# practical approach to Management Accounting

John Gibbs FCA

# A Practical Approach to Management Accounting

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### Preface

Many books have been published on the subject of management accounting, some encyclopaedic in their coverage of every aspect of an accountant's work; others concerned primarily with the theoretical background to that work not necessarily linked to its practical applications.

One justification for yet another volume is our belief that there is need for a concise yet practical approach to the essential planning and control activities which are the distinctive features of the accountant's role in business management.

In its preparation, whilst having in mind the needs of the accountant in business life, we have paid particular regard to the examination syllabus of the various professional bodies which now include management accounting as a subject for special study.

The material used is based on the highly successful courses produced by the Financial Training Group, and is intended to enable a student to be fully prepared to pass papers set for him in the subject up to an advanced level.

# Introduction — The nature of management accounting

#### BOOK-KEEPING AND ACCOUNTING

The distinctive features of accounting as compared with book-keeping are that whereas book-keeping is concerned with the classification and recording of transactions, accounting superimposes the functions of summarising, reporting and interpreting the results of the book-keeping process.

In relation to general purpose financial reports, such as a company's annual accounts, the accountant's work is concerned with the overall earnings of the business, and with changes in its capital position. This total view is helpful to outside users of the accounts such as creditors, lenders, investors and employees; though each may have additional specific information needs.

The managers of a business must, of course, ensure that the end results of their activities will be satisfactory to the suppliers of money, goods and effort, on whom the business depends. To enable them to achieve such results, however, they will need frequent and detailed information on all aspects of the business, including that expressed in financial terms.

The unique role of the 'management accountant' is to present accounting information in such a way as to assist management in their task. To describe the scope of his work it is therefore helpful to review the various functions of management.

#### THE FUNCTIONS OF MANAGEMENT

The distinctive feature of a manager's role in any business is that he has the

x Introduction

responsibility of taking decisions. The type of decision taken will depend on the relative seniority of a manager within the hierarchy of the business. The foreman in a factory for example acts as a manager when he decides to allot a job to one operator rather than another, or to authorise overtime working under special conditions. The sales manager may instruct his salesmen to concentrate on sales of one product or in one market rather than another.

At the most senior level the board of directors has to decide in general terms what profit the business ought to achieve in a particular period, and what sources of finance shall be used in supporting its operations.

At board level, decisions relate to the general policy of the business. At less senior levels decisions are related to particular actions which will assist in the implementation of that policy.

Whenever a decision is taken, the manager concerned has an equal responsibility to check that his decision is implemented and that it leads to the desired effects; in other words he must exercise control over the results of that decision.

Unless results are to be left to chance there must be clearly delegated authority for carrying out the decisions, reflected in a well-designed organisation structure for the business.

In brief therefore management involves:

- (a) setting objectives, which at board level will be long-term objectives and at junior level will be shorter-term aims;
- (b) planning how those objectives shall be achieved, either in the long run or in the immediate period ahead;
- (c) organising the business in such a way that every person knows the limits of his authority and responsibility;
- (d) controlling the results of actions taken in implementing plans.

Relating this to the accounting function, it is possible to define management accounting as:

The application of professional knowledge and skill in the preparation and presentation of accounting information in such a way as to assist management in the formulation of policies and in the planning and control of the operations of the undertaking. Introduction xi

This definition is taken from the *Terminology of Management and Financial Accounting* published by the Institute of Cost and Management Accountants.

#### MANAGEMENT ACCOUNTING

Since policy-making, planning and control are generally descriptive of all the functions of management, it would appear that any information which could be useful to managers and which was evaluated in money terms could be a management accounting responsibility.

Some writers indeed have used the term to cover every possible task of accountants in a business environment. In this book, however, the decision has been taken to exclude from detailed consideration:

- (a) any responsibilities for general purpose financial reporting except in so far as the measurement of overall business achievement is linked with the scheme of internal controls, as outlined in Chapter 1;
- (b) internal book-keeping (cost accounting); though a brief background summary of costing techniques is given in Chapter 2;
- (c) financial control activities, including inventory planning and the evaluation of capital projects, which are covered in detail in a companion volume written by John Gibbs entitled *A Practical Approach to Financial Management*.

Following the definition given above, this book describes the accountant's responsibilities, and the techniques he may employ in the use of his analytical and critical abilities, in the tasks of:

- (a) policy formulation (Chapter 1);
- (b) short-term planning and control (Chapters 3-8); and
- (c) problem solving and decision-taking (Chapters 9–11).

The book concludes with a brief guide to methods of presenting management information.

## **Contents**

	Preface	vii
	Introduction — The nature of management accounting	ix
1	Long-range planning and performance evaluation techniques	1
2	Review of cost accounting techniques	31
3	Budgetary control	53
4	Variances from budget	85
5	Standard costing	107
6	Variances from standard cost	123
7	Balance sheet budgets	149
8	Management behaviour and information needs	167
9	Pricing policy and contribution theory	187
10	Capacity decisions	201
11	From marginal costing to linear programming	219
12	Presenting management information	241
	Index	253

## Chapter 1

# Long-range Planning and Performance Evaluation Techniques

#### LONG-RANGE PLANNING

#### Past achievement and future plans

The financial accounts of a business provide information about its past achievements in summary form; and an analysis of a series of periodic accounts will indicate the trends of profitability and the manner in which transactions have been funded.

Internally, a cost accounting system is capable of identifying the relative profitability of different products or activities; of analysing the nature of expenses incurred and assisting the valuation of residual stockholdings and uncompleted work. Where management responsibilities are decentralised, the cost records will also show the costs incurred (and profits achieved, if appropriate) by each manager.

A comprehensive accounting system therefore supplies basic data from which forecasts can be made of likely future performance. Forecasting, however, necessarily involves taking account of changes in the conditions under which past results were achieved. Some of these changes will be external to the business and normally outside its control, for example:

- (a) changes in the pattern of demand for the type of product offered;
- (b) actions of competitors, notably in technical innovation or marketing methods, which may threaten to disturb the existing trend of the business;
- (c) government action in such matters as taxation, import regulations, price controls or social legislation;
- (d) economic factors such as changes in the general level of prices or in foreign exchange rates.

Other changes will be occurring within the business as a result of past decisions, including:

- (a) the introduction of new products, or the discontinuance of existing products;
- (b) changes in the resources and facilities available;
- (c) changes in the efficiency with which those resources are used.

The reference to external conditions above may have implied that changes in circumstances were largely adverse to the business; but there will in fact be many outside developments offering the possibility of new markets, the discovery of new materials, advances in technology and new sources of finance. The business may be able to make use of these, though probably after further effort and development of its own.

Business management, if one excludes the purely internal 'problem solving' role of junior operational managers, is a process of continuous adaptation to external threats and opportunities having regard to the strengths and weaknesses of the business as existing or in the course of development. The exercise of this management function may be largely informal, particularly in the case of the smaller business, and may therefore give the impression of being based on opportunism or the exercise of entrepreneurial flair. Commercial experience and acumen must of course have a large influence on management actions because in the last resort all decisions involve a subjective judgment on the facts available; but where management responsibility is delegated, as in the case of the larger business, it is necessary that there shall be some formal procedures for pooling information and for arriving at decisions which will be in accordance with the best interests of the business as a whole.

In order to decide what are these 'best interests' it is clearly necessary to

define what the business exists to achieve; in other words what are the business objectives.

#### Business policies and objectives

Various classifications of business objectives will be found in practice and in theoretical analysis, but for the majority of enterprises, those which involve the investment of funds, the primary objective must be to ensure that risk capital will be available when required. This means that there must be an acceptable rate of return to the proprietors or ordinary shareholders. What this rate should be must be decided in each case having regard to the rate of return available on other types of long-term investment and also to the degree of risk associated with the particular business.

#### THE PROFIT OBJECTIVE

The primary objective therefore is for **profitability** measured in some way as the relationship between profits and the value of the ordinary share capital.

The traditional 'pyramid' of financial ratios is:

$$\frac{\text{Profit}}{\text{Capital employed}} = \frac{\text{Profit}}{\text{Sales}} \times \frac{\text{Sales}}{\text{Capital employed}}$$

For the purpose of financial planning it is necessary to be more specific about the nature of **profit** and of **capital employed**, and in fact to take account of the two main sources of capital i.e., loan capital and shareholders' funds (in other words the 'gearing' of the long- and medium-term sources of capital). The above interlocking ratios could for this purpose be elaborated to read:

$$\frac{\text{Profit for ordinary shareholders}}{\text{Ordinary shareholders' capital employed}} = \\ \left\{ \frac{\text{Total profit}}{\text{Sales}} \times \frac{\text{Profit for ordinary}}{\text{Shareholders}} \right\} \times \\ \left\{ \frac{\text{Sales}}{(\text{Net assets} \times \frac{\text{employed}}{\text{Ordinary shareholders' capital employed}}} \right\}$$

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As a simple example, take the following figures:

#### Profit and loss account

	£000
Sales	100
<b>—</b>	==
Total operating profit	20
Less: Loan interest	5
Profit before tax for ordinary shareholders	15
	==
Balance sheet	
Ordinary shareholders' funds	200
Loan capital	50
Net assets employed	250

Our revised set of formulae then becomes:

$$\frac{15}{200} = \left(\frac{20}{100} \times \frac{15}{20}\right) \times \left(\frac{100}{250} \times \frac{250}{200}\right)$$

$$7\frac{1}{2}\% = 15\% \times 0.50 \text{ times per annum}$$

In relation to long-term planning however it is necessary to note that objectives must be set not only for profitability, but also for sales and for the capital structure of the business. These and other types of objectives are outlined in the following paragraphs.

#### OBJECTIVES ADDITIONAL TO PROFITABILITY

The sales objective is particularly closely linked with the profitability objective, since no business can expect to achieve profits unless it is meeting a clearly defined market need. Meeting that need means defining a product range; and developing a product range may require invention, research or development. It is common to find the sales of objectives divided into:

- (a) A product market objective (variously described as market standing, consumer needs or growth and service) which emerges from such considerations as:
  - (i) what market should we serve?
  - (ii) what share of that market should we obtain?

- (iii) what level of service should we offer?
- (iv) what products are required?
- (b) An innovation objective corresponding to the questions:
  - (i) what products are currently available?
  - (ii) what new products should be developed?
  - (iii) should we undertake our own research and development or make use of outside facilities?

#### The capital structure objective

This is sometimes referred to as physical and financial resources or assets and investment, and is concerned with:

- (a) the types of asset to be held by the business;
- (b) the way in which they are to be used (some companies identify a separate objective of efficiency or productivity);
- (c) the methods by which they should be financed, for example, by equity or fixed interest capital, or by hire, hire-purchase or leasing.

In addition to the foregoing objectives, which are clearly linked with financial ratio analysis, companies are increasingly giving public recognition of their responsibilities to persons other than the shareholders, and are designing objectives relating to:

- (a) **Responsibility to employees** for the development of their careers and the satisfaction of their personal aims.
- (b) Public welfare, variously described as social or public responsibility. Some of the more obvious objectives under this heading, such as to refrain from polluting the environment, are being progressively converted into legal constraints.

Finally there exists a miscellaneous group of objectives arising from the peculiar circumstances of particular businesses, such as:

- (a) 'To remain an independent public company' which in some cases might well be considered as a prerequisite of the achievement of the profitability and responsibility objectives. Or
- (b) 'To remain a manufacturer of a particular product' which demon-

strates the desirable intention of building on the company's existing strengths. These could be described as 'pre-emptive objectives' since they could eliminate some course of action which might otherwise appear desirable from the point of view of shareholders or other interested parties.

#### **CONVERTING OBJECTIVES INTO PLANS**

As the purpose of establishing objectives is to guide managers in taking decisions, it is clearly desirable that they should be set in tangible terms so that it will be possible to measure subsequently the extent to which they are being achieved. Such objectives as 'to maximise profits' or 'to give good value to customers' may be admirable in theory but difficult to use in practice since no yardstick of success has been established. They could be described as 'visionary objectives' or, more commonly, as statements of policy. The word **policy**, however, is often used as a general alternative to **objective**.

These intangible objectives could be converted into terms which would enable the measurement of performance, for example:

- (a) to increase earnings per share each year;
- (b) to increase market share by 20 per cent within three years.

They could then be used, together with the pre-emptive objectives referred to earlier, as the basis for plans of action.

The typical business plan is the annual budget showing, in the same form as will eventually be used for financial and costing reports, the intended results for the year ahead. In some types of business one year may in fact be the practical limit for effective planning, for example, those engaged in short-term jobbing work or in the supply of goods which are subject to frequent changes in fashion. In other cases the detailed budget, or some parts of it, will extend beyond one year. This would apply to companies carrying out long-term construction contracts or engaged in mineral extraction; and to all companies in regard to their major capital expenditure or research projects.

Whatever the period of the budget may be however, its main concern is to lay down detailed performance targets in relation to a set of circumstances already in existence or known to be coming available. It is a tactical response to a limited range of problems. The time available for budget

preparation does not normally permit any detailed analysis of the longerterm problems of the business; and although the budget may be shown to meet some of the company's objectives within its own relatively short period of time, this does not guarantee that over a longer period those objectives will continue to be achieved.

#### LONG-RANGE PLANNING

The purposes of long-range planning are:

- (a) To keep under review the economic and other external factors affecting the business, and to forecast likely future developments.
- (b) To review the development of the business and to identify its strengths and weaknesses in relation to those of its competitors and to its own future needs.
- (c) To investigate possible 'strategies' including major changes in the products offered, the markets to be served, the organisation of the business and its methods of finance.
- (d) To decide what combination of strategies appears at any point in time to offer the best chance of success in achieving the objectives of the business as a continuing entity i.e., over a relatively long period of time.

The term 'strategy' is used to indicate any action which is deliberately decided upon as a means of achieving the objectives of the business; and this may be contrasted with 'tactical' decisions which are short-term responses to immediate problems. Some strategies, such as a decision to set selling prices on a new basis or to change the level of service offered to customers by an adjustment of the normal level of stockholdings, might well be decided and implemented as part of the short-term budgeting process; but most strategic possibilities, particularly if new products or new markets are envisaged, would require a relatively long period of gestation. Unless decisions were made on these proposals after evaluation of their long-term affects, any short-term budget could well involve actions which could hinder or prevent their implementation.

Having made preliminary evaluations of the various growth opportunities it is possible to begin assembling the results of different combinations of strategies and to compare the likely pattern of profits emerging year by year with the target figures implicit in the company's profitability objective.

The planners will then modify the assumptions made, or develop further strategies, with the object of achieving the desired profit to the greatest extent possible.

The end-product of long-range planning will be an evaluated plan for whatever period of years is appropriate to the type of business concerned. This will normally be presented in the form of a series of outline profit and loss accounts and balance sheets, with suitable supporting calculations.

The extent to which this broad outline would be supported by detailed schedules will depend on the significance of such data and on the degree of certainty with which long-term forecasts can be made. It is important, however, that the early years of the plan shall be calculated in sufficient detail to ensure that they provide a realistic basis from which operational budgets can be developed.

The main importance of long-range planning lies in the analysis which must precede the strategic plan, and which will comprise the study of the existing strengths and weaknesses of the business and of the environmental factors affecting its development; and in the definition of those fundamental objectives which the business exists to achieve.

The various stages of business planning are set out in Figure 1.1 commencing with the establishment of objectives and leading through to the establishment of annual or other short-period budgets.

#### PERFORMANCE EVALUATION TECHNIQUES

In setting shorter-term plans which can be used effectively in the day-to-day control of the business, it is necessary:

- (a) to have an adequate system of accounting for the internal operations of the business, in other words a 'cost accounting' system. A brief summary of the typical features of such a system is given in Chapter 2;
- (b) to identify those performance indicators which are relevant in ensuring that the plan is acceptable; and subsequently in measuring what has been achieved.

These performance indicators, or internal management ratios, must be derived from and linked with the primary ratios already noted. The re-

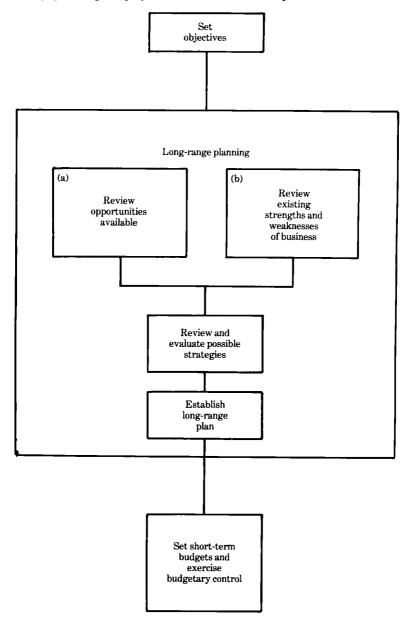


Figure 1.1 Stages in business planning