Memorandum

To	Joe Nethery, Manager, Priority Development Projects
From	Gary Scandlan, Managing Partner
Date	September 25, 2022
Re:	Milton Quarry East Extension, Town of Halton Hills Fiscal Impact Study – Peer Review Comments

Fax ☐ Courier ☐ Mail ☐ Email ☒

1. Introduction

The Joint Agency Review Team (JART) is currently undertaking a review of an application for expansion of the Milton Quarry into the Town of Halton Hills. The JART is comprised of representatives from the Town of Halton Hills, Regional Municipality of Halton, the Niagara Escarpment Commission, and Conservation Halton. As part of the submission package submitted by CRH Canada Group Inc. (CRH), a financial impact analysis was to be completed. The JART retained Watson & Associates Economists Ltd. (Watson) to conduct a peer review of the financial impact analysis. CRH retained Altus Group Economic Consulting (Altus) to undertake a fiscal impact study on the proposed Milton Quarry East Extension. The following provides Watson's peer review discussion and analysis with respect to the Fiscal Impact Study dated November 15, 2021 (herein referred to as the Altus Report).

2. General Observations

In general, the fiscal impact study prepared by Altus focuses on revenues the municipality will receive (e.g. property taxes, TOARC fees, etc.). With respect to operating expenditures, the approach taken is based on incremental assessment rather than incremental employment. Further, the relative share of non-residential expenditures is based on the amount of non-residential assessment relative to residential assessment as opposed to the split of population versus employment.

With respect to the anticipated tonnage of aggregate to be extracted, it is unclear whether the amount utilized in the analysis is in addition to the current extraction amount, or the total tonnage to be extracted. If the amount utilized is not additional to the existing amount (i.e. the new extraction amounts will replace the existing), this would imply that the revenues identified are not incremental to existing revenues. If the argument of the applicant is that without the quarry extensions, the revenue would no longer be provided to the Town and Region, the fiscal impact study should also include a scenario which identifies the fiscal impact of this option. Further, as the expansion is

located in Halton Hills, if the tonnage is a replacement of existing extraction amounts, then Halton Hills will receive aggregate revenues, and Milton may lose aggregate revenues.

The following sections discuss each area of the fiscal impact study in further detail, organized by sections as they relate to the study.

3. Discussion by Section

3.1 Introduction

This section summarizes the development location, proposed extraction areas within the extension, traffic impacts and monitoring and mitigation programs.

3.2 Fiscal Impact Analysis

3.2.1 Assumptions and Inputs

This section outlines the assumptions utilized in the fiscal impact analysis including the financial data source and the tonnage of aggregate anticipated to be extracted each year.

It is unclear if the average extraction amount of 5.5 million tonnes per year will be in addition to current extraction levels or replacing some portion of the existing extraction amounts. Based on Section 3 of the Traffic Impact Study/Haul Route Assessment (included as part of the Applicant's submission package), it is stated that "the extension is not projected to increase production as per input from the project team". Whether the tonnage is incremental or is replacing existing extraction amounts should be clarified in the analysis. It is also stated that the main processing plant may have to be removed, which would reduce annual extraction amounts to 2,000,000 tonnes. Similarly, clarification on whether this tonnage is incremental, or part of the existing extraction amounts is needed.

The financial information return (FIR) data and tax rates utilized in this report are based on 2019 data. Given that 2021 data is now available, it is suggested that the most recent information be used to update the analysis (along with other changes noted in this peer review).

Section 2.2 of the Altus Report discusses the net change in municipal revenue, including changes in tax revenues. There are two areas of discussion regarding this topic: assessment assumptions and tax class assumptions. These are discussed further below:

3.2.2 Rehabilitation, Long-term Monitoring, and Pumping Costs

The rehabilitation of the site and long-term monitoring of the water supply, along with any related costs such as pumping, would be the financial responsibility of the applicant. Although this is a cost to be funded by the applicant, should the applicant no longer own/maintain the property in the future (e.g. through bankruptcy or other means), the costs may be borne by the municipality.

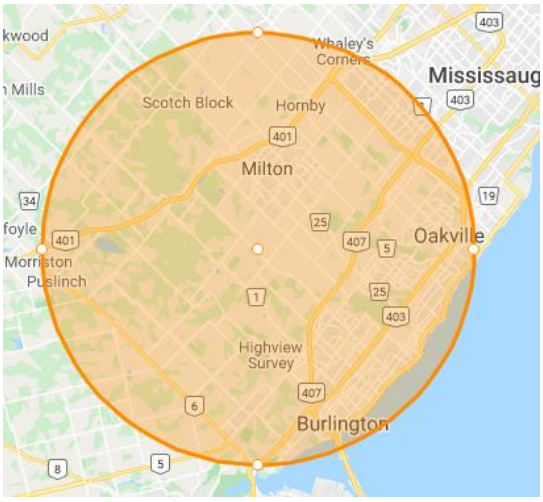
The applicant may note that agreements will be pursued with landowners, however, under these agreements are in place, the applicant should provide further details on how they will ensure the public does not bear the cost burden.

At a minimum, an estimate of the rehabilitation costs and long-term monitoring and pumping costs should be identified in the financial impact analysis to provide the municipalities with an estimated cost that may be incurred in the future.

3.2.3 Assessment Assumptions

In estimating the assessment to be generated from the expansion of the quarry, Altus undertook a survey of various quarries. In general, Watson would agree with this approach, however, it would be more appropriate to survey quarries in the area, rather than quarries in other municipalities. As part of the Assessment Act, section 44 (3) (b) notes that land valuation will have reference to the value of similar lands in the vicinity and make adjustments to maintain equity with these lands. As a result, a survey of quarry properties in the vicinity should be undertaken in estimating the assessed value. A survey undertaken by Watson is shown below, along with a map of the area surveyed.

Area Surveyed



Survey of Properties with MPAC Property Code 593 (Gravel Pit, Quarry, Sand Pit)

Address	Municipality	Assessed Value	Area (acres)	Assessed Value/ Acre
834 BROCK RD	Hamilton	$6,061,000	666.35	$9,096
3333 DERRY RD	Milton	$1,506,000	99.76	$15,096
DUBLIN LINE	Milton	$11,980,000	772.82	$15,502
9410 DUBLIN LINE	Halton Hills	$5,156,000	393.74	$13,095
10371 ESQ-NASS TWN LINE	Halton Hills	$31,000	2.26	$13,717
10379 ESQ-NASS TWN LINE	Halton Hills	$12,400	0.83	$14,940
10391 ESQ-NASS TWN LINE	Halton Hills	$14,900	1.00	$14,900
10413 ESQ-NASS TWN LINE	Halton Hills	$15,000	1.00	$15,000
10461 ESQ-NASS TWN LINE	Halton Hills	$127,000	8.49	$14,959
10479 ESQ-NASS TWN LINE	Halton Hills	$1,979,000	240.00	$8,246
1775 KING RD	Burlington	$1,652,000	111.16	$14,861
NASS-ESQ TWN LINE	Milton	$2,507,000	164.45	$15,245
NASS-ESQ TWN LINE	Milton	$30,000	2.00	$15,000
NASS-ESQ TWN LINE	Milton	$36,000	2.41	$14,938
10262 NASS-ESQ TWN LINE	Milton	$131,000	8.75	$14,971
10380 NASS-ESQ TWN LINE	Milton	$75,000	5.00	$15,000
10446 NASS-ESQ TWN LINE	Milton	$568,000	41.00	$13,854
10494 NASS-ESQ TWN LINE	Milton	$514,000	44.94	$11,437
1775 KING RD	Burlington	$1,652,000	111.16	$14,861
2435 NO 2 SIDE RD	Burlington	$9,029,000	540.40	$16,708
SECOND LINE	Milton	$2,140,000	204.61	$10,459
3488 TREMAINE RD	Burlington	$1,861,000	94.90	$19,610
7204 WALKERS LINE	Milton	$1,325,000	98.00	$13,520
7384 WALKERS LINE	Milton	$3,332,000	220.40	$15,118
1570 YORKTON CRT*	Burlington	$12,693,000	83.66	$151,721
Total		**$51,734,300**	**3,835.43**	**$13,489**

Summary by Municipality	Hamilton	$6,061,000	666.35	$9,096
	Milton	$24,144,000	1,664.14	$14,508
	Burlington	$14,194,000	857.62	$16,550
	Halton Hills	**$7,335,300**	**647.32**	**$11,332**

If the survey of all properties in the area is utilized, the average assessed value per acre is $13,490. However, if only Halton Hills properties are utilized, the value per acre is $11,330. Note, this amount would apply to the entire property (i.e. all tax classes), whereas the Altus approach was to identify different assessed values for different parts of the property.

If the data Altus presented were to be used, then there are a few discrepancies between the data presented and the data retrieved by Watson:

Altus Report

Address	Municipality	Assesed Value	Site Size (Acres)	Assessment Value/Acre
7237 Wellington Rd 124	Guelph/Eramosa	$1,949,000	222	$8,779
600 Highway 5 W	Hamilton	$8,065,000	207	$39,027
9410 Dublin Line	Halton Hills	$5,156,000	394	$13,095
2433 No.2 Sideroad	Burlington	$9,028,400	546	$16,535
822 Rest Acres Rd	Brant	$1,167,000	119	$9,819
4459 Concession 7	Puslinch	$2,456,000	100	$24,560
437075 4th Line	Melancthon	$1,297,000	50	$26,139
3030 Ament Line	Wellesley	$2,891,000	40	$71,489
Total		**$32,009,400**	**1678**	**$19,084**

Watson Check

Address	Municipality	Assesed Value	Site Size (Acres)	Assessment Value/Acre
7237 Wellington Rd 124	Guelph/Eramosa	$1,949,000	222	$8,779
600 Highway 5 W	Hamilton	$8,065,000	206.65	$39,027
9410 Dublin Line	Halton Hills	$5,156,000	393.74	$13,095
2433 No.2 Sideroad	Burlington	$9,029,000	540.4	$16,708
822 Rest Acres Rd	Brant	$1,167,000	118.85	$9,819
4459 Concession 7	Puslinch	$2,456,000	100	$24,560
437075 4th Line	Melancthon	$516,000	49.62	$10,399
3030 Ament Line	Wellesley	$3,241,000	40.44	$80,143
Total		**$31,579,000**	**1672**	**$18,890**

Source: MPAC data - Accessed January 17, 2022

As presented in the table above, the assessed values and acres are slightly different for three of the sample quarries. This results in a minor reduction in the assessment per acre calculations ($19,084 to $18,890). In addition to the above, it would appear that the assessed value of the 3030 Ament Line property is an outlier in the data (in terms of assessed value per acre, especially when compared to the Melancthon quarry which is a similar size but approximately one-third of the assessed value per acre). As a result, it should be excluded from the average assessed value calculations. When this property is excluded, the assessment per acre decreases to $17,370 (rounded).

In preparing the analysis a range of assessed values may be included with a low of $11,330 of assessment per acre (Watson approach) and a high of $17,370 of assessment per acre (Altus approach, adjusted).

When applying the $17,370 per acre to the areas provided in Figure 3 of the Altus Report, this reduces the estimated increase in the total assessed value from a gain of $302,250 (Altus calculations) to a gain of $53,910. When utilizing the $11,330 per acre, the decrease is now reduced to a loss of $867,600 in assessment.

3.2.4 Tax Class Assumptions

Currently the proposed quarry extension is assessed as 100% residential, however, the analysis assumes that all of the licensed area of the extension would be assessed as industrial, and the remaining area would be assessed as farmland/managed forest. This results in the following breakdown:

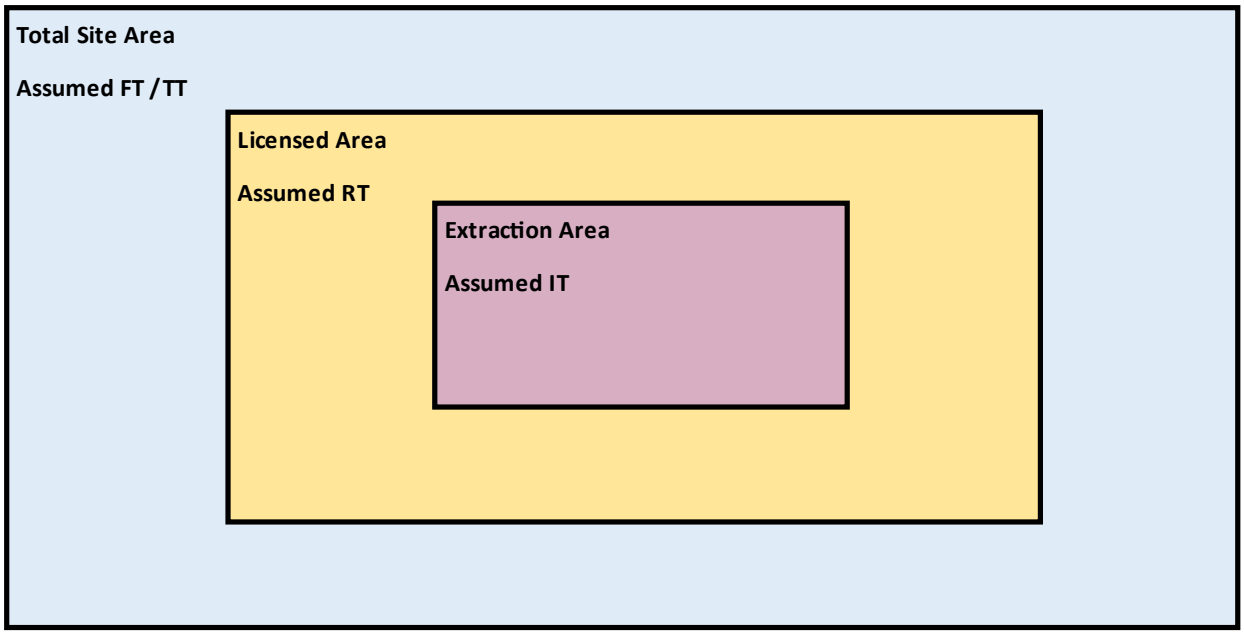
Current Quarry Assessment

Tax Class	Tax Code	Assessed Value	Share of Assessed Value
Residential	RT	2,721,000	100%
Farmland	FT	-	0%
Managed Forests	TT	-	0%
Industrial	IT	-	0%
Total		**2,721,000**	

East Extension Assumptions as per Altus Report

Tax Class	Tax Code	Assessed Value	Share of Assessed Value
Residential	RT	-	0%
Farmland	FT	340,125	11%
Managed Forests	TT	340,125	11%
Industrial	IT	2,342,996	77%
Total		**3,023,246**	

Based on the Assessment Act, it would appear that the industrial assessment (IT) applies only to the extraction area, residential assessment (RT) would apply to the remaining licensed area, and any remaining lands would be assessed based on use (50% farmland (FT) and 50% managed forests (TT) may be a fair assumption). This is provided in the following diagram:



We would note that this would be a fair assumption as the actual assessment class would depend on the use as per the Assessment Act. For example, if the use is farming by a bona-fide registered tenant farmer then it might be FT otherwise, if farmed it could be RT at farmland assessment rates. The same would apply for the Managed Forest portions if the owner applies to the Ministry of Natural Resources and Forestry for the TT tax class consideration.

It should also be noted that the Altus report has utilized the Managed Forest tax rate for the FT/TT category. It is unclear from the report what the share of land at the extension would be between these two categories, however the Managed Forest tax rate is higher than the Farmland tax rate for both the Region and Town. Given that the Altus report has applied the higher Managed Forest tax rate to the entire area, the relative share of these two classes should be clarified and the appropriate tax rates should be applied to the respective assessment. For the purposes of the analysis shown below, it is assumed that the unlicensed lands would be 50% FT and 50% TT.

In conjunction with the reduced assessment per acre assumptions, this would provide the following breakdown of tax classes for each of the extensions:

East Extension Assumptions - Revised

Low Assessment Assumptions

Tax Class	Tax Code	Assessed Value	Share of Assessed Value
Residential	RT	400,358	21.6%
Farmland	FT	503,947	27.2%
Managed Forests	TT	503,947	27.2%
Industrial	IT	445,153	24.0%
Total		**1,853,404**	

High Assessment Assumptions

Tax Class	Tax Code	Assessed Value	Share of Assessed Value
Residential	RT	613,788	22.1%
Farmland	FT	739,329	26.6%
Managed Forests	TT	739,329	26.6%
Industrial	IT	682,463	24.6%
Total		**2,774,910**	

The tax rates for residential properties are lower than industrial for both the Region and the Town. As a result, a shift from industrial assessment to residential assessment will reduce the anticipated tax revenue received by the Region and the Town

The anticipated revenue from the extension would be approximately 55% lower than calculated in the Altus Report for the Region and the Town (or $15,700 as compared to $35,000) for the high scenario (Altus approach, adjusted) and approximately 71% lower than calculated in the Altus Report (or $10,300 as compared to $35,000) for the low scenario (Watson approach).

3.2.5 Annual Aggregate Levy Fees

The calculation of the aggregate levy revenues to the municipalities is completed correctly, however, it remains unclear on whether the 5,500,000 tonnes of aggregate extraction is in addition to current operations. If the extraction amounts are the same before and after the extension (i.e. the extraction from the new quarry extension will replace the amounts from the existing site), there would be no increase in revenues to the municipalities. Further, if this extraction amount is not in addition to current operations, it is unclear what the impacts on the Town of Milton would be as a result of the relocation of extraction from Milton to Halton Hills. It is suggested that this be clarified.

3.2.6 Net Additional Municipal Expenditures

In estimating the impacts to the municipalities' budgets, a review of incremental operating expenditures (net of revenues) was undertaken. The basis for the operating expenditures is the Region and Town's FIRs. This is consistent with the information that Watson would utilize in this analysis, however it is suggested that the data used be updated to reflect the most recent FIR data available.

Expenditures have been allocated to the non-residential sector based on the non-residential sector's proportionate share of assessment within the Town. This approach is not typically how Watson would apportion costs as the rationale for applying the shares based on assessment is unclear. For example, with respect to roads services, it is unclear how assessment shares relate to the share of the use of roads. Typically, Watson would apportion costs based on the ratio of existing population to employment as this is more indicative of the usage of services. Based on existing population and

employment figures for Halton Hills, the non-residential share of costs would be approximately 25% as opposed to the 16% utilized in the analysis.

The Altus Report uses incremental property assessment to estimate the change in operating expenditures. This approach is not typically utilized by Watson; however, it was noted that this approach has been used and accepted at the LPAT (now known as the OLT). As a result, Watson would not comment on the validity of this approach.

Within Altus' analysis, an assumed growth factor is used to identify how each service's expenditures would change with the addition of the development (and corresponding loss of the existing properties). Further rationale on the growth factor for Roads and Winter Control should be provided. It is assumed that for every dollar of assessment gained, the operating cost of roads and winter control services will increase proportionately, however, it is unclear whether increased truck traffic would lead to a further increase in costs. If the truck traffic is a continuation of existing levels, this should be identified.

3.3 Change to Municipal Revenues

3.3.1 Net Change to Municipal Fiscal Position

Section 3.1 of the Altus report provides for the net fiscal impact on the Town's budget. A net impact should also be provided for the Region's fiscal position. In addition, financial impacts to the Town of Milton should also be noted here (e.g. changes to aggregate levy revenues, changes to operating expenditures etc.).

Three categories of impacts were included: property taxes, aggregate levy, and operating expenditures. The following provides a summary of the items that were and/or should have been considered in the net fiscal impact:

1. **Property Taxes:** Altus Report assumed an increase in tax revenue of $10,616 for the Town of Halton Hills. As noted in section 2 of this report, it is anticipated there would be a decrease in property tax revenue relative to this amount.

2. **Aggregate Levy:** Altus Report assumed incremental aggregate levy revenues of $697,840 for the Town of Halton Hills. As noted in section 3.2.4 of this report, this is based on an extraction amount of 5,500,000 tonnes. It is unclear if this tonnage is incremental to what is currently being extracted from the existing quarry and what these impacts are on the Town of Milton.

3. **Operating Expenditures:** As noted in section 3.2.5 of this report, it appears the increase in operating expenditures was understated. This increase in operating expenditures should have a larger impact on the overall fiscal position of the Town.

4. **Overall Net Fiscal Impact:** Based on the above, it would appear that the net fiscal impact on the Town's budgets may be less positive than what has been identified in the Altus report. As noted, commentary should also be provided on the overall net fiscal impact for the Region and the Town of Milton.

3.3.2 Sensitivity Analysis

Section 3.2 of the Altus report indicates that the main processing plant may need to be removed and replaced with portable processing plants, in which case only 2,000,000 tonnes would be shipped annually, as opposed to the 5,500,000 previously identified. The report notes that the only impact would be a reduction in aggregate levy revenues, however, it remains unclear as to whether the 2,000,000 tonnes is incremental or is replacing an existing extraction amount. This should be clarified.

3.4 Economic Impacts

The Altus Report estimates the economic impacts of the quarry expansion using the standard Input-Output model. This approach estimates the impacts using multiplier data from Statistics Canada. The anticipated employment, wages, and taxes are estimated based on the assumed Gross Domestic Product from sales of 5,500,000 tonnes of aggregate per year. In general, the approach to the calculations appears valid and consistent with the approach Watson would undertake. However, the economic impact of the ongoing operations (section 4.2.4 of the Altus report) should clarify that this would be a continuation of the existing levels of economic activity and not incremental to the existing operations.

The model assumptions in section 4.2.2 of the Altus report indicates that the aggregate amount of 5,500,000 tonnes would be produced for 2.5 years. Clarification on whether the quarry will cease operations after this point in time should be provided.

Figure 10 in the Altus report indicates that 242 full-time equivalent jobs would be supported through direct operation of the quarry. It is unclear whether this figure is based on an annual production level of 5,500,000 tonnes. If this is the case, then a similar sensitivity analysis should also be undertaken on the economic impact if only 2,000,000 tonnes are extracted annually.

4. Aggregate Resource Manual Study Requirements

The Region's Aggregate Resource Manual identifies a number of studies that must be undertaken in completing an application submission. This includes a financial impact study. The following provides a list of the requirements identified in the manual (as presented on page 30 and 31 of the document) and our commentary with respect to how each item was addressed.

4.1 Purpose of the Financial Impact Study

1. To demonstrate that the proposal will have a minimal negative financial impact on the Region or taxpayers from the cost of providing services such as road maintenance, long term monitoring and replacement water supplies among other matters.

   Watson Review

   The financial impact analysis concludes that road improvements are not needed as a result of the extension, however, it does not fully address the financial impact on the road network due to increased truck traffic (if applicable). The study notes that the operating expenditures related to roads would have a growth factor of 100%, however if there is an increase in truck traffic, the growth factor may need to be increased above 100%. Any potential increases to the growth factor as a result of increased truck traffic should be confirmed and incorporated into the analysis.

   With respect to water supply, the report addresses the responsibility of providing for ongoing monitoring and mitigation costs, however, it should be noted that should the property owner become bankrupt, the cost may fall to the municipalities. As a result, an estimate of the ongoing monitoring and pumping costs should be identified in the financial impact analysis.

2. To demonstrate that extraction will occur in a manner that minimizes social, economic and environmental impacts.

   Watson Review

   The financial impact study does not appear to address the social or environmental impacts. This is typically completed in other analyses submitted by the applicant. The financial analysis should refer to the appropriate documents in the submission package.

3. To demonstrate that there will be no public costs associated with the proposal throughout extraction, complete rehabilitation and any long-term continuing mitigation and monitoring requirements, and to demonstrate that there will be adequate securities put in place, through an agreement or legislation, to ensure that the public and agencies will not be put at financial risk as a consequence of the approval.

   Watson Review

   In our opinion, the study demonstrates that additional public costs will be associated with the application through increased operating expenditures,

however these will be partially offset by increased aggregate levy revenues and other revenues.

The fiscal impact analysis does not identify how the applicant will ensure the public does not bear the cost burden of long-term monitoring, pumping, and rehabilitation of the site. At a minimum, the analysis should include an estimate of the rehabilitation cost as well as the cost of ongoing long-term monitoring and pumping.

4. To demonstrate to what degree the proposal will create direct and indirect financial benefits or costs to the municipalities affected.

   Watson Review

   As noted above, the study notes anticipated revenues and costs, however, adjustments to the values provided in the report are recommended.

5. To demonstrate what financial benefits to the community may be created as a consequence of the approval.

   Watson Review

   The study does provide that a number of indirect jobs may be created as a result of the proposed extension.

4.2 Objectives of the Financial Impact Study

1. To quantify the amount of assessment to be generated as a consequence of the approval of the application (compared to loss of existing use i.e. farmland).

   Watson Review

   The analysis provides for the change in assessment and tax revenue estimates as a result of the application, however, as mentioned above, adjustments should be made to the values utilized in the analysis.

2. To identify what the economic impacts may be.

   Watson Review

   The report provides a discussion on the economic impacts; however refinements have been noted.

3. To estimate how much in license fees will be provided to the affected municipalities.

   Watson Review

   This information was included in the study; however, it appears the study includes outdated rates. These should be updated.

4. To determine what impacts the additional truck traffic will have on the cost of providing maintenance on affected roads.

   Watson Review

   It remains unclear on whether the quarry extension will lead to increased truck traffic. If there is an increase, there is no commentary or analysis with respect to the impacts on the broader road network due to this. If there is no additional truck traffic as the 5.5 million tonnes is not incremental, this should be clarified.

5. To determine whether the proposal, if approved, will impact on the timing and/or need for road improvements to be paid for by the municipality.

   Watson Review

   The study indicates that additional road improvements are not required, however, this should be reviewed in concert with the peer review being conducted on the traffic impact analysis.

6. To identify the financial benefits that may occur generally as a consequence of the approval (i.e. TOARC payments for road improvements).

   Watson Review

   The study generally speaks to the financial benefits subject to the refinements noted earlier in this memo.

7. To identify the potential cost of any long-term monitoring and mitigation on the site and the responsibility for that monitoring and the liability to any public authority or agency associated with that responsibility.

   Watson Review

   Although the study identifies that the applicant is responsible for the long-term monitoring and mitigation, the study does not identify what these costs would be. At a minimum, the cost for rehabilitation of the site and ongoing monitoring and pumping costs should be estimated, in the event the cost becomes the responsibility of the municipality (e.g. through bankruptcy).

5. Summary of Observations

Overall, it appears the net fiscal impact may have been overstated by overestimating tax revenues, understating the increase in net operating costs, and including the aggregate levy amount equal to, or less than, today's revenues.

With respect to the economic impact analysis, the approach and calculations appear reasonable, however, it should be noted if the employment identified is not in addition to existing employment. A sensitivity analysis should also be conducted on the economic impact in the event that only 2 million tonnes are extracted on an annual basis.