4 Financial framework and control

Introduction

4.1. In this chapter we first outline the statutory framework within which AEA operates (paragraphs 4.2 to 4.10). This is a necessary background to an understanding of the way in which DEn determines financial targets for AEA and controls and monitors its performance against those targets (paragraphs 4.11 to 4.25). We then review the financial history of AEA (paragraphs 4.26 to 4.33). We then describe briefly the financial planning and budgeting philosophy and the history of AEA's financial and accounting structure which has influenced the control of working capital (paragraphs 4.34 to 4.43) and the allocation of costs (paragraphs 4.44 to 4.55). Finally we deal with the organisation and operation of the audit function (paragraphs 4.56 to 4.73). Our conclusions and recommendations are at paragraphs 4.74 to 4.83.

The statutory framework

4.2. AEA was first established by the Atomic Energy Authority Act 1954. AEA operated with Government funding through a grant until 1 April 1984, and then a grant-in-aid up to 1 April 1986. Developments during the period 1954 to 1986 are more fully described in Chapter 2.

4.3. From 1 April 1986, the Atomic Energy Authority Act 1986 put the finances of AEA on a trading fund basis. It appears that trading fund `status' was chosen as the Government wished to make AEA financially self-supporting, and the Government trading funds were a convenient model. It was appreciated at the time that the Government Trading Funds Act 1973 could not apply as AEA is not a Government department, and therefore the change would have to be brought about by specific legislation. In practice AEA has been treated rather as a public corporation-cum-nationalised industry.

4.4. The 1986 Act laid down the powers of the Secretary of State, with the consent of HMT, to:

(a) specify the commencing capital debt of AEA; and

(b) specify the borrowing powers.

The Act also established the supervisory powers of the Secretary of State in relation to the formulation and carrying out of plans for the operation of AEA, and in determining capital expenditure in respect of particular projects, as well as the general programme of capital expenditure.

4.5. The Secretary of State decided that:

(a) AEA should assume a capital debt of £80 million at 1 April 1986 to be repaid over 20 years at the rate of £2 million every six months, with interest payable at the rate prevailing on 1 April 1986 for similar loans from the National Loans Fund (NLF); and

(b) a valuation of assets and liabilities, including a revaluation of tangible fixed assets, should be made at 1 April 1986.

4.6. The limit on borrowing was fixed at £150 million or such greater sum, not exceeding £200 million, as the Secretary of State may specify. The statutory limit has recently been increased to £200 million.

4.7. The annual report and accounts are required to be drawn up in accordance with the Atomic Energy Authority (Accounts) Direction 1987. The Direction follows very closely standard accounting practice and disclosure requirements of the Companies Acts and the Stock Exchange, and best commercial accounting practice, including requirements of the Statements of Standard Accounting Practice. There is one major additional requirement, which is a supplementary profit and loss account and balance sheet prepared on a current cost basis with a report of AEA's performance against the current cost financial target agreed between the Secretary of State and AEA.

4.8. The Comptroller and Auditor General is required to examine and certify the accounts statements, and lay copies of the accounts together with his report before each House of Parliament.

4.9. As a consequence of the move to a trading fund basis of operation, AEA's balance sheet was revamped. In summary the changes were:

(a) fixed assets were revalued from £84 million to £204 million;

(b) investments standing in the balance sheet at £3.7 million were written off against the capital account;

(c) the capital account was converted to a capital loan account of £80 million-the capital loan was deemed to be drawn on the NLF; and

(d) the amount arising from the revaluation of fixed assets to £204 million was transferred to the general reserve. This resulted in a balance on this reserve at 1 April 1986 of £150 million.

4.10. In addition to complying with the relevant statutory provisions and with any Directions which the Secretary of State may give, the financial relationship between DEn and AEA is laid down in a Memorandum. The principal features of the Memorandum include the provision of corporate plans, capital expenditure programmes, Public Expenditure Survey (PES) information and financial information.

Control and monitoring by DEn

External financing limit

4.11. The EFL is set by DEn, after discussions with HMT, on the basis of the corporate plan submitted by AEA in February/March of each year as part of the PES process. The EFL is announced in October/November of each year in respect of the financial year starting on 1 April following. The EFL is incorporated in the budget for the relevant year. The budget is included in the corporate plan submitted to DEn in February/March.

4.12. The achievement of the EFL is an important Government operating control. It is of equal importance to the business that all aspects of AEA's finances are managed to budget and/or properly determined standards. If the EFL is achieved only by deferring creditors or cutting down essential capital expenditure the planned objectives of the business may suffer.

4.13. Table 4.1 shows the source and application of funds statement for each of the five years 1986/87 to 1990/91 with budget compared with actuals.

4.14. AEA has kept within both its annual EFL and its borrowing limits since the start of the trading fund. However, performance against budget on the items comprising the source and use of funds has varied significantly. The performance against the capital expenditure budget is discussed in Chapter 11.

TABLE 4.1 **Source and application of funds: budget/actual, 1986/87 to 1990/91**

£ million

	1986/87		*1987/88*		*1988/89*		*1989/90*		*1990/91*	
	Budget	*Actual*	*Budget*	*Actual*	*Budget*	*Actual*	*Budget*	*Actual*	*Budget*	*Actual*
Source of funds:										
Profit	14.7	15.9	17.7	16.2	18.4	16.6	14.4	14.6	14.5	17.8
Depreciation	18.2	18.7	19.9	19.7	20.5	20.5	19.5	17.9	17.0	14.6
Other	2.1	1.5	1.0	3.3	3.4	4.2	2.0	4.0	1.5	8.0
Total	35.0	36.1	38.6	39.2	42.3	41.3	35.9	36.5	33.0	40.4
Use of funds:										
Capital expenditure	19.1	18.6	32.2	24.7	25.6	16.2	23.1	23.0	25.0	18.2
Increase/(decrease) in working capital:										
Stocks and work-in-progress	(1.8)	2.7	1.9	6.2	(2.4)	(5.2)	(2.7)	1.3	-	(10.9)
Debtors	14.5	35.1	(4.6)	5.4	(8.1)	(11.8)	(2.0)	0.5	-	22.0
Cash, bank	0.6	(1.3)	0.6	(0.1)	0.0	6.7	0.0	5.5	-	12.4
Decrease/(increase) in creditors	1.8	(19.2)	(1.3)	(8.8)	(4.8)	0.0	(0.1)	(12.8)	(9.8)	(6.6)
	15.1	17.3	(3.4)	2.7	(15.3)	(10.3)	(4.8)	(5.5)	(9.8)	16.9
Interest on long-term loans	9.9	8.5	8.5	8.4	7.5	7.6	6.8	6.3	6.8	8.6
Other	0.0	0.8	0.6	0.0	2.2	0.0	2.2	2.3	0.0	0.0
Total	44.1	45.2	37.9	35.8	20.0	13.5	27.3	26.1	22.0	43.7
Deficit/(surplus) in year	9.1	9.1	(0.7)	(3.4)	(22.3)	(27.8)	(8.6)	(10.4)	(11.0)	3.3
Restructuring costs	0.0	0.0	0.0	0.0	0.0	4.6	9.8	10.7	56.0	40.9
External finance required (repaid)	9.1	9.1	(0.7)	(3.4)	(22.3)	(23.2)	1.2	0.3	45.0	44.2

Source: AEA.

Financial target-return on capital employed

4.15. Apart from the need to keep within its EFL, AEA has only one financial target, which is a requirement to achieve the rate of ROCE as it is annually determined by DEn. The rate of return is calculated as the percentage of operating profit including exceptional items, but excluding interest payable and extraordinary items, to capital employed. Both operating profit and capital employed are expressed in current cost terms. For the first three years of the trading fund, 1986/87 to 1988/89, AEA was required to earn an average of 5 per cent per annum. For the two years 1989/90 and 1990/91 the ROCE was fixed at 4 per cent. For 1991/92 the rate has been put at 6.8 per cent. The target rate for 1990/91 excluded exceptional items. DEn stated that at the time the target for 1990/91 was set it was recognised that, because of the size, incidence and uncertainty of restructuring costs in that year, AEA could not be expected to make a profit after exceptional items. The financial target was set in that year at 4 per cent ROCE calculated according to the current cost convention and based on profits earned before long-term interest payable and the exceptional and extraordinary items.

4.16. In 1991/92 the financial target has been fixed at 6.8 per cent ROCE calculated according to the current cost convention and based on profits earned before long-term interest payable and extraordinary items, but after exceptional items. This was a return to normal practice, it having been made clear to AEA that 1990/91 was an abnormal year. However, the 1991/92 target excludes the exceptional item of £5.3 million on profits from the disposal of assets. This is because of the uncertainties of the property market.

4.17. DEn told us that the principle followed in setting the ROCE target was that it should be `challenging but achievable'; and that it aimed `to set AEA as high a target as it can reasonably be expected to achieve, having regard for the many factors which influence AEA's many activities, and following an intensive and critical examination of the AEA Corporate Plan'. The ROCE financial target rate is normally determined in conjunction with AEA and reflects the current AEA Corporate Plan. That the decision on the target is influenced by the results forecast in the plan is illustrated in a letter from the Secretary of State to the Chairman of AEA dated 23 January 1991. In relation to the financial target (ie the ROCE) the letter states:

> I am keen also to set the Authority's financial target. However, I recognise that this cannot be done sensibly until you have completed your current round of corporate planning. I would hope that, as soon as the results of that planning are available to you, we will be able to agree an appropriate target.

DEn further explained that AEA was expected to repay its loans from profits and other funds generated by its activities and that this would involve achieving higher profits than in the past. The 1991/92 target had been set at 6.8 per cent, compared with 4 per cent for 1990/91, and there would be further increases as AEA's commercial development progressed. On the adequacy of the target to cover loan repayments, the test applied was whether AEA's forecast funds statement showed an adequate cash flow. The statement in the current AEA Corporate Plan covers the period when the loans are being made and consequently shows net increases in loans (although by the last year- 1994/95-the AEA Corporate Plan indicates a small positive cash flow). DEn expected that the plans for future years would indicate a reduction in borrowings commensurate with the repayment periods set when the loans were made.

4.18. The target is fixed after the corporate plan is drawn up, and constitutes more a forecast of profit outturn than a target towards the achievement of which the business is proactively planned and managed. Examples of such a proactive target would be:

(a) raising AEA's position in the profit performance table for its industry sector (although meaningful comparable performance data would not be easy to obtain); and

(b) the level of profit needed to enable AEA to self-fund its requirements explicitly including items such as the servicing and repayment, within a defined time-scale, of its restructuring-related loans.

AEA's operating profit targets

4.19. AEA told us that in determining the operating profit level for the budget it had two objectives. First the profit level should be achievable, and secondly the profit level should show a satisfactory rate of increase over previous years, thus moving to the establishment of a satisfactory profit record. Over and above this AEA confirmed that its current medium-term profit target was the achievement of an operating profit of 10 per cent on turnover. The operating profit is expressed before interest payments, but after any expenditure on CR and business development. As described in Table 4.7, for the years 1986/87 to 1990/91 the percentage operating profit to turnover has been between 3 and 4 per cent compared with the medium-term profit target of 10 per cent.

Profit contingency reserve

4.20. In a minute of the Board meeting held on 12 September 1991 it is stated that AEA has not so far used any of the substantial profit contingency reserve for the year 1991/92. AEA confirmed the profit contingency reserve at £5.2 million. This contingency is created by showing a lower profit in the budget and corporate plans submitted to DEn than the sum of the profit targets allocated to each of the businesses and other profit-generating areas of AEA. DEn said that it was aware that the AEA Board, in setting the annual budget, had for reasons of commercial prudence taken a cautious view of the profits forecast by individual businesses, but it was not aware of the amount involved.

Quarterly monitoring by DEn

4.21. DEn is responsible for monitoring the progress, at quarterly intervals, which AEA is making towards the achievement of its budget and financial target. DEn told us that, although actual performance to date was important, of equal importance was the level of confidence it could draw from the figures that the final out-turn for the year would be achieved.

4.22. Table 4.2 shows the cumulative actual and budget figures for certain key data in each quarter of 1990/91.

TABLE 4.2 **Cumulative quarterly budget and actual comparisons, 1990/91**

£ million

	Quarter ended June 1990	*Quarter ended September 1990*	*Quarter ended December 1990*	*Quarter ended March 1991*
Turnover-budget	92.2	198.4	310.2	430.0
-actual	57.6	164.2	276.8	452.6
Operating surplus-budget	2.8	7.6	9.8	14.2
-actual	2.1	8.3	13.6	16.9
Change in stocks and work-in-progress				
increase/(decrease)-budget	13.5	13.8	13.4	-
-actual	30.6	29.2	29.4	(10.9)

Source: AEA.

The table illustrates some of the inconsistencies in performance against budget through the year with, for example, operating surplus sometimes better than budget despite lower than budgeted turnover.

4.23. Up to the first quarter of 1991/92 no quarterly balance sheet information was made available to DEn. The absence of both actual and budget balance sheets at each quarter-end means that there is no quick way of determining whether the operating variances are consistent. For example, with balance sheet actual and budget information, it is relatively easy to see that shortfalls in turnover may be compensated by increases in uninvoiced work-in-progress. Similarly, cash flow variations and pressure on liquidity can be identified through the debtor and creditor levels. Up to the end of 1990/91 a historic cost balance sheet was produced quarterly, but this showed the latest estimate for the financial year in question compared with budget. Table 4.3 details the latest estimate of the balance sheet for the year to 31 March 1991 in a summarised form as submitted at quarterly intervals to DEn.

TABLE 4.3 **Latest estimated balance sheet at 31 March 1991 as submitted to DEn**

£ million

	Date balance sheet submitted			
	June 1990	*September 1990*	*December 1990*	*March 1991 (actual out-turn)*
Total fixed assets	163.9	160.6	153.6	147.4
Current assets	105.8	98.8	110.6	142.1
Current liabilities	(92.2)	(157.9)	(149.9)	(141.1)
Net assets	177.5	101.5	114.3	148.4

Source: AEA.

DEn's monitoring of Programme Letters

4.24. The work carried out by AEA for DEn is covered in Programme Letters (see Chapter 14). These contain details of the workplan together with cost estimates. In order to ensure that there is adequate cash funding for the Programme Letters, DEn pays AEA at the end of each month on the basis of a payments profile agreed with AEA. The monthly settlements are made independently of any actual charges which may be incurred during the month. An adjusting invoice is prepared quarterly showing any under- or overpayments against the value of work done in the quarter.

4.25. DEn said that, in the months where the quarterly adjustment was made, it had difficulty in forecasting accurately its own funding requirements from HMT. DEn was also concerned that, because of the payments profile procedure, there was less pressure on AEA to produce in good time its invoices for work completed. This can have the effect that problems of over- or underspend only become apparent late in the year. AEA confirmed that, in 1990/91, because of a specific cash limit imposed by DEn, it had recovered £13 million only from DEn in respect of the costs of £14.9 million incurred on the fast reactor restructuring programme.

Financial history

Turnover and profits

4.26. The turnover and profit history of AEA is summarised in Table 4.4.

TABLE 4.4 **AEA: profit and loss account (historic cost)**

£ million

	Year to 31 March				
	1987	*1988*	*1989*	*Group 1990*	*Group 1991*
Turnover	415.0	428.6	438.8	440.2	452.6
Operating profit	15.6	15.7	16.3	13.7	16.9
Interest payable less receivable	(8.1)	(7.9)	(7.0)	(5.4)	(7.4)
Loss from interests in associated undertakings	0.0	0.0	0.0	0.0	(0.2)
Amounts written off investments	0.0	0.0	0.0	0.0	(0.2)
Profit on ordinary activities	7.5	7.8	9.3	8.3	9.1
Exceptional item	0.0	(5.0)	(25.6)	(116.6)	(59.3)
Profit/(loss) on ordinary activities after exceptional item	7.5	2.8	(16.3)	(108.3)	(50.2)
Extraordinary item	0.0	(15.0)	(14.4)	(35.9)	10.2
Profit/(loss) for year	7.5	(12.2)	(30.7)	(144.2)	(40.0)

Source: AEA.

4.27. In real terms turnover has fallen progressively over the five years of AEA's trading fund history, although in absolute terms turnover has been approximately even over the period. The principal reason for the static turnover is the progressive withdrawal of DEn from experimental reactor activities, although in the current year this loss of turnover is compensated by an expanding decommissioning and radioactive waste treatment programme. Table 4.5 summarises the actual turnover over the five years to March 1991.

TABLE 4.5 **AEA: turnover, 1986/87 to 1990/91**

£ million

	1986/87	*1987/88*	*1988/89*	*1989/90*	*1990/91*
DEn Programme Letter excluding DRAWMOPS	185.5	156.4	148.5	150.5	124.4
DRAWMOPS Programme Letter	14.3	22.5	34.2	39.6	82.3
DEn non-nuclear	10.5	14.4	11.7	12.9	15.8
Sub-total DEn	210.3	193.3	194.4	203.0	222.5
Other customers	204.7	235.3	244.4	237.2	230.1
Total invoiced sales	415.0	428.6	438.8	440.2	452.6

Source: AEA.

4.28. Profits on ordinary activities have shown a slight increase in the later years. When set against the relatively static turnover, the profit levels reflect some success in reducing costs through staff reductions and items such as a reduced level of employer's contribution to pension funds. However, because of the high element of `cost-plus' contracts, AEA said that much of the savings accrued to the benefit of customers rather than increasing profits. The exceptional and extraordinary items shown in the years 1988 onwards are provisions made to cover restructuring programme expenditures. More details on restructuring programme costs are given in Chapter 9.

Balance sheet

4.29. Summarised balance sheets for each of the five years ending in 1991 are set out in Table 4.6.

TABLE 4.6 **AEA: summarised balance sheets (historic cost) at 31 March**

£ million

	1987	*1988*	*1989*	*Group 1990*	*Group 1991*
Tangible fixed assets	201.9	206.0	168.1	150.7	147.3
Investments	0.1	0.1	0.1	0.4	0.1
Stocks and debtors less creditors other than borrowings*	62.1	65.0	46.5	37.8	48.0
Capital employed	264.1	271.1	214.7	188.9	195.4
Borrowings net of cash	(22.9)	(25.6)	(4.6)	(0.6)	(8.2)
Net assets	241.2	245.5	210.1	188.3	187.2
Capital and reserves:					
Capital loans	79.0	73.0	64.0	60.0	86.0
General reserve	150.1	150.3	150.3	150.3	150.3
Profit and loss account	7.4	(4.8)	(42.3)	(186.5)	(226.5)
	236.5	218.5	172.0	23.8	9.8
Provision for costs of restructuring 0.0	20.0	24.8	147.7	154.6	
Other provisions	4.7	7.0	13.3	16.8	22.8
Net equity	241.2	245.5	210.1	188.3	187.2

Source: AEA.

*Debtors include restructuring debtors.

4.30. The effect of the restructuring programme is seen in the debit balance on the profit and loss account of £226 million which effectively wipes out the general reserve. As restructuring programme costs mature, the provision will be run down, with capital loans increasing as NLF draw-downs are made to meet the restructuring programme expenditures.

Performance against the ROCE target

4.31. AEA has failed to meet its current cost ROCE target fixed by DEn since the inception of the trading fund arrangement, with the exception of 1990/91 when the target excluded exceptional items. On a historic cost basis the percentage ROCE achieved has averaged just below 7 per cent. The most significant adjustment between historic and current cost in the case of AEA accounts is the higher depreciation and higher average capital employed, in each case because the value of the fixed assets is indexed. Table 4.7 sets out both the historic and current cost return on average capital employed and compares the current cost return with the financial target established by DEn for the five years to 1991.

TABLE 4.7 **AEA: historic and current cost return on average capital employed at 31 March**

£ million

	1987	*1988*	*1989*	*1990*	*1991*
Historic cost					
Operating profit (before interest)	15.6	15.7	16.3	13.7	16.9
Average capital employed*	254.3	267.6	242.9	201.8	192.2
Percentage return on capital employed	6.1	5.9	6.7	6.8	8.8
Percentage operating profit to turnover	3.8	3.7	3.7	3.1	3.7
Current cost					
Profit/(loss) before long-term interest and extraordinary items	12.5	8.1	(15.0)	(110.6)	12.8
Average capital employed	242.9	256.1	246.2	223.7	217.3
Percentage return	5.2	3.2	(6.1)	(4.94)	5.9†
Financial target percentage‡	5.0	5.0	5.0	4.0	4.0

Source: AEA.

*The figures for capital employed are simple averages of the amounts at the beginning and end of each financial year.
†The target for 1990/91 was before exceptional items.
‡The target for 1987 to 1989 was an average of 5 per cent over the three years.

4.32. AEA said that there was a case for reviewing its performance against a target return excluding those exceptional items relating to the restructuring programme. The size of the restructuring programme is a long way in excess of the level of ongoing restructuring spend in a more normal situation. AEA's performance against a target ROCE excluding exceptional costs-which in the case of AEA were unusually large-is set out in Table 4.8. This shows that AEA did as well as or bettered a ROCE target which excluded exceptional items.

TABLE 4.8 **Comparison of ROCE (excluding exceptional items) with actual results**

	ROCE target %	*Percentage return achieved*
1986/87 to 1988/89	5 average	5.0
1989/90	4	4.4
1990/91	4	5.9

Source: AEA.

Net profit

4.33. The form of the financial target is a ROCE and is consequently based on operating profits declared after exceptional items, but before long-term interest payment (exceptionally, the 1990/91 target was set before exceptional items). However, AEA has as its trading fund objective to be financially self-supporting, progress towards which needs to take account of net profit performance. DEn told us that, when setting the target, it recognised the importance of considering the level of net profit associated with operating profit; and that consequently, it assessed-having regard for the Plan projections-the level of interest payments to be incurred and the adequacy of the balance of net profit to provide a margin sufficient to cover AEA's growth plans.

Financial and accounting structure

4.34. As mentioned in Chapter 2, each AEA site was, up to the very recent past, managed by a Site Director. The Site Director was supported by the usual service functions, such as accounts, personnel, computing and the like. The heads of these functions reported to the Site Director, either directly or through a management hierarchy. The functional relationships between the sites and CHQ were relatively limited. The Chief Accountant on a site saw his line of accountability to the Site Director, though he had a functional responsibility to the Executive Director Finance at AEA level.

4.35. The semi-autonomous nature of the sites and Site Directorate strongly influenced the development of the financial and accounting procedures. Up to the recent past there was little standardisation in the site accounting systems, other than what was required to satisfy the contractual requirements of Government customers and to meet the statutory accounting and reporting requirements. Most of the control and monitoring activities were carried out by the Site Directorate and relatively limited accounting information, mainly concerned with profit and cash flow, was submitted to CHQ as a matter of regular routine.

Financial planning and budgeting

4.36. Financial planning and budgeting is carried out as part of the corporate planning activity. The budget is a development of the first year of the AEA Corporate Plan. The planning procedures and timetable are discussed more fully in Chapter 3. The budget is produced after the EFL for the budget year has been announced. In the normal way, therefore, the budget will be built around the appropriate EFL.

4.37. Budget and planning parameters, such as escalation rates, together with budget and planning timetables, are issued centrally. The sites have computerised budget/planning systems for the production of the operating budgets. There is, however, no integrated budget/planning system which produces integrated balance sheets and cash flow forecasts. The operating budgets can be phased using the computerised budget system, but because there has been no balance sheet budgeting system, there are no phased balance sheet forecasts and the phased cash forecasts have not been reliable.

Control of working capital

4.38. Each of the sites maintains debtor, work-in-progress and creditor ledgers. It is planned, after implementing FIS, that each of the businesses and sites will have their own ledgers and be responsible for accounting and follow-up.

4.39. There are no automated or manual procedures for the production of phased balance sheet budgets, either for businesses or sites. To date the only balance sheet budgets which have been produced are for the year-end position. Apart from the lack of budgets for balance sheet items, no standard criteria such as standards for debtor days or work-in-progress days have been established, and there is no reporting against such criteria. The sites produce regular listings of debtors by age which are expected to trigger effective action on debt collection.

4.40. AEA confirmed that it had been less than successful in contract administration and the timely preparation and despatch of invoices. Table 4.9, which covers the quarter-ends March 1990 to March 1991, illustrates the effect on the level of working capital of the absence of appropriate contractual arrangements to secure progress payments and/or the failure to prepare and despatch invoices promptly. It should also be noted that debtor levels are lower than they would be if prompter invoicing was achieved.

TABLE 4.9 **Quarterly summary of AEA's working capital, 1990/91**

	Actual balance sheet position				
	March 1990	*June 1990*	*Sept 1990*	*Dec 1990*	*March 1991*
Work-in-progress	32.2	63.6	65.6	62.8	24.6
Debtors	63.0	48.1	50.8	74.0	75.9
Creditors (excl restructuring)	67.3	73.2	61.1	70.6	68.0

Source: AEA.

4.41. There is other evidence to suggest delays in debtor collection. The standard terms of trade call for payment within 28 days of the date of invoice. Debtor levels indicate that the sites fall well short of this standard. Debtor days statistics are set out in Table 4.10. Apart from the provision for specific doubtful debts made at local level, a corporate provision of £3.7 million was made in the 1990/91 accounts after agreement with the auditors. The provision was based on 5 per cent of trade debtors and some work-in-progress items and was intended to bring AEA's provision more in line with commercial practice. Specifically it was driven by the need to take account of the fact that the work done for the private sector as opposed to the Government is subject to business failures as a result of the United Kingdom recession. It was also intended to take account of the greater reluctance on the part of all customers to pay if milestones are not met or the quality of work is alleged to fall short of customer expectations.

TABLE 4.10 **Debtor age statistics, 1991/92**

	A *Total debtors* *£'000*	*B* *Outstanding* *60 days plus*	*B/A* *%*
Winfrith (period 6)	3,210	1,337	42
Harwell (period 6)	18,596	4,952	26
		90 days plus	
Risley (period 3)	11,893	1,944	16

Source: AEA.

4.42. The normal policy for payment of creditors' invoices is for settlement at the end of the month following receipt of the invoice. Although not normally stated specifically in formal contractual terms and conditions, this standard policy is applied unless particular circumstances warrant otherwise. For example, if the supplier owes AEA significant amounts of money, the normal period of credit may be extended. Invoices are not normally processed through the accounts payable accounting system until properly supported by goods received notes or other authorisation. All discounts will be taken where appropriate, and this may mean payment is made outside the normal terms. AEA told us that it had recently undertaken to become a founder member of the Code of Practice which the Confederation of British Industry (CBI) planned to introduce to encourage good payment practice. This would involve AEA's name being entered on a register of organisations prepared to pay invoices from suppliers within agreed contractual terms.

4.43. AEA recognises that the administration and control of debtors can be improved at business level. This is evidenced by the proposal to introduce an internal interest charging mechanism in 1992/93. This is intended to penalise poor business contract administration and reward good cash collection performance.

Allocation of costs

4.44. The structural move from a site- to a business-centred organisation which started in April 1990 has created the need for parallel changes in the accounting system for collecting and allocating costs. These changes are temporary to cover the transition up to the implementation of FIS in April 1992. Up to that date sites will continue to be responsible for accounting and the changes which have taken place to accommodate the new business structure have been made within the existing job costing system. In order to obtain operating results for each of the businesses a system named BORIS (Business Oriented Information System) has been superimposed on the existing site systems to provide summarised profit and loss information for the businesses.

4.45. The basic principles adopted under the existing system for cost collection and allocation are relatively uncomplicated. Costs are grouped under five principal headings, namely:

(a) labour;

(b) direct supplies;

(c) corporate overheads;

(d) business overheads; and

(e) site overheads.

These are discussed separately in the following paragraphs.

Labour costs

4.46. Actual labour costs are charged, through the payroll summaries, to a series of holding accounts which are determined by businesses and sites. These holding accounts are cleared by debits to either projects, business or site departments based on time records of days worked charged out at a standard labour rate. The standard labour rates include basic pay, employer's national insurance and superannuation contributions, site allowances, shift allowances and overtime premium. AEA told us that the forthcoming financial year's standards were based on the previous year's standard adjusted for the expected pay rate escalation and other similar changes. There is a standard rate for each of the eight pay bands used by AEA. The standard rates so established are used for charging days worked by those staff who are directly employed on projects and by those `overhead personnel' engaged in the business and site overhead departments.

4.47. The differences between the actual payroll costs charged into the holding account and the standard charges on-charged either to direct projects or overhead accounts represent an under- or over-recovery of labour costs. The variances can arise in a number of ways including:

(a) an over-recovery in the first part of the year due to the fact that the standard rate includes estimates for annual pay rises (the most significant pay rises are effective in August of each year);

(b) a variance due to the actual weighting in any particular pay band being different from the average weighting incorporated in the standard rate;

(c) variances from the assumed standard in any of the other elements making up the payroll, such as site allowances, shift allowances and overtime premium; and

(d) variances from the 210 productive days assumed in the standard.

These variances are not analysed in detail as a regular procedure, but idle or unrecovered time or other reasons for non-standard results are identified if the total variance is significant.

Direct supplies

4.48. Direct supplies or services required for a project are allocated directly to the project. Other supplies from external sources are allocated to the user overhead department.

Corporate overheads

4.49. Corporate overheads include the costs of CHQ, payroll processing, the central superannuation office, epidemiological studies, nuclear materials accounting charges, and AEA's insurance premiums. In general corporate overheads are allocated to sites and business overhead departments on an average per capita basis. However, certain costs, for example nuclear materials accounting, are charged to those businesses/sites using such services.

Business overheads

4.50. Business overheads include those departments of the business which are not directly involved in saleable projects. They include, for example, the business Chief Executive and his support staff, Marketing/Sales Departments, the Business Secretary/Finance Departments, together with the businesses' share of corporate overheads and those site department costs which are not allocated directly to projects. Business overheads are allocated to projects on the basis of a predetermined (or budgeted) overhead percentage rate added to the standard labour charged directly to projects.

Site overheads

4.51. Site overheads cover all the site service functions. Essentially they represent services required by the businesses on the site and include estates, utilities, management computing, transport, finance and accounts, personnel and all such services of a support nature.

4.52. The systems used for accounting for site departments vary with each site. A move towards standardisation of site procedures was initiated in mid-1990, but it has been decided to wait until April 1993, to give FIS time to `bed down', before any corporate-wide standardisation is implemented. AEA said that the lack of standardisation had impeded the drive towards the most cost-efficient site department organisations because of the difficulties of cost comparisons and the like.

4.53. Site department costs include the costs of using the services of other site departments. This cross-charging can give rise to a good deal of work. For example, whilst the Finance Department uses the Computer Department and therefore receives a charge for the use of the Computer Department facilities, similarly the Computer Department utilises the Finance Department. The Finance Department charge to the Computer Department then included in Computer Department costs gives rise to a further increase in the charge to the Finance Department, and so on. Some sites are involved in up to five iterations. All these inter-site department cross-charges cancel out to zero, so that the net total charge to all businesses is not affected. Where, unusually, a business is an exceptionally heavy user of one department the impact of cross-charging may be significant.

4.54. Site department costs are recovered in one of four general categories. These are:

(a) *Estates rental*. Accommodation costs are usually recovered from businesses on the basis of space occupied and type of building, distinguishing between office, laboratory and storage-type premises. Utility costs may be part of the general rental cost, but where it is possible to charge on the basis of usage, this is done.

(b) *Nuclear-related*. Costs specifically identified with nuclear activities are charged to the businesses which incur them. The nuclear overhead includes charges for safety, occupational health, special nuclear materials management, active pipelines, and the additional police security required for nuclear facilities. In certain cases the nuclear overhead is split between `high' and `low'. The `high' version generally covers activities involving Category I and II nuclear materials.

(c) *Per capita charges*. These cover services where a more specific charging mechanism has not been available because of the `general benefit' nature of the service provided. These include finance, accounts, personnel, catering, some security and safety costs.

(d) *On-demand services*. These services are charged on a tariff basis according to usage directly to the project using the service. Although there are local differences between sites, on-demand services include computing, instrumentation, graphics/reproduction, transport, some site engineering services, training and chemical analysis.

4.55. As part of the `business' philosophy of AEA, businesses can negotiate with site departments on the level of service and the cost of that service. Businesses are also free to use external services rather than site departments. AEA's general policy on contracting-out is more fully described in Chapter 8. AEA told us that, if the use of any external service by any business seemed likely to result in significantly higher unit costs for the remaining businesses using the internal service, then the relevant Managing Directors would be consulted to ensure that AEA as a whole would not be incurring higher costs in total by using any such external service.

Internal audit

4.56. The Internal Audit Department has been reorganised several times in recent years. In April 1989 there were two separate audit teams, at Risley and Harwell, and a corporate audit unit including an efficiency unit at Harwell. The site teams reported functionally to the head of corporate audit who answered to the Director of Quality and Performance (DQP). Staff supervision on sites was the responsibility of local senior administrators.

4.57. In April 1990, as a result of a report by the then DQP, audit became a single corporate function with no site managerial involvement. The head of department continued to report to the DQP. The report recommended staff numbers be reduced to 19. AEA told us that, as a result of recruitment difficulties and transfers to sites and businesses, actual staff levels were below establishment.

4.58. A further review in February 1991 changed the structure of the department to that of today. There is an internal audit section and an internal management consultancy which was formerly the efficiency unit. The head of department reports to the Executive Director Finance. He has the right to separate meetings with the Chief Executive and/or the Chairman although this right has never been exercised. The Audit Committee reviews the performance of the department, usually annually.

4.59. The outline plan for the second half of 1991/92 and 1992/93 includes a further reduction in staff to 17.5 on average, decreasing to 16 by March 1992. The cost of running the department in 1990/91, including allocated overheads, was £675,000, which provided 180 man-days of consultancy and 1,090 man-days of audit and FIS support.

The work of the Internal Audit Department

4.60. The function of the department is to provide the Board with comfort that procedures and checks are in place, as laid down in AEA directives and in financial and other manuals.

4.61. As well as performing audit functions of a traditional nature, the Internal Audit Department also acts as auditor to a range of recreational associations and welfare funds within AEA. AEA regards this latter work as part of its contribution to the proper management of these associations, but is encouraging them to have professional financial help from outside AEA.

4.62. The accounting systems presently subject to audit are diverse (see Chapter 5), but will be standardised over the next accounting year when FIS is introduced throughout businesses and sites. An audit programme is devised before each financial year and approved by the Audit Committee. Each accounting area is subjected to risk analysis and the results of this analysis determine the frequency of each audit visit. Currently the department is working to a three-year cycle, but the higher risk functions, eg cash and debtors, are audited at more frequent intervals. The department plans to continue to move away from a reliance on transaction auditing and to concentrate more on systems auditing. AEA told us that its risk analysis had led it to believe that it could eliminate some low-risk areas and reduce the frequency of auditing in other cases. It was confident that staff reductions would not affect the integrity of the work. AEA told us that the National Audit Office (NAO), AEA's external auditor, was broadly content with these changes.

4.63. Due to a manpower shortage, only 75 per cent of the 1990/91 audit programme was completed, but AEA told us that all important control areas were covered. 142 audit reports were produced in the 18 months to 30 September 1990. Each report is sent to the auditee (except where a clean bill of health is given) and a prompt response is required. However, in practice responses are frequently slow and have sometimes taken several months. The Internal Audit Department told us that it planned to report 15 days after the completion of the audit and expected a response 30 days after that.

4.64. Two major errors have been investigated in the last two years. An Ecu bank account of £304,000 (equivalent) was discovered by NAO as unrecorded in the Winfrith accounting system at 31 March 1990. Also at Winfrith a computer system recording man-hours was installed without proper checks as to its completeness and accuracy. This led to what AEA called a `disaster', in that work-in-progress at Winfrith was wrongly recorded for several months, which led to under-invoicing of clients. Substantial efforts were needed to remedy the position.

NAO

4.65. The statutory auditor of AEA is the Comptroller and Auditor General, the head of NAO. He is appointed by the provisions of section 4 of the Atomic Energy Authority Act 1954. Under this Act the Comptroller and Auditor General `shall examine and certify the statements and lay copies thereof, together with his report thereon, before each House of Parliament'. The form of the accounting statements is laid down by HMT. NAO also audits AEA's restructuring grant claims on Programme Letters on behalf of DEn.

4.66. NAO audits the accounts and produces a management letter which makes observations on AEA's accounting procedures and may recommend changes. Both the management letter and AEA's reply are considered by the Audit Committee.

4.67. The examination of the 1990/91 AEA accounts led to comments in the management letter on the recording of fixed assets, stocktaking procedures and stock provisions, currency translations, creditor debit balances, creditor payments and duplicate payments.

4.68. As in previous years NAO was unable to place direct reliance on the work of Internal Audit, but workplans were exchanged, and discussions regarding the elimination of duplicate work continue. AEA told us that it would like NAO to accept some of Internal Audit's work as replacing that of NAO, but saw some practical difficulties in implementation. AEA's view, endorsed by NAO, was that a lower audit fee could be achieved by improving the financial systems of AEA, thus making the work of NAO easier. NAO felt that the development of internal audit was to be fostered and reliance placed on it whenever possible, in particular where internal audit effort was related to figures in the accounts. Positive progress was being made and NAO quoted two examples:

(a) the new FIS development where NAO intended to rely extensively upon an agreed programme of work being undertaken by Internal Audit; and

(b) pensions audits where Internal Audit was to take on agreed testing of transactions and balances.

Audit Committee

4.69. The Audit Committee is the main committee of the Authority Board (see Chapter 2). It is chaired by a part-time member and currently comprises three further part-time members and the Executive Director Finance. Membership is open to all part-time members of the Board. A secretary is provided by CHQ Financial Department.

4.70. The Audit Committee's terms of reference are:

> to keep under review and to advise the AEA Chairman on issues affecting the overall efficiency of AEA's systems of organisation and management and to report to AEA from time to time.

The committee has powers to call for reports and presentation by staff of AEA. AEA quoted as a recent example a review of cash and banking procedures brought about by the critical NAO report on an unrecorded Ecu bank account at Winfrith (see paragraph 4.64).

4.71. During the last two years the committee has received and considered reports on many aspects of AEA's operations. It has paid particular attention to progress on the design and implementation of the new FIS.

Internal consultancy

4.72. The internal consultancy of the Internal Audit Department carries out a variety of cost-saving exercises on behalf of businesses and sites. From April 1992 this service will be on a tariff basis. AEA told us that the consultancy fell naturally as part of the internal audit function, allowing staff flexibility and promotion prospects.

4.73. In three projects in 1991 the consultancy identified £17.4 million of potential cost savings. Businesses and sites have committed themselves to savings worth £13 million which will lead to £5 million profit enhancement (the difference being accounted for by those savings benefiting customers).

Conclusions and recommendations

Setting the ROCE target

4.74. The ROCE target set by DEn is based on the AEA Corporate Plan submitted by AEA in March and agreed by DEn. In drawing up the plan AEA's objective is an achievable profit with a satisfactory rate of increase over previous years. The determination of the target is strongly influenced by the forecast results shown in the plan, although DEn tests the adequacy of the target to cover loan repayments by reviewing the cash flow in the plan. The test only covers the three forward years of the plan. It does not address explicitly the longer-term profit performance which would be required if the objective set for AEA by the Secretary of State `to achieve returns that enable it to fund the cost of restructuring and make a return to the Exchequer' is to be met. The target, as currently set, does not reflect an orderly progression towards financial self-sufficiency. We conclude that the incorporation of such longer-term goals into the target-setting process could be expected to encourage AEA to adopt a more proactive planning and management of the business towards achievement of its objectives.

4.75. We recommend that the ROCE target set by DEn should recognise wider strategic objectives including a more explicit regard for the profit levels necessary to make AEA self-funding.

Monitoring by DEn

4.76. The quarterly reports submitted by AEA to DEn show considerable fluctuations between the actual and budgeted operating results and cash flow forecasts. Moreover, up to the first quarter of 1991/92, no actual balance sheet was made available; nor was any budget balance sheet information submitted. The quarterly figures are used not only to monitor progress, but also to substantiate the probability of achievement of the full-year budget. We conclude that the level of variances in the quarterly cumulative operating results between actual and budget, and the lack of balance sheet information, have inhibited the monitoring. We recommend that AEA should, with effect from budget 1992/93, review the process it adopts for phasing the operating budgets to ensure that they more closely reflect the expected out-turn during the year.

Monitoring working capital items

4.77. There are no phased budget balance sheets for either sites or businesses. Neither management nor staff, therefore, have a quick comparator against which to measure actual levels of working capital items during the year, nor is there any indication of the extent of any deviation from the plan for the year. We conclude that effective monitoring and management depend on the timely recognition of deviations from any plan. We recommend that the present budgeting system should be extended to incorporate an integrated phased balance sheet and funds flow statement, to be implemented for 1993/94, and that reports to all appropriate levels of management should include the phased budget and variances from actuals.

Critical control targets

4.78. Site management has been responsible for monitoring the level of working capital items such as debtors, stocks and work-in-progress. At year-end, there are obvious pressures to get out invoices and collect debts. However, during the year there appears to be less concern about levels of work-in-progress and debtors. We conclude that a more effective monitoring of management performance in relation to working capital items is necessary, although we accept that the proposed internal interest procedures, yet to be introduced, may strengthen the management motivation towards improved control.

4.79. We recommend that by September 1992 a set of target criteria for working capital items should be established, such as work-in-progress days, debtor days and targets for invoice production and despatch. These criteria should be used in conjunction with an enhanced reporting system to all appropriate levels of management, providing period-by-period actual levels against the standard criteria, so as to trigger and direct corrective management action.

Non-standardisation of site department accounting

4.80. Steps towards standardisation of the procedures for collection, classification and allocation of site service department costs were taken in April 1990. This was four years after the inception of the trading fund, although it has been recognised that such standardisation would facilitate monitoring and control of costs, and focus management's attention on costs requiring remedial action. We conclude that the standardisation of the accounting procedures for site services departments might have been effected much earlier. We recommend that management should implement the required changes in site services accounting procedures by April 1993.

Standard labour rates

4.81. Standard labour rates are produced for the beginning of each financial year. The standards are based on the previous year's standard adjusted for the expected pay rate escalation and other similar changes. The standard rates so established are used for charging days worked on projects and in site and business departments costings. Variances between standard rates and actual cost are not as a matter of course analysed in detail. We conclude that it is critical to the effective control, monitoring and allocation of costs that the standard rates closely reflect actual payroll costs. We recommend that AEA should, by September 1992, review its procedures for monitoring and adjusting standard pay band rates to ensure that the rates properly reflect actual payroll costs.

Audit Committee

4.82. The Audit Committee has a wide-ranging brief to keep AEA's efficiency under review. Its membership is open to all part-time members of the Board, with the addition of the Executive Director Finance. We conclude that it is inappropriate for the Executive Director Finance to be a member of the Audit Committee. We recommend that as from April 1992 the Executive Director Finance should attend Audit Committee meetings as an observer and only by invitation.

Audit reports

4.83. The credibility of the work of Internal Audit depends upon the acceptance of its audit reports and the prompt response of the audited department to recommendations. The responses have been slower than acceptable in the past and it has now been agreed that audit reports are to be produced within 15 days of the audit, followed by a response within 30 days after that. We also note that audit reports are not put before the Audit Committee except in extracted and summarised form as part of an annual review. We conclude that AEA has not attached sufficient importance to internal audit reports. We recommend that, with immediate effect, audit reports and responses should be given more prominence by putting before the Audit Committee an executive summary of each report requiring a response, together with the response and response time.