

International trade may be carried out by firms of all sizes and comes in many and various forms. A firm's involvement may be restricted to the purchase or sale of goods and services using a foreign currency but it could involve a foreign currency loan or an investment in a foreign subsidiary, associate or joint venture.

From an accounting point of view we need to identify two different situations:

- 1 Accounting for foreign currency transactions in the accounting records.
- 2 Translation of foreign currency financial statements as a preliminary to some form of consolidation.

We deal with each in turn.

We explore accounting for foreign currency transactions in the context of a number of examples. When we turn to the translation of foreign financial statements as a preliminary to full consolidation, proportional consolidation or use of the equity method of accounting, we concentrate on the translation of the financial statements of an overseas subsidiary and explore the two methods of accounting specified for this purpose in the UK standard, namely the closing rate/net investment method and the temporal method. Having first introduced the two methods, we discuss their strengths and weaknesses before exploring a more complex example of the closing rate/net investment method, the method used by the vast majority of companies in the UK.

We then turn to the provisions of the relevant international accounting standard.

In this chapter, we therefore draw upon:

- SSAP 20 *Foreign Currency Translation* (1983), and
- IAS 21 *The Effects of Changes in Foreign Exchange Rates* (revised 1993)

In May 2002, both the ASB and the IASB issued exposure drafts of proposed replacements for SSAP 20 and IAS 21 respectively. We draw attention to proposed changes at relevant points in the text and summarise them in a separate section towards the end of the chapter.

## Introduction: the problems identified

Many firms based in the UK undertake transactions with firms in other countries and have branches and subsidiary and associated undertakings overseas.

Transactions undertaken between firms will often be expressed in foreign currencies and it will be necessary to translate these amounts into sterling in order to enter them in the accounting records of the UK firm. If the rate of exchange changes between the date of the transaction and the date of settlement it is necessary to decide how to deal with the resulting difference on exchange in the financial statements of the UK company. If there is an intervening balance sheet date, then it is necessary to decide which rate of exchange should be used at the balance sheet date and how the resulting difference on exchange should be treated.

Where there is an overseas branch, subsidiary or associated undertaking, it is usual for the accounting records of the overseas unit to be kept in the local currency: indeed, the local law may require the preparation and publication of financial statements in the local currency. In order to combine the results of the overseas unit with the sterling results of the investing company and those of any similar UK and other overseas units, the financial statements expressed in foreign currency must be translated into sterling.<sup>1</sup> When exchange rates between currencies fluctuate, this need for translation poses two problems. First, it is necessary to decide what rates of exchange are appropriate for the individual assets, liabilities, revenues and expenses in the financial statements of the overseas unit. No matter how this question is answered, the translation process invariably gives rise to differences on exchange. The second problem is therefore how to deal with these differences in the aggregated financial statements.

Until the ASC attempted to standardise the accounting treatment of exchange differences in 1975,<sup>2</sup> professional accountancy bodies in the UK had provided little guidance on how the above questions should be answered. Official pronouncements<sup>3</sup> tended to describe various methods and to emphasise that selection between them is a matter of professional judgement, without providing any guidance as to the principles on which that professional judgement should be based. As a result, many different methods were used in practice.

In this chapter, we look first at accounting for transactions denominated in foreign currencies and then turn our attention to the more complex subject of translating the financial statements of an overseas unit for the purposes of aggregation. The accounting treatment of both topics is presently regulated in the UK by SSAP 20, *Foreign Currency Translation*, issued in April 1983. The ASB is at present working on a replacement for this standard and, to this end, issued FRED 24 *The Effects of Changes in Foreign Exchange Rates and Financial reporting in hyperinflationary economies* in May 2002. FRED 24 has been drafted in an attempt to achieve convergence with a proposed revision of the international accounting standard on this topic, IAS 21 *The Effects of Changes in Foreign Exchange Rates*, as well as with IAS 29 *Financial Reporting in Hyperinflationary Economies*. IAS 21 was last revised in 1993 and the proposed revision of this standard was issued by the IASB as part of its proposed improvements project in May 2002.<sup>4</sup> The IASB has no plans to review IAS 29, which was reformatted in 1994. We shall draw attention to proposed changes at relevant points in the text and in a separate section towards the end of this chapter.

## Accounting for foreign currency transactions

A UK company may purchase fixed assets, stocks or services from an overseas company and may, in addition, sell such items to an overseas company. It may also raise loans denominated in a foreign currency and make investments in the shares of an overseas company. When the amounts involved are expressed in a foreign currency, it will be necessary to translate those amounts into sterling in order to incorporate them into the accounting records of the UK company. The approach that should be adopted is best illustrated by means of a number of examples.

<sup>1</sup> Following the American terminology introduced by ED 21, the term 'conversion' is restricted to the exchange of one currency for another.

<sup>2</sup> ED 16 *Supplement to 'Extraordinary Items and Prior Year Adjustments'*, September 1975.

<sup>3</sup> See, for example, recommendation N 25 of the ICAEW, issued in February 1968.

<sup>4</sup> Exposure Draft of Proposed Improvements to International Accounting Standards, IASB, London, May 2002. This proposes revisions to 12 international accounting standards and was discussed in Chapter 3.

### Example 16.1

Let us consider a UK company, Han Limited, which makes up its accounts to 31 December each year. On 15 September 20X1 it purchased a fixed asset, a machine, from a company in Druroland for 30 000 Druros when the rate of exchange was D3.00 to £1. It paid for this machine on 15 December 20X1 when the rate of exchange was D3.30 to £1.<sup>5</sup>

At the date of purchase, 15 September 20X1, it is necessary to translate the foreign currency amount to record the cost of the machine and the corresponding creditor in sterling. In the absence of an agreed rate of exchange for settlement, in which case the foreign company would bear the risk of any exchange rate movement, or a forward exchange contract, the rate ruling on the date of purchase, that is D3.00 to £1, should be used for this purpose.<sup>6</sup>

20X1				
Sept 15	Dr Machinery – at cost		£10 000	
	Cr Creditor company in Druroland			£10 000
			<u>          </u>	<u>          </u>
	Purchase of machine for D30 000 at exchange rate of D3.00 to £1			

The sterling cost of the machine is £10 000 and it is this amount which will be depreciated over the expected useful life of the asset. No further adjustment to this cost is necessary, whatever subsequently happens to the rate of exchange. However, if the asset is subsequently revalued, it is necessary to translate the revalued amount at the rate of exchange ruling on the date that the new valuation is established.

In order to pay for the machine, Han Limited must arrange with its bankers to convert sterling into Druros. If bank charges are ignored, the payment of D30 000 on 15 December 20X1 will require an amount of £9091 in sterling given that the rate of exchange is D3.30 to £1.

20X1				
Dec 15	Dr Creditor company in Druroland		£9 091	
	Cr Cash			£9 091
			<u>          </u>	<u>          </u>
	Payment of D30 000 converted at D3.30 to £1			

The debt is now settled but when we look at the account of the creditor in the records of Han Limited, it shows a credit balance of £909.

#### Creditor: Company in Druroland

20X1			£	20X1			£
Dec 15	Cash		9 091	Sept 15	Machine		10 000
	Difference:						
	gain on						
	exchange		909				
			<u>    </u>				<u>    </u>
			<u>10 000</u>				<u>10 000</u>

<sup>5</sup> The currencies used in this and the following examples are fictitious currencies, and movements in the rates of exchange are exaggerated to illustrate the principles involved.

<sup>6</sup> FRED 24 proposes that the spot rate at the date of the transaction should always be used except where hedge accounting techniques are used in accordance with a proposed standard based upon FRED 23 *Financial Instruments: Hedge Accounting* (May 2002).

This is a difference on exchange, in this case a gain which arises because sterling has strengthened (that is become more valuable) against the Druro between the date of purchase and the date of settlement. The gain is, of course, realised and SSAP 20 requires that it be credited to the profit and loss account in arriving at the profit or loss from ordinary activities for the accounting year ended 31 December 20X1.

### Example 16.2

In Example 16.1 we assumed that there was no contractually agreed rate of exchange for settlement or forward exchange contract in existence. SSAP 20, Para. 48 states that, where appropriate, contractually agreed rates of exchange *should* be used and *permits* the use of rates of exchange fixed in related or matching forward contracts.<sup>7</sup>

Let us assume that, as before, Han Limited purchased a machine from a company in Druroland for D30 000 on 15 September 20X1. However, let us also assume that, on that date, Han Limited entered into a forward exchange contract with its bank to purchase D30 000 for delivery on 15 December 20X1. Relevant rates of exchange are:

20X1		D to £1
Sept 15	Spot rate	3.00
	Forward rate – 3 months	3.10

Under SSAP 20, the company may record the cost of the machine at one of two amounts:

Cost of machine:	£
Using spot rate – as in Example 16.1	10 000
Using forward rate – 30 000/3.10	9 677

Given that the subsequent payment will be made at the agreed forward exchange rate of D3.10 to £1, the subsequent position will be as follows:

#### (i) Using spot rate

Creditor: Foreign company					
20X1		£	20X1		£
Dec 15	Cash	9 677	Sept 15	Machine	10 000
	Gain on exchange	323			
		<u>10 000</u>			<u>10 000</u>

#### (ii) Using forward rate

Creditor: Foreign company					
20X1		£	20X1		£
Dec 15	Cash	<u>9 677</u>	Sept 15	Machine	<u>9 677</u>

<sup>7</sup> FRED 24 proposes that the spot rate should always be used in these circumstances.

Under the provisions of SSAP 20, Han Limited may choose to record the cost of the machine at either £10 000 or at £9677. Clearly this does little to standardise accounting practice in this area and reflects what may now be regarded as a rather naive approach by SSAP 20. The difference between the spot rate and the forward rate reflects differences between the interest rates in the two countries and it may be argued that the purchase of the machine and the forward exchange contract should be recognised as two different transactions. Under the more sophisticated approach adopted by the US Financial Accounting Standards Board (FASB) Statement No. 52 *Foreign Currency Translation*, the cost of the machine would be calculated using the rate of exchange at the date of purchase, the forward exchange contract would be recorded separately and ‘marked to market’ and the discount or premium under the forward exchange contract would be taken to the profit and loss account as part of the finance charge over the period of the contract. The difference between the US approach and the UK approach will, of course, be more marked where the contracts extend over two or more accounting periods.

SSAP 20 is now becoming rather long in the tooth and, in addition to a number of problems which we address in this chapter, it fails to deal satisfactorily with the various purposes for which forward exchange contracts, currency swaps and currency options are used. However, it has been difficult for the ASB to make progress in this area until the standard on financial instruments has been produced.<sup>8</sup> The proposed revision of SSAP 20, contained in FRED 24, would only permit the use of a forward exchange rate where hedge accounting techniques are used in accordance with the provisions of a standard to be based upon FRED 23 *Financial Instruments: Hedge Accounting*.

### Example 16.3

The next complication which may arise is that the purchase and the payment occur in different accounting years. To illustrate this, let us assume that Han Limited purchased stock from a company in Sudarland for 200 000 sudars on 20 November 20X1 when the rate of exchange was 8 sudars to £1. It subsequently paid for the goods on 15 January 20X2 when the rate of exchange was 10 sudars to £1. The rate of exchange on 31 December 20X1, the intervening balance sheet date, was 9.5 sudars to £1. Following the principles explained in Example 16.1, the purchase would be recorded as follows:

20X1			£25 000	
Nov 20	Dr Stock			
	Cr Creditor – Foreign company		_____	£25 000
		Purchase of stock for 200 000 sudars at 8 sudars to £1.	_____	_____

The cost of stock is recorded at £25 000 and, as before, this figure is not affected by any subsequent changes in the exchange rate. If the stock is still held on 31 December 20X1 it is included in the balance sheet at the lower of cost and net realisable value. Cost will be determined in accordance with the company’s normal accounting policy (e.g. FIFO, average cost, etc.).

When we turn to the creditor, a monetary amount, such an approach is not sensible and, in the absence of either contractually agreed exchange rates for settlement or forward exchange con-

<sup>8</sup> The ASB made precisely this point when, in May 1999, it withdrew the brief exposure draft ‘Amendment to SSAP 20 “Foreign Currency Translation”’ on the grounds that more substantial changes to SSAP 20 were necessary.

tracts, SSAP 20 requires that all monetary items are translated at the closing rate. The closing rate is defined more precisely as follows:

The closing rate is the exchange rate for spot transactions ruling at the balance sheet date and is the mean of the buying and selling rates at the close of business on the day for which the rate is to be ascertained.<sup>9</sup>

On 31 December 20X1 the amount payable to extinguish the creditor is not £25 000 but a lower amount of £21 053, that is 200 000 sudars, translated at the closing rate of exchange on that day – 9.5 sudars to £1. When the liability is adjusted to this figure, the result is a gain on exchange:

Creditor – Foreign company					
20X1		£	20X1		£
Dec 31	Balance c/d	21 053	Nov 20	Stock	25 000
	Profit and loss account				
	– gain on exchange	3 947			
		<u>25 000</u>			<u>25 000</u>
			20X2		
			Jan 1	Balance b/d	21 053

The gain on exchange has occurred because the sterling value of the liability has fallen between 20 November 20X1 and 31 December 20X1 which is due to the strengthening of sterling against the sudar. SSAP 20 considers that, as there is objective evidence for the sterling value of the liability and, as such a gain on a short-term monetary item will shortly be reflected in cash flows, so the profit on exchange is a part of realised profit and hence should be included in the profit or loss from ordinary activities.

The gain recognised in 20X1 could, of course, be fully or partly offset by a loss in the subsequent year if sterling weakens against the sudar between 31 December 20X1 and the date of settlement, 15 January 20X2. The treatment adopted is, of course, consistent with the accruals concept: the gain occurred in 20X1 and is reported in 20X1, while the loss would occur in 20X2 and be reported in 20X2.

In this particular example there is, of course, no loss in 20X2 but a further gain on exchange when settlement is made on 15 January 20X2. Ignoring bank charges, the amount payable in sterling is £20 000 (200 000 sudars ÷ 10) so that the creditor's account appears as follows:

Creditor – Foreign company					
20X2		£	20X2		£
Jan 15	Cash	20 000	Jan 1	Balance b/d	21 053
	Profit and loss account – gain on exchange	1 053			
		<u>21 053</u>			<u>21 053</u>

As in 20X1, the gain on exchange is credited to the profit and loss account, this time for the year ended 31 December 20X2.

SSAP 20 requires similar adherence to the accruals principle in the case of long-term monetary liabilities although, as we shall see, the standard adopts a different stance on the realisation of gains on exchange on such long-term liabilities.

<sup>9</sup> SSAP 20, Para. 41.

**Example 16.4**

Let us suppose that Han Limited raised a long-term loan of 400 000 sudars from a bank in Sudarland on 1 October 20X1 when the rate of exchange was 8 sudars to £1. The loan will be recorded in the accounting records of Han Limited at a figure of £50 000:

20X1			
Oct 1	Dr Cash	£50 000	
	Cr Long-term loan	<u>          </u>	<u>£50 000</u>
	Being loan of 400 000 sudars translated at 8 sudars to £1		

If, on 31 December 20X1, the rate of exchange is 9.5 sudars to £1 then, under the provisions of SSAP 20, the liability must be translated into sterling at that rate to produce a figure of £42 105 (400 000 ÷ 9.5):

Long-term loan (denominated in sudars)					
20X1		£		20X1	£
Dec 31	Balance c/d	42 105		Oct 1	Cash
	Profit and loss account – gain on exchange	<u>7 895</u>			<u>50 000</u>
		<u>50 000</u>			<u>50 000</u>
				20X2	
				Jan 1	Balance b/d
					42 105

Restating the sterling liability at this figure produces a gain on exchange of £7895 and SSAP 20 requires that this be reported as part of the 'ordinary' profits of Han Limited.

Some accountants would argue that such a gain is realised on the grounds that there is objective evidence, in the form of an officially published exchange rate, that it actually occurred in 20X1. Others would argue that, because it relates to a long-term item which has not been repaid at the balance sheet date, the gain may be reversed by subsequent exchange rate movements before repayment and is therefore not realised at the balance sheet date. These two views reflect the lack of consensus on the precise meaning of realisation, which was discussed in Chapter 4.

Although SSAP 20 takes the view that exchange gains on unsettled short-term monetary items are realised, it takes the view that such gains on unsettled long-term monetary items are unrealised.<sup>10</sup> In the authors' view, this is an extremely uncomfortable position, for it may result in a situation where a gain on a short-term item will be treated as realised even though we may know, at the time of preparing the financial statements, that it has subsequently been reversed, whereas a gain on a long-term item, where we have no such certain knowledge of reversal, will be treated as unrealised. The ASC appears to have adopted different definitions of realisation for short-term and long-term items. In the former case, the existence of an objective exchange rate seems crucial, no matter what happens to the exchange rate subsequently. In the latter case, the existence of the objective exchange rate seems unimportant and uncertainty about the ultimate cash

<sup>10</sup> SSAP 20, Para 65.

payable appears to be dominant. Among such confusion, we should perhaps be thankful that, rightly or wrongly, there is little disagreement among accountants that the SSAP 20 view that all exchange losses on unsettled monetary items, whether short-term or long-term, are realised.

Given the ASC's conclusion that exchange gains on unsettled long-term monetary items are unrealised, many accountants argue that the prudence concept dictates that such gains should not be included in the profit and loss account. Indeed, they may quote statutory support for their argument in that the Companies Act 1985 specifically states that: 'only profits realised at the balance sheet date shall be included in the profit and loss account'.<sup>11</sup> However, the law permits directors to depart from this principle if there are special reasons, provided that the notes to the accounts give particulars of the departure, the reason for it and its effect.<sup>12</sup> SSAP 20 considers that such a departure from the realisation principle is essential if exchange gains and losses are to be treated symmetrically in accordance with the accruals principle. Thus, in contravention of SSAP 2, which was the relevant standard when SSAP 20 was issued, SSAP 20 requires that the accruals concept takes precedence over the prudence concept.<sup>13</sup> Hence, in the same way that exchange losses on long-term liabilities during the period are debited to the profit and loss account, so exchange gains for the period are credited to the profit and loss account.

Relevant disclosure must be made. It would also seem to be necessary to remove such unrealised profits, credited in profit and loss accounts, when calculating legally distributable profits. However, as we have seen in Chapter 4, the ASB has been attempting to change the concept of realisation to include such gains on exchange but whether this approach would be acceptable to the courts remains an open question.

### Example 16.5

It is possible for a UK company to raise a foreign currency loan which it then invests in the shares of an overseas company. The loan and investment may be in the same currency or, alternatively, the loan may be raised in one currency while the investment is made in a country with a different currency. For ease of exposition we shall assume that only one currency is involved.

Let us assume that Han Limited raised a long-term loan of 300 000 Ruritanian dollars (R\$) on 1 October 20X1 when the rate of exchange was R\$1.5 to £1. It immediately invested the proceeds in the shares of a Ruritanian company so that, if we ignore the receipt and payment of cash, the summarised journal entry will appear as follows:

20X1			
Oct 1	<i>Dr</i> Investment in Ruritanian company	£200 000	
	<i>Cr</i> Long-term loan (Ruritanian)	<u>£200 000</u>	
	Being loan of R\$300 000 raised to finance investment in Ruritanian company translated at R\$1.5 to £1		

<sup>11</sup> Companies Act 1985, Schedule 4, Para. 12(a).

<sup>12</sup> Companies Act 1985, Schedule 4, Para. 15.

<sup>13</sup> SSAP 2, Para. 14(b): 'provided that where the accruals concept is inconsistent with the "prudence" concept, the latter prevails'. SSAP 2 has subsequently been replaced by FRS 18 *Accounting Policies* (December 2000) and, as we have seen in Chapter 2, the ASB is playing down the role of realisation, as traditionally understood, in the recognition process.



The investment may constitute the Ruritanian company a subsidiary, an associate, a joint venture or merely a simple investment. Whichever is the case, the treatment in the accounting records of Han Limited will be exactly the same, although the treatment in any consolidated financial statements will differ.

Let us assume that the rate of exchange on 31 December 20X1 is R\$1.4 to £1. If Han Limited follows the rules explained in previous examples, certain difficulties will arise. Unless there had been a permanent fall in the value of the investment, the investment would be shown in the balance sheet at its cost of £200 000 while the loan, a monetary amount, would have to be translated at the closing rate of exchange and shown as a liability of £214 286 ( $R\$300\,000 \div 1.4$ ). Restating the loan at this amount produces a loss on exchange of £14 286 which would have to be charged to the profit and loss account.

**Long-term loan  
(denominated in Ruritanian dollars)**

20X1			20X1		
Dec 31	Balance c/d	£214 286	Oct 1	Cash	£200 000
			Dec 31	Profit and loss account	
				– loss on exchange	14 286
		214 286			214 286

It may be argued that to make such a one-sided adjustment is misleading. Because of the adherence to historical cost accounting, the investment is retained at its historical cost in sterling while the liability is shown at its current sterling equivalent. SSAP 20 recognises the logic of this argument and *permits*, although it does not *require*, Han Limited to translate the investment at the closing rate of exchange rather than at the historical rate of exchange, thus:

**Investment in Ruritanian company**

20X1			20X1		
Oct 1	Cost	£200 000	Dec 31	Balance c/d, $300\,000 \div 1.4$	£214 286
Dec 31	Gain on exchange	14 286			
		214 286			214 286

This produces an absurd sterling figure for the investment, a figure which is neither the historical cost in sterling nor a current value in sterling, but what has been achieved is the creation of a gain on exchange which may be used to offset the loss on exchange on the long-term loan. In this case the gain on the investment is exactly equal to the loss on the long-term loan and one may be offset against the other without any need to charge any gain or loss to the profit and loss account. If the loan and investment were for different currency amounts or in different foreign currencies, this equality of gain and loss is unlikely to exist. In such a case SSAP 20 requires that any exchange gain or loss on the investment should be taken direct to reserves. Any loss or gain on the loan should then be offset against the gain or loss on the investment but, if the exchange loss/gain on the loan exceeds the gain/loss on the investment, then the excess must be charged/credited to the profit and loss account.

The final problem addressed in this example is the extent to which such an offset should be permitted. Should it be necessary to identify a particular loan with a particular investment? Should the offset be restricted to situations where the loan and investment are in the same currency? Where a large company has many loans denominated in various foreign currencies and

many investments in various foreign currencies, should a global approach be permitted whereby any gains are set off against any losses? What criteria should be laid down to govern the use of this offset arrangement?

After receiving many different recommendations from those who commented on the offset arrangements included in ED 27, SSAP 20 specified the following conditions:<sup>14</sup>

- (a) in any accounting period, exchange gains or losses arising on the borrowings may be offset only to the extent of exchange differences arising on the equity investments;
- (b) the foreign currency borrowings, whose exchange gains or losses are used in the offset process, should not exceed, in the aggregate, the total amount of cash that the investments are expected to be able to generate, whether from profits or otherwise; and
- (c) the accounting treatment adopted should be applied consistently from period to period.

This must be recognised as a pragmatic solution to what is often a very difficult question to answer in practice: 'To what extent do foreign currency loans provide a hedge against foreign equity investments?'

Why the offset arrangement should apply to equity investments but not to other investments, such as a readily saleable property overseas, seems difficult to justify and displays the ad hoc nature of the UK approach to standard setting in the past. The topic of hedge accounting has now been addressed in a more systematic way in FRED 23 *Financial Instruments: Hedge Accounting*, issued in May 2002. As we saw in Chapter 8, this proposes that there should be both a pre-designated hedge and an effective hedge for the use of hedge accounting to be permissible.

## Summary

The accounting treatment of foreign currency transactions may be summarised as follows:

### 1 Non-monetary assets shown on basis of historical cost

Non-monetary assets shown at an amount based upon historical cost should be translated at the exchange rate at the date on which the historical cost was established. However, if there is a contractually agreed exchange rate for settlement, this *should* be used and, if there are related or matching forward exchange contracts in respect of trading transactions, the rates of exchange specified in those contracts *may* be used.<sup>15</sup> The cost of non-monetary assets purchased is not affected by subsequent changes in the exchange rate except where a company exercises the option to use the closing rate to translate the cost of foreign equity investments financed by foreign currency borrowings.

### 2 Non-monetary assets shown on basis of a revalued amount

Non-monetary assets which have been revalued, either upwards under the alternative accounting rules or downwards under the rules on impairment, should be translated at the rate ruling when the valuation was established.

<sup>14</sup> SSAP 20, Para. 51. FRED 24 does not contain any provisions permitting the use of such offset arrangements. Such offset arrangements would only be possible where hedge accounting is used in accordance with a standard based upon FRED 23 *Financial Instruments: Hedge Accounting* (May 2002).

<sup>15</sup> As we have explained above, FRED 24 proposes that, in future, the spot rate should be used, except where hedge accounting is used in accordance with a standard to be based upon the proposals of FRED 23.

### 3 Unsettled monetary items

Unsettled monetary items should be translated at the closing rate, unless there is a contractually agreed exchange rate for settlement, in which case the latter *should* be used. If there are related or matching forward contracts in respect of trading transactions, the rates of exchange specified in those contracts *may* be used.

### 4 Treatment of exchange gains and losses

All exchange gains and losses on settled and unsettled transactions should be credited or charged to the profit and loss account as part of the profit from ordinary activities (unless they relate to transactions which are treated as extraordinary items) but note that, according to SSAP 20, gains on unsettled long-term monetary items are not realised and hence it would seem necessary to make an adjustment when calculating the legally distributable profit of a company. Whether the legal definition of realised profits has progressed sufficiently to be consistent with the desire of the ASB to define such gains as realised remains an open question.

## Translation of the financial statements of an overseas subsidiary

Where a UK company has an overseas branch, subsidiary or associated undertaking which keeps its records in a foreign currency, it is necessary to translate financial statements in order to be able to combine the figures with those of the UK company or group. In this chapter we assume that the overseas unit is a subsidiary, although readers will appreciate that similar principles are appropriate for a foreign branch, associate or joint venture.

As explained in the first section of this chapter, when exchange rates are changing, the existence of an overseas subsidiary requires us to answer two questions. First, what rate of exchange should be used to translate the individual items in the accounts of the overseas subsidiary? Second, how should the resulting differences on exchange be treated in the accounts?

Turning first to the balance sheet of the overseas subsidiary, there are at least two rates of exchange which could be applied to each asset or liability. These are the historical rate or the closing rate. The historical rate is the rate of exchange ruling at the date the transaction occurred or, where appropriate, the rate of exchange ruling at the date of a subsequent revaluation. The closing rate is the rate of exchange ruling on the balance sheet date.

The major methods of translation which have been used employ a combination of these rates, and Table 16.1 illustrates how four methods deal with the major categories of asset and liability.

Under the current/non-current method, current assets and liabilities are translated at the closing rate while fixed assets and long-term liabilities are translated at the appropriate historical rates.

Under the monetary/non-monetary method, monetary assets and liabilities are translated at the closing rate while non-monetary assets are translated at the historical rate.

Under the temporal method, which is discussed in more detail later in this chapter, the rate of exchange depends upon the basis of valuation used in the balance sheet of the overseas subsidiary. If items are shown at current value, which is automatically the case with

**Table 16.1 Major methods of translation**

	<i>Current/ non-current</i>		<i>Monetary/ non-monetary</i>		<i>Temporal</i>		<i>Closing rate</i>	
	<i>H</i>	<i>C</i>	<i>H</i>	<i>C</i>	<i>H</i>	<i>C</i>	<i>H</i>	<i>C</i>
<i>Assets</i>								
<i>Fixed assets</i>								
At cost less depreciation	x		x		x			x
At current value	x		x				x	x
<i>Current assets</i>								
<i>Stock</i>								
At cost		x	x		x			x
At current value		x	x				x	x
Debtors		x		x			x	x
Cash		x		x			x	x
<i>Liabilities</i>								
Long-term loans	x			x			x	x
Current liabilities		x		x			x	x

H = historical rate; C = closing rate.

monetary assets and liabilities, the closing rate is used.<sup>16</sup> Where items are shown at a figure based upon historical cost, the historical rate is appropriate, and where items are shown at a figure based on a valuation, the rate of exchange at the date of the valuation is used.

From Table 16.1, it can be seen that there is very little difference between the temporal method and the monetary/non-monetary method within the context of historical cost accounts. The most frequent instance of a difference occurs where stock is shown at net realisable value.

Under the closing rate method all assets and liabilities are translated at the closing rate of exchange.

When we turn to the profit and loss account, three possible translation rates may be distinguished:

- (a) historical rates, that is rates of exchange specific to each transaction;
- (b) average rate ruling during the year;<sup>17</sup>
- (c) closing rate on the balance sheet date.

Under the first of these, the appropriate rate of exchange is that ruling on the date of the transaction. So, if depreciation is based upon a historical cost, the rate of exchange at the date of acquisition of the asset is appropriate. If depreciation is based upon a revalued amount, the rate of exchange at the date of revaluation is appropriate. Where revenues and other expenses arise on a particular day, the rate of exchange on that day is appropriate. In

<sup>16</sup> This statement is only true within the confines of traditional financial statements. Arguably the current value of a monetary item should be its present value, which takes into account interest for the time period until maturity of the debt.

<sup>17</sup> This should, of course, be an appropriate weighted average, reflecting the way in which the currencies have moved during the year, and not merely a simple average of the opening and closing rates.

practice, for recurrent items such as wages, power, directors' remuneration, etc., an average rate is used as an approximation to the historical or specific rate of exchange.

Under the second option, an average rate of exchange is used in its own right, whereas with the third approach the closing rate of exchange is used for all items in the profit and loss account.

When we consider rates of exchange applied to balance sheet items and profit and loss account items, the following combinations have been found:

<i>Balance sheet</i>	<i>Profit and loss account</i>
Current/non-current	Historical or average
Monetary/non-monetary	Historical or average
Temporal	Historical or average
Closing rate	Average or closing rate

Thus there has been a wide choice in practice as to the appropriate combinations of rates of exchange.

Whichever combinations are used, there will inevitably be differences on exchange and there are various ways of dealing with them in the consolidated accounts:

- (i) Include as part of profit or loss from ordinary activities.
- (ii) Treat as a movement on reserves.
- (iii) Some combination of the above.

When the choice between relevant rates of exchange is coupled with the choice between the various ways of dealing with differences on exchange, there are a large number of possible combinations.

## The SSAP 20 solution

ED 21, wrongly entitled, *Accounting for Foreign Currency Transactions*,<sup>18</sup> was issued in September 1972 as the first comprehensive attempt towards standardising the accounting treatment of foreign currencies in the UK. It permitted companies to use either the temporal method or the closing rate method and laid down rules on the rates of exchange to be used for translation and the treatment of the differences on exchange.

If ED 21 had become an SSAP, it would certainly have reduced the choice of methods available to companies by outlawing the use of the current/non-current and the monetary/non-monetary methods. However, when applied to historical cost accounts, the temporal method and the closing rate method usually produce very different results and, hence, the degree of standardisation proposed by ED 21 was limited and the exposure draft was heavily criticised.

The subsequent ED 27 *Accounting for Foreign Currency Translations*, issued in November 1980, and SSAP 20 *Foreign Currency Translation*, issued in April 1983, require the use of the closing rate/net investment method in the vast majority of cases although, as we shall see below, there are circumstances where the use of the temporal method is required.

<sup>18</sup> Wrongly entitled because it dealt almost exclusively with foreign currency translation and gave little attention to foreign currency transactions.

The words ‘net investment’ were added to the title of the method to indicate the view which the method implicitly takes of the investment in the overseas subsidiary. The majority of overseas subsidiaries are thought to have a large amount of autonomy and to operate primarily within the economic environment of an overseas country using the currency of that country. Using the terminology of the US FASB Statement No. 52, the ‘functional currency’ of the overseas subsidiary is usually that of the country in which it operates.<sup>19</sup> The holding company is therefore regarded as having an investment in the net assets of the subsidiary rather than in its individual assets and liabilities. It follows that only the net investment is at risk from movements in the exchange rate and, as we shall see, use of the closing rate/net investment method is consistent with this position.

In some cases, however, the overseas subsidiary may not have significant autonomy. Thus the affairs of the overseas company may be closely linked with those of the parent company, and its ‘functional currency’ may be sterling rather than the local currency. In such a case, SSAP 20 requires that the foreign financial statements be translated using the temporal method so that the results are included as if the transactions had been undertaken by the parent company itself.

SSAP 20 provides little guidance on how to recognise situations where the temporal method is appropriate and, given the variety of situations found in practice, it has to be recognised that it will sometimes be extremely difficult to decide which method of translation to apply.

To summarise, under the provisions of SSAP 20, it is expected that the vast majority of companies should use the closing rate/net investment method while a small number of companies will be required to use the temporal method. It is therefore essential for us to look at both methods.

In the following two sections of this chapter, we shall examine the principles of the closing rate/net investment and temporal methods using simple examples. We shall then compare and contrast the two methods before presenting a more complex example of the closing rate/net investment method.

## Closing rate/net investment method

As we have seen, any method for translating the financial statements of an overseas subsidiary must specify which rates of exchange are to be used for the various items in the statements of that subsidiary and how the resulting differences on exchange are to be treated in the consolidated financial statements.

The SSAP 20 version of the closing rate/net investment method lays down the following rules:

- (a) Assets and liabilities in the balance sheet of the overseas subsidiary are to be translated at the closing rate. This, of course, determines the amount of the shareholders’ interest although, as we shall see, it may be sensible to translate the share capital and components of reserves at various rates of exchange.
- (b) Profit and loss account items are to be translated at either the average rate or the closing rate.<sup>20</sup>
- (c) Differences on exchange arising on translation are to be taken direct to reserves.

<sup>19</sup> See Appendix A to Statement of Financial Accounting Standard No. 52 for factors which should be taken into account in determining the functional currency of an overseas subsidiary.

<sup>20</sup> The forerunner to SSAP 20, ED 27, proposed the use of the average rate for profit and loss account items and, although this is standard international practice, the comments on ED 27 showed that there was considerable opposition to the exclusive use of an average rate in the UK. In spite of this opposition, FRED 24 (May 2002) follows the international standard by proposing that revenues and expenses should be translated at the exchange rates at the dates of transactions. In practice, this will usually require the use of average rates of exchange for many items.

When the rate of exchange between sterling and the overseas currency is fluctuating, a difference on exchange will arise in respect of the opening net assets of the subsidiary, which are translated at a different rate at the year end from that used at the beginning of the year. A second difference will arise if the average rate of exchange is used to translate profit and loss account items for, in such a case, the increase in net assets as shown by the retained profit or loss is translated at the average rate, whereas the resulting net assets are translated at the closing rate in the balance sheet. Both differences on translation are treated as movements on reserves.

Let us illustrate the method by means of a simple example.

### Example 16.6

Widening Horizons Limited, a UK company which owns and rents out properties, established a wholly owned overseas subsidiary, Foreign Venture Limited, on 31 December 20X1. Widening Horizons Limited subscribed £100 000 in cash for one million shares of 1 groucho each. On 31 December 20X1, the rate of exchange between currencies was 10 grouchos to £1.

Foreign Venture Limited immediately raised a long-term loan of 500 000 grouchos and purchased freehold land and buildings, suitable for renting, at a cost of 1 200 000 grouchos.

After these transactions, the opening balance sheet of the new subsidiary, in both foreign currency and sterling, is therefore as given below:

<b>Foreign Venture Limited</b>			
<b>Opening balance sheet on 1 January 20X2</b>			
	Grouchos	Rate of exchange (grouchos to £1)	£
Freehold land and buildings			
At cost	1 200 000	10	120 000
Short-term monetary assets			
Cash	<u>300 000</u>	10	<u>30 000</u>
	1 500 000		150 000
less Long-term loan	<u>500 000</u>	10	<u>50 000</u>
	<u>1 000 000</u>		<u>100 000</u>
Share capital			
1 000 000 shares of 1 groucho	<u>1 000 000</u>	10	<u>100 000</u>

At this date only one rate of exchange is appropriate; it qualifies as both the historical rate and the closing rate. Once the balance sheet is translated into sterling, it is possible to match the cost of the investment shown in the records of Widening Horizons Limited at £100 000 against the share capital of Foreign Venture Limited to produce neither positive nor negative goodwill on consolidation.

During the following year to 31 December 20X2, Foreign Venture Limited collects rentals and incurs expenses with the result that its profit and loss account for the year and balance sheet on 31 December 20X2 are as follows:

**Foreign Venture Limited**  
**Profit and loss account for the year ended 31 December 20X2**

	Grouchos	Grouchos
Rentals received		400 000
<i>less</i> Expenses		
Management expenses	115 000	
Depreciation of buildings	50 000	
Interest on long-term loan	<u>75 000</u>	<u>240 000</u>
Profit before taxation		160 000
<i>less</i> Taxation payable		<u>60 000</u>
Retained profit for year		<u><u>100 000</u></u>

**Balance sheet on 31 December 20X2**

	Grouchos
Freehold land and buildings	
At cost	1 200 000
<i>less</i> Depreciation	<u>50 000</u>
	1 150 000
Short-term net monetary assets (debtors plus cash less creditors)	<u>450 000</u>
	1 600 000
<i>less</i> Long-term loan	<u>500 000</u>
	<u><u>1 100 000</u></u>
Share capital	
1 000 000 shares of 1 groucho each	1 000 000
Retained profit	<u>100 000</u>
	<u><u>1 100 000</u></u>

Assuming that the relevant rates of exchange between grouchos and sterling are as given below, we may proceed to translate the financial statements in accordance with the closing rate/net investment method:

	<i>Grouchos to £1</i>
1 January 20X2	10
Average for year to 31 December 20X2	8
31 December 20X2	6

The average rate, rather than the closing rate, has been applied in the profit and loss account.



**Foreign Venture Limited**  
**Profit and loss account for the year ended 31 December 20X2**

	Grouchos	Rate of exchange	£
Rentals received	400 000	8	50 000
<i>less</i> Expenses			
Management expenses	115 000	8	14 375
Depreciation of buildings	50 000	8	6 250
Interest on long-term loan	75 000	8	9 375
	<u>240 000</u>		<u>30 000</u>
Profit before taxation	160 000		20 000
<i>less</i> Taxation payable	60 000	8	7 500
Retained profit for year	<u>100 000</u>		<u>12 500</u>

**Balance sheet on 31 December 20X2**

	Grouchos	Rate of exchange	£
Freehold land and buildings			
At cost	1 200 000	6	200 000
less Depreciation	50 000	6	8 333
	<u>1 150 000</u>		<u>191 667</u>
Short-term net monetary assets	450 000	6	75 000
	<u>1 600 000</u>		<u>266 667</u>
<i>less</i> Long-term loan	500 000	6	83 333
	<u>1 100 000</u>		<u>183 334</u>
Shareholders' interest:			
Share capital	1 000 000	10(HR)	100 000
Retained profits	100 000	Per P and L a/c	12 500
	<u>1 100 000</u>		<u>112 500</u>
Difference on exchange	–	Balance	70 834
	<u>1 100 000</u>		<u>183 334</u>

*Note:* HR = historical rate.

The treatment of share capital merits special attention. It has been translated at the historical rate of exchange, that is the rate ruling at the date of acquisition.

If we assume for a moment that share capital had been translated at the closing rate of exchange of 6 grouchos to £1, this would have produced a sterling figure of £166 667 instead of the £100 000 shown. This would have reduced the difference on exchange, the balancing figure, by £66 667, but consideration must also be paid to the subsequent consolidation of the subsidiary's accounts with those of the parent company. In the consolidation workings the cost of the investment, £100 000, would be matched with the share capital of the subsidiary, £166 667, when translated at closing rate, to produce negative goodwill on consolidation of £66 667. This is clearly nonsensical since there was no goodwill on acquisition and the apparent negative goodwill would only have arisen because of the change in the exchange rate. In other words the £66 667 is a difference on exchange.

The wisdom of the method used in the example may now be seen. The application of the historical rate to share capital and, in a more general case, to pre-acquisition reserves as well,

means, first, that the total difference emerges in the translation of the subsidiary's balance sheet and, second, that there is no risk that an erroneous adjustment will be made to the goodwill on consolidation. We shall return to this topic in the more comprehensive example of the closing rate/net investment method later in the chapter where positive goodwill on acquisition emerges. Once we recognise positive goodwill, it is necessary to consider where the goodwill is situated, for this determines whether it should or should not be retranslated at each subsequent balance sheet date.

The total difference on exchange, a gain of £70 834, must be credited to consolidated reserves. It has arisen for two reasons. First, the opening net assets were translated at one rate on 1 January 20X2 and at a different rate on 31 December 20X2. Second, the increase in net assets, the retained profit, has been translated at one rate in the profit and loss account and at a different rate in the closing balance sheet. We may analyse the difference as follows:

#### Analysis of difference on exchange

	Grouchos	Opening balance sheet (10 grouchos to £1) £	Closing balance sheet (6 grouchos to £1) £	Difference £
Opening net assets				
Freehold land and buildings	1 200 000	120 000	200 000	80 000 (gain)
Cash	300 000	30 000	50 000	20 000 (gain)
	<u>1 500 000</u>	<u>150 000</u>	<u>250 000</u>	<u>100 000</u>
less Long-term loan	500 000	50 000	83 333	33 333 (loss)
	<u>1 000 000</u>	<u>100 000</u>	<u>166 667</u>	<u>66 667</u>
Increase in net assets during year				
Retained profit for year				
Per profit and loss account, 100 000 grouchos at 8 grouchos to £1			12 500	
Per closing balance sheet (part of net monetary assets), 100 000 grouchos at 6 grouchos to £1			16 667	4 167 (gain)
Total gain on exchange				<u>70 834</u>

It is hoped that the above analysis helps to explain why the words 'net investment' have been added in the name 'closing rate/net investment' method. The loss on the opening long-term loan has effectively been offset against the gains on the opening assets so that it is only the gain on the opening *net* assets which is taken to reserves with the second part of the gain in respect of the retained profit for the year. If the closing rate had been used for profit and loss account items, this second part of the gain would not arise.

Let us assume that the financial statements of the parent company are as given in the left-hand column below. Provided there are no unrealised intercompany profits or similar consolidation adjustments, we may proceed to consolidate by adding the figures for the parent

company with the translated figures for the overseas subsidiary, treating the difference on exchange of £70 834 as a movement on reserves and disclosing it in the Statement of Total Recognised Gains and Losses.

**Widening Horizons Limited**  
**Workings for consolidated profit and loss account**  
**for the year ended 31 December 20X2**

	<i>Widening Horizons Limited</i>	<i>Foreign Venture Limited</i>	<i>Consolidated</i>
	£	£	£
Rentals received	500 000	50 000	550 000
<i>less</i> Expenses			
Management expenses	120 000	14 375	134 375
Depreciation	60 000	6 250	66 250
Loan interest	100 000	9 375	109 375
	<u>280 000</u>	<u>30 000</u>	<u>310 000</u>
Profit before taxation	220 000	20 000	240 000
<i>less</i> Taxation	<u>100 000</u>	<u>7 500</u>	<u>107 500</u>
	120 000	12 500	132 500
<i>less</i> Dividends proposed	<u>60 000</u>	<u>–</u>	<u>60 000</u>
Retained profit for year	<u>60 000</u>	<u>12 500</u>	<u>72 500</u>

**Workings for movement on reserves for year to 31 December 20X2**

	<i>Widening Horizons Limited</i>	<i>Foreign Venture Limited</i>	<i>Consolidated</i>
	£	£	£
Reserves on 1 January 20X2	420 000	–	420 000
<i>add</i> Retained profit for year	60 000	12 500	72 500
Gain on exchange	<u>–</u>	<u>70 834</u>	<u>70 834</u>
Reserves on 31 December 20X2	<u>480 000</u>	<u>83 334</u>	<u>563 334</u>

**Consolidated statement of total recognised gains and losses**  
**for the year ended 31 December 20X2**

	£
Profit for the financial year	132 500
Gain on exchange	<u>70 834</u>
Total recognised gains for the financial year	<u>203 334</u>

**Workings for consolidated balance sheet on 31 December 20X2**

	<i>Widening Horizons Limited</i> £	<i>Foreign Venture Limited</i> £	<i>Consolidated</i> £
Freehold land and buildings			
At cost	2 000 000	200 000	2 200 000
less Depreciation	<u>350 000</u>	<u>8 333</u>	<u>358 333</u>
	1 650 000	191 667	1 841 667
Investment in Foreign Venture Limited – at cost	100 000	–	–
Goodwill on consolidation – at cost	–	–	–
Short-term net monetary assets	<u>330 000</u>	<u>75 000</u>	<u>405 000</u>
	2 080 000	266 667	2 246 667
less Long-term loan	<u>1 000 000</u>	<u>83 333</u>	<u>1 083 333</u>
	<u>1 080 000</u>	<u>183 334</u>	<u>1 163 334</u>
Share capital	600 000	100 000	600 000
Reserves	<u>480 000</u>	<u>83 334</u>	<u>563 334</u>
	<u>1 080 000</u>	<u>183 334</u>	<u>1 163 334</u>

Once the translation has been undertaken, preparation of the consolidated financial statements poses only the normal problems faced when consolidating a UK subsidiary and preparing financial statements using the formats required by company law.

## Temporal method

This method was first proposed by an American, Leonard Lorenson, in a study published by the American Institute of Certified Public Accountants.<sup>21</sup> It was the only method permitted by the US FASB in their standard on the subject, Financial Accounting Standard (FAS) 8, which was issued in October 1975. However, this standard attracted a great deal of criticism in the USA and has now been replaced by FAS 52, issued in December 1981, which, like SSAP 20 and IAS 21, favours the use of the closing rate method in most, but not all, circumstances.

Under the temporal method, the rates of exchange to be used for translation are determined by the basis of measurement used for the various items in the financial statements of the overseas subsidiary.

In the balance sheet, assets which are shown at a figure based on historical cost are translated at the relevant historical rate; assets shown on the basis of a revalued amount at some past date are translated at the rate of exchange ruling when the revalued amount was established; assets and liabilities shown at a current value, which includes all monetary assets and liabilities, are translated at the closing rate.

In the profit and loss account the rate of exchange used is similarly determined by the underlying basis of measurement: depreciation based on historical cost is translated at the

<sup>21</sup> L. Lorenson, *Reporting Foreign Operations of US Companies in US Dollars*, Accounting Research Study No. 12, AICPA, New York, 1972.

relevant historical rate; revenues and expenses which have accrued over the year are translated at an average rate; while revenues and expenses which relate to amounts established in previous years or to merely a part of the current year are translated at a specific rate or an appropriate average rate.

It follows that more extensive records are necessary than those required for use of the closing rate/net investment method.

Under the SSAP 20 version of the temporal method, all differences on exchange are credited or charged to the consolidated profit and loss account as a part of the ordinary profits for the year.<sup>22</sup>

Let us examine the temporal method by applying it to the same simple facts used in the previous example.

### Example 16.7

The opening balance sheet of Foreign Venture Limited, the new subsidiary established by Widening Horizons Limited, in both grouchos and sterling is repeated below:

<b>Foreign Venture Limited</b>			
<b>Balance sheet on 1 January 20X2</b>			
	<i>Grouchos</i>	<i>Rate of exchange</i>	£
Freehold land and buildings			
At cost	1 200 000	10	120 000
Short-term monetary assets			
Cash	<u>300 000</u>	10	<u>30 000</u>
	1 500 000		150 000
less Long-term loan	<u>500 000</u>	10	<u>50 000</u>
	<u>1 000 000</u>		<u>100 000</u>
Share capital	<u>1 000 000</u>	10	<u>100 000</u>

Widening Horizons Limited paid £100 000 for the investment and hence at the date of acquisition there is no goodwill on consolidation.

The accounts of Foreign Venture Limited for the year ended 31 December 20X2 are given below. The left-hand column gives the financial statements in foreign currency while the right-hand column shows the results translated into sterling. For ease of reference, the relevant exchange rates are repeated:

	<i>Grouchos to £1</i>
1 January 20X2	10
Average for year to 31 December 20X2	8
31 December 20X2	6

In the profit and loss account the historical rate, that ruling when the land and buildings were purchased on 31 December 20X1, is applied to depreciation. For other items the average rate is an appropriate approximation to the historical rate. A simple average of the opening and closing

<sup>22</sup> Other variants of the temporal method exist. Thus some versions require the amortisation of unrealised gains or losses over the remaining life of the asset or liability.

rates would only be appropriate if the revenue and expenses arose reasonably evenly over the year and the rate of exchange moved reasonably evenly. Otherwise an appropriate weighted average would have to be used.

**Foreign Venture Limited**  
**Profit and loss account for the year ended 31 December 20X2**

	<i>Grouchos</i>	<i>Rate of exchange (see note)</i>	£
Rentals received	400 000	8(AR)	50 000
<i>less Expenses</i>			
Management expenses	115 000	8(AR)	14 375
Depreciation of buildings	50 000	10(HR)	5 000
Interest on long-term loan	75 000	8(AR)	9 375
	<u>240 000</u>		<u>28 750</u>
Profit before taxation	160 000		21 250
<i>less Taxation payable</i>	<u>60 000</u>	8(AR)	<u>7 500</u>
Retained profit for year	<u>100 000</u>		<u>13 750</u>

Note: AR = average rate, HR = historical rate.

In the balance sheet, the freehold land and buildings, shown at depreciated historical cost, are translated at the historical rate of exchange on 1 January 20X2 while all monetary assets and liabilities are translated at the closing rate.

As explained in the previous example, it is sensible to translate the share capital and, in a more general case, any pre-acquisition reserves at the historical rate in order to maintain the goodwill on acquisition at its 'historical cost' of zero in the consolidated financial statements. It is also necessary to translate the retained profit for the year at the same sterling figure as shown for retained profit in the profit and loss account. When this has been done the difference on exchange emerges as the balancing figure.

**Balance sheet on 31 December 20X2**

	<i>Grouchos</i>	<i>Rate of exchange (see note)</i>	£
Freehold land and buildings			
At cost	1 200 000	10(HR)	120 000
<i>less Depreciation</i>	<u>50 000</u>	10(HR)	<u>5 000</u>
	1 150 000		115 000
Short-term net monetary assets	<u>450 000</u>	6(CR)	<u>75 000</u>
	1 600 000		190 000
<i>less Long-term loan</i>	<u>500 000</u>	6(CR)	<u>83 333</u>
	<u>1 100 000</u>		<u>106 667</u>
Shareholders' interest:			
Share capital			
1 000 000 shares of 1 groucho each	1 000 000	10(HR)	100 000
Retained profit			
Per profit and loss account	<u>100 000</u>	Actual	<u>13 750</u>
	1 100 000		113 750
Difference on exchange	<u>–</u>	Balance	<u>(7 083)</u>
	<u>1 100 000</u>		<u>106 667</u>

Note: HR = historical rate, CR = closing rate.

As explained above, SSAP 20 requires any difference on exchange arising under the temporal method to be included in the ordinary profits and losses of the group.

If we assume that the financial statements of the parent company are as given in the left-hand column below and that there are no consolidation adjustments for such matters as unrealised intercompany profits, we may proceed to consolidate. This requires adding the figures for the parent company with the sterling figures for the overseas subsidiary, treating the difference on exchange as part of the ordinary profits. We have not produced a Statement of Total Recognised Gains and Losses, as there are no gains/losses except for the profit for the financial year.

**Widening Horizons Limited**  
**Workings for consolidated profit and loss account for the year ended**  
**31 December 20X2**

	<i>Widening Horizons Limited</i> £	<i>Foreign Venture Limited</i> £	<i>Consolidated</i> £
Rentals received	500 000	50 000	550 000
<i>less Expenses</i>			
Management expenses	120 000	14 375	134 375
Depreciation	60 000	5 000	65 000
Loan interest	100 000	9 375	109 375
	<u>280 000</u>	<u>28 750</u>	<u>308 750</u>
Revenue less expenses	220 000	21 250	241 250
<i>less Loss on exchange</i>	<u>–</u>	<u>7 083</u>	<u>7 083</u>
Profit before taxation	220 000	14 167	234 167
<i>less Taxation</i>	<u>100 000</u>	<u>7 500</u>	<u>107 500</u>
	120 000	6 667	126 667
<i>less Dividends proposed</i>	<u>60 000</u>	<u>–</u>	<u>60 000</u>
Retained profit for the year	<u><u>60 000</u></u>	<u><u>6 667</u></u>	<u><u>66 667</u></u>

**Workings for movement on reserves for year to 31 December 20X2**

	<i>Widening Horizons Limited</i> £	<i>Foreign Venture Limited</i> £	<i>Consolidated</i> £
Retained profits on 1 January 20X2	420 000	–	420 000
<i>add Retained profit for year</i>	<u>60 000</u>	<u>6 667</u>	<u>66 667</u>
Retained profits on 31 December 20X2	<u><u>480 000</u></u>	<u><u>6 667</u></u>	<u><u>486 667</u></u>

**Workings for consolidated balance sheet on 31 December 20X2**

	<i>Widening Horizons Limited</i> £	<i>Foreign Venture Limited</i> £	<i>Consolidated</i> £
Freehold land and buildings			
At cost	2 000 000	120 000	2 120 000
less Depreciation	<u>350 000</u>	<u>5 000</u>	<u>355 000</u>
	1 650 000	115 000	1 765 000
Investment in Foreign Venture Limited			
At cost	100 000	–	–
Short-term net monetary assets	<u>330 000</u>	<u>75 000</u>	<u>405 000</u>
	2 080 000	190 000	2 170 000
less Long-term loan	<u>1 000 000</u>	<u>83 333</u>	<u>1 083 333</u>
	<u>1 080 000</u>	<u>106 667</u>	<u>1 086 667</u>
Share capital	600 000	100 000	600 000
Retained profits	<u>480 000</u>	<u>6 667</u>	<u>486 667</u>
	<u>1 080 000</u>	<u>106 667</u>	<u>1 086 667</u>

From workings similar to the above, it is quite straightforward to produce the consolidated financial statements for publication, although attention would have to be given to providing the more detailed information in accordance with the formats prescribed by company law.

As would be expected in this case, there is no goodwill on consolidation. The loss on exchange is charged in the profit and loss account and, under the rules of SSAP 20, would only be disclosed if it were an exceptional item.

There is no need to analyse the difference on exchange for the purposes of preparing the consolidated financial statements. However, it is instructive to do so.

No difference on exchange relates to the freehold land and buildings. In the opening balance sheet of Foreign Venture Limited the freehold land and buildings were shown at cost and translated at 10 grouchos to £1. In the profit and loss account, depreciation of 50 000 grouchos was provided and this was translated at 10 grouchos to £1. In the closing balance sheet the asset is shown at cost less depreciation, again translated at 10 grouchos to £1.

The difference arises, first, because monetary assets and liabilities are translated at different rates in the opening and closing balance sheet and, second, because, for certain items, different rates are used in the profit and loss account and closing balance sheet. It may be analysed as follows:

<b>Analysis of difference on exchange</b>	£
1 Opening balance of short-term net monetary assets	<u>300 000</u> grouchos
In opening balance sheet, 10 grouchos to £1	£30 000
In closing balance sheet, 6 grouchos to £1	<u>£50 000</u> Gain 20 000
2 Opening balance on long-term loan	<u>500 000</u> grouchos
In opening balance sheet, 10 grouchos to £1	£50 000
In closing balance sheet, 6 grouchos to £1	<u>£83 333</u> Loss 33 333
<i>c/f</i>	<u>Loss 13 333</u>



<b>Analysis of difference on exchange (continued)</b>		£
b/f		Loss 13 333
3 Increase in short-term net monetary assets during year		
Per profit and loss account		
Retained profit	100 000	grouchos
add Depreciation	<u>50 000</u>	grouchos
	<u>150 000</u>	grouchos
At 8 grouchos to £1	£18 750	
Per closing balance sheet as part of short-term net monetary assets, at 6 grouchos to £1	<u>£25 000</u>	
		Gain <u>6 250</u>
Net loss		<u>7 083</u>

The differences on exchange may therefore be understood by thinking in terms of a flow of net monetary items:

#### **Movement in net monetary assets/liabilities for the year ended 31 December 20X2**

	<i>Grouchos</i>	<i>Grouchos</i>	<i>Rate</i>	£
Opening balance of net monetary liabilities:				
Long-term loan		500 000		
Short-term monetary assets		<u>300 000</u>		
		200 000	10	20 000
<i>less</i> Source of net monetary assets				
Retained profit plus depreciation		150 000	8	<u>18 750</u>
				1 250
Difference on exchange – balance (loss)				7 083
Closing balance of net monetary liabilities				
Long-term loan	500 000			
Short-term monetary assets	<u>450 000</u>			
	<u>50 000</u>			
		<u>50 000</u>	6	<u>8 333</u>

## A critical look at the two methods

### **Some substantial differences**

We have now demonstrated the mechanics of the two methods of translation, using the same example but rather large movements in the hypothetical exchange rates.

When exchange rates between currencies change over time, the methods produce very different results from the same set of foreign currency financial statements. Thus, if we compare the translated amount of the fixed assets of Foreign Venture Limited, in the simple examples in the two preceding sections, we find the following results:

**Fixed assets of Foreign Venture Limited on 31 December 20X2**

	<i>Net book value</i>
	£
Closing rate/net investment method	191 667
Temporal method	115 000

It is true that the rate of exchange moved from 10 grouchos to £1 at the beginning of the year to 6 grouchos at the end of the year, but there are substantial changes in practice in the exchange rates between currencies. Table 16.2 contains movements in the rate of exchange between sterling and a number of major currencies over a ten-year period.

**Table 16.2 Movements in exchange rates over ten years**

	<i>Rates to £1 at end of</i>		<i>Change as a</i>
	<i>1991</i>	<i>December</i>	
		<i>2001</i>	
US dollars	1.87	1.46	– 21.9
French francs*	9.70	10.72	+ 10.5
German Deutschmarks*	2.84	3.20	+ 12.7
Italian lire*	2150.30	3165.15	+ 47.2
Japanese yen	233.19	190.63	– 18.3
Swiss francs	2.54	2.42	– 4.7

Source: *Bank of England Quarterly Bulletin*.

\* The currencies marked with an asterisk are now legacy currencies which have been replaced by the Euro from the beginning of 2002.

To illustrate the effect of the differences between the two methods, let us suppose that a German subsidiary bought land in December 1991 and that this was shown in the balance sheet on 31 December 2001 as:

Land, at cost     2 000 000 Deutschmarks

Under the closing rate/net investment method, this cost would be translated at the closing rate, while under the temporal method, it would be translated at the historical rate. Application of the two rates would produce very different sterling figures for the land:

Closing rate	$2\,000\,000 \div 3.20 = \text{£}625\,000$
Historical rate	$2\,000\,000 \div 2.84 = \text{£}704\,225$

When we turn to differences on exchange, we again find substantial differences between the methods. Under the closing rate/net investment method differences on exchange are treated as a movement on reserves, while under the temporal method they are considered to be part of the ordinary profit or loss for the year.

What then are the respective advantages and disadvantages of the two methods and why has SSAP 20 favoured the use of the closing rate/net investment method in most circumstances?

## Advantages and disadvantages

### *How will the translated figures be used?*

In order to evaluate the two methods of translation, we must bear in mind how the translated figures are going to be used. If we were studying the financial statements of an overseas company with a view to acquiring its shares, it might be useful to translate all items in the foreign currency statements into sterling at the closing rate of exchange in order to produce figures which are meaningful in the home currency. Use of a constant rate of exchange for all items would maintain the same relationships in the sterling financial statements as existed in the foreign currency statements. Thus, for example, long-term liabilities would be the same proportion of fixed assets and the current ratio would be the same in sterling as in the foreign currency accounts.

However, when considering the translation of the financial statements of a subsidiary company prior to consolidation, such a consideration would seem to be irrelevant. After all, we add the translated figures for the overseas subsidiary to those of the parent company and hence the relationship between items in the financial statements of the overseas subsidiary will be completely lost. What would seem to be more important for meaningful aggregation in the consolidated financial statements is that the bases of measurement used for the assets and liabilities are consistent.

### *The temporal method – the case for*

If we accept the need to use consistent bases for consolidation then, in the context of historical cost accounting, it seems reasonable to aggregate the historical costs of the fixed assets and stocks of the subsidiary with the historical costs of the fixed assets and stocks of the parent company. Similarly, the amounts payable and receivable at the balance sheet date for both companies should be dealt with in a consistent manner.

Stated in this way, only the temporal method of translation is conceptually consistent with the historical cost basis of accounting and indeed any basis of accounting. The translation of a historical cost at a historical rate produces the historical cost in sterling, that is the amount which would have been incurred if a sum of money had been dispatched from the UK to purchase the asset. The translation of a historical cost at a closing rate must produce a conceptual nonsense.

It was arguments such as these which led the US FASB to require the exclusive use of the temporal method in FAS 8 issued back in 1975. However, the temporal method is not without its problems.

### *The temporal method – the case against*

First, there is the practical problem of keeping records. In order to translate fixed assets and stocks at historical rates of exchange, a detailed analysis of these items together with the respective rates of exchange has to be kept. Such a record is not at present required by those companies which use the closing rate/net investment method.<sup>23</sup>

Second, the application of the method has caused large fluctuations in the reported profits of groups of companies from period to period, fluctuations which bear little relationship to

<sup>23</sup> IAS 21, Para. 30, requires that, in using the closing rate method, income and expenses of the foreign entity should be translated at exchange rates at the dates of the transactions, except when the foreign entity reports in the currency of a hyperinflationary economy, in which case the closing rate should be used. The proposed new international standard and UK standard both contain this provision and hence more extensive recordkeeping will be essential when using the closing rate/net investment method in future.

the underlying operating performance of the overseas subsidiaries. Such volatility of reported earnings arises because of the requirement to include exchange gains and losses on long-term monetary items in the ordinary profits of the group, and the problem could be solved by taking these particular exchange gains or losses direct to reserve or by spreading them over a period of years.

Third, the method produces misleading differences on exchange, which may in turn have adverse behavioural implications.

As an example of the third problem, let us take as an example a UK company which has an overseas subsidiary. In the balance sheet of the overseas subsidiary, fixed assets and stocks are shown on the basis of historical cost and these are usually financed by net monetary liabilities and an equity interest. During a particular year sterling is weakening against the overseas currency; that is, the other currency is becoming more valuable. In such a case the value of the overseas net assets to the UK company would be increasing and any potential dividends from the overseas subsidiary would be more valuable, as a given future dividend stream in the foreign currency would produce a greater amount of sterling. However, using the temporal method of translation, we would recognise no gains on the fixed assets but merely losses on the net monetary liabilities.

Thus, as a result of the movement in exchange rates, the overseas subsidiary is more valuable, but as a result of using the temporal method, the accounts show losses on exchange!

Under the provisions of both FAS 8 and SSAP 20, such losses on exchange reduced the profits from ordinary activities and hence the earnings per share. Given that boards of directors do not wish to undertake activities which reduce profits or produce losses in the financial statements, evidence was produced to indicate that 'profitable' overseas projects had been rejected because of the subsequent accounting losses which resulted from the use of the temporal method of translation.<sup>24</sup>

### ***The closing rate/net investment method – its compensating virtues***

The closing rate/net investment method does not produce these misleading differences. Because the closing rate is applied to non-monetary assets as well as monetary assets and liabilities, it is possible to set off exchange losses on foreign currency borrowings against exchange gains on real assets and therefore eliminate the need to charge such losses in the profit and loss account. The use of such a cover method is felt by many to reflect the reality of the situation where fixed assets and stocks are financed by money raised overseas. Indeed, under the offset arrangements included in SSAP 20, this cover method is extended to loans raised by the parent company or other companies in the group so that, where foreign currency borrowings have been used to finance, or provide a hedge against, group equity investments in foreign enterprises, exchange gains or losses on the borrowings may be set off against exchange differences arising on the retranslation of the net investment.<sup>25</sup>

Many would support the view that it is unhelpful to take into account exchange gains or losses on the monetary items without taking into account the exchange losses or gains on real assets. However, it is undoubtedly true that it would help users to understand what has happened and is likely to happen if companies provided a list of net investments in foreign

<sup>24</sup> See, for example, D.P. Walker, *An economic analysis of foreign exchange risk*, ICAEW Research Committee Occasional Paper No. 14, ICAEW, London, 1978.

<sup>25</sup> SSAP 20, Para. 57 specifies the conditions under which this offset arrangement may be applied. As we shall see in a later section of this chapter, the exchange difference on the retranslation of the net assets in the consolidated financial statements will usually differ from the exchange difference on the retranslation of the investment in the financial statements of the parent company.

entities and related borrowings, whose exchange gains or losses are offset as reserve movements, according to the principal foreign currencies involved.<sup>26</sup>

### Summary

To summarise, the temporal method has the advantage of producing translated figures which are conceptually consistent with the underlying basis of measurement used, whereas the closing rate/net investment method has the advantage of simplicity and manages to avoid the reporting of fluctuating profits and misleading differences on exchange by the use of one rate of exchange for both assets and liabilities.

The ASC had to balance the respective advantages and disadvantages of the two methods in producing SSAP 20. As we have seen, it favoured the closing rate/net investment method for the majority of situations but required the use of the temporal method where the trade of the foreign enterprise is more dependent on the economic environment of the investing company's currency than that of its own reporting currency. It did, however, recognise the limitations of the closing rate/net investment method where the foreign country suffers from hyperinflation. In such a case it requires that the local currency financial statements be adjusted to reflect current price levels before the translation process is undertaken.<sup>27</sup>

In the view of the authors, the use of the closing rate/net investment method is inconsistent with the subsequent consolidation of the resulting sterling figures. In our view, the logic of the method should lead us to include the results of an overseas subsidiary in the consolidated financial statements by using the equity method of accounting.<sup>28</sup> In this way the consolidated profit and loss account would include the appropriate proportion of the profit or loss of the subsidiary while the consolidated balance sheet would show a net investment in the overseas subsidiary. This is surely what the title of the closing rate/net investment method implies!

### One aspect of a larger problem

We have seen that both of the major methods of translation have advantages and disadvantages and that it has been difficult to choose between them.

The difficulties which we face here may be seen as part of the much larger problem discussed in the first part of this book. In Chapter 4 we have seen, for example, that the addition of historical costs which have been incurred at different points in time results in an unhelpful total when the value of the pound has been changing over time. The movement of exchange rates between currencies presents us with similar problems and, given that we have not yet solved the problems of accounting where only one currency is involved, it is not surprising that there is considerable confusion when we introduce two or more currencies.

It might be suggested that the major stumbling-block is the traditional reliance on historical cost accounts, which are known to have so many defects. We cannot expect the choice of

<sup>26</sup> It was to this end that the ASB published a brief exposure draft, *Amendment to SSAP 20 'Foreign Currency Translation': Disclosure*, in February 1999. This exposure draft was withdrawn shortly afterwards, in May 1999, on the grounds that more substantial changes to SSAP 20 are needed. The ASB has now issued FRED 24 (May 2002), which attempts to achieve convergence with the proposed new International Financial Reporting Standard (IFRS) on this topic.

<sup>27</sup> SSAP 20, Para. 26. This topic is addressed by IAS 29 *Financial Reporting in Hyper-inflationary Economies* (reformatted 1994) and UITF Abstract 9, 'Accounting for operations in hyper-inflationary economies' (June 1993). These specifically require adjustments prior to translation where the cumulative rate of inflation over a three-year period is approaching or exceeds 100 per cent.

<sup>28</sup> See Chapter 15 for a comprehensive discussion of the equity method of accounting.

exchange rate to remedy these defects. If we were to depart from historical costs and instead to show assets and liabilities of the overseas company at their current values, only one rate of exchange would be appropriate. The closing rate is required by both the temporal method and the closing rate method and the resulting sterling figures may quite properly be aggregated with the current values of assets and liabilities of the parent company. It would still be necessary to determine the treatment of resulting differences on exchange but a major problem would have disappeared.

There would still, of course, be other problems in connection with foreign currencies. In the examples above, we have assumed that our UK parent company prepares consolidated financial statements, so that sterling is the appropriate currency to use. Once we widen our horizons to look at a multinational company, which operates throughout the world and has shareholders in many countries, it is difficult to know even what the reporting currency should be, let alone what the resulting differences on exchange really mean.

To illustrate the sort of problem which we face, let us end this section with a very simple example.

Let us suppose that an individual habitually spends six months of every year in the UK and six months in the USA. On 1 January 20X2 he has wealth of \$100 000 in the USA and £100 000 in the UK when the rate of exchange between the currencies is \$2.0 to £1. During the year he lives on income arising in the respective countries and ends the year with exactly the same money wealth in each country when the exchange rate has moved to \$1.5 to £1.

Let us compare his wealth at the beginning and end of the year in dollars and sterling, respectively:

	\$	£
Opening wealth – 1 January 20X2 (rate of exchange \$2.0 to £1)		
UK, £100 000	200 000	100 000
USA, \$100 000	<u>100 000</u>	<u>50 000</u>
	<u>300 000</u>	<u>150 000</u>
Closing wealth – 31 December 20X2 (rate of exchange \$1.5 to £1)		
UK, £100 000	150 000	100 000
USA, \$100 000	<u>100 000</u>	<u>66 667</u>
	<u>250 000</u>	<u>166 667</u>
Gain during year	–	£16 667
Loss during year	<u>\$50 000</u>	<u>–</u>

As can be seen, if we ignore changes in the purchasing power of the respective currencies, the translation process produces a loss of \$50 000 or a gain of £16 667 during the year, even though our individual has the same money wealth at the end as he did at the beginning.

Problems such as those discussed above obviously bedevil the multinational company. Although such companies prepare their consolidated financial statements in the currency of the country where the parent company is situated, it must be admitted that the figures produced are of dubious significance to many shareholders.

## A more complex example

### Example 16.8 The closing rate/net investment method

- (A) Some years ago, Home Country plc, a UK company, raised a long-term loan of \$400 000 which it used to help purchase 80 per cent of the shares in Overseas Inc. at a total cost of \$500 000.
- (B) Relevant rates of exchange were as follows:

	<i>Dollars to £1</i>
At date of acquisition	5
On 31 December 20X1	4
On 31 December 20X2	3

- (C) We shall first look at the treatment of the above transactions in the accounts of the parent company.

In accordance with the principles explained earlier in the chapter, the loan and investment would have originally been recorded at the following amounts:

Long-term loan (\$400 000 ÷ 5)	<u>£80 000</u>
Investment in subsidiary (\$500 000 ÷ 5)	<u>£100 000</u>

On 31 December 20X1 the loan would have been translated at the rate on that date and we shall assume that the company has also translated the investment at the closing rate at that date, as permitted by Para. 51 of SSAP 20. These items would have then appeared in the balance sheet as follows:

<b>Home Country plc</b>	
<b>Extract from balance sheet on 31 December 20X1</b>	
Long-term loan denominated in dollars	
\$400 000 ÷ 4	<u>£100 000</u>
Investment in subsidiary	
\$500 000 ÷ 4	<u>£125 000</u>

The difference on exchange between the date of acquisition and 31 December 20X1 would have been credited to reserves in past years, namely:

Exchange gain on equity investment	
£125 000 – £100 000	£25 000
/less Exchange loss on dollar loan	
£100 000 – £80 000	<u>£20 000</u>
Net gain	<u>£5 000</u>

When the balance sheet on 31 December 20X2 is prepared, the foreign currency amounts will be translated at the closing rate of \$3 to £1:

**Home Country plc**  
**Extract from balance sheet on 31 December 20X2**

Long-term loan denominated in dollars	
\$400 000 ÷ 3	<u>£133 333</u>
Investment in subsidiary	
\$500 000 ÷ 3	<u>£166 667</u>

The difference on exchange to be treated as a movement on reserves in 20X2 in the financial statements of the parent company is therefore as follows:

**Home Country plc**  
**Part of movement on reserves for 20X2**

Exchange gain on equity investment	
£166 667 – £125 000	£41 667
<i>/less</i> Exchange loss on dollar loan	
£133 333 – £100 000	<u>£33 333</u>
Net gain	<u>£8 334</u>

- (D) The above figures for 20X2 are incorporated in the summarised financial statements of Home Country plc for the year ended 31 December 20X2 which appear below:

**Home Country plc**  
**Profit and loss account for the year ended 31 December 20X2**

	£
Profit before taxation	117 000
Dividend receivable from Overseas Inc. (net)	
(80% of £20 000)	<u>16 000</u>
	133 000
<i>/less</i> Taxation	<u>60 000</u>
	73 000
<i>/less</i> Dividends payable	<u>30 000</u>
Retained profit for year	<u>43 000</u>

**Home Country plc**  
**Movement on reserves for the year ended 31 December 20X2**

	£
Balance on 1 January 20X2	133 666
Retained profit for year	43 000
Difference on exchange	<u>8 334</u>
Balance on 31 December 20X2	<u>185 000</u>



**Home Country plc**  
**Balance sheet on 31 December 20X2**

	£	£
Fixed assets		
Tangible assets		400 000
Investment in subsidiary (80% holding)		<u>166 667</u>
		566 667
Current assets		
Stocks	60 000	
Debtors	40 000	
Dividend receivable from Overseas Inc.	16 000	
Cash	<u>5 666</u>	
	121 666	
less Current liabilities	<u>70 000</u>	<u>51 666</u>
		618 333
less Long-term loans:		
Denominated in dollars	133 333	
Denominated in sterling	<u>100 000</u>	<u>233 333</u>
		<u>385 000</u>
Share capital		200 000
Reserves		<u>185 000</u>
		<u>385 000</u>

(E) We may now turn our attention to the financial statements of the overseas subsidiary.

The balance sheet of Overseas Inc. on 31 December 20X1 in dollars is given in the left-hand column below, while the relevant rates of exchange and resulting sterling amounts are given in the second and third columns, respectively. It has been assumed that the assets of Overseas Inc. were revalued at their fair values at the date of acquisition to produce a revaluation reserve of \$150 000. Other reserves at the date of acquisition are assumed to have been \$100 000.

**Overseas Inc.**  
**Balance sheet on 31 December 20X1**

	\$	<i>Rate of exchange</i>	£
Fixed assets			
At revalued amounts at date of acquisition and subsequent cost less depreciation	1 000 000	4(CR)	250 000
Current assets			
Stocks	300 000	4(CR)	75 000
Debtors	200 000	4(CR)	50 000
Cash	<u>100 000</u>	4(CR)	<u>25 000</u>
	600 000		150 000
less Current liabilities	<u>400 000</u>	4(CR)	<u>100 000</u>
Net current assets	<u>200 000</u>		<u>50 000</u>
	1 200 000		300 000
less Long-term loan	<u>600 000</u>	4(CR)	<u>150 000</u>
	<u>600 000</u>		<u>150 000</u>

**Overseas Inc.**  
**Balance sheet on 31 December 20X1 (continued)**

	\$	Rate of exchange	£
Share capital	100 000	5(HR)	20 000
Revaluation reserve – at date of acquisition by Home Country plc	150 000	5(HR)	30 000
Reserves			
Pre-acquisition	<u>100 000</u>	5(HR)	<u>20 000</u>
	350 000		70 000
Post-acquisition	<u>250 000</u>	Balance	<u>80 000</u>
	<u>600 000</u>		<u>150 000</u>

Notice that in translating the balance sheet, the share capital and pre-acquisition reserves have been translated at the historical rate at the date of acquisition with the intention of maintaining the goodwill on consolidation at its 'cost', which is:

	£
Cost of investment	100 000
less 80% of Net assets at their fair values 80% of £70 000	<u>56 000</u>
Purchased goodwill	<u>44 000</u>

This effectively treats the goodwill as a sterling asset, rather than a foreign asset, and appears to be the method envisaged by SSAP 20. While this articulated well with the regime of SSAP 22 under which goodwill was invariably written off immediately against reserves, it does not fit so comfortably with the FRS 10 approach under which goodwill continues to appear in consolidated balance sheets long after the acquisition of a subsidiary. If this goodwill is regarded as a foreign asset, rather than a sterling asset, then its cost would be \$220 000, that is £44 000 translated at \$5 to £1. If goodwill is regarded as a foreign asset, it should then be retranslated at the closing rate on each succeeding balance sheet date with any resulting difference on exchange being taken to reserves.

For ease of exposition, we shall continue to follow the former approach although we recognise that FRED 24 contains the proposal that purchased goodwill should be regarded as an asset of the foreign operation and hence translated at the closing rate on each balance sheet date.<sup>29</sup> For simplicity, we will also ignore any requirement to amortise goodwill over its expected useful economic life.

The balance of post-acquisition reserves, which is translated at £80 000, includes all exchange differences which have arisen since the date of acquisition. The size of these exchange differences depends upon when the post-acquisition reserves were earned and the rates of exchange prevailing at those dates. The less the fluctuation in exchange rates since acquisition, the lower will be the difference.

<sup>29</sup> FRED 24, Para. 45. This paragraph also requires that any fair value adjustments to the carrying values of assets and liabilities arising on the acquisition of a foreign operation should be treated as assets and liabilities of the foreign operation and hence translated at the closing rate on each balance sheet date. This has always been the case under UK GAAP and, unlike many US accountants, no UK accountant would consider doing anything different.

At first sight the use of historical rates for share capital and pre-acquisition reserves might be thought to be incorrect as far as the minority interest is concerned. However, the minority interest is 20 per cent of the net assets or total share capital and reserves, and the way in which the individual components of the share capital and reserves are translated has no effect on the total figure.

- (F) The financial statements of Overseas Inc. for the year ended 31 December 20X2 are given below. The left-hand column is in dollars, the centre column gives the relevant rate of exchange and the right-hand column gives the resulting sterling figures.

The profit and loss account has been translated at the closing rate rather than the average rate and, as we have seen earlier in the chapter, this avoids one difference on exchange. A standard based upon FRED 24 would outlaw the use of both the closing rate and the average rate for it proposes that income and expenses shall be translated at exchange rates at the dates of the transactions, a much more complex process.<sup>30</sup>

**Overseas Inc.**  
**Profit and loss account for the year ended 31 December 20X2**

	\$	<i>Rate of exchange (closing rate)</i>	£
Operating profit	330 000	3	110 000
less Taxation	<u>150 000</u>	3	<u>50 000</u>
	180 000		60 000
less Dividends payable	<u>60 000</u>	3	<u>20 000</u>
Retained profit for year	<u><u>120 000</u></u>		<u><u>40 000</u></u>

**Overseas Inc.**  
**Balance sheet on 31 December 20X2**

	\$	<i>Rate of exchange</i>	£
Fixed assets			
At revalued amount or cost			
less depreciation	960 000	3	320 000
Current assets			
Stock	360 000	3	120 000
Debtors	240 000	3	80 000
Cash	160 000	3	53 333
	<u>760 000</u>		<u>253 333</u>
less Current liabilities			
(including dividend payable)	400 000	3	133 333
Net current assets	<u>360 000</u>		<u>120 000</u>
	1 320 000		440 000
less Long-term loan	<u>600 000</u>	3	<u>200 000</u>
	<u><u>720 000</u></u>		<u><u>240 000</u></u>

<sup>30</sup> FRED 24, Para. 37.

<b>Overseas Inc.</b>			
<b>Balance sheet on 31 December 20X2 (continued)</b>			
	\$	<i>Rate of exchange</i>	£
Share capital	100 000	5(HR)	20 000
Revaluation reserve (created at date of acquisition)	150 000	5(HR)	30 000
Reserves			
Pre-acquisition	100 000	5(HR)	20 000
Post-acquisition			
At 1 January 20X2	<u>250 000</u>	Per balance sheet 31.12.20X1	<u>80 000</u>
(Net assets on 1.1.20X2)	600 000	4	150 000
Post-acquisition			
Current year – 20X2	<u>120 000</u>	Per P and L account	<u>40 000</u>
	720 000		190 000
Difference on exchange	–	Balance	<u>50 000</u>
	<u><u>720 000</u></u>		<u><u>240 000</u></u>

Note that the balance sheet contains a suitable analysis of reserves and, in particular, that it is necessary to translate the post-acquisition reserves so that they agree with the previous year's financial statements and with the profit and loss account balance for the year ended 31 December 20X2, respectively. An exchange gain of £50 000 emerges as the balancing figure. As the profit and loss account has been translated at the closing rate rather than the average rate, the whole of the difference on exchange relates to the opening net assets:

<b>Difference on exchange</b>		
Opening net assets	\$600 000	
Translation at beginning of year	\$600 000 ÷ 4	£150 000
Translation at end of year	\$600 000 ÷ 3	<u>200 000</u>
Gain on exchange		<u><u>50 000</u></u>

- (G) In order to prepare consolidated financial statements, it is necessary to provide the usual analysis of the shareholders' interest in Overseas Inc. and to decide how to deal with the difference on exchange. In practice there will usually be many other adjustments in respect of such matters as unrealised intercompany profits, but these are problems faced on any consolidation and are therefore not dealt with here.

The shareholders' interest in Overseas Inc. may be analysed as follows:

**Overseas Inc.**  
**Analysis of shareholders' equity on 31 December 20X2**

	Total	Group 80%		Minority interest
		Pre-acquisition	Post-acquisition	
	£	£	£	£
Share capital	20 000	16 000		4 000
Revaluation reserve	30 000	24 000		6 000
Other reserves				
Pre-acquisition	20 000	16 000		4 000
Post-acquisition				
At 1 January 20X2	80 000		64 000	16 000
Retained profit 20X2	40 000		32 000	8 000
Difference on exchange 20X2	50 000		40 000	10 000
	<u>240 000</u>	<u>56 000</u>	<u>136 000</u>	<u>48 000</u>
Cost of investment (original cost)		<u>100 000</u>		
Goodwill on consolidation		<u>44 000</u>		

- (H) As shown in section (C) above, the financial statements of Home Country plc for 20X2 include an exchange gain on the equity investment of £41 667 and an exchange loss on the dollar loan of £33 333, together producing a net gain of £8334 which has been credited to reserves.

When we turn to the consolidated financial statements it is still possible to set the loss on the dollar loan, which appears in the parent company's financial statements, against the gain on the investment as permitted by SSAP 20, Para. 57. However, the appropriate exchange gain in the consolidated financial statements is the parent company's share of the exchange gain resulting from the translation of the subsidiary's financial statements, in this case 80 per cent of £50 000 = £40 000.

This treatment is in line with the general principle of consolidation whereby the cost of the investment in the parent company's balance sheet is replaced by the underlying net assets of the subsidiary.

As a consequence of this, the net difference on exchange, which is to be treated as a movement on reserves in the consolidated financial statements, will be:

	£
Gain on exchange in 20X2 in respect of Home Country's share of net assets in Overseas Inc., 80% of £50 000	40 000
/less Loss on exchange in 20X2 in respect of dollar loan – per accounts of Home Country plc (see (C) above)	<u>33 333</u>
Net gain	<u>6 667</u>

- (I) An adjustment similar to that discussed in (H) above is necessary to calculate the balance of consolidated reserves brought forward at 1 January 20X2.

It is insufficient just to add together the reserves of Home Country plc and 80 per cent of the post-acquisition reserves of Overseas Inc. As shown in section (C), the reserves of Home Country plc on 31 December 20X1 include the following net exchange gain made since acquisition:

	£
Exchange gain on equity investment	25 000
less Exchange loss on dollar loan	<u>20 000</u>
Net gain	<u>5 000</u>

While the exchange loss on the dollar loan may be properly charged against consolidated reserves, the relevant exchange gain in the consolidated financial statements is not that on the investment but the parent company's share of the gain on translating the subsidiary's financial statements. We do not know the amount of this exchange gain but we do know that it is included in the figure of £80 000 for post-acquisition reserves shown in (E) above.

The balance of consolidated reserves on 31 December 20X1, that is brought forward on 1 January 20X2, may therefore be calculated as follows:

	£
Home Country plc	
Per company's own balance sheet (see (D))	133 666
less Exchange gain on equity investment included in above figure (see this section above)	<u>25 000</u>
	108 666
Overseas Inc.	
Share of post-acquisition reserves at 1.1.20X2 including exchange differences on net assets since acquisition, 80% of £80 000 (see (E))	<u>64 000</u>
	<u>172 666</u>

(J) We are now in a position to consolidate:

**Home Country plc**  
**Workings for consolidated profit and loss account for the year to 31 December 20X2**

	£	£
Profit before taxation		
Home Country plc	117 000	
Overseas Inc.	<u>110 000</u>	227 000
less Taxation		
Home Country plc	60 000	
Overseas Inc.	<u>50 000</u>	110 000
		117 000
less Minority interest, 20% of (£110 000 – £50 000)		<u>12 000</u>
		105 000
less Dividends payable by parent company		<u>30 000</u>
Retained profit for the year		<u>75 000</u>

**Workings for movement on reserves for year to 31 December 20X2**

	£	£
Balance on 1 January 20X2 (per (I) above)		172 666
Retained profit for year – per consolidated profit and loss account above		75 000
Exchange gain (per (H) above)		
Gain on net assets	40 000	
less Loss on foreign currency borrowings	<u>33 333</u>	6 667
Balance on 31 December 20X2		<u>254 333</u>

### Workings for consolidated balance sheet on 31 December 20X2

	£	£
Fixed assets		
Intangible assets		
Goodwill on consolidation – at cost per analysis of equity interest (see (G))		44 000
Tangible assets – at net book value		
Home Country plc	400 000	
Overseas Inc. (see note (a))	<u>320 000</u>	720 000
Net current assets (see note (b))		
Home Country plc	51 666	
Overseas Inc.	<u>120 000</u>	<u>171 666</u>
		935 666
<i>less</i> Long-term loans		
Home Country plc	233 333	
Overseas Inc.	<u>200 000</u>	<u>433 333</u>
		<u>502 333</u>
Share capital		200 000
Reserves – as above		<u>254 333</u>
		454 333
Minority interest, per analysis of equity interest		<u>48 000</u>
		<u>502 333</u>

#### Notes:

- (a) Note that the revalued amount of the fixed assets of Overseas Inc. at the date of acquisition represents 'cost' to the group.
- (b) An adjustment is necessary to cancel out the dividend receivable by Home Country plc. The amount is £16 000 but the effect on the total net current assets is, of course, nil.

It is now relatively straightforward to prepare the consolidated financial statements for publication in the normal manner, although a greater amount of detail would be necessary to satisfy the disclosure requirements of company law and accounting standards.

Note that, in order to simplify the example and concentrate on the translation process, we have assumed that purchased goodwill is a sterling asset, rather than a foreign asset, and that it has not been amortised. As explained above, FRED 24 proposes that purchased goodwill be treated as a foreign asset to be retranslated at each balance sheet date. FRS 10 *Goodwill and Intangible Assets* requires that positive purchased goodwill be amortised over its useful economic life.<sup>31</sup>

## The international accounting standard

Although IAS 21 *Accounting for the Effects of Changes in Exchange Rates*, was first issued in 1983, it was reconsidered as part of the IASC comparability and improvements project and issued in a revised form as IAS 21 *The Effects of Changes in Foreign Exchange Rates* in

<sup>31</sup> See Chapter 13 for a comprehensive discussion of goodwill.

November 1993. This revised version was issued some 10 years after the issue of SSAP 20 and some 12 years after the issue of the US FAS 95 *Foreign Translation*, in December 1981. All three statements are based upon the same underlying principles although these are expressed rather differently. Inevitably, there are differences in detail.

In particular, IAS 21 makes it clear that it does not deal with hedge accounting except for items which hedge a net investment in a foreign entity; some guidance on hedge accounting has subsequently been provided in IAS 39 *Financial Instruments: Recognition and Measurement* (revised 2000).

Leaving this on one side, IAS 21 requires the same method of accounting for foreign currency transactions as SSAP 20. Thus transactions are initially recorded at the actual or spot rate of exchange. At subsequent balance sheet dates, non-monetary items must be translated at the historical rate, unless they are shown at a subsequent fair value, in which case the rate at the date on which the fair value was established must be used. Monetary assets and liabilities must normally be retranslated at the closing rate and any differences on exchange must be taken to the profit and loss account. The international standard does not have to concern itself with the thorny problem of whether exchange gains/losses are realised or unrealised, which bedevils discussion of this and many other topics in the UK. A cover method is required where a foreign currency liability is accounted for as a hedge of an enterprise's net investment in a foreign entity (see below) but the cumulative exchange differences relating to the investment should be recognised in the profit and loss account in the same period that the company recognises the gain or loss on disposal of the investment.

When we turn to the translation of foreign financial statements as a preliminary to some form of consolidation, IAS 21 distinguishes between a foreign entity, the activities of which are not an integral part of those of the reporting enterprise, and a foreign operation that is integral to the operations of the reporting enterprise. It requires the use of the closing rate/net investment method for the former and the temporal method for the latter. Thus it adopts the basic approach of SSAP 20 although it uses different terminology. However, in the context of the closing rate method to be used for foreign entities, it specifically requires that income and expense items should be translated at the exchange rates at the dates of transactions rather than the average rate for the period or closing rate as required by SSAP 20. Given the conceptual deficiencies of the closing rate method, discussed earlier in this chapter, this would seem to achieve spurious accuracy.

IAS 21 specifically refers to the treatment of goodwill and fair value adjustments within the context of the closing rate method. It allows these to be translated either at the historical rate or at the closing rate. Thus, as we explained in Example 16.8 in the context of a UK parent, they may be treated either as a sterling asset or as a foreign currency asset.

The disclosure requirements of IAS 21 are more stringent than SSAP 20. In particular, the requirements of the international accounting standard include disclosure of:<sup>32</sup>

- (a) the amount of exchange differences included in the net profit or loss for the period;
- (b) net exchange differences classified as equity as a separate component of equity, and a reconciliation of the amount of such exchange differences at the beginning and end of the period;
- (c) the method selected . . . to translate goodwill and fair value adjustments arising on the acquisition of a foreign entity.

<sup>32</sup> See IAS 21, Paras 42–47 for full disclosure requirements.



## The proposed new standards

As we have explained in Chapter 3, the IASB published an exposure draft of proposed Improvements to International Accounting Standards in May 2002. This exposure draft contained proposed replacements for 12 international accounting standards, one of which was IAS 21 *The Effects of Changes in Foreign Exchange Rates*. In the same month, the ASB issued FRED 24, which attempts to bring UK standard practice for foreign currency transactions and translations into line with the proposals of the IASB. Hence in this, as in many other areas of accounting, the ASB is shooting at a moving target!

While the IASB exposure draft makes no major changes in accounting for foreign currencies, it uses rather different terminology to the present IAS 21 and will have some considerable impact on UK practice if the proposals of FRED 24 are adopted. In keeping with the approach that we have adopted in this chapter, we will outline first the proposed changes in accounting for foreign currency transactions and second the changes in the translation of foreign currency financial statements.

The exposure draft requires the same approach to the translation of foreign currency transactions as that explained in this chapter, with the exception that contracted and forward exchange rates may only be used at the date of a transaction where hedge accounting techniques are used in accordance with a proposed replacement for IAS 39. As IAS 39 only applies to financial instruments, forward exchange contracts related to the purchase of goods and services will not be covered, although loans raised to hedge an investment in foreign equity shares will continue to be covered, provided some more stringent conditions are satisfied. Hence foreign currency transactions will usually be recorded initially using the spot rate of exchange at the date of the transaction and the choice between the spot rate and the forward rate, permitted by SSAP 20, will no longer be available.

With regard to the translation of foreign currency financial statements as a preliminary to consolidation, the exposure draft requires a similar approach to that of the current IAS 21 but uses rather different terminology. It distinguishes between a functional currency, the currency of the primary economic environment in which an entity operates, and a presentational currency, the currency in which the financial statements are presented. It proposes to permit companies to use any presentational currency they choose.

Where a foreign operation has the same functional currency as the parent, the foreign currency financial statements are to be translated as if the parent company had entered into the foreign currency transactions itself. In other words, the temporal method is to be used. Where the foreign operation has a different functional currency to the parent, the closing rate method should be used. It is in the application of the closing rate method that some important changes will be necessary in the UK.

The exposure draft proposes that, where the closing rate method is used, the income and expenses in the profit and loss account of the foreign entity shall be translated at exchange rates at the dates of transactions. This is, of course, far more complex than the use of the closing rate or average rate under SSAP 20 and, given the nonsense of the numbers produced by the closing rate method, appears to the authors to be aiming for spurious accuracy. The exposure draft also proposes that purchased goodwill and fair value adjustments arising on the acquisition of a foreign subsidiary should be regarded as foreign currency assets and hence retranslated at each balance sheet date. Under UK GAAP, fair value adjustments are always included as adjustments to the values of assets and liabilities of the subsidiary and hence would always have been retranslated at closing rates. However there has been no such consistency with the treatment of goodwill and the proposals, if taken forward, would lead to a more standard, although rather simplistic, treatment in this area.

The cover method, whereby exchange gains or losses on foreign currency borrowings may be offset against the losses or gains on the investment in a foreign operation will only be permitted if hedge accounting procedures are employed in accordance with the provisions of a revised IAS 39 *Financial Instruments: Recognition and Measurement*.

Finally, as we pointed out in Chapter 11, there is a fundamental difference of opinion between the ASB and the IASB on the issue of the recycling of gains and losses. Both IAS 21 and FRED 24 require gains or losses arising on a net investment in a foreign entity to be taken to reserves and, in the UK, these would be reported in the Statement of Total Recognised Gains and Losses (STRGL). Both the existing and proposed international accounting standards require accumulated exchange differences, which have been taken to reserves, to be recognised in the profit and loss account of the period in which the investment is sold. The ASB does not intend to permit such recycling of exchange gains and losses. As we have seen in Chapter 11, the ASB takes the view that once a gain or loss is reported in the STRGL, it cannot be reported a second time in the profit and loss account. Given that the vast majority of countries do not require the publication of a STRGL at all, let alone as a primary statement, it is hard to see how convergence will be achieved on this point!

## Summary

In this chapter, we examined both the accounting treatment of foreign currency transactions undertaken by a UK company and the translation of the foreign currency financial statements of a subsidiary as a preliminary step to the preparation of consolidated financial statements.

We discussed the treatment of foreign currency transactions through a series of examples and have explained how SSAP 20 requires such transactions to be dealt with. We have explained some of the limitations of this SSAP 20 approach, including its approval of alternative approaches when forward exchange contracts are employed, the confusion surrounding what are and are not realised profits and the use of the cover method when foreign currency borrowings are invested in equity shares but not when they are invested in other equally saleable assets.

We then turned to the translation of foreign currency financial statements as a preliminary to the preparation of consolidated financial statements. While we have concentrated on a foreign subsidiary, we provided principles which are applicable to accounting for foreign associates and joint ventures as well. We identified two main methods of translation, namely the closing rate/net investment method and the temporal method, illustrated both of these and explained when SSAP 20 requires each to be applied. We explained the severe weaknesses of both methods and demonstrated why the SSAP 20 solution represents a compromise between two far from perfect alternatives. We then provided a more complex example of the closing rate/net investment method, which is the most common method in use in the UK.

Finally we examined the provisions of the international accounting standard IAS 21, and outlined the changes proposed by the exposure draft of Proposed Improvements to International Standards, issued by the IASB in May 2002, and reflected in the ASB FRED 24, published in that same month.

## Recommended reading

Chartered Association of Certified Accountants, *The operation of SSAP 20 – a survey of opinion on the functioning of SSAP20 'Foreign currency translation'*, ACCA, London, 1992.

ICAEW, *The effects of changes in foreign exchange rates*, ICAEW Technical release TECH:12/02, London, 2002.

I.J. Martin, *Accounting and Control in the Foreign Exchange Market*, 2nd edn, Butterworths, London, 1993.

C. Nobes, 'A review of the translation debate', *Accounting and Business Research Number 40*, ICAEW, London, Autumn 1980.

C. Nobes and R. Parker, *Comparative International Accounting*, 7th edn, Financial Times Prentice Hall, Harlow, 2002: Chapter 17, 'Foreign currency translation' by John Flower.

J. Pearcy, *How to Account for Foreign Currencies*, Macmillan, Basingstoke, 1984.

L. Revsine, 'The rationale underlying the functional currency choice', in *Accounting Theory and Policy*, R. Bloom and P.T. Elgers (eds), Harcourt Brace Jovanovich, Orlando, USA, 1987.

C.A. Westwick, *Accounting for Overseas Operations*, Gower, Aldershot, 1986.

Readers are also referred to the latest edition of *UK and International GAAP* by Ernst & Young, which provides much greater detailed coverage of this and other topics in this book. At the time of writing, the most recent edition is the 7th, A. Wilson, M. Davies, M. Curtis and G. Wilkinson-Riddle (eds), Butterworths Tolley, London, 2001. The relevant chapter is 8.

## Questions

**16.1** You are the Chief Accountant of JKL plc, a UK company that has three wholly-owned overseas subsidiaries.

- Company A is located in Spain. The company assembles computer terminals from materials provided by JKL plc. Once assembled, the computer terminals are shipped to the UK where JKL plc sells them.
- Company B is located in Singapore and produces computers using materials supplied by local companies. Company B sells the computers to customers throughout south-east Asia.
- Company C, operated on the same basis as Company A, is located in a country where recent legislation forbids the ownership of companies by foreign nationals and where strict currency and import/export controls have been introduced. These currency controls mean that JKL plc is unable to sell its interest in Company C.

You are required to explain how each of the three subsidiaries would be dealt with in the consolidated financial statements of JKL plc.

*CIMA, Advanced Financial Accounting, May 1994*

(15 marks)

**16.2** You are the consolidation accountant of Home plc. Home plc is incorporated in the United Kingdom and prepares its financial statements using UK Accounting Standards. Home plc has a subsidiary, Away Ltd. Away Ltd is incorporated in a country that has the Tot as its unit of currency. The accepted abbreviation for the Tot is 'T'. The financial statements of Home plc and Away Ltd for the year ended 30 June 2001 are given opposite:

## Balance sheets at 30 June 2001

	<i>Home plc</i>		<i>Away Ltd</i>	
	£000	£000	T000	T000
<b>Fixed assets:</b>				
Tangible assets	30 000		50 000	
Investment in Away Ltd	<u>14 000</u>		<u>        </u>	
		44 000		50 000
<b>Current assets:</b>				
Stocks	10 000		16 000	
Debtors	12 000		18 000	
Cash in hand	<u>60</u>		<u>80</u>	
	<u>22 060</u>		<u>34 080</u>	
<b>Creditors failing due within one year:</b>				
Trade creditors	7 000		11 000	
Taxation	1 000		2 000	
Proposed dividends	1 000		2 000	
Bank overdraft	<u>3 000</u>		<u>5 000</u>	
	<u>12 000</u>		<u>20 000</u>	
Net current assets		<u>10 060</u>		<u>14 080</u>
Total assets less current liabilities		<u><u>54 060</u></u>		<u><u>64 080</u></u>
<b>Capital and reserves:</b>				
Called up share capital (£1/T1 shares)		25 000		40 000
Profit and loss account		<u>29 060</u>		<u>24 080</u>
		<u><u>54 060</u></u>		<u><u>64 080</u></u>

## Profit and loss accounts for the year ended 30 June 2001

	<i>Home plc</i>	<i>Away Ltd</i>
	£000	T000
Turnover	12 000	20 000
Cost of sales	<u>(6 000)</u>	<u>(10 000)</u>
Gross profit	6 000	10 000
Other operating expenses	<u>(3 000)</u>	<u>(5 000)</u>
Operating profit	3 000	5 000
Interest payable	<u>(100)</u>	<u>(200)</u>
Profit before tax	2 900	4 800
Tax	<u>(900)</u>	<u>(1 600)</u>
Profit after tax	2 000	3 200
Proposed dividends	<u>(1 000)</u>	<u>(2 000)</u>
Retained profit	1 000	1 200
Retained profit – 1 July 2000	<u>28 060</u>	<u>22 880</u>
Retained profit – 30 June 2001	<u><u>29 060</u></u>	<u><u>24 080</u></u>

**Notes to the financial statements**

- 1 On 1 July 1995, Home plc purchased 30 million shares in Away Ltd for 42 million Tots. The balance on the profit and loss account of Away Ltd on 1 July 1995 was 8 million Tots. Away Ltd has not issued any additional shares since 1 July 1995. Goodwill on consolidation is amortised over 10 years.
- 2 Home plc has not made any entries in its financial statements regarding the dividend receivable from Away Ltd.
- 3 On 30 June 2001, Home plc invoiced Away Ltd for a management charge of £250 000 for the year ended 30 June 2001. This amount was included in the turnover and debtors of Home plc. Away Ltd received the invoice before closing its books for the year ended 30 June 2001 and entered it using the closing rate of exchange to translate the sum into Tots. The relevant amount was included in the other operating expenses and trade creditors of Away Ltd. There was no other trading between the two companies.
- 4 Relevant rates of exchange are as follows:

<i>Date</i>	<i>Exchange rate (Tots to £1)</i>
1 July 1995	3
30 June 2000	3.75
30 June 2001	4
Average for the year ended 30 June 2001	3.85

- 5 In previous years, the financial statements of Away Ltd have been translated into sterling for consolidation purposes using the closing rate method. The average rate of exchange for the year has been used to translate the profit and loss account. Exchange differences have been recognised in the consolidated statement of total recognised gains and losses. A junior accountant is puzzled by this treatment and has approached you for clarification. He cannot understand how the consolidated financial statements show a true and fair view if possibly significant exchange differences by-pass the consolidated profit and loss account.

**Required**

- (a) Translate the balance sheet of Away Ltd into sterling (£) using the closing rate method. (6 marks)
- (b) Prepare the consolidated balance sheet of the Home group at 30 June 2001. (12 marks)
- (c) Prepare the consolidated profit and loss account of the Home group for the year ended 30 June 2001. You should start with turnover and end with retained profit for the year. (6 marks)
- (d) Prepare a statement that reconciles the opening and closing reserves of the Home group. [*Marks will be awarded for deriving each figure in the reconciliation, including exchange differences arising on consolidation.*] (11 marks)
- (e) Prepare a memorandum to the junior accountant that justifies the fact that exchange differences by-pass the consolidated profit and loss account and summarises recent developments regarding the destination of gains and losses in the performance statements. (5 marks)

*CIMA, Financial Reporting – UK Accounting Standards, November 2001* (40 marks)

- 16.3** Shott, a public limited company, set up a wholly owned foreign subsidiary company, Hammer, on 1 June 1999 with a share capital of 400 000 ordinary shares of 1 dinar. Shott transacts on a limited basis with Hammer. It maintains a current account with the company but very few transactions are processed through this account. Shott is a multinational

company with net assets of £1500 million and 'normal' profits are approximately £160 million. The management of Hammer are all based locally although Shott does have a representative on the management board. The prices of the products of Hammer are determined locally and 90% of sales are to local companies. Most of the finance required by Hammer is raised locally, although occasionally short term finance is raised through borrowing monies from Shott. Hammer has made profits of 80 000 dinars and 120 000 dinars after dividend payments respectively for the two years to 31 May 2001. During the financial year to 31 May 2001, the following transactions took place:

- (i) On 30 September 2000, a dividend from Hammer of 0.15 dinars per share was declared. The dividend was received on 1 January 2001 by Shott.
- (ii) Hammer sold goods of 24 000 dinars to Shott during the year. Hammer made 25% profit on the cost of the goods. The goods were ordered by Shott on 30 September 2000, were shipped free on board (fob) on 1 January 2001, and were received by Shott on 31 January 2001. Shott paid the dinar amount on 31 May 2001 and had not hedged the transaction. All the goods remain unsold as at 31 May 2001.
- (iii) Hammer has borrowed 150 000 dinars on 31 January 2001 from Shott in order to alleviate its working capital problems. At 31 May 2001 Hammer's financial statements showed the amount as owing to Shott. The loan is to be treated as permanent and is designated in pounds sterling.

The directors of Shott wish to use the closing rate to translate the balance sheet of Hammer and the average rate to translate the profit and loss account of Hammer but are unsure as to whether this is possible under accounting standards. On 1 June 2001 Hammer was sold for 825 000 dinars, and the proceeds were received on that day.

	<i>Dinars to £1</i>	
Exchange rates:	1 June 1999	1.0
	31 May 2000	1.3
	30 September 2000	1.1
	1 January 2001	1.2
	31 January 2001	1.5
	31 May 2001	1.6
	1 June 2001	1.65
Average rate for year to	31 May 2001	1.44

#### Required

- (a) (i) Advise Shott as to whether the temporal or closing rate/net investment method should be used to translate the financial statements of Hammer; (6 marks)
- (ii) Discuss the claim by SSAP 20 *Foreign Currency Translation*, that the usage of the temporal or net investment/closing rate method is based upon the economic relationship between the holding company and its foreign subsidiary. (5 marks)
- (b) Discuss how the above transactions should be dealt with in the consolidated financial statements of Shott, calculating the gain or loss on the disposal of Hammer on 1 June 2001 and stating how the cumulative exchange differences would be dealt with on the disposal. (14 marks)

ACCA, *Financial Reporting Environment (UK Stream)*, June 2001 (25 marks)

- 16.4** Howard plc acquired 2 100 000 ordinary shares of Kroner 1 in Pau Ltd on 1 January 1985 when the reserves of Pau Ltd were Kr1 500 000 and the exchange rate was Kr10 to £1. Goodwill was eliminated against the consolidated reserves on 31 December 1985.

The profit and loss accounts of Howard plc and Pau Ltd for the year ended 31 December 1992 were as follows:

	<i>Howard</i>	<i>Pau</i>
	£000	Kr000
Turnover	9 225	94 500
Cost of sales	<u>6 027</u>	<u>63 000</u>
Gross profit	3 198	31 500
Distribution cost	1 290	7 550
Administrative expenses	1 469	2 520
Depreciation	<u>191</u>	<u>2 100</u>
	248	19 330
Dividends from subsidiary	<u>315</u>	<u>          </u>
	563	19 330
Tax	<u>195</u>	<u>7 570</u>
Profit on ordinary activities after tax	368	11 760
Dividends paid 30.6.92	<u>183</u>	<u>4 200</u>
Retained profit for the year	<u><u>185</u></u>	<u><u>7 560</u></u>

The balance sheets of Howard plc and Pau Ltd as at 31 December 1992 were as follows:

	<i>Howard</i>	<i>Pau</i>
	£000	Kr000
<i>Fixed assets</i>		
Tangible assets	1 765	38 500
Investment in Pau Ltd	305	
<i>Current assets</i>		
Stock	2 245	3 675
Debtors	615	1 750
Cash	<u>156</u>	<u>9 450</u>
	<u>3 016</u>	<u>14 875</u>
<i>Current liabilities</i>		
Trade creditors	(2 245)	(4 375)
<i>Creditors falling due after more than 1 year</i>		
Loan	<u>(1 230)</u>	<u>(8 680)</u>
	<u>1 611</u>	<u>40 320</u>
<i>Capital and reserves</i>		
Share capital in £1 ordinary shares	600	
Share capital in Kr 1 ordinary shares		3 500
Profit and loss account	<u>1 011</u>	<u>36 820</u>
	<u><u>1 611</u></u>	<u><u>40 320</u></u>

The tangible assets of Pau Ltd were acquired 1 January 1985 and are stated at cost less depreciation.

Stocks represent six months' purchases and at 31 December 1991 the stock held by Pau Ltd amounted to Kr4 760 000.

Exchange rates have been as follows:

	<i>Kroner to £1</i>
1 January 1985	10
30 June 1991	10.5
30 September 1991	10
31 December 1991	9.5
Average for 1992	8
30 June 1992	8
30 September 1992	7.5
31 December 1992	7

In determining the appropriate method of currency translation, it is established that the trade of Pau Ltd is more dependent on the economic environment of the investing company's currency than on that of its own reporting currency.

**Required**

- (a) Explain briefly how it would be established that the trade of Pau Ltd is more dependent on the economic environment of the investing company's currency than on that of its own reporting currency. (4 marks)
- (b) Prepare the consolidated profit and loss account for the year ended 31 December 1992 and a balance sheet as at that date, using the temporal method of translation. (22 marks)
- (c) Calculate the amount to be included in the consolidated balance sheet of the Howard Group as at 31 December 1992 if Howard plc had sold goods to Pau Ltd on 30 September 1992 for £14 000 which had cost £10 000 and which remained unsold at 31 December 1992 using:
  - (i) the closing rate method;
  - (ii) the temporal method. (4 marks)

ACCA, *Advanced Financial Accounting, June 1993*

(30 marks)

- 16.5** The balance sheets of UK plc and its subsidiaries France SA and US Inc at 30 September 1998 (the accounting date for all three companies) are given below:

	<i>UK plc</i>		<i>France SA</i>		<i>US Inc</i>	
	£000	£000	Fr000	Fr000	\$000	\$000
<i>Fixed assets</i>						
Tangible assets	26 000		95 000		56 000	
Investments (Notes 1 & 2)	<u>25 500</u>		<u>—</u>		<u>—</u>	
		51 500		95 000		56 000
<i>Current assets</i>						
Stocks (Note 3)	15 000		44 000		25 000	
Debtors (Note 4)	10 000		30 000		16 000	
Cash in hand	<u>2 000</u>		<u>6 000</u>		<u>3 000</u>	
	<u>27 000</u>		<u>80 000</u>		<u>44 000</u>	
<i>Current liabilities</i>						
Trade creditors (Note 4)	6 000		12 000		8 000	
Taxation	3 000		6 000		4 000	
Proposed dividend	2 000		8 000		3 000	
Bank overdraft	<u>8 000</u>		<u>10 000</u>		<u>9 000</u>	
	<u>19 000</u>		<u>36 000</u>		<u>24 000</u>	
<i>Net current assets</i>		<u>8 000</u>		<u>44 000</u>		<u>20 000</u>
c/f		59 500		139 000		76 000



	UK plc		France SA		US Inc	
	£000	£000	Fr000	Fr000	\$000	\$000
b/f		59 500		139 000		76 000
Long-term loans		(20 000)		—		(25 000)
		<u>39 500</u>		<u>139 000</u>		<u>51 000</u>
<i>Capital and reserves</i>						
Share capital (Note 5)		20 000		80 000		32 000
Profit and loss account		<u>19 500</u>		<u>59 000</u>		<u>19 000</u>
		<u>39 500</u>		<u>139 000</u>		<u>51 000</u>

## Notes to the financial statements

### Note 1

UK plc has owned 100% of the ordinary share capital of France SA since incorporation, subscribing for it at par. The date of incorporation of France SA was 25 May 1990. France SA acts as a selling agent for products manufactured in the UK by UK plc and has no manufacturing capacity of its own. UK plc has negotiated an overdraft facility for France SA and has guaranteed the overdraft. Apart from this overdraft, France SA receives all its funding from UK plc.

### Note 2

On 30 September 1992, when the reserves of US Inc stood at \$8 million, UK plc purchased 24 million shares in US Inc for \$35 million. US Inc has a product range which is similar to that of UK plc and France SA, but is targeted more specifically towards the needs of the US market. The stock is manufactured in the USA, and US Inc negotiates its own day-to-day financing needs with US financial institutions. The \$25 million loan which was outstanding at 30 September 1998 was originally taken out on 30 June 1976 for a 30-year period. The accounting policy of UK plc is to amortise premiums on acquisition over a 20-year period. In the case of US Inc, the first write-off took place in the year ended 30 September 1993.

### Note 3

The stocks of France SA were acquired from UK plc on 31 August 1998. They represent a consignment which cost UK plc £3.6 million to manufacture but were invoiced to France SA at a price of 44 million Francs. This price represented the sterling transfer price of £4 million translated at the spot rate of exchange in force at 31 August 1998. The stocks of US Inc were all manufactured locally. The stock in hand of US Inc at 30 September 1998 represents 6 months' production.

### Note 4

- The debtors of UK plc include dividends receivable from France SA and US Inc. These debtors have been translated into sterling using the rate of exchange in force at 30 September 1998.
- The trade creditors of France SA comprise 12 million Francs payable to UK plc. UK plc's debtors include the equivalent asset translated into sterling using the rate of exchange in force at 30 September 1998.
- There was no other inter-company trading.

### Note 5

- The shares of UK plc are £1 shares.
- The shares of France SA are 1 Franc shares.
- The shares of US Inc are \$1 shares.

**Note 6**

The dates of acquisition of the tangible fixed assets of France SA and US Inc were as follows:

**30 September 1998 – Net Book Value of Fixed Assets**

<i>Date</i>	<i>France SA</i> Fr million	<i>US Inc</i> \$ million
25 May 1990	10 000	2 000
30 September 1993	45 000	20 000
30 September 1997	<u>40 000</u>	<u>34 000</u>
	<u>95 000</u>	<u>56 000</u>

**Note 7**

Exchange rates at relevant dates were as follows:

<i>Date</i>	<i>£/Fr rate</i>	<i>£/\$ rate</i>
25 May 1990	10	2.4
30 September 1992	9.5	2.0
30 September 1993	9	1.7
30 September 1997	10	1.6
31 March 1998	10.5	1.7
31 August 1998	11	1.8
30 September 1998	12	1.8

**Requirements**

- (a) Explain how the financial statements [profit and loss account and balance sheet] of France SA and US Inc will be translated into sterling for the purposes of the consolidated financial statements of UK plc. Your answer should refer to relevant Accounting Standards and should explain the treatment of the exchange difference on translation in each case. (10 marks)
- (b) Prepare the working schedule for the consolidated balance sheet of the UK plc group at 30 September 1998. Your schedule needs to show only one figure for consolidated reserves, so a separate analysis of the exchange differences is not required. (30 marks)

*CIMA, Financial Reporting, November 1998* (40 marks)

- 16.6** One of the frequent criticisms of SSAP 20, *Foreign currency translation*, is that exchange differences on net investments in foreign enterprises, and on borrowings which are a hedge, never pass through the profit and loss account.

Discuss the validity of this criticism and suggest a possible solution to the perceived problem.

*ICAEW, Financial Accounting 2, July 1993* (13 marks)