

21世纪 高等职业教育创新型精品规划教材
国家级示范性高等职业院校重点建设专业精品课程规划教材

现代物流 专业英语

主编 胡连荣

*Modern
Logistics English*

- 基于工作过程导向选择内容框架，按行动体系序化知识内容
- 全面采用任务驱动的编写模式、模块化的体例结构、案例式的教学方法
- 理论以“必需、够用”为度，实训项目注重实用性、技能性
- 教材内容体现教学过程，方便教师的教与学生的学



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现代物流专业英语

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内容提要

《现代物流专业英语》在选材上力求紧贴物流学科的发展趋势,反映现代物流的最新概念、技术与发展。全书由9章组成,每章包括2~3个单元,涉及到供应链管理、仓储与库存管理、运输、包装、配送、物流信息等物流管理的各个方面。每个单元由知识导入、正文、单词和词组注释、难点分析、练习题和补充阅读材料构成。每单元均设有供学生讨论的话题,激发学生参与教学并提高英文表达能力。本书的附录1收录了较为全面的物流专业英语词汇,方便学习者自学,附录2列出了一些物流方面的英文网站,方便学习者进行资料查询。

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前 言

随着我国经济的快速发展,物流业目前正处于高速增长的上升阶段,存在着巨大的市场潜力和广阔的发展前景。现代物流的发展趋势是信息化、网络化、智能化和一体化,我国物流业必须时刻关注国际物流技术发展的最新动态,利用先进的技术改造仓储、运输和包装等物流环节,以提高物流效率,增强物流企业在国际物流市场上的竞争力,加快物流的现代化建设。在这种背景下,我们应该不断学习国际最前沿的物流知识,掌握物流知识的英文表达。为此,我们编写了这本《现代物流专业英语》。本书参考了大量的英文原版资料,力求语言准确、精练;同时紧贴物流学科的发展趋势,反映现代物流的最新概念、技术和发展。本书每章都有补充阅读材料,可满足部分水平较高的读者的自学要求。课后讨论题型的设计能够激发学习者学习英语的积极性并引导其开口讲英语。

本书既可以作为高等职业院校、普通高等院校物流管理专业的教材,也适合作为各个层次物流培训和物流从业人员教学与学习的参考书。

本书由胡连荣担任主编,高静娟担任副主编,具体分工如下:胡连荣编写第3、4、7章;高静娟编写第1、2章;王雪丽编写第5、6章;冯雅琪编写第8、9章。

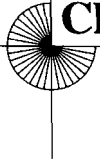
由于编写时间仓促,编者水平有限,书中难免有不足之处,敬请读者批评指正。

编 者

2009年4月

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Chapter 1 Overview of Logistics

Guide to Text

The main mission of this chapter is to make the reader have a clear concept of logistics and logistics management after reading the whole chapter. In addition, you will know what the elements of logistics are and how the logistics management develops after learning the text.

Text

Unit 1 Introduction to Logistics

The term “logistics” originally comes from the moving, lodging and supplying of troops. Military commanders have always been aware of the importance of good logistics to the success of their campaigns. Many military failures have arisen from failure to maintain a logistic line of communication. The term involves not only the movement of goods, but also of people, as well as housing and feeding them. Before the material, food and accommodation can be supplied, they must first be obtained from somewhere. It may be bought “off the shelf”, but if it is not readily available it must be designed and made. Logistics is also described as the art of achieving the “six rights”: they are getting the right things, in the right quantity, to the right place, at the right time, in the right condition and at the right price. ^[1]

In the business world, however, the concept of “logistics” is applied solely to “Material Replenishment Programs” (MRP) and is confined to the manufacturing sector at the beginning. Therefore the extension of concept to company operations is a relatively new one and the earliest dates back to the 1950s in the USA.

Logistics starts with the provision of raw materials and semi-finished goods for the manufacturing process, and finishes up with the physical distribution and after-sales service of products.

Economically, this creates a new source of profit characterized by the development of mass distribution and attention to service quality. The two basic objectives in practicing business logistics, cost reduction and time saving, have enabled companies to profit not only in performance and quality

but also in customer satisfaction. [2]

Operationally, companies have realized the different aspects of logistics instead of viewing them as separate processes, thus substantial saving can be made within their business outgoing expenditure.

Definition of Logistics

What is logistics in the sense that it is understood today? There are a number of definitions of what is understood by the word “logistics” and, in some senses, the use of the word is simple, while in others it is more complex. The following definitions will help understand the term:

Logistics(business definition): Logistics is defined as a business planning framework for the management of material, service, information and capital flows. It includes the increasingly complex information, communication and control systems required in today’s business environment.

——(Logistics Partners Oy, Helsinki, FI, 1996)

Logistics(military definition): The science of planning and carrying out the movement and maintenance of forces. . . those aspects of military operations that deal with the design and development, acquisition, storage, movement, distribution, maintenance, evacuation and disposition of material; movement, evacuation, and hospitalization of personnel; acquisition of construction, maintenance, operation and disposition of facilities; and acquisition of furnishing of services.

——(JCS Pub. 1-02 excerpt)

Logistics: The procurement, maintenance, distribution, and replacement of personnel and material.

——(Websters Dictionary)

Logistics: The process of planning, implementing, and controlling the efficient, cost-effective flow and storage of raw materials, in-process inventory, finished goods and related information from point of origin to point of consumption for the purpose of meeting customer requirements.

——(Reference: Canadian Association of Logistics Management, <http://www.calm.org/calm/AboutCALM/AboutCALM.html>, 12 Feb. , 1998)

Logistics: Logistics is the science of planning and implementing the acquisition and use of the resources necessary to sustain the operation of a system.

——(Reference: ECRC University of Scranton / Defense Logistics Agency included with permission from: HUM—*The Government Computer Magazine* “Integrated Logistics” December 1993, Walter Cooke)

From these definitions logistics can be briefly described like this: Logistics means having the right thing, in the right place, at the right time. But in this book the underlying concept might be defined as follows:

Logistics is the process of strategically managing the procurement, movement and storage of materials, parts and finished inventory (and the related information flows) through the organization and its marketing channels in such a way that current and future profitability are maximized through the

cost-effective fulfillment of orders.

This basic definition will be extended and developed as time goes by, but it makes an adequate starting point.

Role of Logistics

Let us now have a look at how logistics works. It is important to recognize the importance of a dynamic balance between the minute details and the main elements involved in a product. The role of logistics is to maintain that balance. Once the firm realizes the importance of logistics it is necessary that the firm make full and efficient use of logistics. The first step is to create a buyer value for the customer and a strategic value for the firm.

The customer is the most important asset for a company. He drives the entire supply chain including manufacturing, marketing and logistics. Hence it is important for a firm to have a clear understanding of what the customer demands and to keep up with the customers' expectations. Once a company has a clear understanding of its customers' requirements it must devise a strategy on how to use logistics to achieve it. This means that the company has to have a clear understanding or assessment of company's strategic direction.

Now let's take a look at the various steps involved in a logistics strategy development and planning process.

Visioning: this includes the systematic development of an organizational consensus regarding the key inputs to the logistics planning process as well as identification of the potential alternative logistics approaches. This is an important step for the following reasons:

1. Help define a strategic direction for the company and also get a clear understanding of the role of logistics.
2. Get a clear idea of the requirements of the various segments of customers.
3. Have a look at the various factors that would affect the strategy of the company.
4. Define alternative strategies and also the scope of the planning effort.

Strategic Analysis: this involves taking a look at the various components involved in the process and selecting the best logistics process among the alternatives. These components, which are to be reviewed, are revealed during the first step. This may include from revamping the entire process to assessing how a single component can be used more effectively.

Planning: this involves the assembling of a plan that outlines the mission and goals for the logistics function and the programs and activities to achieve these goals. Logistics planning is an iterative process. The plans have to be redefined every year to improve the quality of performance.

Managing Change: this involves effective management to implement enhanced ways of conducting business. The management should keep changing the plans in accordance with the change in the market and also coach the organization to effectively embrace this change.

Elements of Logistics

A logistics system can include many different functional activities such as procurement, transportation, storage, materials handling, inventory control, packaging, information, order processing, customer service levels, demand forecasting, distribution communications, plant and warehouse site locations, return goods handling (reverse distribution), etc. One logistics system does not fit all companies, so the number of activities in a logistics system can vary from company to company. The basic activities are described briefly below.

Procurement (Purchasing)

The procurement is the process of obtaining all the goods and services required by an organization from external sourcing. Since these inputs can have a direct impact on both the cost and quality of the final product/service offered to the consumer, this activity is vital to the overall success of the logistics effort.

Transportation

Transportation is an element that pervades the entire logistics, rather than being a separate element of it. It refers to the physical movement of goods from a point of origin to a point of consumption and can involve raw materials being brought into the production and/or finished goods shipped out to the customer.^[3] Transportation has assumed a greater role in many logistics systems.

Storage and Materials Handling

Storage encompasses the tasks necessary to manage what space is needed; material handling is concerned with the movement of goods within that space. Thus, the former would consider issues related to warehouse number, size, layout, and design; the latter would focus on the systems needed to move goods into, through, and out of each facility. Obviously, an organization's inventory policies have a direct impact on their storage and handling needs.

Inventory Control

Inventory control deals with balancing the cost of maintaining additional products available against the risk of not having those items when the customer wants them (i. e. the cost of lost sales). This task has become more complex as firms have gradually lowered inventory levels. It is not doubted that holding inventory costs money, so firms do not want to have any more than that is absolutely necessary to keep the customers satisfied. Although all of the interest focuses on reducing inventories, the fact remains that they are still necessary for serving customers in a given market. The challenge in this situation is to manage the rest of the logistics system to coordinate the lack of inventory so that customer service does not suffer.

Packaging

Packaging focuses on protecting the product while it is being shipped and stored. Too much packaging increases costs while inadequate protection can result in merchandise damage and, ultimately, customer dissatisfaction. Furthermore, since every bit of packaging is ultimately discarded, logistics managers must also consider the societal costs associated with waste disposal. Increasingly,

firms are working to develop materials that provide requisite levels of protection yet are recyclable or quickly biodegradable.

Information

Flow of information in logistics is as fundamental as the flow of goods and materials. The whole logistics process is kept moving by the supply of information and communication. Such information flows occur not only internally within companies, but also between external suppliers, contractors, and customers. Indeed, firms are now linking their internal logistics information systems with those of their vendors and customers as a means of adding more value to the entire channel. Such an open exchange of information can result in faster order placement, quicker benefit delivery, and greater accountability throughout the logistics process.

New Words and Expressions

provision	<i>n.</i>	供应;供应品
procurement	<i>n.</i>	获得;取得
implement	<i>v.</i>	贯彻;实现;执行
fundamental	<i>adj.</i>	基础的;基本的
	<i>n.</i>	基本原则;基本原理
strategic	<i>adj.</i>	战略的;战略上的
storage	<i>n.</i>	存储
materials handling		原料处理;物料运送
mission	<i>n.</i>	任务;使命
cost-effective	<i>adj.</i>	有成本效益的;划算的
physical distribution		实体配送
raw material		原材料
inventory control		存货控制
internal	<i>adj.</i>	内部的

Notes

[1] Logistics is also described as the art of achieving the “six rights”: they are getting the right things, in the right quantity, to the right place, at the right time, in the right condition and at the right price.

物流又被描述为“6R”,它们分别是获取适当的物品、以适当的数量、在适当的地点、在适当的时间、具备适当的物品条件和适当的价格。

[2] The two basic objectives in practicing business logistics, cost reduction and time saving, have enabled companies to profit not only in performance and quality but also in customer satisfaction.

成本缩减和省时是物流业务处理的两个基本目标,这两个目标使得企业的效益不仅来自

于业务处理和工作质量,还有客户满意。

[3] It refers to the physical movement of goods from a point of origin to a point of consumption and can involve raw materials being brought into the production and/or finished goods shipped out to the customer.

运输指物品从供应源点一直到消费全过程的实体的位置移动过程,它包括原材料的购买、生产一直到最终产品运出送往消费者手中的整个过程。

Exercises

I. Answer the following questions according to the text:

1. What on earth is logistics ?
2. What are the elements included in logistics?
3. Is logistics important in social economy? Why?

II. Please translate the following sentences into Chinese:

1. The term "logistics" originally comes from the moving, lodging and supplying of troops.
2. Operationally, companies have realized the different aspects of logistics instead of viewing them as separate processes, thus substantial saving can be made within their business outgoing expenditure.
3. Once the firm realizes the importance of logistics it is necessary that the firm make full and efficient use of logistics.
4. Hence it is important for a firm to have a clear understanding of what the customer demands and to keep up with the customers' expectations.

III. Topics for discussion

Try to describe the word "logistics" in your own words.

Unit 2 Introduction to Logistics Management

Logistics Management

Logistics management is part of the supply chain which plans, implements and controls the efficient, effective forward and reverse flow and storage of goods, services and related information between the point of origin and the point of consumption in order to meet customers' requirements. A professional working in the field of logistics management is called a logistician.

The Chartered Institute of Logistics & Transport (CILT) was established in the United Kingdom in 1919 and was granted the Royal Charter in 1926. The Chartered Institute is one of professional bodies or institutions for the logistics & transport sectors, which offers professional qualification or degree in logistics management.

Evolution of Logistics Management Concept

Above all, logistics management concept has evolved over the last three decades from the narrowly defined distribution management to the integrated management and to the global supply chains. ^[1]

Physical Distribution

The first phase of the logistics management concept began during the 1960s to replace the fragmented management by physical distribution management. Physical distribution is the term applied to the broad range of activities concerned with efficient movement of finished products from the end of the production line to the consumer. These activities include functions such as freight transport, warehouse location, order processing, market forecasting and customer service. The main focus of physical distribution is on the rationalization of the relationship between the firm and its customers.

Internally Integrated Logistics

Logistics management has experienced the second transformation in 1980s. The experience during 1960s and 1970s suggested that the physical distribution function should be integrated with pre-production activities such as material sourcing and work-in-process inventory to form a total material flow management.

Material flow was thought to be a process that involved horizontal movement of inventory from the time the raw material was delivered until the time when an account receivable was recorded by the firm (a sale made and the product shipped). Emphasis varied from the minimization of the level of inventory to the speed of processing (e. g. inventory velocity). These logistics management techniques were primarily understood at the level of individual firm, but it has little impact on the improvement in the overall efficiency of the national economy.

Externally Integrated Logistics

This integrated logistics management approach has made the third evolution in the early 1990s and beyond. It has extended the concept beyond one firm to all firms involved in the whole supply chain, outsourcing the internally supplied materials and products to external suppliers. This open idea of enterprises offered firms an opportunity to view the relationship with vendors, suppliers, third party logistics support agents and customers in a different way, each forming a part of the channel. Participants in the channel gain competitive advantage through improving the overall channel efficiency by reducing risk and effectively leveraging the corporate resources of each channel member. Coupled with the recent development of electronic data interchange (EDI), this approach began to bring about a broader impact on macro economic efficiency.

Global Supply Chain Management

The fourth evolution has taken place in the form of the global logistics management, which has been applied by MNCs (Multi-national Corporations). With declining profit margin in the domestic market and in face of need of continued business expression, these corporations are seeking new worldwide markets on an unprecedented scale. Global marketing and sale initiatives are the trend to-

ward which MNCs are increasingly gearing up. This trend for internationalization, in turn, requires much more sophisticated management techniques over the entire process of the commodity movement from the countries of origins to the countries of destinations. Moving a wide variety of products around the world 24 hours a day, 365 days a year requires logistics management techniques significantly different from those developed for domestic markets. Close linkage of all players in the global supply chains requires the logistics management underpinned by the international EDI system. This globalization of business activities is a major factor reshaping the international trading activities to which all countries are required to adjust by adapting their institutional frameworks.

Mission of Logistics Management

The underlying philosophy behind the logistics management concept is that of planning and coordinating the materials flow from source to user as an integrated system rather than, as was so often the case in the past, managing the goods flow as a series of independent activities.^[2] Thus under a logistics management regime the goal is to link the marketplace, the distribution network, the manufacturing process and the procurement activity in such a way that customers are serviced at higher levels and yet at lower cost. In other words, this means to achieve the goal of competitive advantage through both cost reduction and service enhancement.

Logistics management, it can be argued, has the potential to assist the organization in the achievement of both a cost/productivity advantage and a value advantage. The mission of logistics management is to plan and coordinate all those activities necessary to achieve desired levels of delivered service and quality at the lowest possible cost. Logistics must therefore be seen as the link between the marketplace and the operating activity of the business. The scope of logistics spans the organization, from the management of raw materials to the delivery of the final product.

Logistics management is the means whereby the needs of customers are satisfied through the coordination of the materials and information flows that extend from the marketplace, through the firm and its operations and beyond that to suppliers. To achieve this company-wide integration clearly requires a quite different orientation than that is typically encountered in the conventional organization.

For example, for many years marketing and manufacturing have been seen as largely separate activities within the organization. At best they have co-existed, at worst there has been open warfare. Manufacturing priorities and objectives have typically been focused on operating efficiency, achieved through long production runs, minimized set-ups and changeovers and product standardization. On the other hand, marketing has sought to achieve competitive advantage through variety, high service levels and frequent product changes.

In today's more turbulent environment there is no longer any possibility of manufacturing and marketing acting independently of each other. The internecine disputes between the "barons" of production and marketing are clearly counter-productive to the achievement of overall corporate goals.

It is no coincidence that in recent years both marketing and manufacturing have become the fo-

cus of renewed attention. Marketing as a concept and a philosophy of customer orientation now enjoys a wider acceptance than ever in the western world. It is now generally accepted that the need to understand and meet customer requirements is a prerequisite for survival. At the same time, in the search for improved cost competitiveness, manufacturing management has been the subject of a massive renaissance. The last decade has seen the rapid introduction of flexible manufacturing systems (FMS), of new approaches to inventory based on materials requirements planning (MRP) and Just-in-time (JIT) methods and, perhaps most important of all, a sustained emphasis on quality.^[3]

Equally there has been a growing recognition of the critical role that procurement plays in creating and sustaining competitive advantage as part of an integrated logistics process. Leading-edge organizations now routinely include supply-side issues in the development of their strategic plans. Not only is the cost of purchased materials and supplies a significant part of total costs in most organizations, but also there is a major opportunity for leveraging the capabilities and competencies of supplies through closer integration of the buyers' and the suppliers' logistics process.

In this scheme of things, logistics management is therefore essentially an integrative concept that seeks to develop a system-wide view of the firm. It is fundamentally a planning concept that seeks to create a framework through which the needs of the marketplace can be translated into a manufacturing strategy and plan, which in turn links into a strategy and plan for procurement. Ideally there should be a "one-plan" mentality within the business, which seeks to replace the conventional stand-alone and separate plans of marketing, distribution, production and procurement. This, quite simply, is the mission of logistics management.^[4]

New Words and Expressions

evolution	<i>n.</i>	进化;演变
conventional	<i>adj.</i>	惯例的;常规的;传统的
internecine	<i>adj.</i>	两败俱伤的;互相残杀的
return goods handling		回收处理
reverse distribution		反向分配(回收物流)
managing change		管理变革
Just-in-time(JIT)		准时制
lean thinking		精益思想
third-party logistics		第三方物流
EDI	<i>abbr.</i>	(electronic data interchange) 电子数据交换
counter-productive	<i>adj.</i>	达不到预期目标的;反生产的

Notes

[1] Above all, logistics management concept has evolved over the last three decades from the narrowly defined distribution management to the integrated management and to the global supply

chains.

总的来讲,在过去的30年间,物流管理概念的发展经历了3个阶段:初步的配送管理、综合管理、全球化供应链。

[2] The underlying philosophy behind the logistics management concept is that of planning and coordinating the materials flow from source to user as an integrated system rather than, as was so often the case in the past, managing the goods flow as a series of independent activities.

物流管理概念根本的哲学意义是对原料从源头到用户的整个过程进行计划并协调的综合管理过程,而不是像过去认为的那样,将对货物流通的管理看作是一系列独立的活动。

[3] The last decade has seen the rapid introduction of flexible manufacturing systems (FMS), of new approaches to inventory based on materials requirements planning (MRP) and Just-in-time (JIT) methods and, perhaps most important of all, a sustained emphasis on quality.

最后一个阶段见证了柔性制造系统(FMS)的飞速发展和基于物料需求计划(MRP)和准时制(JIT)的新的库存控制方法,也许更重要的是,对质量的不断重视。

[4] Ideally there should be a "one-plan" mentality within the business, which seeks to replace the conventional stand-alone and separate plans of marketing, distribution, production and procurement. This, quite simply, is the mission of logistics management.

理论上来说,应该有个“单一计划”思路,来取代营销、分销、生产、获取这些传统的、相互独立的计划方式。这也正是物流管理的使命所在。

Exercises

I. Answer the following questions according to the text:

1. What on earth is logistics management?
2. What is the mission of logistics management?
3. Is logistics management important in social economy? Why?

II. Please translate the following sentences into Chinese:

1. Logistics management is part of the supply chain which plans, implements and controls the efficient, effective forward and reverse flow and storage of goods, services and related information between the point of origin and the point of consumption in order to meet customers' requirements.
2. The Chartered Institute is one of professional bodies or institutions for the logistics & transport sectors, which offers professional qualification or degree in logistics management.
3. The mission of logistics management is to plan and coordinate all those activities necessary to achieve desired levels of delivered service and quality at the lowest possible cost.
4. For example, for many years marketing and manufacturing have been seen as largely separate activities within the organization.

III. Topics for discussion

How to understand the concept of logistics management?

Supplementary Reading Materials

History of Logistics / Supply Chain Management

Logistics has always been a critical part as one of the 4P in Marketing: product, place, price and promotion. The “place” component ensures the product is at the right place, at the right time, in the right quantity and the right quality. Read about how the logistics discipline started and where it is headed.

Military Roots

Logistics received recognition in military operations during World War II. It gained its momentum as it contributed to the effective distribution of machinery and supplies to troops. A service delivery failure here may mean an increase in unnecessary fatalities. Peter Drucker (a business guru in the 1960's) identified logistics as a growing concern within business.

Deregulation

As the economies in North America evolved in the 1970's and 1980's, transportation deregulation changed the competitive landscape of business. Carriers were free to charge their customers (shippers) at a competitive rate for their shipments. Warehousing companies that typically acted as surplus inventory storage locations married up with transportation companies to offer customers full-service solution capabilities. This formed the beginning of the 3rd party logistics business and paved the way for outsourcing logistical activities.

Globalization

With the advent of globalization, firms began to seek ways of cutting their production costs. Thus, multi-national corporations re-located their factories of production to low-wage countries to gain a competitive advantage. Increasingly, more and more countries are joining the World Trade Organization (WTO) and opening their country to foreign capital investment (most recently in China). Retail giants like Wal-Mart exploit these new efficiencies and increase their imports from new emerging economies to reduce product prices in their stores. Thus, the new challenge is how to manage the product and information flows around the world. The increased pressure on managing these operations further underscored the importance of logistics as an area for optimization.

Information Technology

Another contributor that led to an increased presence for logistics was the explosion in information technology and use of computers throughout the 1980's and onwards. The cost of computing has decreased year after year since then and computing power rose exponentially. The use of the Internet and increased bandwidth capacity further enhanced and enabled quick connectivity and collaborative relationships that reduced inventories and created a Just-In-Time operating opportunity for organizations. These efficiencies reduced errors, increased fill-rates and cut overall operating costs for organizations.

Supply Chain Management

As the above factors fuelled efficiencies, logistics gained more prominence in organizations. A natural extension was to link the logistical operations from each firm to the entire supply chain. The new paradigm became known as the “systems approach” to supply chain management and introduced the concept of trade-offs. In order to achieve least total supply chain cost, operational integration of the 5 main areas of logistics must be simultaneously optimized; warehousing, transportation, inventory, order processing and lot quantities. Optimizing any one of these areas individually will sub-optimize the system as a whole. For example, a single warehouse in a network would achieve the lowest warehousing cost. This would create high transportation costs as suppliers ship over greater distances to ship products into the warehouse and conversely, outbound to its market distribution area. The addition of a second warehouse in the network would reduce transportation costs more than the marginal cost of operating the second warehouse, which would reduce total supply chain costs.