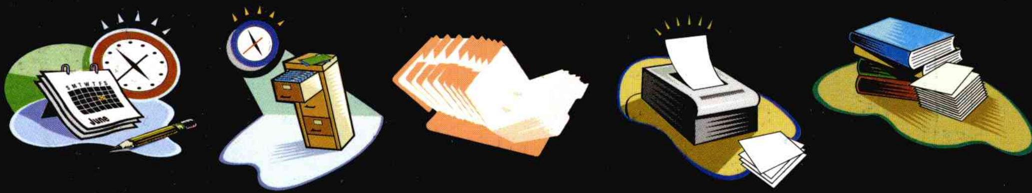

Marketing Information Products and Services

A Primer for Librarians and Information Professionals

Editors
Abhinandan K Jain
Ashok Jambhekar
T P Rama Rao
S Sreenivas Rao

MARKETING

INFORMATION PRODUCTS AND SERVICES

A Primer for Librarians and Information Professionals

MARKETING

INFORMATION PRODUCTS AND SERVICES

A Primer for Librarians and Information Professionals

Editors

Abhinandan K Jain, Ashok Jambhekar,
T P Rama Rao, S Sreenivas Rao

IDRC
CANADA **International Development Research Centre**

Ottawa Cairo Dakar Johannesburg
Montevideo Nairobi New Delhi Singapore

Tata McGraw-Hill Publishing Company Limited
NEW DELHI

McGraw-Hill Offices
New Delhi New York St Louis San Francisco Auckland Bogotá
Caracas Lisbon London Madrid Mexico City Milan Montreal
San Juan Singapore Sydney Tokyo Toronto

Canadian Cataloguing in Publication Data

Main entry under title:

Marketing information products and services: a primer for librarians and information professionals

Co-published in Asia by Tata McGraw-Hill Publishing Company Ltd.
ISBN 088936-817-1

1. Information services—Marketing.
2. Information resources—Marketing.
3. Marketing—Management.

I. Jain, Abhinandan K.
II. International Development Research Centre (Canada)

HF5415.124M27 1999 659.1'902 C99-980192-9

Jointly published by International Development Research Centre
PO Box 8500, Ottawa, ON, Canada KIG 3H9 (*http://www.idrc.ca/books/*)
and Tata McGraw-Hill Publishing Company Limited,
7 West Patel Nagar, New Delhi 110 008 (*http://www.tatamcgrawhill.com*).

Typeset at Anvi Composers and printed at Rajkamal Electric Press,
B-35/9, G.T. Karnal Road, Delhi 110 033.

RZXCRRBTRYRBA

Foreword

Recognizing the importance of information in the process of development, Canada's International Development Research Centre (IDRC) has over the years supported a large number of projects aimed at developing information systems and services in support of research and development activities. An important objective related to the development of such projects was to ensure that the systems and services developed could be sustained over the long term. A crucial element in the sustainability of information systems and services is effective marketing. It presents avenues to generate revenue and reduce the financial constraints that many information services are facing in developing countries. This has long been recognized by IDRC, and the development of marketing plans has been introduced in several information projects to study how this could be achieved.

A literature review conducted in 1993 revealed that marketing of information was a relatively new issue in developing countries and that most of the literature on the subject originates in the North. The review concluded that marketing potential is underestimated by libraries and information services and that information professionals were generally reluctant to embrace the marketing concept. Information professionals need a better understanding of marketing concepts and approaches to be able to introduce them into their services and to recover the costs of the information services and products that they provide.

In this framework, leaders of a number of IDRC-supported information projects were brought together with a team of specialists in marketing of information at a meeting held at the Indian Institute of Management in Ahmedabad (IIMA), India, in February 1994. The discussion at this meeting focussed on how institutions in developing countries could be assisted in evolving relevant marketing strategies. The meeting recommended the preparation of marketing guidelines and case studies that would help information specialists to design proper marketing strategies and marketing plans. Participants at the meeting prepared an outline for a manual that would respond to this need, and IIMA indicated its interest in coordinating the arduous work of compiling the manuscript. In October 1994, IDRC agreed to finance the activity.

This book is the result of IIMA's work. IDRC hopes that the guidelines and approaches proposed to introduce marketing activities within information services and systems will assist information professionals in developing countries with the development of sound marketing strategies. IDRC is proud to have contributed to this work—a collaborative effort of several information and development specialists from around the world.

Renald Lafond
Senior Information Specialist
International Development Research Centre
Ottawa, Canada

Preface

The information era is here. Even at the beginning of the last decade, John Naisbitt in *Megatrends* (1982) indicated that over 60 per cent of the people worked with information. He pointed out that between six and seven thousand scientific articles were being written each day, scientific and technical information was increasing by 13 per cent per year, and the rate would soon jump to perhaps 40 per cent per year.

On one hand, computers and networking have tremendously enhanced information storage, retrieval and dissemination capabilities. However, the new facilities require significant investments, which many libraries and information centres, particularly in the developing world, cannot afford.

On the other hand, economic reforms, globalization and privatization trends in the developing world lay emphasis on private enterprise and competitiveness. Consequently, government funding of libraries and information centres has been declining, and librarians and information managers have been forced to generate revenues not only for acquiring state-of-the-art facilities but also for their own survival.

Information is power, and more so in a competitive environment. Businesses, governments and individuals are collecting and storing more data than any previous generation in history (Alvin Toffler, *Powershift*, 1990). Moreover, information is being recognized as a critical resource for socio-economic development. As a result, libraries and information centres have an opportunity to tap.

This marketing guide, therefore, introduces librarians and information professionals to marketing concepts and approaches, helps them to adopt a marketing orientation, and provides them with a step-by-step approach to developing marketing strategies and plans for their libraries or information centres.

The guide contains nine chapters and two cases studies.

- ***Chapter 1:*** Prof. Sreenivas Rao highlights the need for adopting a marketing approach by librarians and information managers.
- ***Chapter 2:*** Drawing upon an earlier research on assessment of needs of management information, Prof. Jain and Prof. Rama Rao explain concepts of marketing management and how they are useful and relevant to libraries and information centres.
- ***Chapter 3:*** Ms. Gumbs describes the marketing plan developed by the Technology Information Centre at the Argus Institute of Technology and, through this example provides guidelines for developing a marketing plan.
- ***Chapter 4:*** Prof. Koshy explains the meaning of products and services in the context of libraries and information centres, and provides guidelines for planning a portfolio of products and services.
- ***Chapter 5:*** Mr Vespry, Ms. Vespry and Ms. Avery discuss price—one of the four important marketing decisions. With the example of National Information Centre on Management (NICMAN) at IIMA, they explain the various considerations in taking pricing decisions.
- ***Chapter 6:*** Prof. Sreenivas Rao discusses another of the four marketing decisions, promotion, with examples of various libraries and information centres, such as INSDOC, ICRISAT, and CEIS; and provides guidelines for making promotion decisions.
- ***Chapter 7:*** Prof. Koshy deals with the rationale, procedure and steps of conceiving, designing and introducing new information products and services.
- ***Chapter 8:*** Mr. Chin and Prof. Jain discuss the what, why, and how of marketing research along with brief descrip-

tions, illustrations, and guidelines for planning and executing selected marketing research designs.

- ***Chapter 9:*** Dominique Beaulieu describes how the Centre de recherche industrielle du Québec switched from free service to charged service and brought about changes in the outlook, attitude and structure of the organization to achieve a marketing orientation.

Towards the end of the guide, two case studies have been included.

- **(A) "Caribbean Energy Information System"** by Ms. Whyte and Prof. Sreenivas Rao and
- **(B) "Asian CD-ROM on Health and Environment"** by Mr. Chin and Prof. Jain.

CEIS was set up to enhance the capabilities of the Caribbean countries in energy information collection, storage and utilization for optimum conservation and utilization of the region's energy resources. The other case presents the market research conducted for assessing suitability and utility of CD-ROM publishing, a modern information technology, and the process of developing suitable marketing plans for the same in developing countries.

This guide can be used as

- a *text* to understand marketing concepts, tools and techniques relevant to a library/information centre,
- a *reference book* to draw up marketing strategies and plans, and
- a *training manual* in educational and training programmes for librarians and information managers.

EDITORS

Acknowledgements

This guide is an outcome of a workshop held at the Indian Institute of Management, Ahmedabad in February 1994, where project leaders of the International Development Research Centre, Canada, expressed the need for a marketing manual for librarians and information professionals. IDRC entrusted the job to the Indian Institute of Management, Ahmedabad. Mr. Renald Lafond, Senior Programme Officer, IDRC, gave us valuable guidance through-out the project. We are very grateful to him and to IDRC.

In August 1996, authors of the guide and other professionals discussed the draft threadbare. We are thankful to the following for their contributions to the guide by

- Ms. Swati Bhattacharya, Librarian, Indian Institute of Management, Calcutta;
- Mr. Chikkamallaiah, Librarian, Indian Institute of Management, Bangalore;
- Dr. Roshan Raina, Librarian, Indian Institute of Management, Lucknow,
- Ms. Rumma Sharma, Librarian, All India Management Association, New Delhi.
- Dr. N.K. Gopalakrishna, Librarian, Administrative Staff College of India, Hyderabad;
- Dr. I.K. Ravichander Rao, Professor, Documentation Research and Training Centre, Bangalore;
- Mr. V.W. Karnik, Librarian, British Library, Ahmedabad; and
- Mr. P.C. Shah, Manager, National Information Centre on Textiles and Allied Subjects, Ahmedabad.

We received enthusiastic cooperation and guidance in preparing the Asian CD-ROM case study from Ms. Maria Ng Lee Hoon, International Development Research Centre, Singapore, and Dr. G.P. Phondke, National Institute of Science Communication, New Delhi, and in preparing the CEIS case study from CEIS project staff. Our special thanks to all of them.

At IIMA, Mr Ravi Acharya, DTP Coordinator, put the manual into shape. Mr PS Seshadri, Editorial Associate, edited the manuscript. Ms Shakuntala, Ms Heena Shah and Ms Sunitha P. Naidu assisted us at various stages of the project. Ms Sarala Nair and Mr R. Mahadeva Iyer shared the major responsibility of typing the manuscript. The staff of the Vikram Sarabhai Library helped us at all stages of the project. They all deserve our thanks.

Many more have directly or indirectly contributed to this work. We are grateful to all.

EDITORS

Contributors

1. **Mr Dominique Beaulieu**, a management expert, is with Centre de recherche industrielle du Québec, Québec, Canada. He has been responsible for designing the marketing strategy and plan of CRIQ for its Business and Industry information services.
2. **Mr Chin Saik Yoon** served with the International Development Research Centre as a senior professional, and now owns the publishing company Southbound Sendirian Berhad Publishers, Penang, Malaysia.
3. **Ms. Barbara Gumbs** was Head of the Technical Information Service at the Caribbean Industrial Research Institute, and has done consulting assignments for setting up information systems and developing marketing strategies and plans. She is now a Principal Consultant in Information Resources Management, Trinidad & Tobago.
4. **Prof. Abhinandan K. Jain** is professor at the Indian Institute of Management, Ahmedabad in the area of marketing. His specialization is in the field of quantitative models in marketing, strategic marketing, international marketing.
5. **Prof. Abraham Koshy** is professor at the Indian Institute of Management, Ahmedabad in the area of marketing. His specialization is in product and brand management, international marketing, and strategic marketing.
6. **Prof. T.P. Rama Rao,** is professor at the Indian Institute of management, Ahmedabad in the area of computers and Information Systems. His specialization is in management information systems, DSS and software project management.

7. **Prof. S. Sreenivas Rao** was a faculty in the Business Policy Area at the Indian Institute of Management, Ahmedabad. His specialization is in communications. He is now among the visiting faculty at the Indian Institute of Management, Ahmedabad and consultant to a business organization in Ahmedabad.
8. **Mr H. Arthur Vespry** was Director of LARDIS (Library, Reference, Documentation, and Information Service) at the Asian Institute of Technology, Bangkok, Thailand. He is now a private consultant to libraries and information Services.
9. **Ms. Mona Whyte**, Project Manager, Caribbean Energy Information System (CEIS), has been associated with the setting up of the regional information system, with its headquarters at the Scientific Research Council, in Jamaica.
10. **Ms. Marienne Vespry**, was programme officer in the Programme Management Division of the Economic and Social Commission for Asia and the Pacific (ESCAP). She had previosuly worked in various capacities as an editor and information officer with ESCAP, and earlier with United Nations Industrial Development Organization (UNIDO) in Vienna, the National Library of Singapore, and the IDRC, Ottawa.
11. **Ms. Christa Avere** is a Marketing Consultant.
12. **Mr Ashok Jambhekar** is Libranian and Head, National Information Centre on Management, Indian Institute of Management, Ahmedabad.

Contents

Case Study A
Marketing Research for Asian CD-ROM on Health and Environment

Case Study B
Caribbean Energy Information System

CHAPTER 5

How to Price Information Products and Services

H. Arthur Vespry, Marianne Vespry and Christa Avery

INTRODUCTION

What is Price

Price is a means of exchange offered by a buyer for buying the product/service being marketed by a seller/marketer. It is generally expressed in currency units, such as dollars and cents. However, it may also be expressed in services or other goods which the seller and buyer may agree to exchange for the item.

Price (or the value of an offer) goes by many names like (Kinnear and Bernhardt, 1986) tuition, rent, interest, fee, fare, toll, dues, salary, wage or commission depending on what is being exchanged. For information products and services, the relevant terms may be *price* of a physical product like CD-ROM and *fee* of a service or membership of the information centre/ library. We would use the term price to mean all this in this chapter.

For deciding a price, it may be useful to understand its role. Conceptually, as explained in Chapter 2, price is one of the four (P's) the important marketing decisions (the other three decisions are product, promotion, and distribution). Price (along with other P's) helps in appropriately positioning the product/service/information centre in the mind of the target segments vis-a-vis the competitors. The price that can be charged, may depend on the ability of the target segment to pay, as well as the value that the target segment might derive by using the product/service. Further, the value of the product/service varies, depending on the situation and time of availability. Besides, the information centre and/or the management of the parent organization, may view price in a variety of ways, including generation of revenue/profit depending on the situation of the centre/library.

Steps in Pricing

Pricing decisions will vary with the circumstances and aims of the seller, the type of product or service being sold, the seller's costs and profit targets, the seller's knowledge of the customers and estimates of what they will pay, and the competitive situation.

This chapter will cover the steps to be taken by an information centre/library to price its products/services. These consist of understanding of consideration in pricing, deciding on base price of products and services, adapting the base price to the situation, and revising the prices depending on market changes and competitive moves.

CONSIDERATIONS IN PRICING

The Marketer: Who are You

The purpose/ownership of the information centre/library may have an important bearing on the role of price. A centre/library owned by a commercial organization may have to run on commercial lines and not only recover the costs of its operations, but also contribute to its profits. On the other hand, a library or information centre may be supported wholly, or in part, by a private company, municipality, academic institution, organization, government agency or by a donor. Some of these organizations may be tempted, from the most altruistic of motives, to charge only token prices for their products/services. Decision of token pricing should be made carefully, as it has the potential to not only comprise revenue earning capacity, but also damage the image of a quality/centre in the eyes of the customers.

The Product/Service: What are You Marketing

Product characteristics and type of product influence the pricing significantly. Value added products/services have particular influence on price.

Product Characteristics

Important characteristics of information which have influence on pricing are: accuracy, timeliness, fittingness with easy use and reproduction ability. More accurate, timely, and fitting the information, higher would it be valued by the user, and higher it would also cost to collect and provide to the buyer by the marketer. Charging a higher price may encourage reproduction of written (through copying machines) and electronic information (through computers) as these are easy and low cost operations. It introduces a significantly different feature to information, not found in any other product. This aspect is supposed to be taken care of by laws relating to intellectual property rights. Irrespective of the laws, their implementation is always a problem. Information marketer needs to take care of such practices through appropriate mechanisms like price of (additional) copy being unattractive enough to bear the hassles and cost of reproducing. Another mechanism could be written contracts with buyers for non-reproduction or per unit reproduction fee.

Type of Product

Information can be classified into three broad categories: product, service, and value added (product/service). Pricing a product is very different from pricing service, or a value added information.

Value of a physical product, say an issue of current content, may be enhanced by better packaging, faster delivery (speed post, courier vis-a-vis ordinary mail) or making it user friendly. In this sense, the improvement in these characteristics can lead to commanding a better price.

However, in case of a service, none of the above attributes is visible to the buyer before the service is bought. Services are primarily retailing activities, with the seller/provider dealing directly with the intended user. Unlike shopkeepers, service retailers generally cannot turn to a manufacturer to produce the product in bulk and advise on the price.

Customers of most services are unable to assess the price-quality relationship prior to purchase, and often, they cannot assess it, even after purchase and use. Thus they feel vulnerable, and seek ways to reduce the risks inherent in buying a product which has not yet been produced. Customers may use price as an indicator of service quality, specifically, for first time buying. They will, however, frequently return to a supplier whose service has been satisfactory in the past: perceived quality and reliability are more important than price. Also, they expect savings from a supplier who 'knows us, knows our situation and our objectives.' These may not be price savings, but the customers save on the time invested in explaining their needs and circumstances to a consultant or information broker. Costly errors result if the briefing is incomplete or unfocussed, or if the consultant does not recognize or comprehend some vital element.

Value Added Products/Services

New information products and services will be developed through adding value to what is currently available. Increasingly, the scarce resource of customers is time; they will buy products/ services which allow them to maximize the return on their most scarce resource. Researchers who want raw data, or want to browse through databases, increasingly have the capability to do so for themselves. On-line access to virtual libraries enables huge quantities of information, but it allows a school-child with a modem or a CD-ROM drive to do the same. Huge quantities of undigested information have no value; indeed, they are a liability. They take up space on hard drives or shelves, and they irritate and threaten those who know they will never have time to look through them, and fear that some vital fact may be hidden therein. The need is for screening, customization and personalization of information. This 'value-added' process includes assistance with management of information overload. The new information technology supports the creation and use of new, more dynamic integrated formats for presenting data, information and knowledge.

If the centres are to market such value-added products/services, they will also have to accept higher responsibility for quality offered and benefits promised to the customers. It is to be expected that customers who purchase value-added information and act upon it, will take legal action against the provider, to recoup any losses resulting from a faulty product, in appropriate mechanisms, involving higher costs leading to higher prices. It may also be necessary, to devise creative pricing structures to assure promised value to the customers, and compensate them in case of any deficiencies/service failure.

Planners, policy makers and managers do not want bibliographies or thick texts. Increasingly, they want policy options neatly set out with pros and cons. They want data, of course, but they want processed data for analyzing, planning and implementing solutions, set out in easy-to-understand tables, or better yet, graphs. They want management tips and strategies that will allow them to solve problems, control costs, and get the job done with the least possible delay, confusion or ill-feeling. They want short, cogently reasoned briefing papers and reports to put before their bosses. They want public information materials to orchestrate public approval for themselves and their projects. This kind of brief, high-quality documents have been produced by staff in some agencies. In most agencies it has hardly been available at all, because manual methods do not suffice to produce it in cycles, short enough to meet the demand, before another crisis shifts attention elsewhere.

Pricing of each type of product/service, therefore, has to be undertaken differently. The nature of product/service along with the type of customer probably would help in understanding how to price the offer.

The Customer: Who is Buying

It is essential to study and know your users before you become involved with the pricing frame. Everyone needs information. However, what price will the customer pay for the information depends on answers to some key questions like: How important is it (how much is it worth to them)? How much can they pay? How much do they expect to pay?

Value of Information

Potential customers are interested in a product or service on the basis of what they expect to gain from it, and/or what they might lose if they did not have it. They also have to calculate/assess any costs associated with using the product/service after they have purchased it (running costs, maintenance costs, insurance, depreciation). Information services and products are often promoted on the basis that they will save time, but they can also be time consuming to use. Information centres should be attentive to this facet, and should build in the maximum 'user-friendliness' to meet the customer's needs, including the time available to the consumer to use the product/service.

Assessment of the value of information to customer(s) is not easy. The buyer has certain hopes and anticipations, but the benefit of the information to be acquired cannot really be judged until after it has been received. For some markets, gain in intangibles, such as prestige, outweigh gains which contribute to more mundane objectives. However, this factor has not been dominant in most sectors of the information market (though there is a great deal of prestige value in knowing the latest news and gossip).

Thus the assessment of value of information for, say, evaluating strategic opportunities, is likely to be made on the basis of the rewards to be reaped from improved decision making and the mistakes and lost profits incurred. The probable gain is then weighed against the costs (in time and money) of acquiring, evaluating and using the information.

Ability to Pay

Even if the value of information to the customer can be ascertained, the ability to pay for the information differs across customers. The differences arise because of variations in the types of customers. In general, these are: (i) whether the customer is located in developed or developing countries, (ii) whether the customer is an individual or an organization, and (iii) the type of customer within each class. The incomes as well as current expenditures of customers in developed economies are much higher as compared to their counterparts in developing economies. Further, organizations can buy one/limited copies of information and make it available to individuals. Income of individuals, usually, are much smaller than the incomes/budgets of organizations. Also, within individual customers, some have lower ability to pay, say students, compared to others say executives in commercial organizations. Among organizations, the budgets/ ability to pay depends on their levels of income and several other factors.

The above factors require adjustments in price to suit the abilities of customers to pay for information. This is usually handled through the mechanism of differential prices to different types of customers.

Willingness to Pay

The actual price that a buyer would pay, would not only depend on the value of information and the ability to pay but also his willingness to pay for information. The willingness to pay seems to be dominantly influenced by the fact that most of the information appears to be free (though on closer examination, it is found that it is generally bartered for information of equivalent interest or value). This free/bartered information includes commercial intelligence passed through clan business networks, research findings exchanged among scientists, and gossip exchanged at the village market. This information is extremely valuable, in that it is closely tailored to the known interests of the recipients, and the recipient can generally assess its quality with ease. Indeed, it is difficult or impossible for information centres to compete with the informal information bartering networks; in most cases they should probably seek rather to supplement them.

The tradition of the 'free public library' and 'free use' of academic libraries also contributes to the reluctance of customers to pay a realistic price for information. Availability of information over the Internet, some of it free, may also reinforce expectations of low or zero prices. Pirating of intellectual property in the third world has been a further factor in depressing price expectations; indeed the concept of intellectual property is not well understood at least in part because it conflicts with the popular belief that information is and should be 'free'.

Customers' sensitivity to risk, or the uncertainty that the information search will be productive, also plays a role in their decisions. The intending end-user is likely to evaluate need, relative cost, likely benefits, and uncertainty about outcome differently from an administrator or purchasing officer. Thus, it is important to determine who makes the decisions within the customer's organization and how they calculate relative benefits against acquisition costs. For example, how they assess the risks of purchasing an information search, the outcome of which cannot be known in advance. It should also be noted that even one favourable experience will weigh heavily in favour of further use.

The Competition: Who/What are You Competing with

Customers weigh their alternatives in deciding whether to buy. Thus, the presence and quality of competing services, and the level of the competitors prices will influence pricing strategy, and may ultimately determine whether your service is viable.

However, it should be noted that pricing alone is seldom the determining factor: quality, delivery dates and after-sales service (a long-term relationship with a reliable supplier) are generally rated as more important than price.

Who is the Competitor

We live in an information intensive age: more and more information is available to and required by decision makers in commerce, academia, research, government, almost every walk of life, and the deadlines attached to those needs grow shorter. Accessing the needed information requires time and skill; hence, we can expect to find ourselves among a growing number of professionals and agencies, who will specialize in obtaining information for others, and/or advising them on their information needs. These include professionals like consultants (information specialists and subject specialists), information brokers, information managers, management information system specialists, telecommunications network managers, etc. and agencies like information centres, libraries, publishers, software and systems specialists, etc.

Any of these are potential competitors, as established presences or as new entrants, seeking backward or forward integration to expand their presence in the marketplace.

Potential competition comes mainly from similar products/services, or other product/services which serve the same purpose. It may also come from products/services which allow customers to position themselves more advantageously, shifting their purpose. The really dangerous competition for an information service, at any point in time, is probably posed by firms, products and services that did not exist earlier. An information centre should be well prepared to locate and understand current and potential competitors.

The Competitors' Prices

While market demand might set a ceiling, and costs set a floor to pricing, knowledge of competitors' prices (and possible reactions to our offers) help us to establish realistic prices. We must, thus, track the price and quality of competing offers.

If our offer is similar to a major competitor's offer, then we will probably have to price close to the competitor or lose sales. If our offer is inferior, we will probably have to charge less. If our offer is superior (a better fit to the customer's needs and wants), we can charge more than the competitor. However, we must be aware that competitors may change their prices and offers in response to ours.

Other Factors Influencing Competition

Some situations are not open to competition on the basis of what we assume to be the normal factors. Anti-competitive factors may include:

- Some players may be subsidized, such as:
    - A national library or public library (by some level of government).
    - An academic library (by the parent university).
    - An information service which is part of a commercial firm (by the parent firm).
    - Information centres in the third world (by donors).
- Only certain suppliers can be considered, such as:
    - Nationals of a country.
    - Members of the local professional organization, chamber of commerce, etc.
    - Those with the proper family/ clan connections.
    - Supporters of a particular political party.
    - Other members of a combine or cartel.
    - Those who have the favour of a powerful figure in the society (may include politicians, and/or local 'godfathers' and 'dark influences).
- 'Commissions', bribes or 'donations' may be expected or directly solicited.

How are Competitors Likely to React

Having identified the competition and competitors, assessed their prices, and their strengths and weaknesses, it is necessary to predict the reaction of competition to our likely moves/prices. The competitors may use appropriate approaches to price their products, given their situation, including any advantage arising from other factors of competition. We need to visualise their likely moves by putting ourselves in their shoes, i.e. some kind of a role play. External information about their likely moves, through intelligence gathering and marketing research, would help a great deal in this process.

Determine Revenue/Demand: What is the Price-Volume Relationship

Information centres/libraries need to estimate their revenues in each year/quarter/month that would be earned through marketing their products/services. Obviously, the revenue likely to be received from sales of a product/service depends on the price and the demand of the product/service at that price. Also, the demand at different prices is likely to be different. The relationship or curve between demand of a product/service (in a time period) with the price is called a demand schedule. So, the information centre needs to estimate the demand schedule. The first subsection deals with the factors which influence the effect of price on demand. The methods of estimating demand schedule are dealt in the next subsection.

Understand Sensitivity of Demand to Price

The important factors influencing sensitivity of demand to price, in the context of information products/services, can be identified as: attitude to pricing, exclusivity, fittingness to use, risk taking ability and reliability, responsiveness, assurance, and empathy.

In the context of information products and services, attitude of users of information towards pricing seems to be negative, particularly in developing countries. Given this context, chances are that a higher price would affect the demand more adversely, compared to a lower price.

Higher prices may be easily accepted by customer if your product/service is exclusive, in uniqueness, credibility/prestige of source of supply, and/or better quality of the information. This is because it is very difficult to compare one information product/ service with another and the above parameters may be used by the potential customer as indirect measures of quality. A higher price would also be easier to accept if the information fits well in the customers' end-use system, forms a smaller fraction of total expenditure on information buying, and forms a small fraction of the likely benefit arising out of the use of information.

Higher the reliability (ability to perform promised service dependably and accurately), the responsiveness (willingness to help customers and to provide product service), the assurance (knowledge and courtesy of employees and their ability to convey trust), and the empathy (provision of caring and individualized attention) lower the sensitivity of demand to price. This is because the four factors mentioned are the four key dimensions associated with quality of service. And it is well known that higher the quality of a service, less sensitive it would be to price.

Estimating Demand at Different Prices

Historical information on demand for information products and services, particularly in developing countries, is sketchy. This is particularly so in case of specific product/service. In the absence of such information, the methods that can be used for assessing demand are: expert opinion, survey of buyer's intentions, and test marketing.

Experts whose opinion could be elicited include managers (of information centres/libraries), distributors (of information products and services), consultants (in the relevant fields), and important buyers. The information centre could, occasionally, invite a group of experts to exchange views and arrive at a particular figure of demand for a product/service at a price and then assess changes in the estimated demand if the price was to be more or less. Alternatively, several experts could supply their estimates individually, which could be grouped by an analyst at the information centre.

The most prevalent method of generating the demand schedule for a product/service is a survey of buyer intentions (see the case study on Marketing of Asian CD-ROM). In implementing this method, first a range of prices is determined over which the demand needs to be assessed. A sample representing the current and potential buyers is chosen. Each sample respondent is asked to express his intention to buy on a scale (of either buy/not buy or a graded scale from definitely not buy to definitely buy) at the lowest (highest) price. The respondent is asked to state his buying intention at each of the next level of price till the price range is exhausted. These responses can then be summed over all respondents to get the demand at different prices.

The method of test market is ideal for testing the entire marketing strategy for the product/service. Its use merely to assess demand is less efficient. However, it is a possible method. In this method, the entire marketing programme is implemented in a mini market which is representative of the total market (similar to taking a sample of respondents). The demand thus obtained is then projected as demand for the total market. More details of this method are provided in Chapter 7.

Determine Costs: What is the Cost–Volume Relationship

Assessment of costs has become vital to the sustainability of information centres and libraries. The first subsection deals with the basic types of costs useful for decision making. The nature of cost elements in information centres/libraries is described in the second subsection. Process of assessing the product/service costs would be discussed in the third and the total information centre/library costs in the fourth subsection.

Classification of Costs for Decision Making

There are three important classifications of costs which are useful for decision making: fixed costs, variable costs, and relevant costs.

Fixed Costs Fixed costs are costs which are fixed per time period (say month/year) and do not vary with the volume of production of a service or product. For example, wages and salaries of employees in the information centre/library (who are paid on monthly/yearly basis) are fixed costs. This is because whatever may be the output of service/product in a particular month/day/year, these remain same per month.

Variable Costs Variable costs are costs which vary with the volume of production of a product/service. For example, in the case of an issue of a monthly printed publication of Current Content (of say marketing journals), the cost elements of paper, printing, binding, handling, and postage per copy, are examples of variable costs. This is so because even for one additional copy of the issue, these costs would have to be paid/incurred and if this one copy is not produced, the same would be saved.

Relevant Costs Relevant costs are costs which are relevant while deciding between two (or more) alternatives. These could include both fixed and variable costs. For example, if a decision has to be made between undertaking the production and marketing of Current Contents of Marketing, the options/alternatives are producing/do not produce the Current Contents. Costs associated with each decision are:

Produce CC	Cost of acquiring marketing journals + Fixed costs of preparing the master copy + Fixed costs of printing an issue of 'X' pages + Variable cost/copy X number of copies to be produced.
Do not Produce CC	Cost of acquiring marketing journals (which may be acquired for use irrespective of whether CC is produced or not)

Notice that the cost of acquiring journals is common to both options as they need to be acquired for several other purposes. This, therefore, is not a 'relevant' cost to decide between the two options. The other two costs in producing the CC would not be incurred if the CC is not produced. These are relevant costs for deciding whether the CC should be produced or not. Notice that the elements included are of both types, i.e. fixed and variable.

Cost Elements in Information Centres/Libraries

There are two broad headings of cost elements in any information centre/library. One of these belongs to the unit as a whole and cannot be easily traced to any product or service. Let us call these as Centre Costs. The others are such which can be easily traced to a product/service. Most elements of costs belonging to the first set are fixed in nature whereas those belonging to the second set could be, and usually are, both fixed and variable. Let us call these as product/service costs.

Information Centre Costs Information Centre Costs are regarded as 'fixed' because they are difficult to change in the short run. Even if production of products/services stops altogether, the rent and salaries (including your own) have to be paid if the business is to continue. Of course, these costs are variable over the long term: you may move to cheaper or more expensive premises, or employ more or fewer staff members at higher or lower salaries.

For an information centre, centre costs may include the following and should not include those which can be directly traced to a product/service:

- Wages
  - Information centres and libraries may have few or many staff members on their payrolls who are paid on periodic basis.
- Equipment (e.g., telephone, computer hardware, printer, copier, fax), with repair and maintenance charges.
- Software, supplies.
- Communications and transport costs.
- Costs of acquiring information, such as
  - Fees for searching and downloading information.
  - CD-ROMs, subscriptions, books.
  - Fees for using copyright materials.
  - Continuing education of staff.
  - Consultant fees and/or wages paid to others to whom you subcontract portions of your work.

- Marketing, promoting, advertising.
- Premises (investment costs or rental costs)
  - Building with its equipment and furniture.
  - Cleaning and maintenance.
  - May include upkeep of exterior of building, grounds.
- Utilities (heating and/or air-conditioning, electricity, water, sewage/waste disposal).
- Taxes, licences, memberships.
- Interest, insurance, depreciation.
  (These costs can be calculated on a monthly or an annual basis.)

Product/Service Costs *Variable Costs of Product/Service* Product/service costs are the particular costs incurred in producing the product/supplying the service that the customer needs. Each manager's list of cost elements may differ. Production costs can include the following variable costs for each product/service.

- Costs of 'research' of acquiring information needed for that product/service may include:
  - On-line/down-loading costs.
  - Purchase of maps, videos, manuals, etc.
  - Fee for consultant(s), or short-term staff member(s) with expertise you need for the job.
- Data processing costs.
- Cost of producing the package can vary greatly, depending on the nature of the package, the quality level required, the time available for the job, customers changing their minds and the specifications in mid-job, etc. The following are examples of items to be considered in costing various types of jobs:
  - *Written report:* For example, writing, editing, desktop publishing, reproducing, binding.
  - *Video training film:* For example, scripting, story-boarding, shooting, sound recording, music, editing, production.

— *Workshop:* For example, identifying and hiring trainers, updating and reproducing training materials, advertising, renting training room and equipment, refreshments for trainees.
— *Survey:* For example, developing and testing questionnaire, designing sample methodology, identifying and training interviewer(s), wages and expenses of interviewer(s) during the survey, data input and processing, designing the report, producing tables and graphs, writing, editing.

- ❑ Handing over costs: costs of any special event, seminar, reception, press conference, graduation ceremony, etc. that marks the completion of the project.
- ❑ Follow-up service costs: retainer, etc. is calculated separately, based on your expectations of future work and your experience gained during the project.

Fixed Costs of Product/Service In addition, there may be fixed costs directly associated/incurred to produce the product/service. The librarian/information centre manager can easily identify those cost elements which are fixed in nature (of the type mentioned under Information Centre Costs) and are incurred for the particular product/service. It may also be possible to assign the Information Centre Costs to each of the product/service being produced and marketed by a centre. Thus, in the ultimate analysis, costs of an information centre ideally could be expressed in terms of product/service costs with two components, one fixed and the other variable.

Calculating Costs

General Guidelines Costing is an inclusive exercise; it is precisely those things which we don't know (or tend to overlook) which are likely to hurt us.

- ❑ Don't forget anything. Make lists (see items above for suggestions). Keep detailed accounts.
- ❑ Remember inflation. Are the inflation data issued by your government realistic for your business, or must you calculate a different inflator?

— For years the prices of journals have been rising at a multiple of the rate of general inflation. Are some parts of your costs rising more rapidly than others?
— Forget the myth that computer equipment is getting rapidly cheaper. Processing speed and storage capability is getting cheaper, there are more bells and whistles, but PC purchase prices for a good standard of equipment have hardly moved over the past five years (what has moved is the 'good standard', from kilobytes/hertz/FLOPS to mega to giga...).
— If your country is going through a period of rapid inflation, it may be simpler to calculate your costs in dollars, SDRs, ECUs, the value of 100 grams of gold, whatever standard you can find that is relatively fixed, and translate into 'today's value' of your national currency whenever needed.

- Review from time to time; new cost elements may have been introduced or old ones dropped out, or the costs of the same elements may have risen or fallen.
- A complete list of costs is of course useful for other management tasks, including cost containment/reduction. Are there any items that should not be on the list? Are any items too expensive, and are cheaper alternatives available which will meet the required standard? Would it be cheaper to contract certain tasks out, or to do them in-house?

Costing Specific Products/Services For each product/service, calculate the variable cost per unit of production, and the fixed costs which would not be incurred if the product/service was not produced. In case of a product, the elements have already been identified. In case of a service, say reference service within the information centre/library, all that the customer seeking the reference service would require is few minutes of the staff working as a reference librarian. In this situation, the only resources of the library utilized are the time of the reference librarian and the ('depreciation') time for which the reference source, say a book, has been used. Both of these are fixed costs for the library/information centre. In this manner, identify the facilities, equipment, personnel, resources, etc., utilised in providing a service (producing a product). Then classify each element into variable or fixed. Sum up all the variable and fixed elements separately, to obtain the total variable cost per unit, and the total fixed cost of producing that product/ service.

Draw up charts showing total costs (variable and fixed) of producing each product/service at different output levels.

Information Centre Costs Costs which cannot be directly traced to any product/service would constitute the Information Centre Cost. Most of this would be fixed in nature as discussed earlier.

Cost–Volume Relationship The total cost of the information centre at different levels of production of specific products and services can be obtained by adding the cost—volume relationships of specific products/services and the IC costs.

SELECT A BASE PRICE

Customer's wants and expectations (demand) and competitors' prices largely set the ceiling to the prices that we can charge, while our costs set the floor. A commercial firm also wants to charge a price that includes a fair return for its effort and risk, that is, a profit. However, many information providers are still subsidized or partially subsidized; thus their costs may be unrealistically low, and they may in addition be forbidden to seek a profit.

Other factors that influence pricing preferences include competitors, suppliers, distribution, economic and socio-political conditions, regulations and product composition. The more a firm's product is differentiated, the more leeway it has in setting prices.

Pricing Objectives

Various players will have varying pricing objectives, according to their current circumstances and their medium and long-term plans.

BOX 5.1

NICMAN at IIM Ahmedabad: Considerations in Pricing

What is Marketing?

National Information Centre of Management has been set up at the Indian Institute of Management, Ahmedabad. NICMAN would utilize the resources of the Vikram Sarabhai Library of IIMA. As per the agreement, between IIMA and National Information System for Science and Technology, NICMAN should, ultimately, become financially self-sufficient and offer sustainable products and services to its clients in business and industry, as well as academic and research organizations.

What is Being Marketed?

NICMAN plans to develop and market information products and services in three phases. In the first phase, the offering will be:

(i) Extend indexing and current awareness services to external clients (both, academic and business and industry).
(ii) Start abstracting service from our own database, as well as CD-ROM based databases, and extend to external clients.
(iii) Extend to external clients database search service using our own database and CD-ROMs.
(iv) Extend access to external clients for case bibliography and develop an electronic delivery system, i.e., through e-mail or floppy diskettes.

Immediate introduction of Current Contents and Index of Management Literature was planned in each of the six areas of management. The products would be delivered monthly and would be, to begin with, in hard copy.

Who are the Buyers?

The clients being targeted for both, the products and the services are:
- Business and industrial organizations
- Academic organizations offering MBA programmes
- Executives
- Teachers and students

The value of information on management literature is likely to be higher for executives in certain departments (like training, human resource development, corporate planning, etc.) of organizations. Although the organizations and executives are likely to have purchasing power/ability, only the organizations are likely to buy. Purchase of such information by executives in India is mostly governed by 'allowances' provided by organizations. The allowances vary with the level of executive in the hierarchy within an organization and also across organizations.

(Contd)

In academic institutions, the grants from government and public agencies have been frozen/limited. The private ones also, are not likely to have significant funds. Most private academic institutions charge a hefty fees for their programmes, but do not necessarily have even adequate premises to house a library. Students are likely to be hard pressed for buying such materials, as the fees charged are already high. Teachers/researchers may be able to buy depending on the allowances available to them, and/or provision for information acquisition in research projects.

Competition

Management information, especially conceptual and theoretical, originates mostly from educational and research institutions in developed countries. It is available to Indian users mostly through foreign journals and books. But the prices of such publications are un-affordable to Indian academic institutions, as well as to small and medium size organizations. Indian material is extremely limited.

Services like indexing and abstracting mostly originate from the developed countries. Coverage of literature on management as a discipline/subject is very limited, as management is treated as a part of social science information. This limitation of coverage is a great handicap for locating the right and relevant information. National institutions like IIMs, and a few sectoral institutions have the base sources and are generating indexing and bibliographic services, targeted mainly to the in-house users. The benefit to the clientele, outside the campus, is minimal because no conscious effort has been made to develop products/services which could meet their needs.

Increased availability of access to internet in future and availability of information products and services is likely to affect the market for such products. However, in usefulness, price, and accessing, the picture is not yet clear.

Price–Volume Relationship

No secondary information was available on the price–volume relationship of such products similar to the ones being planned by IIMA. IIMA, therefore, had conducted a countrywide market research to assess the potential demand for Current Contents, and Index of Management Literature in each of the functional areas of General Management, Finance, Marketing, Production, Personnel and Industrial Relations, and Purchase/Materials. For arriving at the Price–Volume Relationship, following steps were followed:

1. Sample products were prepared and specific prices (options) at which the products could be marketed were decided.

(*Contd*)

2. Each respondent in the survey was shown and requested to go through a sample of the product.
3. The respondent was then asked to indicate his interest in buying the product for his organization on the following scale: Very Keen, Interested, Will Think, Not Decided, Not Interested.
4. The respondent was asked to show the interest at the lowest price, the middle price and the highest price.
5. Those mentioning 'Very Keen' and 'Interested' categories of responses were assumed to be prospective buyers giving rise to demand.
6. By aggregating the responses, demand at different prices was assessed.

Following relationship was found between demand per year and price charged for the two products:

For Current Content

Price/Year	1500	2000	2500	3000	3500	4000
Demand in Percentage Penetration on the basis of 'Very Keen' Only	7	6.5	5.5	5.0	4.5	4.0

Cost–Volume Relationship

It was assessed that the number of copies per functional area could vary from 100 to 1000. It was, therefore, decided to find the (fixed and variable) costs for these levels of sales. It was further assessed that the number of pages in each monthly issue would be about 20.

Sr. No.	***Cost Elements***	***Cost***	***Nature of Cost***
1.	Composing and Plate Making	: Rs. 180/page.	Fixed
2.	Cost of Paper/page	: Rs. 0.25	Variable
3.	Cost of Printing/page	: Rs. 0.55	Variable
4.	Cost of Cover and Binding per copy	: Rs. 2.50	Variable
5.	Cost of Postage per copy	: Rs. 12.00	Variable
6.	Cost of (Paper + Printing) per copy: $20 \times (0.25 + 0.55)$	: Rs. 16	Variable
7.	Total Variable Cost/copy (4 + 5 + 6)	: Rs. 30.50	Variable
8.	Fixed Cost/Issue (number of pages × 1)	: Rs. 3,600	Fixed
9.	Fixed Cost/Year (12 issues) (8 × 12)	: Rs.43,200	Fixed

The per month and per year costs for volumes of 100, 250, 500, 750, 1000 copies per issue were calculated as follows:

(*Contd*)

Volume	Per Month			Per Year			Per Issue Cost
	Variable Cost	Fixed Cost	Total Cost	Variable Cost	Fixed Cost	Total Cost	
100	3,050	3,600	6,650	36,600	43,200	79,800	798.0
250	7,625	3,600	11,225	91,200	43,200	134,700	538.8
500	15,250	3,600	18,850	183,000	43,200	226,200	452.4
750	22,875	3,600	26,475	274,500	43,200	317,700	423.6
1000	30,500	3,600	34,100	366,000	43,200	409,200	409.2

Other costs of operation of the centre were mostly fixed and could not be traced directly to the products under consideration. These for the first two years were as given below. The costs have been adjusted for 10% inflation for the second year.

	First Year (Rs)	Second Year (Rs)
Fixed costs of equipment (depreciation, etc. excluding software)	2,40,000	2,40,000
Base resource costs, CD-ROM, etc.	4,00,000	5,50,000
Staff costs	1,32,000	2,40,000
Promotion (mailers, ads, travel)	1,10,000	1,60,000

It was difficult to identify costs of infrastructure, supplies, etc.because of lack of data and hence, are not included.

Objectives should be both feasible, given available resources, and measurable over time. For instance, a year long, month long or quarter long target would be considered 'measurable'. The methodology in setting objectives should be zero-based (not extrapolated from past trends or current budgets), and consistent with the data in the strategic planning document of the organization (Chapter 3, Gumbs). Once objectives are clearly stipulated, appropriate strategies can be adopted that are clearly and soundly related to the goal.

Token Pricing

Subsidized players may decide to introduce token pricing for a variety of reasons:

BOX 5.2

Guidelines for Developing Considerations

1. Who are You?	– Type of ownership. – Purpose(s) of library/information centre. – Purpose(s) of parent organization to assess nature of objectives of the library.
2. What are You Marketing?	– Type of product: product, services value added. – Product: hard copy, electronic. – Service: electronic, personal – Value added: consulting.
3. Who is Buying?	– Organization, individual. – Organization: private/public, commercial/academic/research. – Ability and willingness to pay. – Gauge through personal assessment/research.
4. Assess Price–Volume–Relationship	Identify what influences purchase. – Role of price in influencing purchase. – Establish relationship–price to purchase. – Through research on representative consumers, past data.
5. Assess Cost–Volume Relationship	– Identify elements of cost. – Classify cost elements into fixed/variable. – Calculate variable costs of additional (copy) unit. – Calculate fixed costs. – Calculate total costs at different volumes of production.
6. Assess Competitive Moves	– Identify direct, and generic competitors. – Identify type of competitors (like in who are you above). – Assess current price and trend of prices over time—the past Identify their objectives. – Identify their share in the market. – Assess likely reaction, particularly the lowest price they could go to (equal to variable cost in most cases).

- They may feel that what is given 'free' is not valued or that free services are not respected.
- They may wish to educate their clientele to the fact that information is not a free good.
- They may have been instructed by their supporting agency to do so.
- They may doubt that their subsidies will continue for ever, and be taking a first step toward some unspecified time when they will have to generate their own income.

Whatever factor is moving them, they have decided or have been instructed to begin with a token price, so as not to impose undue hardship on their customers.

Token pricing, however, may generate unrealistic views of the value of information in the mind of customers as does free distribution. It may also spoil the market for any unsubsidized libraries/ information centres as effectively, or more effectively, than a library/centre providing 'free' service.

Income Generation

'Income generation' for information services has generally meant 'generating some income to support a particular service.' Thus, some services are priced (and may be expected to break-even), while others are not. Selling publications (including journals) is common, as is passing on to the customer the charges for the use of on-line services. Photocopying charges are generally borne by the customer. In this phase, it is probably advisable to charge a realistic price for any priced services, rather than to accept any internal cross-subsidizing. This will assist the customers in acquiring a realistic picture of what information actually costs, and assist management in gauging the market for non-subsidized services.

Sustainability

The information centre is taking a step beyond 'income generation'; it is now being asked to sustain itself (meet its costs) through charging for its services. This is happening in developed countries also, as corporate 'special libraries' are being redefined as cost centres/profit centres. If 'sustainability' is being phased in, the centre may be able to survey its customers to prioritize the various products and services which are offered or could be offered, indicating which are most important to them, and the level of pricing that they could support.

Market Share

Maximizing market share is a common strategy among service providers who, in the initial phases of business, often absorb losses to gain a strong foothold in a competitive industry. Pricing to preserve or increase market share must move with competitors prices, though price wars should be avoided. Market share as a concept is generally linked to high-volume markets. Price has a direct effect on volume. If prices are perceived as being too high, price resistance develops and customers turn to a competing product. In the information field these include markets for infotainment media, wire services, telecommunications services (including telephone and Internet services), computer hardware and software, documents delivery (including booksellers) and database vendors. Market share may be pursued at the expense of profits in the short term.

Individual information providers and small information centres are more likely to think in terms of building up a loyal clientele than of 'market share'. Customer satisfaction is frequently their main aim, with the resulting word-of-mouth recommendations to other potential customers. Their prices still have to be realistic in competing goods/services, but a modest premium will generally be acceptable if satisfaction is high.

Managing Demand Relative to Supply

One of the goals of service pricing is to manage demand relative to supply. An information centre may have a music listening centre, where it charges by the hour. It may have limited terminals for on-line searches, or a staff member may have more questions than he/she can handle effectively at certain hours. Pricing and prior appointments can assist managers in levelling demand throughout the day, and reducing the proportion of slack time, when no service is provided and no revenue is earned. For this strategy, the focus is on demand-based pricing, not cost-based pricing.

To manage demand, it is necessary to understand how customers behave relative to price and price changes. Customers attempt to negotiate prices down, or to maximize the amount they will gain by paying a set fee. For example, if prices for on-line searching are based on connect time, since it is very difficult to assess the relative value of an information search, the customers' goals would tend to be to minimize connect time and/or to maximize information acquisition relative to a predetermined time/budget limit. Neither is likely to enable them to maximize the value received from the search.

Most sellers of goods and services adopt the opposite strategy from the customers' strategy; that is, they attempt to negotiate prices upward and/or the amount of goods/services they are to exchange for the agreed prices downwards. For libraries/information centres, who do not deplete their stock of information by selling it, the best strategy is often to maximize the value received by the customer, and so attract continuing business.

Positioning Objectives

Customers often use price as an indication of quality. Thus, higher prices are appropriate to a firm marketing its services as a high quality and exclusive product, moderate prices to a firm serving a mid-level clientele, and rock-bottom prices to an agency serving disadvantaged groups. If prices are too low, customers often assume the product or service is cheap and shoddy, and refuse to buy for that reason.

Packaging of services (like packaging of products) has implications for positioning. For example, services and products can be bundled by selling memberships.

Pricing Strategies: Options

In the context of information products and services, pricing options should be generated for information products, information services, information projects for specific purposes, and memberships of various types. This section first deals with basic pricing approaches and then, with specific modifications required for the above offerings.

Basic Options

There are three basic options for pricing strategies: cost based, competition based, and customer value/benefit based.

Cost Based Options This is essentially the approach from the point of view of coverage of total costs and, if needed, generating profits by charging a certain percentage of cost in addition to the cost itself. To assess the 'percentage plus' figure, first assess the fixed costs associated and the reasonable volume that can be produced/sold during the month/year. Most find the fixed cost per unit of volume by dividing the associated fixed costs by the number of units that can be produced. Lastly, express the per unit fixed cost as a percentage of the base (variable) cost of the product/service.

As manager of an information centre you need to decide two things: base (variable) cost and the percentage of fixed costs that need to be recovered.

The base cost ideally should be the variable cost. In case of services, however, this creates problems because many services have very low variable cost. Bulk of the direct costs are/could be fixed costs. In case of services, therefore, the information manager should use per unit direct fixed costs as base cost.

The percentage plus is a managerial decision depending on what part of the fixed cost (other than the direct cost) the centre decides to recover. The percentage could vary from 0% to more than 100% depending on the objectives set for the information centre/the specific service/product.

Competition Based Options The basic options are: (i) to match the competitors price, (ii) be less by a certain percentage, and (iii) be more by a certain percentage. This applies more in the case of similar competing products/services. The extent of difference in prices could be decided on the basis of quality and other parameters of your service/centre vis-a-vis similar parameters of competitors.

Customer Value Based Options In this approach you first assess the value (both real and perceived) of your offer to the specific customer/target customer group. You could then decide to charge a price which is either equal to, or lower than, the value (perceived) realised by the customer group. Information of (perceived) value from the point of view of the customer may be generated through estimating the worth of each feature of the offer provided by you and/or the worth of the offer as a whole.

Help of market research/experts may have to be taken for this purpose. How much below this value you should charge, depends on the total volume of product/service that you wish to sell, or any other market related objective you need to achieve like market share, individual customer share, target profit, etc. This is because the larger the difference between the value to customer and the price, higher the attractiveness of the offer.

Pricing Strategies for New Offerings

There are two basic strategies for pricing new products/services: penetration pricing and skimming pricing.

Penetration Pricing The purpose of penetration pricing is to achieve a quick build up of sales among the customers in the target market. It boils down to as low a price as you could charge —usually close to variable cost/base cost of the product/service. This is used when the product/service is well known, the primary hurdle in using the service could be its higher price, and when there are economies of scale in production (i.e., cost per unit could be lowered significantly if higher volumes are produced). It is inadvisable to use this strategy when other efforts are required to develop the market and the market is not likely to develop fast enough. This is because, extra costs would be incurred in developing the market whereas, the same would not be recovered through generation of sales.

Skimming Pricing This is the opposite of penetration pricing. In this, you charge about the highest (close to the perceived value by the most sophisticated customers) price in the introductory phase, and then slowly reduce it over a period of time. This is applicable when there are very few customers who are knowledgeable about the service/product and its benefits, the market development effort (of other than lower price) is likely to be significant, competition is not likely to develop quickly, and there are low economies of scale (i.e., cost per unit is not likely to go down significantly with increase in volume of production). Over time, the marketer keeps reducing the price to expand the customer base to include those customers for whom the benefits are less and/or whose paying abilities are less.

In this option, the revenues generated through higher prices in the earlier stages help the financing of market development in later stages.

A Word of Caution It is strongly suggested that you do not confuse the penetration pricing with the discounts offered to the customers to try the product, for assessing the real benefits of the product/service during introductory phase (or for other specific purposes). The latter could be important elements for introducing services/products whose benefits can be realised only after sustained use/experience by individual customers. In fact, in case of experience based offers the price could actually go up after the benefits have been realised. However, penetration pricing is different in the sense that it is used when customers realise the benefits to begin with and the primary hurdle to adoption/purchase is its price. In such a case, low price can be used to quickly penetrate a large proportion of the market.

Strategies for Different Types of Offerings

Products/Services For specific products and services, you should first identify which basic approach of pricing to use, i.e. cost based, competition based, or customer based. The decision hinges on the objectives of the information centre and the specific market conditions.

Cost Based Cost based approach fits well with certain objectives of covering costs, and are about the only approach when competition does not exist and when it is difficult to assess the benefits of the offer from the point of view of the customer.

Competition Based Competition based approach should be used when similar competing offers are available in the market and the potential buyer is not able to distinguish between the competing offers quite well.

Customer Based Customer based approach should be used when special benefits are likely to accrue to the customers which are difficult to be obtained by producing the offer on their own and/or acquire an offer from competition. Value added information products/services may be better suited for adopting customer based approach.

Information Projects Information centres may be contracted by customers to work on a project whose output could be design of information products/services, design of information processing systems, etc. Such projects would be of higher value and of significant importance to the customers. The options available for preparing a budget could be: fixed fee (for manpower) plus expenses (of all kinds), fixed fee alone (inclusive of expenses), or sharing of certain proportion of benefits accruing out of the implementation of the project. The last option is applicable only if output is distinctly measurable. Among the fixed fee alone and the fixed fee plus expenses, the size of the project may actually influence the approach. Larger the size, chances are that the client might insist on fee plus expenses and may in fact put down conditions/penalties if the project gets delayed or does not measure up to the quality standards set out for it.

Membership The membership is a highly flexible offer. It can be designed primarily for seeking clients' help in developing the information centre as a whole or a significant service activity being planned by the information centre. It can also be designed for funding specific resources or services. For example, an information centre/library may identify patrons who may be interested in development of a kind of information centre. Alternatively, an information resource like a journal, could be funded/ subscribed through a member. The member in return might be cited at the place where the journal is located and also receive some free or subsidised services/products offered by the centre.

The 'membership' as a pricing unit has a number of advantages. From the point of view of the customers, a number of products/services are available whenever needed, as part of the membership (and thus easily budgeted) or at a 'member's discount' price. The membership fee is tax deductible as a business expense in some countries. Depending on the package offered, the membership may provide useful contacts with fellow members. Depending on the name attached, there may be prestige value in being a member.

From the point of view of the provider, memberships can be a useful marketing tool. They can provide funding for a journal and/or a newsletter. Other publications can be included in a higher membership fee, or offered at a discount with a less inclusive membership. A specific number of 'free' queries/database searches can be offered; this can be useful in promoting new or underutilized resources or services. A limited number of free photocopies can be included, in effect waiving charges when the price, in any case, would be so small that it would not be economical to collect it.

The membership list is itself valuable. If the members agree, it can be sold on a single-use basis to advertisers. The information centre can use it to announce new services, circulate questionnaires, announce meetings and workshops, and survey customers' needs and preferences, to fine-tune its efforts to serve them.

When purchasing a membership, whether in an information service network or a health spa, a customer is paying for an intangible benefit. There are tangible features, primarily equipment and facilities and professional advice. At the spa the member is paying for use of exercise equipment, the advice of a trainer, and for better health or a better body image. In the information network members are paying for use of the information resources and perhaps the equipment of the information centre, plus the expertise of the staff. They are also paying to be better informed, and hence more competent in their professions.

Membership pricing programs permit considerable flexibility and creativity: they need not be limited to a 'one size fits all' approach. As mentioned earlier, fee structures can be used to manage demand for limited resources. Different fee structures can be charged for customers who agree to use the facilities only during limited (low peak) hours. However, clearly defined rules of membership must be provided to customers and, at least equally important, be constantly in the forefront of staff attention, to assure that each member receives full agreed value for fees paid.

To counter high turnover, renewal rates can differ from initial membership rates. Discounts can be offered to those who introduce new members.

Services can also be 'unbundled', with separate fees charged for various packages or 'membership plans'. One fee might be charged to use all services, with separate rates for those who want only the main journal or newsletter, or only the 'current contents' service. A flat membership fee may be charged for use of most of the equipment and services, with a per-use charge for high demand or high variable cost services. This is an old tradition in libraries: many 'subscription libraries' charged a membership fee, plus a surcharge for borrowing 'best sellers'.

Membership pricing can incorporate a variable pricing structure offering subscription rates, volume discounts, and peak load and off peak load prices. The variable pricing structure can set differential rates based on the type of file queried (e.g. bibliographic vs. full-text database), the type of search utilized, and perhaps, the nature or type of InfoPros (Information Professionals) doing the search (e.g. university library vs. private sector firm or the nature or type of a customer). Important points to remember are:

- Markets for information services may not be homogeneous. Differential pricing structures can be tailored to differences in buyers' sensitivities to prices, owing to differences in available resources and in the perceived value of the information to be received.
- A complex pricing structure has its own costs, in staff training and time required for administering it, and in possible bad feeling which may arise when customers compare the prices they paid for 'the same service'.

Generate Pricing Options

To begin with generate the lowest price that can be charged and the highest price that can be charged. Subsequently, decide on intermediate points.

Specify the Lowest Price

This would depend on three specific factors. Firstly, from the point of view of economic sustainability, the lowest price should never be less than the variable cost. This is because at a price lower than this, you would be incurring a cash loss, i.e. more units you market, more losses you would make. Such a situation must be avoided altogether. Secondly, this option (price lower than variable cost) may be considered, in case, there are alternative ways of recovering the difference through indirect means, i.e. subsidies from some other source. Thirdly, this option may be considered for short period if such a price is required for inducing trial by customers so as to provide them opportunity to experience the benefits of the product. Besides, the information manager must look for reducing the costs of producing the product continuously, to further reduce the lowest price point.

Maximum Price that can be Charged

This is the price which most potential customer(s) would be willing and able to pay, for the benefits provided by the product/ service. In case of information, it is not easy to identify such benefits, leave alone their quantification to arrive at the figure. Research may have to be conducted to assess these. A more practical way is to identify the price of the closest substitute product/ service, and assess the amount of premium your offering may be able to command for its quality, delivery, prestige, etc. Besides, explicitly look for product enhancements and/or ways of promotion, to enhance the product appeal that could improve the maximum price that could be charged. Obviously, this increase in the price should be more than the cost of building such enhancements.

Generate Intermediate Options

Once the lowest and the highest price options are generated, intrapolating few price points in between the range is not difficult. It would be ideal if these intermediate points had a specific rationale like competitor price.

Select the Base Price

Each one of the pricing options, must be evaluated, on each of the objectives set for the product/service. Crucial dimensions on which the options need to be evaluated are as follows.

Coverage of Fixed Costs

For each of the options, assess the revenue and the costs and check how much of the costs are being covered. You must make sure that the price is, at the least, more than the variable cost. You must also calculate the percentage by which fixed costs are being covered. Ideal would be more than 100% so that you actually make a profit on the service/cover other costs of the information centre.

Sensitivity to Uncertainty in Demand

You need to assess the coverage of fixed costs, to uncertainty in demand, for each option. Lower the effect of uncertainty, better is the option.

Sensitivity to Fluctuations in Price/Costs

The coverage of fixed costs needs to be assessed for likely changes in price in the market place, arising out of competitors' actions and/or market conditions, as well as, likely fluctuations in variable and fixed costs. Once again lower the impact, better the option.

Fittingness to Position

This is the most crucial parameter from the point of view of market so far as the long term viability is concerned. You must make sure that the selected price option supports the position chosen for the offer. You cannot sell gold at half its market price because the customer would never trust you.

Likely Reaction of Competitor/Environment

Certain options may invite drastic reactions from competitors or other stakeholders, like serious complaints by regular buyers/patrons of the centre. If any such reaction is likely, plans need to be prepared to forestall the same/take care of such eventuality.

Prepare Cash Flow Statement for New Products

A cash flow statement needs to be prepared to see long-term viability of the offer/service.

In a specific situation, any one option may not be the best on all the objectives. In such a case, trade offs among the specific objectives may need to be made judiciously. It would be useful to make such trade offs explicitly and note the rationale for the same. This may also be discussed with/agreed upon by the management of the information centre.

ADAPTING THE BASE PRICE

Pricing of any product may have to be adjusted for a number of situations. Some of the important adjustments are being briefly described here.

For Ability to Pay

Prices of most information products may need to be adjusted for the ability of customers to pay. For example, prices charged to customers in developed economies may be higher than those in developing economies or prices charged to organizational consumers may be higher than those charged to individual consumers. Among the organizations, commercial ones may be charged higher than not-for-profit ones. And among individuals, non-students may be charged higher than students.

The adjustment of price according to the ability to pay (so that demand is created) makes perfect sense. However, effective ways of administering/managing the same may be needed. The most effective ways would be through some differential features like product features, service, delivery, packaging, etc., so that the cross buying across segments is minimised. Besides, administrative arrangements like proof of belonging to the lower price groups may also be useful, but may involve more of policing function than marketing.

For Increased Life/Purchase

Several types of discounts may need to be provided for information products and services. Two important ones are: quantity discounts and cash discounts.

Quantity discounts are frequently offered if multiple copies of the same product are bought. These make economic sense because there are savings in promoting, handling, mailing, etc. of multiple copies together compared to equivalent single copies.

An additional aspect of information products is to discourage the production of copies of the document for own use, or sale by the buyer, as the production of copies whether hard paper or electronic, is easy and low cost.

Cash discounts are being used in information industry through advance payments for delivery/use of service over extended periods. For example, if a subscription is bought for 1 year, 2 years, or more, appropriate discounts are offered. These provide benefit to the customer. At the same time, there are effective ways of pre-empting the future demand, reducing promotional expenditure, and obviously earning interest on advance payment.

Assessment of the impact of various discounts may be made in terms of increased demand, as a result of lower price and meeting other objectives of the centre, before discounts are offered. These may also have to be in line with the industry norms.

For Promoting Trial/Usage

Promotional pricing, as the title suggests, is meant for temporary or medium to long-term promotion. It can take several forms. Some examples are as follows:

- A new product may be priced lower to induce trial in the introductory phase.
- A specific product/service may be priced lower as it can be used to attract more customers who would buy other products/services.
- Special events may be organised, like exhibitions, seminars where the product/service may be offered at a discount to promote the product/the information centre.

In all the situations of promotional pricing, the information managers must evaluate the impact in terms of monetary as well as non-monetary objectives set for the product/service and/or the promotion.

BOX 5.3

NICMAN at IIMA : Setting the Price

Selecting Pricing Objective

Following pricing objectives, could be identified, on the basis of considerations, for pricing of NICMAN products and services.

Considerations	**Pricing Objectives**
NICMAN to become self sustaining at the earliest.	Sustainability of specific product/ service by meeting all costs and contributing to overall income generation.
Product and service being conceptual in nature not possible for the customer to assess value.	Keep price low enough to try on a sustained basis for understanding the real value of products/services.
Differential paying ability of different customer.	Adjust price for paying ability of the customer.
Competition uncertain.	Charge as low a price as possible to cover as much market as possible.
IIMA being parent organization.	Price to match the high quality position.

Selecting Basic Approach

The considerations and the pricing objectives developed above, strongly indicate the following:

Competition is difficult to assess and is uncertain. Therefore, competition based pricing would be difficult to use.

Value of the products/services is difficult to assess for both customer and NICMAN. Hence, customer value based pricing may be difficult to use.

It is possible to assess costs quite well, particularly the costs directly associated with the specific product/service. Hence, this basis is both feasible and useful to apply.

NICMAN is introducing most of the products for the first time. Use of these products, given the nature of products/services, may be higher if prices are kept low. This would be more among academic and young executives if they are able to afford buying of the products.

This group is of particular importance to NICMAN, as in the long run this could lead to professionalization of management. Penetration pricing, therefore, may be better suited.

(*Contd*)

Generate Pricing Options

The basic approach decided for pricing is cost. In this approach the following options have been generated:

1. Minimum Price	:	Lowest Variable Cost	:	Rs. 30.50 × 12
			=	Rs. 366
2. Intermediate Price	:		:	Rs. 800
3. Intermediate Price	:		:	Rs. 2000
4. Intermediate Price	:		:	Rs. 3000
5. Maximum Price	:	As obtained from Survey	:	Rs. 4000

The real generation of options is of the lowest and the highest price. The rest are intrapolation of the range.

Setting the Price

Each of the options was evaluated on the objectives identified earlier. The basic parameters of cost were:

Variable Cost: Rs. 366. Fixed Cost of Production: Rs. 43,200; Fixed Cost of Promotion: Rs. 20,000

Criteria	Option: Price/Year in Rs.									
	366	500	800	1000	1500	2000	2500	3000	3500	4000
Contribution/ Member	0	134	434	634	1134	1634	2134	2634	3134	3634
Penetration% in Bus. & Ind.[1]	7.0	7.0	7.0	7.0	7.0	6.5	5.5	5.0	4.5	4.0
No. of Member subscriptions[2]	112	112	112	112	112	104	88	80	72	64
Total Contr./ Yr. (Rs. 000)	Nil	15.0	48.6	71.0	127.0	169.9	187.8	210.7	225.6	232.6
Contr. After Fixed Costs (Rs. 000)	−63.2	−48.2	−14.6	7.8	63.8	106.7	124.6	147.5	162.4	169.4
Risk of:										
- Loss (Contr./ Fixed Cost)	0	0.24	0.77	1.12	2.01	2.69	2.97	3.33	3.57	3.68
- Penetration	←NIL→									

[1]Penetration is assessed as those mentioning 'Very Keen to Buy' at a particular price, based on reactions to price range of Rs. 1,500–Rs. 4,000. Penetration at prices less than Rs. 1,500 has been assumed to be same as that at Rs. 1,500.

[2]Assuming total number of organizations in business and industry as 1,600, i.e. the total number of organizations in India which were assessed to be potential customers of such products in the survey.

(Contd)

The above analysis helps in choosing a price according to what is the primary objective.

— From the point of view of contribution/coverage of fixed costs, any price at Rs. 1,000 or more is acceptable. However, to take care of the risk, the price of Rs. 1,500 or more is more acceptable than the price of less than Rs. 1000.
— From the point of view of penetration/market coverage, any price up to Rs. 1,500 is acceptable as the penetration is likely to be 7% up to that price.
— From the point of view of fittingness with the position, information products/services from the premier management institutes, a price of Rs.1000 upwards is acceptable. This is because the price of competing products from Indian suppliers of similar products/ services is less than Rs. 1,000. The foreign products/services are priced much higher.

The NICMAN could choose a price for commercial clients which is anywhere from Rs. 1,000 to Rs. 1,500 per year.

For Promoting Product-Mix

Two specific forms of price adjustments related to product/service mix offered by information centres/libraries are: two part pricing and product/service bundling pricing.

Two part pricing involves a fixed fee for the service/product plus a variable component depending on usage level. For example, you may offer annual membership of the centre plus a specific charge for individual services (usually at a lower price compared to casual users). This kind of pricing helps the information centre in getting assured revenues (to cover bulk of the fixed costs of the service) and assured liquidity, though at a lower per unit price of the service. This method would attract bulk users as they may be able to reduce their total cost by paying lower price per unit of service.

In product bundling pricing, the information centre bundles a number of products/services in distinct groups of interest to customers. The price of each bundle is done in a manner that the price of the bundle is lower than the sum of prices of individual product/service which are included in the bundle. This could

BOX 5.4

Guidelines for Setting the Base Price

1. For Setting Objectives

1.1 Review the objectives of the product/service/centre (library) from the document on marketing plan.

1.2 Review the considerations for Pricing and assess implications for objectives.

1.3 Decide whether the objective is Token Pricing/Income Generation/ Sustainability from the point of view of market situation and organizational objectives.

1.4 Decide whether Image, Market Share, and Positioning objectives are relevant on the basis of considerations.

1.5 On each objective, define the desirable level/value to be attained.

1.6 Given the situation, assess the relative importance of objectives.

2. Select a Pricing Approach

2.1 Assess the market situation and decide whether the primary marketing task is market development or fighting the competition.

2.2 For developing the market, assess the role of price vis-a-vis other elements of marketing mix.

2.3 For fighting competition, assess whether you have any distinctive advantage/disadvantage vis-a-vis competition.

2.4 If the primary task is market development, assess the price–volume relationship and use the customer oriented approach as pricing strategy.

2.5 If the primary task is fighting competition, study the competitors and assess their reactions to your likely pricing moves. The basic approach would be competitor oriented.

3. Generate Pricing Options

3.1 Decide lowest price option: i.e., lowest variable cost of producing and marketing an additional unit of the product.

3.2 Decide maximum price option:
- maximum value a customer could derive by using the product in case of primary task of market development,
- maximum price at which similar products are being marketed in case the task is snatching share from competitors.

3.3 Decide intermediate price points.

4. Evaluating the Options

Each option must be evaluated on specific objectives/criteria developed.

4.1 Assess the volume of demand for each option.

4.2 Estimate revenue and costs for the level of demand generated for each option.

4.3 Estimate contribution towards coverage of fixed costs for each option.

4.4 Estimate market penetration for each option.

4.5 Estimate market share for each option.

4.6 Estimate the chances of not achieving (risk) the desired (as per objective set) level of contribution, penetration, and market share.

4.7 Select the best option in terms of achieving objectives at affordable/ minimum risk.

BOX 5.5

NICMAN at IIMA : Adapting the Base Price

In the context of NICMAN, the base price needs adaptation to adjust for different clients, product mix, multiple copy purchases, and introductory phase.

Adjustment for Types of Clients

As discussed in Considerations for Pricing, the ability and willingness to pay, varies across the different markets. The base price was decided for a single copy in the commercial organization market. The base price for academic organizations and individual buyers in both, commercial and academic markets, needs to be decided.

- Discounts of 10 to 15 per cent to academic organizations and individuals are customary in the market for books.
- Differential price to organizations and individuals, though existent in the market for journals, could give rise to grey market, i.e., organizations buying in individual's capacity. The discount to individual could be up to 50% of price to an organization.
- The minimum price should never be below the variable cost.

The options generated therefore are,

Minimum Price	:	Rs. 400	
Maximum Price	:	Rs. 1,200	(20 per cent discount on price to commercial organizations)

It is proposed to price the individual copy at Rs. 800 considering, the fact, that even a glossy general publication was priced at Rs. 50 per copy in the Indian market. Academic journals are priced far higher. This price could also be justifiable from the point of view of covering direct costs (both fixed and variable), along with the minimum penetration level of 4% (64) in the commercial sector. Whatever sales are made to the academic sector/individuals would lead to an additional contribution.

Product-Mix Adjustment: NICMAN would offer more than one product/service. Two types of adjustments could be thought of: buying of multiple products/services and membership of the Centre on some fixed initial payment.

Membership Plus Price: Membership fee could be decided to cover as much of the fixed costs and investments of the Centre as possible. The Centre would get revenue from the membership through interests on its investment. The safe returns on capital in India ranged from 10 to 15 per cent. To attract membership, for making the Centre viable and strong, NICMAN could think of providing 20 per cent (more than the return on investment) of membership fee as discount. A standard package of services/products could be worked out for this.

(*Contd*)

Buying Multiple Products: If a buyer buys multiple products/services, the major savings could be in mailing, distribution, and promotion. These savings in case of CC/IML could be up to 25% of the variable cost (Rs.12 × 15: Rs.180). It is proposed to pass on the distribution cost savings to the clients. Thus, a discount of 10 to 15 per cent could be decided.

Special Discounts: In case any one bought more than one copy of the same product, a discount similar to the one for buying multiple products was proposed. This level of discount was not likely to fully take care of making of copies at customer's end. This is because the cost of making a copy at customer's end could be as low as (Rs. 0.75 per page × 20 pages per issue × 12 issues) Rs.180 compared to a discounted price of close to Rs. 800 to Rs. 1000. However, it was expected that the quality of paper, the binding, and hassles of making copies and distributing to individuals would detach the customers to prepare their own multiple copies.

Introductory Discount: It was proposed to give special discount if orders were placed by a certain date. This could help in generating quick orders in the introductory phase. For introductory phase a 20% discount could be given.

Overall Adjustments: Overall adjustments could be described as under:

	Commercial Organization	*Academic Organization*	*Individuals*
Price (Rs./yr.)	1,500	750	750
Bulk Discount	20%	20%	—
Bulk Price/Copy	1,200	600	—
Other Products	20% of Other Product's Price (same as bulk discount)		
Introductory Discount	20% on the Order		

The price would be as follows:

Implications:

	Commercial Organization		*Academic Organization*	
	Reg. Price	*Intro. Price*	*Reg. Price*	*Intro. Price*
Single Copy	1,500	1,200	750	600
Multiple Copies	1,200	960	600	480

Fixed cost of Rs. 63,200 would get covered in various ways. For covering Rs. 63,200 fixed cost, the number of single copy subscriptions from commercial and academic organizations could be as given in the table below:

Table Subscriptions Required to Cover Fixed Costs of Rs.63,200

Sr. No.	Comm. Orgn.		Academic Orgn.	Total Subscriptions
1.	75	+	0	75
2.	70	+	18	88
3.	65	+	36	101
4.	50	+	54	104

BOX 5.5

Guidelines for Adapting the Base Price

1. Review product/service, market situation, buyer behaviour, and competitive behaviour, etc. (considerations in Pricing) for identifying which kind of adjustments are needed.
2. For each type of adjustment, assess the benefits to the centre/library and the costs. Adjust price, only in cases, where benefits are more than the costs.
3. Review all the adjustments and their implications for the objectives of cash generation and contribution. If necessary, revise adjustments.

lead to increase in demand as the effective price is lower. At the same time, the increased demand more than offsets the impact of reduced margins on the revenue earnings of the centre.

REVISING PRICES

An information centre may be required to change the price of its products/services in response to changes in the costs of inputs, market developments, environmental changes, competitive pressure. In a conceptual sense, you either initiate a price change or react to a price change by competitors.

Reacting to Price Changes

Price changes introduced by competitors could be of two types: increase in price or decrease in price (price cut). In either case, the answers to the following questions might help in deciding the nature of reaction:

- Why has the competitor changed the price? Is it in response to changes in input costs? For grabbing more market?
- Is the price change likely to be temporary or permanent?
- What is likely to happen to sales and profits of competitors?

- How are competitors likely to respond?
- How would the total market get affected?
- What is the effect on your sales and profits?

The options available to react to price changes could be:

- No reaction: If change is temporary and/or is not likely to affect you significantly.
- Introduce New Product: Of better/poorer quality in case the change is likely to open a new slot/position in the marketplace.

The real challenge of price changes in the field of information products and services is going to be assessment of value addition through studying/understanding customer requirements.

Initiating Price Changes

This is the most likely scenario being faced by information centres/libraries. To begin with they would/might start with charging token prices. As the attitudes of buyers change (in terms of expectations of prices) and as they realise the full benefits of better information products and services, prices may have to be increased. Also, acquiring equipment and software to design and market better information products and services is likely to lead to increases in fixed costs/investments of information centres/ libraries. For economic viability of such acquisitions also, prices may have to be increased. In the process of recouping the investments and covering the fixed costs faster, the purpose of pricing/ marketing may also be getting an additional share in the marketplace. In other words, the primary task is to justify price increases, both for developing the markets, as well as, getting a higher share of the existing market.

For deciding whether the price change needs to be initiated, following assessments may have to be made:

- Assess customers' reaction to the price change—your customers as well as customers in general.
- Assess competitor's reaction to price change.
- Assess your performance in light of the above two.

SUMMARY AND CONCLUSIONS

Introducing the concept of pricing of information products and services, particularly in libraries and in developing countries, is a difficult task. Both, the customers as well as the staff, not only find it difficult to accept, but in several cases actively oppose such moves. However, the changing environment of decreasing/ freezing grants from donor/parent organizations, the changing and increasing complex needs for information of clients, and the need to infuse funds to provide the required products and services, make it essential to devise ways of generating financial resources through charging the users.

A library/information centre might like to first assess the clients to be served and their information and delivery requirements. The worth/value of current information products and services to the clients and their ability and willingness to pay for each product/service, currently offered, can then be assessed. Finally, an assessment of costs can be made which are associated with each of the product/service and the money required to run the library. The requirements of funds for acquiring basic resources should also be made.

The library/information centre then needs to assess the extent of funds that can be generated through charging of information products and services to users/clients/customers. A decision needs to be made as to which customers/products/services can be charged only token price, which ones can be charged to cover a reasonable proportion of cost, and which ones (if at all in the beginning) can be used to generate revenues more than their cost. Strategically, the library may also make similar decisions for medium and long term. It could also fix a time-frame to move towards the achievment of objectives of higher/full cost recovery generating surplus. These decisions would form a part of developing a marketing plan as discussed in Chapter 3.

The libraries/information centres may continue to generate part of their resources through donations and memberships/

patrons as in the past. However, the money received should be, in some way, linked to the benefits the donor/patron is entitled to. Targets of funds to be generated through this route along with the bundle of services to be offered need to be decided.

BOX 5.6

Key Steps in Deciding Prices of Information Products/Services

- Considerations of library objectives, types of clients, types of offering (product/service), competition, likely price and sales volume, cost and volume relationships, and their implications for succeeding steps.
- In the light of considerations, assess the appropriate pricing objectives and approaches.
- In the light of above two steps, generate and evaluate pricing options so as to select a base price for the product/service.
- The base price may have to be adjusted for different types of customers/segments and specific situation in the marketplace to achieve desired overall objectives.
- In general, price charged should not be lower than the variable cost of producing and marketing the product/service, and not more than the value that a customer could derive by using the product/service.
- Prepare a cash flow statement for planning and reviewing the funds generation for the library/centre and each of the product/service.
- The balance requirements of funds should be targeted to be raised through memberships/donations, etc. Devise appropriate product/service bundling for such memberships/donors.

REFERENCES

1. Bridges, William, *Job Shift: How to Prosper in a Workplace without Jobs*, Addison-Wesley, New York, 1994.
2. Brindley, Lynne J., "Information Service and Information Product Pricing", *Aslib Proceedings*, Vol. 45, Issue 11/12, Nov/Dec 1993.
3. Chernos, Saul, "Pricing of Commercial Online Services: A Canadian Perspective", *Information Highways*, Vol. 2, Issue 5, 1995.
4. Cousins, Jill, "Setting up a Business Information Service", *Aslib Information*, Vol. 18, Issue 4, April 1990.

5. Danilenko, Gene, "Activity Based Costing for Services: The Corporate Information Center", *Special Libraries*, Vol. 85, Issue 1, 1994.
6. Drabenstott, Karen, *Analytical Review of the Library of the Future*, Council on Library Resources, Washington D.C., February 1993.
7. George, Anne Lee, "Fee-Based Information Services and Information Brokers: A Case Study in Collaboration", *Fee for Service*, Vol. 1, Issue 1, 1994.
8. Ghani, Din, "Charging and Paying for Information on Open Networks", *Aslib Proceedings*, Vol. 47, Issue 6, June 1995.
9. Gray, Doublas A., *Start and Run a Profitable Consulting Business: A Step by Step Business Plan*, 3rd ed. Self Counsel Press (a division of International Self Counsel Press Inc.), Business Series, North Vancouver, 1990).
10. Handy, Charles, *The Age of Unreason*, Harvard Business School, Boston, 1989.
11. Handy, Charles, *The Age of Paradox*, Harvard Business School, Boston, 1994.
12. Hanna, Nessim and Dodge, Robert, H. *Pricing Policies and Procedures*, New York University Press, New York, 1995.
13. Harrow, John, 'Politics and Pricing—Lessons to be Learned from the Failure of Warwick Statistics', *Fee for Service*, Vol. 1, Issue 4, September 1994.
14. Hatfield, Deborah, 'Partnerships in Information Services: The Contract Library', *Special Libraries*, Vol. 85, Issue 2, 1994.
15. Hoffman and Novak, 'Electronic Enterprises: Looking to the Future', Technology Assessment Report (downloaded electronically), Office of U.S. Congress, 1994.
16. Hyde, Margery, 'Quality Standards for Fee-Based Information Services', *Fee for Service*, Vol. 2, Issue 2, 1995.
17. Illinois Digital Library Project, 'Digital Library Infrastructure; Building the Interspace for a University Engineering Community', *ACM Communications of the Computing Machinery*, Special Issue on Digital Libraries, April 1995.
18. Jotwani, D. and Haravu, L.J., 'Pricing of the SDI Service at ICRISAT', *Journal of Information Science: Principles & Practices*, Vol. 19, Issue 1, 1993.
19. Kinnear, Thomas C. and Bernhardt, Kenneth L., *Principles of Marketing*, Glenview, III: Scott, Foreman, 1986.

20. Montgomery, Stephen L., *Profitable Pricing Strategies*, McGraw-Hill, New York, 1987.
21. Morris, Michael H. and Morris, Gene, *Market-Oriented Pricing: Strategies for Management*, Quorum Books, New York, 1990.
22. Mowshowitz, A., 'On the Market Value of Information Commodities. I. The Nature of Information and Information Commodities', *Journal of the American Society for Information Science*, Vol. 43, Issue 3, April 1992.
23. Mowshowitz, A., 'On the Market Value of Information Commodities. III. Demand Price', *Journal of the American Society for Information Science*, Vol. 43, Issue 3, April 1992.
24. Nagle, Thomas T., *The Strategy and Tactics of Pricing : A Guide to Profitable Decision Making*, Prentice-Hall, Englewood Cliffs, N.J., 1987.
25. Pienarr, Rae, 'The Organization of Fee-Based Services', *Fee for Service*, Vol. 1, Issue 4, September 1994.
26. Rogers, Len, *Pricing for Profit*, B. Blackwell, Oxford, 1991.
27. Saksida, Marino, 'Shift 'Inevitable', *Information World Review*, No. 63, 1991.
28. Sheedy, Edna, *Start and Run a Profitable Home-Based Business: Your Step-by-Step, First-Year Guide*, Self Counsel Press (a division of etc.) Business Series, North Vancouver, 1990.
29. Sykes, Phil, 'Safe Broking—A Ten Point Guide', *Aslib Information*, Vol. 20, Issue 2, February 1992.
30. University of Toronto Business Information Centre, 'Fee-Based Profile', *Fee for Service*, Vol. 1, Issue 4, September 1994.
31. Warner, Alice Sizer, 'Looking Back, Looking Ahead', *Bulletin of the American Society for Information Science*, Vol. 21, Issue 3, Feb/Mar 1995.
32. Weaver, Maggie, 'The Top Ten Marketing Tips', *Fee for Service*, Vol. 1, Issue 3, June 1994.
33. Webber, Sheila, 'Costing and Pricing Information Services', *Fee for Service*, Vol. 2, Issue 1, 1995.
34. Whelan, Hilary, 'The In-house Information Shop—The Corporate Information Unit as a Profit Centre', *Aslib Information*, Vol. 18, Issue 3, March 1990.
35. Whitmell, Vicki, 'Establishing Long-Term Relationships with Your Fee-Based Clientele. Part One: Agreeing to Agree' *Fee for Service*, Vol. 1, Issue 1, Part Two: Costing Issues, Vol. 1, Issue 2, March 1994.