

Mr K Whiteman
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12 December 2002

INTERIM DETERMINATION

You applied on 12 September 2002 for an interim determination of your company's price limits under Part IV of Condition B of your licence. Your reporter, Ben Haywood Smith of Strategic Management Consultants Ltd, submitted his report on your application on 14 September 2002.

Your application covers the additional costs resulting from the following five items.

- Changes to the requirements for treatment and monitoring for cryptosporidium.
- Costs arising from the EC Waste Incineration Directive.
- A proposed programme for tackling additional sewer flooding problems.
- Differences in the rate of change of the construction price index relative to RPI compared with our final determination assumptions.
- Increased operating costs, additional capital expenditure and uncollected revenue resulting from the ban on disconnection.

Your application also takes into account two changes that have reduced your costs or resulted in extra income:

- changes to the requirements for plumbosolvency control and lead communication pipe replacement; and
- proceeds from disposals of land.

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We have taken both of these favourable changes into account in making our determination.

We sent you our draft decisions on 6 November. You sent us your representations on 20 November and we discussed those on 25 November. We have considered your representations and those from others, including WaterVoice Yorkshire. We have concluded that, apart from smoothing the price limits, there should be no change from our draft determination.

In your representations, you stated that you believed customers would prefer a smooth profile of bill increases over the next two years. WaterVoice Yorkshire also support this conclusion. We have therefore amended the profile of price limits.

WaterVoice Yorkshire also raised particular concerns about:

- the impact which rising levels of debt are having on customers' bills;
- increases in capital costs because of the rate of change in the construction price index relative to RPI; and
- affordability.

When we set price limits at a periodic review we seek to give companies and customers as much certainty as possible about changes in costs and hence in bills. However there are some specific circumstances (in this case including the ban on disconnection and the change in the construction price index) where we are required to take changes into account. On affordability, my statutory duties require me to make sure that a well managed company can finance the services it provides to its customers. In doing so, I ensure that customers pay no more than is necessary for those services.

Annex A summarises your estimates of the changes to your costs, our final view of your costs and the new price limits. Our decisions are summarised in Annex B. We have provided you separately some confidential explanatory notes expanding on Annex B.

The total impact of the relevant items on your costs is sufficient to exceed the materiality threshold set out in Condition B of your licence. The revised price limits set out in the attached table will apply from 1 April 2003. In the final determination in 1999 we anticipated that the average household bill for the whole of your area would need to increase by £1 in real terms between April 2003 and March 2005.

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Mr K Whiteman
12 December 2002
Page 3

Our draft determination set out revised K factors of 4.4% in 2003-04 and 1.3% in 2004-05. This would have meant an increase in bills of £10 in 2003-04 and £12 in 2004-05 compared to the current (2002-03) bill. In our final determination we have smoothed the profile of the increase to give revised K factors of 3.4% in 2003-04 and 3.5% in 2004-05. This means that on average bills will increase by only £6 in 2003-04 and a further £8 in 2004-05. For the whole of the period 2000-05 customers' bills will have fallen by £20, even taking into account these increases.

Following the merger between Yorkshire Water Services Limited and The York Waterworks Limited (York) in March 1999, we said we would ensure that the customers of York are no worse off financially than if the merger had not taken place. To do this we set price limits up to 2005 for York as if it were a stand-alone company, this applies equally for interim determinations in the current price setting period. This means that in addition to determining price limits for Yorkshire Water as a whole, we set new 'shadow' price limits to apply to the former customers of York.

Overall the impact of the changes in costs for York customers is slightly less than that for Yorkshire Water as a whole. The projected increase in bills for customers of York is therefore £4 in 2003-04 and £6 in 2004-05. On top of this there will be a further reduction in the water element of bills of 15% on average in April 2004 for the customers of York in accordance with the terms of the merger agreement.

We are placing this determination in our library and announcing it to the London Stock Exchange.

This letter and its enclosures have been copied to John Ballard (DEFRA), Michael Rouse (DWI), Andrew Woods (Environment Agency), Mohammed Ajeeb (Chairman of WaterVoice Yorkshire), your local members of Parliament and members of the European Parliament.

PHILIP FLETCHER

ANNEX A

YORKSHIRE WATER SERVICES LIMITED
FINAL INTERIM DETERMINATION – December 2002 – SUMMARY TABLE

Description		Company's Assessment (September 2002)	Ofwat's Final Assessment (December 2002)
Item 1 – Cryptosporidium – Additional requirements for continuous monitoring and treatment			
1.1	Estimated net change in capital expenditure over the AMP3 period	£19.5m	£17.0m
1.2	Estimated net change in operating expenditure over the AMP3 period	£3.5m	£2.0m
1.3	Materiality amount (NPV of total net change in costs)	£29.0m	£22.1m
1.4	Contribution towards materiality threshold	5.2%	4.0%
Item 2 – Waste Incineration Directive			
2.1	Estimated net change in capital expenditure over the AMP3 period	£35.9m	£26.8m
2.2	Materiality Amount (NPV of total net change in costs)	£38.1m	£29.2m
2.3	Contribution towards materiality threshold	6.8%	5.2%
Item 3 – Lead – changes to compliance programme			
3.1	Estimated net change in capital expenditure on lead communication pipe replacement over the AMP3 period	(£25.7m)	(£24.0m)
3.2	Materiality amount (NPV of the net change in costs)	(£24.9m)	(£24.1m)
3.3	Contribution towards materiality threshold	(4.4%)	(4.3%)
3.4	Estimated net change in capital expenditure on plumbosolvency control over the AMP period	(£0.2m)	£0.4m
3.5	Estimated net change in operating expenditure on plumbosolvency control over the AMP3 period	£2.9m	£2.4m
3.6	Materiality amount (NPV of total net change in costs)	£7.9m	£6.7m
3.7	Contribution towards materiality threshold	1.4%	1.2%
Item 4 – Sewer Flooding			
4.1	Estimated net change in capital expenditure over the AMP3 period	£11.2m	£9.2m
4.2	Materiality amount (NPV of total net change in costs)	£10.7m	£8.4m
4.3	Contribution towards materiality threshold	1.9%	1.5%
Item 5 – Land Disposals			
5.1	Net receipts (50% of total) from disposals of land	(£6.0m)	(£6.0m)
5.2	Materiality amount (NPV of total net change in costs)	(£6.8m)	(£6.7m)
5.3	Contribution towards materiality threshold	(1.2%)	(1.2%)
Item 6 – Changes in the Notified Index			
6.1	Estimated net change in capital expenditure over the AMP3 period	£34.3m	£32.5m
6.2	Materiality amount (NPV of total net change in costs)	£37.6m	£35.6m
6.3	Contribution towards materiality threshold	6.7%	6.4%
Item 7 – Loss of disconnection			
7.1	Estimated net change in capital expenditure over the AMP3 period	£0.9m	£0.9m
7.2	Estimated net change in operating expenditure over the AMP3 period	£6.0m	£5.6m
7.3	Estimated net change in revenue write-off over the AMP3 period	£12.1m	£12.4m
7.4	Estimated net change in financing costs over the AMP3 period	£4.5m	£4.3m
7.5	Materiality amount (NPV of total net change in costs)	£50.7m	£51.8m
7.6	Contribution towards materiality threshold	9.0%	9.2%

OVERALL ASSESSMENT						
8	Materiality amount (NPV of total net change in costs)	£142.3m			£123.0m	
9	Yorkshire Water turnover for 2001-02 used in materiality test	£560.4m			£560.4m	
10	Materiality test	25.4%			21.9%	
PRICE LIMITS		2000-01	2001-02	2002-03	2003-04	2004-05
11	Current price limits (as set in November 1999)	-14.4%	0.0%	0.0%	0.0%	1.0%
12	Revised price limits	-14.4%	0.0%	0.0%	3.4%	3.5%
Notes:						
8. Additional costs are shown as positive, savings and revenue gains are shown as negative.						
9. The appropriate discount rate used is 6.79%						
10. Materiality test – Result must be greater than $\pm 10\%$ to trigger a change in price limits.						
11. All monetary values are stated in September 2002 prices. Totals may not add due to rounding.						
12. Current price limits and the revised price limits both exclude the 15% reduction in water bills for York Waterworks customers in April 2004 following the merger with Yorkshire Water.						


**YORKSHIRE WATER SERVICES LIMITED
FINAL INTERIM DETERMINATION – DECEMBER 2002
SUMMARY OF OFWAT'S ASSESSMENT**

INTRODUCTION

1. We have followed a four stage assessment of your application in accordance with the terms of Condition B of your company's licence.
2. You included seven changes in your application.
 - Changes to the requirements for treatment and monitoring for cryptosporidium.
 - Changes arising from the EC Waste Incineration Directive.
 - Changes to requirements on plumbosolvency control and lead communication pipe replacement.
 - A proposed programme for tackling additional sewer flooding problems.
 - Proceeds from disposals of relevant land.
 - Differences in the rate of change of the construction output price index relative to RPI compared with our final determination assumptions.
 - Increased operating costs, additional capital expenditure and uncollected revenue resulting from the ban on disconnection.
3. We issued counter notices in respect of changes to the requirements for lead communication pipe replacement and for proceeds from disposals of land, both of which you reflected in your application.
4. Our assessment of your application and the counter notices is summarised below.

STAGE 1 – CONFIRMATION THAT THE CHANGED REQUIREMENTS ARE RELEVANT CHANGES IN CIRCUMSTANCE OR ARE COVERED BY SPECIFIC NOTIFIED ITEMS

Item 1 – Cryptosporidium - additional requirements for continuous monitoring and treatment

5. When  set price limits in 1999 the extent of the new requirements to deal with the risk from cryptosporidium was uncertain. Only work which had been identified and received technical support from the DWI was included in price limits. This did not include a requirement to carry out continuous monitoring.
6. On 27 March 2000 and 8 September 2000 the DWI issued notices under regulation 23A(7) of The Water Supply (Water Quality) (Amendment) Regulations 1999 which set out the steps you must take to comply with the requirements of regulation 23B. The DWI wrote to you on 7 August 2002 setting down a revised programme of work to meet the cryptosporidium regulations. We have received confirmation from the DWI that the work set out in your application is necessary to meet your obligations under the cryptosporidium regulations.

7. These additional monitoring and treatment requirements for cryptosporidium qualify as a relevant change of circumstance under Condition B paragraph 13 of your licence.

Item 2 – Waste Incineration Directive

8. In 1999 we allowed in price limits the continuing costs of disposing of sewage sludge. For Yorkshire Water this included costs associated with operating four incinerators. The European Parliament and the Council adopted the Waste Incineration Directive (Directive 2000/70/EC) on 4 December 2000. The Government must implement the Directive in the UK by 28 December 2002.
9. This legislation will introduce tighter emission limits than those in existence at present together with a requirement for continuous monitoring of emissions. The legislation will require you to apply for a permit to operate each of your incinerators confirming that you have met the revised requirements.
10. As such we consider that the programme of work you have set out in your application is a relevant change of circumstance under Condition B paragraph 13 of your licence.

Item 3 – Lead – changes to the compliance programmes

11. In 1999 we allowed in price limits for a work programme to comply with the new lead standards. This assumed a lead communication pipe replacement programme and a plumbosolvency control programme. During the 1999 periodic review the DWI stated that it would review the most effective means of delivering compliance. Plumbosolvency control is now the preferred initial approach.
12. The DWI has confirmed that the provision made in the 1999 final determination for meeting new lead standards was only for the purpose of setting prices. The programme of work set down in the DWI's letter to you of 3 April 2001 'Periodic Review 1999: Yorkshire Water, Confirmation of Improvement Works for Plumbosolvency Measures – Final Statement of Intent' replaces the letter of support provided for the periodic review process. The DWI has since written to you on 24 October 2002 setting down a modified programme of work.
13. The DWI has advised that it will not be possible to determine whether a strategic programme of lead communication pipe replacement will be required until the effectiveness of plumbosolvency control has been assessed. But it has informed us that it supports a pilot lead pipe replacement programme for your company.
14. We have received confirmation from the DWI that the plumbosolvency control measures set out in your application are necessary to comply with the new lead standards.
15. The change in the lead compliance programme is a relevant change of circumstance under Condition B paragraph 13 of your licence.

Item 4 – Sewer flooding

16. In March this year we published a consultation paper 'Flooding from sewers: A way forward'. As part of our consultation we invited views on proposals for tackling sewer flooding in the period up to 2005. We confirmed in MD180 'Flooding from sewers' (September 2002) that we are willing to consider proposals for companies to address more problems.
17. Where as a result of a proposal from a company we establish a revised set of regulatory outputs to deal with sewer flooding and a company is making an application for an interim determination (because of other changes to its costs and revenues), we believe it is appropriate to take account of the increased costs to deal with sewer flooding in any interim determination.

Item 5 – Land disposals

18. When we set price limits in 1999 we assumed that there would be no disposals of relevant land in the period 2000-05. You have made a number of such disposals in 2000-01 and 2001-02.
19. These proceeds are a relevant change of circumstance under Condition B of your licence.

Item 6 – Changes to the Notified Index

20. You can request an interim determination of price limits where the Notified Index is different from our assumptions when we last set price limits. The Notified Index measures the rate of change in national construction costs compared to the rate of change in general inflation. The movement in the construction output price index (COPI) compared to the movement in the retail price index (RPI) is different from the movement we assumed when we set price limits in 1999.
21. This difference is a relevant change in circumstance under Condition B of your licence.

Item 7 – Loss of disconnection

22. We set out a notified item in the 1999 price determination to protect you from the consequences of increased levels of bad debt and costs of debt recovery arising from the loss of the power to disconnect domestic customers for non-payment of bills.
23. We confirm that the increases in your bad debt and costs of debt recovery have triggered the notified item.

STAGE 2 – ASSESSING THE APPROPRIATE NET ADDITIONAL COST ATTRIBUTABLE TO EACH CHANGE

Item 1 – Cryptosporidium - additional requirements for continuous monitoring and treatment

24. You have chosen to deal with the requirements by carrying out continuous monitoring at ten sites, providing a treatment process at another two sites, and shutting down 23 others. The reporter has commented that the decisions made by your company are reasonable.
25. We have reviewed your costs for meeting the requirements for cryptosporidium monitoring and treatment, and considered the reporter's report. We have also looked at market prices for this type of work reported by other companies.
26. We compared your additional operating costs for carrying out continuous monitoring for cryptosporidium with a benchmark and found them to be high. We reduced your submitted costs to the benchmark. This is consistent with the approach we have taken at interim determinations in the past.
27. Continuous monitoring and testing for cryptosporidium is still in its infancy. We believe that the unit costs of materials will fall and there will be increases in efficiency for this labour intensive procedure. Therefore we have assumed a future efficiency of 2.5% per annum for operating expenditure.
28. Your additional capital expenditure for continuous monitoring equipment is higher than the benchmark. The costs of installing this equipment should be broadly similar for all sites. In our assessment we reduced these costs by 75% of the difference between your submission and the benchmark cost. This is consistent with the approach we have taken at interim determinations in previous years.
29. Your application included a net reduction in operating costs associated with closing 23 sites and installing treatment at two others. We have reflected this net reduction in costs in our assessment.
30. We reduced your submitted capital expenditure for closing 23 sites and installing treatment at two others by 10%. This takes account of the comments made by the reporter in his report.

Item 2 – Waste Incineration Directive

31. We have reviewed your estimate of the costs of meeting the requirements of the Waste Incineration Directive, and considered the reporter's report. We have reduced your estimate of the capital expenditure required by 25% in light of your reporter's comments. We have also assumed a 2.1% per annum future efficiency for operating expenditure consistent with our assumption about general efficiency at the 1999 review.

Item 3 – Lead – changes to the compliance programmes

32. The DWI stated in Information Letter 13/98 that the provision made for meeting the new lead standards was solely for the purpose of estimating costs for the periodic review. This letter made it clear that the allowance in price limits was subject to companies agreeing specific programmes of work with the DWI once the criteria for action had been agreed. After the final determination, the DWI set out in Information Letter 12/2000 its criteria for action, which resulted in more emphasis on treatment to reduce plumbosolvency than was assumed in the final determination.
33. You have chosen to shut down two sites where action was required and to install new treatment at 15 others. In optimising plumbosolvency treatment at existing dosing plants to meet the new lead standards, you have increased the phosphate dose rate from an average of 0.6mg of phosphorus per litre to 1.2mg phosphorus per litre.
34. In our assessment of the costs associated with introducing new dosing we compared the volumetric output of the works in the notional plumbosolvency programme assumed at the final determination (around 15% of output) with the volumetric output of the works in the confirmed programme (around 20% of output). We have taken into account only the proportion of the costs associated with the net additional volumetric output of the confirmed programme.
35. We also included in our assessment the chemical cost of optimising existing treatment schemes, that is the cost of increasing the phosphate dose rate.
36. We compared your operating costs with cost information from other companies that employ average dose rates similar to that of Yorkshire Water. We have reduced your costs by 25% of the difference between your submission and the unit cost of our comparison company.
37. We assumed that future efficiencies of 1.4% a year are reasonable for plumbosolvency control operating costs. This is consistent with the approach we have taken at interim determinations in previous years.
38. We used your submitted capital costs for plumbosolvency treatment in our assessment. But we have assumed that an estimate of 1.4% per annum future efficiencies is reasonable for this work. This is also consistent with the approach we have taken at interim determinations in previous years.
39. We have offset the allowance made in price limits for lead communication pipe replacement against your estimate of the cost of your pilot lead pipe replacement programme. This is the net saving for lead pipe replacement.
40. For the purpose of calculating materiality in Annex A we have considered the changes to the lead programme separately, as additional costs and as savings.

Item 4 – Sewer flooding

41. We said in MD180 that we would consider proposed programmes for additional work to address sewer flooding where these are based on a system for prioritising schemes established in consultation with the relevant WaterVoice Committee. The prioritisation process must be based primarily on an overall assessment of the severity and frequency of the problems faced by the customers concerned. You have submitted such a proposal for the completion of 34 schemes at a projected cost of £11.2m.

42. We have considered your proposal, taking account of comments from WaterVoice Yorkshire, and have concluded that there are 5 schemes with a total value of £2.0m that should be excluded. This is either because:

- the schemes have high projected costs compared to their projected benefits; or
- the work which you have proposed appears to be driven by environmental impact rather than the direct impact of sewer flooding on customers.

43. Further work to understand these problems, and the development of the likely solutions and costs, could provide a clearer interpretation of the cost and benefits for these schemes, and they could be included if better information is provided. Otherwise they could be suitable for consideration within an application to log-up additional expenditure at the 2004 review.

44. The revised programme which we have included consists of 29 schemes with a total cost of £9.2m (equivalent to an average cost of £63,000 per problem addressed). The programme will alleviate:

- 18 problems where customers' properties have been internally flooded;
- 99 problems where customers' gardens have been flooded; and
- 29 other external flooding problems.

We will discuss further schemes to tackle sewer flooding as part of a programme of work which may be 'logged up' at the next periodic review.

Item 5 – Land disposals

45. Under the terms of Condition B of your licence, at an interim determination, we can take into account 50% of proceeds from disposals of relevant land. You report to us the value of any such proceeds each year. This forms part of your audited June return submission.

46. We have taken our figures from Table 39 of your June return submissions for 2000-01 and 2001-02.

Item 6 – Changes in the Notified Index

47. When we set price limits in 1999, we made assumptions about the movement in the Notified Index over the period 2000-05. This index represents the movement in COPI relative to RPI. We assumed that COPI moved in line with RPI over the

period to 2005. In practice COPI has increased at a greater rate than RPI and the Notified Index is, consequently, greater than we assumed.

48. We have assessed the change in your capital costs from those we assumed in the 1999 periodic review to take account of the actual movements in the Notified Index in 2000-01 and 2001-02. This is consistent with the approach you have taken in your application.

Item 7 – Loss of disconnection

49. We have carefully assessed the information submitted in your application. Where appropriate we have requested further clarification from yourselves and your reporter.

50. In your application you explained that:

- the amount of debt which you cannot collect;
- the cost of financing outstanding revenue; and
- the costs of collecting debt

have all increased since the implementation of the Water Industry Act 1999. We accept your evidence.

51. Your application set out the changes made to your procedures for recovering debt from customers. Prior to the Water Industry Act 1999 you used the threat of your power to disconnect domestic customers widely. You established contact with a significant number of non-paying customers as a result and obtained payment from most of those customers. Having lost this power you have used a number of new debt initiatives including attachment of earnings, use of solicitor's letters and increased use of debt collection agents. These do not secure payment in as many cases and, where payment is secured, it is recovered less quickly.

52. We accept that as a result of these changes:

- the amount of debt which you are unable to collect has increased; and
- where debt is recovered it now takes you longer on average to do so. Financing costs increase because of this.

53. You also stated in your application that the changes in your procedures have caused your operating costs to rise. These costs include costs of sending additional reminders, commission to third party collection agents, increased debt recovery team costs and increased court fees. We also accept that these costs have increased.

54. You explained that the introduction of a new debt management system to accommodate new methods of debt recovery required additional capital expenditure. We accept that these are costs which would not have arisen during this period if it were not for the ban on household disconnection.

55. You have assessed the change between 1998-99 and 2001-02 in both the level of debt written off, and financing costs of outstanding debt following the general approach we set out in RD12/01 'Notified Item for bad debt' (August 2001).

There are several points of detail where our calculations differ. The most significant of these are as follows.

56. Firstly, we have calculated changes using outturn prices rather than adjusting the numbers in each year to the same price base (2001-02) as set out in your application. This means we have allowed slightly more additional costs than you included in your application.
57. Additionally, when calculating these changes you have included revenue effects and operating cost increases in 1999-2000. This interim determination does not take account of changes experienced between 1998-99 and 1999-2000, as the Notified Item did not come into effect until April 2000.
58. These differences in methodology are reflected in the numbers as set out in Annex A.

STAGE 3 – MATERIALITY TEST – IN AGGREGATE DOES THE SUM OF ALL THE CHANGES EXCEED THE MATERIALITY THRESHOLD SET OUT IN THE LICENCE?

59. Condition B of the licence sets a materiality threshold for consideration of interim determinations. A revision of price limits is triggered if the present value of the net additional costs and revenue losses arising from the changes is greater than 10% of the turnover of the appointed business in the latest financial year for which accounting statements have been delivered to Ofwat. For the purpose of this calculation, capital costs are calculated up to 31 March 2005 and operating costs and revenue losses are calculated over 15 years.
60. The results of our analysis, based on the revised assumptions set out above, are summarised in Annex A. This shows that the materiality threshold has been exceeded.

STAGE 4 – IMPLICATIONS FOR PRICE LIMITS IF THE MATERIALITY THRESHOLD IS EXCEEDED

61. Because the materiality threshold is exceeded we are required by Condition B of your licence to review and revise your price limits. Our assessment of your company's application is that the price limits for the charging years 2003-04 and 2004-05 should be revised as set out in the table in Annex A.