FINANCIAL ACCOUNTING

Part 2

In Part 2 we outline the principles of double-entry book-keeping and explain how to prepare financial accounts for sole traders, companies and for some other types of entitites in the not-for-profit sector. The relationship of Part 2 to the rest of the book is shown below.

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Recording data

A book-keeping error?

KPMG forewarned XL board of accounting woes

KPMG resigned as auditor of XL, forewarning its board it had ignored 'potential accounting irregularities'

KPMG resigned in 2006 as auditor of the collapsed travel company XL Leisure, after forewarning its board it had ignored 'potential accounting irregularities' and was replaced by BDO Stoy Hayward.

The *Sunday Times* reports KMPG said in a strongly worded resignation letter the company had 'not satisfactorily addressed the concerns we had raised about other arrangements and potential accounting irregularities in the financial statements'.

KPMG resigned after staff at XL held up the payment of invoices to airline catering company Alpha Airports. The delay inflated XL's figures leading up to the listing of its then parent company Avion on the Icelandic stock exchange.

The discovery triggered the departures of Alpha's chairman, chief executive and finance director, as well as the departure of Steve Tomlinson, XL chief operating officer, and Paul Robinson, chief financial officer.

Source: *Accountancy Age*, 15 September 2008.

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About this chapter

In the last chapter we outlined some fundamental accounting rules. We indicated that some 'rules' are merely conventions, i.e. they have become generally accepted over a long period of time by custom and practice. You may recall that one convention that we dealt with in Chapter 2 is called the *dual aspect rule*. There is no iron law either of man or of nature that requires this rule to be adopted. It is merely a highly practical and useful one that has been shown to work over many centuries.

The dual aspect rule is a logical method of recording accounting data that enables (a) an accurate record to be kept of an entity's activities on a regular basis; and (b) an entity to assess its performance over and at the end of a defined period of time.

We cover the practical application of the dual aspect rule in this chapter.

<table>
<tr><td>**Learning objectives**</td><td>By the end of this chapter you should be able to:
● explain what is meant by the 'accounting equation';
● define the terms 'debit' and 'credit';
● write up some simple ledger accounts;
● extract a trial balance;
● identify six errors not revealed in a trial balance.</td></tr>
</table>

⚠ Why this chapter is important

This chapter is important for non-accountants for three main reasons.

1 *To learn the language of accounting.* The chapter will enable you to become familiar with the language and terminology used by accountants. This means that it will then be much easier for you to discuss with them any issues arising from the reports that they prepare for you.

2 *To check the reliability of information presented to you.* The chapter gives you a basic knowledge of the fundamental recording systems used by all types of entities throughout the world. You will then be able to assess the reliability of any accounting information based on the data that have been included in the system. You will also be more aware of what information has *not* been recorded. This will enable you to take into account what is missing from the accounts when considering the usefulness of any information your accountants give you.

3 *To discuss matters with your accountants.* Accounting information is based on a considerable number of questionable assumptions. These may not always be valid. If you are familiar with the language and nuances of fundamental accounting procedures, you will be able to have a more helpful discussion with your accountants about the type of information that you need to do your job.

The accounting equation

The system that accountants use to record financial data is known as *double-entry book-keeping*. The system recognizes that every transaction has a twofold effect. So if I loan you £100, a twofold effect arises because: I give you some money and you receive it. But the transaction also has a twofold effect on *both of us*.

(a) *The effect on you:* (1) your cash goes up by £100 and (2) what you owe me also goes up by £100.

(b) *The effect on me:* (1) my cash goes down by £100 and (2) what I am owed by you goes up by £100.

If an entity (say 'me') uses this twofold effect to record *twice* each of the transactions that take place between 'me' and another entity (say 'you'), then I am using some form of

double-entry book-keeping. The most commonly used system has evolved over at least the last six hundred years and it is now used on a worldwide basis. Before we describe how it works, however, we must first make sure that you are clear about three important accounting terms. They are as follows:

- *Assets*: These are possessions or resources *owned* by an entity. They include physical or tangible possessions such as property, plant, machinery, stock, and cash and bank balances. They also include intangible assets, i.e. non-physical possessions such as copyright and patent rights, as well as debts owed to the entity such as trade and other debtors.
- *Capital*: This is the term used to describe the amount that the owners have invested in an entity. In effect, 'capital' is the amount owed by the entity to its owners.
- *Liabilities*: These are the opposite of assets. They are the amounts owed *by* an entity to outside parties. They include loans, bank overdrafts, creditors, i.e. amounts owing to parties for the supply of goods and services to the entity that still have to be paid for.

There is a close relationship between assets, capital and liabilities. It is frequently presented in the form of what is called the 'accounting equation' (also see Figure 3.1):

$$\text{Assets} = \text{capital} + \text{liabilities}$$

The equation tells us in clear and simple terms that what the entity owns (or possesses) was obtained using a combination of contributions from the entity's owners and borrowings from other people.

$$A = C + L$$

Figure 3.1 The accounting equation

We will illustrate the use of the accounting equation with a simple example. Let us assume that you have decided to go into business. You do so by transferring £2000 in cash from your own private bank account. The entity rule means that we are not interested in your private affairs, so we only want to keep track of how the business deals with your £2000.

The business now has £2000 invested in it. This is its capital but it also has £2000 in cash. The cash is an asset. So the £2000 asset equals the £2000 of capital. Or in equation form:

Assets		Capital	
Cash	£2000	Capital	£2000

The equation captures the twofold effect of the transaction: the assets of the business have been increased by the capital contributed by the owner.

Now suppose that you then decide to transfer £1500 of the cash to a business bank account. The effect on the equation is:

	Assets			Capital	
		£	=		£
	Bank	1500		Capital	2000
	Cash	500			
		2000			2000

As you can see, there has simply been a change on the *assets* side of the equation.

Suppose now that you borrow £500 in cash from one of your friends to help finance the business. The assets will be increased by an inflow of £500 in cash, but £500 will be owed to your friend. The £500 owed is a liability and your friend has become a creditor of the business. The business has total assets of £2500 (£1500 at the bank and £1000 in cash). Its capital is £2000 and it has a liability of £500. The equation then reads:

Assets			Capital			Liabilities	
	£			£			£
Bank	1500	=	Capital	2000	+	Creditor	500
Cash (500 + 500)	1000						
	2500			2000			500

If £800 of goods were then purchased in cash for subsequent resale to the entity's customers, the equation would read:

Assets			Capital			Liabilities	
	£			£			£
Stocks	800		Capital	2000		Creditor	500
Bank	1500	=			+		
Cash (1000 – 800)	200			2000			500
	2500						

Again there has been a change on the assets side of the equation when £800 of the cash (an asset) was used to purchase £800 of goods for resale (i.e. stocks), another asset.

The equation is now becoming somewhat complicated but it does enable us to see the effect that *any* transaction has on the entity. The vital point to remember about the accounting equation is:

> If an adjustment is made to one side of the equation, you *must* make an identical adjustment *either* to the other side of the equation *or* to the same side.

This maxim reflects the basic rule of double-entry book-keeping:

> **Every transaction must be recorded twice.**

We will explain how the recording is done in the next section.

Activity 3.1

What are the missing words in the following statements?

(a) The accounting equation is represented by _____ = _____ + _____.
(b) Every transaction must be recorded _____.

Double-entry book-keeping

We are going to explain how a *handwritten* double-entry book-keeping system works, even though these days most systems are computerized. We do so because both systems use the same accounting principles and the principles are much easier to follow in a simple handwritten system.

Just as the accounting equation reflects the twofold effect of every transaction, so does a double-entry book-keeping system. This means that each transaction must be recorded twice. A change to the accounting system is called an *entry* and so we talk about making entries in the accounts (remember that an *account* is simply a history or a record of a particular type of transaction). Accounts used to be kept in various bound books referred to as ledgers and all the *ledgers* used in a particular accounting system are known collectively as the *books of account*.

The effect of entering a particular transaction once in one ledger account and again in another ledger account causes the balance on each of the two accounts either to go up or to go down (like the accounting equation). So a transaction can either *increase* or *decrease* the total amount held in an account. In other words, an account either *receives* (i.e. accepts) an additional amount or it *gives* (i.e. releases) it. This receiving and giving effect has given rise to two terms from Latin that are commonly used in accounting:

> **debit**: *meaning to receive, or value received*;
> **credit**: *meaning to give, or value given*.

Accountants judge the twofold effect of all transactions on particular accounts from a receiving and giving point of view and each transaction is recorded on that basis. So when a transaction takes place, it is necessary to ask the following two questions:

- Which account should *receive* this transaction, i.e. which account should be debited?
- Which account has *given* this amount, i.e. which account should be credited?

Accounts have been designed to keep the debit entries separate from the credit entries. This helps to emphasize the opposite, albeit equal, effect that each transaction has within the recording system. In a handwritten system the separation is achieved by recording the debit entries on the left-hand side of the page, and the credit entries on the right-

Date	Description	Page	Amount £	Date	Description	Page	Amount £

← ——————— Debit side ——————— →   ← ——————— Credit side ——————— →

Notes
1 The columnar headings would normally be omitted.
2 The description of each entry is usually limited to the *title* of the corresponding account in which the equal entry and opposite entry may be found.
3 The page column is used to refer to the page number of the corresponding account.
4 This example of a ledger account may nowadays only be found in a fairly basic handwritten book-keeping system. The debit and credit columns in a computerized account would normally be side-by-side.

Figure 3.2 Example of a ledger account

hand side. Each account is normally kept on a separate page in a ledger (i.e. a book of account). A traditional handwritten ledger account is illustrated in Figure 3.2.

In the next section we will show you how particular transactions are recorded in ledger accounts.

Activity 3.2

In one sentence describe what is meant by each of the following terms:

(a) An account is _____ .
(b) A ledger is _____ .
(c) Debit means _____ .
(d) Credit means _____ .

Working with accounts

There are four specific purposes behind this section:

1 to outline what type of transactions are included in an account;
2 to show how they are entered in an account;
3 to explain what is meant by a debit balance and a credit balance;
4 to demonstrate what happens at the end of an accounting period.

We should stress that we are not trying to turn you into a book-keeper. We just think that you need to know something about how accounting information is recorded and summarized before it is presented to you as a manager. If you have that knowledge then we believe that information will be much more useful to you in deciding what to do with it.

Choice of accounts

There is no specified or statutory list of accounts that *must* be used. Much will depend on the size and nature of the entity and whether it is in the private or public sector. Sometimes it is not clear, even to accountants, what account to use so they then adopt the

maxim *if in doubt, open another account.* It really does not matter how many accounts are used – they can always be dropped if some of them become superfluous.

Some of the more common types of accounts that you may come across in your career are summarized below. Figure 3.3 also shows you how they are all so closely interlinked.

Capital

The *Capital Account* records what the owner has contributed (or given) to the entity out of private resources in order to start the business and keep it going. In other words, it shows what the business owes the owner.

Cash at bank

The *Bank Account* records what money the entity keeps at the bank. It shows what has been put in (e.g. cash and cheques) and what has been taken out (e.g. cheque and direct debit payments).

Cash in hand

The *Cash Account* works on similar lines to the Bank Account, except that it records the physical cash received (such as notes, coins and cheques) before they are paid into the bank. The cash received may be used to purchase goods and services or it may be paid straight into the bank. From a control point of view, it is best not to pay for purchases directly out of cash receipts but to draw an amount out of the bank specifically for sundry cash purchases. Any large amount should always be paid through the bank account.

Creditors

Creditor Accounts record what the entity owes its suppliers for goods or services purchased or supplied on credit (see also *trade creditors*).
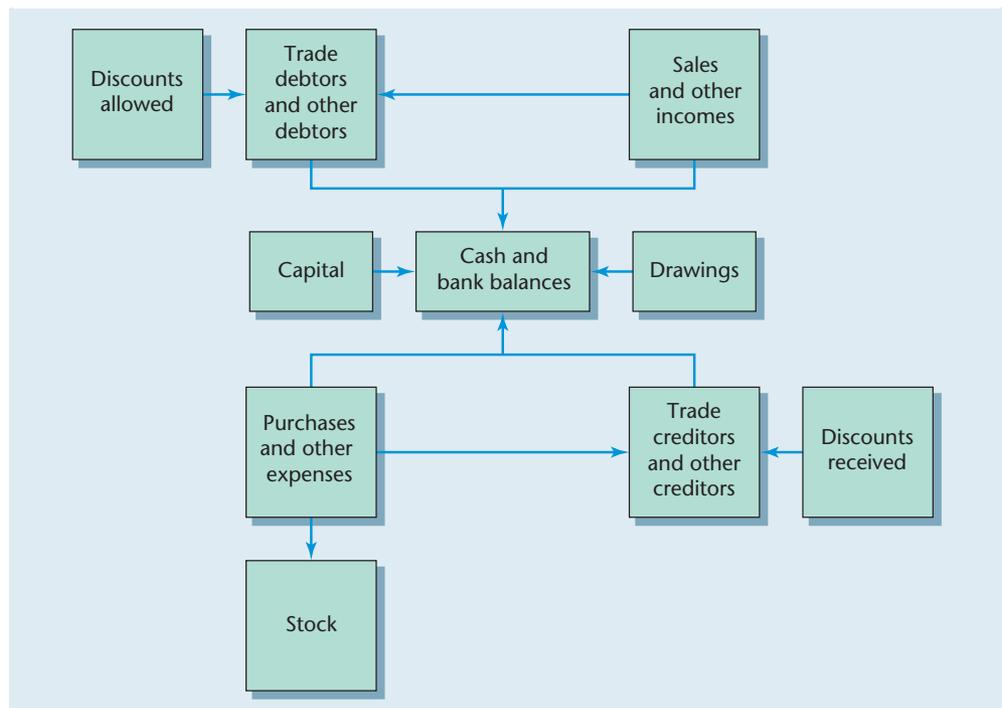
Figure 3.3 Interlinking of accounts

Debtors

Debtor Accounts record what is owed to the entity by its customers for goods or services sold to them on credit (see also *trade debtors*).

Discounts allowed

Discounts allowed are cash discounts granted to the entity's customers for the prompt settlement of any debts due to the entity. The amount of cash received from debtors who claim a cash discount will then be less than the total amount for which they have been invoiced.

Discounts received

Discounts received relate to cash discounts given by the entity's suppliers for the prompt payment of any amounts due to them. So the amount paid to the entity's creditors will be less than the invoiced amount.

Drawings

The term *drawings* has a special meaning in accounting. The *Drawings Account* is used to record what cash (or goods) the owner has withdrawn from the business for his personal use.

Petty cash

The *Petty Cash Account* is similar to both the Bank Account and the Cash Account. It is usually limited to the recording of minor cash transactions, such as bus fares or tea and coffee for the office. The cash used to finance this account will normally be transferred from the Bank Account.

Sales

The *Sales Account* records the value of goods sold to customers during a particular accounting period. The account includes both cash and credit sales. It does not include receipts from (say) the sale of a motor car originally purchased for use within the business.

Stock

Stock includes goods which have not been sold at the end of an accounting period. In accounting terminology, this would be referred to as *closing stock*. The closing stock at the end of one period becomes the *opening stock* at the beginning of the next period. The term *inventory* is now beginning to replace the term *stock*.

Purchases

The term *purchases* has a restricted meaning in accounting. It relates to those goods that are bought primarily with the intention of selling them (normally at a profit). The purchase of some motor cars, for example, would not usually be recorded in the *Purchases Account* unless they have been bought with the intention of selling them to customers. Goods not intended for resale are usually recorded in separate accounts. Some purchases may also require further work to be done on them before they are eventually sold.

Trade creditors

Trade Creditor Accounts are similar to Creditor Accounts except that they relate specifically to trading items, i.e. purchases.

Trade debtors

Trade Debtor Accounts are similar to Debtor Accounts except that they also relate specifically to trading items, i.e. sales.

Trade discounts

Trade discounts are a form of special discount. They may be given for placing a large order, for example, or for being a loyal customer. Trade discounts are deducted from the normal purchase or selling price. They are not recorded in the books of account and they will not appear on any invoice.

Once the book-keeper has chosen the accounts in which to record all the transactions for a particular accounting period, it is then necessary to decide which account should be debited and which account should be credited. We examine this problem in the next subsection.

Activity 3.3

Which two ledger accounts would you use in recording each of the following transactions?

(a) cash sales
(b) rent paid by cheque
(c) wages paid in cash
(d) a supplier of goods paid by cheque
(e) goods sold on credit to Ford.

Entering transactions in accounts

When entering a transaction in an account always make sure that you:

Debit the account which receives

and

Credit the account which gives.

Example 3.1 illustrates the use of this rule. It contains some common ledger account entries.

Example 3.1

Examples of some common ledger account entries

Entry 1
The proprietor contributes some cash to the business.

    Debit: Cash Account   *Credit*: Capital Account

Reason: The Cash Account receives some cash given to the business by the owner. His Capital Account is the giving account and the Cash Account is the receiving account.

Entry 2
Some cash in the till is paid into the business bank account.

    Debit: Bank Account   *Credit*: Cash Account

Reason: The Cash Account is the giving account because it is releasing some cash to the Bank Account.

Entry 3

A van is purchased for use in the business; it is paid for by cheque.

> *Debit*: Van Account   *Credit*: Bank Account

Reason: The Bank Account is giving some money in order to pay for a van, so the Bank Account must be credited as it is the giving account.

Entry 4

Some goods are purchased for cash.

> *Debit*: Purchases Account   *Credit*: Cash Account

Reason: The Cash Account is giving up an amount of cash in order to pay for some purchases. The Cash Account is the giving account, so it must be credited.

Entry 5

Some goods are purchased on credit terms from Fred.

> *Debit*: Purchases Account   *Credit*: Fred's Account

Reason: Fred is supplying the goods on credit terms to the business. As he is the giver, his account must be credited.

Entry 6

Some goods are sold for cash.

> *Debit*: Cash Account   *Credit:* Sales Account

Reason: The Cash Account receives the cash from the sale of goods and the Sales Account is credited because it is the giving or supplying account.

Entry 7

Some goods are sold on credit terms to Sarah.

> *Debit*: Sarah's Account   *Credit:* Sales Account

Reason: Sarah's Account is debited because she is receiving the goods, and the Sales Account is credited because it is supplying (or giving) them.

Activity 3.4

Is there anything wrong with the following abbreviated bank account?

Debit		£000	Credit		£000
10.3.12	Wages paid	1000	6.6.12	Interest received	500

It is not always easy to think of the receiving and of the giving effect of each transaction. You will find that it is very easy to get them mixed up and to then reverse the entries. If we look at Entries 6 and 7 in Example 3.1, for example, it is difficult to understand why the Sales Account should be credited. Why is the Sales Account the giving account? Surely it is *receiving* an amount and not giving anything? In one sense it is receiving something, but then that applies to any entry in any account. So in the case of the sales account, regard it as a *supplying* account because it gives (or releases) something to another account.

If you find this concept difficult to understand, think of the effect on the opposite account. A cash sale, for example, results in cash being increased. The cash account must, therefore, be the *receiving* account and it must be debited. Somebody (say Jones) must

have given the cash, but a cash sale is credited straight to the sales account as the *supplying* account. If the sales had been sold to Jones on credit, his account would have been debited (because his account is the *receiving* account) and credited to sales (again because it is the *supplying* account).

Activity 3.5	State which account should be debited and which account should be credited in respect of each of the following transactions:

(a) cash paid to a supplier
(b) office rent paid by cheque
(c) cash sales
(d) dividend received by cheque.

A ledger account example

This section illustrates the procedure adopted in entering various transactions in ledger accounts. It brings together the basic material covered in the earlier part of this chapter. It also demonstrates the use of various accounts as well as the debiting and crediting effect of different types of transactions.

Example 3.2

Joe Simple: a sole trader

The following information relates to Joe Simple, who started a new business on 1 January 2012:

1	1.1.12	Joe started the business with £5000 in cash.
2	3.1.12	He paid £3000 of the cash into a business bank account.
3	5.1.12	Joe bought a van for £2000 paying by cheque.
4	7.1.12	He bought some goods, paying £1000 in cash.
5	9.1.12	Joe sold some of the goods, receiving £1500 in cash.

Required:

Enter the above transactions in Joe's ledger accounts.

Answer to Example 3.2

Joe Simple's books of account

Cash Account

		£			£
1.1.12	Capital (1)	5 000	3.1.12	Bank (2)	3 000
9.1.12	Sales (5)	1 500	7.1.12	Purchases (4)	1 000

Capital Account

		£			£
			1.1.12	Cash (1)	5 000

Bank Account

		£			£
3.1.12	Cash (2)	3 000	5.1.12	Van (3)	2 000

Van Account

		£			£
5.1.12	Bank (3)	2 000			

Purchases Account

		£			£
7.1.12	Cash (4)	1 000			

Sales Account

	£			£
		9.1.12	Cash (5)	1 500

Tutorial notes

1 The numbers in brackets after each entry refer to the example notes; they have been inserted for tutorial guidance only.

2 The narration relates to that account in which the equal and opposite entry may be found.

After entering all the transactions for a particular period in appropriate ledger accounts, the next stage in the exercise is to calculate the balance on each account at the end of an accounting period. We show you how to do this in the next section.

Balancing the accounts

News clip

Past problem

The American Italian Pasta Company has paid out $1m to settle allegations that it engaged in fraudulent accounting including capitalising period costs, the recording of false receivables, and the failure to write-off obsolete or missing parts.

Source: Adapted from www.accountancyage.com, 16 September 2008.

During a particular accounting period, some accounts (such as the bank and cash accounts) will include a great many debit and credit entries. Some accounts may be made up of mainly debit entries (e.g. the purchases account) or largely credit entries (e.g. the sales account). It would be somewhat inconvenient to allow the entries (whether mainly debits, credits or a mixture of both) to build up without occasionally striking a balance. Furthermore, the owner will almost certainly want to know not just what is in each account, but also its overall or *net* balance (i.e. the total of all the debit entries less the total of all the credit entries). So in order to meet these requirements it will be necessary to calculate the balance on each account on a regular basis.

Balancing an account requires the book-keeper to add up all the respective debit and credit entries, take one total away from the other, and arrive at the net balance.

Accounts may be balanced fairly frequently, e.g. once a week or once a month, but some entities may only do so when they prepare their annual accounts. In order to keep a tight control on the management of the business, it is advisable to balance the accounts at reasonably short intervals. The frequency will depend on the nature and the size of the entity but once a month is probably sufficient for most entities.

The balancing of the accounts is part of the double-entry procedure and the method is quite formal. In Example 3.3 below we show how to balance an account with a *debit* balance (i.e. when the total debit entries exceed the total credit entries).

Example 3.3	**Balancing an account with a debit balance**

<div style="text-align:center">Cash Account</div>

		£			£
1.1.12	Sales (1)	2 000	10.1.12 Jones (1)		3 000
15.1.12	Rent received (1)	1 000	25.1.12 Davies (1)		5 000
20.1.12	Smith (1)	4 000			
31.1.12	Sales (1)	8 000	31.1.12 Balance c/d (2)		7 000
	(3)	15 000	(3)		15 000
1.2.12	Balance b/d (4)	7 000			

Note: The number shown after each narration relates to the tutorial notes below.

Tutorial notes

1 The total debit entries equal £15,000 (2000 + 1000 + 4000 + 8000). The total credit entries equal £8000 (3000 + 5000). The net balance on this account, therefore, at 31 January 2012 is a *debit balance* of £7000 (15,000 – 8000). Until both the debit entries and the credit entries have been totalled, of course, it will not usually be apparent whether the balance is a debit one or a credit one. However, it should be noted that there can never be a credit balance in a cash account, because it is impossible to pay out more cash than has been received.

2 The debit balance of £7000 is inserted on the *credit* side of the account at the time that the account is balanced (in this case, at 31 January 2012). This then enables the total of the credit column to be balanced so that it agrees with the total of the debit column. The abbreviation 'c/d' means carried down. In this example the debit balance is carried down in the account in order to start the new period on 1 February 2012.

3 The £15,000 shown as a total in both the debit and the credit columns demonstrates that the columns balance (they do so, of course, because £7000 has been inserted in the credit column to make them balance). The totals are double-underlined in order to signify that they are a final total.

4 The balancing figure of £7000 is brought down ('b/d') in the account to start the new period on 1 February 2012. The double entry has been completed because £7000 has been debited below the line (i.e. below the £15,000 debit total), and the £7000 balancing figure credited above the line (i.e. above the £15,000 credit total).

Example 3.3 demonstrates how an account with a debit entry is balanced. In Example 3.4 we illustrate a similar procedure, but this time the account has a *credit* balance.

Example 3.4	**Balancing an account with a credit balance**

Scott's Account

		£			£
31.1.12	Bank (1)	20 000	15.1.12	Purchases (1)	10 000
31.1.12	Balance c/d (2)	5 000	20.1.12	Purchases (1)	15 000
	(3)	25 000		(3)	25 000
			1.2.12	Balance b/d (4)	5 000

Note: The number shown after each narration relates to the tutorial notes below.

Tutorial notes to Example 3.4

1   Apart from the balance, there is only one debit entry in Scott's account: the bank entry of £20,000. The total credit entries amount to £25,000 (10,000 + 15,000). Scott has a *credit balance*, therefore, in his account as at 31 January 2012 of £5000 (10,000 + 15,000 − 20,000). With many more entries in the account it would not always be possible to tell immediately whether the balance was a debit one or a credit one.

2   The credit balance of £5000 at 31 January 2012 is inserted on the *debit* side of the account in order to enable the account to be balanced. The balance is then carried down (c/d) to the next period.

3   The £25,000 shown as the total for both the debit and the credit columns shows that the account balances. This has been made possible because of the insertion of the £5,000 balancing figure on the debit side of the account.

4   The balancing figure of £5000 is brought down (b/d) in the account in order to start the account in the new period beginning on 1 February 2012. The double-entry has been completed because the debit entry of £5000 above the £25,000 line on the debit side equals the credit entry below the £25,000 line on the credit side.

Activity 3.6	Write down in you notebook what is meant by (a) an account having a debit balance (b) an account having a credit balance.

The next stage after balancing each account is to check that the double-entry procedure has been completed throughout the entire book-keeping system. This is done by compiling what is known as a *trial balance*.

The trial balance

A trial balance (TB) is a working paper compiled at the end of a specific accounting period. It does not form part of the double-entry procedure. It has three main purposes: (1) to check that all of the transactions for a particular period have been entered correctly in the ledger system; (2) to confirm that the balance on each account is correct; and (3) to assist in the preparation of the profit and loss account and the balance sheet.

A sales glitch

The formal global audit firm Arthur Andersen has been fined £75,000 and ordered to pay £100,000 in costs for 'failing to spot that sales had been booked into the wrong accounting period'. For some reason not explained it appears that the firm was 'reluctant to contact customers to verify sales' (a normal audit procedure).

Source: Adapted from www.accountancyage.com, 29 January 2009.

The trial balance lists each debit and each credit balance in columns side by side. The total of each column is then added up. If the two totals agree we can be reasonably confident that the double-entry procedures have been carried out correctly. There are, however, some errors that do not show up. We will explain what they are later in the chapter.

We show how to prepare a trial balance below in Example 3.5.

| **Example 3.5** | **Edward – compilation of a trial balance** |

Edward started a new business on 1 January 2012. The following transactions took place during his first month in business.

2012
- 1.1   Edward commenced business with £10,000 in cash.
- 3.1   He paid £8000 of the cash into a business bank account.
- 6.1   He bought a van on credit from Perkin's garage for £3000.
- 9.1   Edward rented shop premises for £1000 per quarter; he paid for the first quarter immediately by cheque.
- 12.1   He bought goods on credit from Roy Limited for £4000.
- 15.1   He paid shop expenses amounting to £1500 by cheque.
- 18.1   Edward sold goods on credit to Scott and Company for £3000.
- 21.1   He settled Perkin's account by cheque.
- 24.1   Edward received a cheque from Scott and Company for £2000; this cheque was paid immediately into the bank.
- 27.1   Edward sent a cheque to Roy Limited for £500.
- 31.1   Goods costing £3000 were purchased from Roy Limited on credit.
- 31.1   Cash sales for the month amounted to £2000.

Required:
(a) Enter the above transactions in appropriate ledger accounts, balance off each account as at 31 January 2012, and bring down the balances as at that date.
(b) Extract a trial balance as at 31 January 2012.

Answer to Example 3.5(a)

Cash Account

		£			£
1.1.12	Capital (1)	10 000	3.1.12	Bank (2)	8 000
31.1.12	Sales (12)	2 000	31.1.12	Balance c/d	4 000
		12 000			12 000
1.2.12	Balance b/d	4 000			

Capital Account

		£			£
			1.1.12	Cash (1)	10 000

Bank Account

		£			£
3.1.12	Cash (2)	8 000	9.1.12	Rent payable (4)	1 000
24.1.12	Scott and		15.1.12	Shop expenses (6)	1 500
	Company (9)	2 000	21.1.12	Perkin's garage (8)	3 000
			27.1.12	Roy Limited (10)	500
			31.1.12	Balance c/d	4 000
		10 000			10 000
1.2.12	Balance b/d	4 000			

Van Account

		£			£
6.1.12	Perkin's Garage (3)	3 000			

Perkin's Garage Account

		£			£
21.1.12	Bank (8)	3 000	6.1.12	Van (3)	3 000

Rent Payable Account

		£			£
9.1.12	Bank (4)	1 000			

Purchases Account

		£			£
12.1.12	Roy Limited (5)	4 000			
31.1.12	Roy Limited (11)	3 000	31.1.12	Balance c/d	7 000
		7 000			7 000
1.2.12	Balance b/d	7 000			

Roy Limited Account

		£			£
27.1.12	Bank (10)	500	12.1.12	Purchases (5)	4 000
31.1.12	Balance c/d	6 500	31.1.12	Purchases (11)	3 000
		7 000			7 000
			1.2.12	Balance b/d	6 500

Shop Expenses Account

		£			£
15.1.12	Bank (6)	1 500			

Sales Account

		£			£
			18.1.12	Scott & Company (7)	3 000
31.1.12	Balance c/d	5 000	31.1.12	Cash (12)	2 000
		5 000			5 000
			1.2.12	Balance b/d	5 000

Scott and Company Account

		£			£
18.1.12	Sales (7)	3 000	24.1.12	Bank (9)	2 000
			31.1.12	Balance c/d	1 000
		3 000			3 000
1.2.12	Balance b/d	1 000			

Tutorial notes

1 The number shown after each narration has been inserted for tutorial guidance only in order to illustrate the insertion of each entry in the appropriate account.

2 There is no need to balance an account and carry down the balance when there is only a single entry in one account (see Edward's Capital Account).

3 Note that some accounts may not have a balance (e.g., *Perkin's Garage Account*).

Answer to Example 3.5(b)

Trial Balance at 31 January 2012

	Dr	Cr
	£	£
Cash	4 000	
Capital		10 000
Bank	4 000	
Van	3 000	
Rent payable	1 000	
Purchases	7 000	
Roy Limited		6 500
Shop expenses	1 500	
Sales		5 000
Scott and Company	1 000	
	21 500	21 500

Tutorial notes

1 The total debit balance agrees with the total credit balance and so the trial balance balances thus confirming that the transactions appear to have been entered in the books of account correctly.

2 The total amount of £21,500 shown in both the debit and credit columns of the trial balance does not have any significance except to prove that the trial balance balances.

Trial balance errors

A trial balance confirms that the books of account balance arithmetically. This means that the following procedures have all been carried out correctly:

● for every debit entry there appears to be a credit entry – a cardinal rule in double-entry book-keeping;
● the value for each debit and credit entry has been entered in appropriate accounts;
● the balance on each account has been calculated, extracted and entered correctly in the trial balance;
● the debit and credit columns in the trial balance are the same.

As we indicated earlier, there are, however, some errors that are not disclosed by the trial balance. They are as follows.

- *Omission*: a transaction could have been completely omitted from the books of account.
- *Complete reversal of entry*: a transaction could have been entered in (say) Account A as a debit and in Account B as a credit, when it should have been entered as a credit in Account A and as a debit in Account B.
- *Principle*: a transaction may have been entered in the wrong *type* of account, e.g. the purchase of a new delivery van may have been debited to the purchases account instead of to the delivery vans account.
- *Commission*: a transaction may have been entered in the correct type of account but in the wrong *personal* account, e.g. in Bill's account instead of in Ben's account.
- *Compensating*: an error may have been made in (say) adding the debit side of one account and an identical error made in adding the credit side of another account; the two errors would then cancel each other out.
- *Original entry*: a transaction may have been entered incorrectly in both accounts, e.g. as £291 instead of as £921.

Such errors may only be discovered if some transactions are double-checked later on in the period. They may also become apparent when the financial statements are prepared and the results are compared with previous periods. Similarly, some errors may also come to light if they affect creditor and debtor balances and suppliers and customers begin to complain about unpaid or incorrect invoices. Notwithstanding these possible errors the compilation of a trial balance is still useful because:

- the arithmetical accuracy of the entries made in the books of account can be confirmed;
- the balance owed or owing on each account can easily be extracted;
- the preparation of the financial statements is simplified.

Activity 3.7	State whether each of the following errors would be discovered as a result of preparing a trial balance.

(a) £342 has been entered in both ledger accounts instead of £432. *Yes/no*
(b) The debit column in Prim's account has been overstated by £50. *Yes/no*
(c) £910 has been put in Anne's account instead of Agnes's. *Yes/no*

！ Questions you should ask

As a non-accountant it is highly unlikely that you will become involved in the detailed recording, extraction and summary of basic accounting information. Your particular responsibility as a senior manager will be to ensure that:

- adequate accounting records are kept;
- they are accurate;
- an appropriate profit and loss account and a balance sheet (as required by any legislation) can be prepared from such records.

As a minimum you should ensure that the accounting records are capable of dealing with all cash received and paid by the entity and that they contain details of all its assets and liabilities.

In order to satisfy yourself about these requirements you should ask the following questions.

- Do we use a double-entry book-keeping system?
- If not, why not?
- Is it a manual or a computerized one?
- Does the system include a cash book in which all cash and bank transactions are entered?
- Is the balance shown in the cash book checked regularly against the balance disclosed in the bank's statements of account?
- Is a separate account kept for each identifiable group of fixed assets, current assets and current liabilities?
- What is included in such groups?
- Is a balance calculated regularly for each of the accounts?
- How often is a trial balance prepared?
- What steps are taken to ensure that errors not disclosed in a trial balance are minimized?
- What is the system for the separation of duties affecting the recording of the accounting information and the preparation of the trial balance?
- Does a senior manager (not involved with the accounting function) receive a copy of the trial balance?

Conclusion

This book is specifically aimed at non-accountants. In this chapter we have deliberately avoided going into too much detail about double-entry book-keeping. In your managerial role you will almost certainly be supplied with information that has been extracted from a ledger system. In order to assess its real benefit to you, we believe that it is most important that you should know something about where it has come from, what it means, and what reliability can be placed on it.

The chapter has, therefore, covered the following features of a double-entry book-keeping system:

- the accounting equation;
- the type of accounts generally used in practice;
- the meaning of the terms 'debit' and 'credit';
- the definition of the terms 'debtor' and 'creditor';
- the method of entering transactions in ledger accounts;
- the balancing of ledger accounts;
- the compilation of a trial balance.

Key points

1 The accounting equation is represented by the formula: assets = capital + liabilities. It underpins the dual aspect rule and it forms the basis of a conventional accounting recording system.

2 An account is an explanation, a record or a history of a particular event.

3 A book of account is known as a ledger.

4 A transaction is the carrying out and the performance of a particular business activity or event.

5 All transactions have a twofold effect.

6 A double-entry system records that twofold effect.

7 A debit means that a transaction is received into an account.

8 A credit means that a transaction is given by an account.

9 Debits are entered on the left-hand side of an account.

10 Credits are entered on the right-hand side of an account.

11 For every debit entry there must be a credit entry.

12 Accounts are balanced periodically.

13 The accuracy of the book-keeping is tested by preparing a trial balance.

14 The trial balance does not reveal all possible book-keeping errors.

Check your learning

1 What is the accounting equation?

2 What is the basic rule of double-entry book-keeping?

3 What is an account?

4 What is a ledger?

5 What is meant by the terms 'debit' and 'credit'?

6 What factor would indicate whether or not a new account should be opened?

7 What distinguishes a cash account from a bank account?

8 What are the following accounts used for: (a) capital, (b) trade creditors, (c) trade debtors, (d) stock, (e) sales, (f) purchases, (g) drawings?

9 What is the difference between a discounts allowed account and a discounts received account?

10 What must there be for (a) every debit, and (b) every credit?

11 What is (a) a debit balance, and (b) a credit balance?

12 What is a trial balance?

13 Name three main functions that it fulfils.

14 List six book-keeping errors that a trial balance does not detect.

News story quiz

Remember the news story at the beginning of this chapter? Go back to that story and reread it before answering the following questions.

This alleged accounting irregularity is rather puzzling. It apparently revolved round the delay in paying invoices. This is not unusual so it is not clear why it turned into an 'irregularity'.

Questions

1 Assuming that the payment of the invoices had been paid reasonably promptly what effect would this have had on (a) the bank account; and (2) the suppliers' accounts?

2 Would the delay have increased or decreased the profit for the year?

3 By delaying the payments can the financial statements be said to represent 'a true and fair view'?

Tutorial questions

The answers to questions marked with an asterisk can be found in Appendix 4.

3.1 Do you think that non-accounting managers need to know anything about double-entry book-keeping?

3.2 'My accountant has got it all wrong,' argued Freda. 'She's totally mixed up all her debits and credits.'
'But what makes you say that?' queried Dora.
'Oh! I've only to look at my bank statement to see that she's wrong,' responded Freda. 'I know I've got some money in the bank, and yet she tells me I'm in debit when she means I'm in credit.'
Is Freda right?

3.3 'Double-entry book-keeping is a waste of time and money because everything has to be recorded twice.' Discuss.

3.4* Adam has just gone into business. The following is a list of his transactions for the month of January 2010:

(a) Cash paid into the business by Adam.
(b) Goods for resale purchased on cash terms.
(c) Van bought for cash.
(d) One quarter's rent for premises paid in cash.
(e) Some goods sold on cash terms.
(f) Adam buys some office machinery for cash.

Required:
State which account in Adam's books of account should be debited and which account should be credited for each transaction.

3.5* The following is a list of Brown's transactions for February 2011:

(a) Transfer of cash to a bank account.
(b) Cash received from sale of goods.
(c) Purchase of goods paid for by cheque.
(d) Office expenses paid in cash.
(e) Cheques received from customers from sale of goods on cash terms.
(f) A motor car for use in the business paid for by cheque.

Required:
State which account in Brown's books of account should be debited and which account should be credited for each transaction.

3.6 Corby is in business as a retail distributor. The following is a list of his transactions for March 2012:

1 Goods purchased from Smith on credit.
2 Corby introduces further capital in cash into the business.
3 Goods sold for cash.
4 Goods purchased for cash.
5 Cash transferred to the bank.
6 Machinery purchased, paid for in cash.

Required:
State which account in Corby's books of account should be debited and which account should be credited for each transaction.

3.7 Davies buys and sells goods on cash and credit terms. The following is a list of her transactions for April 2010:

1 Capital introduced by Davies paid into the bank.
2 Goods purchased on credit terms from Swallow.
3 Goods sold to Hill for cash.
4 Cash paid for purchase of goods.
5 Dale buys goods from Davies on credit.
6 Motoring expenses paid by cheque.

Required:
State which account in Davies' books of account should be debited and which account should be credited for each transaction.

3.8 The following transactions relate to Gordon's business for the month of July 2011:

1 Bought goods on credit from Watson.
2 Sold some goods for cash.
3 Sold some goods on credit to Moon.
4 Sent a cheque for half the amount owing to Watson.
5 Watson grants Gordon a cash discount.
6 Moon settles most of his account in cash.
7 Gordon allows Moon a cash discount that covers the small amount owed by Moon.
8 Gordon purchases some goods for cash.

Required:
State which account in Gordon's books of accounts should be debited and which account should be credited for each transaction.

3.9　Harry started a new business on 1 January 2012. The following transactions cover his first three months in business:

1　Harry contributed an amount in cash to start the business.
2　He transferred some of the cash to a business bank account.
3　He paid an amount in advance by cheque for rental of business premises.
4　Bought goods on credit from Paul.
5　Purchased a van paying by cheque.
6　Sold some goods for cash to James.
7　Bought goods on credit from Nancy.
8　Paid motoring expenses in cash.
9　Returned some goods to Nancy.
10　Sold goods on credit to Mavis.
11　Harry withdrew some cash for personal use.
12　Bought goods from David paying in cash.
13　Mavis returns some goods.
14　Sent a cheque to Nancy.
15　Cash received from Mavis.
16　Harry receives a cash discount from Nancy.
17　Harry allows Mavis a cash discount.
18　Cheque withdrawn at the bank in order to open a petty cash account.

Required:
State which account in Harry's books of account should be debited and which account should be credited for each transaction.

3.10* The following is a list of transactions which relate to Ivan for the first month that he is in business:

1.9.10	Started the business with £10,000 in cash.
2.9.10	Paid £8000 into a business bank account.
3.9.10	Purchased £1000 of goods in cash.
10.9.10	Bought goods costing £6000 on credit from Roy.
12.9.10	Cash sales of £3000.
15.9.10	Goods sold on credit terms to Norman for £4000.
20.9.10	Ivan settles Roy's account by cheque.
30.9.10	Cheque for £2000 received from Norman.

Required:
Enter the above transactions in Ivan's ledger accounts.

3.11* Jones has been in business since 1 October 2011. The following is a list of her transactions for October 2011:

1.10.11	Capital of £20,000 paid into a business bank account.
2.10.11	Van purchased on credit from Lang for £5000.
6.10.11	Goods purchased on credit from Green for £15,000.
10.10.11	Cheque drawn on the bank for £1000 in order to open a petty cash account.
14.10.11	Goods sold on credit for £6000 to Haddock.
18.10.11	Cash sales of £5000.
20.10.11	Cash purchases of £3000.
22.10.11	Miscellaneous expenses of £500 paid out of petty cash.
25.10.11	Lang's account settled by cheque.
28.10.11	Green allows Jones a cash discount of £500.
29.10.11	Green is sent a cheque for £10,000.

30.10.11   Haddock is allowed a cash discount of £600.
31.10.11   Haddock settles his account in cash.

Required:
Enter the above transactions in Jones's ledger accounts.

3.12   The transactions listed below relate to Ken's business for the month of November 2012:

1.11.12   Started the business with £150,000 in cash.
2.11.12   Transferred £14,000 of the cash to a business bank account.
3.11.12   Paid rent of £1000 by cheque.
4.11.12   Bought goods on credit from the following suppliers:

Ace	£5000
Mace	£6000
Pace	£7000

10.11.12   Sold goods on credit to the following customers:

Main	£2000
Pain	£3000
Vain	£4000

15.11.12   Returned goods costing £1000 to Pace.
22.11.12   Pain returned goods sold to him for £2000.
25.11.12   Additional goods purchased from the following suppliers:

Ace	£3000
Mace	£4000
Pace	£5000

26.11.12   Office expenses of £2000 paid by cheque.
27.11.12   Cash sales for the month amounted to £5000.
28.11.12   Purchases paid for in cash during the month amounted to £4000.
29.11.12   Cheques sent to the following suppliers:

Ace	£4000
Mace	£5000
Pace	£6000

30.11.12   Cheques received from the following customers:

Main	£1000
Pain	£2000
Vain	£3000

30.11.12   The following cash discounts were claimed by Ken:

Ace	£200
Mace	£250
Pace	£300

30.11.12   The following cash discounts were allowed by Ken:

Main	£100
Pain	£200
Vain	£400

30.11.12   Cash transfer to the bank of £1000.

Required:
Enter the above transactions in Ken's ledger accounts.

3.13*   The following transactions relate to Pat's business for the month of December 2010:

1.12.10   Started the business with £10,000 in cash.
2.12.10   Bought goods on credit from the following suppliers:

Grass	£6000
Seed	£7000

10.12.10	Sold goods on credit to the following customers:	
	Fog	£3000
	Mist	£4000
12.12.10	Returned goods to the following suppliers:	
	Grass	£1000
	Seed	£2000
15.12.10	Bought additional goods on credit from Grass for £3000 and from Seed for £4000.	
20.12.10	Sold more goods on credit to Fog for £2000 and to Mist for £3000.	
24.12.10	Paid office expenses of £5000 in cash.	
29.12.10	Received £4000 in cash from Fog and £6000 in cash from Mist.	
31.12.10	Pat paid Grass and Seed £6000 and £8000, respectively, in cash.	

Required:
(a) Enter the above transactions in Pat's ledger accounts.
(b) Balance off the accounts as at 31 December 2010.
(c) Bring down the balances as at 1 January 2011.
(d) Compile a trial balance as at 31 December 2010.

3.14* Vale has been in business for some years. The following balances were brought forward in his books of account as at 1 January 2011:

	£	£
	Dr	*Cr*
Bank	5000	
Capital		20000
Cash	1000	
Dodd		2000
Fish	6000	
Furniture	10000	
	22000	22000

During the year to 31 December 2011 the following transactions took place:

1 Goods bought from Dodd on credit for £30,000.
2 Cash sales of £20,000.
3 Cash purchases of £15,000.
4 Goods sold to Fish on credit for £50,000.
5 Cheques sent to Dodd totalling £29,000.
6 Cheques received from Fish totalling £45,000.
7 Cash received from Fish amounting to £7000.
8 Office expenses paid in cash totalling £9000.
9 Purchase of delivery van costing £12,000 paid by cheque.
10 Cash transfers to bank totalling £3000.

Required:
(a) Compile Vale's ledger accounts for the year 31 December 2011, balance off the accounts and bring down the balances as at 1 January 2012.
(b) Extract a trial balance as at 31 December 2011.

3.15 Brian started in business on 1 January 2012. The following is a list of his transactions for his first month of trading:

1.1.12	Opened a business bank account with £25,000 obtained from private resources.
2.1.12	Paid one month's rent of £2000 by cheque.
3.1.12	Bought goods costing £5000 on credit from Linda.
4.1.12	Purchased motor car from Savoy Motors for £4000 on credit.
5.1.12	Purchased goods costing £3000 on credit from Sydney.
10.1.12	Cash sales of £6000.
15.1.12	More goods costing £10 000 purchased from Linda on credit.
20.1.12	Sold goods on credit to Ann for £8000.
22.1.12	Returned £2000 of goods to Linda.
23.1.12	Paid £6000 in cash into the bank.
24.1.12	Ann returned £1000 of goods.
25.1.12	Withdrew £500 in cash from the bank to open a petty cash account.
26.1.12	Cheque received from Ann for £5500; Ann also claimed a cash discount of £500.
28.1.12	Office expenses of £250 paid out of petty cash.
29.1.12	Sent a cheque to Savoy Motors for £4000.
30.1.12	Cheques sent to Linda and Sydney for £8000 and £2000, respectively. Cash discounts were also claimed from Linda and Sydney of £700 and £100, respectively.
31.1.12	Paid by cheque another month's rent of £2000.
31.1.12	Brian introduced £5000 additional capital into the business by cheque.

Required:
(a) Enter the above transactions in Brian's ledger accounts for January 2012, balance off the accounts and bring down the balances as at 1 February 2012.
(b) Compile a trial balance as at 31 January 2012.

3.16 An accounts clerk has compiled Trent's trial balance as at 31 March 2010 as follows:

	Dr £	Cr £
Bank (overdrawn)	2 000	
Capital	50 000	
Discounts allowed		5 000
Discounts received	3 000	
Dividends received	2 000	
Drawings		23 000
Investments		14 000
Land and buildings	60 000	
Office expenses	18 000	
Purchases	75 000	
Sales		250 000
Suspense (unexplained balance)		6 000
Rates		7 000
Vans	20 000	
Van expenses		5 000
Wages and salaries	80 000	
	310 000	310 000

Required:
Compile Trent's corrected trial balance as at 31 March 2010.

3.17 Donald's transactions for the month of March 2012 are as follows:

	£
Cash receipts	
Capital contributed	6 000
Sales to customers	3 000
Cash payments	
Goods for sale	4 000
Stationery	500
Postage	300
Travelling	600
Wages	2 900
Transfers to bank	500
Bank receipts	£
Receipts from trade debtors:	
Smelt	3 000
Tait	9 000
Ure	5 000
Bank payments	£
Payments to trade creditors:	
Craig	2 800
Dobie	5 000
Elgin	6 400
Rent and rates	3 200
Electricity	200
Telephone	100
Salaries	2 000
Miscellaneous expenses	600
Other transactions	
Goods purchased from:	
Craig	3 500
Dobie	7 500
Elgin	7 500
Goods returned to Dobie	400
Goods sold to:	
Smelt	4 000
Tait	10 000
Ure	8 000
Goods returned by Ure	900
Discounts allowed:	
Smelt	200
Tait	500
Ure	400
Discounts received:	
Craig	50
Dobie	100
Elgin	200

Required:
(a) Enter the above transactions in appropriate ledger accounts.
(b) Balance each account as at 31 March 2012.
(c) Extract a trial balance as at that date.