ECONOMIC PERSPECTIVE

REFORMING THE SCOTTISH WATER INDUSTRY: ONE YEAR ON

by John W Sawkins, Department of Economics, Heriot-Watt University

1. INTRODUCTION

On 1st April 1996 the Scottish water industry was restructured as part of the wider process of local government reform. Under the terms of the Local Government etc. (Scotland) Act 1994 responsibility for the delivery of water and sewerage services transferred from the twelve regional and islands councils to three new public water authorities. As part of the same reform package the Central Scotland Water Development Board was abolished and a new body, the Scottish Water and Sewerage Customers Council (SWSCC), established. Taken together these changes amounted to the most radical institutional restructuring in over two decades. And for those working in the industry, they signalled the beginning of a period of heightened uncertainty, increased change and rapid innovation.

The first anniversary of this event is an appropriate juncture at which to review and analyse the reform process. This paper addresses that task by discussing the rationale underpinning the institutional changes, before highlighting particular aspects of the way in which the new regime has functioned. The future of the industry is discussed and proposals are made for further institutional reforms.

2. THE REFORMS

Rationale

The Government had many reasons for seeking to reform the Scottish water industry: and several reasons for leaving it alone. Of the former, the most pressing was the need to improve the water environment, to raise the quality of drinking and bathing water through enhanced treatment and disposal of water and sewage.

The rising public interest in environmental issues in general had combined with an increased volume of European environmental legislation to propel this issue towards the top of the Government's legislative agenda in the late 1980s and early 1990s. In its consultation paper 'Water and Sewerage in Scotland: Investing for our Future'[1] the Scottish Office indicated that around £5 billion would be needed over the next 15 years in order to bring Scottish water and sewerage services up to European standards. Approximately half of this would be devoted to quality improving measures and half to the maintenance and replacement of existing infrastructure. Projected costs for the European Directives on Drinking Water (80/778/EEC) and Urban Waste Water Treatment (91/271/EEC) were estimated to be £1.2 billion and £1.3 billion respectively.

A second reason for reform was the opportunity offered by Scottish local government reorganisation to undertake a fundamental re-examination of the institutional structure of the industry. The structure inherited from the 1975 local government reorganisation was one in which twelve separate authorities (the regional and islands councils) had responsibility for the delivery of water and sewerage services to just over five million people in total. In England and Wales three of the ten water and sewerage companies served more than 6 million consumers[2] each. This comparison led many associated with the Scottish industry to support the consolidation of operations in order to promote integration and facilitate the strategic management of human and non-human resources.

Although the Scottish Office set out a balanced and coherent rationale for reform in its 1992 consultation paper the Government had good reason to proceed with caution. The debate which followed revealed a deep seated public aversion to the privatisation option which had been adopted in England and Wales. A celebrated, and rather acrimonious, exchange between Strathclyde Regional Council and the Scottish Office over the results of research commissioned by Strathclyde[3] exposed the gulf which divided central and local government politicians over the question of private sector involvement in the industry. In the event opponents of the Government did succeed in persuading policy makers that full privatisation should be rejected in favour of a system of public ownership and control. On the other hand, they failed to defend the principle of exclusive public sector provision.

Implementation

On 1st April 1996 responsibility for the delivery of water and sewerage services across Scotland was transferred from the nine regional and three islands councils to three new public bodies - the North, East and West of Scotland Water Authorities. The enabling legislation - the Local Government etc. (Scotland) Act 1994 - also provided for the abolition of the Central Scotland Water Development Board (CSWDB)[4] and the creation of a new body, the Scottish Water and Sewerage Customers Council (SWSCC). This Council was established to represent and protect the interests of customers to which end it formed three Area Committees covering each of the new Water Authority areas. Overall responsibility for setting the framework of accountability for the industry remained with the Scottish Office in the person of the Secretary of State for Scotland, who appointed members to the boards of all the new bodies.[5]

On the same date the Government transferred responsibility for pollution control and river water quality to the new Scottish Environment Protection Agency (SEPA) and abolished the River Purification Boards[6]. The Scottish Office retained responsibility for drinking water quality regulation. SEPA took on a whole raft of environmental protection responsibilities from other agencies, for the first time bringing together all environmental protection functions. SEPA, therefore, became the main quality regulator for Scotland to whom the new water authorities were responsible.

Perhaps the most significant institutional change brought about by the Act was the removal of water and sewerage from local government control. Previously, although the Scottish Office retained final responsibility for the regulation of the industry, these regulatory powers were delegated to regional and islands councillors who, inter alia, set charges at a high enough level to cover annual expenditure.

Under the new arrangements the water authorities were required to set charges in consultation with the SWSCC. The Council was given the power to approve charging schemes, to suggest modifications and amendments. In the event of disagreement between an authority and the Council the Secretary of State would determine the final outcome. In addition to charges, water authorities would use loans and grants to finance their services. The level of funds made available by the Government would, however, be capped and authorities would not be allowed to exceed their External Financing Limit (EFL) fixed by the Secretary of State for Scotland on an annual basis. (Table 3)

Overall, the amount of money made available to the new water authorities through charges and EFLs was inadequate to meet their capital expenditure requirements. In order to bridge this gap they were permitted and encouraged by the Government to enter into contracts with private sector operators under the auspices of its Private Finance Initiative (PFI). For 1996/7 the Secretary of State indicated that authorities would be expected to enter into PFI contracts with a minimum total value of £25 million. Such contracts - or BOO[7] schemes - would not count as public expenditure and would therefore be excluded from PSBR calculations. The private sector, the Government argued, enjoyed a comparative advantage in the assessment and management of particular risks[8]. Consequently as long as the transfer of risk from the public to the private sector was genuine the benefits of private sector delivery would more than outweigh the increased financing and transactions costs. In this way the public sector's monopoly of service provision was broken.

The new pricing arrangements also meant that, for the first time, domestic consumers were charged directly for both water and sewerage services. Previously the water charge appeared as a separate item on council tax bills, but sewerage services were financed from general council tax revenue and were not identified separately. To smooth transition the new unitary local authorities were required to collect water and sewerage revenues on behalf of the water authorities as part of the council tax collection process. In addition the Secretary of State provided £89.7 million of transitional sewerage relief in 1996/7[9] to enable authorities to limit price rises. To make sure this policy had the desired effect he took the precaution of restricting charge increases to 6% for the first year.

3. AN ASSESSMENT

Any assessment of the performance of an industry a mere 12 months after it has undergone its most radical restructuring in twenty years is bound to be provisional and partial. Nevertheless it may be argued that by selecting and analysing issues which have been of importance to key stakeholders it is possible to build up a reliable picture of the industry one year on. To this end we begin by considering the ways in which the Public Water Authorities (PWAs) have responded to the challenges of reform.

Harmonisation

Arguably the most difficult internal management task facing the new PWAs was the harmonisation of systems inherited from the regional and islands councils. In this they were given an unparalleled opportunity to select the best operating, administrative and financial systems from predecessor authorities and apply these across their areas. In practice the task was onerous, more so for the North and East, less for the West of Scotland Water Authority, where only two regional council areas were brought together[10].

The difficulties of harmonisation are clearly illustrated when we consider the challenge facing each of the authorities in constructing robust and reliable Asset Management Plans (AMP). Before 1st April 1996 the twelve predecessor authorities maintained their own, individual, asset registers. Consequently the records inherited by the PWAs were often incomplete, dated and constructed according to differing regional conventions. In order to undertake a rigorous appraisal of capital investment needs the new authorities set about building new AMPs immediately. The first task, which at the time of writing continues, is to construct and update inherited asset registers. Once this is complete authorities will assess the condition of their assets before using this information to consider strategic investment options. As more reliable information becomes available, capital expenditure projections will improve, and authorities will be able to prioritise expenditure more effectively. Already this improved information has enhanced managerial control of capital expenditure. In addition, freed from local government interference the authorities are at liberty to direct funds to projects yielding the highest net marginal benefit, rather those 'gold-plated' schemes which do more to boost the prestige of local politicians and industry technocrats than meet the most pressing needs of consumers.

Another benefit brought about by the harmonisation of information systems and the consolidation of smaller operators is the ability of managers to benchmark their internal and external activities. Benchmarking is the term used to describe the use of comparative information by managers to identify areas where performance might be falling short. In the race to achieve operating expenditure (OPEX) and capital expenditure (CAPEX) cost reduction without compromising quality the tool has already been employed, with some success, by firms south of the border.

In Scotland steady progress has been made during the past year towards establishing a set of key performance indicators which will underpin the benchmarking process. A Unit Cost Working Party was established, comprising the three PWAs and the Scottish Office, with the Office of Water Services (Ofwat, the English and Welsh economic regulator) in attendance. Consensus is now emerging over the identity of the key performance indicators and the way in which management information systems might be established to capture the relevant information. The expectation is that during the next two years further progress will be made towards deriving useful management information for the purposes of internal and external benchmarking.[11]

Commercial Orientation

An important new statutory duty laid on the PWAs by the Local Government etc. (Scotland) Act 1994 was the preparation of codes of practice setting out the way in which they would relate to consumers. The codes cover standards of performance, complaints procedures and the circumstances in which compensation should be paid for failing to meet standards. Another early priority was the establishment of consistent operating and financial reporting systems in order to comply with Section 87 of the 1994 Act, which requires all PWAs to maintain proper accounts. In these and other ways the Act required and enabled the PWAs to become more commercially orientated.[12] Internally these new commercial freedoms have been mirrored by a cultural change seeking to supplant bureaucratic with market-driven incentive structures. One consequence of this is the gradual erosion of the power and influence of engineering technocrats, as a new cohort of commercially literate employees take positions of responsibility within the authorities.

Despite PWAs being encouraged to engage with the private sector and to adopt market orientated incentive structures, the 1994 Act endeavours to stop them from following commercial policies to their logical conclusion. In Section 120(1) of the Act a duty is laid upon them to continue to consult together and collaborate with one another in matters of common interest. The provision is significant in that it distinguishes the Scottish industry's modus operandi from that of the English and Welsh, where relationships between private operators have, in some cases, been strained beyond breaking point.[13]

Finance

The financial settlement inherited by the PWAs bore all the hallmarks of an uneasy political compromise reached after a protracted and contentious public debate. For example, in the months leading up to reorganisation some regional councillors saw fit to draw down reserves built up by water service departments to ensure domestic charges rose by less than the rate of inflation. By taking this action the local politicians hoped to pressure central government into increasing grants in order to cushion the impact of large projected price rises.[14] In the event the Government did offer transitional relief, however one wonders whether the financial policy decisions taken by local councillors in the months preceding reorganisation owed more to political indignation than to a concern for smoothing the transition process.

An important aspect of the new financing arrangements was the move to a system in which customers were charged directly for both water and sewerage services. Previously sewerage expenditure had been met by regional and islands councils out of general council tax revenues. From an economic point of view this change had much to recommend it.[15] However identification of the sewerage charge on council tax bills previously devoid of this item would have given the impression that a very large increase in price for these services had occurred. Although concerned to bear down on public expenditure Scottish Office ministers took the decision to grant the PWAs transitional sewerage relief amounting to £89.7 million in 1996/7 (Table 2). This was reduced to £59.7 million in 1997/8 and will eventually be phased out completely. Prior to reorganisation the Government also commuted £0.7 billion of local authority debt in order to reduce debt servicing charges, but a continued tightening of financial provision continued as the EFL of £219.3 million (restated) granted in 1996/7 was reduced to £163.0 million in 1997/8 (Tables 3 & 1). Overall, therefore, in their first year of operation the PWAs have had to deal with a situation in which central government funding has been reduced substantially over a relatively short period of time. There is no indication that this trend is likely to be reversed.

The amount of private sector capital accessed by the industry to meet a part of the shortfall has been relatively modest. Instead the PWAs have sought to meet their strict financial targets by reducing OPEX and CAPEX whilst maintaining upward pressure on prices. Anecdotal evidence suggests that great strides are being made in terms of cost reduction. On the question of prices it may be noted that at reorganisation Scottish prices were low in absolute and relative terms when compared with England and Wales (Tables 4 & 5). Consequently, the authorities argued, there was scope for eroding but not removing this differential, in order to finance the large capital investment programme.

The price setting process for 1997/8 put the new industry watchdog, the SWSCC, to the test for the first time. In 1996/7 the Secretary of State had taken the decision to limit price rises to 6%, however under the 1994 Act it was the SWSCC in the first instance, that became responsible for agreeing charging schemes with the PWAs. According to press reports the PWAs lobbied hard for increases well above the rate of inflation.[16] Negotiations were hampered, however, by the delay in the announcement of the level of transitional sewerage relief by Scottish Office ministers. Eventually agreement was reached between the SWSCC and the PWAs for 'headline' price rises of 7% in the North, 8% in the East, and 6% in the West (Table 6 & 7). Significantly the Secretary of State was not required to arbitrate, although the sharp reduction in transitional relief meant that headline price rise figures substantially understated the impact of the changes on domestic consumer's bills. To take one example, in the East of Scotland, consumers living in the Edinburgh and Lothians area in a band D house saw their water and sewerage charges rise from £95.50 in 1996/7 to £122.79 in 1997/8. An increase of 29%. In Forth Valley the change was even more exaggerated with bills of £52.50 for a band D house in 1996/7 rising to £80.79 in 1997/8. An increase of 54%. Despite this, Scottish charges remain low in absolute and relative terms when compared with England and Wales, although the gap is closing.

The reason why consumers in some parts of Scotland are experiencing larger price rises than their counterparts in the same PWA area is that all authorities have adopted the policy of charge equalisation. This is not a statutory requirement. Before reorganisation all regional and islands councils operated systems of regional average charges, which implicitly cross subsidised rural users. These users were mentioned specifically in the 1994 Act[17], and its intention was to protect their position. However, by phasing out the remaining regional price differentials, PWAs are sacrificing economic efficiency to regional equity. Given the inherited distinct pricing structures it would have been a relatively simple matter to ensure that prices continued to reflect, broadly, local costs of supply. This opportunity had now been lost with the West of Scotland's completion of equalisation in 1997/8 and the North and East's intention to do the same over the next couple of years.

Private Sector Involvement

As noted above, the main driver of demand for increased levels of finance in the industry has been, and is likely to remain, the capital investment programme. In terms of capital expenditure per head of population the Scottish industry has lagged behind the English and Welsh (Tables 8 & 9) for several years, although overall levels of spending have increased.[18] In 1996/7 the PWAs commissioned a large number of new projects the majority of which have been financed in the conventional way. More significantly, however, private companies were invited to tender for contracts to build, own and operate facilities such as treatment works for the first time[19]. These quasi-franchise agreements - or 'BOO' (build, own and operate) schemes - were organised under the auspices of the Government's Private Finance Initiative (PFI): the expectation being that the PFI vehicle would be used increasingly by the PWAs as a means of escaping strict public sector finance constraints.

Given widespread opposition to privatisation among the Scottish electorate, PFI was one of the few ways left open to the Government of introducing the disciplines of the private capital market into this industry. Technically the Government's case for PFI turned on the ability of the private sector to undercut the public sector agencies in delivering programmes of investment at a lower overall cost. The Government argued that the benefits of private sector involvement included superior risk management, greater X- efficiency and therefore value for money. These benefits, it argued, would more than offset higher transactions and capital costs incurred by private companies forced to remunerate shareholders and borrow at commercial rates of interest on international capital markets. These were strong, but not unreasonable, assumptions given water's status as a low risk - and therefore low cost of capital - industry.

In the first year of their operation the PWAs were expected to access £25 million of PFI money from the private sector. In fact the take-up was initially rather slow as the new organisations busied themselves with more routine operational tasks, tentatively exploring private sector co-operative ventures with a small number of prospective partners. At the start of the year one project was in progress and a handful of others were under negotiation. The expectation is that this process will gather momentum in the coming year as PWAs identify and select suitable projects, learning from previous contracting experience.

Accountability

One of the main charges levelled at the Government during the debate over the industry's reform was that accountability would be undermined. It was argued that if local government appointees to PWA boards were replaced by central government appointees then industry officials would become less responsive to the concerns of the general public, and a 'democratic deficit' would be created. There was, however, another view.

Before local government reorganisation comparatively little interest was shown by local politicians in water and sewerage services across Scotland. To the electorate, it was unclear in what sense they were accountable for water and sewerage services, and single issue elections were seldom fought over water. On balance therefore, the reforms have enhanced rather than diminished the accountability of industry officials to the general public. PWA boards are smaller than their predecessors and staffed by highly motivated people, many of whom have considerable industry-specific expertise. Formally, these boards are responsible to the Secretary of State for Scotland, through him to Parliament and through Parliament to the electorate. But in addition the creation of the SWSCC has provided consumers with an influential body through which complaints may be channelled.

To date, however, the SWSCC has not fulfilled its potential. In April 1996 a survey of domestic users carried out by Market Research Scotland Ltd found that only 13% of the population sampled were aware that a new body had been set up to look after water and sewerage customer interests. This figure rose dramatically to 80% when business customers were questioned. However twelve months later it is clear that widespread ignorance of the body's existence persists among the general public. Only 171 complaints were received and handled by the

SWSCC up to 2 December 1996[20]. This is likely to rise substantially as public awareness increases over the coming year. Nevertheless an institution designed to address the perceived problem of a 'democratic deficit' is in place. This is one of the lasting benefits of reform.

4. FUTURE PROSPECTS

In the light of the changes that have taken place over the past year it is not entirely inappropriate to speculate on the direction the industry might take during the next twelve months. Several things may be predicted with a fair degree of certainty.

At an operational level the PWAs will continue to exploit the technical, managerial and financial economies of scale made available to them by the restructuring. High on the agenda of the organisations will be issues such as the continuing drive to minimise OPEX and CAPEX without compromising quality, the completion of asset registers and the implementation of asset management plans (AMPs).

Assuming this trend continues it is to be hoped and expected that PWA boards will continue to re-orientate their organisations' strategic planning focus; balancing supply side solutions with comprehensive demand management policies. The selective use of metering, and the installation of meter boxes in all new houses, are both ways in which allocative efficiency within organisations would be promoted. However, the increased pressure exerted by central government to deliver services at minimum cost may also lead to sharp falls in employee numbers for the first time in the history of the industry. Given the large reductions in manpower seen in the English and Welsh industry during the last decade (Tables 10 & 11) the scope for reductions in employee numbers in Scotland might be considerable as the PWAs emerge from under the protective umbrella of local government control. Although these and other initiatives will allow PWAs to limit price rises it remains probable that domestic bills will continue to rise well above the rate of inflation for several years to come.

At present the new unitary councils are responsible for the collection of these (rising) charges. In future PWAs will have to negotiate collection arrangements on an individual basis with each local authority. Given the history of community charge non-payment in parts of Scotland PWAs could be forgiven for being reluctant to alter the settlement.

5. FURTHER REFORMS

As the operational, financial and political environment in which the industry operates develops, so the process of reform and readjustment should continue. This paper concludes, therefore, with two proposals for future institutional reforms which arise out of the analysis of the industry's performance during the past twelve months.

Regulatory Arrangements

First, the industry's regulatory arrangements should be revised. At present the Scottish Office acts as the PWAs' primary economic regulator. The Scottish Office sets the industry's EFLs and required rates of return on an annual basis. It also acts as final arbiter in decisions over pricing. The SWSCC on the other hand, is charged with agreeing price limits in the first instance and in representing the interests of consumers when complaints arise. The flaw in this arrangement lies in the limited powers granted to the SWSCC given their responsibilities. At present where agreement cannot be reached between the PWAs and the SWSCC over price the case must be referred to the Scottish Office for a decision. Consequently operators may judge it to be in their own interest in effect to bypass the SWSCC and appeal to the Secretary of State for a final, binding, determination as a matter of routine.[21]

There are two ways in which this problem might be resolved. The first, and more unsatisfactory, is to reduce the role of the SWSCC to that of a consumer body similar in its constitution and responsibilities to an English Customer Service Committee (CSC). In England and Wales the Director General of Water Services appoints board members to the individual CSCs. They in turn represent the interests of consumers to water companies operating within their areas and to the economic regulator, Ofwat. Significantly, however, they have no formal price setting powers.

More satisfactory would be the delegation of ultimate price setting authority from the Secretary of State to a new independent economic regulator (Ofscotwat) which would be responsible for ensuring reasonable prices, a satisfactory standard of service and effective consumer representation. The Scottish economic regulator would incorporate the functions of the present SWSCC, being given powers to instruct PWAs to supply performance information, and to set economic performance targets such as required rates of return[22] as frequently as it sees fit.

Although regulating a public sector industry with a different organisational structure Ofscotwat would be modelled on, and benefit from the closest of ties with, the English and Welsh economic regulator, Ofwat. One model for the way in which this relationship might be formalised exists in the electricity industry where the industry regulator, Offer, conducts its Scottish operations from an office in Glasgow. Offer Scotland regulates an industry radically different in its institutional configuration from that in England and Wales. Nevertheless the regulatory body is strengthened by having access to comparative performance information supplied by companies operating in different industrial environments. Similarly Ofwat (England and Wales) would benefit from having access to Scottish unit cost information whilst Ofscotwat (Scotland) would be able to draw on the expertise of the best run utility regulatory body in the UK.

Funding arrangements for the new economic regulator might be similar to those financing the SWSCC at present, with a levy on the water and sewerage authorities. In the event of a major disagreement over matters of substance PWAs should be granted a right of appeal to an independent third party. In England and Wales the Monopolies and Mergers Commission fills this role, in Scotland the Local Authority Accounts Commission may be well placed to take on this new responsibility.

Funding Arrangements

Second, the Government should consider ways in which public sector funding arrangements might be stabilised. The current system in which EFLs and transitional sewerage relief are announced annually fosters uncertainty and encourages PWAs to shorten their planning horizon to the detriment of service provision. This is a capital intensive industry comprising fixed assets with very long useful lives. Capital investment projects frequently take many years to complete, consequently considerable disruption and delay may be brought about by changes in levels of public finance fixed after the annual round of political bargaining that invariably accompanies public sector spending decisions. Such uncertainty and disruption inevitably raises the cost of capital compounding the difficulties of encouraging private companies to become involved in the industry.

Given the Scottish industry's heavy reliance on public sector finance for the foreseeable future it is unlikely that this problem will be overcome completely. It might be mitigated should the Government voluntarily give a binding commitment to EFL levels for up to five years. Although this appears unlikely given the Treasury's desire to retain flexibility in budgetary arrangements to allow it to respond to changing macroeconomic conditions.

6. CONCLUSION

Much has been achieved by the PWAs in the twelve months since reorganisation. Considerable progress has been made towards harmonising systems, reducing costs and exploiting economies of scale whilst maintaining consumer confidence. The organisations have begun the process of engaging constructively with the private sector, gradually replacing systems of control emphasising physical and technical measures with systems focusing on financial, legal and commercial constraints. Matters such as the regulatory structure of the industry and overall funding arrangements require further attention, nevertheless it is not premature to argue that Scottish consumers are beginning to benefit from the reforms.

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APPENDIX

Table: 1 **External Financing Limits (Planned) £ million**

	1996/7	1997/8
North	82.0	49.0
East	87.0	52.0
West	105.3	62.0
Total	274.3	163.0

Source: 1996/7 Table 2.11 Departments of the Secretary of State for Scotland and the Forestry Commission (1996), The Government's Expenditure Plans 1996-7 to 1998-9, Cm 3214, HMSO, Edinburgh. 1997/8 The Scottish Office.

Notes: Indicative EFL for 1998/9 = £187 million, 1999/2000 = £223 million (Parliamentary Written Answer Hansard 13 Dec 1996)

Table: 2 **Transitional Sewerage Relief £ million**

Water Authority	1996/7	1997/8
North	22.4	14.9
East	27.3	18.2
West	40.0	26.6
Total	89.7	59.7

Source: 1996/7 Table 2.13 Departments of the Secretary of State for Scotland and the Forestry Commission (1996), The Government's Expenditure Plans 1996-7 to 1998-9, Cm 3214, HMSO, Edinburgh. 1997/8 The Scottish Office.

Table: 3 **External Financing Limits 1996/97 Pre and Post commutation £ million**

Water Authority	**Pre- commutation**	**Post- commutation**
North	82.0	65.9
East	87.0	70.0
West	105.3	83.9
Total	274.3	219.8

Source: Hansard HC Written Answers 24 July 1996 column 421.

Notes: Local authority debt of £0.7 billion was commuted before being transferred to the new water authorities on 1 April 1996. Hence this table shows a reduction in the authorities' EFL to reflect the reduced debt servicing charge.

Table: 4 **Average Household Charge for Unmeasured Water Supply**

	1995/6	1996/7
SCOTLAND (weighted ave)	63	67
ENGLAND & WALES (weighted ave)	98	102

Source: Waterfacts '96.
Notes: The Scottish figures for 1996/7 are the mean of weighted average figures for individual authorities.

Table: 5 **Average Household Charge for Unmeasured Sewerage Services**

	1995/6	1996/7
SCOTLAND (weighted ave)	43	50
ENGLAND & WALES (weighted ave)	111	117

Source: Waterfacts '96.

Notes: The Scottish figures for 1996/7 are the mean of weighted average figures for individual authorities.

Table: 6 **Domestic Water and Sewerage Charges (Unmetered) 1996/7**

Area	Council Tax Band							
	A	B	C	D	E	F	G	H
North of Scotland (£)								
Tayside	54.33	63.39	72.44	81.50	99.61	117.72	135.83	163.00
Grampian and Highland	64.67	75.44	86.22	97.00	118.56	140.11	161.67	194.00
Orkney, Shetland and Western Isles	80.33	93.72	107.11	120.50	147.28	174.06	200.83	241.00
East of Scotland (£)								
Borders	63.67	74.28	84.89	95.50	116.72	137.94	159.17	191.00
Forth Valley	35.00	40.83	46.67	52.50	64.17	75.83	87.50	105.00
Fife	47.67	55.61	63.56	71.50	87.39	103.28	119.17	143.00
Edinburgh and Lothians	63.67	74.28	84.89	95.50	116.72	137.94	159.17	191.00
North Lanarkshire and East Dunbartonshire*	61.67	71.78	81.89	92.00	112.22	132.44	153.67	184.00
Kinross	54.33	63.39	72.44	81.50	99.61	117.72	135.83	163.00
West of Scotland (£)								
	61.67	71.78	81.89	92.00	112.22	132.44	153.67	184.00

Source: The Scotsman 5/3/96.

Notes: All figures refer to combined water and sewerage charges net of transitional sewerage relief.

* East of Scotland provide water service only in this area. Sewerage is provided by West of Scotland Water.

Table: 7 Domestic Water and Sewerage Charges (Unmetered) 1997/8

Area	Council Tax Band							
	A	B	C	D	E	F	G	H
North of Scotland (£)								
Angus, Dundee and Perth	75.84	88.47	101.11	113.76	139.04	164.32	189.96	227.51
Aberdeen, Highland and Moray	85.51	99.75	114.00	128.26	156.76	185.26	213.71	256.51
Northern and Western Isles	93.51	109.08	124.67	140.26	171.43	202.59	233.77	280.51
East of Scotland (£)								
Fife	67.86	79.17	90.49	101.79	124.42	147.03	169.66	203.59
Borders	81.86	95.50	109.15	122.79	150.08	177.36	204.66	245.59
Edinburgh and Lothians	81.86	95.50	109.15	122.79	150.08	177.36	204.66	245.59
Forth Valley	53.86	62.84	71.82	80.79	98.75	116.70	134.66	161.59
Added Areas								
Kinross	74.19	86.56	98.93	111.29	136.03	160.75	185.49	222.59
Forth Valley*	63.60	74.20	84.80	95.40	116.60	137.80	159.00	190.80
West of Scotland (£)								
	78.96	92.12	105.27	118.43	144.74	171.06	197.39	236.86

Source: The Scotsman 1/3/97.

Notes: All figures refer to combined water and sewerage charges net of transitional sewerage relief.

* Forth Valley includes parts of East Dunbartonshire and North Lanarkshire, where sewerage is provided by West of Scotland.

Table: 8 Total Capital Expenditure per Head of Connected Population (£) °

Year	Scotland	Northern Ireland	England and Wales*
1985/6	18.2	15.8	18.3
1986/7	20.1	16.1	21.0
1987/8	17.3	15.8	24.0
1988/9	21.7	15.8	29.2
1989/90	25.0	17.3**	37.6
1990/1	28.3	27.9	50.9
1991/2	33.6	32.1	62.9
1992/3	45.1	40.4	61.0
1993/4	51.2	51.3	56.0
1994/5	50.6	60.2	49.4
1995/6	46.4	63.2	51.0

Source: Waterfacts '86, '87, '88, '89, '90, '91, '92, '93, '94, '95, '96, Public Water Supplies in Scotland 1995-96 Water Resources Survey.

Notes:

° Resident connected population for water services.

* Figures for England and Wales include NRA capital expenditure. All figures are out-turn prices

** A discontinuity in the Waterfacts time series.

Table: 9 **Total Capital Expenditure (£m)**

Year	Scotland	Northern Ireland	England and Wales*
1985/6	93.5	25.2	909.1
1986/7	102.9	25.8	1048.9
1987/8	88.6	25.3	1200.4
1988/9	110.6	25.2	1457.3
1989/90	127.4	27.7**	1896.7
1990/1	144.5	44.7	2570.7
1991/2	171.1	51.4	3195.1
1992/3	230.4	64.6	3099.7
1993/4	262.0	82.0	2855.3
1994/5	259.9	97.1	2524.9
1995/6	238.2	102.9	2625.2

Source: Waterfacts '92, Waterfacts '96.

Notes: * Figures for England and Wales include NRA capital expenditure. All figures are out-turn prices
**A discontinuity in the Waterfacts time series.

Table: 10 **Employment**

Number of Full-Time Equivalent Employees at March 31st

Year	Scotland	Northern Ireland	England and Wales*
1981	6,318	2,892	70,852
1982	6,226	2,708	68,955
1983	6,121	2,605	66,551
1984	6,144	2,524	63,173
1985	6,129	2,518	59,606
1986	6,155	2,510	57,502
1987	6,182	2,605	56,774
1988	6,194	2,552	55,356
1989	6,094	2,569	54,575
1990	-	-	-
1991	6,229	2,598	53,241
1992	6,514	2,633	53,904
1993	6,608	2,533	53,318
1994	6,665	2,463	52,105
1995	6,653	2,418	50,972
1996	6,921	2,308	47,504

Source: Waterfacts '92, Waterfacts '96

Notes: * Figures for England and Wales include NRA staff. Most of these transferred from the Regional Water Authorities in 1989.

Table: 11 Employment

Water Authority	1996/7
North	1,940
East	2,013
West	2,968
Total	6,921

Source: 1996/7 Waterfacts '96.

ENDNOTES

1 The Scottish Office (1992).
2 North West, Severn Trent and Thames.
3 See Chemical Bank (1994) and the Scottish Office (1994). The Scottish Office's own 'Summary of Responses to the Consultation Paper "Investing for our Future"' confirmed that 94% of respondents favoured retention of services within public control, and that only 1% were in favour of privatisation.
4 A body responsible for the development of bulk supplies to regional authorities located around the central belt.
5 The Secretary of State also set a 6.5% rate of return target for the authorities to be earned on the value of net assets. (Section 83(2) of the 1994 Act) This target was retained for 1996/7 and 1997/8.
6 The River Purification Boards were responsible for pollution control and river quality on mainland Scotland. The islands councils undertook to carry out the same function in their own areas.
7 Build, own and operate. Private companies would build, own and operate physical plant under contract to public water authorities.
8 For example construction and operating risks.
9 This was cut to £59.7 million in 1997/8. See Table 2.
10 Strathclyde and Dumfries & Galloway.
11 By the end of the year the expectation is that agreement will have been reached on the calculation of gross unit costs for water and wastewater.
12 For example they are permitted to join with other persons to form limited companies (Section 89(2)), to supply premises outwith their own limits of supply (Section 106) and to export water (Section 107).
13 For example Wessex Water recently pulled out of the Water Services Association (the trade association of the large water and sewerage companies) before becoming involved in a take-over battle with Severn Trent over South West Water. Neither company succeeded in its bid.
14 Grampian Regional Council adopted this policy in 1995/6. Press and Journal report 5th February 1995.
15 Ensuring that those who benefit also pay for the service will improve allocative efficiency.
16 The Scotsman (1/3/97) reported that the East of Scotland Water Authority had initially proposed a 9.5% price rise.
17 Section 85(2)(a)(i).
18 Rowson (1996, p 47) notes, "... investment has risen both sides of the border, but Scotland is behind by maybe two years."
19 This process began in a very limited way prior to reorganisation.
20 Written Parliamentary Answers Hansard 10 December 1996.
21 Clearly the PWAs must consider that the risks of a tighter determination are outweighed by the benefits of Scottish Office rather than SWSCC handling of the negotiations. The problems are compounded if the Scottish Office and the SWSCC are not clear about their roles.
22 The economic regulator may wish to consider a form of price cap regulation.