forecasting, and replenishment (CPFR), 96-99  
  business case scenario, 100-130

  complaint analysis, 155-157  
  compliance cell (CSBO Model), 164  
    customer service activities in, 168  
    process simplification, 172  
  continuous replenishment (CR), 94  
  contract leverage in CSM Model, 7, 19, 32  
  contract leverage index (CLI), 41  
  costs in international logistics, 75-77  
  cost-to-serve index, 20, 33-37, 39-40  
  Council of Logistics Management (CLM), 93  
  CPFR (collaborative planning, forecasting, and replenishment), 96-99  
    business case scenario, 100-130  
  CR (continuous replenishment), 94  
  CSBO Model (Customer Service Balanced Organization Model), 161-164  
    business case scenario, 165-172  
  CSC (customer service cycle), 152-157  
  CSM Model (Customer Service Management Model), 4-7. *See also* customer service  
    cost-to-serve index, 20  
    customer relationship horizon, 27-37  
    customer service alignment levels, 18-19

- customer service processes, 49-57
  - post-transactional elements*, 56-57
  - pre-transactional elements*, 51-55
  - transactional elements*, 55-56
- output, 6
- pillars of, 4-5, 17
- scenarios, 37-48
- suppliers' customer management ability, 19-20
- CTS index.** *See* cost-to-serve index
- customer experience, enabling, 10
- customer management, suppliers' ability, 19-20
- customer relationship horizon, 27-37
- customer service. *See also* CSM Model (Customer Service Management Model)
  - alignment levels, 18-19, 29-30
  - business relationship knowledge areas
    - intensity categories*, 67
    - list of*, 61
  - distribution channel example, 73-75
  - expectations
    - hired service level versus*, 18, 20-21
    - perception versus*, 18, 22-24
  - hired service level
    - delivered service level versus*, 18-19
    - expectations versus*, 18, 20-21
  - interaction management
    - example, 63-66
  - job descriptions
    - customer service analyst*, 173-175
    - customer service and logistics manager*, 175-178
    - customer supply chain director*, 178-179
    - levels, 4
    - maturity of, 8
    - primary boundary, 7, 59-60
    - processes, 49-57
      - post-transactional elements*, 56-57
      - pre-transactional elements*, 51-55
      - transactional elements*, 55-56
    - secondary boundary, 60
    - shareholder value, creating, 9-12
    - strategies
      - balancing customer- and product-centric strategies*, 81-85
      - Business-Driven Customer Service Model*, 86-88
      - customer-centric culture*, 79-80
      - demand planning and forecasting*, 67-68
      - distribution*, 70-73
      - international logistics*, 75-77
      - inventory control*, 68-69
      - segmentation*, 77-78
      - sustainability in supply chains*, 89-92
    - supplier's process performance, 25-26
    - supply chain management. *See* supply chain management
  - customer service analyst (job description), 173-175
  - customer service and logistics manager (job description), 175-178
  - Customer Service Balanced Organization Model (CSBO Model)**, 161-164
    - business case scenario, 165-172
  - customer service compliance cell (CSBO Model), 164
    - customer service activities in, 168
    - process simplification, 172

customer service cycle (CSC), 152-157

### Customer Service Management

Model (CSM Model), 4-7. *See also*

customer service

cost-to-serve index, 20

customer relationship horizon, 27-37

customer service alignment levels,  
18-19

customer service processes, 49-57

*post-transactional elements*,  
56-57

*pre-transactional elements*,  
51-55

*transactional elements*, 55-56

output, 6

pillars of, 4-5, 17

scenarios, 37-48

suppliers' customer management  
ability, 19-20

customer supply chain director (job  
description), 178-179

### customer-centric culture

balancing with product-centric  
culture, 81-85

product-centric culture versus,  
79-80

customers' complaints performance  
indicator, 144, 155-157

cycle stock, 69

## D

dead stock, 69

delivered service level, hired service  
level versus, 18-19

demand cycle, 150-151

demand planning and forecasting,  
67-68

DIH performance indicator, 146-147

distribution, 70-73

distribution channel example, 73-75

distributors, 72

## E

ECR Movement (Efficient Consumer  
Response Movement), 93-94

efficacy indicators, 135

EFT (equivalent full-time) in CSBO  
Model, 170

expectations

customer relationship horizon, 27-37

hired service level versus, 18, 20-21

perception versus, 18, 22-24

## F

forecasting, 67-68. *See also* sales

forecast accuracy

business case scenario, 100-130

CPFR (collaborative planning,  
forecasting, and replenishment),  
96-99

## G

generalist wholesalers, 71-72

governance. *See* supply chain  
governance

## H

hired service level

customer relationship horizon, 27-37

delivered service level versus, 18-19

expectations versus, 18, 20-21

HRBP (human resource business  
partner) in supply chain  
governance, 160-162

## I

interaction management

example, 63-66

international logistics, 75-77

in-transit stock, 69

inventory by service level  
 performance indicator, 139  
 inventory control, 68-69  
 inventory reduction, 126

## J

job descriptions  
 customer service analyst, 173-175  
 customer service and logistics  
 manager, 175-178  
 customer supply chain director,  
 178-179

## K

key accounts, 73  
 knowledge areas for business  
 relationships  
 intensity categories, 67  
 list of, 61  
 knowledge management  
 with human resource business  
 partner (HRBP), 160-162  
 in virtuous cycle, 159-169

## L

LFR (line fill rate), 132-135  
 logistics  
 customer service and logistics  
 manager (job description), 175-178  
 defined, 93

## M

margin growth, enabling, 10-11

## O

OCT (order cycle time), 157  
 on-time in-full (OTIF) performance  
 indicator, 128-133, 146-147  
 order size performance indicator, 143

order-management cell (CSBO  
 Model), 163-164  
 customer service activities in, 168  
 equivalent full-time (EFT)  
 needed, 170  
 order-size variation, 125  
 OTIF (on-time in-full) performance  
 indicator, 128-133, 146-147

## P

PCI (process commitment index), 41  
 PCP cycle (production planning and  
 control cycle), 151-152  
 perception  
 customer relationship horizon, 27-37  
 expectations versus, 18, 22-24  
 performance indicators  
 attributes of, 42  
 in supply chain management,  
 130-147  
 types of, 135  
 performance leverage in CSM Model,  
 7, 19, 32  
 performance leverage index (PLI), 41  
 pipeline mapping, 102-103  
 planning logistics in SNAR Model,  
 67-69  
 PLI (performance leverage index), 41  
 post-transactional processes  
 in CSBO Model, 164  
 in CSM Model, 56-57  
 pre-transactional processes in CSM  
 Model, 51-55  
 primary boundary in customer service,  
 7, 59-60  
 process categorization, 49-57  
 post-transactional elements, 56-57  
 pre-transactional elements, 51-55  
 transactional elements, 55-56  
 process commitment in CSM Model,  
 7, 19, 32  
 process commitment index (PCI), 41

process performance by suppliers, 25-26

### product-centric culture

- balancing with customer-centric culture, 81-85
- customer-centric culture versus, 79-80

production planning and control cycle (PCP cycle), 151-152

## R

### replenishment

- business case scenario, 100-130
- continuous replenishment (CR), 94
- CPFR (collaborative planning, forecasting, and replenishment), 96-99

resource usage example (supply chain sustainability), 89-92

retailers, 73

returns performance indicator, 142-143

reverse logistics, 92

### risk

- aggregated risk in CSM Model scenarios, 40
- targeted aggregate risk, 31

## S

S&OP (sales and operations planning), 147-157

safety stock, 69, 128

sales forecast accuracy, 119-122, 129.

*See also* forecasting

sales volume growth, enabling, 10

scenarios in CSM Model, 37-48

seasonal stock, 69

secondary boundary in customer service, 60

### segmentation

- categories of, 84
- as customer service strategy, 77-78
- standardization versus, 70-71

service. *See* customer service

service level and inventory

performance indicator, 143

shareholder value, creating, 9-12

SKMap (Supply Chain Knowledge Management Maturity Roadmap), 1-2

SNAR Model (Supply Network Alignment Reference Model), 1-3

coding system, 11-12

planning logistics, 67-69

synchronous operations, 69-77

SNG Cycle (Supply Network

Governance Cycle), 42-43

SNValue Model (Supply Network Business Value Model), 10-14

SPC (statistical process control) analysis, 116-118

specialized wholesalers, 72

standardization, segmentation versus, 70-71

statistical process control (SPC) analysis, 115-118

stock, types of, 69

strategies (customer service)

- balancing customer- and product-centric strategies, 81-85
- Business-Driven Customer Service Model, 86-88

customer-centric culture, 79-80

demand planning and forecasting, 67-68

distribution, 70-73

interaction management example, 63-66

international logistics, 75-77

inventory control, 68-69

segmentation, 77-78

sustainability in supply chains, 89-92

### suppliers

- customer management ability, 19-20
- process performance, 25-26

supply chain governance  
 human resource business partner  
 (HRBP) in, 160-162  
 S&OP (sales and operations  
 planning), 147-157  
 SKMap (Supply Chain Knowledge  
 Management Maturity Roadmap),  
 1-2

Supply Chain Knowledge  
 Management Maturity Roadmap  
 (SKMap), 1-2

supply chain management  
 CPFR (collaborative planning,  
 forecasting, and replenishment),  
 96-99  
*business case scenario, 100-130*  
 ECR Movement (Efficient  
 Consumer Response Movement),  
 93-94  
 performance indicators, 130-147  
 VMI (vendor-managed inventory),  
 94-96

supply chains, sustainability in, 89-92

supply cycle, 151

Supply Network Alignment Reference  
 Model (SNAR Model), 1-3  
 coding system, 11-12  
 planning logistics, 67-69  
 synchronous operations, 69-77

Supply Network Business Value  
 Model (SNValue Model), 10-14

Supply Network Governance Cycle  
 (SNG Cycle), 42-43

sustainability in supply chains, 89-92

synchronous operations in SNAR  
 Model, 69-77

## T

tactic integration in supply chain  
 governance, 1-2

targeted aggregate risk, 31

transactional processes  
 in CSBO Model, 163  
 in CSM Model, 55-56

turnover, impact on virtuous cycle,  
 159-169

## U

unprofitable customers, 78

## V

value stream mapping, 104-105

virtuous cycle, 159-169

VMI (vendor-managed inventory),  
 94-96