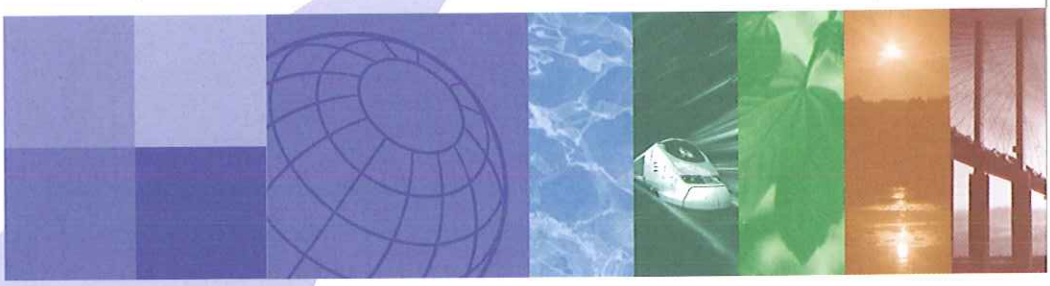
Northern Ireland Water Ltd

Annual Information Return 2009

To the

Northern Ireland Authority for Utility Regulation



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Part 6 of 7 containing:

Financial Measures - commentaries for tables 32 to 38 and 40 (tables 35b and 36b excised)

Reporter's Submission

By

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Northern Ireland Water Ltd

Annual Information Return 2009

To the

Northern Ireland Authority for Utility Regulation

Public Domain Version

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Northern Ireland Water Ltd – AIR2009 Submission

This is the public domain version of the Reporter's submission for AIR2009.

Items mark (x) have been excised as they are considered commercially confidential or of sensitive nature.

Table 32 – Analysis of fixed asset additions and asset maintenance by asset type (current costing accounting)

Commentary by REPORTER

1. Background

This table facilitates analysis by asset type of fixed asset additions for enhancement and the renewal or replacement of assets for the purpose of maintaining base service.

2. Key Findings

- Procedures for proportional allocation are significantly improved on previous years
- Apportionments are undertaken by project engineers/managers at project level, many of which have been independently reviewed and challenged to improve consistency and robustness
- Overall, we believe that the allocation of investment into service areas and asset types has been done well
- Allocations into QBEG categories (and therefore into the Base service provision versus the Enhancements blocks within this table) have been greatly improved over the year and data collation processes have now been largely automated
- There remain some concerns over QBEG allocations but these are under review by NI Water and we expect to see these diminish to relative immateriality over the course of 2009/10
- Outside of the CWP and Operations-Capital programmes, SBP apportionment assumptions generally still prevail. We recommend that these are revisited to ensure that they remain valid for the treatment of actual expenditures.
- Rules on the classification of PPP expenditure need to be clarified and agreed

3. Audit Approach

A total of 10 SBP non-infrastructure projects were included 'Capex' audit programme which was conducted with the PC10 audits. These were weighted towards projects involving greater capital expenditure.

At year end we also reviewed the CIDA allocation process and the detailed review work that had been done both internally and the overview by independent consultants on expenditure allocation.

The detailed level 'Capex' audits were followed up with a review of the contents of the spreadsheet systems, which access and collate the expenditure information by project for the Report Year. During this latter review, the collation system is tested to ensure that the proportional allocations exposed in the scheme specific audits are consistent with our expectations from the detailed Capex audits.

4. Audit Findings

4.1 Proportional Allocation

NI Water has produced a Capital Investment Driver Allocation (CIDA) Manual, June 2007. This is a comprehensive document which includes:

- An explanation of the need for proportionally allocating capital investment;
- the occasions (generally formal approval stages) in the life of a capital scheme when the analysis should be considered or re-appraised;
- the thresholds for which CIDA is required;
- the procedures for undertaking the allocation;
- a comprehensive series of worked examples;
- definitions of purpose categories and investment drivers;
- descriptions of purpose categories and investment drivers
- descriptions of asset types and examples of assets;
- non-infrastructure asset life categories, lists of typical asset types in each category and the range of asset lives covered; and
- NIW asset categories

This manual appears to fully conform with the NIAUR Reporting Requirements and the Regulatory Accounting Guidelines and should form a sound basis for compliant reporting in Tables 32, 34, 35, 36, 37, 38 and 40.

The Reporting Requirements indicate that, for a company with capital investment greater than £100m per annum, proportional allocation should be applied to all schemes/projects expending over £100k in the Report Year.

As noted elsewhere, NI Water commissioned an independent consultant, who helped compile the CIDA Manual, to check through all the projects which had been reviewed to reduce the errors, improve the allocations and identify key areas for improvement. The review included all schemes above this threshold and many of those below it, only omitting those with very small spend in the year which between them account for less than £300k of the 2008/09 expenditure.

We strongly recommend that checks continue to be undertaken on all schemes with Report Year spend above the £100k threshold, using staff with experience of capital works and detailed knowledge of the CIDA processes, until all such projects have at least been through the revised A1 approval stage.

Training events have been held, a programme of project reviews has been undertaken (covering the majority of projects and the vast majority of expenditure on SBP capital investment programmes) and the requirement for a CIDA review at key project stages (A0, A1, A3 and Project Commissioning) has now been embedded into business-as-usual practice.

Templates for capturing the CIDA information have been produced and linked to investment monitoring systems and to Regulatory Reporting processes, and a series of reconciliation checks have been undertaken to provide assurance of the integrity of the operation of these processes.

The processes are, unfortunately, necessarily time-consuming and complex and much detailed information needs to be assimilated by each user in order to fully and correctly apply all the allocation procedures in accordance with the guidance. Furthermore, we anticipate that many of the users are occasional or infrequent and the retention of these requirements (when they are perceived to be of relatively low relevance/importance to their normal duties and competing pressures), will I believe in these early stages, inevitably lead to some mis-allocation as the concepts and processed bed in and become a familiar routine.

It is therefore appropriate for NI Water to continue to undertake thorough checks on the allocations, noting where and why any corrections are required such that additional training and increased vigilance can be focussed on any areas of concern.

4.2 Audit Checks

During 2008/09, NIW commissioned a thorough review of the CWP projects and their investment allocations. These were initially undertaken by NIW Project Managers, then reviewed centrally by a team from Jacobs to improve compliance with definitions and consistency of application of the regulatory accounting guidelines for allocation into asset types, and with the reporting requirements for purpose categories and driver allocations.

This process was captured in the CIDA (Capital Investment Driver Allocations) spreadsheets: one for water; one for sewerage, uploaded to CAPTRAX and then downloaded into regulatory Tables 32, 35, 36, 37, 38 and 40.

Table 40 reports regulatory outputs at project level and a number of these were cross-checked back to the output of the review to ensure the upload/download and any interim manipulations still retained the appropriate CIDA splits. Tables 37 and 38 report on investment in quality drivers and a series of checks were made to trace the expenditures stated in the tables back to relevant allocations from appropriate projects. These checks assist with the verification of the allocations of investment into base and enhancement purposes as required by Table 32.

4.3 Data collation processes

The reporting of NI Water's information is made more complicated by the separation of information streams. In the financial measures tables, the collation of the final tables is not undertaken until the last stage of the process where the Regulation team finally add the independently derived totals from the EP, Operations and PPP investment streams together.

We would like to see greater transparency of the data breakdown and flow, ideally in a better integrated single system rather than one which diverges into separate systems so immediately below the totals reported in the tables.

The process by which the financial measures tables are populated needs to be simplified and the inclusions/exclusions assumed needs to be formalised to improve the transparency, and stability and repeatability of this information.

Whilst we have been able to follow the methodologies and processes used to collate and the split financial information into the liens and columns required, and we confirm our reasonable comfort with these methodologies and the efforts made in 2008/09 to improve their implementation, it is difficult to drill back down through the numbers to identify the principal components and thereby enable focussed and appropriate scrutiny. Complexities are magnified by the independent sources of information (3 x PPP's which are each treated differently in different tables, EP, Operations and Asset Management Directorates).

4.4 Grants and contributions

As stated in NI Water's commentary to table 32, non-infrastructure additions are shown gross of grants, contributions and asset adoptions. Assets adopted are included in gross MEAV terms as described in our table 36 commentaries

Infrastructure renewals expenditure is shown net of Infrastructure Charge Receipts.

4.5 Reconciliations

We confirm the following consistencies:

- Table 32(Total)/33/2 = table 35(incl.PPP)/3
- Table 32(Total)/32/1 = table 35(incl.PPP)/25
- Table 32(Total)/17/3 + 32/33/3 = table 35(incl.PPP)/26
- Table 32(Total)/33/5 = table 36(incl.PPP)/3
- Table 32(Total)/32/4 = table 36(incl.PPP)/22
- Table 32(Total)/17/6 + 32/33/6 = table 36(incl.PPP)/23

Date: 10 August 2009

Table 33- Depreciation Charge by Asset Type

Commentary by REPORTER

1. Background

Information in this table assists the Regulator with their understanding of the Current Cost Depreciation (CCD) applied by the Company.

The Table also reports on Infrastructure Renewals Charges (IRC) for Water and for Sewerage services separately. It compares IRC against IR Expenditure (IRE) and tracks the prepayment/accrual position.

2. Key Points

- The total data reported under Table 33 is consistent with data reported for Table 25, which has been reviewed by the financial auditors.
- We have commented on proportional allocation between base and enhancement and by asset lives in our commentary to Tables 32, 35-38.
- We believe that the data does not represent a fair view of the split of depreciation between base and enhancement for AIR09. This is because the method used is incorrect. The Company advised that the table definitions have inconsistencies which need to be clarified before NI Water attempt to provide a more accurate solution.
- As a result the Company should restate the depreciation split between base and enhancement for both AIR09 and any other years where it has followed a similar method.

3. Audit Approach

Our audit consisted of an interview with the NI Water system holders and a review of the current Company methodology for data collation.

4. Audit Findings

The total depreciation charge for the year is reported in line 3. We note that this is consistent with data reported in table 25. Data in table 25 is audited by the financial auditors. Our scope therefore is limited to comments on the split of the depreciation charge between base and enhancement assets reported in table 33.

No separate depreciation has been reported for PPP and hence we have not provided further comment in relation to this.

Confirm whether the systems and processes described in the company's methodology statement are those currently in operation. Where this is not the case identify and explain areas where the methodology statement is incorrect or incomplete.

During our audit we were provided with the company commentary and their process notes that related to the Company approach. The Company advised that it was in the process of completing more detailed process notes which were not available at the time of our audit.

As the Company advises, the data for this table has been populated using the same method as that used to populate Table 25. Table 25 is based on actual asset lives and not simplified assets as those reported in Table 34.

The Company advised that it is not able to automatically assign depreciation to either base or enhancement expenditure. It uses a split based on CIDA analysis which identifies whether an asset relates to Quality, Base, Enhancement or Growth.

Data from table 25 is already split between water and sewerage services.

5. Depreciation Policy

Assets are depreciated on a monthly basis from the date they are commissioned for beneficial use. The Company has a de-minimus value for capitalisation.

6. Revised MEAV valuation

The previous asset revaluation was undertaken in 2001-02 by [X]. The overall value of the asset base in 2007 was £6bn. The Company advise that it will undertake the next revaluation for price control 2013.

7. Depreciation Calculations

As data already exists related to water and sewerage the following splits have been used to split expenditure between base and enhancement for water and sewerage for the current year:

Percentages used to split the depreciation charge

Water Enhancement	38%
Water Base Service Provision	62%
Sewerage Enhancement	75%
Sewerage Base Service Provision	25%

The percentages identified above are used in order to split the total depreciation charge between water and sewerage. The Company advised that these percentages are derived

from the Table 34 submission. We challenged the Company to provide supporting information in relation to this. The Company provided data that showed this split is based on assets data reported in Table 34 for 2008/09.

The Company approach will provide a hugely inflated depreciation charge related to enhancement assets as the total depreciation charge relates to the complete asset base valued in the region of £6bn. The Company advise that in the guidance the current definition for Line 3 is the sum of lines 1 + 2 but if we apply only the depreciation for new investment for the period from 1april 08 in line 1 the total of line 1 + 2 will not equal the total depreciation charge for the year. In addition the Company advise that they have no means of determining the total asset base related to enhancement and base. The Company advised that definitive guidance from the UR on this would be helpful.

The current Company method suggests that a large portion of this £6bn (75% worth for sewerage and 38% for water) are enhancement assets. Based on data received we believe that enhancement assets since April 2008 form less than 3% of the total active asset base.

We believe that the Company should revisit the basis of these calculations for the current year as well as previous years where this approach has been applied. The Company advised however that it will require better definitions in advance of this.

The Company advised that it is depreciating asset for Kinnegar as this is an on-balance sheet transaction although it is being built and operated by the private sector. We also note that a lease cost is being paid for these services. Further questions in relation to this should be referred to the financial auditors.

8. Correctness of split of assets between water and sewerage and base and enhancement

Perform tests of the company's systems and processes described by the company's method statement to ensure that it has been followed by the company in the calculation of the CCD and population of table 33.

We have commented on the robustness of asset allocations in our commentary to Tables 32 and 35-38. In general we believe that the approach is appropriate for the purposes of splitting current year expenditure between base and enhancement services. However, as noted above the approach to splitting the total depreciation charge between base and enhancements seems to be incorrect and should be revisited.

Review the company's assessment of a confidence grade by line to assess the robustness of how this table has been completed. Comment on whether you agree with the confidence grade assigned.

The confidence grading of DX reflects the substantial amount of uncertainty related to the data as no historic data exists. We have not reviewed line 3 'Total depreciation

charge for the year' in detail. This is because this line is consistent with data reported in table 25 which has been audited by the financial auditors. In relation to the split of expenditure between base and enhancement this is reliant on the confidence grade entered in line 3. We believe that the current split is incorrect.

Consider and comment on any changes that the company could make to its analysis, which would give a more robust answer. You should consider feasibility and costs associated with making suggested changes, and explain whether you have brought your suggested improvements to the company's attention and whether it is considering implementing them.

The Company needs to continue to improve the process of allocating expenditure between base and enhancement services. We note substantial progress has already been made in this regard for the current year, however additional quality assurance, better governance and internal audit would provide additional confidence in the data submitted.

Compare the company's rules on proportional allocation between services (specifically between base and all enhancements) and allocation of expenditure to depreciable life categories given in table 33. Confirm whether the charge stated has been calculated in accordance with the company's rules. Comment on any exceptions.

As part of our audit we have undertaken a review of the Company approach to proportional allocation between base and enhancement and asset lives. We undertook a sample audit as part of PC10 which was submitted to the regulator as part of the Strategic Business Plan. In addition we have further reviewed the allocation of capital expenditure across services and activities and our findings are reported in Tables 32 and 35-38.

The Company has reported the following asset lives in Table 34.

Asset category	**Asset life**
Short	10
Medium	20
Long	60

We did not review whether these assets are a fair representation of the average asset lives of the various categories for the AIR09. We will review this for AIR10.

Review and comment on the company's explanation of the movement in the total CCD between the current year and prior year.

The Company has shown the following comparison with regards to AIR08.

AIR09

	Water (08/09)	Sewerage (08/09)	Total (08/09)
	£m	£m	£m
CC Depreciation in year	29.483	34.463	63.946
Accelerated Depreciation	2.394	9.844	12.238
Total (2008/2009)	**31.877**	**44.307**	**76.184**

AIR08

	Water (07/08)	Sewerage (07/08)	Total (07/08)
	£m	£m	£m
CCD	29.305	32.044	61.349
Variance (%)	9%	38%	24%

The overall variation between the two years is £14.8 million. The Company has attributed the large part of the variation to accelerated depreciation which accounts for £12.2 million prior to inflation. The Company advised that the amount of accelerated depreciation for 2007/08 was £0.

Review and confirm whether NI Water's explanation of the impact of an MEA revaluation on its CCD charge is adequate and reasonable

There has been no revaluation of the depreciation charge for the current year.

Review and confirm whether NI Water's explanation of the link between HCA and CCA depreciation, including what systems are used to derive both depreciation charges, is adequate and reasonable.

The Company fixed asset register holds details related to both HCA and CCA. Asset values reflect the values at the previous revaluation in 2001, plus new assets that have been commissioned and continue to have useful life. HCA data is indexed on an annual basis to present it as CCA data. Since the incorporation of the Go-Company, NI Water has used RPI to index data.

9. Infrastructure Renewals Charge

Consider whether NI Water's policy for infrastructure renewals charge is consistent with the calculation of the infrastructure renewals charge;

The basis of the calculation of the infrastructure charge is a 10 year average. The Company advise that this is a four year look back to 2003/04 from the current year 2008/09 plus a look forward for the five years until 2012/2013.

As the Company notes in its commentary the backward look is based on 01/02 projected forward on a linear basis till 06/07. We note that the 01/02 data was not subject to external audit. We are therefore unable to comment on the robustness of these values. In addition the projection is a linear assumption. We note that often IRC does not behave in a linear manner. Therefore it is entirely possible that projected data from 03/04 to 06/07 is not reflective of the actual position within NI Water. We appreciate that more accurate data is not available. In the absence of better data we believe that the Company approach is appropriate.

The policy for water infrastructure renewals charge is consistent with the calculations of the infrastructure renewals charge. We have commented in more detail on the Company approach to the infrastructure renewals charge in our commentary to the strategic business plan. The figure that the Company intended to present initially was consistent with that presented in the SBP (the Company advise that a difference of £0.02m existed).

We have not revisited the underlying analysis during our audit of AIR09. Our views in relation to this remain the same as those presented for AIR09.

We note that the regulator has requested an adjustment in the IRC charge of 9.9%. The requested adjustment seems to be arbitrary and the impact on serviceability of assets has not been fully evaluated.

Consider whether NI Water's policy is reflective of NI Water's medium to long-term view of infrastructure renewals expenditure. The reporter should consider what IRE projections are available to NI Water and if these projections are medium to long term; and

The IRE projections used by NI Water are based on data submitted as part of the SBP. A view based on a 10 year (-5 +5) assessment can at best be considered a medium term view of expenditure. We note, and the Company accepts, a substantial portion of historic data contains uncertainties. In addition an arbitrary adjustment to the infrastructure renewals charge of 9.9% has been made. In these circumstances we are not convinced that NI Water's view of medium to long-term IRE is sufficiently robust to be a true reflection of the actual long term average infrastructure renewals expenditure that will be needed to maintain serviceability of assets. We do however accept that in the short term the impact on serviceability is likely to be marginal if any. Hence our view is

that there is a low risk of decline in the short term. However, we would be concerned if there were consistent requests for a reduction in the IRC.

Review and comment on NI Water's explanation of the period over which it expects any infrastructure renewals accrual/prepayment to be wound out and whether this is reasonable.

NI Water has a negligible amount of prepayment of £0.091m.

Date: 10 August 2009

Table 34 - Non-infrastructure Fixed Asset Additions

Commentary by REPORTER

1. Background

This table provides a breakdown of the non-infrastructure asset additions in each Report Year, split by:

- Service area (water or sewerage service)
- Purpose category (Enhancement or Base Maintenance) and
- Asset life category

2. Key Findings

- The depreciation charge is based on actual asset lives rather than average asset lives;
- The asset lives presented in this table do not provide for a very short asset life. In addition we note that the CIDA value for medium live assets as assigned to schemes is 15 years rather than the 20 year average asset life reported in this table;
- The Company has made improvements on the approach used in previous years. In particular it has increased the amount of automation in reporting by introducing CAPTRAX and reconciling with the general ledger.
- The appropriateness of the average asset lives reported here and whether or not the financial asset lives are consistent with the engineering asset lives was reviewed at the time of our audit of the SBP. We have not revisited this data for AIR09. We will review the Company analysis related to this for AIR10.

3. Audit Approach

We undertook an audit of the systems and data generated by those systems for the purposes of reporting data within this table.

4. Key Findings

Confirm whether the systems and processes described in NI Water's methodology statement are those currently in operation. Where this is not the case the reporter should identify and explain where the methodology statement is incorrect or incomplete;

The Company methodology is contained in the commentary submitted. The Company installed the Capital investment driver allocation (CIDA) approach in 2007/08 in order to improve the allocation of costs primarily between base and the various enhancement categories. We undertook a review of this method as part of our review of section C5 of the Company Strategic Business Plan submission. We did not find any shortcomings in the data at the time of the review.

The process used by Northern Ireland water is described in the Company commentary.

The Company advises that it has further developed the CAPTRAX database for the current year. It contains all CIDA reports. The Company further advise that the CIDA methodology has improved considerably during 2008/09. These improvements are listed in the Company commentary and will enable more confidence in the data being reported.

The Company advises that CAPTRAX has also been further refined. A number of improvements are again cited in the Company commentary. We believe that this again will allow for better reporting of data for current and future years.

The Company advises that the CAPTRAX system is reconciled on a monthly basis with the general ledger. The values being reported in table 34 include WIP and do not represent solely expenditure on commissioned assets in the year.

The Company advises that the CAPTRAX system allows the generation of reports that can be used directly for the population of data in table 34. However, the Company has noted that its systems contained 555 projects in 2007/08 which have no split between base and enhancement expenditure. The Company advise that this has been reduced to 149 in 2008/09. The total value of this expenditure is not material based on data provided by the Company. The Company advise that the total value of this unallocated expenditure in 2008/09 is £278k, which the Company advises is less than 0.1% of total expenditure.

The method described in the Company commentary does not substantially address asset life allocations. This is an area where the Company could usefully expand its method statement for future years.

The Company advise that Internal training and mentoring has been ongoing. Key staff targeted were Engineering Procurement, Operations, Asset Management, PPP and Finance and Regulation directorates. This should allow for the better reporting of data for future years.

Further comments are provided in relation to the systems and processed used by NI Water in our commentary to tables 35 to 38.

Perform tests of NI Water's systems and processes described by NI Water's methodology statement to confirm that it has been followed by NI Water in the calculation of the CCD and population of table 34;

The approach to CCD is based on actual asset lives not average asset lives contained in Table 34. During our review of the CIDA model we noted that medium life assets are shown as 15 year asset lives. This suggests that expenditure to medium life asset categories is based on an average asset life of 15 years. We note that the Company has

reported a 20 year average asset life in Table 34.

The Company has opted to report 3 categories of average asset lives. These are:

Short	10
Medium	20
Long	60

The average asset lives reported in this table are broadly consistent with the average asset lives for these categories within the water industry in England and Wales. We note the absence of very short asset lives in the Company submission. We further note the Reporter recommendation from AIR08 that NI Water 'reviews its allocation to consider the full range of asset life categories'.[1]

The Company provided flowcharts related to completion of the data within CAPTRAX, through to reporting data for AIR09.

Review and comment on reasonableness and consistency of the rules adopted by NI Water for allocation of expenditure to life categories;

We undertook a review of the allocation of expenditure across QBEG categories and asset lives on a sample basis for the SBP. We did not find any material areas of concern during this audit.

Review NI Water's procedures and consider whether or not they are reasonable, and whether they are followed by staff involved in allocation decisions;

The large part of the data reported in this table is based on the CIDA analysis. This has been reviewed internally by NI Water (either NI Water staff or consultants employed by NI Water). We have commented on Company procedures in our audits to tables 35-38 and the application of these procedures in terms of allocation expenditure.

Review and comment upon any differences from rules and procedures adopted in previous years, and consistency of asset lives with those used for depreciation of assets;

The Company approach is continually improving. For the current year the Company has made a number of improvements to data for both the CIDA allocation and the CAPTRAX system and has started to implement a governance structure related to the quality of information being entered in to the CAPTRAX system.

In terms of depreciation actual assets lives are used, rather than average asset lives as reported in this table. We did not review the correctness of the average asset lives for

[1] Please see Reporter's Report on Northern Ireland Water's Annual Information Return 2007-08, [X].

AIR09, though we note that they are broadly in line with those categories in England and Wales.

Consider the appropriateness of the current cost depreciation charge in the year and in particular: – confirm when NI Water last reviewed or amended its asset life and apportionment policy; – comment on whether, in the reporter's view, the financial asset lives reflect the operational lives of the assets and the reason for that opinion; – comment on the appropriateness of both asset lives and the apportionment of expenditure across asset lives used by NI Water;

The Company approach to apportionment is being improved continually. The apportionment and asset life policy remains broadly as previous years. However, the Company is seeking to improve the application of this policy and has made a number of improvements to both CIDA and CAPTRAX to aid it in this aim.

It should be noted that the total current cost depreciation charge has been reviewed by the financial auditors. We have not reviewed the basis of the total depreciation charge. We have commented on whether we believe the financial asset lives are the same as the engineering asset lives as part of our commentary to the SBP.

The apportionment across average asset lives has been done on the basis of the CIDA allocations. As noted above the CIDA split had an average asset life for medium life assets at 15 years. We note that this is not consistent with data reported in Table 34.

Review and comment on inconsistencies between engineering and financial judgements on asset lives and investment allocation; and

Our reviews of asset lives remain as those that were reported in the SBP document. We have not revisited this analysis for the AIR.

Review and comment on an exception basis where NI Water has not provided commentary on inconsistencies in asset lives and investment allocation between those used in previous years.

We have commented on investment allocations in more detail in our audits to tables 35-38. In general the approach to allocating expenditure to asset lives remains the same as that used for AIR08.

5. Methodology PPP table

The Company has used a number of assumptions in order to reporter data under PPP.

Project Alpha

The Company advise the QBEG split has been extracted from the Contractors financial model. This is likely to be a simplification and based on early projections.

A number of assumptions have been made in order to split data between infrastructure and non-infrastructure expenditure. Again, this is likely to be a simplification.

Project Omega and Kinnegar

The Company has not populated the appropriate PPP expenditure related to this spend as it does not currently have data at a sufficient level of detail for it to report anything with confidence.

Date: 10 August 2009

Table 35 – Water Service – Expenditure by purpose

Commentary by REPORTER

1. Background

This table disaggregates expenditure between base, enhancements, grants and contributions and adopted assets. Enhancements are reported under quality, enhanced service levels, and supply/demand. The table also indirectly checks the Company's proportional allocation rules.

2. Key Findings

- Proportional allocation methodologies have been further developed and are consistent with the Reporting Requirements.
- Allocations have been substantially reviewed and corrections applied such that there is good alignment of the capital works programmes with allocation rules
- Whilst other programmes remain consistent with SBP assumptions on allocation, they should be revisited for compliance with current requirements

3. Audit Approach

A total of 10 SBP non-infrastructure projects were included 'Capex' audit programme which was conducted with the PC10 audits. These were weighted towards projects involving greater capital expenditure.

As the investment allocation system is still undergoing some development and as the requirements continue to bed in to the organisation, at year-end we undertook a review of the contents of the spreadsheet systems, which collate the expenditure information by project for the Report Year. During this review, the collation system is tested to ensure that the proportional allocations exposed in the scheme specific audits are correctly stated at the summary level for entry into the AIR Tables. We also overview the schemes which contribute expenditure to each asset type, purpose and driver as a further high level check on the allocation methodologies.

The detailed level 'Capex' audits were followed up with a review of the contents of the spreadsheet systems, which access and collate the expenditure information by project for the Report Year. During this latter review, the collation system is tested to ensure that the proportional allocations exposed in the scheme specific audits are consistent with our expectations from the detailed Capex audits.

4. Audit Findings (Capex)

4.1 Strategic Business Plan Assumptions

A summary table from the Strategic Business Plan is provided on page 17 of that document and reproduced in our Table 35a and 36a commentaries.

Financial information, particularly that relating to the capital programmes, was not prepared using the principles now required for regulatory reporting. Whilst some specific project requirements could be identified, many programmes of work and levels of investment were based upon experience and historic levels of expenditure. Few projects were well defined in terms of need, solution and very few had reached detailed design, specification and reliable costing stage. Thus, the allocations of investment assumed were done at relatively high level and based on judgement, with limited supporting information.

Partly to assist with the financing of the transformed enterprise and partly to recognise the legacy of under-investment that the new Go-Co was inheriting, the concept of 'backlog' was introduced and any related expenditure was considered as enhancement investment.

The SBP contained expenditure projections covering a 7-year period. The PC10 process has required the separation of that programme such that the projects which will be commenced prior to 1 April 2010 will form one programme, those commencing later are to be considered with other new obligations and priorities. Whilst it appears that NI Water is reasonably well on track with regard to outputs being delivered, there is less clarity over the related expenditure and whether this is delivering like-for-like programmes of work to those assumed in the SBP.

4.2 Proportional Allocation

Since April 2007, it is apparent that NI Water has been endeavouring to understand, develop, implement and improve their proportional allocation procedures. Much work has been done to review ongoing projects and to better allocate the investment to the appropriate QBEG purpose categories.

During the Report Year, an extensive review has been undertaken by external consultants of 254 projects (62 water and 192 sewerage) which are either ongoing or commenced during the Report Year. We have reviewed the methodology and checked that it has been undertaken diligently, consistently and comprehensively and that appropriate quality assurance and sense-checking has taken place. We believe that the findings are of good quality and noted a few, minor, shortcomings.

Overall, the methodology involved training of the project engineers in allocation methodologies and their being involved in interviews with the external Consultants. We

believe that this will have improved understanding and consistency of application. This improved understanding appears to have led to a significant shift in allocation from the more generic methodology adopted for the SBP.

We have reviewed, in some detail, a sample of projects of different type, covering all purpose categories and a wide variety of asset types. These are reported on in our PC10 commentaries.

The 'CIDA calculator' input processes, which the project engineers populate, was developed in 07/08 and has not been changed for 08/09. However, the output processes had to be completed manually and, for 08/09, NI Water had planned to have all these calculations automated. This was achieved for the sewerage sheet but not for the water sheet where a manual process had to be applied to 25 projects with a combined expenditure of £9.676m in 08/09.

Our random sample audits, which checked the consistency of CIDA with table 40 information, generally proved satisfactory but included one of these 25 projects. Although the project was small (circa £35k expenditure in 08/09) it indicated that the proportional allocation was significantly different. It is not known whether this discrepancy is repeated in the remaining projects. NI Water plans to complete the automation of this process in the current year.

External Review

The external review of proportional allocation assumptions covered some 50 projects and excluded those which had an obvious prime purpose (e.g. water mains for new development). Previously reported allocations have not been amended, so the AIR08 information is unaffected.

Some 149 projects did not have a CIDA allocated, these have a total of £278k expenditure reported in the year which is less than 1% of Report Year spend. The allocation used for this sum was in proportion to the overall allocation for the whole programme.

Clearly, there are likely to be major differences between allocation methodology now used and the high level forecast allocation assumptions used in the Strategic Business Plan and these are likely to be a principal cause of the differences reported in Tables 35a and 36a.

4.3 Year-end Capital Investment Reconciliations

For 2008/09, the year end reconciliation between Oracle and CAPTRAX was less than £100k (below the allocation threshold). NI Water demonstrated that the differences were due to rounding errors: CAPTRAX rounds down to the nearest £1000. The reconciliation was absorbed into the CWP using the average QBEG split.

4.4 Capital Programmes

4.4.1 Water mains rehabilitation programme

As noted in NI Water's Table 32 commentaries, the investment in DZP studies has been transferred to Management and General/base service/infrastructure and as such is no longer reported in table 40. The CWP included for these within the water distribution project costs. Approximately £1.8m was incurred on this activity in 2008/09.

Over the course of the SBP period, NI Water has continued to complete further distribution zonal studies. The ongoing outcomes from these are assessed against the priorities established for the preparation of the SBP. This has led, with the assent of the DWI, to a series of changes in the zones which need to be prioritised for attention within the SBP period.

Whilst NI Water still intend, and still anticipate, delivering in excess of the total mains rehabilitation length of 910 km identified in the SBP, the mix of outputs, sizes and environments will inevitably be different.

The mains rehabilitation activity is based on the prioritisation of the zones rather than the ease of achievement or cost of delivery of the outputs. There is an emerging difference relating to the contributory outputs of new mains, mains replaced, mains relined and the various techniques involved between the SBP assumptions and those being delivered. Given the continuous and high volume outputs of the programme, we believe that these 'actuals' are more representative of the underlying requirements (unless policy/technology/market pressures change) and should be reasonably reflective of the balance of techniques and outputs required in the PC10 period.

NI Water has in fact increased the emphasis on mains rehabilitation because there are difficulties in maintaining the pace of the Drainage Area Studies, and the solutions relating to these are taking longer to identify than previously anticipated.

Proportional allocation

Proportional allocation is determined for each zone separately. Extensive spreadsheets are produced which provide details of the works required in each street, the principal reason why the work is necessary, lengths, diameters and materials of existing and proposed assets, and the technique for rehabilitation/replacement. The principal reason (justification) for the work in each street is taken to indicate the (prime) purpose category as follows:

- structural = base
- hydraulic = supply/demand balance (new development)
- operational = base
- water quality= quality

A higher level review of the purpose category allocations indicated that proportional allocation of work across all zones aggregated to:

•	backlog quality	= quality	=	26%
•	new quality	= quality	=	0%
•	base maintenance	= base	=	54%
•	backlog base	= enhancement	=	0%
•	enh. service level	= enhancement	=	0%
•	backlog growth	= supply/demand	=	0%
•	new growth	= supply/demand	=	20%
				100%

There appear to be some shortcomings with this allocation methodology which need to be addressed in 2009/10:

a) there is no apparent means to allocate investment to levels of service enhancements where the work is alleviating DG2 (pressure) or DG3 (interruptions to supply) problems.

b) new growth appears to account for a significant component of the allocation, higher than we expect will be sustained. Thus it seems probable that it this may be including backlog growth, which in turn is probably best identified by problems with poor pressure/low flow and thus may, under the definitions, be on levels of service enhancements expenditure.

c) although the allocation system is undertaken at a very granular level, there are concerns that some of the benefits may be being masked by what is essentially a prime purpose allocation. For example, it is evident that there is almost universal upsizing of the mains and, whilst we concur that it makes sense to standardise on diameters and to cost-effectively install a larger main than may be required, there will generally be some enhancement benefit which is not being recognised when allocations are to base service. Conversely, when replacing mains for enhancement purposes, there is an infrastructure asset being removed which had a maintenance (base) liability.

Whilst I believe this methodology to be well developed, well implemented and well managed and the resulting overall allocations to be a vast improvement on the SBP assumptions, it remains to be determined what significance the issues above may have on these allocations. We are mindful of the time and cost involved in further analysing these projects at this level of granularity, and of the fact that each mains length will generally have a cost less than £100k (which requires only a prime-purpose allocation). However, these projects sum to levels of investment substantially above the threshold, and revisions to the allocations could be very material. Thus, subject to confirmation by the Utility Regulator, we would recommend that a pilot study, covering a stratified sample of these mains rehabilitation projects, is undertaken to determine whether and what adjustments are necessary to the current procedures and allocations.

We met with the NI Water Compliance manager to discuss the processes in place to monitor the output delivery of the SBP programme (the Capital Works Programme). Since a major component of ths CWP relates to WWTW, our discussions were mainly focussed on this (see commentary on table 36). The other principal CWP programmes were discussed, but in less detail.

4.4.2 Water treatment works

NI Water has 42 WTW (4 of which are within the Alpha PPP). About half of those operated by NI Water are performing satisfactorily and reliably to the standards required. The remainder are subject to Authorised Departures whilst improvement works or mitigation measures are being implemented.

The WTW capital programme consists of projects at 3 sites. All are in progress and NI Water confirmed that they believe the beneficial use dates will be achieved as planned. Further discussion on this programme can be found in table 37 of our AIR09 commentaries.

4.4.3 Service Reservoirs

The SBP contained a general line for quality improvements to Service Reservoirs. NI Water are reacting to DWI and compliance issues and generating a rolling list of projects in response.

4.4.4 Programme reconciliation

The Head of CIPP is currently producing a document which endeavours to reconcile the capital programme outputs required in the SBP against those being delivered, and to account for the changes. This document, 'NI Water Strategic Business Plan 2007/08 - 2009/10 Delivery Assurance' is work in progress and is expected to be available shortly. This will help greatly with understanding the progress that is really being achieved in both output and investment terms, which we consider to be a necessity for progress monitoring as, without it, the picture appears confused and unclear.

4.5 PPP

[X]

We challenged the information arising from PPP Alpha over its consistency with the Reporting Requirements and Regulatory Accounting Guidelines. NI Water confirmed that limited information was available and what there is has been gleaned from tender information and further details provided in response to a general request. There is little confidence that it complies with the guidance and NI Water has had to adjust the coarse information using engineering judgement to fit the allocations required in the AIR tables.

The QBEG split used in the SBP is assumed to prevail, which includes a sum for maintenance (non-infrastructure). Whilst NI Water has paid this sum, it seems unlikely that it will have been incurred at this early stage of PPP operation.

4.6 Operational Capital (including M&G)

Operations Capital (including M&G projects) is now subject to similar procedures as the Capital Works Programme. Project engineers provide the initial QBEG allocations (for tables 35 and 36) and the investment splits into asset type (for Table 32) and asset life categories (for Table 34 - and Table 33).

Most Operational capital will relate to base maintenance, or to new development or security of supply. Rarely does a quality driver apply, although there has been some modest expenditure on customer-driven lead supply pipe replacements (circa £150k).

The investment analysis forms are submitted to NI Water's Finance and Regulation section for review. These are particularly challenged when there is spend against Q, E and G purpose categories. Allocations are adjusted with the approval of the project manager, this appears to have resulted in an underlying trend of movements from the Q and E purpose categories to B, base service.

Also the costs associated with the transition to the new Mobile Work Management system has been classed as an enhancement.

4.7 New Outputs/Obligations

NI Water has reported no new outputs/obligations to date.

4.8 Leakage Expenditure (line 13)

NI Water has identified expenditure on leakage in their commentary as follows:

	2008/09	2007/08
Capex	**£ 6.39m**	£6.44m
Opex	**£ 3.86m**	£4.21m
	£10.29m	£10.65m

This accounts for all expenditure on leakage reduction, not just that which is required to reduce leakage to the ELL target established in the SBP. NI Water has assumed a 100% allocation to supply/demand balance (line 13) because they have not yet achieved ELL.

In England and Wales, where the company benefits from these efficiencies, we would expect capital expenditure to be allocated to line 3 (MNI), but circumstances appear different for NI Water and this should be clarified. Costs to maintain the level of leakage at ELL should be Base as this is maintaining the desirable level of service at the most economic point. If it is necessary to push leakage levels below ELL due to supply restrictions, or possibly due to the additional pressures of carbon reduction or public pressure then other purpose categories should apply.

The capex is broken down broadly as follows:

Leak detection	[X]
Leak repairs	[X]
Management Services	[X]
Infrastructure improvements	[X]
Meters	[X]
TDMS replacement	[X]
	[X]

The capex/opex split appears largely determined by whether the activity is in-house or outsourced. We would normally expect that leak detection activities should be opex as they are not directly contributing to the creation or maintenance of specific assets.

The leakage infrastructure improvements include pressure management, PRV replacements, DMA set up/optimisation, and also the costs of the study on the water balance. It could be argued that the study should be classed as opex, but as it provides a step-change in information on asset performance, we believe that it is appropriate to capitalise this activity.

NI Water advises that they have re-coded the activities in anticipation of reporting against PC10 headings. We will review this in the current year.

Capex codes cover:

Wages and salaries	[X]
Temporary and other staff support	[X]
Power costs	[X]
Contractors	[X]
Vehicles and plant charges	[X]
	[X]

5. Grants and Contributions (lines 4, 21)

In accordance with the assumptions made in the SBP, NI Water assumes that all grants and contributions would relate to enhancements. Therefore zero receipts are reported against maintenance non-infrastructure (line 4). Lines 3 and 5 are therefore identical. We believe this to be reasonable.

6. Infrastructure Charge Receipts (line 21)

The SBP forecasts have proven to be significantly optimistic (even allowing for the unexpected recession) and NI Water's current projections and annual budgets are considerably lower. The recession has further exacerbated the situation, badly slowing development and their infrastructure charge receipts for both water and sewerage.

As assumed in their SBP, NI Water consider all Infrastructure charge receipts (ICR's) to relate to enhancements (and thus there is no difference between IRE net and IRE gross). Further, the Company used the SBP investment projections on growth to determine the components of the ICR's which would be allocated to either infrastructure or to non-infrastructure. For 2007/08, 41.09% of ICR's was allocated to non-infrastructure; for 2008/09 it is 47.26%. The SBP only identified the infrastructure element of these receipts, so for consistency NI Water has reported ICR's in this table on the same basis.

All receipts are for domestic customers and charges are assumed to be phased in as follows:

2007/08	33% charge	67% subsidy
2008/09	67% charge	33% subsidy
2009/10	100% charge	-

The non-infrastructure element of the ICR's is assigned an asset life of 30 years and released over that period into the P&L account.

ICR's are received by customer services and coded into the Oracle accounting systems. For year-end reporting, an Oracle report is accessed showing the receipts against the relevant codes, different codes for water and sewerage and for charges and subsidy components. We have reviewed the spreadsheets used to calculate the full ICR's for water and sewerage, then to calculate the infrastructure and non-infrastructure components using the percentage apportionments above. The infrastructure element is entered into the table.

We confirm that the table entry is consistent with the calculations reviewed. However, we note that for 2008/09, the charge component is approx 62.5% of the total rather than 2/3, but that it was greater than 1/3 in 2007/08. We assume that the proportions will be corrected overall in 2009/10.

7. Opex

The starting point for data in this table is Table 21 total operating expenditure levels. Incremental Opex that is associated with enhancement projects from prior years is then assessed and removed from the total Opex reported in Table 21. The residual is considered to be base operating expenditure. Enhancement additional operating cost can result from three primary sources:

- Wastewater Operations
- Water Operations
- Customer Services

The Company advised that incremental opex has been calculated directly from the accounting general ledger. It advised that it considered those sites that had become

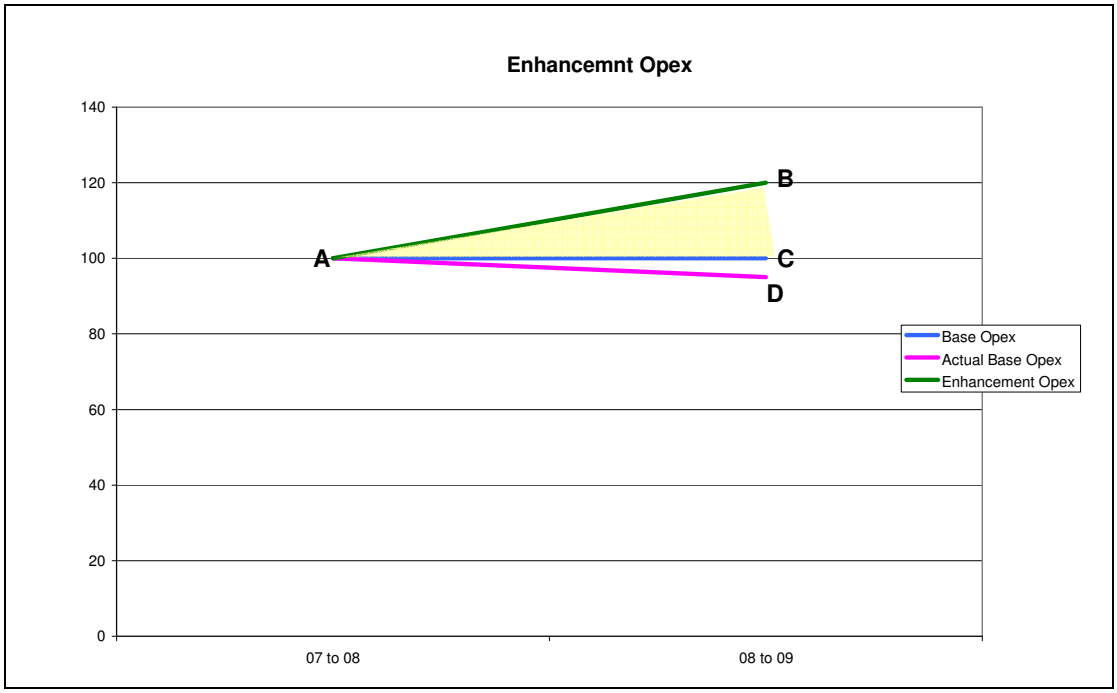
active since 2007/08. It then undertook a comparison of data on a site by site basis related to pre and post Capex investment.

Although the process relies substantially on manual assessment we believe that it is capable of reporting incremental Opex that is reflective of the actual additional opex due to capex incurred in the year.

We challenged the Company whether it has data on a site by site basis for all sites. The Company advised that this information exists for large sites in the form of a location code. The Company advised that out of a total of 1100 works, 100 have their own location codes. It advised that for the smaller sites it relies on the operations team to advise of specific schemes that are being commissioned or upgraded. It then determines the associated power costs for these schemes which is reported as an Opex cost. This process will not fully capture all enhancement opex costs. However, the Company feels that it will capture the majority of such Opex costs.

Once the total additional opex per site is obtained the Company applies a split between the different lines based on the CIDA split. Note it applies the entire CIDA split to enhancement. The base portion of any CIDA split is apportionment across the enhancement categories based on the non-base aspect of the CIDA split.

We challenged the Company in relation to why it assigns all expenditure to enhancement, even though the CIDA split suggests an element of the Capex will relate to base. The Company advised that the additional split is necessary enhancement split, as any base replacement will not result in additional Opex. In addition the Company advised that it is likely that the enhancement aspect is being under reported as it does not account for efficiencies. This is illustrated in the chart below:



In the above chart, the Company approach compares base over a period, before and after enhancement. In general this is likely to be a comparison over two years of the project. Base is shown by the line AC. This assumes base expenditure remains static between the two years. The increase in opex, from A to B represents the additional opex due to enhancement expenditure. The amount of enhancement expenditure reported is therefore ABC. In reality however, the level of base opex is likely to reduce due to efficiencies. Hence base opex may reduce from A to D between two periods. The correct level of enhancement expenditure would therefore be ABD, rather than ABC. Reporting enhancement expenditure as ABC will therefore understate the amount of actual enhancement expenditure and overstate base expenditure.

We would not expect efficiencies in any year to exceed 5%, and this is likely to be top end estimate. This could mean that 5% of the base opex in any year with enhancement associated with it could in theory be enhancement expenditure. For the reasons above we would not expect this figure to be material.

The approach for apportionment relies on projected expenditure versus actual expenditure. We believe that the approach could benefit from a comparison of actual splits compared with projected splits. This loop would also be beneficial to the Company in terms of providing feedback on allocation splits

We believe the Company approach is a substantial improvement of AIR08. We will review the application of the approach on a sample basis in AIR10.

7.1 Line commentaries

Line 1 – Base operating expenditure

The value is derived as the balancing residual after specifically allocated operating expenditure is deducted from the total operating expenditure as reviewed by the Auditors. We confirm on the basis of data received by us at the time of audit that the total operating expenditure figure in Line 24 of this table is consistent with that contained in Table 21 Line 22.

We have made comments in variations in our commentary to tables 21 and 22 for AIR09.

Line 8 – Opex: Total quality enhancement programme

The Company has only reported an increment amount of £3,000 for the current year. This is likely to consistent largely of inflation. The Company advised that this expenditure relates to backlog base.

Line 9 – Capital expenditure – customer service

NI Water has entered zero for this line. Investment in connection with improving the water supply headroom has been reported under line 16.

Line 10 – Additional operating expenditure – customer service

The Company has reported zero in this line.

Line 15 – Additional operating expenditure – Supply Demand Balance

The Company has reported zero in this line.

Line 17 – Additional operating expenditure – Security of Supply

The Company has reported zero in this line.

Line 19 – Additional operating expenditure – New Outputs, Obligations

The Company has reported zero in this line.

8. Confidence Grades

Capex and opex totals reconciles very closely with that reported from Oracle.

NI Water has assigned confidence grades of B2 for most capex lines. The confidence grades placed on the investment lines are therefore substantially dependent upon the QBEG analysis that is undertaken. The Company has undertaken a substantial review of their proportional allocation assumptions at project level. Further training, dissemination of the reporting requirements and greater familiarity with the systems and rules have enhanced confidence greatly. Any material concerns remaining seem likely to relate to differences of opinion over interpretation of the rules or perhaps alternate subjective assessments of allocations on larger schemes. The former will take time to identify, agree and formalise and the latter are likely to continue to occur. We therefore consider that a B3 for capex is now a generally valid confidence grade.

Base opex is supported by well tried and tested processes which have been subject to considerable scrutiny for some years. We would therefore have anticipated a better confidence grade than B4, perhaps B2, but our familiarity with the processes and the methodologies employed to convert Base opex into information compliant with the reporting requirements is lacking depth in this, our first year of appointment, so we are content to defer to the Company's assessment. We concur with B4 for enhancement opex lines.

Information relating to infrastructure charge receipts, grants, contributions and adopted assets appears to be well founded, with stable and appropriate methodologies and assumptions. We concur with the A2 confidence grades assigned.

9. Reconciliations

We confirm the following consistencies:

Capex

- Table 35(incl. PPP)/3 = Table 32(Total)/33/2
- Table 35(incl. PPP)/25 = Table 32(Total)/32/1
- Table 35(incl. PPP)/26 = Table 32(Total)/17/3 + 32/33/3
- Table 35(incl. PPP)/7 = Table 37/18 + PPP Alpha [X]

Opex

- Table 35(incl. PPP)/8 = Table 37/19 [X]
- Table 35(incl. PPP)/24 = Table 21(Total)/22

Date: 10 August 2009

Table 35a – Water service – Expenditure comparisons by purpose

Commentary by Reporter

1. Background

This table facilitates capital and operating expenditure comparisons between Company report year actual figures and those contained in the Strategic Business Plan.

2. Key Findings

- Opex information has not been completed in this table due to there being no comparative analysis available from the SBP.
- The SBP projections have had to be re-worked back into the capex categories due to the top-down adjustments made to the final case.
- SBP inflation assumptions have been used to generate the report year expenditure projections for comparison with actuals. We believe that unless and until a more appropriate index is accepted, actual COPI should be used as otherwise the effects of inflation/recession (which were not anticipated when the SBP was produced) may be an influential cause of variance.
- The SBP allocation assumptions between the purpose categories analysed in this table were significantly different from those now being developed and utilised by NI Water. We believe that this, and other impacts, will materially affect the allocations and render any comparisons inconclusive.

3. Audit Approach

The audit consisted of interviews with the NI Water's table author and a review of relevant supporting documentation, the methodology, assumptions and data used to compile the table. The audit also included a review of the Company's commentary.

4. Audit Findings (Capex)

4.1 SBP Projections

NI Water has provided a spreadsheet, based upon information supporting the SBP, and which reconciles to the total capital expenditure profile given in the SBP (as reproduced below).

Copied from NIWL Strategic Business Plan (page 17)								
NIWL Capital Expenditure DRD Final Sustainable Case (post efficiency)								
	2007/08	**2008/09**	**2009/10**	**2010/11**	**2011/12**	**2012/13**	**2013/14**	**Total**
CWP	229,976	211,120	225,793	212,147	201,639	184,407	170,806	**1,435,888**
E&P Capitalised Salaries and Overheads	5,479	4,973	3,640	3,704	3,769	3,836	3,903	**29,304**
SWwTW's	-	5,401	5,536	5,674	5,816	5,962	6,111	**34,500**
Capital Contributions	-10,055	-9,936	-10,480	-11,413	-11,265	-11,547	-11,836	**-76,532**
Technology Programme	11,092	12,639	7,856	-	-	-	-	**31,587**
Connections	2,344	2,250	2,087	2,124	2,161	2,199	2,238	**15,403**
Accommodation	-	-	-	-	-	-	-	
Asset Management - NIAMP3	2,303	2,861	1,939	-	-	-	-	**7,103**
ICT	2,162	930	863	806	820	834	849	**7,264**
Metering	4,808	6,131	2,175	2,457	2,501	2,545	2,589	**23,206**
Customer Billing	553	102	95	501	98	100	528	**1,977**
Other	24,372	19,081	13,233	9,808	10,094	10,493	11,589	**98,670**
Total Post Eff. Nominal	**273,034**	**255,552**	**252,737**	**225,808**	**215,633**	**198,829**	**186,777**	**1,608,370**
	Note that totals above do not fully match the SBP due to rounding.							

In order to report against the lines and tables in the AIR, NI Water has needed to recast the SBP supporting information and make some corrections/adjustments to align the SBP figures with the investment streams reported in tables 35 and 36 and thus to produce the 'SBP Projections' given in columns 1 and 2 of tables 35a and 36a.

With NI Water assistance, we were able to reconcile the totals and a sample of the SBP Projection figures back to the SBP extract above. We recommend that this reconciliation is formalised and discussed/agreed with the Utility Regulator such that the UR take ownership and control of these regulatory expectations.

NI Water advised that, following the acceptance of the SBP (from which the above data is copied) the DRD adjusted the funding allowances assumed for the Capital Works Programme (CWP) between expenditure categories, as follows:

Expenditure category (£k in 06/07 prices)	2007/08	2008/09	2009/10
Water infra (base)	-2,708	-2,184	-2,626
Water infra (enhancement)	-3	-101	-59
Water non-infra (base)	+2,711	+2,285	+2,685
Sewerage infra (base)	-4,887	-3,966	-3,804
Sewerage infra (enhancement)	-307	-180	-198
Sewerage non-infra (base)	+5,194	+4,146	+4,002

These net to zero in each year and in each service area.

NI Water has also adjusted their view of the SBP Projections by moving the assumed expenditure on Sewage Pumping Stations from infrastructure to non-infrastructure to accord with the reporting guidelines as follows:-

Expenditure Category (£k in 06/07 prices)	2007/08	2008/09	2009/10
Sewerage infra (base)	-3557	-3626	-3982
Sewerage non-infra (base)	+3557	+3626	+3982

However, neither of these adjustments has been made to derive the SBP Projections in Tables 35a and 36a.

4.2 Indexation

NI Water has indexed the SBP projections from the 2006/07 base year using the inflation assumption used at that time. These are:

- For COPI: 5.38% for 2007/08 and 2.50% for 2008/09 and beyond, aggregating to an inflation multiplier of 1.08015 for 2008/09.
- For RPI: there is no reported Determination information for opex, so indexation is not required. However 2.50% per annum was assumed in the SBP for opex.
- In reconciling the information supporting the SBP to the figures that were finally agreed with DRD, NI Water has found it necessary to use a hybrid inflation rate for the M&G programme cost assumptions. These equate to 3.71% for 2007/08 and approximately 2.50% beyond.

If these tables are endeavouring to identify the differences between the SBP investment assumptions and the actual expenditure due to causes within management control, it would seem more suitable to use actual RPI and COPI inflation so as to eliminate the prevailing (rather than as forecast) external economic factors. Thus, we believe actual RPI and COPI should be used and this would be consistent with the interpretation in England and Wales, where the indexation figures to use are provided by Ofwat.

4.3 Expenditure comparisons

As noted by NI Water in their commentary, there are significant differences between the proportional allocation assumptions made in the SBP (which tended to be poorly informed at project level and generic at programme level as well as financially influenced) and those now being applied using the developing CIDA methodology.

Additionally, as discussed in Table 35, the Company had applied a rigorous challenge process to their Capital Works Programme projects, eliminating or reducing the unnecessary elements of the schemes, so as to ensure a more focussed delivery of the regulatory outputs and secure cost reductions. I believe that this is likely to influence the proportional allocation as it appears that the main elements being impacted will be base service (MNI). As the WWTW programme is the most significant, the influences of this process are likely to be greater in the sewerage service than the water service.

NI Water explain further significant anomalies between SBP and Table 35 assumptions relating to PPP Alpha.

We recommend that these re-allocations are identified and quantified as, if Tables 35a and 36a are to be of benefit in the future, appropriate and commensurate adjustments are required to ensure that assumptions underlying both the SBP Projections and the actual expenditures are aligned.

Thus, I believe that a comparison by purpose, at the high level that this table is intended to facilitate, would currently be generally inconclusive.

5. Audit Findings (Opex)

Line 1 – Base operating expenditure

The Company advised that the opex figures have not been reported for this line as the SBP did not separately identify base operating expenditure.

Line 7 - Opex – total quality enhancement programme

The Company advised that the opex figures have not been reported for this line as the SBP did not separately identify quality enhancement operating expenditure.

Line 9 – Additional operating expenditure – customer service

The Company advised that the opex figures have not been reported for this line as the SBP did not separately identify customer services enhancement operating expenditure.

Line 17 and Line 19 – total opex

It is not clear why the Company has not populated data for this line as this data should exist. We suggest that this data is populated for AIR10.

Date: 10 August 2009

Table 36 – Sewerage Service – Expenditure by purpose

Commentary by REPORTER

1. Background

This table disaggregates expenditure between purpose categories for the sewerage service, namely base, enhancements, grants and contributions and adopted assets. Enhancements are reported under quality, enhanced service levels, and supply/demand. The table also indirectly checks the Company's proportional allocation rules.

2. Key Findings

- Proportional allocation methodologies have been further developed and are consistent with the Reporting Requirements.
- Allocations have been substantially reviewed and corrections applied such that there is good alignment of the capital works programmes with allocation rules.
- Whilst other programmes remain consistent with SBP assumptions on allocation, they should be revisited for compliance with current requirements.
- The WWTW programme has been subject to significant change, through re-assessment of scope, re-prioritisation and re-programming. Whilst quality outputs are being met numerically, and investment is currently perceived to be beating the efficiency targets, it is not clear whether what is being delivered is fully comparable with the original expectations.
- We believe the regulatory process would benefit from a greater level of formality of outputs (sites, standards and dates) to allow a structured and more accurate assessment of progress in delivering the capital programmes to be made.
- Standard reconciliation checks with other table information proved satisfactory.

3. Audit Approach

A total of 10 SBP non-infrastructure projects were included 'Capex' audit programme which was conducted with the PC10 audits. These were weighted towards projects involving greater capital expenditure.

As the investment allocation system is still undergoing some development and as the requirements continue to bed in to the organisation, at year-end we undertook a review of the contents of the spreadsheet systems, which collate the expenditure information by project for the Report Year. During this review, the collation system is tested to ensure that the proportional allocations exposed in the scheme specific audits are correctly stated at the summary level for entry into the AIR Tables. We also overview the schemes

which contribute expenditure to each asset type, purpose and driver as a further high level check on the allocation methodologies.

The detailed level 'Capex' audits were followed up with a review of the contents of the spreadsheet systems, which access and collate the expenditure information by project for the Report Year. During this latter review, the collation system is tested to ensure that the proportional allocations exposed in the scheme specific audits are consistent with our expectations from the detailed Capex audits.

4. Audit Findings - Capex

4.1 Strategic Business Plan Assumptions

A summary table from the Strategic Business Plan is provided on page 17 of that document and reproduced in our Table 35a and 36a commentaries.

Financial information, particularly that relating to the capital programmes, was not prepared using the principles now required for regulatory reporting. Whilst some specific project requirements could be identified, many programmes of work and levels of investment were based upon experience and historic levels of expenditure. Few projects were well defined in terms of need, solution and very few had reached detailed design, specification and reliable costing stage. Thus, the allocations of investment assumed were done at relatively high level and based on judgement, with limited supporting information.

Partly to assist with the financing of the transformed enterprise and partly to recognise the legacy of under-investment that the new Go-Co was inheriting, the concept of 'backlog' was introduced and any related expenditure was considered as enhancement investment.

The SBP contained expenditure projections covering a 7-year period. The PC10 process has required the separation of that programme such that the projects which will be commenced prior to 1 April 2010 will form one programme, those commencing later are to be considered with other new obligations and priorities. Whilst it appears that NI Water is reasonably well on track with regard to outputs being delivered, there is less clarity over the related expenditure and whether this is delivering like-for-like programmes of work to those assumed in the SBP.

4.2 Proportional Allocation

Since April 2007, it is apparent that NI Water has been endeavouring to understand, develop, implement and improve their proportional allocation procedures. Much work has been done to review ongoing projects and to better allocate the investment to the appropriate QBEG purpose categories.
During the Report Year, an extensive review has been undertaken by external

consultants of 254 projects (62 water and 192 sewerage) which are either ongoing or commenced during the Report Year. We have reviewed the methodology and checked that it has been undertaken diligently, consistently and comprehensively and that appropriate quality assurance and sense-checking has taken place. We believe that the findings are of good quality and noted a few, minor, shortcomings.

Overall, the methodology involved training of the project engineers in allocation methodologies and their being involved in interviews with the external Consultants. We believe that this will have improved understanding and consistency of application. This improved understanding appears to have led to a significant shift in allocation from the more generic methodology adopted for the SBP.

We have reviewed, in some detail, a sample of projects of different type, covering all purpose categories and a wide variety of asset types. These are reported on in our PC10 commentaries.

The 'CIDA calculator' input processes, which the project engineers populate, was developed in 07/08 and has not been changed for 08/09. However, the output processes had to be completed manually and, for 08/09, NI Water had planned to have all these calculations automated. This was achieved for the sewerage sheet but not for the water sheet where a manual process had to be applied to 25 projects with a combined expenditure of £9.676m in 08/09.

The process by which the financial measures tables are populated needs to be simplified and the inclusions/exclusions assumed in each table need to be formalised to improve the transparency, and stability and repeatability of this information.

Whilst we have been able to follow the methodologies and processes used to collate and to split the financial information into the lines and columns required, and we confirm our reasonable comfort with these methodologies and the efforts made in 2008/09 to improve their implementation, it is difficult to drill back down through the numbers to identify the principal components and thereby enable focussed and appropriate scrutiny. Complexities are magnified by the independent sources of information (3 x PPP's which are each treated differently in different tables, EP, Operations, Asset Management Directorates).

Our random sample audits, which checked the consistency of CIDA with table 40 information, generally proved satisfactory but included one of these 25 projects. Although the project was small (circa £35k expenditure in 08/09) it indicated that the proportional allocation was significantly different. It is not known whether this discrepancy is repeated in the remaining projects. NI Water plans to complete the automation of this process in the current year.

External Review

The external review of proportional allocation assumptions covered some 50 projects and excluded those which had an obvious prime purpose (e.g. water mains for new development). Previously reported allocations have not been amended, so AIR08 information is unaffected.

Some 149 projects did not have proportional allocation completed. These have a total of £278k expenditure reported in the year which is less than 1% of Report Year spend. The allocation used for this sum was in proportion to the overall allocation for the whole programme.

Clearly, there are likely to be major differences between allocation methodology now used and the high level forecast allocation assumptions used in the Strategic Business Plan and these are likely to be a principal cause of the differences reported in tables 35A and 36A.

4.3 Year-end Capital Investment Reconciliations

For 2008/09, the year end reconciliation between Oracle and CAPTRAX was less than £100k (below the allocation threshold). NI Water demonstrated that the differences were due to rounding errors: CAPTRAX rounds down to the nearest £1,000. The reconciliation was absorbed into the CWP using the average QBEG split.

4.4 Capital Programmes

4.4.1 Drainage Area Studies

As the Drainage Area studies are completed, packages of work emerge and a datasheet for each package is produced which identifies the drivers. NI Water advises that Proportional Allocation is done for sewerage projects on the basis of the drivers using diameter and length. This allows different types of schemes (which would generally be below the £100k threshold) to be combined to provide a composite weighted proportional allocation for each package.

4.4.2 Wastewater Treatment Works Programme

Progress

We discussed the progress on the WWTW programme with NI Water.

There have been some changes to the programme of major significance in that all projects in the programme have been subject to the 'mProve' process which is designed to remove unnecessary elements of a project. NI Water advise that this has produced a 'quick-win' outcome of around of £20m.

Whilst there are some more extreme examples of changed solutions, eg installing a flow meter rather than he planned RBC at one site, other scope reductions are generally of a more peripheral nature (removing the requirement to upgrade the access road for

example) rather than impacting on the proposed quality improvements. NI Water confirmed that all solutions would have been subject to discussion with and approval of the quality regulator. The 'mProve' process also includes all the main directorates (Engineering Procurement, Asset Management/Compliance, Operations).

There have also been changes to the priorities established in support of the SBP as better information has been gleaned about the sites and external factors emerge (land, development, planning).

NI Water confirmed that the vast majority of Compliance dates will be achieved and that all have been achieved so far. However, some of their remaining projects now appear likely to miss the SBP deadlines and NI Water is discussing the necessary actions with NIEA.

Programme monitoring

We met with the NI Water Compliance manager to discuss the processes in place to monitor the output delivery of the SBP programme (the Capital Works Programme) for WWTW.

A spreadsheet was provided which contained a list of all WWTW projects over 250pe plus the small WWTW in the current programme; NIEA completion dates; revised dates; comments on delivery and Water Order Consent (WOC) dates. For information, NI Water advised that:

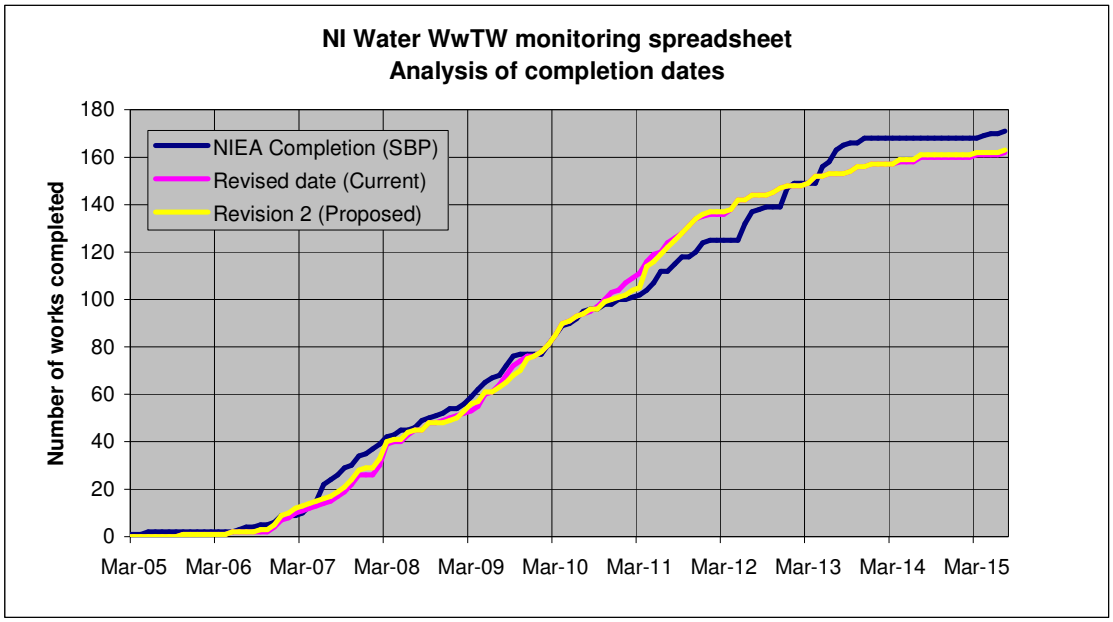
- when the Water Order consents were being formulated in 2006/07, NIEA were provided with the CWP for the SBP as it then stood. This included completion dates for each scheme but where there was a change in standard upon completion of a scheme, NIEA tended to give a 6 month "period of grace" between completion of the work and commencement of the new standard, to allow for performance and take-over testing. These are the dates to which NIEA signed up.
- NIEA have not signed up to the revised dates but have been made aware of the potential delays in a number of schemes.
- The first meeting of a WWTW/UPM monitoring group involving NIIEA and NIW is scheduled for 21st August. Through this forum progress on the CWP, including delays, will be discussed and appropriate action agreed.

The information represents the position at end December 2008, ie Compliance year-end. Further updates have been done, but these are not relevant to the 2008/09 Report Year. An analysis of the spreadsheet showed:

- 182 WWTW projects are listed.
- 20 projects are small WWTW not on the CWP.
- 56 projects (of which 5 are small WWTW) have WOCs.

- 7 projects (of which 4 are small works) have a revised completion date which is later than the WOC date.
- 6 projects cite the "mProve" process as being influential in changing the output/solution/date, generally deferring it.
- 7 projects indicate that an interim solution has been or is being implemented for various reasons.
- 1 project (Hillsborough WWTW) is noted as being related to the Maze development which is under re-consideration.
- 1 project (a small WWTW) has been rejected by CIPP due to the proposed solution being outside acceptable cost thresholds.

On the basis of this information, we have undertaken a simple outputs analysis of the changes to the programme over time. The results are provided below. The analysis indicates that, at March 2009, the SBP anticipated 59 WWTW completions and that 56 appear to have been achieved. Whilst there are some minor inconsistencies in this analysis, it does indicate that the programme appears generally on track in terms of outputs. What is not evident in this analysis is the degree to which the anticipated investment profile has been affected by the programme manipulations, i.e. whether larger, more complex and more expensive outputs have moved backwards or forwards in time, whilst less expensive outputs have moved to maintain the output delivery targets, or indeed, whether these adjustments have retained the investment profile in balance.



At the beginning of the SBP process, NIEA needed to consider a range of environmental drivers together with concerns over works capacity and existing poor compliance issues. A scoring matrix was devised to determine the sites with the greatest priority to be

included in the 7-year SBP period (1/4/2007 to 31/3/2014). To convert this into a programme of works which could be considered, optioneered, designed, constructed and commissioned, the Engineering Procurement Directorate (EP) considered the complexities and timescales at each works and smoothed the overall programme to match funding constraints and deliverability expectations. This yielded a preliminary schedule of outputs which was agreed with NIEA and forms the baseline for ongoing discussion as site specific issues and events arise as they work through the schedule.

NI Water and NIEA hold quarterly meetings to discuss progress and to identify and resolve issues arising. These may require the amendment of delivery dates. Other specific sites (or cluster of sites) are discussed on an ad hoc basis, e.g. Portavogie - which is affected by land availability issues and this delay affords NI Water more time to develop and deliver a full rather than interim solution, but defers delivery from August 2009 (the date of the Water Order Consent) to July 2014.

Other principal CWP programmes were discussed, but in less detail.

Small WWTW programme

The list of small Wastewater Treatment Works is discussed with NIEA annually and the scope of 'Appropriate Treatment' is agreed. Solutions are mainly generic, often RBC's scaled to the most appropriate size for the works.

EP manages the delivery of the capital works programme and advises the Compliance Manager when a project is complete. NIEA is then informed of the beneficial use date of the works. Whilst a formal notification procedure is in place, we understand that NI Water and NIEA are currently looking to improve this process and in particular we would wish to see a formal "sign-off" by the NIEA to confirm that the funded output has been delivered and the new consent standards will then be used to determine compliance.

4.4.4 Sewerage Infrastructure

For sewerage infrastructure, NI Water discuss progress of the Drainage Area Plans at quarterly meetings with NIEA. The priorities identified for the Drainage Areas are agreed with NIEA from which the packages of work in the programmes are identified.

The definition of work on sewerage infrastructure in the SBP was lacking in detail and was more of an allowance, based on recent levels of expenditure. Thus, schemes are continually developing and being added to the CWP to address unsatisfactory CSO's and sewer flooding issues in particular.

Again, we believe and recommend that it would be advantageous to improve the recording and formalisation of meetings with NIEA, particularly in relation to documenting their assent to the adding of new projects, the expected outputs or outcomes, the timescales for delivery and confirmation that the project has been delivered.

4.4.5 Sewage sludge

Sewage sludge is disposed of to the Glen incinerator, a PPP project which is still subject to trials and cannot as yet accept all NI Water's sludge volumes. Northern Ireland is designated a Nitrate Vulnerable Zone and these sludges cannot be disposed of to land.

We understand that there are no formalised requirements of outputs or delivery dates in the SBP, but NI Water are concerned to ensure that the Glen PPP is available as soon as possible as all surplus sludge production is having to be exported at greater cost than is desirable.

4.4.6 Programme reconciliation

The Head of CIPP is currently producing a document which endeavours to reconcile the capital programme outputs required in the SBP against those being delivered, and to account for the changes. This document, 'NI Water Strategic Business Plan 2007/08 - 2009/10 Delivery Assurance' is work in progress and is expected to be available shortly. This will help greatly with understanding the progress that is really being achieved in both output and investment terms, which we consider to be a necessity for progress monitoring as, without it, the picture appears confused and unclear.

4.5 PPP

As reported by NI Water, table 36 contains no capex related to the PPP Omega or PPP Kinnegar schemes. We recommend that NI Water and NIAUR consider that, to avoid the confusion that exists between how investments in PPP Alpha is treated in the water service and how sewerage PPPs are treated, PPP expenditure has fully separate and perhaps simplified reporting streams, with no combined regulatory reporting tables.

4.6 Operational Capital (including M&G)

Operations Capital (including M&G projects) is now subject to similar procedures as the Capital Works Programme. Project engineers provide the initial QBEG allocations (for Tables 35 and 36) and the investment splits into asset type (for Table 32) and asset life categories (for Table 34 - and Table 33).

Most Operational capital will relate to base maintenance, or to new development or security of supply. Rarely does a quality driver apply, although there has been some modest expenditure on customer-driven lead supply pipe replacements (circa £150k).
The investment analysis forms are submitted to NI Water's Finance and Regulation section for review. These are particularly challenged when there is spend against Q, E and G purpose categories. Allocations are adjusted with the approval of the project manager, this appears to have resulted in an underlying trend of movements from the Q and E purpose categories to B, base service.

Also the costs associated with the transition to the new Mobile Work Management system has been classed as an enhancement.

4.7 New Outputs/Obligations (line 16)

NI Water has reported no new outputs/obligations to date.

5. Grants and Contributions (lines 4, 19)

In accordance with the assumptions made in the SBP, NI Water assumes that all grants and contributions would relate to enhancements. Therefore zero receipts are reported against maintenance non-infrastructure (line 4). Lines 3 and 5 are therefore identical. We believe this to be reasonable.

NI Water confirms the analysis of enhancement requisitions, grants and contributions in their commentaries.

6. Infrastructure Charge Receipts (line 18)

The SBP forecasts have proven to be significantly optimistic (even allowing for the unexpected recession) and NI Water's current projections and annual budgets are considerably lower. The recession has further exacerbated the situation, badly slowing development and their infrastructure charge receipts for both water and sewerage.

As assumed in their SBP, NI Water consider all Infrastructure charge receipts (ICR's) to relate to enhancements (and thus there is no difference between IRE net and IRE gross). Further, the Company used the SBP investment projections on growth to determine the components of the ICR's which would be allocated to either infrastructure or to non-infrastructure. For 2007/08, 41.09% of ICR's was allocated to non-infrastructure; for 2008/09 it is 47.26%. The SBP only identified the infrastructure element of these receipts, so for consistency NI Water has reported ICR's in this table on the same basis.

All receipts are for domestic customers and charges are assumed to be phased in as follows:

2007/08	33% charge	67% subsidy
2008/09	67% charge	33% subsidy
2009/10	100% charge	-

The non-infrastructure element of the ICR's is assigned an asset life of 30 years and released over that period into the P&L account.

ICR's are received by customer services and coded into the Oracle accounting systems. For year-end reporting, an Oracle report is accessed showing the receipts against the relevant codes, different codes for water and sewerage and for charges and subsidy components. We have reviewed the spreadsheets used to calculate the full ICR's for water and sewerage, then to calculate the infrastructure and non-infrastructure components using the percentage apportionments above. The infrastructure element is

entered into the table.

We confirm that the table entry is consistent with the calculations reviewed. However, we note that for 2008/09, the charge component is approx 62.5% of the total rather than 2/3, but that it was greater than 1/3 in 2007/08. We assume that the proportions will be corrected overall in 2009/10.

7. Assets adopted or acquired at nil cost (line 20)

NIW's Tactical Asset Management section (within the Operations Directorate) receives applications under Article 161 from developers requesting the adoption of sewerage assets: sewers; and sewerage pumping stations.

The TAM team survey the assets, checking for compliance against the required standards set out in the current edition of 'Sewers for Adoption'. Upon acceptance, sewers are adopted at nil cost but added to the asset register at a cost which is determined by the diameter and the length, using cost curves developed from NI Water's own historic costs. NI Water advised that the cost curves are consistent with those used for the development of the SBP. We have not confirmed this. The costs are inflated by RPI to provide the relevant Report Year prices.

In 2008/09, and as is evident in Table 36, there has been a major clearance of a backlog of sewage pumping station adoptions. The reported information includes:

£ 14.833m of sewer adoptions
£ 3.951m of adoptions associated with SPSs (approx 60 Nr)
£ 0.500m of land at a STW
£ 19.284m

The adopted assets are analysed by type, the proportion of spend by assert type being assigned to an Oracle asset reference code. The coding references to an appropriate asset life and uploads the asset additions to the Corporate Asset Register.

8. Opex

The starting point for data in this table is table 22 total operating expenditure levels. Incremental Opex that is associated with enhancement projects from prior years is then assessed and removed from the total Opex reported in table 22. The residual is considered to be base operating expenditure. Enhancement additional operating cost can result from three primary sources:

- Wastewater Operations
- Water Operations
- Customer Services

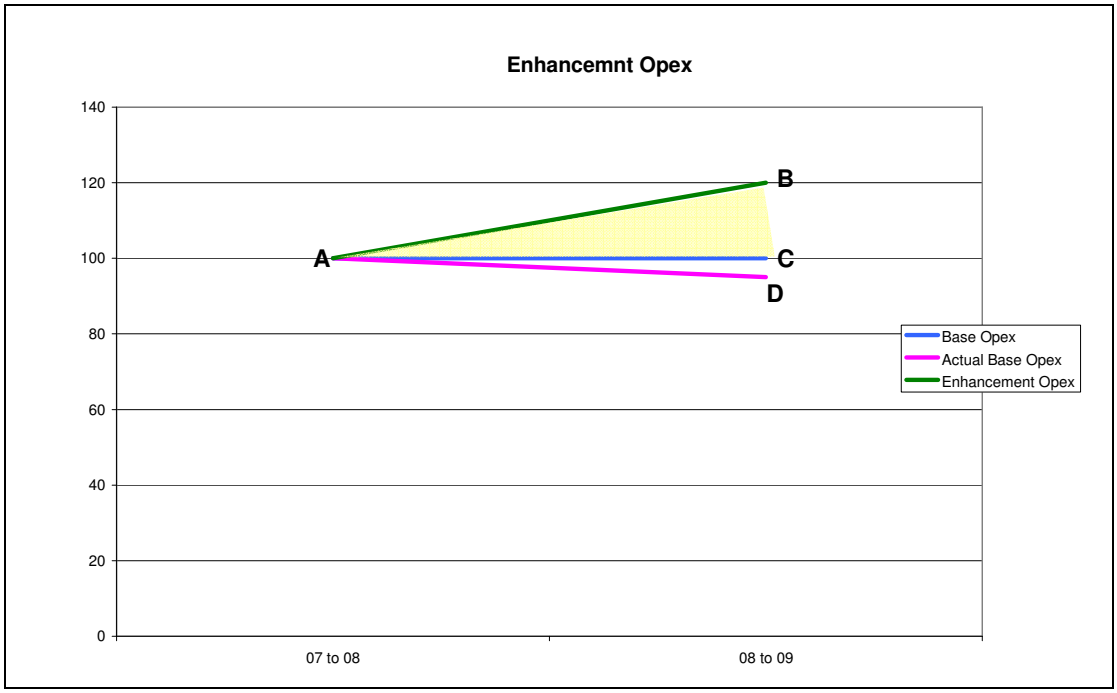
The Company advised that incremental opex has been calculated directly from the accounting general ledger. It advised that it considered those sites that had become active during 2007/08. It then undertook a comparison of data on a site by site basis related to pre and post Capex investment. It then adjusted for inflationary impacts.

Although the process relies substantially on manual assessment we believe that it is capable of reporting incremental opex that is reflective of the actual additional opex due to capex incurred in the year.

We challenged the Company whether it has data on a site by site basis for all sites. The Company advised that this information exists for large sites in the form of a location code. The Company advised that out of a total of 1100 works, 100 have their own location codes. It advised that for the smaller sites it relies on the operations team to advise of specific schemes that are being commissioned or upgraded. It then determines the associated power costs for these schemes which are reported as an Opex cost. This process will not fully capture all enhancement opex costs. However, the Company feels that it will capture the majority of such Opex costs.

Once the total additional opex per site is obtained the Company applies a split between the different lines based on the CIDA split. Note it applies the entire CIDA split to enhancement. The base portion of any CIDA split is apportionment across the enhancement categories based on the non-base aspect of the CIDA split.

We challenged the Company in relation to why it assigns all expenditure to enhancement, even though the CIDA split suggests an element of the Capex will relate to base. The Company advised that the additional split is necessary enhancement split, as any base replacement will not result in additional Opex. In addition the Company advised that it is likely that the enhancement aspect is being under reported as it does not account for efficiencies. This is illustrated in the chart below:



In the above chart, the Company approach compares base over a period, before and after enhancement. In general this is likely to be a comparison over two years of the project. Base is shown by the line AC. This assumes base expenditure remains static between the two years. The increase in opex, from A to B represents the additional opex due to enhancement expenditure. The amount of enhancement expenditure reported is therefore ABC. In reality however, the level of base opex is likely to reduce due to efficiencies. Hence base opex may reduce from A to D between two periods. The correct level of enhancement expenditure would therefore be ABD, rather than ABC. Reporting enhancement expenditure as ABC will therefore understate the amount of actual enhancement expenditure and overstate base expenditure.

We would not expect efficiencies in any year to exceed 5%, and this is likely to be top end estimate. This could mean that 5% of the base opex in any year with enhancement associated with it could in theory be enhancement expenditure. For the reasons above we would not expect this figure to be material.

The approach for apportionment relies on projected expenditure versus actual expenditure. We believe that the approach could benefit from a comparison of actual splits compared with projected splits. This loop would also be beneficial to the Company in terms of providing feedback on allocation splits

We believe the Company approach is a substantial improvement of AIR08. We will review the application of the approach on a sample basis in AIR09.

The Company has advised that for ten small WwTWs, it does not have individual representation on the General ledger. In order to obtain additional operating

expenditure due to new capex schemes it benchmarked against similar existing sites and identified power costs as the main expenditure at each of these sites. It then used the power costs for these sites. In addition the Company has advised than an improvement this year has been the identification of new pumping stations. However new pumping Stations cannot be identified individually in the General Ledger and where possible the same methodology as the small WwTWs has been used.

8.1 Line commentaries

Line 1 – Base operating expenditure

The value is derived as the balancing residual after specifically allocated operating expenditure is deducted from the total operating expenditure as reviewed by the Auditors. We confirm on the basis of data received by us at the time of audit that the total operating expenditure figure in Line 24 of this table is consistent with that contained in Table 21 Line 22.

We have made comments in variations in our commentary to tables 21 and 22 for AIR09.

Line 8 – Opex: Total quality enhancement programme

There has been a substantial amount of additional Operating expenditure income related to quality enhancements. This is in the region of £1 million. The Company advised that this relates largely to backlog base. Further information is provided in our commentary to table 38.

Line 10 – Additional operating expenditure – customer service

There has been an additional £44,000 worth of expenditure allocated to customer services for the current year. The Company advised that this relates to backlog base related to sewage treatment works.

Line 15 – Additional operating expenditure – Supply Demand Balance

The Company has reported an overall reduction in operating expenditure of £100,000. The Company advised that this is likely to be due to a change in the QBEG allocations as the QBEG allocations for AIR08 were incorrect. This resulted in an over allocation of expenditure to growth and an under allocation of expenditure to quality.

Line 17 – Additional operating expenditure – New Outputs, Obligations

The Company has reported £0 in this line.

9. Confidence Grades

Capex and opex totals reconciles very closely with that reported from Oracle.

NI Water has assigned confidence grades of B2 for most capex lines. The confidence grades placed on the investment lines are therefore substantially dependent upon the QBEG analysis that is undertaken. The Company has undertaken a substantial review of their proportional allocation assumptions at project level. Further training, dissemination of the reporting requirements and greater familiarity with the systems and rules have enhanced confidence greatly. Any material concerns remaining seem likely to relate to differences of opinion over interpretation of the rules or perhaps alternate subjective assessments of allocations on larger schemes. The former will take time to identify, agree and formalise and the latter is likely to continue to occur. We therefore consider that a B3 for capex is now a generally valid confidence grade.

Base opex is supported by well tried and tested processes which have been subject to considerable scrutiny for some years. We would therefore have anticipated a better confidence grade than B4, perhaps B2, but our familiarity with the processes and the methodologies employed to convert Base opex into information compliant with the reporting requirements is lacking depth in this, our first year of appointment, so we are content to defer to the Company's assessment. We concur with B4 for enhancement opex lines.

Information relating to infrastructure charge receipts, grants, contributions and adopted assets appears to be well founded, with stable and appropriate methodologies and assumptions. We concur with the A2 confidence grades assigned.

10. Reconciliations

We confirm the following consistencies:

Capex

- Table 36(incl. PPP)/3 = Table 32(Total)/33/6
- Table 36(incl. PPP)/22 = Table 32(Total)/32/4
- Table 36(incl. PPP)/23 = Table 32(Total)/17/6 + 32/33/6
- Table 36(incl. PPP)/7 = Table 38/29

Opex

- Table 36(incl. PPP)/8 = Table 38/30
- Table 36(incl. PPP)/21 = Table 22(Total)/21

Date: 10 August 2009

Table 36a – Sewerage service – Expenditure comparisons by purpose

Commentary by Reporter

1. Background

This Table facilitates capital and operating expenditure comparisons between company report year actual figures and those contained in the Strategic Business Plan (SBP).

2. Key Findings

- Opex information has not been completed in this table due to there being no comparative analysis available from the SBP.
- The SBP Projections have had to be re-worked back into the capex categories due to the top-down adjustments made to the final case.
- SBP inflation assumptions have been used to generate the report year expenditure projections for comparison with actuals. We believe that unless and until a more appropriate index is accepted, actual COPI should be used as otherwise the effects of inflation/recession (which were not anticipated when the SBP was produced) may be an influential cause of variance.
- The SBP allocation assumptions between the purpose categories analysed in this table were significantly different from those now being developed and utilised by NI Water. We believe that this, and other impacts, will materially affect the allocations and render any comparisons inconclusive.

3. Audit Approach

The audit consisted of interviews with the NI Water's table author and a review of relevant supporting documentation, the methodology, assumptions and data used to compile the table. The audit also included a review of the Company's commentary.

4. Audit Findings (capex)

4.1 SBP Projections

NI Water has provided a spreadsheet, based upon information supporting the SBP, and which reconciles to the total capital expenditure profile given in the SBP (as reproduced below).

Copied from NIWL Strategic Business Plan (page 17)								
NIWL Capital Expenditure DRD Final Sustainable Case (post efficiency)								
	2007/08	2008/09	2009/10	2010/11	2011/12	2012/13	2013/14	Total
CWP	229,976	211,120	225,793	212,147	201,639	184,407	170,806	**1,435,888**
E&P Capitalised Salaries and Overheads	5,479	4,973	3,640	3,704	3,769	3,836	3,903	**29,304**
SWwTW's	-	5,401	5,536	5,674	5,816	5,962	6,111	**34,500**
Capital Contributions	-10,055	-9,936	-10,480	-11,413	-11,265	-11,547	-11,836	**-76,532**
Technology Programme	11,092	12,639	7,856	-	-	-	-	**31,587**
Connections	2,344	2,250	2,087	2,124	2,161	2,199	2,238	**15,403**
Accommodation	-	-	-	-	-	-	-	
Asset Management - NIAMP3	2,303	2,861	1,939	-	-	-	-	**7,103**
ICT	2,162	930	863	806	820	834	849	**7,264**
Metering	4,808	6,131	2,175	2,457	2,501	2,545	2,589	**23,206**
Customer Billing	553	102	95	501	98	100	528	**1,977**
Other	24,372	19,081	13,233	9,808	10,094	10,493	11,589	**98,670**
Total Post Eff. Nominal	**273,034**	**255,552**	**252,737**	**225,808**	**215,633**	**198,829**	**186,777**	**1,608,370**
	Note that totals above do not fully match the SBP due to rounding.							

In order to report against the lines and tables in the AIR, NI Water has needed to recast the SBP supporting information and make some corrections/adjustments to align the SBP figures with the investment streams reported in Tables 35 and 36 and thus to produce the 'SBP Projections' given in columns 1 and 2 of Tables 35a and 36a.

With NI Water assistance, we were able to reconcile the totals and a sample of the SBP Projection figures back to the SBP extract above. We recommend that this reconciliation is formalised and discussed/agreed with the Utility Regulator such that the UR take ownership and control of these regulatory expectations.

NI Water advised that, following the acceptance of the SBP (from which the above data is copied) the DRD adjusted the funding allowances assumed for the Capital Works Programme (CWP) between expenditure categories, as follows:

Expenditure category (£k in 06/07 prices)	2007/08	2008/09	2009/10
Water infra (base)	-2,708	-2,184	-2,626
Water infra (enhancement)	-3	-101	-59
Water non-infra (base)	+2,711	+2,285	+2,685
Sewerage infra (base)	-4,887	-3,966	-3,804
Sewerage infra (enhancement)	-307	-180	-198
Sewerage non-infra (base)	+5,194	+4,146	+4,002

These net to zero in each year and in each service area.

NI Water has also adjusted their view of the SBP Projections by moving the assumed expenditure on Sewage Pumping Stations from infrastructure to non-infrastructure to accord with the reporting guidelines as follows:-

Expenditure Category (£k in 06/07 prices)	2007/08	2008/09	2009/10
Sewerage infra (base)	-3557	-3626	-3982
Sewerage non-infra (base)	+3557	+3626	+3982

However, neither of these adjustments has been made to derive the SBP Projections in Tables 35a and 36a.

4.2 Indexation

NI Water has indexed the SBP projections from the 2006/07 base year using the inflation assumption used at that time. These are:

- For COPI: 5.38% for 2007/08 and 2.50% for 2008/09 and beyond, aggregating to an inflation multiplier of 1.08015 for 2008/09.
- For RPI: there is no reported Determination information for opex, so indexation is not required. However 2.50% per annum was assumed in the SBP for opex.
- In reconciling the information supporting the SBP to the figures that were finally agreed with DRD, NI Water has found it necessary to use a hybrid inflation rate for the M&G programme cost assumptions. These equate to 3.71% for 2007/08 and approximately 2.50% beyond.

If these tables are endeavouring to identify the differences between the SBP investment assumptions and the actual expenditure due to causes within management control, it would seem more suitable to use actual RPI and COPI inflation so as to eliminate the prevailing (rather than as forecast) external economic factors. Thus, we believe actual RPI and COPI should be used and this would be consistent with the interpretation in England and Wales, where the indexation figures to use are provided by Ofwat.

4.3 Expenditure comparisons

As noted by NI Water in their commentary, there are significant differences between the proportional allocation assumptions made in the SBP (which tended to be poorly informed at project level and generic at programme level as well as financially influenced) and those now being applied using the developing CIDA methodology.

Additionally, as discussed in Table 35, the Company had applied a rigorous challenge process to their Capital Works Programme projects, eliminating or reducing the unnecessary elements of the schemes, so as to ensure a more focussed delivery of the regulatory outputs and secure cost reductions. I believe that this is likely to influence the proportional allocation as it appears that the main elements being impacted will be base service (MNI). As the WWTW programme is the most significant, the influences of this process are likely to be greater in the sewerage service than the water service.

NI Water also comments on a number of other fundamental adjustments to the allocation of expenditure which has not been reflected in the SBP Projections. We

recommend that all these re-allocations are identified and quantified as, if Tables 35a and 36a are to be of benefit in the future, appropriate and commensurate adjustments are required to ensure that assumptions underlying both the SBP Projections and the actual expenditures are aligned.

Thus, I believe that a comparison by purpose, at the high level that this table is intended to facilitate, would currently be generally inconclusive.

5. Audit Findings (opex)

Line 1 – Base operating expenditure

The Company advised that the opex figures have not been reported for this line as the SBP did not separately identify base operating expenditure.

Line 7 - Opex – total quality enhancement programme

The Company advised that the opex figures have not been reported for this line as the SBP did not separately identify quality enhancement operating expenditure.

Line 9 – additional operating expenditure – customer services

The Company advised that the opex figures have not been reported for this line as the SBP did not separately identify customer services enhancement operating expenditure.

Line 15 and Line 17 – total opex

It is not clear why the Company has not populated data for this line as this data should exist. We suggest that this data is populated for AIR10.

Date: 10 August 2009

Table 37 – Water Compliance – Expenditure Report

Commentary by REPORTER

1. Background

The information in this table will be used to assess the overall cost of meeting compliance with specific parameters, and compare relative company efficiencies at meeting the required quality standards.

2. Key Issues

- The Company's allocation methodologies correctly report relevant capital expenditure from Captrax to their CIDA spreadsheets.
- NI Water has two outstanding SBP drinking water programme outputs that were agreed with the DWI – Clay Lake WTW and Seagahan WTW, and progress is broadly in line with the DWI's expectations. We found that Clay Lake WTW was completed in July 2008 (one month ahead of programme), and Seagahan is due for completion in December 2009 (one month late).
- The approach adopted by NI Water to assess QBEG for the water main rehabilitation programme, was found to be systematic, robust and appropriate.
- The Company replaced 521km of main during the year at a unit cost of £101/m.
- In recognition of possible errors in the allocation of costs, we recommend a confidence grade of B3 for all capital costs.

3. Audit Approach

As part of our review of NI Water's PC10 submission, we completed a number of detailed reviews of a number of SBP schemes with some carry over expenditure into the PC10 period. Of the SBP schemes reviewed, two schemes were water related - Carmoney WTW and Lough Bradan WTW.

At year-end we undertook a review of the contents of the Capital Investment Driver Allocation (CIDA) spreadsheet systems, which access and collate the expenditure information by project for the Report Year. During this review, we tested the collation system to ensure that the proportional allocations exposed in the scheme specific audits are correctly stated at the summary level for entry into the AIR Tables.

We also met with the system holder to confirm the reported data for each line and review progress against the various programmes.

The opex audit reviewed the methodology used by NI Water to calculate the entries for this table, the procedures supporting the systems and the internal procedures in place to eliminate errors. The entries for each line were tracked and compared to recent and historic trends.

4. Audit Findings

4.1 Capital Expenditure

4.1.1 General

Our audits and reviews this year confirm that the Company's processes for proportional allocation of expenditure in the water related capital programme are broadly satisfactory and are consistent with allocations applied to PC10 programme.

Detailed in the table below is a summary of the water related SBP carry over schemes we reviewed as a part of the PC10 process. For AIR09, we were able to confirm that the Company's allocation methodologies correctly report relevant capital expenditure from Captrax to their CIDA spreadsheets.

				CIDA QBEG Allocation				PC10 QBEG Allocation				
Project Reference	PC10 Carryover Projects Project Name	LBE £k	Spend in year £k	Q %	B %	E %	G %	Q %	B %	E %	G %	Reporter Assessment
JL723	Carmoney WTW	4,677	47	32%	68%	0%	0%	32%	68%	0%	0%	✓
JN390	Lough Bradan WTW	4,710	57	51%	49%	0%	0%	51%	49%	0%	0%	✓

We provide further detail on the Company's approach to QBEG proportional allocation within our commentary to Table 35.

We established that at the beginning of 2008/09, NI Water had two outstanding SBP drinking water programme outputs that were agreed with the DWI – Clay Lake WTW and Seagahan WTW, and progress is broadly in line with the DWIs expectations. We found that Clay Lake WTW was completed in July 2008 (one month ahead of programme), and Seagahan is due for completion in December 2009 (one month late).

We recommend that NI Water consider reviewing the structure of the CIDA spreadsheet to improve the transparency of the overall capital programme and the allocation methodology and enable easier analysis of expenditure information.

4.1.2 Obligations prior to the SBP

NI Water has not recorded any carry over expenditure in Line 1, as the SBP represents the first specifically defined and funded capital programme delivered by NI Water.

However, our review of CIDA confirmed expenditure during the year against a number of projects that were initiated by the Water Service, prior to SBP. As such you could argue that spend incurred during the year against these pre-SBP schemes could be included in Line 1.

4.1.3 Water Treatment

As highlighted in Section 4.1.1 above, NI Water have a relatively small water treatment programme for SBP, with only £4.36m expenditure incurred during the year.

Spend against the Pesticide driver (Line 4) - circa £4k, relates to early investigation work undertaken for the PC10 Carry over scheme – Carmoney WTW. We reviewed this scheme as part of our review of NI Water's PC10 proposals, and found the scheme to be well justified and appropriately scoped, costed and allocated.

For Line 5 – Cryptosporidium, NI Water has recorded £84k expenditure against five separate schemes for AIR09; including Clay Lake WTW (£64k), Lough Bradan (£9.7k), Carmoney WTW (£3.76k), Forfanney WTW (£0.05k) and Lough Ross/Curran Hill WTW (£5.5k).

Clay Lake WTW is an SBP scheme that was substantially completed during the year. However, we found that the membrane filter based solution delivered for Clay Lake in the SBP has subsequently failed and has therefore been included in the PC10 programme for further improvement work. Going forward, it is important that the regulatory treatment of issues such as these, needs to be made clearer.

Carmoney and Lough Bradan are PC10 carry over schemes in the early stages of delivery, whilst Fofanny and Lough Ross/Curran Hill are Water Service 'pre-SBP' schemes. As suggested in Section 4.1.2 above, this expenditure could reasonably be reported in Line 1 – Obligations prior to SBP.

Significant spend has been recorded against Line 7 – Other Parameters, with £2.85m incurred on Seagahan WTW (JFF63), which we expected, given its pending completion date. Within this driver category, NI Water has separately recorded expenditure against THM organics removal (£515k) and Manganese removal (£572k) with the balance against Other Parameters (which includes Seagahan). Our review of 'Other Parameters' identified a separate project THM Reduction (JS250) - £77k. We queried why this scheme was not included in the THM Removal sub-category and found the scheme related to the upgrade of chlorine monitoring equipment at a number of service reservoirs, and wasn't directly related to THM removal, but more of an enabling project.

4.1.4 Water Distribution

NI Water has reported a nominal expenditure (£4k) against the Kellyhevlin to Lough Bradan Link Main (JL713) in Line 9 – S19 Undertakings. We queried the nature of this undertaking, and the Company advised that although the scheme was not specifically identified by the DWI as a S19 Undertaking, it fell out of the overall Water Resources Strategy that was agreed with the DWI. As expenditure is trivial, we have not pursued this further.

Over the three years of the SBP, NI Water forecast the rehabilitation of 910km of water main, through its Mains Rehabilitation Programme, which equates to circa 303km/year. For AIR09, NI Water delivered 521km during the year and has delivered 848 km in the first two years of the SBP (some 40% higher than forecast for Years 1 and 2 of the SBP). Whilst the lengths delivered to date include new and replacement mains as well as rehabilitation, we consider NI Water will outperform the SBP forecast.

In order to determine distribution expenditure allocated to quality (Line 10), NI Water has undertaken a systematic review of all projects included in the Mains Rehabilitation Programme (MRP) for the year, and assessed QBEG on a project by project basis. These estimates were then applied to the yearly expenditure incurred at each scheme to assess total Q expenditure for that particular scheme.

We reviewed the analysis undertaken by NI Water to assess QBEG and found the systematic approach adopted to be both robust and appropriate and in contrast to the high level assessments undertaken at other E&W companies. For 2008/09, the QBEG for the mains rehabilitation programme averaged out as follows:

Q	B	E	G
26%	54%	0%	20%

For AIR09, NI Water has allocated £10.525m to Q (Line 10), which infers programme expenditure for 2008/09 of £40.48m (when based on the above QBEG split). However, our review of CIDA confirmed a total spend of £52.742m reported for the year, which would suggest an allocation to Q of £13m. We were unable to fully resolve this discrepancy during our audit, however, we checked a number of schemes and can confirm the QBEG for those schemes was correctly applied. The variance could be explained by a skew towards the larger, higher value schemes.

Based on a total expenditure of [X] and the replacement of [X] of main during the year, a unit cost of [X] was achieved for the Report Year. When compared to the unit cost achieved for AIR08, as shown below, NI Water has reported a significant decrease in unit cost, which reflects the re-negotiation of contract rates for mains laying post SBP.

	07/08	08/09
Total expenditure (Outturn prices)	[X]	[X]
Length rehabilitated	[X]	[X]
Unit Cost	[X]	[X]
COPI adjusted (to 2008/09)	[X]	[X]

We note that NI Water appears to have a policy of mains replacement rather than a combination of replacement/relining and queried why relining (which should help to lower the overall unit cost of mains rehabilitation) has not been considered. The Company advised that this was not the case and that NI Water would consider spray lining for Q only schemes (such as Limafady DZ), however, the MRP to date, has tended to always include an element of upsize. We also found that there is a high incidence of small diameter mains in-situ (<90mm) within the MRP, and NI Water now enforce a policy minimum mains diameter of 125mm, which we consider to be reasonable. NI Water also believe that the cost of relining in NI is higher than mains replacement, due to the limited experience in spray lining in the province and the resultant lack of a local skill base. Furthermore, NI Water also has a policy of 100% mains replacement, and have cost effectively delivered a number of large quality mains rehabilitation programmes.

NI Water has reported zero spend on LDTMs during the year.

Expenditure relating to the replacement of Lead Communication Pipes (LCP) reported in Table 37 (£0.131m) primarily relates to the Belfast Area Lead Pipe Replacement Project – CM000121. We queried why NI Water were delivering a specific LCP replacement project, when it is Company policy to engage in opportunistic replacement only. The Company advised that the scheme in question is an 'Operations' project that has been driven by customer requests.

4.1.5 Security related measures

Expenditure to date on security related measures reflects progress towards compliance with Advice Note 8 of the SEMD for Service Reservoirs.

4.1.6 Environmental Programme

We confirm that expenditure recorded on line 16 relates to investigations undertaken for the Strule Inlet for Derg WTW.

4.1.7 Capex Totals

The total Capex recorded for the Report Year concurs with that audited and was traced back to CIDA.

4.2 Operating Expenditure

The Company advised that incremental opex has been calculated directly from the accounting general ledger. It advised that it considered those sites that had become active during 2007/08. It then undertook a comparison of data on a site by site basis related to pre and post Capex investment. It then adjusted for inflationary impacts.

Although the process relies substantially on manual assessment we believe that it is capable of reporting incremental opex that is reflective of the actual additional opex due to capex incurred in the year.

We note that data does not exist on a site by site basis for all sites. Where this is the case, additional analysis of costs is required.

The Company feels that it is now capturing fully the Opex impacts of Capex.

4.2.1 Obligations prior to the SBP

For the current year the increase in expenditure is £3,000. This is not material and is largely explained by inflation.

There is no other Opex included in any other line in table 37.

5. Confidence Grades

5.1 Capital Expenditure

Capital related expenditure is extracted directly from CIDA. We have undertaken a detailed review of the spreadsheets, which access and collate the expenditure information by project for the Report Year. As all data is derived from the same source, we believe the confidence grade should be consistent for all capex related lines. In recognition of possible errors in the allocation of costs, we recommend a confidence grade of B3 for all capital costs.

5.2 Operating Expenditure

The Company has reported a confidence grade of B4 for all opex related data, which is consistent with that reported previously.

6. Consistency Checks

We found that lines 7 of Table 35 are not consistent with lines 18 of Table 37. The variance relates to the exclusion of PPP – [X] expenditure [X] that was included in Table 35, but excluded from Table 37, as sufficient detail was not available, to enable the distribution of PPP expenditure across the various programme areas. Furthermore, the total expenditure reported in Line 18 of Table 37, excludes the £4k reported in Line 9, which is consistent with guidance for Table 37.

Line 8 of Table 35 is however consistent with Line 19 of Table 37.

Date: 10 August 2009

Table 38 – Sewerage Compliance – Expenditure Report

Commentary by REPORTER

1. Background

The information in this table will be used to assess the overall cost of meeting compliance with specific parameters under named directives, and to compare relative company efficiencies at meeting the required quality standards.

2. Key Findings

- Of the 17 WwTW outputs forecast for delivery during the Report Year, three were delivered ahead of programme, eight were delivered on schedule, whilst a further six schemes have had their completion date deferred.
- Whilst the QBEG analysis was generally consistent with the SBP, there were a number of instances where the QBEG was radically different, and one case where the scheme was not even identified on CIDA.
- The structure of the CIDA spreadsheet should be modified to improve the transparency of the overall capital programme and the allocation methodology and enable easy analysis of expenditure information.
- Our review of Table 38 information identified a number of cost allocation errors/discrepancies. As such we recommend a confidence grade of B4 for all capex related lines, rather than the B2 suggested by the Company.

3. Audit Approach

As part of our review of NI Water's PC10 submission, we completed a number of detailed reviews of SBP schemes with some carry over expenditure into the PC10 period. Of the SBP schemes reviewed, eight schemes were sewerage service related.

At year-end we undertook a review of the contents of the Capital Investment Driver Allocation (CIDA) spreadsheet systems, which collate the expenditure information by project for the Report Year. During this review, we tested the collation system to ensure that the proportional allocations exposed in the scheme specific audits are correctly stated at the summary level for entry into the AIR Tables.

We also met with the system holder to confirm the reported data for each line and review progress against the various programmes.

The opex audit reviewed the methodology used by NI Water to calculate the entries for this table, the procedures supporting the systems and the internal procedures in place to eliminate errors. The entries for each line were tracked and compared to recent and historic trends.

4. Audit Findings

4.1 Capital Expenditure

4.1.1 General

Our audits and reviews this year confirm that the Company's processes for proportional allocation of expenditure in the sewerage related capital programme are broadly satisfactory and are consistent with allocations applied to the PC10 programme.

Detailed in the table below is a summary of the sewerage service related SBP carry over schemes we reviewed as a part of the PC10 process. In our review of these schemes, we found that the Company had proposed cost effective solutions and the QBEG allocation was broadly appropriate.

For AIR09, we found that whilst the QBEG analysis was generally consistent with the PC10 allocation, there were a number of instances where the QBEG was radically different, and one case where the scheme was not even identified on CIDA.

				CIDA QBEG Allocation				PC10 QBEG Allocation				
Project Reference	PC10 Carryover Projects Project Name	LBE £k	Spend in year £k	Q %	B %	E %	G %	Q %	B %	E %	G %	Reporter Assessment
KS225	Ardglass WWTW	5,500	42	41%	15%	0%	44%	42%	16%	0%	42%	✓
KC299	Bushmills and Portballintrae	7,600	1,346	32%	15%	12%	41%	33%	14%	11%	42%	✓
KB284	Coagh WWTW	2,100	95	32%	9%	0%	59%	32%	10%	0%	58%	✓
KT102	Dunmurry WWTW	8,900	32	76%	17%	0%	7%	76%	0%	17%	7%	×
KR310	Newtownbreda WWTW	8,700	130	100%	0%	0%	0%	84%	3%	9%	4%	×
	Parkgate WWTW	800						0%	21%	0%	79%	×
KN533	Rousky WWTW	800	32	48%	5%	0%	47%	48%	4%	0%	48%	✓
KB436	Whitehead, Ballystrudder, etc	9,900	179	78%	10%	0%	12%	78%	10%	0%	12%	✓

We queried the above discrepancies and reviewed extracts from Captrax in order to determine the definitive QBEG allocation and found the following:

		Captrax QBEG Allocation			
Project Reference	PC10 Carryover Projects Project Name	Q %	B %	E %	G %
KT102	Dunmurry WWTW	76%	17%	0%	7%
KR310	Newtownbreda WWTW	100%	0%	0%	0%
KA164	Parkgate WWTW	0%	19%	0%	81%

We found that the QBEG for KR310 has not been updated for the current year on Captrax, which suggests the QBEG indicated in PC10 is probably a better reflection of current project status. For KT102, the PC10 QBEG appears to be incorrect, whilst the KA164 allocation is consistent with PC10. However, we were unable to ascertain why KA164 was not included on CIDA

We provide further detail on the Company's approach to QBEG proportional allocation within our commentary to Table 36.

4.1.2 Obligations prior to the SBP

NI Water has not reported expenditure against any pre-SBP obligations for AIR09.

Although we did not identify any specific examples of expenditure incurred during the year on projects initiated by the Water Service prior to the SBP, our findings for Table 37, suggest that a number of sewerage projects would also have been initiated by the Water Service, prior to SBP. As such, spend incurred during the year against these pre-SBP schemes could be included in Block A.

4.1.3 Intermittent Discharges

For 2008/09, NI Water has reported £40.378m expenditure on UID related outputs, summarised as follows:

- Sewerage Service - £37.072m
- WwTW - £0.087m
- Outfalls/Headworks - £0.026m
- WwPS - £3.193m

The majority of spend on UIDs reported during the year was incurred on UIDs associated with the Belfast Sewers Project (circa £33.3m). Although substantially complete, we reviewed this project for PC10 and for convenience, have re-stated our findings below:

The tunnel, that underpins the Belfast Sewers Project, is designed as a self cleaning conduit, with no storage. The terminal pumps are designed to keep the conduit flowing by gravity, i.e. it is not designed to run surcharged, nor to pick up any future connections.

The tunnel works are substantially complete and it is anticipated they will be fully completed by PC10 with no carryover costs. Final settlement of land and third party costs accrued for payment in PC10 is understood to be already funded. Subsequently the major risks associated with the tunnel boring have now been realised; problems encountered included the following:

Unforeseen Ground Conditions

- *The basic ground profile consists of boulder clay overlying sandstone. Within the clay it was found that two layers of larger than anticipated boulders were present slowing tunnel progress.*
- *The extent of contaminated ground at the old gas works site was much larger and more concentrated than anticipated, with carcinogens present, and even some contamination under the river section.*
- *Dolerite dykes (extremely hard) were encountered by the tunnelling machine*
- *Difficulty was encountered in dewatering the shafts to allow breakout of the tunnel portal. This resulted in delays as airlock systems and additional dewatering were required to enable breakout.*
- *[Note that the tunnel was designed to be mainly in the clay between the upper sleach, which has no cohesiveness, above the tunnel, and just above the hard sandstone below.]*
- *The Harbour Commissioners changed the requirements for the diffuser discharge structure which needed to be strengthened to allow for deepening of the Hertman channel*

The tunnel scheme, once complete, will pick up discharges from 10 UIDs and relieve foul water flooding in several areas and at many properties for storms up to a 1:30 year return period.

The construction programme is likely to run through to December 2009, marginally over its 36 month duration that was originally due to finish in August 2009.

The project has been carried out under NEC with about 200 early warnings, some already agreed as compensation events and some with ongoing negotiations. The Belfast Sewers project has had good cooperation from public bodies and residents groups as it is seen as needed for the greater good.

4.1.4 EU Directives

NI Water has agreed a relatively large SBP wastewater quality programme, whereby 75 WwTW improvements were forecast for delivery during the SBP.

We found that 17 of the 75 outputs were forecast for delivery during the Report Year. Of these, three were delivered ahead of programme, eight were delivered on schedule, whilst a further six schemes have had their completion date deferred. We queried the reasons for deferral of these schemes and have summarised the Company's responses below:

- Annahilt WwTW - the SBP spend profile shows some 15.5% of the total spend for this scheme allocated to 2009/10, hence NI Water consider the March 2009 compliance date to be optimistic. They consider the revised date of November 2009 to be more appropriate.

- Gilford WwTW - some additional work was undertaken at the existing settlement tanks and inlet pumps. The revised date (May 2009) is only 2 months from the SBP date and the current spend profile shows only 7% of the total spend in 2009/10, which is consistent with completion of the project.

- Magheralin WwTW - pump-away solution. The vast majority of the project was delivered within programme. Operational issues concerning infiltration in the existing network plus resolution of a NIEA sample non-compliance at the existing WwTW resulted in a delay to the actual transfer of flows.

- Mullaghboy WwTW – The SBP indicated that an interim solution should be completed in 2008/09 with a long term solution initiated by 2010/11. It was decided to carry-out a long term solution only, however protracted land purchase negotiations have delayed the project. The final solution will nevertheless be delivered sooner than originally planned in the SBP.

- Park WwTW - review of scope, etc., reduced SBP estimated spend from circa £2.2m to £1m. Delay of only 3 months reflected in current spend profile representing about 5.6% of total spend occurring in 09/10 (actual compliance was achieved in 08/09)

- Cranagh WwTW - mProve exercise indicated that a different procurement route should be considered (small WwTWs). Planning issues have delayed the current proposed completion date.

For the schemes completed during the year, and in previous years, we queried whether NIEA provided formal sign off/approval of the solutions delivered to confirm that the driver has been achieved.

NI Water advised that there is no formal system in place where works are signed off. However, we found that prior to a scheme being initiated, E&P will submit a pre-application to NIEA based on the assessed PE's and flows. NIEA will then issue design standards. Prior to the upgraded/new WwTW coming into operation a full application form will be submitted for the final Water Order Consent which will come into effect from a specified date. NI Water is self monitoring so undertakes audit sampling at all WwTW with numeric standards to a schedule agreed with NIEA. These results are submitted to NIEA on a monthly basis and from these the compliance with the environmental drivers can be ascertained. For WwTW with descriptive standards, there will still be design standards but to confirm the meeting of environmental drivers, NI Water will submit the performance and take-over test data to NIEA. However, this has not yet occurred.

For AIR09, we reviewed the breakdown of expenditure for UWWTD schemes; Dromore, Gilford and Newtownbreda and Enniskillen WwTWs. For each of these schemes, we found that the currently assessed drivers were different to those assessed for the SBP. We queried the variances, which we have summarised below, and the Company acknowledged that these were errors, which need to be rectified:

Project Reference	Project Description	SBP Q Driver Allocation	AIR09 Q Driver Allocation
KV008	Dromore WwTW	U2, FF2, WQO/WFD	U2, U4, FF2, WQO/WFD
KV009	Gilford WwTW	U2, FF2, WQO/WFD	U5
KR333	Newtownbreda WwTW et al	U1, U3	U3
KP299	Enniskillen WwTW	U1, U3	U1, U3, U4

For Line 9, the majority of expenditure against the Bathing Water Directive (BWD) was incurred at Warrenpoint WwTW (£0.57m) and a number of pipeline solutions, such as Portrush Sewer improvements (£0.65m). We queried why this infrastructure project was largely driven by the BWD. NI Water advised that Portrush was a popular seaside resort and the objective of the scheme was to ensure compliance with the North Coast Bathing Water's mandatory targets for 2008. The work being implemented will ensure the closure of 14 UIDs throughout Portrush that currently discharge directly to Mill Strand.

We found that expenditure associated with the Freshwater Fish Directive has been incurred on all schemes forecast for delivery in 2008/09, with significant spend reported against Anhahilt WwTW and Castlewellen WwTW.

NI Water has reported significant expenditure against the other EU Directives, which we have summarised below:

Driver	Total	U3	U4	U5	U6	U7	HS 1	HS 2	SF	WFD
2008/09 Expenditure (£)	23,026	2,666	1,511	4,312	3,205	2,512	792	1,843	716	5,468

We found that total expenditure against each of the programme areas has been adjusted on a pro-rata basis to ensure consistency with the total expenditure reported in Table 36. The Company advised that the adjustment process accounts for projects with no CIDA allocation and for rounding errors between Oracle and Captrax. We confirm that the adjustment was negligible circa ±0.1%.

4.1.5 Other environmental programmes

Whilst NI Water does not have a formal first time sewerage programme funded in the SBP, expenditure was incurred during the year in the provision of first time sewerage for existing properties connected to the sewerage system for the first time. An example of this relates to [X] [X], where £267k was incurred during the year.

4.1.6 Investigations

No expenditure reported during the year

4.1.7 Sewerage sludge management

Not applicable

4.1.8 Capex Totals

The total Capex recorded for the Report Year has been adjusted to reconcile with expenditure reported in Table 36 and as such does not quite reconcile with CIDA, as described in Section 4.1.4 above.

4.2 Operating Expenditure

4.2.1 General

The Company advised that incremental opex has been calculated directly from the accounting general ledger. It advised that it considered those sites that had become active during 2007/08. It then undertook a comparison of data on a site by site basis related to pre and post Capex investment. It then adjusted for inflationary impacts.

Although the process relies substantially on manual assessment we believe that it is capable of reporting incremental opex that is reflective of the actual additional opex due to capex incurred in the year.

We note that data does not exist on a site by site basis for all sites. Where this is the case, additional analysis of costs is required.

The Company feels that it is now capturing the majority of data related to the Opex impact of Capex. The allocation of the Opex across individual lines is based on CIDA analysis where the allocation is split between all CIDA enhancement categories. Projects with a Base allocation in CIDA have had this transferred to the Enhancement categories on a pro-rata basis for applying Enhancement Opex lines This is because all base additional operating expenditure is coded to enhancement. See our commentary for table 36 for more details.

The approach to application of the expenditure across quality drivers is the same as that used for the Capital schemes. The Opex costs relate to the works commissioned during the SBP period.

4.2.2 Unsatisfactory Intermittent Discharges

The Company has reported £81,000 for intermittent discharges for the report year. For AIR08 the Company had reported zero.

4.2.3 Discharges – EU Directives

Line 8 – Opex: Continuous discharges

The Company has reported £115,000 for continuous discharges for the report year, against the following schemes:

- KP 298 – Irvinestown WwTW
- KB229 – Bellaghy WwTW
- KC252 - Ballybrakes & Glenstall WwTW
- KL365 – Claudy WwTW
- KV008 – Dromore WwTW
- KB035 – Cookstown WwTW

Line 10 – Opex: Continuous and intermittent discharges – Bathing Waters Directive

The Company has reported £30,000 for intermittent discharges, relating to the following schemes:

- KV033 – Warrenpoint WwTW
- KR390 – Clough WwTW Interim solution
- KR388 – Ballywalter WwTW Interim solution
- KC232 – North Coast WwTW EC Compliance

Line 12 – Opex: Continuous and intermittent discharges – Freshwater Fish Directive

The Company has reported £67,000 for intermittent discharges, relating to the following schemes:

- KN586 – Killen WwTW
- KP298 – Irvinestown WwTW
- KV031 – Hilltown WWTW
- KV097 – Belleeks WWTW
- KV042 – Culaville WWTW
- KV008 – Dromore WWTW
- KB035 – Cookstown WWTW

Line 16 – Opex: Continuous and intermittent discharges – Other EU Directives

The Company has reported £735,000 for intermittent discharges, relating to the following schemes:

- KR333 – Newtownbreda, Dunmurry, New Holland WWTW's Nutrient removal
- KN586 – Killen WWTW
- KF009 – Killylea, Caledon, Tynan WWTW's
- KP298 – Irvinestown WWTW
- KV031 – Hilltown WWTW
- KV009 – Gilford WWTW
- KV033 – Warrenpoint WWTW
- KV097 – Belleeks WWTW
- KV042 – Cullaville WWTW
- KB315 – Pomeroy WWTW
- KB229 – Bellaghy WWTW
- KV008 – Dromore WWTW
- KR390 – Clough WWTW interim solution
- KR388 – Ballywalter WWTW interim solution
- KN558 – Sionmills WWTW
- KS301 – Dundrum WWTW
- KR342 – Belfast lough north shore WWTW's
- KB035 – Cookstown WWTW
- KC232 – North Coast WWTW EC compliance.

6. Confidence Grades

6.1 Capital Expenditure

All capital related expenditure is extracted directly from CIDA. We have undertaken a review of the spreadsheets, which access and collate the expenditure information by project for the Report Year. However, in doing so, we have identified a number of cost allocation errors/discrepancies. As such we recommend a confidence grade of B4 for all capex related lines, rather than the B2 suggested by the Company.

6.2 Operating Expenditure

The Company has reported a confidence grade of B4 for all opex related data, which is consistent with that reported previously and in other tables.

7. Consistency Checks

We can confirm that lines 7 and 8 of Table 36 are consistent with lines 29 and 30 of Table 38.

Date: 10 August 2009

Table 40 – Analysis of fixed asset additions and asset maintenance by asset type (current costing accounting)

Commentary by REPORTER

1. Background

This Table covers the Capital Investment Monitoring Return for the report year.

2. Key Findings

- Consistency between Table 40 and Table 32 has been satisfactorily demonstrated.
- Table 40 is consistent with the CIM template issued with the Guidance.
- Actual expenditure has been deflated to 06/07 prices using SBP assumptions.
- Some investment streams have been moved into/out of Table 40 such that it does not align with those in the SBP.
- [X]
- Procedures for proportional allocation are significantly improved on previous years.
- Apportionments are undertaken by project engineers/managers at project level, many of which have been independently reviewed and challenged to improve consistency and robustness.
- Overall, we believe that the allocation of investment into service areas and asset types has been done well.
- Allocations into QBEG categories have been greatly improved over the year and data collation processes have now been largely automated.
- There remain some concerns over QBEG allocations but these are under review by NI Water and we expect to see these diminish to relative immateriality over the course of 2009/10.
- There remain a number of omissions and inconsistencies in the asset category/type information which should be addressed.
- We have identified a number of suggestions for improvement to assist in the checking and analysis of the Table.

3. Year-end capital investment reconciliations

In the AIR09 submission, our commentaries confirm a satisfactory reconciliation has been achieved between the capital investment tables.

To tie Table 40 to the AIR capital investment tables, we sought a reconciliation from NI Water. They provided a calculation which aligned AIR Table 40 to AIR Table 32 as follows:

- Table 40, column 53 total (in 06/07 prices) **[X]**
- Indexation assumed in SBP (see Section 5)

  06/07 to 07/08 5.38%
  07/08 to 08/09 2.50%
  Thus 06/07 to 08/09 8.02%

- **Table 40, column 53 total (in 07/08 prices)** **[X]**
- Reconciliation between [X] and [X] [X]
- Capitalised salaries and overheads (not in Table 40)* [X]
- Capital contributions (Table 32 reports gross, Table 40 reports net)** [X]
- Project JC354 in [X] but not [X]/Table 40 [X]
- [X] rounding on upload (which rounds to nearest £k) [X]
- **Table 40 with adjustments as above** **[X]**

This equals

- Table 32 (EP) **[X]**

add

- Table 32 (M&G) [X]
- PPP [X] pipelines [X]
- Which gives Table 32 (NIW Only) as submitted **[X]**

* £8,149,000 was challenged and reconciled back to spreadsheets developed for this purpose, but not to information provided in relation to other challenges, which indicated that a total of £9,277,636 had been capitalised for 08/09. NI Water has confirmed that the total capitalisation of £9,277,636 is correct and that the difference is contained within the M&G calculations which populate Table 32. We note that these are significantly above SBP Projections due to a change in NI Water capitalisation policy.

** £1,300,000 was challenged and reconciled to the spreadsheet NI Water provided in support of grants and contributions audits in Tables 35 and 36

(when water connections and Article 17 adoptions were deducted). We note that these are significantly below SBP Projections (see table below).

4. SBP Projections

NI Water has provided a spreadsheet, based upon information supporting the SBP, and which reconciles to the total capital expenditure profile given in the SBP (as reproduced below).

Copied from NIWL Strategic Business Plan (page 17)

NIWL Capital Expenditure DRD Final Sustainable Case (post efficiency)

	2007/08	2008/09	2009/10	2010/11	2011/12	2012/13	2013/14	Total
CWP	229,976	211,120	225,793	212,147	201,639	184,407	170,806	**1,435,888**
E&P Capitalised Salaries and Overheads	5,479	4,973	3,640	3,704	3,769	3,836	3,903	**29,304**
SWwTW's	-	5,401	5,536	5,674	5,816	5,962	6,111	**34,500**
Capital Contributions	-10,055	-9,936	-10,480	-11,413	-11,265	-11,547	-11,836	**-76,532**
Technology Programme	11,092	12,639	7,856	-	-	-	-	**31,587**
Connections	2,344	2,250	2,087	2,124	2,161	2,199	2,238	**15,403**
Accommodation	-	-	-	-	-	-	-	
Asset Management - NIAMP3	2,303	2,861	1,939	-	-	-	-	**7,103**
ICT	2,162	930	863	806	820	834	849	**7,264**
Metering	4,808	6,131	2,175	2,457	2,501	2,545	2,589	**23,206**
Customer Billing	553	102	95	501	98	100	528	**1,977**
Other	24,372	19,081	13,233	9,808	10,094	10,493	11,589	**98,670**
Total Post Eff. Nominal	**273,034**	**255,552**	**252,737**	**225,808**	**215,633**	**198,829**	**186,777**	**1,608,370**
	Note that totals above do not fully match the SBP due to rounding.							

In order to report against the lines and tables in the AIR, NI Water has needed to recast the SBP supporting information and make some corrections/adjustments to align the SBP figures with the investment streams reported in Tables 35 and 36 and thus to produce the 'SBP Projections' given in columns 1 and 2 of Tables 35a and 36a.

With NI Water assistance, we were able to reconcile the totals and a sample of the SBP Projection figures back to the SBP extract above. We recommend that this reconciliation is formalised and discussed/agreed with the Utility Regulator such that the UR take ownership and control of these regulatory expectations.

NI Water advised that, following the acceptance of the SBP (from which the above data is copied) the DRD adjusted the funding allowances assumed for the Capital Works Programme (CWP) between expenditure categories, as follows:

Expenditure category (£k in 06/07 prices)	2007/08	2008/09	2009/10
Water infra (base)	-2,708	-2,184	-2,626
Water infra (enhancement)	-3	-101	-59
Water non-infra (base)	+2,711	+2,285	+2,685
Sewerage infra (base)	-4,887	-3,966	-3,804
Sewerage infra (enhancement)	-307	-180	-198
Sewerage non-infra (base)	+5,194	+4,146	+4,002

These net to zero in each year and in each service area.

NI Water has also adjusted their view of the SBP Projections by moving the assumed expenditure on Sewage Pumping Stations from infrastructure to non-infrastructure to accord with the reporting guidelines as follows:-

Expenditure category (£k in 06/07 prices)	2007/08	2008/09	2009/10
Sewerage infra (base)	-3,557	-3,626	-3,982
Sewerage non-infra (base)	+3,557	+3,626	+3,982

Whilst these changes are not evident in Table 40, as the Table develops to report more of the capital investment projects, it may become possible to relate the projects to the SBP 'budgets' when it will be necessary to understand changes in both budget and delivery.

5. Indexation

As indicated in the reconciliation above, NI Water has indexed the SBP projections from the 2006/07 base year using the inflation assumption used at that time. These are:

- For COPI: 5.38% for 2007/08 and 2.50% for 2008/09 and beyond, aggregating to an inflation multiplier of 1.08015 for 2008/09.
- NB - For RPI: there is no reported Determination information for opex, so indexation is not required. However 2.50% per annum was assumed in the SBP for opex.
- NB - In reconciling the information supporting the SBP to the figures that were finally agreed with DRD, NI Water has found it necessary to use a hybrid inflation rate for the M&G programme cost assumptions. These equate to 3.71% for 2007/08 and approximately 2.50% beyond.

If these tables are endeavouring to identify the differences between the SBP investment assumptions and the actual expenditure due to causes within management control, it would seem more suitable to use actual RPI and COPI inflation so as to eliminate the prevailing (rather than as forecast) external economic factors. Thus, we believe actual RPI and COPI should be used and this would be consistent with the interpretation in England and Wales, where the indexation figures to use are provided by Ofwat.

6. Differences between the SBP and current programmes

DZS and DAS

Distribution Zonal Studies capex, at £1.82m in 2008/09, has been removed from Table 40 as, with the new organisational structure, this activity has been moved in the Asset Management directorate.

Similarly, the costs associated with Drainage Area Studies, at £1.18m in 2008/09, have also been removed.

Within the SBP, the DZS and DAS costs were included in the project costs. The assumptions used at that time are not sufficiently detailed to distinguish the allowances assumed but in NI Water's final Cost Base report, allowances of 5% for DZS and 2% for DAS on all (water or sewerage) infrastructure costs were assumed.

Allocation assumptions

As noted by NI Water in their commentary, there are significant differences between the proportional allocation assumptions made in the SBP (which tended to be poorly informed at project level and generic at programme level as well as financially influenced) and those now being applied using the developing [X] methodology.

Project scope reviews

Additionally, as discussed in Tables 35 and 36, the Company had applied a rigorous challenge process to their Capital Works Programme projects, eliminating or reducing the unnecessary elements of the schemes, so as to ensure a more focussed delivery of the regulatory outputs and secure cost reductions. I believe that this is likely to influence the proportional allocation as it appears that the main elements being impacted will be base service (MNI). As the WWTW programme is the most significant, the influences of this process are likely to be greater in the sewerage service than the water service.

We recommend that these re-allocations are identified and quantified as, if Tables 35a and 36a are to be of benefit in the future, appropriate and commensurate adjustments are required to ensure that assumptions underlying both the SBP Projections and the actual expenditures are aligned.

7. Proportional Allocation

NI Water has produced a Capital Investment Driver Allocation (CIDA) Manual, June 2007. This is a comprehensive document which includes:

- An explanation of the need for proportionally allocating capital investment;
- the occasions (generally formal approval stages) in the life of a capital scheme when the analysis should be considered or re-appraised;
- the thresholds for which CIDA is required;
- the procedures for undertaking the allocation;
- a comprehensive series of worked examples;
- definitions of purpose categories and investment drivers;
- descriptions of purpose categories and investment drivers
- descriptions of asset types and examples of assets;
- non-infrastructure asset life categories, lists of typical asset types in each category and the range of asset lives covered; and
- NIW asset categories

This manual appears to fully conform with the NIAUR Reporting Requirements and the Regulatory Accounting Guidelines and should form a sound basis for compliant reporting in Tables 32, 34, 35, 36, 37, 38 and 40.

The Reporting Requirements indicate that, for a company with capital investment greater than £100m per annum, proportional allocation should be applied to all schemes/projects expending over £100k in the Report Year.

As noted elsewhere, NI Water commissioned an independent consultant, who helped compile the CIDA Manual, to check through all the projects which had been reviewed to reduce the errors, improve the allocations and identify key areas for improvement. The review included all schemes above this threshold and many of those below it, only omitting those with very small spend in the year which between them account for less than £300k of the 2008/09 expenditure.

We strongly recommend that checks continue to be undertaken on all schemes with Report Year spend above the £100k threshold, using staff with experience of capital works and detailed knowledge of the CIDA processes, until all such projects have at least been through the revised A1 approval stage.

Training events have been held, a programme of project reviews has been undertaken (covering the majority of projects and the vast majority of expenditure on SBP capital

investment programmes) and the requirement for a CIDA review at key project stages (A0, A1, A3 and Project Commissioning) has now been embedded into business-as-usual practice.

Templates for capturing the CIDA information have been produced and linked to investment monitoring systems and to Regulatory Reporting processes, and a series of reconciliation checks have been undertaken to provide assurance of the integrity of the operation of these processes.

The processes are, unfortunately, necessarily time-consuming and complex and much detailed information needs to be assimilated by each user in order to fully and correctly apply all the allocation procedures in accordance with the guidance. Furthermore, we anticipate that many of the users are occasional or infrequent and the retention of these requirements (when they are perceived to be of relatively low relevance/importance to their normal duties and competing pressures), will I believe in these early stages, inevitably lead to some mis-allocation as the concepts and processed bed in and become a familiar routine.

It is therefore appropriate for NI Water to continue to undertake thorough checks on the allocations, noting where and why any corrections are required such that additional training and increased vigilance can be focussed on any areas of concern.

Audit Checks

During 2008/09, NIW commissioned a thorough review of the CWP projects and their investment allocations. These were initially undertaken by NIW Project Managers, then reviewed centrally by a team from [X] to improve compliance with definitions and consistency of application of the regulatory accounting guidelines for allocation into asset types, and with the reporting requirements for purpose categories and driver allocations.

This process was captured in the CIDA (Capital Investment Driver Allocations) spreadsheets: one for water; one for sewerage, uploaded to CAPTRAX and then downloaded into regulatory Tables 32, 35, 36, 37, 38 and 40.

[X]

9. Other findings

Consistency with Tables 37 and 38

Table 40 reports regulatory outputs at project level and a number of these were cross-checked back to the output of the review to ensure the upload/download and any interim manipulations still retained the appropriate CIDA splits. Tables 37 and 38 report on investment in quality drivers and a series of sample checks were made to trace the expenditures stated in the tables back to relevant allocations from appropriate projects. These checks also assist with the verification of the allocations of investment into base and enhancement purposes as required by Table 32.

We checked the report year spend and the QBEG allocation and in general we found consistency between CIDA, Table 40 and the PC10 information. There were some anomalies, some of which appeared to be typographical errors, others we believe are due to the information being under constant review, and notably the impacts of the PC10 submission which, for carry-over projects, may have been updated to reflect the current project status.

CIDA to Table 40

We chose an additional random sample of projects to review, to compare between CIDA and Table 40 and to test the assumptions of proportional allocation on the basis of the information presented, which in CIDA had some additional scope information. We looked at 12 projects and were fully satisfied with the consistency of 10 of these.

NI Water referred back to the project manager on one project and confirmed that the scope had changed significantly, affecting the cost estimate and the QBEG split. This was accepted.

On the other project we noted an apparent conflict between purpose category driver information given in the CIDA spreadsheets with the split assumed in Table 40. The CIDA spreadsheets identified that security of supply was a significant driver and, indeed, a 200mm dia main was identified as being upsized to 280mm dia. Report Year expenditure on this project was only £35k but the project, largely completed before the SBP period, totals approximately £300k. Allocations in Table 40 indicated that 'Base' was the dominant driver (94%) and growth accounted for 6%. Following this challenge, NI Water has reviewed their allocation and confirmed that the split should be:

- 100% infrastructure
- QBEG: 0/45/0/55 %
  Growth%: 10% new development, 45% security of supply

This accords better with the supplementary details given for the project on CIDA and whilst the finding in itself has no material impact upon 2008/09 allocations, it (a) provides evidence that the allocation methodologies have been reviewed down to a level

of granularity lower than £100k in a report year but (b) that there is still some checking to be done in 2009/10 to ensure that the information sources and data trails fully align.

Small STW programme (project KA206)
[X]

All investment is allocated to sewage treatment works in Table 32 and then split: buildings 2%; civil structures 38%; ICA 7%, Fixed Plant 53%.

Since a large part of this programme is to enhance and extend the existing facilities and the works sizes are small, the small % to buildings and relatively low (38%) allocation to 'civils' both seem justified. A minor concern is the allocation of ICA to quality drivers. If this is a new requirement, then this is acceptable, otherwise replacements and upgrades of ICA should be classed as base maintenance.

We believe that the QBEG split varies significantly from that assumed in the SBP (which is not reported in Table 40) where, largely due to 'backlog' allocations, the split was 10/27/13/50%. We have not challenged the rationale behind this change but we are aware of the fluid nature of this programme as the works are investigated and priorities are revised.

10. Table 40 structure/observations

With the exception of the absence of column 165 *'Explanatory Notes/ Comments'*, the Table 40 presented by NI Water has the same structure as that issued by NIAUR with the Reporting Requirements.

To facilitate reliable data sorting, we recommend a number of data cleansing activities or improvements to the table as follows:-

Column 0 - add a column for use in identifying the price control period or interim determination/change protocol to which each project relates. This could be extended to identify separately funded or monitored programmes (eg CWP/M&G/small WWTW etc)

Column 1 - should always be populated with the CWP Project ID to ensure linkage with any 'child' or 'substitute' projects is not lost when the data is sorted.

Column 2 - replace '0' with 'sewerage'.

Column 4 - improve consistency of Primary Asset Types with Table 32 line headings. There are several very similar categories.

Column 44 - we are concerned that outturn capex is being deflated by the inflation assumptions used in the SBP rather than by COPI, particularly in the light of the recession (which was not anticipated in 2006/07). However, we confirm that Report Year capex has been deflated by 8.02% in accordance with the SBP assumptions of 5.38% in 2007/08 and 2.50% in 2008/09.

Columns - should we believe show the project delivery dates as anticipated in the SBP. These appear to be being over-written with current actual and forecast delivery dates so no comparison can be made between the planned, the current expectation and the out-turn programmes.

With the assistance of NI Water we have been able to follow through a number of checks from Table 40 to CAPTRAX and Oracle information and into the other financial measures tables. The processes are complex and NI Water are working on further improvements to ease these reconciliations and to capture all capital projects in a modified Table 40.

We note the 66 projects with £2.7m 08/09 spend 'below the line'. These are projects not linked to the SBP. The recommendation above relating to column 0 would enable these projects to be identified as separate.

Date: 10 August 2009