University of Toronto Faculty Association
720 Spadina Avenue, Suite 419
Toronto, Ontario M5S 2T9
Telephone: (416) 978-3351
Fax: (416) 978-7061
E-mail: faculty@utfa.org
Website: www.utfa.org

Date: January 9, 2011

To: University of Toronto Colleagues

From: George Luste, President, University of Toronto Faculty Association (UTFA)
and Professor, Physics Department, University of Toronto

**Re: Response to President Naylor's public memo of Dec 15, 2010: "George Luste's Pension Tragedy: Titanic Misinformation[1]"**

I welcome the opportunity to continue the public debate regarding our pension plan, initiated by my presentation and memo to the Business Board (BB) of Governing Council on December 13, 2010[2] , to which President David Naylor responded in his public communiqué of December 15, 2010[1]

The December 13, 2010 meeting of BB was the one occasion in the current academic year when BB receives the actuarial report[3] of the U of T pension plan for the preceding year (2009-10) from the plan actuary, Aon-Hewitt. For a number of years UTFA has expressed its concerns about the pension plan at these meetings. Because the BB rules allow for only five minute presentations by non-members, I have written memos expanding on these concerns and posted them on the UTFA website[4] so others could access the concerns and associated issues.

UTFA's memo of December 13 to BB focused on three basic questions:

(i) How serious is the deficit?
(ii) How did it come about?
(iii) How serious are the consequences?

I will organize my response to President Naylor's criticism in the context of the same three questions.

---

[1] President Naylor's 5-page public memo of Dec 15, 2010: George Luste's Pension Tragedy: Titanic Misinformation is posted as a web link at the UTFA website, www.utfa.org and on the Pension Issues web page, http://www.utfa.org/content/pension-issues

[2] George Luste's 7-page memo of Dec 13 to Business Board: Agenda item #3 - Pension Plans: Annual Financial Report for the Year ended June 30, 2010 is posted as at the UTFA website, www.utfa.org and on the Pension Issues web page, http://www.utfa.org/content/pension-issues

[3] The report provided to BB was the 132-page: University of Toronto Pension Plans Annual Financial Report for the Year ended June 30, 2010, which is available as a pdf file on the UofT website at http://www.governingcouncil.utoronto.ca/AssetFactory.aspx?did=7374

[4] See the links at http://www.utfa.org/content/pension-issues under the heading for UTFA Presentations at Business Board of Governing Council -.Regarding Pension Plan, Hewitt (actuary) and UTAM (investment)

## How serious is the deficit?

President Naylor writes:

> The size of that deficit [for past service] is currently $1.1B – a total that is daunting, but bears little relationship to the much larger amount projected by Prof. Luste. That difference arises because Prof. Luste's projections are based on constructs and assumptions that represent his personal view of the history and future of the plan and the long-term prospects for the global economy. It is truly puzzling that Prof. Luste would promote his projections as definite without obtaining independent actuarial advice.

President Naylor's criticism contains two factual errors.

1. In fact, prior to December 13 I asked an independent actuary, Stephen A. Eadie[5] (FSA, FCIA, Partner Robertson, Eadie & Associates), to read my memo and to raise any objections. He agreed that the U of T pension plan uses a very aggressive 4.00% real return assumption for its long term prediction of investment returns.

2. My use of a 2.00% real return assumption, again, is not a *personal view*. According to Bank of Canada data (referenced and displayed in my December 13 memo) the financial marketplace 30-year risk-free[6] real rate of return today is around 1.50% or less. Thus any real return assumptions higher than 1.5% today are not a sure thing. It presumes a gamble that one can do better than the guaranteed return and so requires that one invest in assets that may gain more but can also lose more[7]. From this perspective the 4.00% real return assumption that President Naylor favours is aggressive and uncertain. Secondly, the U of T document presented to BB (see footnote #3, pages 33, 35 and 46) illustrates a 2.0% return assumption, referring to it as a *"low-risk investment portfolio"*. Thirdly, prior to 1987 our pension plan did use a 2.25% real return assumption, a number that is much closer to my use of 2.00% today than to President Naylor's 4.00%.

What is the significance of the debate between the 2% vs the 4% assumption? The significance is that a higher assumed investment return in our pension plan implies a smaller associated liability (i.e. a smaller deficit). And of course the opposite is also true, the lower the interest assumption number, the higher the liability (i.e. a higher deficit). If we assume that our assets will return about 2% (above inflation) on investments in the future as a going concern pension plan, then our current deficit today is about $2 billion[8]. The more optimistic 4% return assumption, the current assumption in our pension plan and the assumption that President Naylor favours, implies the smaller deficit of $1.1 billion.

---

[5] See http://www.re-a.com/ and http://www.riskisopportunity.net/docs/act-eadie-bio.pdf

[6] The Government of Canada real-return bonds (RRBs) provide inflation protection and a guaranteed inflation proof yield if held to maturity. That yield has been decreasing over the past decade and today is around 1.2% for a 34-year RRB, as documented at http://www.bankofcanada.ca/cars/bd_rrb_9359_results_20101201_120000.html

[7] Given the disastrous investment performance in 2008-09, when the market value of the pension plan decreased by $900 million, I do not believe that our pension plan managers should gamble with riskier investments in the hope of obtaining the more aggressive 4% real investment return.

[8] Actuary Stephen A. Eadie estimates the following going concern relationships for our plan: 2.0% real assumption => $2.4 billion deficit, 2.5% => $1.9B, 3.0% => $1.6B, 3.5% => $1.3B deficit.

We leave it to the reader to decide which deficit number is more plausible and probable[9]. Either deficit number, $2 billion (George Luste) or $1.1 billion (President Naylor), has serious implications.

President Naylor writes:

> For now, suffice it to say that we lost more money than most other Canadian plans in 2009, while we made more than most in 2007. Neither fact is very relevant because our focus is long-term. And, on that longer-term basis we are tracking back towards our return target – a target that Prof. Luste chops more or less in half to generate his doomsday scenario.

The longer term, over the last decade, does not support President Naylor's claim that we should expect a 4.00% real return.

From 2000 to 2009 UTAM's[10] actual annual investment results were zero[11] above inflation. This is a substantial underperformance, over ten years, of both a 2% and a 4% real return expectation.

This abysmal performance is a long way from President Naylor's *"tracking*" on a long term pension plan *"return target"* of 4.00% above inflation. Indeed eight years ago, in a 2003 email to then-Dean Naylor, I was already concerned about the 4% assumption, cautioning then that: *"… the 4% real return assumption (in the pension plan) going forward may not be viable again for a decade."*

This annual shortfall of 4.00% in real returns, with respect to the going concern assumption in our pension plan, compounded over the last 10 years, represents a cumulative investment shortfall of 48%[12] for the decade. This is an alarming total shortfall.

President Naylor's statement also fails to mention the additional cost of 'carrying' a deficit[13], namely the annual interest payment it requires.

Assuming a $1.1B deficit (President Naylor's number) and an interest rate of 6.5%[14] the *annual* interest-only cost would be $71.5 million (and higher if the deficit were amortized over several

---

[9] This lack of certainty reflects the fact that we are making assumptions about the future. And defined benefit plans are all about making assumptions regarding the future on interest rates, on salary increases, on inflation, on mortality, etc.

[10] UTAM, the University of Toronto Asset Management Corporation, was established in 2000 and has responsibility for investing both the pension plan and the endowment assets. Apart from its failure to deliver any superior returns, UTAM's annual operating costs have increased significantly. Today UTAM accounts for more than $20 million each year in fees to the pension plan for hedge funds, fund of funds and other management costs. As far back as February of 2003, in an email to Dean of Medicine David Naylor (before he became President), I shared my concern for this escalating expense in the pension plan. In 2003 it was about $12 million (back in 1998 it was only $2.6 million per year) – yet it has increased to more than $20 million today, in 2010.

[11] This is discussed in UTFA's presentation to Business Board at its April 26, 2010 meeting. The analysis in UTFA's memo shows that: *"Over the full ten years of UTAM's existence, its annual compounded rate of return has been 2.1% (for the pension plan funds). Inflation over the same time period has been the same, 2.1%."*. The memo is posted on the UTFA website page at http://www.utfa.org/content/pension-issues or via a direct link at http://www.utfa.org/sites/default/files/webfiles/pdf_files/UofT%20Bus-Board%20-%20%20Apr-26-final.pdf

[12] From 1.04**10 = 1.48

[13] The costly carrying charge on the deficit is the main reason that the U of T pension plan's going concern deficit increased in 2009-10, even though the plan realized an 8.2% nominal (including inflation) return, well above the target of 4% real return plus inflation. And bear in mind that this is based on the $1.1B deficit that President Naylor is defending.

[14] The 6.5% interest rate number is the one used in the Aon-Hewitt actuarial report and represents the sum of the 4.00% real return assumption (above inflation) we have been discussing plus an assumed 2.5% for inflation.

years.) To earn $71.5 million on the current pension plan asset base represents an additional 3.4% annual return above and beyond any real return assumption. That is, just to tread water on a $1.1B deficit our pension plan would require a total return of 9.9% (2.5% for inflation + 4.0% for assumed return + 3.4% to cover cost of deficit). And more than 9.9% if we were to so amortize the $1.1B deficit.

Assuming a $2.0B deficit (George Luste's number) and the same interest rate of 6.5%, the *annual* interest-only cost would be $130 million. The corresponding investment return number just to tread water on the $2 billion deficit would require a total return of 10.7% (2.5% for inflation + 2.0% for assumed return + 6.2% to cover cost of deficit). And more than 10.7% if we are to also amortize the $2 billion deficit. This is simply not feasible.

The above discussion deals with the so-called future 'going concern liability'. But where do we stand today? We next briefly comment on the 'partial solvency liability' and the more accurate 'full wind-up liability'. The important distinctions between the different liability estimates are discussed in the December 13, 2010 memo and in earlier UTFA publications[15].

President Naylor writes:

> How does Prof. Luste arrive at his doomsday scenario?
> The first and over-riding failure of his analysis is an insistence that everyone must think about pension deficit primarily in terms of 'wind-up' cost. The wind-up solvency test for pension plans is one that has repeatedly been criticized as poorly applicable to public institutions. It was designed for private corporations that can go out of business in the near or medium term. …

The President is confusing the matter and so obfuscating on the real issue. The real issue is that we seek an answer to the basic question: "What is the total outstanding accrued liability of our pension plan?" Or stated more simply: "As of today how much money do we owe all current pension plan members, including pensioners?"

As explained in the December 13 memo, in the lexicon of Ontario pension legislation the so called "pension solvency test" is misnamed and so misleading. It is not a true solvency test at all in the normal understanding of the word "solvency". In the context of Ontario pension law it is only a "partial solvency test". Thus the "pension solvency test" does not provide the answer to the question of how much money is owed to all current pension plan members, including pensioners.

The answer is, however, provided by the "pension wind-up solvency test". The test does NOT require or imply an actual wind-up. As the December 13 memo (page 3) puts it:
*".. the issue here is not whether or not there is an actual windup anytime soon, rather the real question is: 'What is the outstanding accrued liability of our pension plan?"*

The $2B deficit estimate via the "pension wind-up solvency test" is consistent with a similar $2B deficit estimate via the "going concern valuation" and a real return assumption of 2.0% to 2.5%.

[15] See UTFA Newsletter, October 24, 2008: Inconvenient Truths about the UofT pension Plan at http://www.utfa.org/content/pension-issues

The basic question here is also in some sense a balance sheet[16] question for the pension plan – wherein one compares total assets with total liabilities at one point in time to determine the net worth of the pension plan. On this basis the net worth is a negative $2 billion as of July 1, 2010.

Why is the size of the deficit important to a pension plan contributor and beneficiary? I believe that plan members have a right to know how much of their annual contribution to the pension plan is actually going towards their own retirement pension as opposed to paying down a legacy debt incurred by prior shortfalls.

## How did the deficit come about?

President Naylor writes:

> A second problem arises from Prof. Luste's interpretation of the history of the pension plan. Indeed, Prof. Luste favours an independent inquiry into past pension "holidays", as if the process of putting his predecessors or mine in the docket would somehow generate funds for the plan, The reality is that contributions were not taken away mindlessly for the 18 years he highlights. For much of that period the pension surplus was sufficiently high that the Income Tax Act simply prevented the University from making any contributions – as was the case for many other plans in those years,

Professor Naylor evades the key point in my December 13 memo, that there was and is a "*failure of appropriate oversight by the pension plan sponsor*". It is, of course, ridiculous to suggest that an independent inquiry would generate funds for the pension plan. However an examination of the past lack of oversight might ensure better management in the future.

Secondly, blaming the Income Tax Act for the 18 years of missing contributions may confuse the uninformed. The pretext that "Ottawa made us spend it" has been shown to be misleading and self serving in prior UTFA memos[17], yet the Administration continues to cling to this excuse.

The 18 years of missing pension contributions were made possible by unilaterally changing the return assumptions four different times, thereby reducing the liability and increasing the "surplus". In addition, the plan administrator failed to set up a separate pension "reserve account" for any surplus until it was far too late. These commissions and omissions represent serious failures in plan management and oversight.

Actuary Stephen A. Eadie states it as follows: *"Had the 2.25% per annum real rate of return assumption (pre 1987) been maintained, then most, if not all, of the plan surplus would not have emerged and the contribution holidays would not have been taken. The argument that the contribution holidays were required by the Canada Revenue Agency are therefore misleading*

---

[16] The main purpose in business for the accounting 'balance sheet' is to determine what the business is worth at one point in time. In this respect the 'solvency test' would not be an appropriate balance sheet for the pension plan as it fails to include the liability for any pension indexation, even though this is part of the pension agreement.

[17] See for example the discussion in the 2008 UTFA report: - Inconvenient Truths - Part II - Missing Pension Contributions at http://www.utfa.org/sites/default/files/webfiles/pdf_files/Inf%20Rep-9-II-%20final-c(1).pdf and the earlier 2003 information report #5 on The Looming Pension Abyss at http://www.utfa.org/sites/default/files/webfiles/pdf_files/Information%20Report%20no5,-April%202003-final.pdf

*because the surpluses would not have existed in general, except for the aggressive real rate of return assumption adopted as part of the plan's funding policy."*

President Naylor writes:

> Prof. Luste alleges that the plan actuary willfully manipulated assumptions over the years to create an artificial surplus.

This is a misleading and baseless supposition. The actuary is not responsible for pension plan oversight. The Administration and Business Board are. They are the legal Sponsor and Administrator of the plan, not the actuary, and so must bear responsibility for any inappropriate assumptions, as well as for the consequences resulting from those assumptions.

At the same time it is worth noting Warren Buffett's thoughts on this issue:
*"The actuaries who have roles in this game know nothing special about future investment returns. What they do know, however, is that their clients desire rates that are high. And a happy client is a continuing client.…… Unfortunately, the subject of pension assumptions, critically important though it is, almost never comes up in corporate board meetings. (I myself have been on 19 boards, and I've never heard a serious discussion of this subject.)*[18]

President Naylor writes:

> In yesterday's communiqué, however, he continues a pattern of post-hoc investment analysis, emphasizing a missed opportunity to buy high-yield inflation-proof bonds in 2000! In investing, hindsight is both perfect and unhelpful. Financial markets, moreover, rise and fall and rise again. A constant prediction of adverse events will always be validated at some point but should not be confused with keen foresight.

This is misleading and incorrect. Unlike the stock market, Government bonds have no return (i.e. no yield) risk if kept for the full term, even though their market valuations during the term may go up and down. This does not matter if kept for the full term. With the guaranteed 4%+ return on government real return bonds available in 2000 one could have ensured that the investment return needs of our pension plan would have been met with no risk for 20+ years. An exceptional opportunity to transfer both market return risk and inflation risk, at no cost, from the U of T pension plan to the Government of Canada Treasury was not exercised and so lost[19].

Here is another example of failed oversight and poor investment management. Investing successfully and prudently is all about managing risk, minimizing investment costs and recognizing as well as seizing opportunity when it arises.

---

18 Warren Buffett, Dec. 10, 2001 issue of Fortune (vol 144, issue 12) see http://money.cnn.com/magazines/fortune/fortune_archive/2001/12/10/314691/

19 Claude Lamoureux, former CEO of the Ontario Teachers Pension Plan (OTPP), confirmed to me in a private discussion regarding RRBs that in and around 2000 OTPP saw this mispricing opportunity and acquired RRBs, although the RRB market was thin and thus not large enough for OTPP to purchase as much as they wanted. (OTPP has over $100 B in assets.)

President Naylor writes:

> Improvements included initiation of the Supplemental Retirement Arrangement (SRA) that enabled plan members to have pension coverage for salaries above the usual cap set by the Canada Revenue Agency.

A pension supplement is a positive construct and UTFA endorses it. However, UofT's implementation of its existing SRA[20] can only be described as a failure in regards to cost, equity and sustainability. This issue requires more attention and I plan to write a specific commentary on the SRA in the near future. But once again the reader should not forget that the Administration, as both legal Sponsor and Administrator of the Registered Pension Plan (RPP), had a basic responsibility to the RPP and pension plan members. That responsibility cannot be cancelled or trumped by other administrative decisions.

President Naylor writes:

> Finally, during the time of the Social contract, the Ontario Government suggested that pension contribution holidays could be used to meet some or part of the required compensation reductions – and the University did so with UTFA's agreement.

I was not a participant in these discussions and so cannot comment on any details. But the University, as both legal Sponsor and legal Administrator of the University of Toronto Registered Pension Plan, had at that time as well as today a fiduciary duty to all the members in the pension plan to see that the plan is managed prudently and that the pension promise will be honoured. With the 1987 pension agreement the University assumed full responsibility for any funding shortfall and the need to manage the fund responsibly. There never was any suggestion of shared responsibility for any shortfall. To the contrary, in the words of the Administration:
*"The University bears the risk of fulfilling the pension promise and must manage that risk prudently*"

UTFA has taken the Administration at its word. Were we wrong to do so?

## How serious are the consequences?

President Naylor writes:

> For current members the plan can be put on a sustainable footing with moderate increases in contributions that align us appropriately with our peers.

Given the reality of the deficit numbers I simply do not see how any *moderate increases in contributions* can deal with the interest charges on our pension debt as well as the amortization of that debt. That was the main conclusion of my December 13 memo.

President Naylor does not provide any numbers to substantiate his assertion.

---

[20] UTFA memo via http://www.utfa.org/sites/default/files/webfiles/pdf_files/Inf%20Rep-12%20-re%20SRA%20-final.pdf and the Provost's response at http://www.utfa.org/sites/default/files/webfiles/pdf_files/Provost%20Response%20to%20UTFA%20SRA%20Report%20-%20March%2018,%202010.pdf

Regarding peers, who does President Naylor have in mind? Is he comparing U of T to OMERS, OPSEU and OTPP? They are not academic peers and they do not represent faculty pensions. UBC and major US universities have faculty contribution rates that are aligned with current inputs by U of T faculty (about 5%). Once again President Naylor's characterization is questionable.

## Concluding thoughts:

I have read the President's public communiqué of December 15 several times. I find nothing in it that requires any changes in the conclusions of my December 13 presentation. I am reminded of Richard Feynman's observation: *"Evidence is more important than opinion.[21]"*

And while the President's focus on the size of the deficit is important, there are other important issues he fails to address. We should not overlook the fact that the Administration was committed to bearing the risk of any adverse economic conditions. At the time when they were taking contribution holidays and not putting their share of the service cost into the pension plan, the Administration affirmed their responsibility in the following words:

*"Under the University of Toronto Pension Plan, the pension promise is funded by both the participants and the University. The participant contributions are determined by a specific formula. The balance of the cost of funding the pension promise is the sole responsibility of the University. In other words, the University bears the risk of fulfilling that pension promise and must manage that risk prudently. The pension promise has a very long time horizon. At various times over that time horizon, due to economic and demographic circumstances, the university's funding to meet the pension promise may be quite high – as it was for the period prior to 1987 when the University contributions were 2 -2½ times participant contributions. At other times, the economic and demographic circumstances may result in lower contribution levels, as has been the case since 1987. The pendulum can easily swing either way…. Whatever the funding level, the pension promise does not change."*

Finally, one might ask: "Why does the employer control or wish to control the pension plan? And why does the president of a university, a university whose principal mission is teaching and research, wish to be involved in the governance of a pension plan?" This engagement can only detract from his/her principal responsibility. During our recent negotiations regarding future pension governance at UofT, UTFA proposed an independent pension trust governance structure[22] - at arms length from the administration of the university itself. This go-forward proposal was rejected by the U of T Administration.

---

[21] A slight variation of a quote from Richard Feynman's 1964 Messenger Lecture at Cornell University, The Character of Physical Law. The BBC recording of this remarkable lecture can be viewed on the web at http://research.microsoft.com/apps/tools/tuva/#data=4%7C4dbfe549-e795-47a0-bda2-9597fe5bb344%7C%7C Richard Feynman received the Nobel prize for physics in 1965.

[22] See the links to Pension Governance pdf memos at http://www.utfa.org/content/pension-issues