

Chapter 9

Current assets

REAL WORLD CASE

Balance sheets at 2 January 2005 (Note 1)

Notes	Group		Company		
	2004 £m	2003 (restated) £m	2004 £m	2003 (restated) £m	
	Current assets				
13	Stocks	708	672	–	–
14	Debtors				
	– Due within one year	1,182	1,221	141	161
	– Due after one year	67	81	22	44
19a	Investments	145	242	–	–
19a	Cash at bank and in hand	201	191	–	–



13 Stocks

	Group	
	2004 £m	2003 £m
Raw materials and consumables	227	202
Work in progress	60	45
Finished goods and goods for resale	421	425
	708	672

(I) Stocks

Stocks are valued at the lower of average cost and estimated net realisable value. Cost comprises direct material and labour costs together with the relevant factory overheads (including depreciation) on the basis of normal activity levels. Amounts are removed from stock based on the average value of the items of stock removed.

Raw Materials and Suppliers

The Group uses a wide range of raw materials in the production of its confectionery and beverage products. The main raw materials are: cocoa beans, sugar and other sweeteners (including polyols and artificial sweeteners such as aspartame), dairy products including milk, fruit and nuts. Cadbury Schweppes buys its raw materials from about 40,000 suppliers around the world. No single supplier accounts for more than 10% of the Group's raw material purchases. The Group developed a Human Rights and Ethical Trading (HRET) policy in 2000.

The Group seeks to minimise the impact of price fluctuations and ensure security of supply by entering into forward agreements and long-term contracts where such agreements and contracts are available.

Cocoa beans are imported from West Africa and the Far East. West Africa accounts for over 60% of world production. The Group buys cocoa beans and cocoa butter from a range of suppliers. The Group attempts to minimise the effect of cocoa price movements and secure its future cocoa requirements by entering into forward and future contracts for cocoa beans and cocoa butter.

The Group purchases most of its sugar at prices essentially set by the European Union or maintained by various national governments through quotas and duties. Only a relatively small proportion of the Group's sugar requirements are purchased at fluctuating world prices. The Group has not experienced and does not anticipate difficulty in obtaining adequate supplies of sugar for its operations, with sources available from numerous supplies.

Risk factors

Raw Materials

The Group's profitability depends to some extent upon the cost of raw materials from around the world, which exposes the Group to price and supply fluctuation. Key items such as cocoa, milk, sugar and packaging materials are subject to potentially significant fluctuations in price and availability. While the Group takes measures to protect itself against the short-term impact of these fluctuations, there is no assurance that in the long-term any increase in costs can be recovered from customers. A failure to recover these costs from customers could decrease the Group's profitability.

Source: Cadbury Schweppes plc, Report and Accounts and Form 20-F 2004, pp. 12, 17, 93, 101, 116.

Discussion points

- 1 What are the proportions of raw materials, work-in-progress and finished goods inventories?
- 2 How does the company deal with the volatile prices of cocoa and sugar?

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Learning outcomes

After studying this chapter you should be able to:

- Define a current asset and apply the definition.
- Explain the operation of the working capital cycle.
- Explain the factors affecting recognition of inventories (stocks), receivables (debtors) and investments.
- Explain how the information presented in a company's balance sheet and notes, in relation to current assets, meets the needs of users.
- Explain the different approaches to measurement of inventories (stocks) and cost of goods sold.
- Analyse provisions for doubtful debts using a spreadsheet.
- Analyse prepayments using a spreadsheet.
- Explain the term 'revenue' and the application of principles of revenue recognition.

Additionally, for those who choose to study the Supplement:

- Record receivables (debtors) and prepayments in ledger accounts.

9.1 Introduction

This chapter will continue the progress through the balance sheet which we began in Chapter 8. As in that chapter, the approach will be:

- What are the principles for defining and recognising these items?
- What are the information needs of users in respect of the particular items?
- What information is currently provided by companies to meet these needs?
- Does the information show the desirable qualitative characteristics of financial statements?
- What are the principles for measuring, and processes for recording, these items?

9.2 Definitions

Definitions were provided in Chapter 2. They are repeated here for convenience.

Definition

An **asset** is a resource controlled by the entity as a result of past events and from which future economic benefits are expected to flow.¹

A **current asset** is an asset that satisfies any of the following criteria:

- (a) it is expected to be realised in, or is intended for sale or consumption in, the entity's normal operating cycle;
- (b) it is held primarily for the purpose of being traded;
- (c) it is expected to be realised within twelve months after the balance sheet date;
- (d) it is cash or a cash equivalent.²

The following list is a sample of the current assets found in most company balance sheets:

- raw materials
- work-in-progress
- finished goods
- trade receivables (debtors)
- amounts owed by other companies in a group
- prepayments and accrued income
- investments held as current assets
- short-term bank deposits
- bank current account (also called 'cash at bank')
- cash in hand.

Activity 9.1

Using the definition provided, explain why each item in the foregoing list may be classed as a current asset. Could a plot of land ever be treated as a current asset?

The definition of a current asset refers to 'the entity's normal operating cycle'. The operating cycle experienced by many businesses lasts for 12 months, covering all the seasons of one year. One year is the reporting period most commonly used by most enterprises for reporting to external users of financial statements.

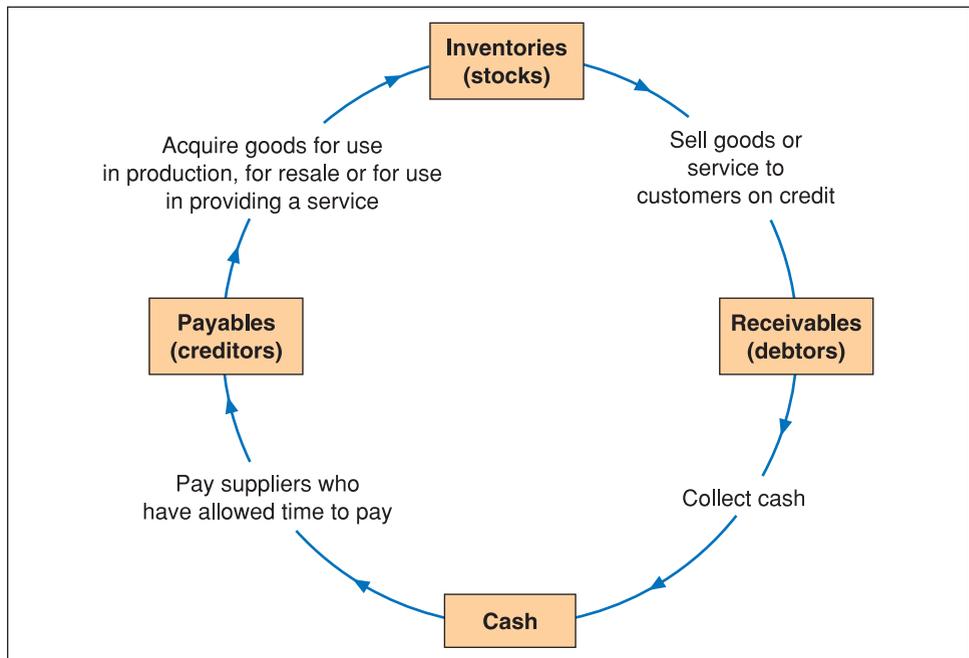
9.3 The working capital cycle

Working capital is the amount of long-term finance the business has to provide in order to keep **current assets** working for the business. Some short-term finance for current assets is provided by the suppliers who give credit by allowing time to pay, but that is not usually sufficient. Some short-term finance for current assets is provided by short-term bank loans but, in most cases, there still remains an excess of **current assets** over **current liabilities**.

The working capital cycle of a business is the sequence of transactions and events, involving current assets and current liabilities, through which the business makes a profit.

Exhibit 9.1 shows how the working capital cycle begins when suppliers allow the business to obtain goods on credit terms, but do not insist on immediate payment. While they are waiting for payment they are called **trade creditors**. The amounts owing to suppliers as creditors are called **trade payables** in the balance sheet. The goods obtained by the business are used in production, held for resale or used in providing a service. While the goods acquired are held by the business they are called the **inventories (stocks)** of the business. Any products manufactured from these goods and held for resale are also part of the inventories (stocks) of the business. The resulting product or service is sold to customers who may pay immediately in cash, or may be allowed time to pay. If they are allowed time to pay they become **debtors** of the business. Debtors eventually pay and the business obtains cash. In the balance sheet the amount due from **trade debtors** is described as **trade receivables**. **Cash** is a general term used to cover money held in the bank, and money held in notes and coins on the business premises. Cash held in the bank will be in an account such as a current account which allows immediate access. Finally the cash may be used to pay the suppliers who, as creditors, have been waiting patiently for payment.

Inventories (stocks), receivables (debtors) and cash are all current assets of the business and will be dealt with in this chapter. Creditors who have supplied goods to the business are current liabilities and will be dealt with in the next chapter.

Exhibit 9.1**The working capital cycle for a manufacturing or service business**

Working capital is calculated as **current assets** minus **current liabilities**. If the working capital is low, then the business has a close match between current assets and current liabilities but may risk not being able to pay its liabilities as they fall due. Not all the current assets are instantly available in cash. There may be some delay in selling the inventories (stocks) of unsold goods. An impatient supplier or bank manager may cause difficulties if cash is not available when payment of a liability is due. On the other hand, if current assets are very much greater than current liabilities, then the business has a large amount of finance tied up in the current assets when perhaps that finance would be better employed in the acquisition of more fixed assets to expand the profit-making capacity of the operations.

Definition

Working capital is the amount which a business must provide to finance the current assets of a business, to the extent that these are not covered by current liabilities. It is calculated by deducting current liabilities from current assets.

9.4 Recognition

The general conditions for recognition were set out in Chapter 2. An item that meets the definition of an asset should be recognised if there is sufficient evidence that the new asset has been created and the item can be measured at a monetary amount with sufficient reliability. There is no doubt that inventories (stocks), receivables (debtors), investments and cash are commonly recognised in a balance sheet but it is useful to be aware of the element of doubt which may be attached to the expectation of economic benefit which creates the asset and to the reliability of measurement. That awareness is essential to understanding the level of uncertainty which surrounds reported financial statements.

9.4.1 Inventories (stocks)

'Inventories' means lists of items. You might come across an inventory if you rent a flat and the owner has a list of the contents that is checked at the start and end of your tenancy. The pronunciation is *IN-ven-t'rees*, with stress on the first syllable 'IN' and not *INVENTOR-ees*, which sounds like a collection of inventors.

Definition

Inventories are assets:

- (a) held for sale in the ordinary course of business;
- (b) in the process of production for sale; or
- (c) in the form of materials or supplies to be consumed in the production process or in the rendering of services.³

If a company is presenting its financial statements using the IASB's accounting system you will probably see the description 'inventories'. If the company is following UK company law and UK ASB standards then you will probably see the description 'stocks'. The remainder of this chapter explains the IASB's system for reporting inventories. The rules of UK law and standards are very similar. In business entities there are three main categories of inventories: raw materials, work-in-progress and finished goods. Consider these in reverse order.

Finished goods

The future economic benefit expected from finished goods is that they will be sold to customers for a price which exceeds the cost of purchase or manufacture. That makes a profit which increases the ownership interest. However, until the sale is agreed with the customer, this expected benefit is uncertain and the qualitative characteristic of **prudence** (explained in Chapter 4) dictates that it is safer not to anticipate that the profit will arise. The value of the inventories of finished goods is therefore measured at the **cost** of purchase or manufacture. In most cases that is a reliable measure because it is based on recorded costs and is not anticipating an uncertain selling price. Sometimes there may be a disappointment where goods are manufactured and then it is found there is a lack of demand. Where there is strong doubt about the expected selling price, such that it might be less than the cost of purchase or manufacture, the inventories (stock) of finished goods are valued at the net realisable value. This is defined as the estimated proceeds from sale of the items in question, less all costs to be incurred in marketing, selling and distributing these items.

The accounting policy note of most companies confirms this prudent approach. You will see in a later section of this chapter that Safe and Sure plc recognises inventories in its balance sheet at the lower of cost and net realisable value.

Work-in-progress

During the course of production the asset of finished goods is gradually being created. The expected future benefit of that activity is gradually building up as the work moves towards completion. A business could wait until the asset is totally finished, before recognising the asset in the balance sheet. That would satisfy the qualitative characteristic of **prudence**, supported by the characteristic of **reliability**, but would run into problems with the characteristic of **relevance**. Where work-in-progress is a substantial aspect of the operations of the business, users need to know how much work-in-progress there is, whether it is increasing or decreasing, and what risks are attached. The risks attached to work-in-progress are often greater than those attached to finished goods because there is the risk of non-completion to add to all the risks faced when the goods are completed and awaiting sale. There is a reliable measurement, in the cost of

work completed at the date of the balance sheet, but careful checking is required by the managers of the business to ensure that this is a reliable measure.

A particularly important type of **work-in-progress** is the construction contract (long-term contract) such as may be found in the engineering and building industries. A company building a bridge over three years will want to tell the shareholders about the progress being made in creating profit. Each year a portion of the total contract price will be reported as turnover and costs of the period will be matched against that turnover to calculate profit. The value of the work completed will be recognised as an asset in the balance sheet, sometimes called work-in-progress. The reporting of profit on construction contracts (long-term contracts) is reviewed later in this chapter, in section 9.11.

Raw materials

The approach to recognition is the same as that for finished goods. Raw materials are expected to create a benefit by being used in the manufacture of goods for sale. On grounds of prudence the profit is not anticipated and the raw materials are measured at the lower of cost and net realisable value.

9.4.2 Receivables (debtors) and prepayments

Debtors are those persons who owe money to a business. Usually the largest amount shown under this heading relates to customers buying goods on credit. These are the **trade receivables (trade debtors)**. Additionally, the business may have lent money to another enterprise to help that enterprise in its activities. There may be loans to employees to cover removal and relocation expenses or advances on salaries. The business may be due to receive a refund of overpaid tax.

Trade receivables (debtors) meet the recognition conditions because there is an expectation of benefit when the customer pays. The profit on the sale of the goods is known because the customer has taken the goods or service and agreed the price. Trade receivables (debtors) are therefore measured at the selling price of the goods and the profit is recognised in the income statement (profit and loss account). There is a risk that the customer will not pay, but the view taken is that the risk of non-payment should be seen quite separately from the risk of not making a profit on a sale. The risk of non-payment is dealt with by reducing the reported value of the asset using an estimate for doubtful debts. That process is explained later in the chapter.

Prepayments are amounts of expenses paid in advance. Insurance premiums, rent of buildings, lease charges on a vehicle, road fund licences for the delivery vans and lorries, are all examples of items which have to be paid for in advance. At the balance sheet date some part of the future benefit may remain. This is recognised as the prepayment. Take the example of an insurance premium of £240 paid on 1 October to cover a 12-month period. At the company's year-end of 31 December, three months' benefit has expired but nine months' benefit remains. The balance sheet therefore reports a prepayment of £180.

Definition

Prepayment An amount paid for in advance for an benefit to the business, such as insurance premiums or rent in advance. Initially recognised as an asset, then transferred to expense in the period when the benefit is enjoyed.

9.4.3 Investments

Investments held as current assets are usually highly marketable and readily convertible into cash. The expectation of future economic benefit is therefore usually sufficient to meet the conditions of recognition. Measurement is more of a problem.

There are two possible measures. One is the cost of the investment and the other is the market value. Recognising the investment at cost is prudent and reliable, but not as relevant as the current market value which is the amount of cash that could be released by sale of the investment. There is no agreed answer to this problem at the present time, although the issue has been debated in the standard-setting context. Most businesses report current asset investments at cost but a smaller number use the market value. Using the market value is called **marking to market**. It is a departure from the normal practice of recording assets at original cost but is justified in terms of the requirement of company law that financial statements should show a **true and fair view** (see Chapter 4). It is seen in companies whose business involves dealing in investments.

9.4.4 Cash

Recognising cash is no problem either in the expectation of benefit or in the measurement of the asset. The amount is known either by counting cash in hand or by looking at a statement from the bank which is holding the business bank account. The expectation of benefit lies in making use of the cash in future to buy fixed assets or to contribute to the working capital cycle so that the business earns a profit. In the meantime, cash which is surplus to immediate requirements should be deposited in such a way that it is earning interest. Where a company has substantial cash balances there should be indications in the income statement (profit and loss account) that investment income has been earned, to provide a benefit to the business.

Activity 9.2

This section has covered in some detail the characteristics of various groups of current assets. Before reading the next section, write down what information you would expect to see, in respect of these groups of assets, in the balance sheet and notes to the accounts. Then read the section and consider similarities to, or differences from, the views given there.

9.5 Users' needs for information

Investors have an interest in knowing that current assets are not overstated. If the assets are overstated the profit of the business will be overstated (see the explanation in Chapter 4, using the accounting equation). They will want to know particularly whether there has been allowance for inventories of goods which may not lead to sales and whether there has been allowance for customers who may not be able to pay the debts shown as due to the business. They may also want the reassurance that the auditors have established the existence of all the current assets, particularly ensuring that a very portable asset such as cash is where it ought to be in the ownership of the company.

The needs of users do not stop with the investors. The trade creditors who supply goods and services to the business are strongly reliant on the working capital cycle for their eventual payment. Employees look for their salaries and wages from the cash generated during the working capital cycle. They want to know that the cash will be there on the day it is required, rather than being tied up in inventories or receivables (debtors) awaiting release as cash. Tax collecting authorities, such as the Inland Revenue and the Customs and Revenue, have definite dates on which payments are required. All these persons have an interest in the working capital of the business and how it is managed. The concern of creditors and employees is primarily with the flow of cash and its availability on the day required. That information will not appear in the balance sheet but there will be some indications of flow in the cash flow statement (outlined in Chapter 3).

9.6 Information provided in the financial statements

In Chapter 7 the balance sheet of Safe and Sure plc contained three lines relating to current assets:

	Notes	Year 2 £m	Year 1 £m
Current assets			
Inventories (stocks)	5	26.6	24.3
Amounts receivable (debtors)	6	146.9	134.7
Six-month deposits		2.0	–
Cash and cash equivalents		<u>105.3</u>	<u>90.5</u>
		<u>280.8</u>	<u>249.5</u>

There is more information provided in the notes to the balance sheet.

9.6.1 Details in notes

There are two relevant notes, of which note 5 deals with inventories and note 6 with receivables (debtors):

Note 5	Year 2 £m	Year 1 £m
Inventories (stocks)		
Raw materials	6.2	5.4
Work-in-progress	1.9	1.0
Finished products	<u>18.5</u>	<u>17.9</u>
	<u>26.6</u>	<u>24.3</u>

This company is a service company so it is not surprising that stocks do not figure prominently in the overall collection of current assets. It is perhaps more surprising that there are inventories of finished products, but reading the description of the business shows that there is a Products Division which manufactures special cleaning chemicals under the company name.

The note on receivables (debtors) shows that the main category is trade receivables (debtors):

Note 6	Year 2 £m	Year 1 £m
Amounts receivable (debtors)		
Trade receivables (trade debtors)	128.1	117.0
Other receivables (debtors)	10.9	9.8
Prepayments and accrued income	<u>7.9</u>	<u>7.9</u>
	<u>146.9</u>	<u>134.7</u>

There is no indication of the nature of 'other receivables (debtors)'. It could indicate employees who have received loans or advances of salaries. It could indicate a loan to a company which has trading links with the group but is not a full subsidiary. Prepayments are expenses paid in advance of gaining the benefit, as explained in the previous section of this chapter.

9.6.2 Accounting policy

It will be shown later in this chapter that the valuation of inventories is a matter of potential variation from one person to the next, so it is important to know that the

company has followed an acceptable policy in its valuation of inventories. The accounting policy note of Safe and Sure provides that confirmation (see Exhibit 9.2). For the moment you will have to accept that this form of wording represents standard practice, but each phrase will be explained later in the chapter.

Exhibit 9.2

Accounting policy note

SAFE and SURE plc Accounting policy

Inventories (stocks and work-in-progress) are stated at the lower of cost and net realisable value, using the first-in-first-out principle. Cost includes all direct expenditure and related overheads incurred in bringing the inventories to their present condition and location.

9.6.3

Operating and financial review

The finance director of Safe and Sure commented as follows in his review:

The group's businesses are structured to utilise as little fixed and working capital as is consistent with the profit and earnings growth objective in order to produce a high cash flow.

The focus on **working capital** is perhaps an indication of the importance seen in explaining how the company manages its current assets and current liabilities. It also shows that for this business the high cash flow is planned and is not an accident of events.

9.6.4

Analyst's view



DAVID WILSON comments: *This is a service business and so holds inventories of goods to be used in the service process. The note to the balance sheet does not actually say what the inventories are, so I asked when I made my visit. They tell me the raw materials are inventories of cleaning materials and chemicals for processes such as disinfecting. My main concern is to be assured that there is nothing in the inventories which could carry a risk of losing value through obsolescence or deterioration. There is not much problem of that with cleaning materials. The finished goods took me by surprise until I found out that there is a Products Division. It was actually the cleaning products that I knew best from years ago but I thought they had moved entirely into service contracts.*

In any event, inventories are not all that important for this company. The receivables (debtors) amount is much larger. I know they have a relatively low risk of bad debts because most customers pay in advance for their contracts.

When I started as an analyst I worked alongside someone who had twenty years' experience. He told me that he had always used what he called 'the 10% test' when looking at inventories (stocks) and receivables (debtors) in a balance sheet. He worked out what effect a 10% error in the inventories or receivables would have on the profit before tax. In this case a 10% error in inventories would be £2.7m. The profit from operations is £195.2m. A difference of £2.7m on £195.2m is 1.4%. An error of 1.4% in profit would not have a significant impact on the view of most investors. So in this company inventories is not a matter which needs time taken for questions. On the other hand, a 10% error in receivables (debtors) would be £14.7m. That is 7.5% of profit from operations. So receivables (debtors) are worth more attention. If this were a company I didn't know, I would ask about the quality of the asset and the type of customer who is given credit. In fact I do know the answer here. The finance director told me that when I met him. The receivables (debtors) are largely public sector bodies such as local authorities and hospitals who insist on paying after the work has been done to their satisfaction. There could be a risk of non-payment because of shoddy work but there is little risk of non-payment through default.

The final point to note in relation to current assets is that this company is a cash-generating business. I looked at the cash flow statement for the past five years which shows that the group builds up cash balances, buys another company, and then generates even more cash. I suppose that can't go on for ever but there are no signs of problems at present.

LEONA: I told you I would be looking for admissions of how much you rely on the auditor without knowing it. Your '10% test' is a very rough-and-ready example of the ratio analysis we carry out on a systematic basis as part of our analytical review of the financial statements. Maybe one day I'll tell you more about that. We have quite a long list of ratios which we calculate. We also look at interrelationships between ratios and relative changes in one compared with another.

It is also an application of what we call 'materiality'. When we see an asset – in this case it is receivables (debtors) – where an error in estimation of the asset value could cause a serious impact on profit, we identify that as a matter for special attention. We would probably spend more time on receivables (debtors) than on inventories in our audit of this company but we would target the risk-related aspects of what is reported about each asset. For receivables (debtors) it is the risk of non-payment through either disputed debts or lack of funds. For inventories it is the risk of obsolescence or similar loss which is not covered by insurance.

Have you decided on how the company's information on current assets meets the list of desirable qualitative characteristics?

DAVID: You're trying to get me to admit that I need the auditors. Reliability is in the auditors' hands as far as the numbers go, but I place a lot of reliance on my assessment of the qualities of senior management when I meet them. You can't audit that kind of feeling. It's all a matter of chemistry. Also, the main current asset is receivables (debtors) and I know they are reliable because the finance director told me what class of customer was involved. I didn't need the auditors for that. Relevance probably scores about eight out of ten because there aren't any complications here with unusual types of inventories. Faithful representation and neutrality are something I leave to the auditors for now but I'll be asking questions next year if the information in the financial statements turns out not to be neutral. Prudence, I know, is built into all aspects of accounting which uses historical cost measures. That sometimes works against relevance. Completeness is not a problem for current assets. The company is unlikely to leave anything out. They are more likely to include too much. I do expect the auditor to check that the assets are there. Comparability is a matter of presentation. This company has a five-year summary elsewhere in the annual report and gives the previous year's amounts in the financial statements. As for understandability, I like to think that I can see my way around figures for inventories, receivables (debtors) and cash. I usually get the answers I want when I phone the financial controller.

LEONA: But don't you see that by admitting that you have to ask more questions to help you understand the amounts, there must be some further explanations which the company could give in the annual report so that your understanding may be shared by others?

DAVID: My fund manager colleagues would say that only the professional investors have the expertise. Even if more information were reported by companies, only the professionals would know how to use it.

9.7 Measurement and recording

The basic measurement rule applying to all current assets is that they should be measured at the *lower* of **cost** and **net realisable value**.⁴ The exception is receivables (debtors) which are measured at selling price because the related profit is earned when the sale is made and not when the credit customer chooses to pay.

The next three sections look at issues of measurement and recording, in relation to inventories, receivables (debtors) and current asset investments, which are essential to an understanding of how much variability and uncertainty lies behind the apparent confidence of the numbers reported in financial statements.

9.8 Inventories (stocks) of raw materials and finished goods

The analysis of transactions involving inventories of raw materials, work-in-progress and finished goods has been explained in detail in Chapter 6 and will not be repeated here. This section examines the problems created by the general rule that inventories must be valued at the lower of cost and net realisable value. This rule is a consequence of the **prudence** concept, based on not anticipating a sale until the goods are delivered to the customer.

Net realisable value means the estimated selling price in the ordinary course of business less the estimated costs of completion and the estimated costs necessary to make the sale. For example, damaged inventories are sold at auction for £10,000. The auctioneer charges selling commission of 20% which is £2,000. The amount received by the seller is £8,000, called the net realisable value.

Definition

Net realisable value is the estimated selling price in the ordinary course of business less the estimated costs of completion and the estimated costs necessary to make the sale.⁵

This section covers first of all the accounting equation in relation to the rule. It then looks at the meaning of cost and the allocation of overhead costs. Various specific models to deal with changing input prices are then discussed and the section concludes with the rules to be applied in financial reporting.

9.8.1 Lower of cost and net realisable value

Consider the example of a container of coffee beans purchased by a coffee manufacturer at a cost of £1,000. The beans are held for three months up to the balance sheet date. During that time there is a fall in the world price of coffee beans and the container of coffee beans would sell for only £800 in the market.

When the asset is acquired, the impact on the accounting equation is an increase of £1,000 in the asset of inventories and a decrease of £1,000 in the asset of cash.

Assets ↑↓ + £1,000 inventories – £1,000 cash	–	Liabilities	=	Ownership interest
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At the end of the year the asset is found to be worth £800 and the ownership interest is reduced because the asset has fallen in value. The asset is reduced by £200 and an expense of loss of value in inventories value is reported in the income statement (profit and loss account).

Assets ↓ – £200 inventories	–	Liabilities	=	Ownership interest ↓ – £200 expense
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If a business fails to report a fall in the value of the asset of inventories, the profit of the period will be overstated.

Where there are separate categories of inventories the rule of 'lower of cost and net realisable value' must be applied to each category separately. Suppose, for example, there is an inventory (stock) of paper at a cost of £2,000 with a net realisable value of £2,300 and an inventory (stock) of pens with a cost of £1,800 and a net realisable value of £1,400. The lower amount must be taken in each case, giving a value of £3,400 for inventories (calculated as £2,000 plus £1,400).

9.8.2 Meaning of cost

The **cost** of inventories comprises all costs of purchase, costs of conversion and other costs incurred in bringing the inventories to their present location and condition.⁶ This expenditure will include not only the cost of purchase but also costs of converting raw materials into finished goods or services.

Costs of purchase include the price charged by the supplier, plus transport and handling costs, plus import duties, and less discounts and subsidies.⁷ Costs of conversion include items readily identifiable with the product, such as labour, expenses and subcontractors' costs directly related to the product. They also include production overheads and any other overheads directly related to bringing the product or service to its present condition and location. **Production overheads** are items such as depreciation of machines, service costs, rental paid for a factory, wages paid to supervisory and support staff, costs of stores control and insurance of production facilities.

Example

Take the example of a business which purchases 10 wooden furniture units for conversion to a customer's specification for installation in a hotel. The units cost £200 each and the labour cost of converting them is £100 each. Production overheads for the period are fixed at £3,500. Two units remain unsold at the end of the period. These two units will be recorded in the balance sheet at £1,300, calculated as £650 each (materials cost of £200 plus labour cost of £100 plus a share of the production overheads at £350 per item).

That was easy because there were 10 identical units to take equal shares of the production overheads. But suppose they had all been different and required different amounts of labour? Would it have been fair to share the overheads equally? Probably not. The problems of sharing out production overhead costs create a chapter in themselves and are studied further as part of management accounting. You need to be aware, in reading published accounting information, that there is considerable scope for discretion to be exercised by management in the allocation of overheads between completed goods and goods held in inventories. The general risk of overstatement of assets applies here. If the asset is overstated by having too much production overhead allocated, the profit of the period is also overstated because it is not bearing the share of production overheads which it should.

9.8.3 Costs when input prices are changing

One very tiresome problem faced by the accounts department in its record keeping is that suppliers change their prices from time to time. Goods held in store may have arrived at different times and at different unit prices. How does the accounts department decide on the unit price to be charged to each job when all the materials look the same once they are taken into store?

In some cases it may be possible to label the materials as they arrive so that they can be identified with the appropriate unit price. That is a very time-consuming process and would only be used for high-value low-volume items of materials. In other cases a convenient method is needed which gives an answer that is useful and approximately close to the true price of the units used. Some possibilities are shown in Exhibit 9.3 using three options – first-in-first-out (FIFO), last-in-first-out (LIFO) and average cost. In each case, Exhibit 9.3 takes a very simple approach, not complicated by having inventory at the start of the period. In real life the calculations can be even more tricky.

Exhibit 9.3
Pricing the issue of goods to production

There are three parts to this illustration. Part (a) contains a table setting out the data to be used in the calculation. Part (b) defines the three bases of calculation. Part (c) uses the data from part (a) to illustrate each of the three bases.

(a) Data

<i>Date</i>	<i>Received</i>	<i>Unit price</i>	<i>Price paid</i>	<i>Issued to production</i>
	<i>Units</i>	£	£	<i>Units</i>
1 June	100	20	2,000	–
20 June	50	22	1,100	–
24 June	–	–	–	60
28 June	–	–	–	70
<i>Total</i>	<i>150</i>		<i>3,100</i>	<i>130</i>

(b) Bases of calculation

First-in-first-out (FIFO)

Assume that the goods which arrived first are issued first.

Last-in-first-out (LIFO)

Assume that the goods which arrived last are issued first.

Average cost

Assume that all goods are issued at the average price of the inventories held.

(c) Calculations

<i>Basis</i>	<i>Date</i>	<i>Quantity and unit price</i>	<i>Issued to production</i>	<i>Held in inventories</i>	<i>Total</i>
			£	£	£

FIFO	<i>Date</i>	<i>Quantity and unit price</i>	<i>Issued to production</i>	<i>Held in inventories</i>	<i>Total</i>
	24 June	60 units at £20	1,200		
	28 June	40 units at £20	1,460		
		30 units at £22			
	30 June	20 units at £22		440	
<i>Total</i>			<i>2,660</i>	<i>440</i>	<u><i>3,100</i></u>

Exhibit 9.3 continued

LIFO					
	24 June	50 units at £22			
		10 units at £20	1,300		
	28 June	70 units at £20	1,400		
	30 June	20 units at £20		400	
<i>Total</i>			2,700	400	<u>3,100</u>

Average					
	24 June	60 units at *£20.67	1,240		
	28 June	70 units at *£20.67	1,447		
	30 June	20 units at *£20.67		413	
<i>Total</i>			2,687	413	<u>3,100</u>

Note: *Weighted average $[(100 \times 20) + (50 \times 22)]/150 = £20.67$.

9.8.4 Approximation when dates are not recorded

In business there may not be time to keep the detailed records shown in the calculations in Exhibit 9.3. In such cases the sales volume is known in total but the dates of sales are not recorded. The calculation then uses the best approximation available, which usually means working through the costs from the oldest date, for FIFO, or the most recent date, for LIFO, without attempting to match the various batches bought and sold during the year.

9.8.5 Choice of FIFO, LIFO or average cost

Look at table (c) of Exhibit 9.3 and compare it with table (a) of that exhibit. You will see from table (a) that the total amount spent on materials during the month was £3,100. You will see from table (c) that the total of the cost of goods issued to production, plus the cost of unsold goods, is always £3,100 irrespective of which approach is taken. All that differs is the allocation between goods used in production and goods remaining unsold. Cost can never be gained or lost in total because of a particular allocation process, provided the process is used consistently over time. The FIFO approach suffers the disadvantage of matching outdated costs against current revenue. The LIFO approach improves on FIFO by matching the most recent costs against revenue, but at the expense of an inventory value which becomes increasingly out of date. The average cost lies between the two and becomes more intricate to recalculate as more items come into inventory. In practice, the choice for internal reporting in management accounting is a matter of finding the best method for the purpose.

There is an effect on profit of the year which may influence management choice. When prices are rising and inventories volumes are steady or increasing, FIFO gives a lower cost of sales and so a higher profit than LIFO. If there were no regulations, companies that wished to show high profits (perhaps to impress investors buying shares in the company) might prefer FIFO. Companies that wished to show lower profits (perhaps to reduce tax bills) might prefer LIFO.

The IASB standard IAS 2 prohibits the use of LIFO. In the UK the tax authorities will not accept LIFO valuation. In the USA the LIFO method of valuation is permitted. Investors need to read the accounting policy note in the financial statements to find which approach a company has used.

Activity 9.3

Look back to Exhibit 9.3 and write your own table of data for goods received, unit price, price paid and goods issued to production. Create calculations of cost of goods sold, using the various models in Exhibit 9.3 (FIFO, LIFO and average price). Check that the value of goods issued to production, plus the value of goods held in stock, will always add up to the same answer in total.

9.9 Receivables (debtors)

The measurement of receivables (debtors) requires attention to bad and doubtful debts. A debt is described as a **bad debt** when there is no further hope of the customer paying the amount owed. This might be due to the customer being declared bankrupt or else disappearing without trace. If the customer is known to be in difficulties or there is some dispute over the amount owed, the debt is described as a **doubtful debt**. The company still hopes to recover the cash owed but realistically has some doubt. Evidence of doubtful debts may be seen in slow payment, partial payments, the need for several reminders or even rumours in the business community. A company will usually analyse the age of its debts to help identify those which may be doubtful.

Example

At the end of Year 1 the Garden Pond Company has a balance sheet comprising £2,000 receivables (debtors), £7,000 other assets and £9,000 ownership interest that consists of £1,800 ownership interest at the start of the period and £7,200 profit of the period. On the balance sheet date the manager of the company reviews the receivables (debtors) list and decides that debts amounting to £200 are doubtful because there are rumours of a customer not paying other suppliers in the trade. The balance sheet at the end of Year 1 is amended to show that the asset is of lower value than was thought and the ownership interest has consequently diminished.

Exhibit 9.4 shows the spreadsheet for analysis set out to reflect the accounting equation. The new column is the one headed **provision for doubtful debts**. This is included in the assets section because it tells the user more about the asset of receivables (debtors), although it is the negative part of the asset. It causes some confusion to those who meet it for the first time because anything called a provision is usually reported under the heading of liabilities. However, on grounds of usefulness to readers and relevance to the provision of information about the asset, the provision for doubtful debts has special treatment in being included as a negative aspect within the asset section of the balance sheet.

It is quite a difficult matter for a company to be prudent in expressing doubt about a debtor while still pursuing the non-payer with a view to collection of the debt. To remove the debt from the record would be to admit defeat. Even to show a separate provision among the liability headings might lead other customers to think, 'Why not me also?' Some companies therefore do not disclose a separate provision for doubtful debts in a company's balance sheet. They deduct the provision from the full receivables (debtors) list and report only the resulting net amount.

Exhibit 9.4

Spreadsheet to analyse the effect of provision for doubtful debts at the end of Year 1, using the accounting equation

Date	Transaction or event	Assets			Ownership interest	
		Receivables (debtors)	Provision for doubtful debts	Other assets	Ownership interest at start	Profit of the period
Year 1		£	£	£	£	£
Dec. 31	Balance sheet first draft	2,000		7,000	1,800	7,200
Dec. 31	Recognition of doubtful debts		(200)			(200)
Dec. 31	Revised balance sheet	2,000	(200)	7,000	1,800	7,000

The balance sheet after incorporating a provision for the doubtful debt would appear as in Exhibit 9.5.

There is no single method of calculating the provision for doubtful debts. Some companies consider separately the amount owed by each customer. To economise on time, most companies use previous experience to estimate a percentage of total receivables (debtors). A mixture of approaches could be used, with known problems being identified separately and a general percentage being applied to the rest.

Exhibit 9.5

Balance sheet of Garden Pond Company showing the presentation of information on doubtful debts

Garden Pond Company		
Balance sheet at 31 December Year 1		
	£	£
Other assets		7,000
Receivables (debtors)	2,000	
Less: provision for doubtful debts	<u>(200)</u>	
		<u>1,800</u>
		<u>8,800</u>
Ownership interest at the start of the year		<u>1,800</u>
Profit of the year		<u>7,000</u>
		<u>8,800</u>

9.9.1 Change in a provision

During Year 2 matters take an upward turn and in July the customer who was showing signs of financial distress manages to pay the amount of £200 owed. The effect on the accounting equation is that the asset of cash is increased and the asset of debtor is reduced by £200. The provision for doubtful debts is now no longer required and could be transferred back to the income statement (profit and loss account), but in practice it tends to be left for tidying up at the end of the year.

The business continues and at the end of Year 2 the receivables (debtors) amount to £2,500. A review of the list of receivables (debtors) causes considerable doubt regarding an amount of £350. It is decided to create a new provision of £350. The old provision of £200 related to last year's receivables (debtors) and is no longer required.

Exhibit 9.6 shows the spreadsheet at the end of Year 2, before and after recording the new provision for doubtful debts. It is assumed that the other assets have grown to £10,000 and there is a profit of £3,500 before amending the provision for doubtful debts.

The income statement (profit and loss account) could show two separate entries, one being £200 increase in ownership interest and the other being £350 decrease in ownership interest. It is rather cumbersome in that form and most enterprises would report as an expense, in the income statement (profit and loss account), the single line:

Increase in provision for doubtful debts £150

Exhibit 9.6

Spreadsheet to analyse the effect of provision for doubtful debts at the end of Year 2, using the accounting equation

Date	Transaction or event	Assets			Ownership interest	
		Receivables (debtors)	Provision for doubtful debts	Other assets	Ownership interest at start	Profit of the period
		£	£	£	£	£
Year 2						
Dec. 31	Balance sheet first draft	2,500	(200)	10,000	8,800	3,500
Dec. 31	Elimination of provision no longer required		200			200
Dec. 31	Creation of new provision		(350)			(350)
Dec. 31	Revised balance sheet	2,500	(350)	10,000	8,800	3,350

9.10 Prepayments

Prepayments arise when an item of expense is paid in advance of the benefit being received. A common example is the payment of an insurance premium. The payment is made in advance for the year ahead and the benefit is gradually used up as the year goes along. The balance sheet recognises the unexpired portion of the insurance premium as an asset, while the income statement (profit and loss account) reports the amount consumed during the period.

Example

On 1 October Year 1 a company paid £1,200 for one year's vehicle insurance. At the balance sheet date of 31 December there have been three months' benefit used up and there is a nine-month benefit yet to come. The transactions relating to insurance would be reported as in Exhibit 9.7.

The effect of identifying the asset is to reduce the expense of the period from £1,200 to £300 and to hold the remaining £900 as a benefit for the next accounting period. In Year 2 the amount of £900 will be transferred from the prepayment column to the expense column, so that the decrease in the ownership interest is reported in the period in which it occurs.

Exhibit 9.7**Spreadsheet recording prepayment of insurance at the balance sheet date**

Date	Transaction or event	Assets		Ownership interest
		Cash £	Prepayment £	Expense £
Year 2				
Oct. 1	Payment of premium	(1,200)		(1,200)
Dec. 31	Identification of asset remaining as prepayment		900	900
		(1,200)	900	(300)

9.11 Revenue recognition

The sale of goods and services creates **revenue** for the business. Sometimes that revenue is referred to as **sales** or **turnover**. The term revenue may also be applied to rents received from letting out property, or interest received on investments made. In the conceptual frameworks of various countries, different views are held of the exact meaning and extent of the word *revenue*. The IASB defines revenue in terms of equity (ownership interest).

Definition

Revenue is defined as the gross inflow of economic benefits during the period arising in the course of the ordinary activities of an enterprise when those inflows result in increases in equity, other than increases relating to contributions from equity participants.⁸

The main problem in recognition of revenue lies in the timing. Assets are recognised at a point in time but revenue is created over a period of time. What are the rules for deciding on the time period for which revenue should be reported? One suggestion has been that the **critical event** is the important factor.⁹ When goods are produced or services are carried out, there is one part of the process which is critical to providing sufficient reassurance that the revenue has been earned by the efforts of the enterprise. For the sale of goods the point of delivery to the customer is the usual critical event which determines the date of revenue recognition. For a contract of service, the critical event is the production of the service.

9.11.1 Contract revenue

Where the service extends over more than one time period, the revenue may be split over the time periods involved. That may happen in a civil engineering or a building contract. In each year of the contract a portion of the revenue will be matched against costs of the period so as to report a portion of profit.

Take the example of a two-year bridge-building contract. The contract price is £60m. Two-thirds of the work has been completed in Year 1 and it is expected that the remainder will be completed in Year 2. The costs incurred in Year 1 are £34m and the costs expected for Year 2 are £17m.

The income statement (profit and loss account) of the business for Year 1 will report, in respect of this contract, turnover of £40m less costs of £34m giving profit of £6m. This gives a fair representation of the profit earned by the activity of the year

(as two-thirds of the total). An independent expert, in this case an engineer, would confirm that the work had been completed satisfactorily to date. The effect on the accounting equation would be:

<b style="background-color: #ADD8E6;">Assets ↑↓ + £40m – £34m	–	<b style="background-color: #FFDAB9;">Liabilities	=	<b style="background-color: #C8E6C9;">Ownership interest ↑ + £6m
---	---	---	---	---

Reporting contract revenue of £40m in Year 1 will increase the ownership interest by £40m. A matching asset will be reported, representing the value of the contract at that stage. The value of £40m shown for the construction contract represents the aggregate amount of costs incurred plus recognised profits to date.

In the income statement (profit and loss account) the expenses of £34m are reported in the usual way and a profit of £6m results. All being well, the income statement (profit and loss account) of Year 2 will report the remaining £20m of revenue minus £17m of expenses, leaving a profit of £3m. Over the two years the total profit of £9m will be reported.

Users of accounting information need to pay particular attention to contract revenue in a business and ask some careful questions. Has prudence been exercised in deciding what portion of revenue to report? Is there a risk that the future costs will escalate and there will be an overall loss? They should look carefully at the provisions section of the balance sheet (see Chapter 11).

Where the customer has paid money in advance as an instalment towards the final contract price, the effect on the accounting equation is to increase the asset of cash and create a liability towards the customer. These amounts received in advance from customers may be described as ‘progress billings’, ‘payments on account’, or ‘payments in advance’. There is a liability because the business has an obligation to repay the customer if the contract is not completed on time or on specification. Although it might be expected that the liability towards the customer would appear in the current liabilities section of the balance sheet, that does not happen. The liability in respect of payments made in advance is deducted from the value of the contract and the resulting net figure is reported as *construction contracts* in the current assets section of the balance sheet. That may mean that, at first glance at the balance sheet, the reader does not realise the true size of the contract being undertaken for the customer. There is no guarantee that any better information will be found anywhere else in the financial statements, because turnover is aggregated for all activities. For the analyst as an expert user, construction contracts (long-term contracts) require a great deal of careful questioning if the underlying details are to be understood.

9.11.2 A continuing debate

There are problems in revenue recognition that continue to be debated. Consider three examples. In the first, a film production company sells a programme to a television company which agrees to pay royalties every time the programme is broadcast. In the second, a farmer sells a cow to a neighbour in return for five sheep. In the third, a mobile phone company charges customers a start-up fee that is 24 times the monthly rental and service charge. There is no specific accounting standard to cover any of these situations. One approach to each is to ask, ‘Has the revenue been earned?’ The companies would all answer, ‘Yes, we have completed our side of the transaction.’ So perhaps revenue should be recognised in all three cases. Another approach is to ask, ‘Are there any risks related to recognising revenue?’ The answer is, ‘Yes – the programme may never be broadcast; we are not sure about the exchange values between cows and sheep; and the telephone company may not be able to provide the service for the long period

implied by the high initial charge.' So perhaps the revenue should not be reported until the risks are diminished. Both views are being applied, with the result that there has been some lack of clarity and comparability as new types of business have emerged. It is necessary to pay careful attention to the accounting policy on revenue recognition.

9.12 Summary

- A **current asset** is an asset that satisfies any of the following criteria:
 - (a) it is expected to be realised in, or is intended for sale or consumption in, the entity's normal operating cycle;
 - (b) it is held primarily for the purpose of being traded;
 - (c) it is expected to be realised within twelve months after the balance sheet date;
 - (d) it is cash or a cash equivalent.
- **Working capital** is the amount which a business must provide to finance the current assets of a business, to the extent that these are not covered by current liabilities. It is calculated by deducting current liabilities from current assets.
- Inventories (stocks), receivables (debtors), investments and cash are commonly **recognised** in a balance sheet. If there is doubt attached to the expectation of economic benefit which creates the asset and to the reliability of measurement, then this is recognised by making a **provision** such as the provision for doubtful debts.
- Users need information about the working capital of the business to judge whether it is suitable to support the activities of the business. Information provided to help users includes: detailed notes of current assets and current liabilities; notes of accounting policy describing the valuation of current assets; and a discussion of working capital management in the operating and financial review.
- **Inventories** (stocks) are measured at the lower of cost and net realisable value.
- **Receivables** (debtors) are measured at the amount receivable on settlement less any provision for doubtful debts.
- **Prepayments** are amounts paid in advance for benefits expected. Prepayments are assets until the benefit is used up. The amount is then transferred from an asset to an expense.
- **Revenue** is defined as the gross inflow of economic benefits during the period arising in the course of the ordinary activities of an enterprise when those inflows result in increases in equity, other than increases relating to contributions from equity participants.
- If revenues are earned over more than one time period (e.g. on long-term contracts) then the revenue is allocated across time periods in proportion to the amount of work completed.

QUESTIONS

The Questions section of each chapter has three types of question. 'Test your understanding' questions to help you review your reading are in the 'A' series of questions. You will find the answers to these by reading and thinking about the material in the book. 'Application' questions to test your ability to apply technical skills are in the 'B' series of questions. Questions requiring you to show skills in problem solving and evaluation are in the 'C' series of questions. A letter **[S]** indicates that there is a solution at the end of the book.

A Test your understanding

- A9.1** What is the definition of a current asset? (Section 9.2)
- A9.2** What is the working capital cycle? (Section 9.3)
- A9.3** What are the features of raw materials, work-in-progress and finished goods which justify their recognition in a balance sheet? (Section 9.4.1)
- A9.4** What information do users need about current assets? (Section 9.5)
- A9.5** What is meant by FIFO, LIFO and the average cost method of pricing issues of goods? (Section 9.8.3)
- A9.6** How is a provision for doubtful debts decided upon? (Section 9.9)
- A9.7** What is a prepayment? (Section 9.10)
- A9.8** What is meant by 'revenue recognition'? (Section 9.11)
- A9.9** Why are there problems with revenue recognition? (Section 9.11.2)
- A9.10** [S] The Sycamore Company has inventories which include the following four items:

Description	Purchase cost £	Selling price £	Cost of selling £
Engine	6,500	8,250	350
Chassis	2,000	1,800	200
Frame	4,800	4,900	300

What amount should be reported as total inventory in respect of these three items?

- A9.11** [S] On reviewing the company's financial statements, the company accountant discovers that items of year-end inventory of goods which cost £18,000 have been omitted from the record. What will be the effect on the income statement (profit and loss account) and the balance sheet when this omission is rectified?
- A9.12** [S] On reviewing the financial statements, the company accountant discovers that an amount of £154,000 owed by a customer will be irrecoverable because the customer has fled the country. What will be the effect on the income statement (profit and loss account) and the balance sheet when this event is recognised?

B Application

B9.1 [S]

During its first month of operations, a business made purchases and sales as shown in the table below:

Date	Number of units purchased	Unit cost	Number of units sold
Jan. 5	100	£1.00	
Jan. 10			50
Jan. 15	200	£1.10	
Jan. 17			150
Jan. 24	300	£1.15	
Jan. 30			200

All sales were made at £2 each.

Required

Calculate the profit for the month and the stock value held at the end of the month using:

- (a) the FIFO approach to the issue of units for sale, where:
- the calculation is carried out at the date of sale; and
 - the calculation is carried out at the end of the month without regard for the date of sale; and

- (b) the LIFO approach to the issue of units for sale, where:
- the calculation is carried out at the date of sale; and
 - the calculation is carried out at the end of the month without regard for the date of sale; and
- (c) the average-cost approach to the issue of units for sale, making the calculation at the end of the month without regard for the date of sale.

B9.2 [S]

A company has a stock of goods consisting of four different groups of items. The cost and net realisable value of each group is shown in the table below.

<i>Group of items</i>	<i>Cost</i> £	<i>Net realisable value</i> £
A	1,000	1,400
B	1,000	800
C	2,100	1,900
D	3,000	3,100

Required

Calculate the amount to be shown as the value of the company's stock.

B9.3

At the end of Year 3 the Bed Company has a balance sheet comprising £3,000 receivables (debtors), £8,000 other assets and £11,000 ownership interest, consisting of £2,000 ownership interest at the start of the period and £9,000 profit of the period. On the balance sheet date the manager of the company reviews the receivables (debtors) list and decides that debts amounting to £450 are doubtful because the customers have not replied to repeated requests for payment.

Required

- Prepare an accounting equation spreadsheet to show the effect of the provision. (See Exhibit 9.4 for an illustration.)
- Show the balance sheet information. (See Exhibit 9.5 for an illustration.)

B9.4

The Bed Company continues trading during Year 4. The balance sheet at the end of Year 4, in its first draft, showed receivables (debtors) as £4,850 and the provision for doubtful debts unchanged from Year 3 at £450. Enquiry showed that during Year 4 some of the receivables (debtors) at the end of Year 3 had been confirmed as bad. They amounted to £250 but nothing had yet been recorded. The management wish to make the provision £550 at the end of Year 4. Other assets amounted to £12,000, ownership interest at the start of Year 4 is £10,550 and the profit is £5,750.

Required

Prepare an accounting equation spreadsheet to show the effect of the bad debt being recognised and of the decision to make a provision at the end of Year 4. (See Exhibit 9.6 for an illustration.)

B9.5

On 1 December Year 1 a company paid £2,400 as an insurance premium to give accident cover for the 12 months ahead. The accounting year-end is 31 December.

Required

Prepare an accounting equation spreadsheet to show the effect of the prepayment in the year ended 31 December Year 1.

C**Problem solving and evaluation****C9.1**

A fire destroyed a company's detailed stock records and much of the merchandise held in stock. The company accountant was able to discover that stock at the beginning of the period was £40,000, purchases up to the date of the fire were £250,000, and sales up to the date of the fire were £400,000. In past periods, the company has earned a gross profit of 35% of sales.

Required

Calculate the cost of the stock destroyed by the fire.

C9.2

It is the policy of Seaton Ltd to make provision for doubtful debts at a rate of 10% per annum on all debtor balances at the end of the year, after deducting any known bad debts at the same date. The following table sets out the total receivables (debtors) as shown by the accounting records and known bad debts to be deducted from that total. There is no provision at 31 December Year 0.

<i>Year-end</i>	<i>Debtor balances</i>	<i>Known bad debts</i>
	£	£
31 Dec. Year 1	30,000	2,000
31 Dec. Year 2	35,000	3,000
31 Dec. Year 3	32,000	1,500
31 Dec. Year 4	29,000	1,000

Required

- Calculate the total expense in the income statement (profit and loss account) in respect of bad and doubtful debts.
- Set out the balance sheet information in respect of receivables (debtors) and provision for doubtful debts at each year-end.

Activities for study groups

Turn to the annual report of a listed company which you have used for activities in previous chapters. Find every item of information about current assets. (Start with the financial statements and notes but look also at the operating and financial review, chief executive's review and other non-regulated information about the company.)

As a group, imagine you are the team of fund managers in a fund management company. You are holding a briefing meeting at which each person explains to the others some feature of the companies in which your fund invests. Today's subject is current assets. Each person should make a short presentation to the rest of the team covering:

- The nature and significance of current assets in the company.
- The effect on profit of a 10% error in estimation of any one of the major categories of current asset.
- The company's comments, if any, on its present investment in working capital and its future intentions.
- The risks which might attach to the inventories of the company.
- The liquidity of the company.
- The trends in current assets since last year (or over five years if a comparative table is provided).
- The ratio of current assets to current liabilities.

Notes and references

- IASB (1989), *Framework for the Preparation and Presentation of Financial Statements*, para. 49(a).
- IASB (2004), IAS 1, para. 57.
- IASB (2004), IAS 2 *Inventories*, para. 6.
- IASB (2004), IAS 2 *Inventories*, para. 9.
- IASB (2004), IAS 2 *Inventories*, para. 6.
- IASB (2004), IAS 2 *Inventories*, para. 10.
- IASB (2004), IAS 2 *Inventories*, para. 11.
- IASB (2004), IAS 18, *Revenue*, para. 7.
- J. H. Myers (1959) 'The critical event and recognition of net profit', *Accounting Review*, 34, pp. 528–32; and ASB (1999) *Statement of Principles for Financial Reporting*, ch. 5, paras. 5.33–5.36.

Supplement to Chapter 9

Bookkeeping entries for (a) bad and doubtful debts; and (b) prepayments

The debit and credit recording aspects of inventories of raw materials and finished goods were explained in the Supplement to Chapter 6. That leaves, for this supplement, the recording of bad and doubtful debts as a new area where potential care is needed. Prepayments are also illustrated here.

Provision for doubtful debts

The following ledger accounts illustrate the recording of the transactions analysed in section 9.9. Look back to that section for the description and analysis of the transactions. The debit and credit analysis is shown in Exhibit 9.8. So that you will not be confused by additional information, the ledger accounts presented here show only sufficient information to illustrate the recording of transactions relating to doubtful debts. Leona comments on the main features.

Exhibit 9.8

Analysis of debit and credit aspect of each transaction and event

Date		Debit	Credit
Year 1			
End of year	Manager identifies doubtful debts £200	Profit and loss account £200	Provision for doubtful debts £200
Year 2			
July	Customer who was doubtful pays £200 in full	Cash £200	Receivables (debtors) £200
End of year	Manager identifies new provision required £350	Profit and loss account £350	Provision for doubtful debts £350
End of year	Former provision no longer required	Provision for doubtful debts £200	Profit and loss account £200

The ledger accounts required are as follows:

L1 Receivables (debtors)

L3 Cash

L2 Provision for doubtful debts

L4 Profit and loss account

Also required to complete the double entry, but not shown here as a ledger account, is ledger account L5 Ownership interest.

The full list of transactions for the year would be too cumbersome to deal with here, so dots are used to show that the ledger account requires more information for completeness.

L1 Receivables (debtors)

Date	Particulars	Page	Debit	Credit	Balance
Year 1			£	£	£

Dec. 31	Balance at end of year				2,000
Year 2					

July	Cash from customer	L3		200	...

Dec. 31	Balance at end of year				2,500



LEONA: *The ledger account for receivables (debtors) has no entries relating to doubtful debts. That is important because although there may be doubts from the viewpoint of the business, the customer still has a duty to pay and should be encouraged by all the usual means. Keeping the full record of amounts due is an important part of ensuring that all assets of the business are looked after.*

L2 Provision for doubtful debts

Date	Particulars	Page	Debit	Credit	Balance
Year 1			£	£	£
Dec. 31	Profit and loss account – new provision	L4		200	(200)
Year 2					
Dec. 31	Profit and loss account – old provision	L4	200		nil
Dec. 31	Profit and loss account – new provision	L4		350	(350)

LEONA: *The provision for doubtful debts is a credit balance because it is the negative part of an asset. It keeps a separate record of doubt about the full value of the asset. A credit entry in the ledger account increases the amount of the provision and a debit entry decreases the amount of the provision.*

L3 Cash

Date	Particulars	Page	Debit	Credit	Balance
Year 2			£	£	£

July	Cash from debtor	L1	200		

LEONA: Receiving cash from the doubtful customer looks like any other transaction receiving cash. It is important that the cash is collected and the debt is removed by receiving the full amount due.

L4 Profit and loss account

Date	Particulars	Page	Debit	Credit	Balance
Year 1			£	£	£

Dec. 31	Balance before provision for doubtful debts				(7,200)
Dec. 31	Provision for doubtful debts	L2	200		(7,000)
Dec. 31	Transfer to ownership interest	L5	7,000		nil
Year 2					

Dec. 31	Balance before provision for doubtful debts				(3,500)
Dec. 31	Removal of provision no longer required	L2		200	(3,700)
Dec. 31	New provision for doubtful debts	L2	350		(3,350)
Dec. 31	Transfer to ownership interest	L5	3,350		nil

LEONA: In Year 1 of this example the provision is established for the first time so there is one debit entry to establish an expense which decreases the profit (as a part of the ownership interest). In Year 2 of this example the old provision is removed and a new provision created. The overall effect is that the provision increases by £150. Some people would take a short-cut and make one entry of £150 to increase the provision from £200 to £350 but I am not keen on short-cuts. They sometimes lead to disaster. Separate entries make me think carefully about the effect of each.

Recording a doubtful debt which turns bad

Suppose that in July of Year 2 it was found that the doubtful debt turned totally bad because the customer was declared bankrupt. The effect on the accounting equation is that the asset of debtor is removed. That would normally reduce the ownership

interest but on this occasion the impact on ownership interest was anticipated at the end of Year 1 and so the provision for doubtful debts is now used to match the decrease in the asset. The analysis of the transaction would be:

<i>Date</i>	<i>Transaction or event</i>	<i>Debit</i>	<i>Credit</i>
Year 2			
July	Doubtful debt becomes bad	Provision for doubtful debts £200	Receivables (debtors) £200

The consequence of using the provision for doubtful debts is that there is no impact on the income statement (profit and loss account) of Year 2 of a bad debt which was known to be likely at the end of Year 1. However, when the provision for doubtful debts is reviewed at the end of Year 2 there is no reversal of the £200 because that has already been used during the year. The charge of £350 for Year 2 relates solely to the provision for doubt in respect of receivables (debtors) owing money at the end of Year 2.

Prepayments

The prepayment transaction analysed in the chapter was as follows. On 1 October of Year 1 a company paid £1,200 for one year's vehicle insurance. At the balance sheet date of 31 December there have been three months' benefit used up and there is a nine-month benefit yet to come. (See Exhibit 9.9.)

Exhibit 9.9

Analysis of prepayment of insurance, Year 1

<i>Date</i>	<i>Transaction or event</i>	<i>Debit</i>	<i>Credit</i>
Year 2			
Oct. 1	Payment of premium £1,200	Expense (insurance)	Cash
Dec. 31	Identification of asset remaining as a prepayment £900	Asset (prepayment)	Expense (insurance)

Ledger accounts required to record the prepayment are:

- L6 Expense of insurance
- L7 Prepayment

Not shown, but necessary for completion of the debit and credit record, are:

- L3 Cash
- L4 Profit and loss account

L6 Expense of insurance

<i>Date</i>	<i>Particulars</i>	<i>Page</i>	<i>Debit</i>	<i>Credit</i>	<i>Balance</i>
Year 1			£	£	£
Oct. 31	Cash	L3	1,200		1,200
Dec. 31	Prepayment	L7		(900)	300
Dec. 31	Transfer to profit and loss account	L4		(300)	nil

LEONA: Although it is known in October that there will be a balance remaining at the end of the year, it is usually regarded as more convenient to debit the entire payment as an expense of the period initially. The expense is reviewed at the end of the year and £900 is found to be an asset which benefits the future. It is transferred to the asset account for prepayments, leaving only the expense of £300 relating to this period, which is transferred to the income statement (profit and loss account).

L7 Prepayment

Date	Particulars	Page	Debit	Credit	Balance
Year 1			£	£	£
Oct. 31	Insurance expense prepaid	L6	900		900

LEONA: The prepayment account is an asset account and therefore the balance remains in the account until the benefit asset is used up. During Year 2 the benefit will disappear and the asset will become an expense. The bookkeeping treatment will be to credit the prepayment account and debit the insurance expense account.

S Test your understanding

- S9.1** Record the transactions of question **B9.3** in ledger accounts for L1 Receivables (debtors), L2 Provision for doubtful debts, L3 Cash and L4 Profit and loss account.
- S9.2** Record the transactions of question **B9.4** in ledger accounts for L1 Receivables (debtors), L2 Provision for doubtful debts, L3 Cash and L4 Profit and loss account.
- S9.3** Record the transactions of question **B9.5** in ledger accounts for L6 Expense of insurance and L7 Prepayment.