



Comprehensive valuation report  
City of Edmonton – Gold Bar  
Wastewater Treatment Plant

*January 7, 2009*



# Grant Thornton

John Hodgson  
Branch Manager  
City of Edmonton  
6<sup>th</sup> Floor, Century Place  
9803 – 102 A Avenue  
Edmonton, AB T5J 3A3

**Grant Thornton LLP**  
1401 Scotia Place 2  
10060 Jasper Avenue NW  
Edmonton, AB  
T5J 3R8  
T (780) 422-7114  
F (780) 426-3208  
[www.GrantThornton.ca](http://www.GrantThornton.ca)

January 9, 2009

Dear Mr. Hodgson:

## **COMPREHENSIVE VALUATION REPORT**

We enclose our report providing our comprehensive opinion of value of the Gold Bar Wastewater Treatment Plant as at October 31, 2008.

Our report and supporting calculations detail the valuation methods, considerations, analyses and conclusions that underlie our valuation. We believe that our analysis must be considered as a whole. Selecting portions of our analysis or the factors we considered, without considering all factors and analysis together could create a misleading view of the process underlying the valuation conclusions. The preparation of a valuation is a complex process and is not necessarily susceptible to partial analysis or summary description. Any attempt to do so could lead to undue emphasis on any particular factor or analysis.

We thank you for the opportunity to provide our business valuation services and will be pleased to discuss the foregoing with you at your convenience.

Yours sincerely,  
**Grant Thornton LLP**

Troy MacDonald, CA, CBV  
Partner, Specialist Advisory Services

Marwan Jomha, CA, CBV  
Director, Specialist Advisory Services

# Contents

	Page
<b>Introduction</b>	<b>3</b>
Terms of reference	3
Purpose	3
<b>Valuation conclusion</b>	<b>5</b>
Fair Market Value	5
EPCOR Proposal	8
<b>Scope of review</b>	<b>12</b>
Scope	12
<b>Plant background and history</b>	<b>13</b>
Gold Bar Wastewater Treatment Plant History and Background	13
Ownership	13
History	13
Facility description	14
Integration with Edmonton water infrastructure	15
Key management and organization structure	16
Regulatory environment and customers	17
Financial Results and Position	18
<b>Industry and economic data</b>	<b>20</b>
Industry overview	20
Water and Wastewater Industry Overview	20
Key Players	22
Canadian economy	26
North American economy	27
Global economy	27
EPCOR History and Background	28
Ownership	28
History	28
Growth strategy	29
Corporate structure	30

<b>Valuation Methodologies – Plant</b>	<b>36</b>
Market approach	36
Discounted cash-flow approach (DCF)	36
Projections	37
Income taxes	37
Working capital requirements	37
Sustainable capital reinvestments	38
Enterprise Value	38
Equity value	38
Market approach	38
Precedent transaction analysis	45
Summary of Plant Valuation	47
<b>The EPCOR Proposal</b>	<b>48</b>
Reconciliation of EPCOR Projection to Drainage Projection	50
EPCOR run GBWWTP dividend stream	51
Discounted cash-flow – Incremental Revenue from EPCOR Wastewater Projects	51
Incremental dividends	54
Transfer price	55
EPCOR – Overall dividend payments	55
<b>Appendix</b>	<b>56</b>
<b>Appendix A: Assumptions, restrictions and qualifications</b>	<b>57</b>
Assumptions	57
Analysis of EPCOR’s GBWWTP Forecast	58
Restrictions	59
Qualifications	59
<b>Appendix B: Key Valuation Definitions</b>	<b>61</b>
<b>Appendix C: Scope of review</b>	<b>63</b>
Documentation	63
<b>Appendix D: Edmonton Drainage Utility Cost Study</b>	<b>66</b>
<b>Schedules</b>	<b>67</b>

# Introduction

## Terms of reference

- 1 As outlined in our engagement letter dated November 20, 2008, you have requested that we prepare an independent comprehensive opinion of the Gold Bar Wastewater Treatment Plant (“GBWWTP” or the “Plant”) as at October 31, 2008 (the Valuation Date), under a going concern approach, assuming Drainage Services (“Drainage”) continues to run the Plant. We are also requested to analyze the financial impact of the proposal to have EPCOR assume the Plant operations and reconcile it to our valuation.
- 2 We reserve the right, but are under no obligation, to review all opinions included in or referred to in this report and, if we consider it necessary, to revise our comprehensive opinion of fair market value in light of any information existing at the Valuation Date that subsequently becomes known to us following the date of our report.

## Purpose

- 3 Grant Thornton LLP has been engaged by the City of Edmonton (the “City”) pursuant to the City Council meeting on October 29, 2008, where a motion was passed in regards to the potential transfer of the GBWWTP to EPCOR directing administration to prepare a supplementary report for the non-statutory public hearing to be scheduled in January/ February, 2009, providing “An independent industry appraisal including market value, replacement value and book value of the Plant, lands and its inherent research and expertise”.
- 4 You have agreed that you will use our valuation analysis only for the purpose stated above. No other use is intended or permitted without the prior written consent of Grant Thornton LLP.
- 5 Our valuation analysis views the Plant on a “stand-alone” basis and excludes the Collection and Transmission (“Sysco”) assets. That is, our conclusion is based upon the Plant’s historical earnings and rates of return required by investors given economic and business conditions existing at the Valuation Date. Purchasers who perceive post-acquisition net economic value (e.g., higher earnings due to economies of scale or other factors), by acquiring the Plant or its underlying assets, may pay a higher price. Such prices, if available, can only be accurately quantified in an actual negotiation.
- 6 Our comprehensive opinion of fair market value in a notional market must be differentiated from the concept of price. Actual transaction prices for a particular business can vary due to such

factors as differing negotiating strengths, unequal motivation to transact and the purchase consideration being other than cash. As a result, the price at which a sale of the business might take place may be higher or lower than the notional fair market value opined herein.

## Valuation conclusion

- 7 This report dated January 7, 2009 and the conclusions drawn are based on the scope of our review and are subject to the scope limitations, assumptions, restrictions and other limitations noted herein.
- 8 All amounts contained in this report are expressed in Canadian dollars unless otherwise stated.

### **Fair Market Value**

- 9 The going concern approach assumes that the value of the Plant would be realized through an analysis of the cash-flows available to Drainage, directly or indirectly as an on-going business that generates appropriate economic returns for its shareholders. This approach is currently supported by the fact that the Plant continues to generate operating profits and present a potentially attractive investment opportunity for logical buyers and investors.
- 10 The Plant is a regulated utility whereby the owners are afforded the opportunity to recover all of its costs and earn a regulated rate of return on its equity by the regulator, being the City.
- 11 Our analysis of the universe of potential buyers for the Plant, led us to conclude that there are likely strategic buyers for this business. As a regulated asset, the price that would be paid by a potential buyer would be related to the book value of the assets. Fair market value often exceeds book value as the potential buyers have a different weighted average cost of capital (“WACC”) and are willing to accept a rate of return different than the regulated rate and / or they see an opportunity to utilize alternate regulatory structures, such as performance based regulation, that will allow them to realize and retain operating efficiencies. This is demonstrated by our trading analysis of comparable regulated companies across multiple sectors (water, power, gas, etc.).
- 12 Considering the size of the Plant, it quickly became apparent that the list of potential buyers would largely be restricted to Companies that currently operate plants of this nature and size and are likely large companies. The Plant’s likely primary third party potential buyers would include American Water Works, Aqua America, Northumbrian Water Group, United Utilities Group, Severn Trent and Pennon Group. We also note a trend towards privatization in the industry as additional efficiencies and access to private capital is sought.

- 13 The inherent research and expertise value of the Plant is viewed to be implicit in the going concern value without a premium attached. The Plant may be viewed as state of the art, however the operational knowledge is not considered proprietary by management and the technology is reflective of commercial best practices. A potential purchaser would likely view the expertise residing in the Plant as part of the operational knowledge that is being acquired as part of the transaction. Any research activities have been indicated to reside within the Edmonton Waste Management Center of Excellence, which is not part of the anticipated transaction.
- 14 It is common to review your overall conclusions through the use of implied valuation multiples. A common measuring stick in assessing your overall conclusion to the comparable entities is the Enterprise Value (“EV”) divided by the earnings before interest taxes depreciation and amortization (“EBITDA”) or the EV/EBITDA multiple. The analysis is common because it removes capital structure from the analysis and allows for a more consistent comparison. Based on our analysis we concluded that the going concern value of the Plant is between \$263 million and \$282 million, implying an EV/EBITDA multiple of 12.5 –13.4x (fiscal 2009 EBITDA) and a 7.7 to 8.2x (average forecast EBITDA). Given the significant additions in the first few years of the forecast and the anticipated significant EBITDA growth, the implied multiples were considered reasonable when comparing to implied public company and transaction multiples. Additionally, the market comparables are dominated by taxable entities, while the broader industry including this asset are owned by the public sector and not taxable, which would further compress the market comparable multiples. By deducting the debt of \$140 million this implies an equity value of \$123 million to \$143 million. This is consistent with the Plant’s net book value of \$126 million and implies an appropriate premium when contributory assets are excluded.

<b>Going concern summary:</b>					
	Going Concern \$ (in millions)				
	NBV	Fair Market Value			Replacement cost
		Low	Midpoint	High	
Enterprise value	266.0	262.8	272.6	282.4	700.0
<b>Less:</b>					
Outstanding debt	<u>(139.6)</u>	<u>(139.6)</u>	<u>(139.6)</u>	<u>(139.6)</u>	
<b>Equity value</b>	<b><u>126.4</u></b>	<b><u>123.2</u></b>	<b><u>133.0</u></b>	<b><u>142.8</u></b>	<b><u>700.0</u></b>

- 15 This value range for the Plant is consistent with the conclusions we drew from our analysis of market’s historical trading patterns once the growth in EBITDA from additional required capital investment and tax status of the market comparables relative to the broader industry is considered, which suggested a multiple range of 9.0x – 10.0x EBITDA.

### Continuum

- 16 We were provided with a balance sheet from Drainage as at October 31, 2008. Management was able to take the Drainage balance sheet and split it into two; the Plant and Sysco. Based on the balance sheets management concluded that the book value of the physical Plant was \$260 million including the contributed assets. In order to arrive at the \$260 million, the land portion of the Plant held by Land Services was allocated to the Plant. The cost of the land, \$5.2 million, was added to the book value of \$254.8 million to arrive at the \$260 million for purposes of the Valuation. The remaining \$6 million represents the positive working capital attributed to the Plant providing the enterprise value of \$266 million.
- 17 There is approximately \$38 million of contributed assets. These are assets that have been contributed to the City and as a result the City cannot earn a rate of return on those assets. However, the assets are an integral part of the Plant and the Plant could not physically operate without them. Therefore, we have included the value as part of the book value of the Plant but recognize the differing regulatory treatment of these assets. The assets would be accounted for separately for purposes of the regulatory environment.
- 18 Fair market value was calculated through a discounted cash flow as a primary methodology. The cash flows were prepared by Drainage for the initial three year period. We then forecasted the cash flows for the next nine years and determined a terminal value based upon further information provided by Drainage. We discounted the cash flows based on the WACC of a market participant to determine the net present value of the cash flow stream.
- 19 The market approach was also considered as a secondary valuation technique due to it relying on actual market prices. The relevance of information is subject to our ability to identify public companies that are considered suitably comparable as a wastewater plant owner/operator and/or companies that have transacted in this industry. We then applied the trading multiples of these companies to the facts of the Plant in order to determine an implied market value for the Plant. As this method involves applying a multiple to current earnings before interest taxes depreciation and amortization (“EBITDA”), it does not fully reflect the growth that the Plant is forecast to generate, which results in a lower value than the discounted cash flow methodology. Additionally, the peer group in the market comparables is dominated by taxable entities, while the industry as a whole is heavily weighted towards the non-taxable public sector, which further compresses the market comparable multiples.
- 20 The replacement cost of the Plant was determined by Drainage to be \$700 million as at the end of 2007 based on previous studies undertaken on their behalf. We have relied upon cash flow based valuation methodologies mentioned above which are more commonly used in the market place for transaction purposes. The table below charts out how our enterprise values fall in relation to each other.



**EPCOR Proposal**

- 21 The purpose of this section of the report is to provide an analysis of the financial impacts that may accrue to the City if the Plant is transferred to EPCOR as currently proposed. This will allow the City to assess the proposal relative to our valuation conclusion. It should be noted that this analysis of the EPCOR proposal is solely based on information provided by EPCOR and is outside of our comprehensive opinion of value above. We have not verified this information with third party sources due to the sensitivity of this matter, and the scope of the report has been limited in this regard.
- 22 In September of 2008, the City initiated a joint review with EPCOR of the potential benefits and risks of transferring the GBWWTP to EPCOR. They agreed that three conditions must be satisfied should a favourable decision to transfer the Plant be reached:
  - 1 No City employees will lose their jobs as a result of the transfer;
  - 2 The Plant's environmental leadership and expertise in the area of wastewater treatment must be maintained; and
  - 3 Council would maintain final approval over drainage rates.
- 23 Through various discussions between EPCOR and the City a proposal to City Council was made on October 29th, 2008 to transfer the GBWWTP to EPCOR in exchange for the following;
  - 1 \$75 million transfer fee to be paid over a seven year period;
  - 2 The City would receive an increase in the dividend associated with GBWWTP to 60% (similar to EPCOR's payment arrangements with the City for other utility services) in comparison to the 30% dividend the City currently receives from Drainage; and
  - 3 Payment of an incremental dividend associated with the growth of the wastewater business that would be directly attributable to owning GBWWTP.
- 24 EPCOR is offering a \$75 million transfer fee to assume the net book value of the asset. This is scheduled to be paid over the next 7 years on a declining basis. The net present value of this cash flow stream ranges from \$62.6 million to \$67.0 million with a midpoint of \$64.7 million and would only occur if the assets were transferred to EPCOR.
- 25 Regardless of who is operating the Plant, there is an annual dividend that will be paid to the City. Currently, Drainage pays a dividend of 30% of net income which is to increase to 40% in 2013. EPCOR is proposing to pay a dividend of 60% which is consistent with their historical dividend payment to the City from their other utilities. The net present value of this cash flow stream would range from \$86.1 million to \$97.7 million with a midpoint of \$91.6 million under an EPCOR run Plant.

- 26 The ability for EPCOR to pay higher dividends is related to their ability to effectively utilize more debt than Drainage as well as other operating synergies and capital efficiencies. Also, the amount of debt that EPCOR is assuming under the proposed transfer is lower than the debt that is directly attributable to the Plant. As a result, the corresponding dividend would be higher as a result of a lower interest payment. From the City's perspective, this would be offset in the Sysco dividend discussed below.
- 27 Upon review of the EPCOR forecast model we identified a number of differences in their model to that of the City model. The differences include the following: long-term utility rate increase assumptions, operating cost growth assumptions, depreciation expenses, and interest expense which, as discussed above, is due to a lower amount of assumed debt in the EPCOR forecast, as well as differences in the cost of financing and optimal capital structures between EPCOR and the City. Given the differences around the EPCOR model in comparison to the City model we applied a slightly higher WACC to reflect the inherent risk around EPCOR's assumptions given they are not currently operating the Plant.
- 28 Drainage plans on retaining and operating Sysco. Due to the proposed debt allocation the overall interest and resulting net income may vary depending on who is operating the Plant. Should EPCOR take over the Plant under the terms they propose it would be expected that the corresponding dividend from Sysco would be lower due to the extra retention of debt by Sysco. The incremental interest expense would reduce the amount of net income and the corresponding dividend. As mentioned above, this could be partially offset by the Plant dividend which would initially have lower debt. The Sysco dividend calculation was outside our scope and therefore, this was not quantified in this report. We have also assumed that the debt EPCOR would be assuming would remain in place at the same rates and EPCOR would continue to pay it off thereby avoiding the retirement of this debt and the occurrence of any early retirement penalties.
- 29 Incremental revenues are profits that EPCOR believes it could generate if it owned and operated the GBWWTP. EPCOR believes that the experience, knowledge and expertise that the Plant provides would secure future projects of a similar size and nature. Upon review of the projects identified and using EPCOR's probability weighted cash flow model, we have determined that the net present value of this cash flow stream could net the City additional dividends ranging from \$54.5 million to \$108.9 million with a midpoint of \$76.4 million. Given the subjective and unproven nature of these dividend streams and our professional judgment, we used a discount rate of 22%, in comparison to the market participant targeted cost of equity of 11.2%. Specifically, this additional risk premium reflected the following considerations:
- We understand that the incremental revenues relate to design, build, finance and operate services ("DBFO") that EPCOR would seek to realize through the additional market credibility achieved through its ownership and operation of the GBWWTP. While the DBFO business provides services to regulated entities, it is not a regulated business itself. Its profitability would be commercially driven through its ability to effectively execute its business activities, as opposed to owning and operating a regulated asset. This represents a different risk profile than

the operation and ownership of an existing regulatory asset, and market participants would expect a higher return on equity to reflect this matter.

- The incremental revenue is related to a portfolio of projects that EPCOR has and will pursue. We understand that several of these projects are subject to advanced discussions with business partners and potential customers. In its analysis of these opportunities, EPCOR estimated the probabilities of realizing each of these opportunities. The probability adjustments and active commercial discussions regarding these projects provide the supporting rationale for this analysis. Despite these factors, these revenue streams have not been secured, and there is no certainty regarding the level of income that will be generated from these projects. This represents a different risk profile than the operation and ownership of an existing regulated asset, and market participants would expect a higher return on equity to reflect this matter.

The following table reconciles the fair market value of the Plant to the EPCOR proposal:

Reconciliation:	\$ (millions)		
	Low	Midpoint	High
Transfer Price - NPV	62.6	64.7	67.0
GBWWTP - Dividend - NPV *	86.1	91.6	97.7
Plus City retention of working capital	6.0	6.0	6.0
Less difference in debt not assumed by EPCOR	(48.6)	(48.6)	(48.6)
Sub-total: Consideration for Plant Equity	106.1	113.7	122.1
Add Incremental Project Revenue Dividend *	54.5	76.4	108.9
Total potential consideration	160.6	190.1	231.0
Fair Market Value of Equity - Midpoint	133.0	133.0	133.0
Premium to fair market value of equity	27.6	57.1	98.0

\* Figures assume operation into perpetuity

- 30 The fair market value of the transfer price, the dividend to be provided by EPCOR for operating the Plant, retention of working capital and retention of debt by the City that is not to be assumed by EPCOR represents consideration for the Plant's equity. Drainage management has informed us that the amount of debt to be assumed by EPCOR as at October 31, 2008 would be \$91 million which is \$48.6 million lower than the \$139.6 million in debt recorded on the books. To this we add the potential incremental revenue dividend range of \$54.5 million to \$108.9 million with a midpoint of \$76.4 million representing the total potential consideration for the equity of the Plant. In comparing this to the fair market value of the equity as derived in our valuation it represents a premium in the range of \$27.6 million to \$98.0 million with a midpoint of \$57.1 million over fair market value.
- 31 It should be noted that the GBWWTP dividend stream under EPCOR management was calculated assuming an opening debt balance of \$108 million. The debt adjustment is based on an assumed

debt transfer of \$91 million. While the EPCOR model was not updated for this differential, we believe it would produce a small increase in the value of the dividend stream; which would further increase the premium.

# Scope of review

## Scope

- 32 We have prepared an independent comprehensive valuation report that reflects the intended purpose and use of the report, as well as the limitations regarding the availability of certain information, as discussed below.
- 33 In preparing our report, we have reviewed and relied on information provided by management of the Plant and by Management of EPCOR, as well as publicly available information. Please refer to Appendix C for a detailed list of the information upon which we relied.
- 34 In the course of developing our conclusions on the valuation of GBWWTP, we required segmented financial information related specifically to the separate operations of the Plant. This information had not previously been separately recorded as the Plant was part of a larger consolidated operation. Management worked from various supporting documents and analyses, to develop this financial information to the best of their ability given the time limitations, the unique nature of these information requirements and that the financial accounting structure used by the City of Edmonton does not typically segregate to the level required for this valuation.
- 35 While our DCF conclusions reflect a number of assumptions that are believed to be reasonable, we were unable to obtain information to support or corroborate some of the assumptions. The October 31, 2008 balance sheet, the December 31, 2007 financial statements and the allocation of the financial statements between GBWWTP and Sysco for both 2007 and 2008 utilized in our analysis were unaudited causing a scope limitation. Therefore, the conclusions reached in our determination of fair market value are subject to this limitation of scope, which may materially impact our conclusion.

# Plant background and history

## Gold Bar Wastewater Treatment Plant History and Background

### Ownership

36 GBWWTP is currently under the Wastewater Section of the Drainage Services Branch of the Asset and Public Works Department of the City, and therefore is wholly owned by the City of Edmonton. It is managed as part of the sanitary drainage utility, which includes the plant and collection system.

### History

37	<b>1956</b>	The City of Edmonton opens GBWWTP. Originally designed to serve a population of 250,000, the plant is the city's first secondary wastewater treatment facility. It consisted of three grit tanks, two primary clarifiers, four digesters, three secondary aeration tanks, four sludge storage lagoons, a blower and boiler building, and an administration building with adjoining laboratory.
38	<b>1991</b>	GBWWTP has grown considerably and now consists of five aerated grit tanks, eight primary clarifiers, six anaerobic digesters, eight secondary clarifiers and aeration tanks, two blower buildings, a re-modeled administration building, and a new and expanded laboratory.
39	<b>1996</b>	GBWWTP becomes a tertiary treatment plant by opening two new bioreactors, followed one year later by a new ultraviolet disinfection facility.
40	<b>1998</b>	A Waste Activated Sludge (WAS) thickening facility and a primary sludge fermenter is added.
41	<b>2002</b>	All ten aeration tanks are now converted to bioreactors, completing the Biological Nutrient Removal upgrade program.
42	<b>2003</b>	GBWWTP is testing a 70-kilowatt micro turbine powered by biogas, reducing reliance on coal-generated electricity. Biogas is a by-product created from the digestion of wastewater sludge and is converted into energy to heat the plant.

43	<b>2006</b>	A new 5.5 kilometre reclaimed wastewater line is built between GBWWTP and Petro-Canada's Strathcona County refinery. It transports high quality effluent treated through a membrane filter directly to the refinery and its third-party, reducing the amount of hydrogen and steam generator water drawn directly from the North Saskatchewan river to meet Petro-Canada's water needs for new processes. It also provides surplus water for other users along the river valley, including the Sunridge and Nordic ski clubs and the parks system. This public-private partnership between the City of Edmonton, Petro-Canada and Strathcona County is funded by Petro-Canada for approximately \$25 million.
----	-------------	---

### Facility description

- 44 GBWWTP is a tertiary treatment (Class IV) facility located on 19.5 hectares of land in the North Saskatchewan River Valley in the east part of the City of Edmonton. Its current average tertiary treatment capacity is 310 megalitres (ML) per day, 420ML (peak). In one year, the plant treats roughly 90,000 ML of wastewater.



- 45 At the plant, solid, organic, and chemical waste are separated from wastewater so that it can be safely re-introduced into the ecosystem. Wastewater, or effluent, enters the plant from two large sewer channels, and then undergoes several treatment phases before it is ready to exit the plant and enter the North Saskatchewan River via the plant's main outfall pipe(s). The treatment process consists of:

***Pre-treatment and Primary Treatment*** – Solid matter is screened and removed from the effluent. As it passes through the grit tanks and screen buildings, large rakes and screens separate the larger solid material from the effluent. This is necessary to prevent damage to equipment and allow for subsequent treatment procedures to focus on removing the dissolved organic matter and pollutants. Once all the grit (solids) has been removed, the effluent enters the primary clarifiers. It still contains a large amount of sludge and scum (partially-dissolved waste). In the deep clarifier tanks, the heavier sludge sifts to the bottom while the scum rises to the top. Both sludge and scum are then skimmed off and piped away for separate treatment,

while the effluent travels on to the next treatment phase. By the end of this process, approximately 50% of pollutants are already removed from the effluent.

**Secondary Treatment** – The remaining approximately 50% of pollutants are more difficult to remove. They will not settle out easily by gravity and cannot simply be scraped out by rakes or machines.

The plant employs biological reactions to further clean the effluent. In the bioreactors, micro organisms are introduced into the effluent. As they grow and multiply, these micro-organisms feed on the bacteria and pollutants and break them down. The effluent is then sent to the secondary clarifiers. As in the primary clarifiers, gravity and mechanical rakes separate matter from the effluent. In this case, the micro organisms are separated. Most are channelled back into the bioreactors, while a small portion are removed and broken down with the rest of the solid waste. All residual sludges are treated separately in fermenters and digesters for anaerobic stabilization.

**Tertiary Treatment** – The effluent passes through a second set of bioreactors, featuring a specialized biological reaction process, to remove remaining impurities. It is then disinfected in the UV facility by exposure to ultra-violet light. The water is now fully treated and ready to enter the North Saskatchewan River via the plant's main outfall.

- 46 Furthermore, GBWWTP continues to work with membrane filter technology to produce reclaimed wastewater through enhanced wastewater treatment. Membrane filters are a series of minute membranes resembling drinking straws that are less than 1/20th of a micron in diameter – which is less than the diameter of a human hair.

### **Integration with Edmonton water infrastructure**

- 47 GBWWTP is the City's only wastewater treatment facility. As part of the overall drainage system, which includes treatment and collection of wastewater and storm water, it provides a critical function by ensuring that effluent returned to the North Saskatchewan River satisfies environmental requirements.
- 48 Edmonton's drainage system operates in a regional context. All City wastewater is treated at GBWWTP except for an area in northeast Edmonton whose wastewater is diverted to the Capital Region Sewage Treatment Plant. In exchange, GBWWTP treats wastewater from the Capital Region's southern members (Beaumont, Leduc, Nisku, and the International Airport).
- 49 The regional relationship is governed under the *Alberta Capital Region Master Agreement (ACRWC)*, where each regional municipality is responsible for its own infrastructure while the ACRWC looks after the main trunk lines and wastewater treatment on their behalf.
- 50 Continuing co-operation between the City and Strathcona County is part of the Regional Wastewater Servicing Strategy and is highlighted through two key agreements: the *34th Street Agreement* and the *Drainage Transfer Station Agreement*. The City leases a portion of the sanitary sewer trunk running along 34th Street to GBWWTP on a yearly basis. In turn, the City charges

Strathcona to process its wastewater. The Drainage Transfer Station Agreement allocates responsibilities for the Clover Bar wastewater transfer station on the City/Strathcona border. The City is responsible for the collection, load analysis, billing and regulatory enforcement, while Strathcona maintains the site, access roads and overall operation, with revenues and expenses shared evenly.

### Key management and organization structure

- 51 GBWWTP is managed by a Director, Wastewater Treatment and a set of General Supervisors, and is organized into functional business units.



- 52 **Engineering Services** – This unit is responsible for the long range planning, project initiation, design and management of the capital upkeep of GBWWTP and associated facilities. It takes the lead on construction and renewal projects, and works closely with the Process Operations and Facilities Maintenance units. There are three business streams within this unit: capital engineering, plant engineering and special programs.
- 53 **Process Operations** – This is the largest unit at GBWWTP and consists of certified wastewater treatment operators that are responsible for the day-to-day running of the plant and associated facilities. There are four business streams within this unit: operations, process, utility and training.
- 54 **Facilities Maintenance** – This unit carries out maintenance and repairs of machinery, controls and instrumentation at GBWWTP. It consists of specialised staff members that work on scheduled maintenance programs and carry out ad hoc repairs as needed. It works with the Engineering unit to provide input on issues such as accessibility for repairs on new machinery, and the Operations unit to understand any issues the plant may be experiencing. There are three business streams within this unit: millwright and welding, instrumentation and electrical, and projects.
- 55 **Technical Services** – This unit provides support services that allow the plant to run efficiently and safely. It consists of a diverse mix of technical and professional staff members. There are five business streams within this unit: maintenance work planning, business IT, process control IT, environment, health and safety, and parking and security.
- 56 **Laboratory Services** – This unit supports various functions at GBWWTP by providing analytical data. It collects, analyzes and stores samples for the Process Operations unit to ensure the plant is

operating effectively and meeting its Approval-to-Operate requirements. In addition, it supports a number of activities undertaken by the Regulatory Services unit and works closely with the Centre of Excellence. There are four business streams within this unit and the potential for a fifth: sampling, process improvements, quality assurance, LIMS (Lab Information Management System), and customer service (if the Lab expands its provision of services to outside customers).

- 57 ***Bio-solids Management Program*** – A developing function that is focused on bio-solids and bio-gas utilization. Bio-solids are separated during the wastewater treatment process and stored at the Clover Bar bio-solids recycling facility, which also receives bio-solids from the capital region. Annual production is approximately 30,000 dry tonnes between Gold Bar and ACRWWC. There are currently three business streams within this program: composting, the NutraGold program and developing future bio-solid management solutions.
- 58 ***Centre of Excellence*** – Located at GBWWTP, the Wastewater Research and Training Centre is part of the Edmonton Waste Management Centre of Excellence. The Centre is a public-private partnership between the City, the University of Alberta, the Alberta Research Council, AMEC Earth and Environmental Ltd., Northern Alberta Institute of Technology, and EPCOR Water Services Inc. It offers opportunities for research and training in advanced biological wastewater treatment.
- 59 ***Regulatory Services*** – A branch wide function currently located at GBWWTP, this unit will move to new premises in December 2008 or January 2009. It consists of specialised staff members that monitor industrial and commercial inputs to the wastewater collection system, recover treatment costs for treatment of this wastewater and enforce City bylaws. There are three business streams within this unit: compliance, surcharge and projects.

## **Regulatory environment and customers**

### **Regulatory Environment**

- 60 The planning, design, construction and operation of GBWWTP, the wastewater collection system, and storm water drainage systems are regulated by Alberta Environment under an Approval-to-Operate. It lays out operational and planning requirements, effluent and discharge limits, and monitoring and reporting requirements. Failure to adhere to the Approval-to-Operate can lead to fines and suspension of plant operations.
- 61 As a utility, Drainage Services is funded by tariffs collected on customer water bills. The rate is set to ensure the utility collects the revenue required to meet its capital and operating needs. Drainage Services presents its intended tariff rates to City Council based on a cost-of-service study and adherence to the City's Utility Fiscal Policy, which sets guidelines for debt service coverage, rate of return on investment, capital financing, dividend payment, cash reserves and local access fee payment. Council reviews and approves the rates.
- 62 Currently, the Drainage Tariff (as of January 1, 2008) is made up of a monthly service charge (\$5.22) and consumption charge (\$0.9969 per cubic metre for residential customers and \$0.9969 per cubic metre for commercial/industrial customers for the first 10,000 cubic metres and \$0.7715 per cubic metre for consumption over 10,000 cubic metres). In addition, Wastewater Over-Strength

Surcharges are applied to surchargeable matter and Land Drainage Charges are assessed based on property size, development intensity and runoff coefficient.

#### Customers

- 63 GBWWTP handles wastewater treatment requirements for 700,000 people in the greater Edmonton area. It provides reclaimed waste water for Petro-Canada's Strathcona County refinery and, depending on demand, may provide re-use water to other customers in the future.

#### Financial Results and Position

- 64 The City currently has one reporting system for the Sanitary Utility. On February 22, 2008 the City hired Drazen Consulting Group ("Drazen"), to prepare a 2007 Drainage Utility Cost Study ("DUCS"). Drazen specializes in energy and regulatory economics and were engaged by the City to analyze costs of service rate design for both aspects of drainage services, the Sanitary Utility ("SU") and the Land Drainage Utility ("LDU"). The study was to compare the revenues from each class with the fully-allocated cost of service. The City has used this study to help in the allocation of the operating costs between the GBWWTP and the Collection and Transmission ("Sysco") divisions. The study looked at the cost of services based on service class and sub functions. The costs allocated under this basis were used to determine the costs associated with GBWWTP. (See Appendix D for a summary of costing methodology)

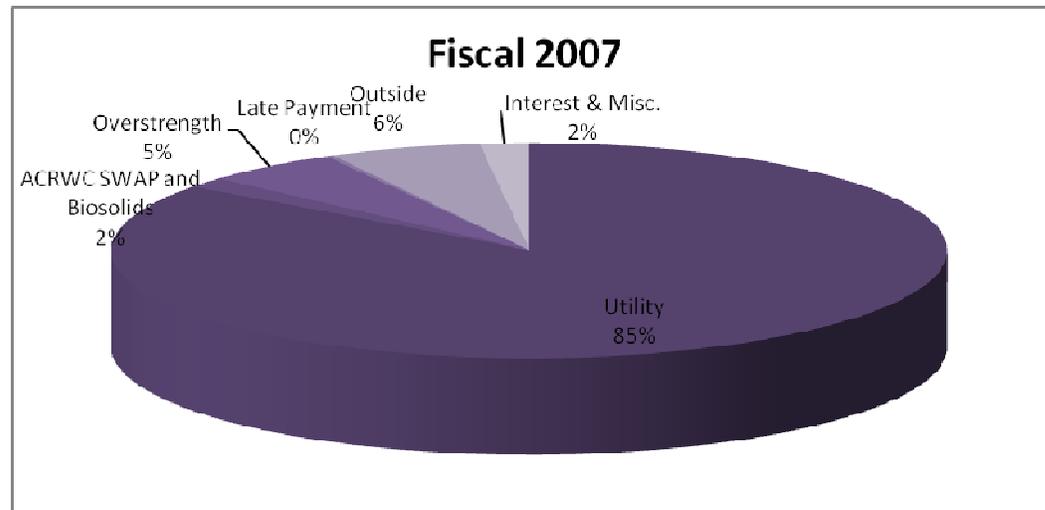
#### Income Statement

- 65 The City used the DUCS model to allocate the Operations and Maintenance ("O & M") costs to the two divisions. Depreciation costs were allocated using this model based on the asset value multiplied by the annual depreciation rate. Interest expense was allocated based on the portion of debt attributed to the GBWWTP assets. Utility and late payment revenues were allocated based on the percentage of O & M allocated to GBWWTP. All other revenues were already tracked separately between GBWWTP and Sysco.

#### Nature of Revenue

- 66 GBWWTP currently collects six types of revenues:
- a. Utility revenue – this is revenue that is collected as a result of providing service to residential, multi-family residential and commercial and industrial customers. This has been allocated as described above.
  - b. Overstrength – this revenue represents an additional processing service charge that is charged to some (but not all) commercial and industrial customers.
  - c. Alberta Capital Region Wastewater Commission (ACRWC). This includes two types of revenues:
    - i. Transmission and treatment of wastewater by either the drainage utility or ACRWC under the SWAP agreement
    - ii. Biosolids processed by the clover bar lagoons for final disposal outlined under the Biosolids Agreement.
  - d. Late payments – these are service charges related to late payments of utilities and have been allocated on the basis above.
  - e. Outside revenue – Relate to services provided directly by GBWWTP to external parties such as engineering, laboratory work and disposal services.

- f. Interest and Miscellaneous – this is interest earned by the City and has been allocated on the basis above.



#### *Nature of Costs*

- 67 GBWWTP costs consist of O&M, local access fee, depreciation expense and financing costs. O&M costs for GBWWTP consist of direct operation and maintenance of the Plant, laboratory analysis, industrial monitoring, technical support, utilities, engineering, and Center of Excellence, sludge disposal, process engineering and administration. GBWWTP's portion of costs was allocated based on the DUCS study.

#### *Net Income*

- 68 Net income for the fiscal year ended December 31, 2007 for GBWWTP was \$6.8 million and is forecast to be \$5.7 million for 2008.
- 69 Drainage pays a 30% dividend of net income to the city based on the prior year's net income. This is calculated as prior year's net income less Sanitary Servicing Strategy Fund (SSSF). The dividend for 2007 was \$8.9 million. The SSSF relates only to Sysco and is excluded from the dividend calculation for GBWWTP. The estimated dividend that would have been paid by the Plant for 2007 would have been \$2.1 million.

#### **Balance Sheet**

- 70 The balance sheet was allocated through the identification of specific assets and liabilities for the Plant and Sysco. Cash and deposits were not attributable directly to a division and were allocated to each operation based on the percentage of net income allocated.
- 71 As at October 31, 2008, the Plant had \$14.9 million of current assets (at net book value) and \$260.2 million of long term assets (at net book value). These assets were financed by \$9.1 million of current liabilities, \$139.6 million of long term liabilities and \$126.4 million of equity.

# Industry and economic data

## Industry overview

### Water and Wastewater Industry Overview

#### Definition

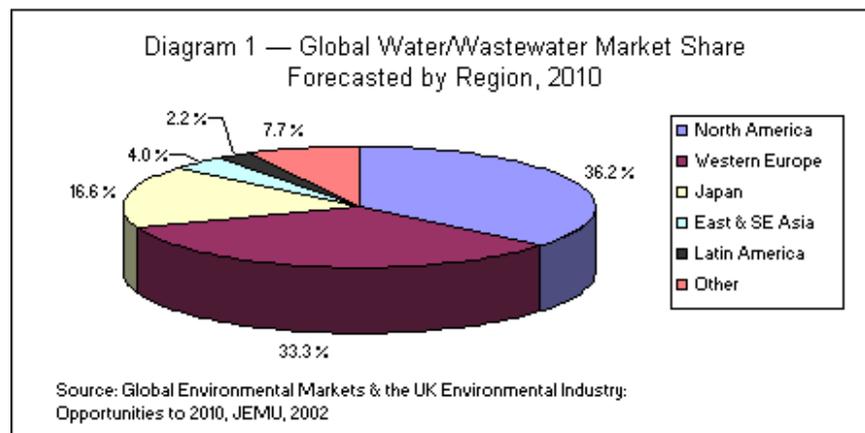
- 72 The wastewater industry is typically viewed within the context of the broader water and wastewater industry, with those activities related to the provision of water and wastewater services. This includes the sourcing, transportation, purification and distribution of potable water; the collecting, treatment and disposal of wastewater; and incidental services such as design, construction, maintenance, repair, testing, metering and billing, facilities management, and consulting.
- 73 The water and wastewater industry is distinguished from other industries by its capital intensity, its characteristic as a local natural monopoly, and its importance in terms of public and environmental health.

#### Wastewater sector

- 74 The major components of a wastewater system are: service connections to networks on both private and public property, local sewers, trunk sewers, pumping stations, treatment plants, and effluent disposal facilities.
- 75 Although the water and wastewater sectors have many similarities and often involve the same key players, they also have important differences. One difference is that wastewater services are not directly metered, meaning that rate design usually does not influence users' behaviour with respect to generating wastewater (except in the case of over-strength surcharges for some industrial and commercial users). Another difference is that for sewer services it is not practical to rely on disconnection as a means of enforcing payment. Therefore, alternative means for ensuring payment must be provided.
- 76 Within the wastewater sector, wastewater treatment itself has an important feature that does not apply to the sector at large. Unlike collection, treatment benefits the public at large but does not provide an immediate benefit to individual users. The benefits of treatment are social or external in nature, which may lead to users being more resistant to fee increases for wastewater treatment than for water treatment.

## Market

- 77 The global water and wastewater treatment market is currently valued at US\$360 billion with annual growth of more than 6 percent forecasted. The US captures just over 25 percent of this market. The commercial industry is small compared to the amount spent annually by regional and local governments. Upwards of 90 percent of the world's water supply is under public control.



- 78 Developed countries account for the vast majority of this market (close to 90%) as they have the financial means to build the necessary infrastructure. The three most significant domestic markets are the U.S., the United Kingdom and France. The U.S. market is highly fragmented and has a high potential for private growth as many municipalities and industrial companies are considering outsourcing options.
- 79 The management of urban water services in particular is expected to grow more complex in the years ahead, as cities are affected by growth both within their boundaries and from surrounding communities.
- 80 In the developing world, many countries have poor and/or scarce water resources, financial and political instability, limited access to water and wastewater networks, low levels of wastewater treatment, operating inefficiencies, and large populations with limited ability to afford infrastructure improvements. There is such a large unmet demand for water and wastewater services in these areas that if funding were to become available this portion of the market could grow rapidly.
- 81 Demand in this industry depends on residential, commercial and industrial water needs, which are related both to population growth and economic growth. This market has been characterized by a focus on water conservation and quality in recent years, reflecting the growing scarcity of water resources and high profile problems with water treatment. In most markets prices are carefully regulated by Public Utility Commissions. Therefore, the profitability of individual companies is largely based on operational efficiency.

### Competition

- 82 Large companies have economies of scale in operations and the ability to raise capital for infrastructure improvements. Small companies may be able to compete successfully through superior engineering or by serving smaller local markets.
- 83 In the US market, where EPCOR has expansion plans, it faces competition from the following key established players:
- a. Aqua America
  - b. American Water Works
  - c. Aquarion
  - d. Severn Trent
  - e. Veolia Environment
  - f. United Water
  - g. OMI/CH2M Hill
  - h. Total Solutions
- 84 In addition, EPCOR faces competition from local municipalities who continue to own and operate their own facilities in many of the geographies it seeks to operate in. EPCOR will face competition from the incumbents in trying to acquire the assets from these municipalities or win management/operating contracts for the facilities.

### Investment

- 85 The water and wastewater industry is highly capital-intensive with requirements for large scale development and maintenance. A large amount of existing infrastructure is old and aging, requiring significant spending for upgrading and replacement.
- 86 Capital investment requirements globally are very large. In the U.S. alone in 2000 it was estimated that \$1 trillion would be required through 2020 for new facilities or the replacement of old ones. That is \$47 billion per year, with \$24 billion a year for water facilities and \$23 billion a year for wastewater facilities. In Canada, it is estimated that \$90 billion will be required over the next decade to maintain, refurbish and expand water and wastewater infrastructure.
- 87 Capital investment is supplied by city governments and federal and provincial/state governments through grants and long-term debt. As discussed below, private sector investors are playing an increasing role in the industry. Operating and maintenance expenses are generally self-funded.

### Key Players

#### Customers

- 88 Customers are users of water, and therefore generators of wastewater, in the residential, commercial and industrial sectors. Industrial users like power generators and manufacturers are the

largest users of water in Canada. Municipalities are also important water users, divided almost equally between residential and commercial users. The average household in Canada uses 638 litres per person per day. Unlike many other countries in which the agricultural sector is the dominant user, Canadian farms use slightly less water than municipalities.

- 89 On average, Canadians use more water per capita than any other country in the world except for the United States. One reason may be that water is priced well below its full cost. Reconciling this discrepancy is one of the major challenges facing the industry in Canada and globally. It is inevitable that water prices will rise to reflect the all-in cost of supply, which will be necessary to sustain a functioning market.
- 90 In the case of wastewater, over 97% of Canadians are connected to a sewage system that provided some degree of treatment. Wastewater is continuing to receive more intensive treatment, with over 80% receiving secondary or tertiary treatment. However, municipal wastewater is still by far the largest source of contaminants to Canadian waters.

#### Municipalities

- 91 Local governments are the owners and operators of the vast majority of water and wastewater systems in Canada. In some cases, particularly small municipalities that are resource constrained, the operation of these systems has been outsourced to private operators, some of which may be extensions of publicly owned utilities.
- 92 Some municipalities also take on the role of regulator by reviewing and approving water and sewer rates.

#### Regulators

- 93 The federal and provincial/state governments are responsible for developing, implementing and enforcing drinking water and wastewater standards and environmental regulations.
- 94 Water and sewer rates are set by Public Utility Commissions in order to provide a fair rate of return for utilities while maintaining affordability and quality for consumers. Municipalities often take on this role.
- 95 Rates are usually set based on cost of service. However, more innovative regulatory schemes such as Performance Based Rates or Regulation (PBR) have been used in various jurisdictions. This approach defines outcomes on a broad range of parameters and grades the utility's effectiveness at achieving them, resulting in penalties or rewards.

#### Private sector

- 96 A variety of public-private partnerships (P3s) have developed for the provision of infrastructure and services. Private sector involvement ranges from provision of discrete services to outright ownership and operation of complete systems. The various types of partnerships are: service contracts, management contracts, lease contracts, build-operate transfer contracts, concessions, design, build, finance and own, and build-operate-own contracts.

- 97 The public sector often can achieve several benefits from P3s including access to private investment capital, reduced operating and construction costs, and transfer of risk. In return, private partners seek adequate return on capital, minimal political risk, minimal compliance costs with regulation, and access to markets, sometimes as a springboard to other markets.
- 98 Canada has over 700 mostly small and medium-sized water and wastewater companies with annual revenues of approximately \$1.5 billion. Canada is recognized particularly for advanced disinfection technologies, physical and chemical treatment like membrane technology, biosolids management, specialized pumps, gates and valves, energy recovery systems, and instruments and monitoring.

### Structure

- 99 Water and wastewater services have typically been entirely owned and operated by the “state” or state-owned monopolies. These public utilities are typically focused on continuing to operate their own systems with limited growth aspirations.
- 100 Globally, opportunities for private sector firms have increased significantly in recent years. In many parts of the world investor-owned utilities provide water and wastewater services to hundreds of millions of people. They participate in the ownership, operation and maintenance of all or part of water and wastewater systems through direct ownership or service/outsourcing contracts. They invest capital in the systems they own and also in many of the assets they are contracted to operate.
- 101 The U.K. and France have the highest levels of private sector participation with large utility companies like Vivendi, Ondeo, Saur, Thames Water, United Utilities, and Kelda dominating the international market for water and wastewater services. The English and Welsh system and several major systems in the U.S. are fully privately-owned and operated. Thousands of other systems around the world are publicly-owned but operated or partially operated by the private sector.
- 102 Mergers and acquisition activities within the water and wastewater industry has seen the consolidation of ownership of investor-owned utilities as the larger utilities have acquired smaller ones and expanded internationally. Many of the large utilities have also become full service water and wastewater companies by acquiring engineering and construction firms and product suppliers.
- 103 Engineering and construction firms have traditionally been involved in the design and construction of components of water and wastewater systems such as treatment facilities. Several have recently taken on risk sharing roles within projects such as direct investment and operating and maintenance contracts.
- 104 There is a trend towards municipalities restructuring their utility operations to allow them to compete with the private sector or take advantage of outsourcing opportunities. For example, EPCOR, wholly owned by the City of Edmonton, competes against the private sector for contracts to operate water and wastewater systems for other municipalities inside and outside Alberta, primarily in Western Canada.
- 105 This is built on the perspective that utilities can operate more effectively and efficiently if they are more independent from government and adopt a more private sector management approach. This

allows them to better organize, plan, fund and administer their systems, while also removing the costs from the government’s books and often providing government with a regular dividend payment.

106 In Canada, direct involvement of the private sector in the ownership and management of municipal water supply and wastewater systems has been limited. To-date only a handful of operation contracts has been tendered and they have largely been won by restructured Canadian publicly owned utilities such as EPCOR and the Ontario Clean Water Agency (OCWA). Major private sector operators have not yet established a huge presence in Canada but a few do operate on a small scale, including US Filter Operating Services, CH2M Hill, Azurix, and American Water Works.

107 Another trend in Canada is the migration to regional service commissions. In Alberta, this has been facilitated by the Government of Alberta, which provides the framework and funding for regionalization. The goal is to better organize water and wastewater systems to reflect regional operating realities, achieve capacity alignment, allow all players to have a voice at the table, and take advantage of the benefits of more arms-length management.

Trends and drivers

<p>Increasing need for investment in water and wastewater infrastructure and technology</p>	<ul style="list-style-type: none"> <li>• Rising global demand for water</li> <li>• Scarcity of supply of water in many areas</li> <li>• Deteriorating quality of water resources</li> <li>• Age and inefficiency of existing water and wastewater infrastructure</li> <li>• Increasing stringency of water and wastewater standards and environmental regulations</li> </ul>
<p>Increasing role of the private sector in the provision of water and wastewater services</p>	<ul style="list-style-type: none"> <li>• Need for investment capital</li> <li>• Need for new and innovative technologies</li> <li>• Need for operating and management expertise</li> </ul>
<p>Consolidation of investors and suppliers in the water and wastewater sector</p>	<ul style="list-style-type: none"> <li>• Consolidation of small utilities within geographical markets (especially in the US)</li> <li>• International expansion of large investor-owned water and wastewater utilities</li> <li>• Consolidation of system management services through municipal outsourcing contracts</li> <li>• Vertical integration between water and wastewater utilities and related parties such as suppliers and engineering and construction firms</li> <li>• Convergence of water and wastewater utilities with power utilities</li> </ul>

### Canadian economy

108 The Table below summarizes the major social and economic indicators in Canada for the last three years as well as the forecasted indicators for 2008 and 2009.

For the years ended December 31	2005	2006	2007	2008 Forecast	2009 Forecast
Population (in millions)	32.353	32.688	33.047	33.311	NA
Real GDP Growth Rate % change	2.9%	3.1%	2.7%	0.5%	-0.2
Unemployment Rate %	6.8%	6.3%	6.0%	6.1%	6.8%
Consumer Price Index	108.0	109.80	112.4	114.9	NA
Consumer Prices % change	2.2%	2.0%	2.1%	2.7%	1.6%

109 The Canadian economy is expected to slow down but is expected to avoid a major recession. Trade has declined but has still remained relatively strong due to domestic demand. The credit crunch is also expected to have less of a negative impact in Canada than is expected in the United States.

110 In Canada, GDP growth has come to a near halt and is expected to be only 0.5% for 2008. Weakened demand from the U.S. and a relatively strong Canadian dollar had been driving down Canadian exports. Tighter credit markets are making it difficult for consumers to spend and for businesses to grow. Additionally, the housing market is beginning to slow, which will hurt domestic growth.

### North American economy

111 The Table below summarizes the major social and economic indicators in United States for the last three years as well as the forecasted indicators for 2008 and 2009.

For the years ended December 31	2005	2006	2007	2008 Forecast	2009 Forecast
Population (in millions)	295.9	298.8	301.6	304.2	NA
Real GDP Growth Rate % change	2.9%	2.8%	2.0%	1.4%	-0.7
Unemployment Rate %	5.1%	4.6%	4.6%	5.7%	7.1%
Consumer Price Index	195.3	201.6	207.3	216.6	NA
Consumer Prices % change	3.4%	3.2%	2.9%	4.4%	2.0%

112 The U.S. economy has been overwhelmed by the recent financial crisis. With stricter credit standards and heightened unemployment rates, consumer spending is set to fall for the first time since the early 1990's. Exports have provided some offset to the downturn, but with the economic slowdown spreading globally, exports should also expect to see a decline. GDP is forecast to decline with -0.7% growth in 2009, but there is expected to be a modest recovery late 2009.

113 Enhanced infrastructure investment and development has been targeted by Governments as one of the strategies pursued to stimulate their respective economies.

### Global economy

114 The worldwide credit crunch has seen the flow of capital between countries diminish, especially in the emerging industrialized countries such as China, Brazil and India. The weakened global economy has caused consumers in emerging markets to ease their spending of manufactured products. Less access to funding combined with the rise in crude oil will mean lower overall global export growth. The U.S has already slipped into a recession, and indications are that several EU and Asian countries may soon follow. Worldwide GDP grew 4.8% in 2007, but is forecasted to grow by just 3.7% in 2008 and 2.9% in 2009.

## EPCOR History and Background

### Ownership

115 EPCOR Utilities Inc.'s sole shareholder is the City. The company is governed by an independent Board of Directors.

### History

116	<b>1891</b>	The Edmonton Electric Lighting and Power Company begins operations.
117	<b>1902</b>	Edmonton Electric Lighting and Power becomes the first municipally owned electric utility in the country.
118	<b>1903</b>	Edmonton Electric Lighting and Power builds the City's first water treatment plant at Rossdale and a distribution system. A new electricity plant is also built at Rossdale.
119	<b>1913</b>	A high lift, low lift pump house is built and two water intakes with 900m pipes are constructed.
120	<b>1933</b>	Edmonton's first traffic light is installed.
121	<b>1947</b>	The Rossdale #1 Water Treatment Plant is commissioned. Underground electricity lines are installed in downtown Edmonton to form the Network Distribution System.
122	<b>1955</b>	The Rossdale electricity plant switches from coil-fired to gas-fired boilers.
123	<b>1956</b>	The Rossdale #2 Water Treatment Plant is commissioned.
124	<b>1967</b>	The Rossdale #3 Water Treatment Plant is commissioned and fluoridation begins.
125	<b>1970</b>	Edmonton Power is formed by combining the electrical distribution and power plan departments of the City.
126	<b>1976</b>	Another water treatment plant (E.L. Smith) is opened. The Clover Bar Generating Station is commissioned.
127	<b>1989</b>	The Genesee Unit 1 electricity generating station becomes operational.
128	<b>1994</b>	The Genesee Unit 2 electricity generating station becomes operational.
129	<b>1996</b>	Edmonton Water is incorporated as a separate legal entity, renamed Aqualta Inc., and begins managing the City's Water Branch assets.

130		EPCOR Utilities Inc. is formed by combining the operations of Edmonton Power, Aqualta and Eltec (a commercial electrical service operation). This is the first merger of natural gas, power and water utilities in Canada.
131	1998	The legal title to Aqualta's assets is transferred to EPCOR for \$1.00.
132	1999	Aqualta becomes EPCOR Water Services.
133	2000	The water softening process is stopped in order to meet enhanced water quality regulations.
134	2001	A universal brand name, EPCOR, is introduced.
135	2003	UV disinfection is added to the Rosedale Water Treatment Plant.
136	2005	EPCOR acquires privately-owned White Rock water utility in British Columbia. The Genesee Unit 3 electricity generating station becomes operational. EPCOR Power L.P. launches.
137	2006	The Britannia Mine Water Treatment Plant begins operations. The Genesee Unit 3 electricity generating station becomes operational (in partnership with TransAlta Corporation). EPCOR completes and begins operating a wastewater and collection treatment system for the District of Sooke on Vancouver Island.
138	2007	Construction begins on Keephills 3, a supercritical coal-fired electricity generating unit west of Edmonton (in partnership with TransAlta Corporation).

### Growth strategy

139 EPCOR builds, owns and operates power plants, electrical transmission and distribution networks, water and wastewater treatment facilities, and infrastructure in Alberta, British Columbia and Ontario. They also provide energy and water services to residential and commercial customers. Through its investment in EPCOR Power L.P., it also has electricity generation operations in: California, Colorado, New Jersey, New York State, North Carolina, Washington State and Indiana.

140 EPCOR's business strategy is delivered through an integrated structure with a portfolio of regulated and competitive businesses. They intend to maintain a base in regulated wires and water businesses and grow commercial electricity and water operations.

141 As water demand continues to increase, EPCOR anticipates increased requirements for better water and wastewater management practices. In North America, there are significant water infrastructure upgrade requirements which provide growth opportunities.

142 Potentially affecting growth is the increase in volume and intensity of environmental policy development and discussion across North America and around the world. Recently, Canadian federal and provincial governments have taken strong environmental and fiscal positions. New stringent emission standards will evolve and could have a material impact on EPCOR’s operations.

**Organizational structure**

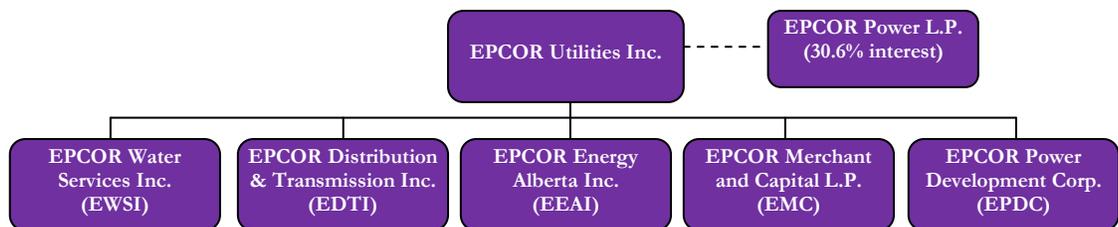
143 Governance – EPCOR’s Board of Directors is appointed by its Shareholder, the City of Edmonton. The Board operates independently of the Shareholder with the full authority to make strategic business decisions. There are no employees or elected representatives of the City on the Board. The Board is led by an independent Chairman and Directors. Twelve of the thirteen Directors are independent. The Board approves the goals of the business and the objectives and policies within which it is managed, and evaluates management’s performance. The selection, assessment and evaluation process for Directors uses an independent consultant and a skills matrix to provide an outside perspective and objective assessment. Oversight and risk management practices include establishing a special Board committee to oversee development of a large capital project.

144 Current members of the EPCOR’s Board of Directors are:



**Corporate structure**

145 EPCOR Utilities Inc. is the parent of several subsidiary companies:



- 146 *EPCOR Water Services Inc.* provides water and wastewater services to the Greater Edmonton Region and to communities and industry across Western Canada.
- 147 *EPCOR Distribution & Transmission Inc.* operates electric power transmission systems, controls the transmission of electricity (i.e. regulating voltages) and distributes it to consumers.
- 148 *EPCOR Energy Alberta Inc.* provides regulated rate option (RRO) electricity service to residential, farm and small commercial business consumers within the City of Edmonton, the FortisAlberta service area, the Town of Ponoka, and applicable FortisAlberta Rural Electrification Associations (REAs). It also provides default supply electricity service to consumers in the City, the Town of Ponoka, and in the Fortis Alberta service area, and customer care (including call center and billing services) for EPCOR companies (including water, natural gas, and electricity).
- 149 *EPCOR Merchant and Capital L.P.* buys and sells electricity and natural gas to manage EPCOR's energy positions. It also markets energy-related products and services to mid-market and large industrial customers across North America. EMC provides electricity services to all EPCOR customers who have signed a contract.
- 150 *EPCOR Power Development Corporation* is responsible for operating power generation with a gross capacity of more than 3,400 MW. Located in Canada and the United States, the facilities owned by EPCOR and EPCOR Power L.P. generate power from renewable sources; wind, small hydro, biomass, landfill gas, and waste heat recovery (wood chips, discarded tires).
- 151 EPCOR Utilities Inc. owns a 30.6% interest in *EPCOR Power L.P.*, a publicly traded limited partnership organized under the laws of the province of Ontario, which owns and operates 20 electrical generation facilities in Canada and the United States. The general partner, EPCOR Power Services Ltd. is responsible for transacting business on behalf of the Partnership.

## Customers

### *Water and wastewater*

- 152 EPCOR designs, builds, operates and finances water and wastewater facilities, working in partnership with governments, municipalities and industrial clients. They provide water and wastewater services to over one million people in more than 50 communities.
- 153 EPCOR owns four water treatment plants (Rossdale and E.I. Smith in Edmonton, and French Creek and White Rock in British Columbia) and operates 16 other water treatment and distribution facilities in Alberta and British Columbia. In these provinces, it also operates 19 wastewater treatment and collection facilities.

### *Power generation*

- 154 EPCOR develops, constructs, owns, and operates power generation facilities across North America. They are responsible for operating power generation with a gross capacity of more than 3,400 MW and generate electricity from coal, natural gas, and renewable sources such as wind, small hydro, biomass, and landfill gas. Power is also produced from co-generation and recycled heat and power.

*Electricity distribution and transmission*

155 EPCOR owns and operates high voltage substations and voltage transmission lines which form part of the Alberta interconnected electric system, and are situated primarily within the City. Energy is distributed through eight distribution substations, 284 distribution feeders and approximately 5,000 kilometers of primary distribution lines.

156 In 2007 EPCOR distributed approximately 12% of provincial energy consumption to more than 300,000 residential and commercial customers in the city.

*Energy Services*

157 In Alberta, EPCOR provides regulated rate electricity service to more than 600,000 residential, farm and small commercial business customers. Call centre and billing services are available to third-party competitive retailers and other utilities.

158 Custom products – Through various subsidiaries, EPCOR offers integrated product and service solutions to customers in Alberta, including the provision of power and natural gas combined with energy pricing options, energy efficiency services, supply options, and other retail and wholesale services. Their water products and services are concentrated in three areas – retail water sales, wholesale water sales, and commercial services.

**Financial Overview:**

159 The EPCOR Utilities Inc. 2007 Annual Report highlighted the following for year ended December 31, 2007:

- a. EPCOR delivered its seventh straight increase to its annual dividend to the Shareholder.
- b. Total assets have increased 56% from 2004 to 2007.
- c. Shareholder's Equity has increased 40% from 2004 to 2007.
- d. Revenues have increased from \$2.5 billion in 2004 to \$3.7 billion in 2007.
- e. Total net income from continuing operations has increased 51% from 2004 to 2007.
- f. Debt as a percentage of equity was 42% in 2007, previously was 44% in 2004 through 2006.
- g. Cash flow from operations was \$517 million in 2007.
- h. Planned capital expenditures for the 2008 fiscal year are \$800 to \$900 million.
- i. The Water business segment of Epcor Utilities Inc. had its best year ever in 2007; with a high level of operational and financial performance.
- j. The majority of Water Services' income is earned through a performance based rate tariff charged to its Edmonton customers.

- k. The key to maintaining earnings levels on water sales is to provide sufficient quantities of high quality water while controlling costs.
- l. Revenues from the Water services segment increased to \$264 million from \$204 million in 2006, while operating income from this segment increased to \$59 million from \$44 million.
- m. Water sales in 2007 were 124,696 megalitres, down from 125,106 megalitres in 2007.
- n. At December 31, 2007, Epcor owned four water treatment facilities and operated an additional sixteen in Alberta and British Columbia; EPCOR operates nineteen wastewater treatment and collection facilities.

160 The EPCOR Utilities Inc. Quarterly Financial Statements for the period ended September 30, 2008 highlighted the following:

- a. Total revenues for the nine-month period ended September 30, 2008 were \$2.6 billion compared to \$2.7 billion in 2007.
- b. Net income before income taxes and non-controlling interests was \$161 million compared to \$215 million for the same period in 2007.
- c. Current assets at September 30, 2008 were \$842 million and consisted primarily of accounts receivable, cash and cash equivalents, and derivative instruments assets.
- d. Long term assets of \$5.948 billion consisted primarily of \$4.5 billion in Property, Plant and Equipment, as well as Power Purchase Arrangements, \$185 million in goodwill, and various other long term assets.
- e. Total assets of \$6.8 billion at September 30, 2008, which is an increase from total assets of \$6.6 billion at December 31, 2007.
- f. Current liabilities were \$1.0 billion at September 30, 2008, compared to \$1.4 billion at December 31, 2007, consisting of accounts payable, short-term debt, and derivative instrument liabilities.
- g. Long-term debt at September 30, 2008 was \$2.34 billion, an increase from \$1.8 billion at December 31, 2007.
- h. Total liabilities at September 30, 2008 were \$3.7 billion, a decrease from the 3.8 billion at December 31, 2007.
- i. Non-controlling interests of \$664 million at September 30, 2008 consisted of \$542 million invested in units of Power LP as well as \$122 million of preferred shares issued by subsidiaries.
- j. Water services revenues for the nine month period were \$226 million, an increase over the total of \$174 million for the same period in 2007.

- k. Water services revenues made up approximately 8.6% of total Epcor Utilities Inc. revenues for the nine-month period.
- l. Operating income for the water services segment for the nine month period was \$48 million, compared to \$46 million for the same period in 2007.
- m. Capital expenditures for the nine month period totalled \$465 million, \$50 million of which was spent in the water services segment. During the same period in 2007 \$82 million in capital expenditures was spent in the water services segment.

161 The EPCOR Utilities Inc. 2007 Annual Report also contained the following future oriented information for EPCOR and the water services segment:

- a. EPCOR operates in markets where there are substantial infrastructure gaps, due to water systems challenged by growing populations, declining infrastructure and inadequate watershed protection practices.
- b. In 2007 the Canadian Federation of Municipalities and McGill University estimated that \$31 billion is required to close the infrastructure gap in Municipal water and wastewater systems. This scale suggests strong growth prospects for water and wastewater infrastructure across North America.
- c. EPCOR plans to invest \$4 billion in new power and water infrastructure over the next five years (including 2008). Of this total, \$3 billion pertains to power generation and related infrastructure and \$1 billion is planned for new water and wastewater facilities.

#### Regulatory environment

162 EPCOR operates in a complex legal environment under the authority of federal, provincial, state, local and common law, and including regulations and permitting requirements in Canada and the United States.

163 Water – EPCOR’s water treatment plants in Alberta are regulated by Alberta Environment under an Approval-to-Operate. It lays out record keeping, analytical, construction and upgrading, operational, quality, monitoring and reporting, and reclamation and decommissioning requirements. Failure to adhere to the Approval-to-Operate can lead to fines and suspension of plant operations.

164 EPCOR’s water treatment and distribution services to customers within the City are rate-regulated by City Council pursuant to a performance based rates (PBR) bylaw, found in the City’s Waterworks Bylaw. The Bylaw was renewed on July 4, 2006 and extends to 2011. Rates approved under this bylaw are intended to allow EPCOR to recover operating costs and earn a return on equity, as well as to provide an incentive to manage cost increases below inflation. If the performance targets outlined in the bylaw are achieved, water rates are increased by the change in the rate of inflation less an efficiency factor.

165 Rates for water sales to regional water commissions that supply water to communities surrounding Edmonton are regulated by the Alberta Utilities Commission “AUC” on a complaints-only basis,

whereby such communities may apply to the AUC to resolve disputes related to rates, tolls or charges determined by EPCOR. EPCOR sets the rates it charges to these regional water commissions to recover related operating and capital costs plus a reasonable rate of return.

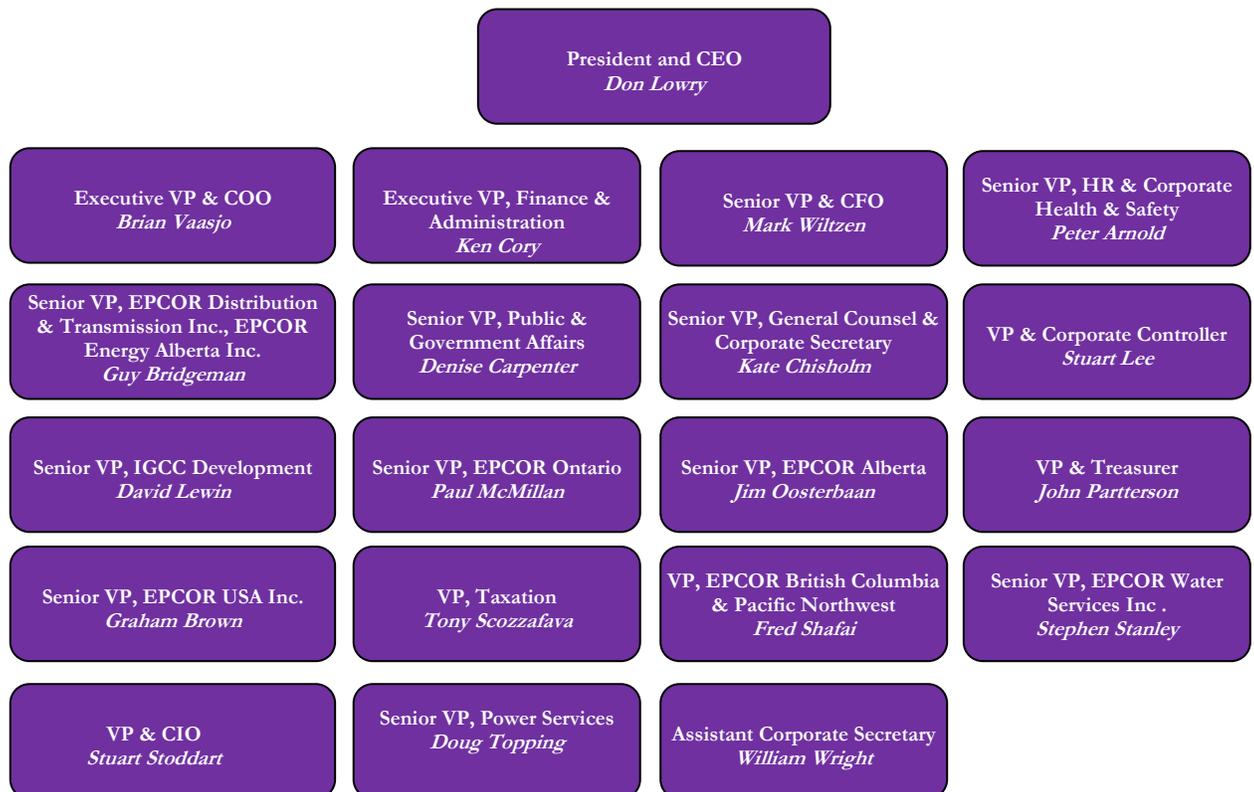
**Electricity**

166 In Alberta, the AUC, a quasi-judicial independent agency established by the Government of Alberta, is responsible for ensuring that delivery of Alberta's utility service takes place in a manner that is fair, responsible and in the public interest. It regulates investor-owned natural gas, electric, and water utilities, and certain municipally owned electric utilities to ensure that customers receive safe and reliable service at just and reasonable rates. It responds to customer inquiries and complaints respecting utility matters and ensures that electric facilities are built, operated, and decommissioned in an efficient and environmentally responsible way. It also provides regulatory oversight of issues related to the development and operation of the wholesale electricity market in Alberta as well as the retail gas and electricity markets in the province.

167 EPCOR files applications with the AUC for electricity distribution and transportation tariffs and the regulated rate tariff (“RRT”). The AUC sets rates intended to permit regulated distribution and transmission businesses to recover their estimated costs of providing service and a fair rate of return on investment in distribution and transmission.

**Key management**

168 Key members of EPCOR’s management team are:



## Valuation Methodologies – Plant

169 Estimates of fair value are generally prepared on the basis of an asset-based approach or an earnings and/or cash-flow approach. Earnings and/or cash-flow approaches are appropriate when the business is considered a viable going concern and purchasers would value it on the basis of its stream of earnings and/or cash-flow. Valuations based on underlying asset values are used for businesses that the going concern outlook may be uncertain or for real estate and investment holding companies where their worth is solely the tangible assets they hold.

170 After reviewing the financial performance and discussions with management, we applied the discounted cash-flow technique (“DCF”) as our primary valuation approach to determining fair value of the Company (see Schedule 1). The following is a synopsis of the principal valuation techniques we employed in our fair value estimate of the Plant.

### **Market approach**

171 The market approach to valuing the Plant is driven by two forms of analysis:

- i an analysis of comparable public company trading multiples and
- ii a review of precedent transaction multiples.

172 The market approach is a variation of an earnings-based technique, where the Plant’s EBITDA is multiplied by a public company multiple derived from the analysis of comparable public companies or comparable precedent transactions. We reviewed information from various public companies operating in the wastewater treatment industry and derived a list of companies who either compete directly with, or share similar attributes with the Plant.

### **Discounted cash-flow approach (DCF)**

173 DCF is an earnings-based valuation technique. It views the collection of business’ assets as a stream of future earnings arising from its ability to generate revenue from its unique assembly of physical, monetary and human resources, and its customer base. The fair market value of this earnings’ stream is determined by applying a weighted average cost of capital or “WACC”, as calculated below in the market section, to the debt free, discretionary cash-flow. The aggregate of the discounted cash-flow and the capitalized terminal year cash-flow results in a value for the

business assets or the enterprise value. The fair value of equity can then be determined by deducting the interest bearing debt on the balance sheet at the Valuation Date.

### **Projections**

174 Management prepared a projection for the Sanitary Utility on an overall basis. The forecasts were based on the 2007 actual numbers. O & M expenses are increased with inflation each year, based on the nature of each cost (i.e. salaries based on union agreements, materials based on inflation, etc.). Then items are increased for specific costs beyond inflation, and then increased for growth. Inflation rates are provided by the corporate department of the City (“Corporate”), based on the latest economic indicators. This detailed forecasting was done for 2008 to 2010, for years after this, the weighted average annual increase is applied. The debt cost forecast is based on the amount that is estimated to be required to finance future capital. The rates again are provided by Corporate based on information provided by the Alberta Capital Finance Authority. Revenue is based on growth rates of customers expected from prior year and a rate increase approved by the City or estimated rate increases.

175 For the 2008 projections the allocation was based on the October 31, 2008 Balance Sheet allocation of assets and liabilities and the Drazen Report allocations which were similar to the allocation of the 2007 actual income statement.

176 Management allocated the sanitary utility projections for 2009 to 2020, on the same basis as the 2008 projection allocation between the divisions, with the exception of the utility revenue, which was based on the assumptions outlined in Appendix A.

177 We have reviewed the projections provided by management and our estimate of fair market value has necessarily been based on these projections which, in turn, were based on the aforementioned assumptions. Some assumptions may not materialize as unanticipated events and circumstances may or may not occur subsequent to the date of this report. Furthermore management may make decisions which are different from the assumptions made during the projection period. Therefore the actual results achieved during the projection period may or may not be materially different from the projections.

178 We calculated a terminal year, based on the last year of the Drainage forecast.

### **Income taxes**

179 The City and the majority of market participants are non-taxable entities. As a result income taxes have been excluded from this analysis.

### **Working capital requirements**

180 Historically, as revenues increase, so too does the working capital requirements. As such, we assumed, into perpetuity, that working capital will be approximately 6.7% of revenues. This results in an annual cash requirement for working capital that is deducted from the net debt free cash-flows.

**Sustainable capital reinvestments**

181 Management has prepared a detailed capital budget for all years in the forecast based on amounts required to maintain existing assets and to fund projected growth.

**Enterprise Value**

182 Once we have included working capital asset requirements, we arrive at the estimated maintainable discretionary cash flow. We then apply the nominal discount rate, based on the WACC (see discussion below) to determine the present value of the cash flows. The terminal year cash flows are then capitalized by capitalization rates to derive an aggregate of present values. As there are no redundant assets and tax asset adjustments to be made, the sum of the terminal value is added to the present value of after tax debt free cash flows to derive an Enterprise Value of \$263 to \$282 million.

**Equity value**

183 From the enterprise value, we subtract the outstanding debt at the Valuation date of \$140 million to arrive at the fair value of the equity. The fair value of the equity was determined to be in the range of \$123 to \$143 million.

**Market approach**

184 Our review of public company comparables is based on a group of ten public companies.

185 The list is comprised of six US based companies and four companies that operate primarily in the United Kingdom.

186 Each of the companies that make up the comparable set derive substantially all of their revenue and profitability from the provision of water and wastewater services to retail, industrial and/or residential customers in the communities and geographies in which they operate. As such they are the most appropriate measures.

187 The figure below lists and describes each of the companies that make up the peer group for the purposes of our market valuation approach.

Figure 1: Public Company Comparable Descriptions

American Water Works Company, Inc.	American Water Works Company, Inc. engages in the provision of water and wastewater services to residential, commercial, and industrial customers in the United States and Canada. It offers its services in approximately 1,625 communities in 20 states of the United States and Ontario, Canada. The company also enters into public/private partnerships, including operation and maintenance contracts; and design, build, and operate contracts for the provision of services to water and wastewater facilities for municipalities, the United States military, and other customers. In addition, it designs, builds, and operates smaller-scale water and wastewater treatment plants for real estate developers, industrial companies, and new or expanding communities; and provides services to domestic homeowners to protect against the cost of repairing broken or leaking pipes inside and outside their homes. The company was founded in 1886 and is based in Voorhees, New Jersey. American Water Works Company, Inc. was a subsidiary of RWE Thames Water PLC., now it operates as a subsidiary of RWE Aqua Holdings GmbH, a subsidiary of RWE AG.
Aqua America Inc.	Aqua America, Inc. operates as the holding company for regulated utilities that provide water or wastewater services in the United States. It serves residential, commercial, fire protection, industrial, and other water and wastewater customers in Pennsylvania, Ohio, North Carolina, Illinois, Texas, New Jersey, New York, Florida, Indiana, Virginia, Maine, Missouri, and South Carolina. The company also provides water and wastewater services through operating and maintenance contracts with municipal authorities and other parties, and septage hauling services, close to its utility companies' service territories. As of December 31, 2007, it served approximately 3 million customers. The company was founded in 1968 and is based in Bryn Mawr, Pennsylvania.
Middlesex Water Co.	Middlesex Water Company owns and operates regulated water utility and wastewater systems in New Jersey and Delaware. It engages in collecting, treating, distributing, and selling water for domestic, commercial, municipal, industrial, and fire protection purposes. The company also operates water and wastewater systems under contract on behalf of municipal and private clients. Middlesex Water Company treats, stores, and distributes water for residential, commercial, industrial, and fire prevention purposes, as well as provides water treatment and pumping services; provides treated surface water under long-term agreements; offers residential customers a service line maintenance program that covers various parts, material, and labor required to repair or replace specific elements of the customer's water service line and customer shut-off valve in the event of a failure; and provides various wastewater services. As of December 31, 2007, the company provided water services to approximately 59,400 retail customers, primarily in central New Jersey, as well as to approximately 31,600 retail customers in New Castle, Kent, and Sussex Counties in Delaware; and wastewater services to approximately 1,400 residential retail customers in Delaware. It also served 5,100 customers in Kent and Sussex Counties through 62 operations and maintenance contracts. The company was founded in 1897 and is headquartered in Iselin, New Jersey.
California Water Service Group	California Water Service Group, through its subsidiaries, provides water utility and other related services in California, Washington, New Mexico, and Hawaii. It engages in the production, purchase, storage, treatment, testing, distribution, and sale of water for domestic, industrial, public, and irrigation uses, as well as for fire protection. The company also provides non regulated water-related services, including operation of water and recycled water systems; meter reading and billing services; sewer and refuse billing services; lab services for water quality testing; and repair services for water lines, as well as leasing of antenna sites to telecommunication companies. As of December 31, 2007, California Water Service Group provides service to approximately 463,600 customers in 83 communities. The company was founded in 1926 and is headquartered in San Jose, California.

Southwest Water Co.	Southwest Water Company provides water, waste water, and public works services principally in the United States. Its services include water and wastewater system management; construction management of water and wastewater systems; water and wastewater certified laboratory services; pipeline inspections; refurbishment of manholes and sewer lines; water meter replacement; non-regulated wholesale water sales; wastewater treatment services; and municipal public works management and/or services. It operates in two groups, Utility and Services. The Utility group owns public water and wastewater utilities in Alabama, California, New Mexico, Oklahoma, Texas, and Mississippi. This group principally engages in the production and distribution of water, and the collection and treatment of sewage for residential, business, industrial, and public authority use. The Services group operates and maintains water and wastewater facilities owned by cities, public agencies, municipal utility districts, private entities, and investor-owned utilities. It operates primarily in Alabama, California, Colorado, Georgia, Mississippi, New Mexico, South Dakota, and Texas. This group also facilitates the design, construction, project management, and operating aspects of various water and wastewater projects. The company was founded in 1954 and is based in Los Angeles, California.
Artesian Resources Corp.	Artesian Resources Corporation, through its subsidiaries, distributes and sells water to residential, commercial, industrial, governmental, municipal, and utility customers in the state of Delaware. It also provides water for public and private fire protection to customers in its service territories. In addition, the company designs and builds water and wastewater infrastructure and provides contract water and wastewater services. As of December 31, 2007, Artesian Resources Corporation had approximately 75,100 metered customers and served a population of approximately 250,000. It served customers through approximately 1,086 miles of transmission and distribution mains. The company was founded in 1905. It was formerly known as Artesian Water Company and changed its name to Artesian Resources Corporation in 1984. Artesian Resources Corporation is headquartered in Newark, Delaware.
Northumbrian Water Group PLC	Northumbrian Water Group PLC, together with its subsidiaries, provides water and waste water management services in the United Kingdom. It engages in collecting, treating, and supplying drinking water in the south east of England; and collecting, treating, and disposing sewage and sewage sludge in the north east of England. The company also provides holiday accommodation, conferencing, recreation, and fishing facilities, as well as undertakes a range of searches for new homeowners relating to water and waste water connections, contaminated land, flooding, and planning applications. In addition, it provides analytical laboratory and scientific services, including sampling and analysis of air quality, contaminated land, water, and waste water in sites. The company provides water and sewerage services under the Northumbrian Water brand name; and water services under the Essex & Suffolk Water brand name. As of March 31, 2008, it served 2.6 million people with water and sewerage services; and 1.8 million people with water services. Further, Northumbrian Water Group offers assistance for design and implementation of projects in the framework of international co-operation and partnership agreements; and plant and vehicle leasing services. The company is headquartered in Durham, the United Kingdom.
United Utilities Group PLC	United Utilities Group PLC, through its subsidiaries, owns and operates water and wastewater assets primarily in the United Kingdom. It involves in the removal and treatment of wastewater from, and the treatment and distribution of approximately 1.9 billion liters of water a day to 3.2 million homes and businesses. The company also operates and maintains electricity and gas distribution networks, as well as installs and maintains gas and electricity meters. In addition, it owns land and property assets. As of March 31, 2008, the company owned and managed assets, including 582 wastewater treatment works; 43,419 kilometres of sewers; 1,826 pumping stations; 143 detention tanks; 2,275 combined sewer overflows and 375 emergency overflows; and 42 sludge treatment facilities. It also owned, operated, and managed water network assets, which include 137 operational and 1 emergency impounding reservoirs and associated catchments; 95 operational and 5 emergency water treatment works; 450 service reservoirs and water towers storing treated water; 609 pumping stations; and 42,219 kilometres of clean water mains. The company was founded in 1989 and is headquartered in Warrington, the United Kingdom.

Severn Trent PLC	Severn Trent PLC and its subsidiaries engage in the supply of water, and treatment and disposal of sewage primarily in the United States, United Kingdom, and Europe. The company develops various technologies and products focused on disinfection, filtration, arsenic removal, ballast water treatment, and metering. It operates and maintains water and waste water treatment plants. The company also offers various analytical services, including environmental water testing primarily in the United Kingdom. In addition, it provides various services and products associated with water, waste water, and contaminated land; and offers water and waste water solutions to various utilities and corporate clients. As of March 31, 2008, it provided drinking water to approximately 7.4 million people, as well as offered sewerage services to approximately 8.5 million people in the Midlands and mid Wales. Severn Trent Plc was founded in 1974 and is headquartered in Birmingham, the United Kingdom.
Pennon Group PLC	Pennon Group PLC, through its subsidiaries, provides water and sewerage services in Devon, Cornwall, Dorset, and Somerset, the United Kingdom. The company serves a region of 10,300 square kilometers with 1.65 million residents and approximately 8 million annual visitors. It supplies 440 million liters of treated water per day through 15,015 kilometers of water mains, as well as disposes approximately 250 million liters of waste water per day through 9,178 kilometers of public sewers. The company also engages in the waste management and renewable energy businesses in the United Kingdom. Pennon Group's waste management services include waste treatment, recycling, and landfill disposal. It recycles and generates electricity from landfill gas, as well as operates materials recycling facilities, waste transfer stations, treatment plants, household waste recycling sites, and composting facilities. The company is headquartered in Exeter, the United Kingdom.

*Source: Capital IQ*

- 188 American Water Works and Aqua America are the two largest companies in North America. American Water services more than 15.6 million customers in 32 states across the US and in the province of Ontario. American Water Works went public through an initial public offering in April 2008. Aqua America services 3 million customers in 13 states in the Midwest, east coast and Texas. Both businesses operate primarily as regulated utilities. Only a small percentage of the revenue comes from non-regulated activities.
- 189 The two largest companies in the UK are United Utilities and Severn Trent. In addition to its water business, United Utilities also operates and maintains electricity and gas networks and installs and maintains gas and electricity meters. While the company does not segment its financial results it appears that the majority of the company's revenue is related to the treatment and distribution of water, therefore we have deemed it to be comparable for the purposes of our valuation analysis. Severn Trent is slightly smaller than United Utilities and is also focused on the treatment and distribution of water. In addition, Severn Trent has significant operations in the US through its subsidiary, Severn Trent Services.
- 190 The table below displays the key market trading metrics for each of the comparables. All market data is based on the closing values of October 31, 2008.

Figure 2: Peer Group Comparables

Company Name	Exchange	Share Price (Trading Currency)	Market Cap. (USD)	TEV (USD)	P/E (LTM)	EV/EBITDA (LTM)	Revenue (USD)	EBITDA %	Debt/ EBITDA	Debt/ Capital
American Water Works Company, Inc.	NYSE	21.10	3,374.1	8,488.7	20.4x	10.5x	2,322.2	34.8%	6.3x	60.0%
Aqua America Inc.	NYSE	19.80	2,672.2	3,979.9	26.4x	12.7x	616.2	49.2%	4.4x	33.2%
Middlesex Water Co.	NasdaqGS	17.30	231.3	386.6	21.1x	11.8x	90.8	36.4%	4.7x	40.1%
California Water Service Group	NYSE	45.20	936.8	1,258.8	19.7x	9.4x	396.1	29.9%	2.8x	26.3%
Southwest Water Co.	NasdaqGS	3.50	86.6	276.5	34.9x	13.1x	222.4	13.2%	6.6x	69.9%
Artesian Resources Corp.	NasdaqGM	14.60	107.5	229.4	16.2x	10.0x	54.8	38.1%	6.0x	54.3%
<b>Average (North America)</b>					<b>23.1x</b>	<b>11.3x</b>		<b>33.6%</b>	<b>5.1x</b>	<b>47.3%</b>
Northumbrian Water Group plc	LSE	2.50	1,905.2	5,161.9	15.3x	9.9x	1,331.9	57.2%	6.4x	50.1%
United Utilities Group PLC	LSE	5.90	7,761.1	14,940.5	20.9x	9.7x	4,725.3	39.1%	5.0x	39.6%
Severn Trent plc	LSE	11.10	3,882.0	9,052.7	19.7x	10.1x	3,084.1	46.0%	5.7x	44.8%
Pennon Group plc	LSE	4.70	2,444.6	5,134.0	19.7x	9.8x	1,738.4	42.6%	5.7x	41.2%
<b>Average (Europe)</b>					<b>18.9x</b>	<b>9.9x</b>		<b>46.2%</b>	<b>5.7x</b>	<b>46.2%</b>
<b>Simple Average</b>					<b>21.4x</b>	<b>10.7x</b>		<b>38.7%</b>	<b>5.4x</b>	<b>45.9%</b>
<b>Weighted Average (75% NA/25% UK)</b>					<b>22.1x</b>	<b>10.9x</b>		<b>36.8%</b>	<b>5.3x</b>	<b>47.0%</b>

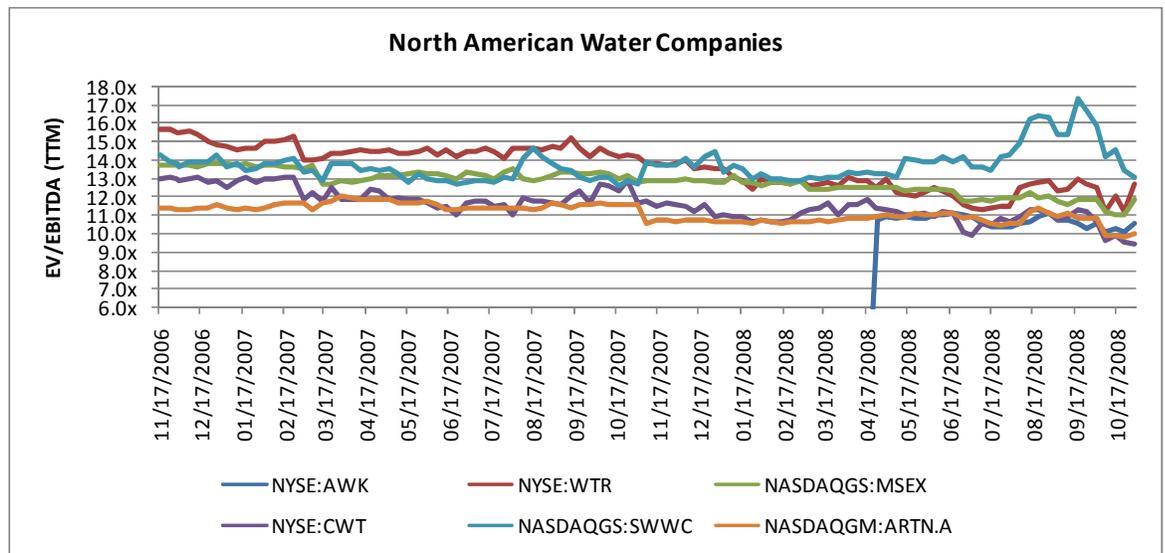
Source: Capital IQ

191 The water companies in North America are currently trading at a stronger valuation than its counterparts in the UK. The average EV/EBITDA multiple (LTM) for the North American peer group is 11.3x EBITDA. This compares to an average of 9.9x for the companies in the UK. The difference in valuation is a reflection of the differences between the two marketplaces. This gap in valuation between the North American and UK companies has remained stable historically.

192 Historically, among the North American peer group Aqua America and Southwest Water Co. have attracted the highest valuations. Over the past two years the average EV/EBITDA multiple for Aqua America and Southwest Water have been 13.6x and 13.7x, respectively. The average valuation for the six North American companies in the peer group for the two year period examined (ending October 31, 2008) was 12.5 times EBITDA, an 11% premium to current levels. Figure 3 shows the historical trend in valuation for the North American peers over the past two years.

193 Overall valuations have come under pressure in light of economic and market conditions. Specifically, the weakness in new housing development and construction is expected to have a significant impact on the operations of water utility companies in North America. This appears to be a key driver behind the decline in valuations. Southwest Water Co. has experienced the most dramatic decline in its valuation due to having missed a reporting deadline for its Q3/08 results.

Figure 3: Relative TTM EV/EBITDA Valuation (weekly: November 10, 2006 – October 31, 2008)

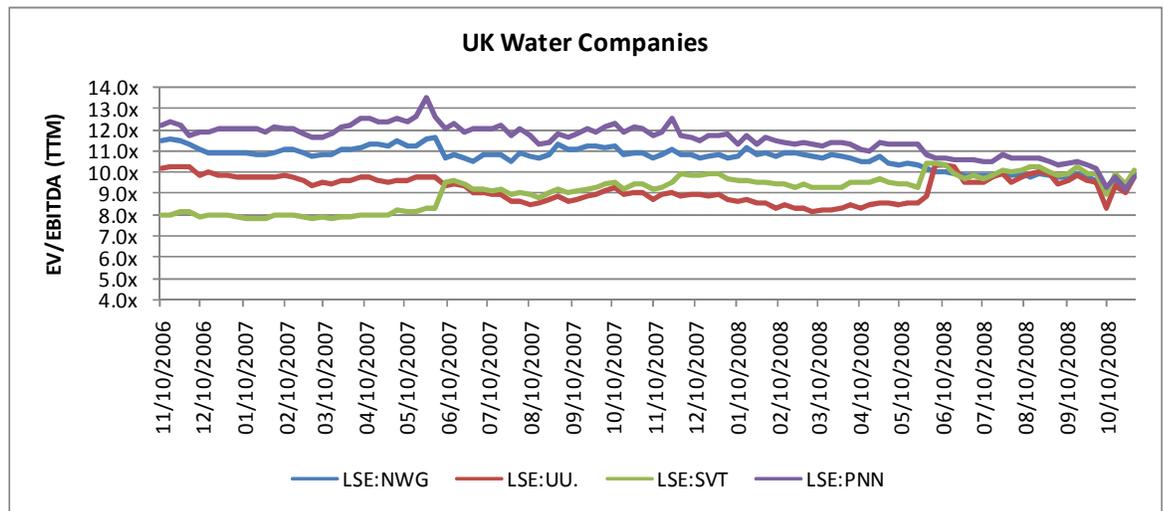


Source: Capital IQ

194 The UK companies in the peer group have attracted lower overall valuations than the North American companies. Currently the UK companies are trading within a very narrow trading range with a multiple range of 9.7x to 10.1x EBITDA. There has been a convergence in the valuation of these companies with very little distinction between them over the past four months. This is illustrated in figure 4 below. Historically, Pennon Group has attracted the strongest valuation with an average EV/EBITDA of 11.5x. This compares to an average of 10.6x for Northumbrian Group, 9.2x for United Utilities and 9.1x for Severn Trent.

195 The average valuation for the four companies in aggregate over the past two years was 10.1x, a 2% premium to current valuations. Figure 4 shows the historical trend in valuation for the European companies in the peer group.

Figure 4: Relative TTM EV/EBITDA Valuation (weekly: November 10, 2006 – October 31, 2008)



Source: Capital IQ

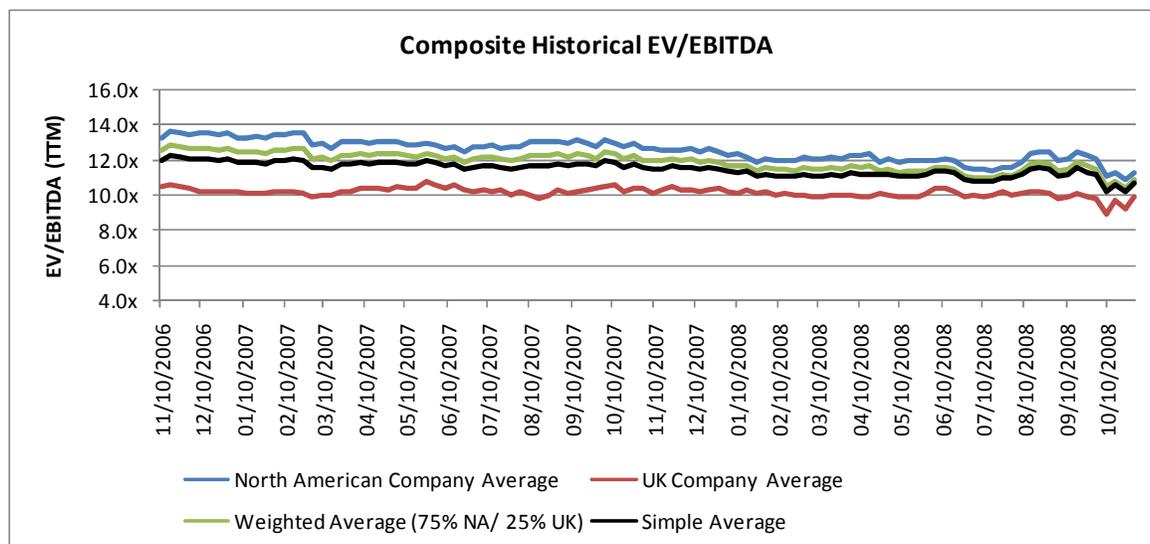
196 As illustrated by the charts above, valuations in North America have displayed a greater degree of volatility than those in the UK. The standard deviation of valuations of North American companies ranged from 0.5x to 1.2x (AWK was excluded due to its recent IPO). In the UK, the standard deviation of the valuation multiples ranged from 0.5x to 0.8x.

197 Figure 5 shows the historical trend in the valuations for the composites of the North American peer group, the UK peer group as well as the simple average for the whole peer group and a weighted average for the entire peer group (75% North America, 25% UK).

198 The average for the North American group is 12.5x EBITDA and the average for the UK group of companies is 10.1x EBITDA. The simple average valuation for all of the ten companies over the past two years is 11.5x EBITDA versus 11.9x using a weighted average with greater emphasis on the businesses in North America.

199 The current average valuations are at a discount to the historical average valuations discussed in the previous paragraph. These discounts range from as low as 2% in the UK to 10% for the North American companies and the weighted average calculation. This appears to be consistent with the lower level of valuations in the UK and the lower degree of volatility displayed in that market. The current discounted valuations are a reflection of the current weakness in financial markets around the globe. The magnitude of the discounts can likely be viewed as a reflection of the relative risk associated with the different markets.

Figure 5: TTM EV/EBITDA Valuation of Peer Group Averages (weekly: November 10, 2006 – October 31, 2008)



Source: Capital IQ, Grant Thornton Corporate Finance Inc.

200 We believe it is most appropriate to employ a weighted average multiple in deriving the value for the Plant asset. We think the operations of UK facilities are relevant and comparable; however, we believe greater weight should be assigned to companies operating in North America that share a more similar operating and economic environment with the Plant being valued.

201 The current weighted average multiple is 10.9x EBITDA based on a 75% North American weighting and a 25% UK weighting. The average multiple over the past two years is 11.9x EBITDA. While we believe the base valuation should reflect the current market environment, we also do not consider the current valuations to be reflective of a rational market environment. As a result we believe a multiple of 11.0x EBITDA is an appropriate base valuation.

202 Using a valuation base of 11.0x EBITDA, we believe it is appropriate to apply a discount in valuing the Plant. We believe a 10-15% discount is appropriate considering the relative size of the facility compared to the size of the peer group companies and the liquidity factor. This results in an EV/EBITDA multiple range of 9.4x – 9.9x, which we would round to 9.0x to 10.0x.

### Precedent transaction analysis

203 Our analysis of precedent transactions shows that there has been a high degree of activity taking place in the water industry. In the past two years there have been at least 70 transactions completed in the industry. The majority of the transactions have taken place in North America (45), due to a strong trend towards the privatization of these assets.

204 Among the list of 70 precedent transactions listed, we were only able to obtain transaction values for 40 of them. Of those, 28 were valued at less than \$10 million, with a number of them valued at less than \$1 million. Due to the fact that many of the targeted business were sold by municipalities

or small private companies, there is limited availability of information concerning the multiples paid in the transactions.

205 In fact, we were only able to obtain the EV/EBITDA multiple for four of the transactions. The average multiple paid in these four acquisitions was 10.9x EBITDA.

206 While this is in line with our base valuation multiple of 11.0x EBITDA, the absence of sufficient data points from precedent transactions causes us to be reluctant to place a high degree of reliability on this valuation technique.

207 We believe a discount of 15-20% would be appropriate to account for the relative size of the Plant asset (note that all transactions for which we have multiple information were multi-billion dollar transactions) and the slowdown occurring in the new residential and non-residential construction markets, which has an impact on the demand for water services. If we were to apply this discount to the average multiple paid in precedent transactions we would arrive at an acquisition multiple of 8.7x- 9.3x EBITDA.

208 Schedule 12 displays all of the precedent transactions over the past two years that we examined.

209 Our conclusions are consistent with research published by First Research on the Water and Sewer Utilities industry. First Research's Water and Sewer Utilities profile (updated November 2008) states that the median EBITDA multiple paid in transactions that were completed between January 2000 and December 2006 was 8.8x. First Research's analysis includes at least 4 private, middle market transactions valued at less than \$1 billion.

#### Weighted average cost of capital

210 For the Plant we have calculated the weighted average cost of capital (WACC) to be 7.22%.

211 The selection of a capitalization rate (also known as a cash-flow multiple) is based on consideration of a wide variety of factors, which can be expected to influence the trend of the Plant's earnings in the future, as well as the present economic and competitive conditions. We utilized the weighted average cost of capital – capital asset pricing model (WACC) to determine the appropriate capitalization rate range for the Plant. From this calculation we selected a range of capitalization rates from 7.1% – 7.4% (Schedule 4, line 16).

212 The weighted average cost of capital (WACC), or discount rate, represents a weighted average of the cost of debt and the cost of equity. The weighting is based on the underlying company's or asset's target debt to equity ratio based on market values. In determining the WACC for the Plant asset we examined the capital structures and betas for comparable companies as defined in the comparable company valuation section. We adjusted the average unlevered beta of the peer group for the target capital structure (as determined by the average debt to capitalization ratio for the peer group) to determine the levered beta for the Plant. This levered beta was then used to determine the cost of equity and ultimately the WACC that we used to value the asset. The table below summarizes the key assumptions used to determine the WACC.

Parameters	LOW	HIGH	Schedule Reference
Corporate Interest Rate	6.0%	6.0%	Schedule 4, line 8
Corporate Income Tax Rate	15.0%	15.0%	Schedule 4, line 9
Debt/Business Enterprise	65.0%	65.0%	Schedule 4, line 10
Equity/Business Enterprise	35.0%	35.0%	Schedule 4, line 11
Weighted After-tax Cost of Debt	3.3%	3.3%	Schedule 4, line 12
Weighted Cost of Equity	3.8%	4.1%	Schedule 4, line 13
<b>WACC</b>	<b>7.11%</b>	<b>7.38%</b>	<b>Schedule 4, line 16</b>

213 The cost of debt represents the incremental borrowing rate. The figure represented in the table above reflects the interest rate bearing on EPCOR's most recently issued debt. The after-tax cost of equity is based on the consideration of a broad range of factors, which can be expected to influence the trend of the business' cash-flow in the future as well as present economic and competitive conditions. It is computed after corporate taxes, which is consistent with the flow of funds that would occur on a purchase and adjusts for the systematic risk borne by each provider of capital as each expects a return that compensates for risk taken.

### Summary of Plant Valuation

214 Our DCF analysis suggests an enterprise valuation range of \$263 million to \$282 million, implying a multiple of 12.5x to 13.4x of 2009 EBITDA and 7.7x to 8.2x average forecast EBITDA.

215 Peer group comparable multiple analysis suggests a valuation range of 9.4x – 9.9x EBITDA.

216 Our precedent transaction analysis suggests a range of 8.7x – 9.3x EBITDA. As noted earlier, the lack of data points in our precedent transaction analysis causes us to rely less on this method in our valuation. Traditionally, acquisition multiples are at least 20-30% greater than trading multiples. This would suggest an acquisition multiple range of 11.3x – 12.9x EBITDA based on our peer group comparable multiple analysis.

## The EPCOR Proposal

217 The purpose of this section of the report is to provide an analysis of the financial impacts that may accrue to the City if the Plant is transferred to EPCOR as currently proposed. This will allow the City to assess the proposal relative to our valuation conclusion. It should be noted that this analysis of the EPCOR proposal is solely based on information provided by EPCOR and is outside of comprehensive opinion of value above. We have not verified this information with third party sources due to the sensitivity of this matter, and the scope of the report has been limited in this regard.

218 In September of 2008, the City initiated a joint review with EPCOR of the potential benefits and risks of transferring GBWWTP to EPCOR. They agreed that three conditions must be maintained for a favourable decision to transfer the Plant;

- a. No City employees will lose their jobs as a result of the transfer;
- b. The Plant's environmental leadership and expertise in the area of wastewater treatment must be maintained; and
- c. Council would maintain final approval over drainage rates.

219 Through various discussions between EPCOR and the City a proposal to City Council was made on October 29th, 2008 to transfer the GBWWTP to EPCOR in exchange for the following;

- a. \$75 million transfer fee to be paid over a seven year period;
- b. The City would receive an increase in the dividend associated with GBWWTP of 60% (similar to EPCOR's current payment arrangements with the City for other utility services) in comparison to the 30% dividend the City currently receives from Drainage; and
- c. Payment of an incremental dividend associated with the growth of the wastewater business that would be directly attributable to owning GBWWTP.

220 As a result of the structure of the offer, we reviewed the cash-flow streams of the offer separately given the diverse nature of the streams and their related risk profiles.

### Forecast

221 EPCOR management forecasted the results of operations of an EPCOR run Plant based on three sources of inputs:

- a. Drainage Utility, City of Edmonton information
- b. Information contained in the Drazen Report
- c. Information and assumptions internal to EPCOR

222 Since EPCOR is relying on these inputs as provided we determined the following amounts should be consistent between EPCOR and the City forecasts:

- Net book value of the Plant and interest bearing debt assumed by EPCOR,
- Operating, depreciation and customer costs as provided in the Drazen report for the 2007 year,
- Allocation of interest costs (provided by the City),
- Consumption and billing volumes and revenues for 2007 and the drainage tariffs for 2008, taken from the City's website,
- Demand growth rate assumptions, and,
- Capital additions to the Plant, from Drainage's capital budget.

223 EPCOR prepared a projection which includes the total Sanitary Utility on an overall basis broken out into the Plant and Sysco streams. The Plant projection is the focus of our analysis, management included the other stream to test the viability of Drainage's results without the Plant.

224 The forecasts were based on the 2007 actual figures. Revenue is based on growth rates of customers provided by the City as well as rate revenue increases which EPCOR has assumed to be different than Drainage's assumptions.

225 Operating and customer expenses are based on 2007 actual figures with growth rates from the City for 2008 and assumed growth rates thereafter which are less than the City initially but range within 1% after 2012.

226 The EPCOR forecast does not apply a growth or inflationary factor to interest or depreciation. Rather, their model separately calculates interest expense based on the assumed debt and additions to the assumed debt based on Drainage's budgeted capital expenditures. Depreciation is also calculated separately based on the value of the Plant as transferred and factoring in the budgeted capital expenditures. EPCOR assumed a forty four year useful life for the Plant and any upgrades, which is consistent with Drainage. EPCOR has calculated interest expense based on EPCOR's cost of debt at the Valuation Date which was 6.78% for new debt, and on the assumed debt rates of interest as provided by Drainage.

227 We have reviewed the projections provided by management and our analysis has necessarily been based on projections which, in turn, were based on the aforementioned assumptions. Some

assumptions may not materialize as unanticipated events and circumstances may or may not occur subsequent to the date of this report. Furthermore management may make decisions which are different from the assumptions made during the projection period. Therefore the actual results achieved during the projection period may or may not be materially different from the projections.

### **Reconciliation of EPCOR Projection to Drainage Projection**

228 In comparing the two projections we identified a number of differences; the differences are highlighted below:

- EPCOR's utility revenue allocation is based on usage volumes with 49% of utility revenues allocated to the Plant; it does not include overstrength revenues in this allocation. The Drainage model allocates 100% of overstrength to the plant; however, it includes this amount in the total utility revenue allocation, thus reducing the allocation of other basic utilities to less than 49% to the Plant.
- EPCOR's overstrength revenues in 2008 are higher than the Drainage model by approximately \$750,000.
- The EPCOR projection allocates 100% of the suburban revenues to the Plant, while the Drainage model allocates this revenue based on a percentage split.
- EPCOR includes only SWAP and Biosolids ancillary revenues in their allocation to the Plant while Drainage includes other external revenue as well as some surplus sales and interest revenues in their allocation to the Plant.
- EPCOR is forecasting total revenue in 2009 higher than the City model by \$0.9 million. This difference grows to \$13.0 million by 2020. This is a result of differences between the rate increase assumptions in the two models. The City is forecasting higher increases than EPCOR in 2012 by 3.0% and 2013 by 1.0%, while EPCOR is forecasting higher rate increases of 1.0% in 2015, 5.0% in 2016 and 2017, and 2.0% in 2018 through 2020.
- The City forecasts large increases in operating costs for 2009 through 2011. The difference in the increases between the two models is 6.4% in 2009, 2.4% in 2010, and 5.5% in 2011. From 2012 onwards the difference in cost growth between the two models is less than one percent.
- Depreciation expense in the EPCOR projection is less than the City amount by approximately \$1.0 million in 2009 through 2011.
- In 2009 EPCOR is forecasting interest expense to be less than the City's amount by \$2.8 million. This is the result of EPCOR assuming a debt amount of approximately \$108 million in their model, which is less than the book value of the debt associated with the Plant on the City's books. This discrepancy decreases each year until 2017 when EPCOR begins to forecast a higher interest expense than the City model. The reason for this is EPCOR's higher cost of borrowing of 6.78% versus the City's cost of borrowing on the books at 5.2%. It is also due to EPCOR financing between 80% and 87% of the capital additions during the years 2009 through 2016 until their optimal capital structure is reached.

**EPCOR run GBWWTP dividend stream**

229 Schedule 7 presents our calculation of the net present value of the dividends to the City from an EPCOR run GBWWTP

230 EPCOR currently has an agreement to pay the City a dividend of 60% of its net income on its other utility assets. We have applied this dividend rate to the earnings before income taxes forecasted by EPCOR for the GBWWTP. This level of dividends has been maintainable due to nature of EPCOR's operations, capital re-investment, asset fleet and financing strategy. EPCOR anticipates that the dividends generated by this asset will be under the same dividend policy. We have confirmed with the City and EPCOR that this policy is expected to be applied to this asset under the EPCOR ownership, and hence have applied it in our calculations.

**Discount Rate**

231 For the purposes of this analysis a range of discount rates was used. The midpoint discount rate is based on the cost of equity calculated in the weighted average cost of capital section of the report (see Schedule 4, line 7), plus a premium of 0.5% to reflect the inherent risk around EPCOR's assumptions given they are not currently operating the Plant. In order to determine the range we added and subtracted 0.5% to the discount rate.

**Net present value**

232 The net present value from this cash-flow stream ranges from \$86.1 million to \$97.7 million with a midpoint of \$91.6 million. (Schedules 7a, b and c)

**Discounted cash-flow – Incremental Revenue from EPCOR Wastewater Projects**

233 EPCOR management strongly believes that owning the GBWWTP will provide them with the necessary credentials to pursue and win wastewater contracts, especially of the more complex regional variety. Currently, EPCOR operates various smaller, stand alone plants; however, they do not currently own or operate any of the more complex regional style plants. Owning GBWWTP provides them with the expertise, the knowledge, the human resources and the necessary credentials needed to help secure these types of opportunities. Management also believes that the optics of its own Shareholder not entrusting the Plant to EPCOR is detrimental to their success in securing these arrangements.

234 In the October 29th, 2008 Council meeting, EPCOR presented a cash-flow relating to incremental revenues as a result of owning GBWWTP. This was based on reviewing three larger project opportunities and probability affecting the potential outcome of securing these engagements if ownership of GBWWTP was transferred to EPCOR. This was completed at a very high level.

235 Through various discussions with management of EPCOR, review of business plans and other documents provided by Management they provided us with a detailed schedule of projects that they anticipated would be available to them over the next 10 years. Each of these projects were reviewed and categorized as critical, moderate and small. Critical represented projects that heavily relied on the fact that EPCOR obtain operational control of GBWWTP. Given the sheer size of the plant, the complexity associated with a Plant of this size and the ability to draw on plant

resources, it was deemed critical for EPCOR to demonstrate to future prospects that they could be successful in designing, building, financing and operating plants with similar characteristics.

- 236 Moderate projects represent projects that are not anticipated to be as complex a system as GBWWTP and therefore, operating the plant is less critical, while still being beneficial. Included in moderate projects are some stand alone projects along with some regional projects. Operating the Plant would increase the ability to obtain those projects as it allows EPCOR the ability to demonstrate that they can deal with complex issues, have access to resources and knowledge and have the ability to parachute knowledgeable people into critical situations.
- 237 Small projects represent projects that are more of a standalone basis which are not as complex as regional plants. As a result, operating the Plant is less critical and owning the asset will likely have nominal effect on whether those opportunities are secured given they already own and/or operate similar standalone plants.
- 238 Management, along with their marketing and business development teams reviewed each project and developed a probability of securing them, under both scenarios of operating the Plant or not. For each case they assigned a probability of securing the opportunity if they did not own the Plant and another probability if they did own the Plant. In determining their probabilities they considered the following;
- a. Who the potential competitors were that may be bidding on the job;
  - b. Whether or not there was an existing relationship with the entity; and
  - c. Where they were in the process on each project.
- 239 In order to determine the impact on cash-flows, we took the differential between the probabilities under both scenarios in order to quantify the impact of their assumptions.
- 240 It should be noted that there were no projects or contracts in place that were contingent on EPCOR owning GBWWTP. All projects are completely subjective as to timing, size and probability of completion. Our work around the projects consisted of discussions with EPCOR management, review of the EPCOR Utilities Inc. Corporate Strategy and Long-Term Plan 2009 – 2013 which was reviewed and approved by the Board, review of the Planning Session – December 4, 2008 document that is the beginning document for the 2010 to 2014 long term strategic plan, yet to be reviewed or approved by the Board and review of the detailed financial model prepared by Management as at December 19, 2008. Due to competitive concerns raised by EPCOR and the relatively early stage of many of the projects, we did not speak to any of the prospective target projects.
- 241 In relation to the model we noted the following:
- a. Using the assigned probabilities, and the total estimated cost of each of the projects, management forecasted the net income and dividends which would be payable to the City using a variety of scenarios (“the Incremental Model”).

- b. The Incremental Model operates largely on a cost recovery basis whereby the revenues earned are a function of the capital cost of the project. Management has assumed that all projects will be Design Build Finance Operate (“DBFO”) whereby EPCOR will not own the asset once construction is complete. Rather, EPCOR will earn finance charges and project management fees during construction, and will be hired to operate the plant upon completion of construction. Since these are DBFO projects depreciation expense is not part of the forecasted earnings.
- c. Interest and finance charges earned during construction are capitalized to the finance contract that the customer will begin repaying to EPCOR upon completion of construction. Sustaining capital reinvestment can either be added to the amount financed or paid for when incurred by the customer, with the work performed by EPCOR for cost plus a percentage fee.
- d. Management calculates operating revenues based on assuming a certain margin on operating costs. Operating costs are assumed to be 10% of the capital cost of a project. We were able to review some ongoing projects that EPCOR is currently undertaking that confirmed these types of margins.
- e. EPCOR management included both Municipal and Industrial projects in their funnel. Municipal projects are typically not subject to income tax while Industrial projects may be subject to income tax. To be conservative, EPCOR management has applied income tax to each project in the model at the enacted rates as at the Valuation Date.

#### Income taxes

242 EPCOR has applied income taxes to both Municipal and Industrial projects. Income taxes are calculated based on the combined federal and provincial enacted income tax rates as at the Valuation date, which are 29.5% for 2009, 29.0% for 2010, 28% for 2011, 26.5% for 2012, and 25% for 2013 and beyond, which management has assumed will be the income tax rate thereafter.

243 With the sole shareholder of EPCOR being the City, EPCOR’s wastewater projects would be non-taxable as long as the customer is a municipality. Projects for industrial customers may be taxable. Regardless of the income tax status of the individual project, EPCOR considers income taxes in their pricing analysis and bids to ensure a level playing field with competing bidders which are not municipally owned companies.

244 EPCOR has calculated incremental dividends on these projects using after tax net income. If the project is non-taxable, the net income would increase and thus the cash flows to the City, in the form of dividends, would increase. Therefore, this adds a level of conservatism to the projected projects.

#### Incremental Project Financing

245 The Incremental Model assumes that EPCOR will finance the construction for the customer 50% through internal equity and 50% through debt financing at EPCOR’s cost of debt rate. Upon completion of construction, the customer commences repayments according to the terms of a financing contract. As part of the Incremental Model, management prepared detailed schedules

of new EPCOR external debt and debt repayments for the forecast period as well as amortization schedules detailing customer repayments over 20 year periods, the assumed length of the financing contract. The financing charge earned from customers is included in the forecasted revenues while the interest expense on EPCOR's incremental external debt is deducted.

### **Incremental dividends**

246 As a result of securing these projects, an overall increase in project net income would be available to the Shareholder. We have reviewed EPCOR's analysis around these projects (see above) and the resulting estimated 60% dividend to the City.

247 We applied an additional risk factor to the discount rate increasing the range from 18% to 26% with a midpoint of 22%. In comparison to the market participant targeted cost of equity of 11.2% specifically, this additional risk premium reflected the following considerations:

- We understand that the incremental revenues relate to design, build, finance and operate services ("DBFO") that EPCOR would seek to realize through the additional market credibility achieved through its ownership and operation of the GBWWTP. While the DBFO business provides services to regulated entities, it is not a regulated business itself. Its profitability would be commercially driven through its ability to effectively execute its business activities, as opposed to owning and operating a regulated asset. This represents a different risk profile than the operation and ownership of an existing regulatory asset, and market participants would expect a higher return on equity to reflect this matter.
- The incremental revenue is related to a portfolio of projects that EPCOR has and will pursue. We understand that several of these projects are subject to advanced discussions with business partners and potential customers. In its analysis of these opportunities, EPCOR estimated the probabilities of realizing each of these opportunities. The probability adjustments and active commercial discussions regarding these projects provide the supporting rationale for this analysis. Despite these factors, these revenue streams have not been secured, and there is no certainty regarding the level of income that will be generated from these projects. This represents a different risk profile than the operation and ownership of an existing regulated asset, and market participants would expect a higher return on equity to reflect this matter.

### **Net Present Value:**

248 The net present value from this cash-flow stream ranges from \$54.5 million to \$108.9 million with a midpoint of \$76.4 million. (See Schedule 8)

**Transfer price**

249 As part of the offer from EPCOR to the City for the transfer of the GBWWTP, they have offered \$75 million to be paid over the next seven years which could be used by the City.

**Net Present Value:**

250 The net present value from this cash-flow stream of \$75 million over 7 years ranges from \$62.6 million to \$67.0 million with a midpoint of \$64.7 million. (See Schedules 11a b and c)

**EPCOR – Overall dividend payments**

251 The anticipated net present values of the dividend payments to be received by the City ranges from \$62.6 million to \$67.0 million with a midpoint of \$64.7 million for the transfer fee, \$86.1 million to \$97.7 million with a midpoint of \$91.6 million for running the GBWWTP and \$54.5 million to \$108.9 million with a midpoint of \$76.4 million as a result of the incremental revenues for a total overall anticipated net present value of dividends to the City in the range of \$203.2 million to \$273.6 million with a midpoint of \$232.7 million.

# Appendix

# Appendix A: Assumptions, restrictions and qualifications

## Assumptions

252 In preparing our report, we have made a number of assumptions which impact our comprehensive opinion of fair market value. The significant assumptions are as follows:

- a. The GBWWTP is a going concern as at the Valuation Date for the purposes of our going concern approach valuation.
- b. No undisclosed significant events and/or transactions have occurred between the Valuation Date and the date of our report that would materially affect our report.
- c. As at the Valuation Date, all assets, wherever located, to which the GBWWTP had ownership rights of any nature, had been recorded in the accounts of the Plant and represented a continuing benefit to the Plant.
- d. The fair market value of the GBWWTP's assets and liabilities, except as noted, are equivalent to their respective net book values.
- e. As at the Valuation Date, all liabilities of the GBWWTP had been recorded in the accounts of the Plant.
- f. The GBWWTP had no significant undisclosed liabilities, contingent liabilities, including potential environmental liabilities, contractual obligations, commitments or litigation pending or threatened at the Valuation Date.
- g. The GBWWTP had no material redundant assets that have not been noted in this report.
- h. All transactions that occur with related parties occur at fair market value.
- i. The GBWWTP's unaudited financial statements are free from material misstatement. The City does not remit federal and provincial income tax and neither will EPCOR therefore they have been excluded from our analysis unless otherwise disclosed.

- j. There are no undisclosed significant events and/or transactions that have occurred between the valuation date and the date of our report that would materially affect our report.
- k. Forecasts prepared by the City reflect the City's best efforts to be consistent with the regulated rate structure.
- l. The annual capital reinvestment is approximately 90% of the City's estimated capital expenditures for 2008 to 2017.
- m. Sustaining capital reinvestment has been determined, by the City to be \$12.1 million for all years after 2017.
- n. GBWWTP has allocated 49% of utility revenue by the City for 2008 to 2009.
- o. The annual growth rates estimated by management in their forecast are consistent with current best estimates for long-term growth of the GBWWTP.
- p. Working Capital requirements is expected to be 6.7% of revenues for the Plant.
- q. The Risk free rate is 4.18%.
- r. The Equity Premium is 5.5%.
- s. Long term inflation is expected to continue at 2.0% per year.
- t. Adjustments to the EBITDA Multiple with regards to comparable companies would include adjustments such as; an adjustment to account for the current economic environment, size, customer concentration, profitability trend, leverage, profitability and market characteristics.
- u. Adjustments to the EBITDA Multiple with regards to precedent transactions would include adjustments such as: size premium, Plant's weakened position, the buyer universe, deals not completed due to the current economic environment and customer concentration.

253 It should be noted that if the assumptions on which this report was based are found to be incorrect, our comprehensive opinion of the fair market value might be rendered invalid.

#### **Analysis of EPCOR's GBWWTP Forecast**

254 EPCOR will pay dividends of 60% of net income after franchise fees to the City of Edmonton and that the dividend rate will continue in perpetuity.

255 Cost growth including inflation will be 4.5% in 2009 through 2011 and 3.0% thereafter.

256 Rate growth will approximate inflation.

257 Residential growth will average 1% over the forecast period.

- 258 Residential and demand growth will be consistent with the City's assumptions.
- 259 Beyond the forecast period growth will continue at a rate of 3.25% per annum.
- 260 GBWWTP will be allocated 49% of the Drainage Utility's revenue plus 100% of the overstrength revenue and 100% of the ACRWC SWAP and Biosolids revenue.
- 261 Capital expenditures will equal the costs assumed under a Drainage run scenario and will be financed with 80% to 87% debt until 2016 and 60% debt thereafter.
- 262 Debt assumed by EPCOR related to the GBWWTP will be \$108.2 million at the City's cost of debt for the purpose of financial modeling.

### **Restrictions**

- 263 This report is not intended for general circulation or publication nor is it to be reproduced or used for any purpose other than that outlined above without our prior written permission in each specific instance. More specifically, this valuation conclusion should not be used as the sole or primary basis to determine the price for a transaction in the open market since vendors and purchasers usually have varying negotiating and financial abilities. We will not assume any responsibility or liability for losses occasioned to the Plant, the shareholders of the Plant or any third party, as a result of the circulation, publication, reproduction or use of this report contrary to the provisions of this paragraph.
- 264 Our analyses are based upon information provided by and/or on behalf of the Plant. We assume no responsibility and make no representations with respect to the accuracy or completeness of any information provided by and/or on behalf of the Plant. There will usually be differences between estimated and actual results because events and circumstances frequently do not occur as expected, and those differences may be material. You acknowledge that no reliance shall be placed on draft analyses, conclusions or advice, whether oral or written, issued by us since the same may be subject to further work, revision and other factors which may mean that such drafts are substantially different from any final advice issued.
- 265 The liability of Grant Thornton LLP and any of our employees or other personnel for any claim in tort or contract related to professional services provided pursuant to our agreement is limited to the amount of professional fees actually paid for those services.
- 266 We reserve the right, but are under no obligation, to review all calculations included in or referred to in this report and, if we consider it necessary, to revise our comprehensive opinion in the light of any information existing at the Valuation Date which becomes known to us after the date of this report.

### **Qualifications**

- 267 In preparing this report, we have relied upon the documents and information listed herein.

268 We are not guarantors of the information upon which we have relied in preparing our report, and except as stated, we have not audited or otherwise attempted to verify any of the underlying information or data contained in this report.

269 Given the nature of our assignment, we were unable to expose the Plant for sale in the open market. Therefore, we were unable to determine whether there were any special interest purchasers who might be willing to pay a price greater than the fair market value expressed in this report. Such special purchasers might be willing to pay a price in excess of fair market value as a result of economic synergies or strategic advantages that they perceive to be associated with the operations of the Plant. Given the difficulty in quantifying the premium such purchasers may pay, if any, we have not considered such possible premiums in our valuation.

270 We certify that we have no active or contemplated interest in the Plant nor are our fees contingent upon our conclusions.

271 This valuation report has been prepared by Chartered Business Valuators, in accordance with the professional standards of the Canadian Institute of Chartered Business Valuators.

## Appendix B: Key Valuation Definitions

272 The Canadian Institute of Chartered Business Valuators (CICBV) Professional Standard 110 (CICBV Standard 110) defines a valuation report as:

273 “... any written communication on letterhead and/or where the author(s) is identified containing a conclusion as to the value of shares, assets, an interest in a business prepared by a Valuator acting independently and that is not marked in draft form .”

274 Under CICBV’s professional standards, the report type being issued is distinguished by the scope of review, amount of disclosure and level of assurance provided in the conclusion.

275 Specifically, CICBV Standard 110 defines a comprehensive valuation report as follows:

276 *A Comprehensive Valuation Report contains a conclusion as to the value of shares, assets or an interest in a business that is based on a comprehensive review and analysis of the business, its industry and all other relevant factors, adequately corroborated and generally set out in a detailed valuation report.”*

277 As well, we have been guided by CICBV’s definition of fair market value:

278 “... the highest price available estimated in terms of money which a willing seller may obtain for the property in an open and unrestricted market from a willing, knowledgeable purchaser acting at arm’s-length.”

279 Fair market value as defined above may or may not equal the purchase or sale price in an actual open market transaction. There may exist in the open market special interest or strategic purchasers who may be willing to pay a price in excess of fair market value because they can, or believe they can, enjoy post-acquisition synergies, economies of scale or strategic advantages by combining the acquired business interest with their own. Such synergies, economies of scale or strategic advantages are referred to as net economic value added.

280 The quantification of the premiums such purchasers may pay, if any, is difficult, if not impossible, to determine without exposing the Plant for sale in the open market. Therefore, we have provided an estimate of the fair market value of the Plant on a “stand-alone” basis without reference to the prices that might be paid by purchasers who perceive post-acquisition net economic value added

281 In determining fair market value of the Plant we have considered the following definitions of the following terms:

*“A Comprehensive Valuation Report contains a conclusion as to the value of shares, assets or an interest in a business that is based on a comprehensive review and analysis of the business, its industry and all other relevant factors, adequately corroborated and generally set out in a detailed valuation report.”*

*“Discounted cash flow is a method within the income approach whereby the present value of future expected net cash flows is calculated using a discount rate.”*

*“EBITDA is earnings before interest, taxes, depreciation and amortization. This is a measure of operating cash flows of a business before changes in net working capital.”*

*“Enterprise value is the total value of a business including its interest bearing debt and equity components.”*

*“Fair Market value is the highest price available estimated in terms of money which a willing seller may obtain for the property in an open and unrestricted market from a willing, knowledgeable purchaser acting at arm’s-length.”*

*“Market (Market-Based) Approach is a general way of determining a value indication of a business, business ownership interest, security, or intangible asset by using one or more methods that compare the subject to similar “businesses, business ownership interests, securities, or intangible assets that have been sold.”*

*“Market value is the most probably price which a property should bring in a competitive and open market under all conditions requisite to a fair sale, the buyer and seller each acting prudently and knowledgeably, and assuming the price is not affected by undue stimulus.”*

*Net Book Value with respect to a business enterprise, is the difference between total assets (net of accumulated depreciation, depletion, and amortization) and total liabilities as they appear on the balance sheet (synonymous with Shareholder's Equity). With respect to a specific asset, the capitalized cost less accumulated amortization.”*

*“Notional Market is where it is necessary to determine fair market value, fair value, or some other value in the absence of open market negotiations.”*

*“Price is the consideration paid in a negotiated open market transaction involving the purchase and sale of an asset.”*

*“Replacement Cost is the current cost of a similar new property having the nearest equivalent utility to the property being valued.”*

*“Weighted Average Cost of Capital (WACC) is the cost of capital (discount rate) determined by the weighted average, at market value, of the cost of all financing sources in the business enterprise's capital structure.”*

## Appendix C: Scope of review

### Documentation

282 In completing our report, we reviewed and relied on the following information, documents and data

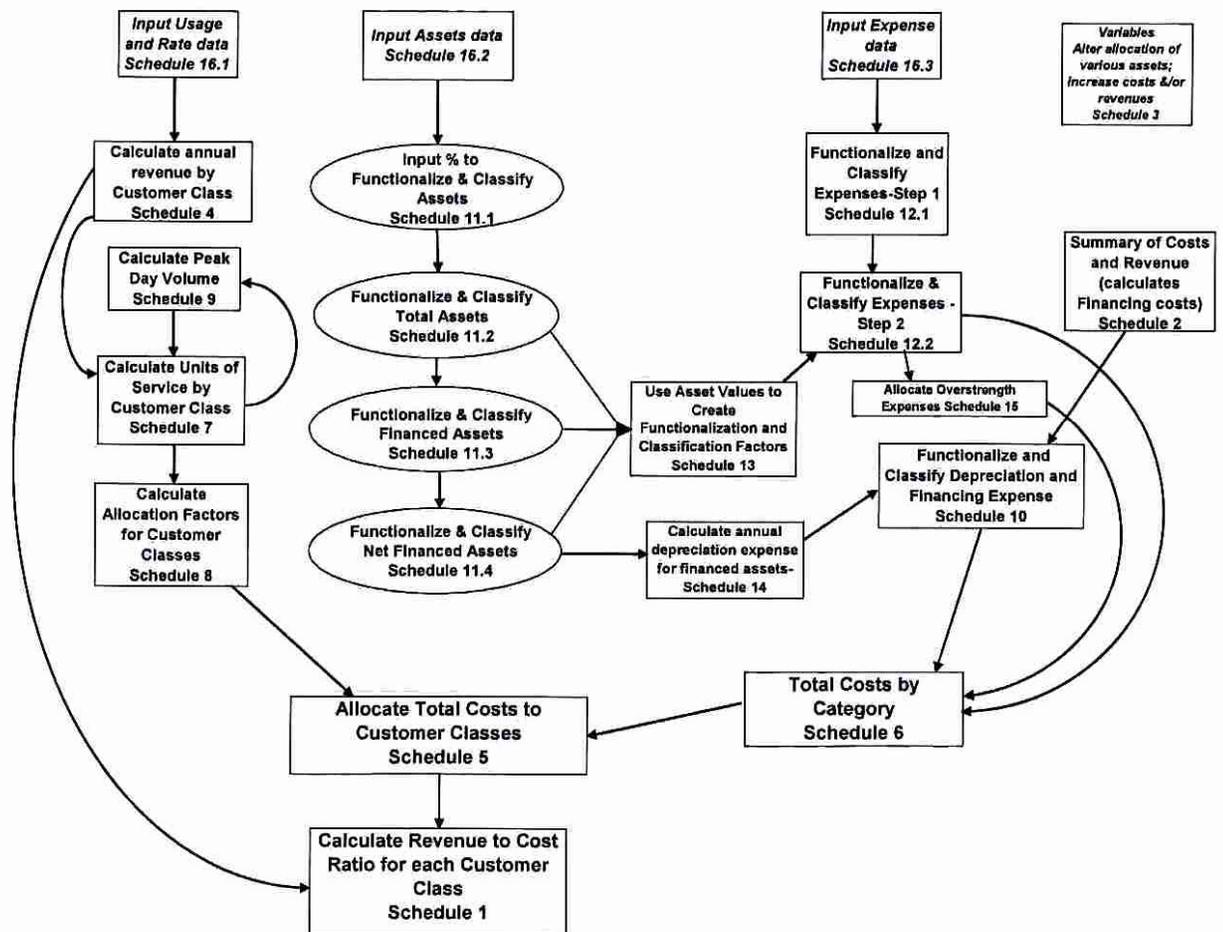
- a. Financial information regarding City of Edmonton's water treatment plant provided by the management;
- b. Gold Bar Wastewater Treatment facility tour on December 1, 2008;
- c. Capital IQ research for Wastewater Treatment comparable companies;
- d. City of Edmonton Drainage Services- 2007 Drainage utility cost study by Drazen Consulting Group dated August 20, 2008;
- e. City of Edmonton Drainage Services – 2007 Drainage study utilizing the Drazen Consulting Group model as at December 5, 2008.
- f. The City of Edmonton-Debenture and Mortgage Debt Analysis as at December 31, 2007;
- g. Gold Bar Wastewater Treatment Plant- Process Buildings/Facilities Information (replacement value report) as at December 31, 2007 and October 24, 2008;
- h. Office of Infrastructure Report as at December 31, 2007;
- i. Utility Fiscal Policy-Sanitary Utility forecast from 2008-2027;
- j. GBWWTP capital budgets from 2008 to 2018;
- k. Discussions with Management.
- l. This industry review was compiled using the following sources:
  - i Analysis of Business Models and Their Applicability to Ontario, KPMG and Cameron McKenna, 2002.

- ii Canada's Aging Water and Wastewater Systems in Desperate Need of New Investment and Management, Nation Talk, 2007.
- iii Clean and Safe Water for the 21st Century, The Water Infrastructure Network.
- iv Economic Principles and Concepts as Applied To Municipal Water Utilities, GeoEconomics Associates Incorporated, 2002.
- v Private Sector Participation in the Water and Wastewater Services Industry, Jennifer Baumert and Laura Bloodgood, Office of Industries, U.S. International Trade Commission 2004.
- vi The Economic Benefits of Water Use In Canada, Steven Renzetti and Diane Dupont, Canadian Water Network, 2007.
- vii The State of the Water Industry, 2006 – Who Will Pay? Who Will Profit?, Steve Maxwell, 2006.
- viii Water and Wastewater Markets, Investors and Suppliers, Macquarie North America Ltd. And Tasman Economics Pty Ltd., 2001.
- ix Water and Wastewater Technologies, Industry Canada, 2003.
- x Statistics Canada, Quarterly Population Estimates.
- xi Forecast Update October 31, 2008, Scotiabank Group.
- xii Bank of Canada, Consumer Price index, total seasonally adjusted.
- xiii U.S. Census Bureau, [www.census.gov](http://www.census.gov).
- xiv U.S. Department of Labor, Bureau of Labor Statistics, [www.bls.gov](http://www.bls.gov) (1982-1984 – 100), 2008 forecast based on October 2008.
- xv 2007 Drainage Utility Cost Study dated August 20, 2008 prepared by Drazen Consulting Group, Inc.
- xvi Electronic versions of EPCOR's forecasted results of operating the GBWWTP, prepared by EPCOR management;
- xvii EPCOR's forecasted cash flows from incremental projects with actual project names reviewed at EPCOR office, not provided to Grant Thornton;
- xviii EPCOR's forecasted cash flows from incremental projects provided to Grant Thornton in electronic format on a "no names" basis, prepared by EPCOR management;

- xix City of Edmonton Drainage Tariffs dated January 1, 2008, taken from the City of Edmonton's website;
- xx EPCOR 2007 Annual Report;
- xxi EPCOR Utilities Inc. Corporate Strategy and Long-Term Plan 2009 to 2013, a copy of which was provided to Grant Thornton to read, we were not provided with a copy for our records;
- xxii EPCOR Memorandum Planning Session December 4, 2008, Pre-Reading Materials for 2010 to 2014 Long-Term Strategic Planning Session;
- xxiii Correspondence between the City of Edmonton Drainage Services personnel and EPCOR concerning various inputs into the EPCOR forecast;
- xxiv Various discussions with EPCOR management; and,
- xxv Various information provided to the City of Edmonton valuation team.

# Appendix D: Edmonton Drainage Utility Cost Study

## EDMONTON DRAINAGE UTILITY COST STUDY



Excerpt from City of Edmonton Drainage Services “2007 Drainage Utility Cost Study” dated August 20, 2008 prepared by Drazen Consulting Group, Inc.

# Schedules

**Comprehensive valuation report  
City of Edmonton - GBWWTP  
As at October 31, 2008  
Discounted cash flow summary**

**Schedule 1**

	Schedule Reference	LOW	HIGH
Present value of discretionary cash flows:			
1	Fiscal 2008 through 2020	\$ 48,368	\$ 49,920
2	Terminal value	214,486	232,542
3	Enterprise Value	262,855	282,461
4	<i>Implied 2009 EBITDA multiple</i>	12.5	13.4
5	<i>Implied Average Forecast EBITDA multiple</i>	7.7	8.2
6	Less: Long term debt	(139,615)	(139,615)
7	<b>Fair Value of Equity</b>	123,240	142,846
8	<b>Rounded Fair Value of Equity</b>	<b>\$ 123,000</b>	<b>\$ 143,000</b>



This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.

Audit • Tax • Advisory

© Grant Thornton LLP. Canadian Member of Grant Thornton International Ltd. All rights reserved.

For the years ended December 31	Schedule Reference	Estimated 31-Oct 2008	Forecast												Low Terminal Year	High Terminal Year		
			2 months 2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019			2020	
1	EBITDA (Gross Cashflow)	3	\$ 15,917	\$ 3,889	\$ 21,100	\$ 23,884	\$ 25,824	\$ 30,531	\$ 34,201	\$ 37,675	\$ 40,453	\$ 39,920	\$ 39,751	\$ 39,596	\$ 39,093	\$ 38,575	\$ 38,575	\$ 38,575
2	Estimated capital expenditures		(18,750)	(3,750)	(36,022)	(28,260)	(33,217)	(21,380)	(32,171)	(26,749)	(35,924)	(35,469)	(11,070)	(12,100)	(12,100)	(12,100)	(12,100)	(12,100)
3	Working capital investment required				(350)	(357)	(391)	(435)	(379)	(353)	(323)	(81)	(75)	(79)	(58)	(58)		
4	<b>Net Cash flow</b>		<u>(2,833)</u>	<u>139</u>	<u>(15,271)</u>	<u>(4,733)</u>	<u>(7,784)</u>	<u>8,716</u>	<u>1,651</u>	<u>10,572</u>	<u>4,206</u>	<u>4,370</u>	<u>28,605</u>	<u>27,417</u>	<u>26,935</u>	<u>26,418</u>	<u>26,475</u>	<u>26,475</u>
5	<b>Terminal Multiple</b>																<u>18.59X</u>	<u>19.57X</u>
6	<b>Terminal Value</b>																<u>\$ 492,187</u>	<u>\$ 518,183</u>
7	<b>Time factor</b>		0.083	0.667	1.667	2.667	3.667	4.667	5.667	6.667	7.667	8.667	9.667	10.667	11.667			
8	<b>Present value factor - low</b>		0.9941	0.9536	0.8881	0.8271	0.7702	0.7173	0.6680	0.6221	0.5794	0.5395	0.5025	0.4679	0.4358			
9	<b>WACC - Low</b>		<u>7.38%</u>															
10	<b>Net present value - annual</b>		138	(14,563)	(4,203)	(6,438)	6,714	1,184	7,062	2,617	2,532	15,434	13,776	12,604	11,512	<u>\$ 214,486</u>		
11	<b>Net present value - cumulative</b>		<u>138</u>	<u>(14,425)</u>	<u>(18,629)</u>	<u>(25,066)</u>	<u>(18,353)</u>	<u>(17,169)</u>	<u>(10,106)</u>	<u>(7,489)</u>	<u>(4,957)</u>	<u>10,476</u>	<u>24,252</u>	<u>36,856</u>	<u>48,368</u>			
12	<b>Present value factor - high</b>		0.9943	0.9552	0.8918	0.8326	0.7774	0.7258	0.6776	0.6326	0.5906	0.5514	0.5148	0.4807	0.4488			
13	<b>WACC - High</b>		<u>7.11%</u>															
14	<b>Net present value - annual</b>		138	(14,587)	(4,221)	(6,481)	6,776	1,198	7,164	2,661	2,581	15,774	14,115	12,947	11,855		<u>\$ 232,542</u>	
15	<b>Net present value - cumulative</b>		<u>\$ 138</u>	<u>\$ (14,450)</u>	<u>\$ (18,671)</u>	<u>\$ (25,152)</u>	<u>\$ (18,376)</u>	<u>\$ (17,178)</u>	<u>\$ (10,014)</u>	<u>\$ (7,353)</u>	<u>\$ (4,772)</u>	<u>\$ 11,002</u>	<u>\$ 25,118</u>	<u>\$ 38,064</u>	<u>\$ 49,920</u>			

This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.



Comprehensive valuation report

Schedule 3

City of Edmonton - GBWWTP

As at October 31, 2008

Forecast future earnings before interest, taxes and depreciation

For the years ended December 31	Forecast												
	2 months 2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
1 Utility	\$ 8,536	\$53,790	\$59,039	\$64,703	\$70,967	\$76,377	\$81,408	\$85,929	\$86,967	\$88,005	\$89,037	\$89,716	\$90,401
2 ACRWC SWAP and Biosolids	69	315	341	368	397	421	442	460	460	460	460	460	460
3 Overstrength	390	1,237	1,336	1,443	1,558	1,651	1,734	1,803	1,803	1,803	1,803	1,803	1,803
4 Late Payment	20	123	123	123	123	123	123	123	123	123	123	123	123
5 Goldbar	457	2,822	2,907	2,994	3,095	3,218	3,325	3,451	3,579	3,673	3,765	3,858	3,953
6 Miscellaneous+Interest	82	313	179	127	104	108	142	225	261	255	305	406	486
7 Total Revenue	9,553	58,600	63,925	69,758	76,244	81,898	87,174	91,991	93,193	94,319	95,493	96,366	97,226
Expenses													
8 Total O&M	4,924	32,750	34,995	38,476	39,765	41,303	42,661	44,248	45,864	47,082	48,279	49,499	50,742
9 Depreciation	1,061	8,026	8,839	9,399	8,777	9,211	9,925	10,650	11,351	11,877	12,082	12,089	12,088
10 Interest	1,296	8,205	9,528	10,458	10,835	11,549	11,968	12,899	13,846	14,280	13,961	13,292	13,461
11 Local access fee	659	4,437	4,867	5,331	5,844	6,286	6,697	7,065	7,148	7,231	7,314	7,368	7,423
12	7,939	53,418	58,229	63,663	65,220	68,349	71,250	74,862	78,209	80,470	81,636	82,248	83,714
<b>13 Earnings before income taxes</b>	<b>1,614</b>	<b>5,182</b>	<b>5,696</b>	<b>6,095</b>	<b>11,024</b>	<b>13,549</b>	<b>15,924</b>	<b>17,129</b>	<b>14,984</b>	<b>13,849</b>	<b>13,857</b>	<b>14,118</b>	<b>13,512</b>
14 <i>Deduct: Interest income</i>	(82)	(313)	(179)	(127)	(104)	(108)	(142)	(225)	(261)	(255)	(305)	(406)	(486)
15 <i>Add: interest on long-term debt</i>	1,296	8,205	9,528	10,458	10,835	11,549	11,968	12,899	13,846	14,280	13,961	13,292	13,461
16 EBIT	2,828	13,074	15,045	16,426	21,754	24,990	27,750	29,802	28,569	27,873	27,514	27,004	26,487
17 <i>Add: amortization and depreciation</i>	1,061	8,026	8,839	9,399	8,777	9,211	9,925	10,650	11,351	11,877	12,082	12,089	12,088
<b>18 EBITDA</b>	<b>\$ 3,889</b>	<b>\$21,100</b>	<b>\$23,884</b>	<b>\$25,824</b>	<b>\$30,531</b>	<b>\$34,201</b>	<b>\$37,675</b>	<b>\$40,453</b>	<b>\$39,920</b>	<b>\$39,751</b>	<b>\$39,596</b>	<b>\$39,093</b>	<b>\$38,575</b>



This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.

Audit • Tax • Advisory

© Grant Thornton LLP. Canadian Member of Grant Thornton International Ltd. All rights reserved.

## City of Edmonton - GBWWTP

As at October 31, 2008

Weighted average cost of equity - capital asset pricing model

	Reference	Assumptions	LOW	MIDPOINT	HIGH
<b>Unadjusted cost of equity</b>					
Risk-free rate					
1	Long-term Canada bond yield	Note 1			
					4.2%
Equity premium					
2	Unadjusted	Note 2			
					5.5%
Beta					
3	Unlevered	Note 3			
					35.0%
4	Levered				
					90.3%
5	Cost of equity (large firm)				9.2%
6	Premium for size and specific risks	Notes 3 & 4			2.0%
7	<b>Cost of equity</b>				<b>11.2%</b>
<b>Weighted average cost of capital</b>					
8	Corporate interest rate	Note 5			6.0%
9	Corporate income tax rate	Note 6			15.0%
10	Debt/business enterprise	Note 7			65.0%
11	Equity/business enterprise				35.0%
Weighting					
12	Cost of debt (after-tax)	Note 8	3.32%	3.32%	3.32%
13	Cost of equity	Note 9	3.79%	3.91%	4.06%
14	Unadjusted nominal discount rate		7.11%	7.22%	7.38%
15	Premium for other risks		0.00%	0.00%	0.00%
16	Final nominal discount rate		7.11%	7.22%	7.38%
17	Long-term inflation rate	Note 10	2.00%	2.00%	2.00%
18	Real discount rate	Note 11	5.11%	5.22%	5.38%
19	Real long-term growth	Note 12	0.00%	0.00%	0.00%
20	<b>Capitalization rate</b>	Note 13	<b>5.11%</b>	<b>5.22%</b>	<b>5.38%</b>

**Notes:**

- (1) Bank of Canada long-term bond yield at November 2008.
- (2) Morningstar (formerly Ibbotson Associates), Canadian Risk Premia Over Time Report: 2007.
- (3) Morningstar (formerly Ibbotson Associates): Cost of Capital 2007 Yearbook.
- (4) Morningstar (formerly Ibbotson Associates), Risk Premia Over Time Report: 2007
- (5) From the company's 2007 annual financial statements, weighted average cost of outstanding debt.
- (6) Given the public sector nature of the industry, taxes have been discounted to 15% in the determination of the market participants cost of capital
- (7) From a Grant Thornton analysis of the company's historical structure and an optimal capital structure for comparable companies.
- (8) Cost of debt formula (after-tax) equals (Corporate interest rate)\*(1-Corporate income tax rate)\*Debt/business enterprise).
- (9) Cost of equity formula equals (Cost of equity\*Equity/business enterprise). Range is based on plus/minus 1 of cost of equity estimate.
- (10) Bank of Canada. Monetary Policy Report Update - July 2008.
- (11) Real discount rate equals (1+nominal rate)/(1+inflation rate)-1.
- (12) Assume no long-term real growth over and above inflation.
- (13) Capitalization rate formula equals (1+nominal rate)/(1+real growth rate)-1.



This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.

**Comprehensive valuation report**  
**City of Edmonton - GBWWTP**  
 As at October 31, 2008  
 Historical balance sheets

**Schedule 5**

<b>December 31</b>	<b>2007</b>	<b>As at October 31</b>
<b>Assets</b>		
Current assets		
1 Cash and cash equivalents	\$ 10,211	\$ 8,379
2 Receivables	10,614	6,266
3 Miscellaneous	267	301
4	<u>21,092</u>	<u>14,946</u>
5 Contributed assets - net	39,514	38,180
6 Financed Assets-Net	212,600	221,973
7	<u>252,114</u>	<u>260,153</u>
8	<u>\$ 273,206</u>	<u>\$ 275,099</u>
<b>Liabilities</b>		
Current liabilities		
9 Bank indebtedness	\$ -	\$ -
10 Payables and accruals	11,962	7,503
11 Miscellaneous	1,379	1,606
12	<u>13,341</u>	<u>9,109</u>
13 Long Term Debt	144,756	139,615
<b>Shareholder's Equity</b>		
14 Contributed Assets	39,514	38,180
15 Retained earnings-invested	65,384	79,816
16 Retained earnings-to be invested	10,211	8,379
17	<u>115,109</u>	<u>126,375</u>
18	<u>\$ 273,206</u>	<u>\$ 275,099</u>



This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.

**Comprehensive valuation report  
City of Edmonton - GBWWTP**

**Schedule 6**

As at October 31, 2008

Historical and forecasted earnings (000s)

For the years ended December 31	2007	Estimated Oct-08 2008	Forecast 2008
<b>1</b> Utility	\$ 44,423	\$ 38,745	\$ 47,281
<b>2</b> ACRWC SWAP and Biosolids	635	346	415
<b>3</b> Overstrength	2,771	1,948	2,337
<b>4</b> Late Payment	142	98	118
<b>5</b> Goldbar	3,103	2,283	2,740
<b>6</b> Miscellaneous+Interest	602	409	491
<b>7 Total Revenue</b>	<u>51,676</u>	<u>43,829</u>	<u>53,382</u>
Expenses			
<b>8 Total O &amp; M</b>	24,261	21,771	26,125
<b>9</b> Billing	3,370	2,848	3,417
<b>10</b> Depreciation	6,118	5,305	6,366
<b>11</b> Interest	7,246	6,479	7,775
<b>12</b> Local access fee	3,840	3,294	3,953
<b>13</b>	<u>44,835</u>	<u>39,697</u>	<u>47,636</u>
<b>14</b> Earnings before income taxes	<u>\$ 6,841</u>	<u>\$ 4,133</u>	<u>\$ 5,746</u>
<b>15 Earnings as a percentage of revenue</b>	13.2%	9.4%	10.8%



This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.

Audit • Tax • Advisory

© Grant Thornton LLP. Canadian Member of Grant Thornton International Ltd. All rights reserved.

For the years ended December 31	Schedule Reference	Forecast													
		2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	Terminal Year	
<b>EPCOR Run Dividend Stream</b>															
1	Earnings before income taxes	7d	\$ 7,708	\$ 10,124	\$ 10,318	\$ 11,237	\$ 13,177	\$ 14,680	\$ 16,838	\$ 18,422	\$ 20,659	\$ 22,210	\$ 23,445	\$ 24,755	\$ 24,755
2	Estimated dividend to City		4,625	6,074	6,191	6,742	7,906	8,808	10,103	11,053	12,395	13,326	14,067	14,853	14,853
3	Net Present Value	12.2%	0.8663	0.7724	0.6886	0.6139	0.5474	0.4880	0.4351	0.3879	0.3458	0.3083	0.2749	0.2451	
4	PV Dividend		4,007	4,692	4,263	4,139	4,328	4,298	4,396	4,288	4,287	4,109	3,867	3,640	
5	Total NPV Cumulative Dividend over period		50,312												
6	Terminal multiple														9.84
7	Terminal value														146,137
8	PV of terminal value		35,815												
9	PV of all cashflows from an EPCOR run plant		\$ 86,127												

This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.



For the years ended December 31	Schedule Reference	Forecast													
		2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	Terminal Year	
<b>EPCOR Run Dividend Stream</b>															
1	Earnings before income taxes	7d	\$ 7,708	\$ 10,124	\$ 10,318	\$ 11,237	\$ 13,177	\$ 14,680	\$ 16,838	\$ 18,422	\$ 20,659	\$ 22,210	\$ 23,445	\$ 24,755	\$ 24,755
2	Estimated dividend to City		4,625	6,074	6,191	6,742	7,906	8,808	10,103	11,053	12,395	13,326	14,067	14,853	14,853
3	Net Present Value	11.7%	0.8712	0.7802	0.6987	0.6257	0.5604	0.5018	0.4494	0.4025	0.3604	0.3228	0.2891	0.2589	
4	PV Dividend		4,029	4,739	4,325	4,219	4,430	4,420	4,540	4,448	4,468	4,301	4,066	3,845	
5	Total NPV Cumulative Dividend over period		51,831												
6	Terminal multiple														10.35
7	Terminal value														153,698
8	PV of terminal value		39,787												
9	PV of all cashflows from an EPCOR run plant		<u>\$ 91,619</u>												

This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.



For the years ended December 31	Schedule Reference	Forecast													
		2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	Terminal Year	
<b>EPCOR Run Dividend Stream</b>															
1	Earnings before income taxes	7d	\$ 7,708	\$ 10,124	\$ 10,318	\$ 11,237	\$ 13,177	\$ 14,680	\$ 16,838	\$ 18,422	\$ 20,659	\$ 22,210	\$ 23,445	\$ 24,755	\$ 24,755
2	Estimated dividend to City		4,625	6,074	6,191	6,742	7,906	8,808	10,103	11,053	12,395	13,326	14,067	14,853	14,853
3	Net Present Value	11.2%	0.8761	0.7881	0.7090	0.6378	0.5737	0.5161	0.4643	0.4176	0.3757	0.3380	0.3040	0.2735	
4	PV Dividend		4,052	4,787	4,389	4,300	4,536	4,546	4,690	4,616	4,657	4,504	4,277	4,062	
5	Total NPV Cumulative Dividend over period		53,416												
6	Terminal multiple														10.91
7	Terminal value														162,084
8	PV of terminal value		44,329												
9	PV of all cashflows from an EPCOR run plant		\$ 97,745												

This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.



**Comprehensive valuation report**

**Schedule 7d**

**City of Edmonton - GBWWTP**

As at October 31, 2008

**EPCOR forecast future earnings before income taxes**

For the years ended December 31	Forecast											
	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
1 Total Revenue	59,515	65,114	71,137	75,610	80,351	85,378	90,707	96,129	101,863	104,835	107,493	110,219
Expenses												
2 Total O&M	32,825	35,073	38,556	39,713	40,904	42,131	43,395	44,697	46,038	47,419	48,842	50,307
3 Depreciation	7,023	7,754	8,452	9,073	9,681	10,351	11,063	11,874	12,403	12,667	12,942	13,217
4 Interest	5,358	7,128	8,308	9,737	10,369	11,605	12,386	13,689	14,870	14,415	13,934	13,397
5 Local access fee	4,601	5,035	5,503	5,850	6,219	6,610	7,025	7,447	7,893	8,125	8,331	8,543
6 Transaction costs	2,000											
7	51,807	54,990	60,819	64,373	67,174	70,698	73,869	77,707	81,204	82,625	84,049	85,464
8 Earnings before income taxes	<b>\$ 7,708</b>	<b>\$ 10,124</b>	<b>\$ 10,318</b>	<b>\$ 11,237</b>	<b>\$ 13,177</b>	<b>\$ 14,680</b>	<b>\$ 16,838</b>	<b>\$ 18,422</b>	<b>\$ 20,659</b>	<b>\$ 22,210</b>	<b>\$ 23,445</b>	<b>\$ 24,755</b>



This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.

Audit • Tax • Advisory

© Grant Thornton LLP. Canadian Member of Grant Thornton International Ltd. All rights reserved.

**Comprehensive valuation report**  
**Dividends from EPCOR Incremental Projects**

As at October 31, 2008

**Discounted cash flow summary (000s)**

**Schedule 8**

	<b>Schedule Reference</b>	<b>LOW</b>	<b>MIDPOINT</b>	<b>HIGH</b>
Present value of incremental dividend stream:				
<b>1</b> April 1, 2009 through December 31, 2020	<b>9</b>	42,885	55,707	70,288
<b>2</b> Terminal value	<b>9</b>	<u>11,663</u>	<u>20,645</u>	<u>38,602</u>
<b>3</b> Net present value		<u>54,548</u>	<u>76,352</u>	<u>108,891</u>
<b>4</b> <b>Rounded</b>		<b><u>54,500</u></b>	<b><u>76,400</u></b>	<b><u>108,900</u></b>



This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.

Audit • Tax • Advisory

© Grant Thornton LLP. Canadian Member of Grant Thornton International Ltd. All rights reserved.

For the years ended December 31	Schedule Reference	Forecast												Low Terminal Year	Midpoint Terminal Year	High Terminal Year	
		2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020				
1	Net earnings	10	\$ -	\$ 4,616	\$ 6,296	\$ 16,561	\$ 22,878	\$ 32,100	\$ 52,040	\$ 53,163	\$ 67,586	\$ 71,341	\$ 71,943	\$ 75,496	\$ 75,496	\$ 75,496	\$ 75,496
2	EPCOR dividend rate		60%	60%	60%	60%	60%	60%	60%	60%	60%	60%	60%	60%	60%	60%	60%
3	Dividends payable on forecasted earnings			2,770	3,778	9,937	13,727	19,260	31,224	31,898	40,551	42,804	43,166	45,297	45,297	45,297	45,297
4	Terminal Multiple													4.21X	5.07X	6.36X	
5	Terminal Value													\$ 190,887	\$ 229,587	\$ 287,969	
6	Time factor		1.00	2.00	3.00	4.00	5.00	6.00	7.00	8.00	9.00	10.00	11.00	12.00	12.00	12.00	
7	Present value factor - low		0.792	0.628	0.497	0.394	0.312	0.247	0.196	0.155	0.123	0.097	0.077	0.061	0.061	0.090	0.134
8	Cost of Equity - Low		26%														
9	Net present value - annual			1,738	1,878	3,914	4,283	4,761	6,114	4,948	4,984	4,167	3,329	2,768	11,663		
10	Net present value - cumulative			1,738	3,616	7,530	11,813	16,574	22,689	27,637	32,621	36,788	40,117	42,885			
11	Present value factor - midpoint		0.818	0.669	0.548	0.448	0.367	0.300	0.245	0.201	0.164	0.134	0.110	0.090			
12	Cost of Equity - Midpoint		22%														
13	Net present value - midpoint			3,090	2,069	4,452	5,031	5,775	7,660	6,402	6,659	5,751	4,744	4,073		20,645	
14	Net present value - cumulative			3,090	5,159	9,611	14,642	20,418	28,078	34,480	41,139	46,890	51,634	55,707			
15	Present value factor - high		0.846	0.715	0.605	0.512	0.433	0.366	0.310	0.262	0.222	0.187	0.158	0.134			
16	Cost of Equity - High		18%														
17	Net present value - annual			1,982	2,266	5,086	5,942	7,052	9,669	8,355	8,984	8,021	6,841	6,072			38,602
18	Net present value - cumulative		\$ -	\$ 1,982	\$ 4,267	\$ 9,353	\$ 15,295	\$ 22,346	\$ 32,016	\$ 40,371	\$ 49,354	\$ 57,375	\$ 64,216	\$ 70,288			

This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.



**Comprehensive valuation report**  
**Dividends from EPCOR Incremental Projects**  
As at October 31, 2008  
Forecast future net earnings (000's)

Schedule 10

For the years ended December 31	Forecast												
	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	Terminal Year
1 Construction revenue	\$ 90,999	\$ 31,756	\$ 191,338	\$ 111,547	\$ 170,736	\$ 364,476	\$ 27,486	\$ 265,311	\$ 77,763	\$ 24,177	\$ 77,603	\$ -	\$ 119,000
2 Interest income	-	7,766	10,314	26,411	35,340	49,070	78,957	79,335	99,787	103,573	102,398	105,457	105,457
3 Annual operating revenue	-	10,973	15,173	39,793	55,274	79,382	131,093	138,214	179,700	195,618	204,149	221,232	221,232
4 Sustaining capital revenue	-	2,163	2,991	7,844	10,896	15,648	25,842	27,245	35,423	38,561	40,243	43,610	43,610
5 Total Revenue	90,999	52,658	219,816	185,596	272,245	508,575	263,379	510,106	392,673	361,929	424,393	370,299	489,299
6 Construction cost	(90,999)	(31,756)	(191,338)	(111,547)	(170,736)	(364,476)	(27,486)	(265,311)	(77,763)	(24,177)	(77,603)	-	(119,000)
7 Operating cost	-	(9,327)	(12,897)	(33,824)	(46,983)	(67,474)	(111,429)	(117,482)	(152,745)	(166,275)	(173,527)	(188,047)	(188,047)
8 Sustaining capital cost	-	(2,120)	(2,931)	(7,687)	(10,678)	(15,335)	(25,325)	(26,701)	(34,715)	(37,790)	(39,438)	(42,738)	(42,738)
9 Interest	-	(2,953)	(3,906)	(10,005)	(13,344)	(18,490)	(29,751)	(29,728)	(37,336)	(38,565)	(37,902)	(38,853)	(38,853)
10 Total expenses	(90,999)	(46,156)	(211,072)	(163,063)	(241,741)	(465,775)	(193,992)	(439,222)	(302,559)	(266,808)	(328,469)	(269,638)	(388,638)
11 Earnings before income taxes	-	6,502	8,744	22,532	30,504	42,800	69,387	70,884	90,114	95,121	95,924	100,661	100,661
12 Income taxes	-	(1,886)	(2,448)	(5,971)	(7,626)	(10,700)	(17,347)	(17,721)	(22,529)	(23,780)	(23,981)	(25,165)	(25,165)
13 Net earnings	\$ -	\$ 4,616	\$ 6,296	\$ 16,561	\$ 22,878	\$ 32,100	\$ 52,040	\$ 53,163	\$ 67,586	\$ 71,341	\$ 71,943	\$ 75,496	\$ 75,496

This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.



## EPCOR Transfer Fee

As at October 31, 2008

## Discounted cash flow - low

	2009	2010	2011	2012	2013	2014	2015
<b>1 Transfer fee payments</b>	\$ 17,500	\$ 15,000	\$ 14,000	\$ 12,000	\$ 10,000	\$ 6,400	\$ 100
<b>2 Time factor</b>		1.00	2.00	3.00	4.00	5.00	6.00
<b>3 Present value factor</b>	1.000	0.909	0.826	0.751	0.683	0.621	0.564
<b>4 WACC - low</b>	<u>10.00%</u>						
<b>5 Net present value - annual</b>	<u>17,500</u>	<u>13,636</u>	<u>11,570</u>	<u>9,016</u>	<u>6,830</u>	<u>3,974</u>	<u>56</u>
<b>6 Net present value - cumulative</b>	<u>\$ 17,500</u>	<u>\$ 31,136</u>	<u>\$ 42,707</u>	<u>\$ 51,722</u>	<u>\$ 58,553</u>	<u>\$ 62,526</u>	<u>\$ 62,583</u>



This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.

## EPCOR Transfer Fee

As at October 31, 2008

## Discounted cash flow - midpoint

	2009	2010	2011	2012	2013	2014	2015
<b>1 Transfer fee payments</b>	\$ 17,500	\$ 15,000	\$ 14,000	\$ 12,000	\$ 10,000	\$ 6,400	\$ 100
<b>2 Time factor</b>		1.00	2.00	3.00	4.00	5.00	6.00
<b>3 Present value factor</b>	1.000	0.926	0.857	0.794	0.735	0.681	0.630
<b>4 WACC - midpoint</b>	<u>8.00%</u>						
<b>5 Net present value - annual</b>	<u>17,500</u>	<u>13,889</u>	<u>12,003</u>	<u>9,526</u>	<u>7,350</u>	<u>4,356</u>	<u>63</u>
<b>6 Net present value - cumulative</b>	<u>\$ 17,500</u>	<u>\$ 31,389</u>	<u>\$ 43,392</u>	<u>\$ 52,918</u>	<u>\$ 60,268</u>	<u>\$ 64,624</u>	<u>\$ 64,687</u>



This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.

## EPCOR Transfer Fee

As at October 31, 2008

## Discounted cash flow - high

	2009	2010	2011	2012	2013	2014	2015
<b>1 Transfer fee payments</b>	\$ 17,500	\$ 15,000	\$ 14,000	\$ 12,000	\$ 10,000	\$ 6,400	\$ 100
<b>2 Time factor</b>		1.00	2.00	3.00	4.00	5.00	6.00
<b>3 Present value factor</b>	1.000	0.943	0.890	0.840	0.792	0.747	0.705
<b>4 WACC - high</b>	<u>6.00%</u>						
<b>5 Net present value - annual</b>	<u>17,500</u>	<u>14,151</u>	<u>12,460</u>	<u>10,075</u>	<u>7,921</u>	<u>4,782</u>	<u>70</u>
<b>6 Net present value - cumulative</b>	<u>\$ 17,500</u>	<u>\$ 31,651</u>	<u>\$ 44,111</u>	<u>\$ 54,186</u>	<u>\$ 62,107</u>	<u>\$ 66,890</u>	<u>\$ 66,960</u>



This schedule forms part of, and should be read in conjunction with, the accompanying Grant Thornton LLP Comprehensive Valuation Report dated January 7, 2009.

Date (offer)	Target	Buyer	Transaction Value	Implied EV/EBITDA	Implied EV/Revenue	Revenue of Target (USD)	Geography of Target
11/10/2008	AS Tallinna Vesi	Parvus Asset Management (UK) LLP	NA	NA	NA	940.7	Estonia
11/04/2008	New Daleville Wastewater System in Londonderry Township, Chester County	Aqua Pennsylvania, Inc.	0.1	NA	NA	NA	US
11/03/2008	Suez Environnement S.A.	Barwa Real Estate Company; Qatari Diar; Qinvest LLC, Investment Arm	NA	NA	NA	12,288.5	France
10/23/2008	Produced Water Solutions, Inc.	Montana Mining Corp.	0.4	NA	NA	NA	Canada
10/03/2008	Novasaur	Cube Infrastructure Fund; IXIS Environnement & Infrastructures	100.0	NA	NA	NA	France
09/10/2008	Three Lane Utilities, Inc.	Pennsylvania—American Water Company	1.0	NA			US
08/28/2008	Valley Road Sewerage Co., Wastewater System Assets	New Jersey—American Water Company, Inc.	NA	NA	NA	NA	US
08/19/2008	Meadowview Wastewater Facility & Highlands Wastewater Facility	Artesian Wastewater Maryland, Inc.	7.8	NA	NA	NA	US
08/19/2008	Cherry Hill Wastewater Facility & Harbourview Wastewater Facility	Artesian Wastewater Maryland, Inc.	NA	NA		3.8	US
08/19/2008	Water Facilities in Meadowview, Pine Hills, Harbour View and Route 7 Facility	Artesian Water Maryland, Inc.	NA	NA		2.2	US
06/02/2008	Water Utility Assets	Pennsylvania—American Water Company	0.24	NA			US
05/30/2008	Felton Water Company	San Lorenzo Valley Water District	13.4	NA			US
05/26/2008	Hera S.p.A.	Iride S.p.A.	NA	NA	NA	3,163.4	Italy
05/05/2008	Regulated Wastewater and Irrigation System	Aqua Utilities Florida, Inc.	1.6	NA	NA	NA	US
03/07/2008	Morrison Utility Services Limited	Cognetas Fund II; Cognetas LLP; Englefield Capital LLP	135.0	NA	0.3	500.0	UK
03/04/2008	SITA Sverige AB	Suez Environnement S.A.	NA	NA	NA	214.0	Sweden
02/21/2008	Prodesa Agua, S. L.	Sociedad de Fomento Agrícola Castellonense, S.A.	NA	NA	NA	NA	Spain
02/14/2008	Water and Wastewater Systems in Southwest Pennsylvania	Pennsylvania—American Water Company	2.0	NA	NA	NA	US
02/08/2008	Aquavitae UK Ltd.	NA	NA	NA	NA	NA	UK
01/31/2008	Birmingham Water Works and Sewer Board, Riverview Sewer System	SWWC Utilities, Inc.	22.5	NA	NA	NA	US
01/21/2008	Tratamiento y Concentración de Líquidos, S.L.	Befesa Medio Ambiente SA	NA	NA	NA	NA	Spain
12/31/2007	Jumper Creek Manor Water and Wastewater Systems	Aqua Utilities Florida, Inc.	0.1	NA	NA	NA	US
12/31/2007	Stanton Ridge Wastewater System	Aqua New Jersey, Inc.	0.1	NA	NA	NA	US
12/27/2007	Aqua Virginia, Inc., Henrico County Operations	County of Henrico	1.5	NA			US
12/26/2007	Western Hancock Utilities, LLC	Aqua Indiana, Inc.	5.0	NA	NA	NA	US
12/20/2007	Waikoloa Resort Utilities, Inc.	Hawaii Water Service Company	6.3	NA	NA	NA	US
12/20/2007	Village of Sun River Terrace Water System	Aqua Illinois, Inc.	0.1	NA			US
12/20/2007	Waikoloa Land & Cattle Co., Waikoloa Water Co., Inc. and Waikoloa Sanitary Sewer Co., Inc.	Hawaii Water Service Company	1.5	NA			US
12/07/2007	3 Water Systems in Virginia	Aqua Virginia, Inc.	0.2	NA			US
12/04/2007	Ruas S.A.	Veolia Environnement SA	NA	NA	NA	28.0	France
11/23/2007	United Utilities Electricity Limited (nka:Electricity North West Limited)	Colonial First State Asset Management (Australia) Limited; J.P. Morgan Asset Management Buyer Funds: JPMorgan Infrastructure Investments	3,866.15	6.8x			UK
11/22/2007	Kelda Group Ltd	Citi Infrastructure Investors; GIC Special Investments; HSBC Bank plc; Infracapital Partners LP; M&G Investment Management Ltd.	5,552.6	11.1x	6.5x	855.8	UK
11/21/2007	Johnny Flo Septic Treatment, Inc.	RMS Holdings, Inc.	NA	NA	NA	NA	US
11/21/2007	Water Solutions Group LLC	RMS Holdings, Inc.	NA	NA	NA	NA	US
10/24/2007	Kerrville South Water Company, Inc.	Aqua Utilities, Inc.	2.9	NA			US
10/11/2007	Intercoastal Utilities, Inc.	St. Johns County Utility Department	24.5	NA	NA	NA	US
10/09/2007	Southern Water Services Ltd.	Challenger Financial Services Group, Asset Management Arm; Challenger Infrastructure Fund; Hermes Private Equity; J.P. Morgan Asset Management; UBS AG	NA	NA	7.0	601.6	UK
10/08/2007	Wastewater System in Pennsylvania	Aqua Pennsylvania, Inc.	NA	NA	NA	NA	US
10/01/2007	North Chatham Water and Sewer Company, LLC	Aqua North Carolina, Inc.	0.1	NA	NA	NA	US

Date (offer)	Target	Buyer	Transaction Value	Implied EV/EBITDA	Implied EV/Revenue	Revenue of Target (USD)	Geography of Target
09/19/2007	VA TECH WABAG GmbH	Va Tech Wabag Ltd	100.0	NA	NA	NA	Austria
09/19/2007	Pelican Island Water System	New Jersey—American Water Company, Inc.	NA	NA	NA	NA	US
09/18/2007	Energeo Environnement	Athnor Equities SA	NA	NA	NA	NA	France
09/03/2007	Suez Environnement S.A.	Suez SA	5,453.4	7.7x	1.2x	NA	France
08/20/2007	Auburn Lakes Limited Partnership, Auburn Lakes Water System	Aqua Ohio, Inc.	0.4	NA	NA	NA	US
08/07/2007	Mountain Hill Water Company, LLC	Artesian Maryland	6.0	NA	NA	NA	US
07/03/2007	Anoxkaldnes AB	Veolia Water Solutions & Technologies	700.0	NA	NA	NA	Sweden
07/03/2007	Harper Water Company Inc.	Aqua Utilities, Inc.	1.5	NA	NA	NA	US
06/29/2007	Eastern Connecticut Regional Water Company Inc.	The Connecticut Water Company	3.5	NA	NA	NA	US
06/18/2007	AOS Operating Company	United Water Resources, Inc.	6.6	NA	0.2	30.0	US
06/02/2007	Uli Lippuner AG	Straub AG, Ingenieure + Geoinformatiker	NA	NA	NA	NA	Switzerland
05/04/2007	Water Services, Inc.	Southwest Water Co.	NA	NA	NA	NA	US
05/04/2007	Diamond Water Company	Southwest Water Co. (NasdaqGS:SWWC)	NA	NA			US
05/01/2007	Water and Wastewater Systems in Florida, North Carolina and Pennsylvania	Aqua America Inc.	0.5	NA	NA	NA	US
04/30/2007	Aquarion Water Company of Sea Cliff, Inc.	Aqua New York, Inc.	7.0	NA	NA	NA	US
04/18/2007	Novasaur	AXA Investment Managers S.A.; Caisse des Dépôts et Consignations; Seche Environnement SA	2,698.5	17.9x	1.7x	1,457.3	France
04/13/2007	Nation Water Treatments Limited	NCH (UK) Limited	NA	NA	NA	NA	UK
03/31/2007	Severn Trent Water Purification Ltd.	ABB Ltd. (VIRTX:ABBN)	NA	NA	NA	NA	UK
03/20/2007	Redstone Water Company, Inc.	Pennsylvania—American Water Company	0.49	NA	NA	NA	US
03/01/2007	North Mississippi Utility Co., Inc.	Southwest Water Co.	NA	NA	NA	NA	US
03/01/2007	Wastewater System in Sussex County	Tidewater Utilities, Inc.	NA	NA	NA	NA	US
02/16/2007	Southern Water Services Ltd.	Royal Bank Equity Finance	300.0	NA	NA	NA	UK
02/01/2007	Carpenters Point Water Co., Inc.	Artesian Resources Corp. (NasdaqGM:ARTN.A)	NA	NA	NA	NA	US
01/09/2007	Water System and Wastewater System in Virginia	Aqua America Inc.	1.2	NA	NA	NA	US
01/05/2007	Two Wastewater Collection and Treatment Systems in Sussex County	Middlesex Water Co.	0.6	NA	NA	NA	US
01/01/2007	Seven Seas Water Corp.	Element Venture Partners; Texas Pacific Group (nka:TPG)	NA	NA	NA	NA	US
12/31/2006	Biovac Sp. z.o.o.		NA	NA	NA	NA	Norway
12/21/2006	5 Water and WasteWater System Assets in New Jersey & North Carolina	Aqua America Inc.	0.1	NA	NA	NA	US
12/14/2006	S.J. Services Inc.	New Jersey—American Water Company, Inc.	NA	NA	NA	NA	US
12/13/2006	AQUAssist Wasserservice GmbH	Veolia Environnement SA (ENXTPA:VIE)	NA	NA	NA	NA	Austria
06/28/2006	Thessaloniki Water and Sewerage Company SA (ATSE:EYAPS)	Suez (ENXTPA:SZE)	NA	NA	NA	NA	Greece
<b>Average</b>				<b>10.9x</b>	<b>2.8x</b>		

