# MANITOBA PUBLIC INSURANCE 

## Round 2 Information Requests

2016 GRA

September 9, 2015

Public Utilities Board
Bike Winnipeg
Consumers' Association of Canada (Manitoba) Coalition of Manitoba Motorcycles Groups

# Manitoba Public Insurance <br> 2016 GRA Round 2 Interrogatories September 9, 2015 

## PUB (MPI) 2016 GRA Information Requests

PUB (MPI) 2-1

| Volume: | PUB/MPI I-1 | Page No.: | PDF Page 4 |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: |  |  |  |
| Issue: | IT spending |  |  |

Preamble: The Corporation's Board of Directors has approved a $\$ 31.67$ million maximum for Corporate Strategic Initiatives in 2015/16.

## Question:

Please reconcile this amount with the forecasted spending on IT reflected in Appendices 13 and 14 in the Expenses section, by project.

## Rationale for Question:

To understand how MPI is managing its approved IT spending.

## PUB (MPI) 2-2

| Volume: | PUB/MPI I-1 | Page No.: | 1-9 |
| :--- | :--- | :--- | :--- |
| Topic: | Financial Overview |  |  |
| Sub Topic: | Financial Information |  |  |
| Issue: | Board of Directors' Meeting Minutes |  |  |

Preamble: Pages 1 to 9, which appear to be Minutes of Board of Directors Meetings or Audit Committee meetings, are undated.

## Question:

a) Please provide the date of each of the Minutes provided and identify the body referenced in the Minutes.
b) Please advise of how the dollar matching reference at item 15-090 on page 6 compares to the hybrid bucketing approach, the cash flow matching approach or the duration matching approach referenced in the Aon reports.
c) Please provide Minutes of Investment Committee meetings relative to the five items listed in PUB/MPI I-1.

## Rationale for Question:

To understand the timing of Corporate decisions that impact Basic.

## PUB (MPI) 2-3

| Volume: | PUB/MPI I-1 Attachment | Page No.: | 11-14 |
| :--- | :--- | :--- | :--- |
| Topic: | Asset Liability Management Study |  |  |
| Sub Topic: |  |  |  |
| Issue: | Asset Liability Management Study |  |  |

Preamble: Aon Hewitt was hired to review the Corporation's assets and liabilities and to recommend an appropriate risk management strategy. The Corporation reviewed Aon Hewitt's analysis and recommendations and relied upon them in making its decision to continue with a duration matching strategy.

As reflected on page 14, paragraph 2, Aon changed its recommended interest rate risk hedging strategy from a hybrid bucketing approach (from the Phase I report) to a perfect duration matching strategy (from the Phase II report).

## Question:

a) Please explain the rationale for the Aon consultants changing their recommendation from the Phase I hybrid bucket approach to the Phase II perfect duration matching strategy.
b) Please file copies of any draft reports provided to MPI related to the ALM Study.
c) Please file the Curriculum Vitae of each of Julianna Spiropoulos, John Myrah and Jocelyn Guerin of Aon.
d) Please confirm whether each of Julianna Spiropoulos, John Myrah or Jocelyn Guerin will be available to testify at the GRA hearing should the Board wish to hear their evidence.

## Rationale for Question:

To understand the implications for revenue requirement of implementing an alternative interest rate mitigation strategy.

## PUB (MPI) 2-4

| Volume: | PUB/MPI I-2 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Basic Financial Statement |  |  |
| Sub Topic: |  |  |  |
| Issue: | Interest Rate Margin for Adverse Deviations |  |  |

## Question:

a) By way of explicit reference to the guidance available from the Canadian Institute of Actuaries (e.g., standards of practice, educational notes), please provide context for the adopted approach for deriving the investment return rate margin for adverse deviations as the low margin level of 25 basis points (described in the material filed as the "minimum risk margin") plus an assumed load for mismatch risk, timing risk and credit risk.
b) Please summarize to what extent consideration was given to the December 2009 Educational Note on Margins for Adverse Deviations for Property and Casualty Insurance in the selection of the forecasted 50 basis point investment return rate margin for adverse deviations, and provide a derivation of an indicated such margin following one of the example methodologies outlined in that educational note.
c) Please provide an outline of what is involved in a Minimum Capital Test based margin setting methodology, and indicate if and when the Corporation anticipates undertaking and reporting on its research in this regard.

## Rationale for Question:

To understand the impact of changes in margin for adverse deviations on financial reporting.

## PUB (MPI) 2-5

| Volume: | PUB/MPI I-3 | Page No.: | RSF.3, Pgs. 2-3 |
| :--- | :--- | :--- | :--- |
| Topic: | Rate Setting Framework |  |  |
| Sub Topic: | Break-Even Rates |  |  |
| Issue: | Requested Rate |  |  |

Preamble: The responses provided in the first round do not provide the requested information.

## Question:

a) In the first round response to (a), it appears to be acknowledged that the rate level adequacy of policy years 2015/16 and 2017/18 are irrelevant since they do not relate to policy year 2016/17. Despite this, the expected net income for policies issued for policy year 2016/17 is assumed as the average of the projected net income for fiscal year 2016/17 (which is affected by the rate level adequacy of policy year $2015 / 16$ ) and the projected net income for fiscal year 2017/18 (which is affected by the rate level adequacy of policy year 2017/18).

How does this approach of averaging the net income of the 2016/17 and 2017/18 fiscal years account for the rate level adequacy of policy years 2015/16 and 2017/18 being different from that of policy year 2016/17, and the influence of the next GRA on fiscal year 2017/18 rate level adequacy?
b) In the first round response to (b), the requested policy year information is not provided.

Please provide a five year comparative history showing the average of two successive fiscal years and the related policy year, with respect to Total Earned Revenues and Net Claims Incurred.

## Rational for Question:

To assess the reasonableness of the Corporation's break-even metric.

## PUB (MPI) 2-6

| Volume: | PUB/MPI I-5 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Pro Formas |  |  |
| Sub Topic: | 2014/15 Financial Results |  |  |
| Issue: | Forecasting |  |  |

Preamble: The update provided in Pre-Ask 5 at the 2015 GRA reflected that if there was a reduction in interest rates of 81 basis points, claims incurred would increase by $\$ 89.9$ million while investment income would increase by $\$ 45.5$ million, for a net loss impact of $\$ 44.4$ million.

MPI attributes the changes from Pre-Ask 5 to actual as follows: higher than budgeted PIPP Claims of $\$ 84.8$ million while investment income increased to $\$ 105$ million for a net positive impact of $\$ 20.2$ million.

## Question:

a) Please explain why the changes related to interest rates as reflected in Pre-Ask 5 last year show a negative $\$ 45.5$ million impact, when a larger drop in interest
rates than that reflected in Pre-Ask 5 shows a positive impact on 2014/15 actual results of $\$ 20.2$ million. Please ignore the impact of variances not related to interest rate changes and the revision to the interest rate margin.
b) Please provide a comparative summary of 2014/15 actual investment income with that forecast in Pre-Ask 5 last year and explain the differences.
c) Please provide an additional column to PUB/MPI I-5(a) Attachment (GOC 10 year bond rate forecast), comparing the difference in interest rates from October 2014 (Pre-Ask 5) with actual.
d) Please provide the referenced commentary in Volume II, Investments that relates to the comparison between the operating results in PUB I-5(b) Attachment and actual.

## Rationale for Question:

Financial Forecast accuracy is important in assessing how future updates should be assessed.

## PUB (MPI) 2-7

| Volume: | PUB/MPI I-6 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Ratemaking |  |  |
| Sub Topic: | Major Classification Required Rates |  |  |
| Issue: | Requested Rate |  |  |

Preamble: The analysis provided in the first round response only illustrates that 5 year averages tend to be more volatile than 10 year averages for the noted exceptions.

## Question:

Please provide a comparative analysis of volatility (e.g., comparing coefficients of variation) between the experience for the noted exceptions vs. the experience for the other coverages and/or vehicle classes.

## Rationale for Question:

To assess fairness in rating.

## PUB (MPI) 2-8

| Volume: | PUB/MPI I-9 | Page No:: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Ratemaking |  |  |
| Sub Topic: | Special Adjustments |  |  |
| Issue: | Requested Rate |  |  |

Preamble: The first round response indicated that the current methodology uses the determined experience adjustment for the significantly larger rating category, and makes a special adjustment to the smaller rating category.

## Question:

a) Please discuss the implications of the current methodology with respect to fairness in rating for the smaller rating categories affected.
b) Please discuss the rationale for the three apparent exceptions made to the current methodology (i.e., Territory 5 rates for All Purpose Motorcycle - Sport Touring, 500 cc or less; Territory 3 rates for Pleasure Motorcycle - Sport Touring, 501 cc to 1000 cc; and Territory 4 rates for Pleasure Motorhome).

## Rationale for Question:

To assess fairness in rating.

## PUB (MPI) 2-9

| Volume: | PUB/MPI I-10 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Ratemaking |  |  |
| Sub Topic: | Exceptions |  |  |
| Issue: | Requested Rate |  |  |

## Question:

a) With respect to the noted exceptions made for Motorcycles, please discuss the implications of these adjustments with respect to fairness in rating for the rating categories affected.
b) With respect to the noted exception made for Off-Road Vehicles, please discuss how the result of the judgmental adjustment applied compares to the result of approximately restating experience prior to 1 March 2014 for the estimated impact of the increase in Basic Third Party Liability limit.

## Rationale for Question:

To assess fairness in rating.

## PUB (MPI) 2-10

| Volume: | PUB/MPI I-11 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Ratemaking |  |  |
| Sub Topic: | Pure Premium Trends |  |  |
| Issue: | Forecasting Accuracy |  |  |

## Question:

Please provide a table comparing the selected pure premium trends by coverage with those selected in the two previous GRAs.

## Rationale for Question:

To assess forecasting accuracy.

## PUB (MPI) 2-11

| Volume: | PUB/MPI I-15(b) | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Value Equation |  |  |
| Sub Topic: |  |  |  |
| Issue: | New or Enhanced Basic Services |  |  |

Preamble: The Corporation has provided cost information relative to each of the new or enhanced services listed, but the Corporation has not provided information on the benefits to the Corporation of each of those services.

## Question:

a) Please advise of the benefits to the Corporation, if any, of the new or enhanced services referenced.
b) Please provide the Corporation's post-implementation report on the PIPP Mediation program, including savings attributable to the program, both to date and as forecast through the outlook period.

## Rationale for Question:

The Board must be provided with sufficient information relative to Basic services to enable the Board to consider necessity and prudence of the expenditure.

## PUB (MPI) 2-12

| Volume: | PUB/MPI I-17 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Compliance with Board Order 135/14 |  |  |
| Sub Topic: |  |  |  |
| Issue: | BI $^{\mathbf{3}}$ Benchmarks |  |  |

## Question:

Please provide the historical data that supports the selection of each of the $58 \%$ benchmark for Rehabilitation Management and the $43 \%$ benchmark for Serious and Long Term Care.

## Rationale for Question:

The Board must be provided with sufficient information relative to benchmarking measures within Basic to enable the Board to consider necessity and prudence of Basic expenditures.

## PUB (MPI) 2-13

| Volume: | PUB/MPI I-18(c) | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Benchmarking |  |  |
| Sub Topic: |  |  |  |
| Issue: | Benchmarking Metrics |  |  |

Preamble: The explanation of the change in the ratio of claims expense per number of claims provides a description of the mechanics of how the calculation is determined but does not provide insight on underlying causes for the changes in claims expense.

## Question:

a) To what extent are claims expenses variable versus fixed?
b) Please explain how a change in the number of claims impacts the level of claims expenses. In particular, please explain why claims costs did not decline when the number of claims was lower.
c) Please provide a comparison of the claims expenses between 2014/15 and $2015 / 16$, by cost element, excluding all improvement initiatives, immobilizer expenses and amortization of prior improvement initiatives, and explain the major differences.

## Rationale for Question:

To understand changes in trends that impact revenue requirement.

## PUB (MPI) 2-14

| Volume: | AI.12 | Page No.: | $1-4$ |
| :--- | :--- | :--- | :--- |
| Topic: | Benchmarking |  |  |
| Sub Topic: |  |  |  |
| Issue: | Staffing Levels - Metric 1.1.3 |  |  |

## Question:

a) Please provide a separate table and extend MPI's trend analysis to include Metric 1.1.3 (FTEs per $\$ 100$ million of GPW) for 2014/15, and forecast for 2015/16 and 2016/17 and provide commentary on the trend.
b) Please provide all supporting calculations for the determination of this ratio for all years in (a).

## Rationale for Question:

To understand changes in trends that impact revenue requirement.

## PUB (MPI) 2-15

| Volume: | PUB/MPI I-19 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Benchmarking Metrics |  |  |
| Sub Topic: |  |  |  |
| Issue: | Benchmarking Metrics |  |  |

## Question:

a) Please provide the metrics developed for Physical Damage and the Contact Centre and explain how the metrics have been used for controlling costs.
b) Please provide a comparison of the metrics relative to actual results for the past fiscal year and current year to date, and provide an interpretation of the results.

## Rationale for Question:

To understand changes in trends that impact revenue requirement.

## PUB (MPI) 2-16

| Volume: | PUB/MPI I-21 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | IT Benchmarking |  |  |
| Sub Topic: |  |  |  |
| Issue: | IT Expenses |  |  |

Preamble: On several of the recommendations made by Gartner, MPI has indicated that it has not yet evaluated the recommendation because it has been deemed a lower priority relative to other IT risks presently being addressed.

## Question:

a) Please provide a full description of the IT risk evaluation criteria utilized by the Corporation in ranking IT spending and management effort.
b) Please provide a full listing of the IT Risks, the priority ranking, and the action plan in place to address each risk.
c) Please advise of when the Corporation intends to review and act upon each of the recommendations not yet evaluated, including recommendations 1.20, 1.22, $2.01,2.04,2.06,3.02,3.03,3.04,4.03,4.08,4.09$ and 4.10.

## Rationale for Question:

To understand how MPI manages IT risk and prioritizes Capital Spending.

## PUB (MPI) 2-17

| Volume: | PUB/MPI I-21, <br> PUB/MPI I-28 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | IT Benchmarking |  |  |
| Sub Topic: |  |  |  |
| Issue: | IT Expenses |  |  |

Preamble: Recommendation 3.04 suggests that MPI should ensure a culturally appropriate future state architecture exists, that a baseline of MPI's current state exists, and that a gap analysis be performed. MPI has not yet acted on this recommendation but it is budgeting to spend $\$ 33.3$ million for the Technology Modernization Initiative.

## Question:

a) Please explain why the Corporation has not yet evaluated Recommendation 3.04.
b) Please explain why the Corporation intends to spend on IT projects without the gap analysis referenced in Recommendation 3.04.

## Rationale for Question:

To understand progress made over achievement of IT cost containment.

## PUB (MPI) 2-18

| Volume: | PUB/MPI I-22 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: |  |  |  |
| Issue: | IT Expenses |  |  |

## Question:

Please provide a schedule for the last five years reflecting a breakdown of Corporate staff and contractors working on IT.

## Rationale for Question:

To understand whether cost containment efforts extend to the delivery of IT infrastructure, a major area of costs incurred by the Corporation.

PUB (MPI) 2-19

| Volume: | PUB/MPI I-23 (d) | Page No.: | 3 |
| :--- | :--- | :--- | :--- |
| Topic: | Cost Containment |  |  |
| Sub Topic: |  |  |  |
| Issue: | Staffing Levels |  |  |

## Question:

Please provide a table to supplement the retirement information provided in (d) including the number of employees eligible to retire in each of the last five years and the percentage of employees that have retired.

## Rationale for Question:

To understand the forecast of staffing levels through the test years and outlook.

## PUB (MPI) 2-20

| Volume: | PUB/MPI I-25 (a \& b) | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: |  |  |  |
| Issue: | Deferred Development Costs |  |  |

Preamble: MPI appears to be forecasting making multi - year investments in technology modernization totalling $\$ 33.3$ million.

## Question:

a) Please explain why the $\mathrm{BI}^{3}$ product cycle is only three years.
b) Please provide a full accounting of the spending and amortization on $\mathrm{BI}^{3}$ and the amortization of that project since inception.
c) Please provide the Business Charter to support the $\$ 33.3$ million provision forecast for the Technology Modernization Initiative. If not complete, please provide any supporting documentation for the proposed provision.

## Rationale for Question:

To assess the reasonableness of budgeted capital expenditures.

## PUB (MPI) 2-21

| Volume: | PUB/MPI I-25 (d) | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: |  |  |  |
| Issue: | Amortization Expense |  |  |

## Question:

a) Please elaborate on the tracking of the Optimized Repair Phase of PDR and how and why the tracking led to a retroactive adjustment in 2014/15.
b) Please provide the accounting entry relative to the retroactive adjustment and the corresponding impact of the transaction on revenue requirement.

## Rationale for Question:

To understand the nature of the transaction impacting amortization expense.

## PUB (MPI) 2-22

| Volume: | PUB/MPI I-26 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: | Deferred Development Costs |  |  |
| Issue: | Provision for Projects |  |  |

## Question:

Please identify and provide a cost breakdown of the specific projects included within the $\$ 2.848$ million (2016/17) and $\$ 8.136$ million (2017/18) provisions for future projects.

## Rationale for Question:

To understand the reasonableness of forecast capital spending.

## PUB (MPI) 2-23

| Volume: | PUB/MPI I-28(b) | Page No.: | 3 |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: |  |  |  |
| Issue: | Physical Damage Re-Engineering |  |  |

Preamble: The revised forecast savings appears to be a reallocation among different sources of the same level of savings, which indicates additional analysis was prepared to support the total.

## Question:

a) Please explain the $\$ 1$ million or $28 \%$ reduction of process improvement internal savings.
b) Please elaborate on the adjusting process change in support of the $\$ 1$ million forecast of savings.
c) Please elaborate on the change in loss of use strategy and how the PDR will realize an additional $\$ 1.7$ million in savings.

## Rationale for Question:

Capital costs of projects impact MPI operations and revenue requirement.

## PUB (MPI) 2-24

| Volume: | PUB/MPI I-28(c) <br> Expenses, Appendix 13, | Page No.: | Pg $\mathbf{3 6}$ |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: | Capital Expenditures |  |  |
| Issue: | Physical Damage Re-Engineering |  |  |

## Question:

Please reconcile the forecast deferred development spending by year with that presented in Expenses, Appendix 13 page 36.

## Rationale for Question:

Capital costs of projects impact Basic operations and revenue requirement.

## PUB (MPI) 2-25

| Volume: | PUB/MPI I-30 <br> Attachment | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: |  |  |  |
| Issue: | Staffing Levels |  |  |

Preamble: MPI's forecasts of staffing levels appear to be overstated when compared to actual staffing levels in each of the last five years.

## Question:

a) Please confirm that the staffing budget provided in the analysis represents that used in establishing the rates for each of those respective years. If not, please provide a comparison of the forecast in the respective application rating year with actual.
b) Please indicate the extent to which the variance between forecast and actual is representative of payroll costs.
c) Please provide the same analysis as in PUB/MPI I-30 for total corporate staffing levels.
d) Please provide the detail of the staffing budget by category for the 1,898 FTE for 2015/16.
e) Given the actual staffing level for $2014 / 15$ was $1,874.8$, please indicate whether the forecast staffing level for 2015/16 needs to be adjusted, and if so, by how much.

## Rationale for Question:

To understand actual and forecast changes in staffing levels.

## PUB (MPI) 2-26

| Volume: | PUB/MPI I-31, I-32 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: |  |  |  |
| Issue: | Vacancy Allowance |  |  |

## Question:

a) Please expand the table in PUB/MPI I-31(b) to indicate the detail of the vacancy allowance determination in each of the years, including the total wages, the percentage of total wages and vacancy dollar amount for the years 2011 to 2015 and forecast for 2016 and 2017.
b) Provide the same analysis in (a) for total Corporate Expense.
c) Please indicate, with supporting calculations, how the targeted $\$ 5.981$ million vacancy allowance was determined.

## Rationale for Question:

To understand how the vacancy rate forecast and savings are incorporated in the application.

PUB (MPI) 2-27

| Volume: | PUB/MPI 2-21(a) 2015 <br> GRA, Vol. 2 Appendix 8 | Page No.: | 26-28 |  |
| :--- | :--- | :--- | :--- | :---: |
| Topic: | Cost Allocation Methodology |  |  |  |
| Sub Topic: |  |  |  |  |
| Issue: | Cost Allocation Methodology Changes |  |  |  |

Preamble: It appears that there have been changes in the cost allocation methodology from that presented in response to last year's PUB/MPI 2-21.

## Question:

a) Please provide a comparison with the cost allocation definitions presented last year with this year's application, and explain any changes.
b) Please explain why MPI changed the allocator for the $\mathrm{BI}^{3}$ Fineos Upgrade this year from last year, which saw a reduction in the amount allocated from $100 \%$ last year to $92.5 \%$ this year.

## Rationale for Question:

To understand changes in the cost allocation methodology.

## PUB (MPI) 2-28

| Volume: | PUB/MPI I-34 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Alternate Rate Scenarios |  |  |
| Sub Topic: |  |  |  |
| Issue: | Financial Results |  |  |

Preamble: The responses provided in the first round do not provide the requested information.

## Question:

From Volume II Claims Incurred CI.8.5, it is expected that at least 2014/15 actual information shown in the Statement of Operations in (a), (b) and (c) may affected by separating out amounts related to the premium deficiency reserves. Similarly, it would appear to be possible that forecasted information in the Statements of Operations and Statements of Financial Position may be affected by separating out amounts related to the premium deficiency reserves, in general and most particularly in (c). Providing this response will assist with better understanding the interplay between rate level adequacy and the need for premium deficiency reserves in the Corporation's financial model.
a) Please provide a restated PF.1, PF. 2 and PF.3, separating out amounts related to the premium deficiency reserves.
b) Using the presentation from (a) above, please provide a restated PF.1, PF. 2 and PF. 3 with a $1.0 \%$ rate change in 2016/17.
c) Using the presentation from (a) above, please provide a restated PF.1, PF. 2 and PF. 3 with a $-1.0 \%$ rate change in 2016/17.
d) Please provide PF.1, PF. 2 and PF. 3 indicating the rate increase required to approximately break even for 2016/17.

## Rationale for Question:

To assess the adequacy of revenue requirements at alternate rate levels.

## PUB (MPI) 2-29

| Volume: | PUB/MPI I-37 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Road Safety and Loss Prevention |  |  |
| Sub Topic: | High School Driver Education Program \& Graduated Driver <br> Licensing Program |  |  |
| Issue: | Program Effectiveness |  |  |

Preamble: The Corporation has not advised of the resultant costs and benefits to the changes to the High School Driver Education Program, as requested.

## Question:

Please provide the expected resultant costs and benefits of the proposed changes to the High School Driver Education Program.

## Rationale for Question:

Road Safety and Loss Prevention costs are incurred with a view to reducing collisions, and in turn claims costs, and have a dual impact upon Basic Rates; as both expenditures and a potential savings mechanism. The Board must be provided with sufficient information relative to those initiatives to enable the Board to consider necessity and prudence of the expenditures and potential savings.

## PUB (MPI) 2-30

| Volume: | PUB/MPI I-45 | Page No.: |  |  |
| :--- | :--- | :--- | :--- | :---: |
| Topic: | Investment Income |  |  |  |
| Sub Topic: |  |  |  |  |
| Issue: | Interest Rate Forecasting |  |  |  |

## Question:

a) Please discuss any concerns that the Corporation may have with respect to the discontinuity in 2017 Q1 in the selected interest rate forecast.

b) Please file an updated interest rate forecast comparing it with that currently included in the application and discuss the net income impact of the changed forecast on 2015/16, 2016/17 and 2017/18.
c) Please file an update to PF.1, PF2 and PF. 3 based on the updated interest rate forecast from (a) above.
d) Please expand the table in (a) above to include the long-term forecasts currently available from the major Banks, the Conference Board of Canada and Spatial Economics, to be filed in confidence with the Board as needed.
e) Please advise of why the Corporation dismisses the use of the Spatial Economics forecast on the basis that it is a semi-annual forecast.
f) Please discuss the merits of utilizing multiple long-term interest rate forecasts and why the Corporation does not do so.

## Rationale for Question:

Interest rate forecasting is an important variable for rate setting.

## PUB (MPI) 2-31

| Volume: | PUB/MPI I-47 | Page No:: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Investment Income |  |  |
| Sub Topic: |  |  |  |
| Issue: | Pension Expense |  |  |

Preamble: The Pension discount rate of $3.6 \%$ is static throughout the forecast period.

## Question:

a) Please file PF. 1 PF. 2 and PF. 3 reflecting a change in pension discount rate logically consistent with the movement of interest rates used in the GRA forecast.
b) Please provide details of the determination of the pension discount rate, pension expense and investment income in (a) above.

## Rationale for Question:

To understand the impact of interest rate forecast changes on investment income.

## PUB (MPI) 2-32

| Volume: | PUB/MPI I-49 | Page No.: | Attachment |
| :--- | :--- | :--- | :--- |
| Topic: | Investment Income |  |  |
| Sub Topic: | Asset Liability Management Study |  |  |
| Issue: | Aon Recommendations |  |  |

## Question:

Please explain why, in each case, MPI did not address certain Aon recommendations in its Investment Policy Statement.

## Rationale for Question:

To understand the extent MPI has adopted recommendations made by Aon in the Asset Liability Management Study.

## PUB (MPI) 2-33

| Volume: | PUB/MPI I-49 and <br> PUB/MPI I-50 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Investments |  |  |
| Sub Topic: |  |  |  |
| Issue: | Asset Liability Management Study |  |  |

## Question:

Please provide an update to the attachment to PUB/MPI I-49 including all recommendations made in the appendices filed in PUB/MPI I-50.

## Rationale for Question:

To understand the extent MPI has adopted recommendations made by Aon in the Asset Liability Management Study.

PUB (MPI) 2-34

| Volume: | PUB/MPI I-50(a) | Page No.: | Attachments C and B |
| :--- | :--- | :--- | :--- |
| Topic: | Investments |  |  |
| Sub Topic: |  |  |  |
| Issue: | Asset Liability Management Study |  |  |

Preamble: Aon has indicated that MPI's Bond Portfolio is underweighted in Corporate Bonds relative to its peers SGI and ICBC.

MPI at February 28, 2014 had $\$ 0.5$ million in Corporate Bonds or about $5.5 \%$ of the total Bond Portfolio.

Aon has noted that long-term Corporate bonds offer a consistent yield advantage and forward looking assumptions suggest that they may offer opportunity for enhanced returns.

## Question:

a) Please provide a table that indicates the current and proposed weighting in corporate bonds and compare that with ICBC and SGI.
b) Please indicate whether MPI intends on increasing its weighting in Corporate Bonds under the updated portfolio.
c) Please explain why the Corporation has not established a range of investments in Corporate Bonds in the Investment Policy Statement as recommended by Aon.
d) Please provide updated tables 3.3.1.3 and 3.3.1.4 (Investment Income, pages 21 - 22) adding additional columns providing corporate bond yield and spread information.
e) Please obtain from each of Saskatchewan Auto Fund and the Insurance Corporation of British Columbia an indication of what approach they use with respect to asset liability management.

## Rationale for Question:

To understand how MPI has acted upon Aon recommendations.

## PUB (MPI) 2-35

| Volume: | PUB/MPI I-50 (a) | Page No.: | Attachments D and E |
| :--- | :--- | :--- | :--- |
| Topic: | Investments |  |  |
| Sub Topic: |  |  |  |
| Issue: | Asset Liability Management Study |  |  |

## Question:

Please provide a supplementary explanatory narrative with respect to the abovereferenced attachments, including references to other sections and attachments of the Aon report as appropriate, regarding the recommendation for Portfolio \#2 over the other portfolios analyzed.

## Rationale for Question:

To understand the approaches used in other jurisdictions for asset liability management.

## PUB (MPI) 2-36

| Volume: | PUB/MPI I-51 <br> PUB/MPI I-18 (2015 <br> GRA) | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Investment Income |  |  |
| Sub Topic: |  |  |  |
| Issue: | Asset Liability Management Study |  |  |

Preamble: At last year's GRA, MPI was ordered to file, and did file a copy of the Request for Proposal for the ALM Study together with the Service Agreement (unsigned) with Aon Hewitt.

While the Board in Order 98/14 did not require that MPI respond to CAC/MPI I-56(c), wherein an engagement letter/service contract was requested, it is not the case that this directive should be interpreted as a general rule that the Corporation is not required to produce information relating to the engagement of consultants, including the filing of engagement letters.

## Question:

a) Please file the engagement letter for the Aon assignment in this proceeding.
b) Please file the statement of work for the Asset Liability Management Study and detail any changes to the scope of the study from that filed last year as PUB/MPI I-18 Attachment B.

## Rationale for Question:

Given the importance of investment income to the Corporation's forecasted net financial result for rate setting purposes, and the significant impact that the portfolio mix has upon MPI's investment income, the Board must understand fully the recommendations of Aon, and the scope of its review.

## PUB (MPI) 2-37

| Volume: | PUB/MPI I-52 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Investment Income |  |  |
| Sub Topic: |  |  |  |
| Issue: | Asset Liability Management Study |  |  |

Preamble: The Corporation has stated that Aon Hewitt presented to it the Phase 1 draft ALM report on September 15, 2014, that the Corporation received an update on October 1, 2014 and that the final draft of the Phase 1 report was received on October 6, 2014.

At last year's GRA hearing, Mr. Dan Guimond testified on October 23, 2014 (commencing at page 383 of the transcript) that there were some meetings with Aon to go over some preliminary information, which he characterized as "a preliminary discussion in terms of options. And so no -- no clear direction or decision at this point in time" (relative to cash flow matching).

At last year's GRA hearing, Ms. Heather Reichert testified on October 29, 2014 (commencing at page 1113 of the transcript) as follows:
"Q: And as Mr. Guimond told us last week, Phase 1 is on track to be completed by the end of 2014. The Corporation doesn't have any preliminary findings or conclusions yet?

A: That's correct."

## Question:

Please reconcile the response to PUB/MPI I-52, and in particular the fact that the Corporation had received the final Phase 1 report on October 6, 2014, with the oral evidence referenced above.

## Rationale for Question:

To understand the process related to the review of the report by the Corporation.

## PUB (MPI) 2-38

| Volume: | PUB/MPI I-53, <br> Investment Income <br> Attachment C | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Investment Income |  |  |
| Sub Topic: |  |  |  |
| Issue: | Asset Liability Management Study |  |  |

## Question:

a) With respect to the chart shown on Investment Income - Attachment C Page 34:
i. Please summarize the significant differences in modeling assumptions and approaches between the Base Case scenario modeled by AON, and the Basic GRA forecast based on the Corporation's financial model.
ii. Please indicate whether the horizontal x -axis relates to average annual volatility of Corporate or Basic retained earnings.
iii. Please provide details for the calculation of "average annual volatility of retained earnings", and an explanatory description of the proper interpretation of a given value on this scale.
iv. Please confirm that the hedging strategies being tested (cash flow match, bucket, duration match) are being modeled for the Corporation as a whole, and not for Basic in isolation.
b) With respect to Investment Income - Attachment C - Appendices B and C, please reconcile and explain the $\$ 58$ million difference in mean Basic Net Income for 2014/15 for the Base Case scenario on page 74 versus that of the Recommended Portfolio on page 87.
c) With reference to Investment Income - Attachment C Appendix E as appropriate, please discuss the advantages and disadvantages of segregating the Basic investment portfolio (from that supporting the competitive lines and the pension obligations), both in general and specifically with respect to addressing Basic interest rate risk.

## Rationale for Question:

To understand the implications for revenue requirement of implementing an alternative interest rate mitigation strategy.

## PUB (MPI) 2-39

| Volume: | PUB/MPI I-13, REV.1.2 | Page No.: | REV.1.2, Pg. 11 |
| :--- | :--- | :--- | :--- |
| Topic: | Motor Vehicle Premiums |  |  |
| Sub Topic: |  |  |  |
| Issue: | Upgrade Factor |  |  |

## Question:

Please provide a table indicating the actual upgrade factor for the last ten fiscal years (if data is readily available) and the prime interest rate prevalent during each of those years, and test the strength of any correlation between the two time series.

## Rationale for Question:

To understand whether there is a correlation between borrowing costs and the upgrade of vehicles, to assess the reasonableness of the upgrade factor used in light of the lower interest rate environment.

## PUB (MPI) 2-40

| Volume: | CAC/MPI I-73, First <br> Quarter Report AI.6 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Financial Forecast |  |  |
| Sub Topic: |  |  |  |
| Issue: | Interest Rate Forecasting |  |  |

## Preamble:

The ten year Canada interest rate increased during the first three months of the fiscal year resulting in $\$ 50.3$ million unrealized loss of FVTPL bonds. MPI has indicated that it has adopted Aon Hewitt's recommendation regarding the calculation of the discount rate for the claims liabilities as of March 2015.

## Question:

a) Please indicate how interest rates changed during the quarter and the impact on the provision for Basic unpaid claims at the quarter-end, Basic investment income for the quarter and Basic net income for the quarter.
b) Please provide a comparison of the discount rate prepared under the previous method with that adopted in March 2015.
c) Please provide the supporting calculations with explanation of the determination of the discount rate used at May 31, 2015.
d) Please provide a back test of the financial model utilizing actual 2014/15 experience to parameterize the model looking forward from February 28, 2014, comparing the model output with actual 2014/15 results, discussing any significant differences.

## Rationale for Question:

To assess whether the financial model is reasonably forecasting the impact of changes in interest rates on financial results.

## BW (MPI) 2016 GRA Information Requests

## BW (MPI) 2-1

| Volume: | 3, Loss Prevention and <br> Road Safety <br> Implementation plan | Page No.: | A1.13 Appx 6 p 43 IR <br> BW 1-9 |
| :--- | :--- | :--- | :--- |
| Topic: | Road Safety |  |  |
| Sub Topic: | Priority Setting |  |  |
| Issue: | Claims costs related fatalities and injuries |  |  |

Preamble: On page 43, the text and chart indicate that reduced fatal and serious collisions results in reduction in collisions and claims costs. Likewise, in MPI's response to BW interrogatory 1-9 d, MPI provided that: "Yes. There is a direct relationship between the reduction of fatality and injury collisions and a reduction in claims costs."

## Question:

What proportion of annual variations in claims costs do MPI analysts estimate, using statistical methods (such as regression analysis) are explained by claim costs related to fatalities and serious injuries?

## Rationale for Question:

BW submits that there is a relationship between claim costs related to fatalities and serious injuries and total claims costs. However, in order to understand the weight attributable to reducing fatalities and injuries - within MPI's objective of reducing claims costs - it is important to know what proportion of variations in claims costs are driven by claims related to fatalities and serious injuries.

## BW (MPI) 2-2

| Volume: | 3, Loss Prevention and <br> Road Safety | Page No.: | MPI response to BW <br> 1 1-9, A1.13, appendix <br> 6 |
| :--- | :--- | :--- | :--- |
| Topic: | Road Safety |  |  |
| Sub Topic: | Claims cost v. social cost |  |  |
| Issue: | Social cost of injuries and fatalities |  |  |

Preamble: In BW 1-9, an inquiry was made about MPI's methodology for quantifying social cost of collisions. BW is seeking to ensure that MPI demonstrates the difference between the claims costs they pay for fatality or serious injury and social costs resulting from such collision outcomes. MPI replied that "The social cost aspect of loss prevention may be quantified in the reduction of lives lost and injuries occurring as a result of collisions on the roadway."

## Question:

a) What is MPI's preferred methodology for setting a social cost value for loss of life?
b) Alternatively, please advise how MPI calculates and/or establishes the social cost value for loss of life.
c) Does MPI agree that it is seeking the Board's approval to focus road safety priorities and programs designed to reduce claims costs rather than reduce fatalities and serious injuries?
d) Does MPI agree that the social cost of fatalities and injuries caused by motor vehicle collisions is of greater magnitude than the claims costs that it must pay?

## Rationale for Question:

BW is seeking to ensure that MPI demonstrates the difference between the claims costs they pay for fatality or serious injury and social costs resulting from such collision outcomes. BW further submits that this is important given that MPI is seeking the Board's approval to focus road safety priorities and programs designed
to reduce claims costs rather than safety priorities and programs aimed to reduce fatalities and serious injuries.

## BW (MPI) 2-3

| Volume: | III, Loss prevention and <br> road safety | Page No.: | 41 |
| :--- | :--- | :--- | :--- |
| Topic: | Road Safety |  |  |
| Sub Topic: | Social costs of collisions |  |  |
| Issue: | Ontario Ministry of Transportation social cost study |  |  |

Preamble: Ms. Kroeker-Hall's opines in her report that: "It is not feasible to provide a definitive response to the Board's specific questions about the optimal size of the road safety budget for Manitoba Public Insurance or the extent to which current funding is being optimally utilized, given the lack of comparable data from other jurisdictions, and in light of the Corporation's relative role within the broader road safety construct."

## Question:

a) Did MPI and/or Sirius Strategic Solutions Ltd. review the Study "Analysis and Estimation of the Social Cost of Motor Vehicle Collisions in Ontario" presented to the Ontario Ministry of Transportation in 2007 by Keith Vodden, Dr. Douglas Smith, Frank Eaton, and Dan Mayhew?
b) If the answer is yes - in particular regard to the findings with respect to the valuation of the social costs of collisions - please provide MPI's and/or Sirius Strategic Solutions Ltd.'s findings, opinions and conclusions with respect to this study.
c) Please produce all the documents, materials, studies and reports which were considered and/or relied upon and/or cited to prepare Ms. Kroker-Hall's Report.

## BW (MPI) 2-4

| Volume: | III, Loss Prevention and <br> Road Safety | Page No.: | AI.13 Appendix 2 and <br> 6 |
| :--- | :--- | :--- | :--- |
| Topic: | Road Safety consultation |  |  |
| Sub Topic: | Stakeholder mapping |  |  |
| Issue: | BW exclusion from Issues of import to cyclists |  |  |

Preamble: Consultation plans are built into the design process. Consultation is a priority with those groups who:

- Have a clearly defined interest in an issue
- Demonstrate willingness to work with MPI
- Can offer a potential resource contribution, and/or
- Can influence and/or provide access to groups targeted for a program or initiative.

It appears that BW is not included in the stakeholder mapping for Speed, nor is it included in the stakeholder mapping for poor driver action

## Question:

Why did MPI not Include BW in stakeholder mapping for speed or poor driver action?

BW (MPI) 2-5

| Volume: | III, Loss Prevention and <br> Road Safety | Page No.: | AI.13 Appendix 10, <br> pages 3-8 |
| :--- | :--- | :--- | :--- |
| Topic: | Road safely goals and priorities |  |  |
| Sub Topic: | MPI goals and priorities v. international road safety goals and <br> priorities |  |  |
| Issue: | Priorities driven by claims reduction v. social cost of road <br> collisions |  |  |

Preamble: The Sirius report states, inter alia, the following:

At page 4, line 37: "In other jurisdictions [...] Currently the safe systems approach appears to be the model of choice. It seeks to identify the major sources of error or design weaknesses that contribute to crashes and mitigate the severity and consequences of injury."

At page 5, line 1: "The public health model, reflected in a global focus on road safety by the World Health Organization, brings a systematic approach to road safety problem solving that has traditionally been applied to issues of disease and injury control."

At page 6, line 9: "In other jurisdictions, [...] Increasingly, road safety has been viewed as a public health problem in particular by the World Health Organization (2004) which includes road crashes among the eight leading causes of death worldwide. [...]"

At page 9: "In sum, the work to date and the commitment to continually enhance elements of the road safety framework to focus resources on priorities that will contribute to MPI's goals and optimize funding, has been considerable and substantive. While there is no uniform or simple formula for determining how much funding should be spent on road safety initiatives in any jurisdiction or organization, MPI has chosen a model intended to optimize its funding, or provide a return on investment that will contribute to achieving its goals. In linking the elements of its road safety framework including priority setting and program development, priority validation and issue analysis, and, monitoring and evaluation, allocation of funding to support the programming is a creditable and supportable approach to successful road safety programming."

## Question:

a) Does the Sirius find that MPI's claims reduction goal is significantly different than the road safety goals of OECD, WHO, and the World Bank?
b) Does Sirius find that MPI's road safety priorities are different than those of the jurisdictions who pursue the goals of reducing fatalities and serious injuries? In what respects?
c) How does MPI's choice of its funding-driven model drive its choice of road safety priorities, particularly with regard to vulnerable road users, relative to jurisdictions who pursue the goals of reducing fatalities and serious injuries?
d) Does Sirius identify any agency in Manitoba with the mandate to reduce social costs resulting from motor vehicle collisions?

## BW (MPI) 2-6

| Volume: | I, Loss Prevention and <br> Road Safety BW 1-10 | Page No.: | 41 |
| :--- | :--- | :--- | :--- |
| Topic: | Road Safety |  |  |
| Sub Topic: | Social costs of collisions |  |  |
| Issue: |  |  |  |

Preamble: In response to PUB Order 135/14, section 11.19 (which required MPI to provide an independent review of the optimal size of a road safety budget portfolio for the Corporation with a view to minimizing the economic and social costs of collisions) MPI has submitted Sirius Strategic Solutions Ltd.'s report authored by Ms. Kroeker-Hall. In response to BW IR 1-10 d), MPI advised that it has no plans to call anyone from Sirius to as a witness in these proceedings.

## Question:

a) With MPI's apparent decision not produce anyone from Sirius at the hearing, please advise how the Board - and the Intervenors - will be able to determine that:
i. the author(s) of the Report is/are qualified as an expert by knowledge, skill, experience, training or education?
ii. the author(s) of the Report have the necessary scientific, technical or other specialized knowledge that will assist the Board to understand the Report and to determine if MPI has satisfied Board Order 135/14, section 11.19 ?
iii. the Report is based on sufficient and or reliable facts and/or data?
iv. The Report reliably applied the proper principles and/or methods to the facts?
b) With MPI's apparent decision not to produce anyone from Sirius at the hearing, please advised how the Board - and the Intervenors - will be able to test in any meaningful manner the purported findings, opinions and conclusions of the Report?
c) Will MPI reconsider its position and call someone from Sirius to provide evidence at the hearing?

BW (MPI) 2-7

| Volume: | 3, Loss Prevention and <br> Road Safety | Page No.: | AI.13 Appendix 10, <br> pages 3-8 |
| :--- | :--- | :--- | :--- |
| Topic: | Road Safety |  |  |
| Sub Topic: | MPI goals and priorities v. international road safety goals and <br> priorities |  |  |
| Issue: | Additional Information and clarification |  |  |

Preamble: In information request BW 1-10, BW requested, inter alia, that MPI file a copy of the engagement letter sent to Sirius Strategic Solutions Ltd. ("Sirius") and to provide Sirius' file with respect to the preparation of the Sirius Report.

With respect to the letter of engagement, MPI declined on the basis that "As per Board Order 98/14, page 112, a response to this question is not required. The Corporation is not required to produce operational information relating to the engagement of consultants and the related engagement letters [2015 GRA CAC

MPI 1-55(c)]." In addition, regarding the request to providing Sirius' file with respect to the preparation of its Report, MPI declined on the basis that is the "proprietary property of Sirius and is not the property of MPI to produce."

Regarding the issue of producing Sirius' letter of engagement, BW submits that contrary to MPI's assertion, Board Order 98/143 does not state that the Corporation is not required to produce operational information relating to the engagement of consultants and the related engagement letters". In fact, BW submits that in that same Order, the Board directed that MPI file a copy of the Request for Proposal for the ALM Study together with the Service Agreement (unsigned) with AON Hewitt. The Board's decision with respect to the production of AON's Service Agreement makes it clear that engagement letters of experts and/or consultants are relevant and producible.

Moreover, MPI has, to date, taken the position that it will not be producing anyone from Sirius as a witness at the hearing. If this is indeed the case, it is even more important that Sirius provide the documents in its possession that are or may be relevant to the matters of substance in the Report. Having these documents provide the Board - and the Intervenors - with a better understanding of the foundation of the findings, opinions and conclusions that have been made in the Sirius Report.

## Question:

a) Please provide a copy of the engagement letter sent to Sirius;
b) Please provide Sirius' file with respect to the preparation of the Report;
c) If MPI declines, please advise on what basis it states that the expert's file is the proprietary property of Sirius?
d) If MPI is taking this position based on a document produced and prepared by Sirius, please advise and produce it?
e) If MPI is taking this position based on something other than a document produced and prepared by Sirius, please advise and produce.

## CMMG (MPI) 2016 GRA Information Requests

## CMMG (MPI) 2-1

## Question:

Please explain the Corporations forecast for a reduction in projected total premium for 2016 shown in the response to CMMG/PUB 1-1. Is this solely a function of the applied for decrease?

## Rationale for Question:

Revenue requirements.

## CMMG (MPI) 2-2

## Question:

Was 2006's experience included in the calculations for the 2016 motorcycle rate?

## Rationale for Question:

Actuarial methodology

## CMMG (MPI) 2-3

## Question:

If 2006's experience was included, what would be the change in the 2016 rate requirement if it was not included?

## Rationale for Question:

Reasonableness of rate calculations and actuarial methodology.

## CMMG (MPI) 2-4

## Question:

With reference to the response in CMMG (MPI) 1-3B, please provide any evidence that motorcycles over 1000 cc's have a higher claims exposure or losses than the 500 to 100 cc class.

## Rationale for Question:

Reasonableness and proof of assumptions.

## CMMG (MPI) 2-5

## Question:

Again, in terms of 1-3B, explain how the experience adjustment rules reduced the amount of the decrease. Please describe in detail as opposed to a general section of the GRA Application.

## Rationale for Question:

Explaining actuarial methodology in rate capping.

## CMMG (MPI) 2-6

## Question:

How many years experience does the Corporation rely on before indicating a certain amount of expense is a trend for a vehicle population like motorcycles? What actuarial rules are utilized by the Corporation in this determination of a trend?

## Rationale for Question:

Checking actuarial assumptions.

## CMMG (MPI) 2-7

## Question:

With respect to CMMG (MPI) 1-4, what is the timeline for completing these investigations? When did they commence?

## Rationale for Question:

Distracted driver loss reduction efforts.

## CMMG (MPI) 2-8

## Question:

Please confirm (with reference to CMMG (MPI) 1-5)) that the $\$ 197,000.00$ forecast for motorcycle specific road safety programs is a reduced amount from monies earmarked by the Corporation in previous years. In answering, please provide the amounts both forecasted and spent for the last ten years for this road safety expense.

## Rationale for Question:

Road safety changes.

## CMMG (MPI) 2-9

## Question:

With reference to CMMG (MIP) 1-6, please compare the budgeted amounts for wildlife collision initiatives with seal belt and distracted driving safety initiatives, by comparing the budged amounts for each of these road safety concerns with the estimated losses (total vehicle population losses, and on a loss per unit basis).

## Rationale for Question:

Road safety expenditures.

## CMMG (MPI) 2-10

## Question:

In CMMG (MPI) 1-12, the Corporation answered in the affirmative that its assumptions and other selected factors (not numbers as stated) have changed.
Instead of a general reference to the ratemaking sections of the GRA, please list which assumptions and factors for motorcycles have changed over the last decade.

## Rationale for Question:

Checking actuarial assumptions.

## CAC (MPI) 2016 GRA Information Requests

## CAC (MPI) 2-1

| Volume: | 3, Actuarial Reports | Page No.: | 22, Oct report 4, Feb <br> report |
| :--- | :--- | :--- | :--- |
| Topic: | Actuarial Reports |  |  |
| Sub Topic: |  |  |  |
| Issue: | Ensuring the reasonableness of the Actuarial reports |  |  |

Preamble: Follow up to CAC (MPI) 1-1

## Question:

a) The response to CAC (MPI) 1-1 (a) states that "the 212-Ultimate factor was chosen to ensure that the 116 -Ulimate factor is equal to 1.0070 ". Does this not mean that the 116-Ultimate factor completely relies on the tabular reserves that have been set? If not please explain why not.
b) In regards to the response to CAC (MPI) 1-1 (b) why has the Corporation not investigated alternative sources of information to calculate the tail factor for the Weekly Indemnity coverage?
c) Please identify the steps, if any, the Corporation has made to find an alternative source of information to calculate the tail factor for the Accident Benefits Other (Indexed) coverage. Data may be available from the Quebec government, for example.
d) The response to CAC (MPI) 1-1 (c) states that "The Corporation currently uses the mortality table from a research paper by the Canadian Institute of Actuaries dates July 1992." How many years of experience will be required before MPI relies on their own mortality experience to set reserves?
e) The response to CAC (MPI) 1-1 (c) states "The Corporation has tracked the actual termination rate of claims beyond 120 months (10 years) of development relative
to the expected termination rate indicated by the current mortality table." Please provide these results.
f) Please calculate the Calculated IBNR shown on Exhibit 4, Page 5 of the February 28, 2015 Actuarial Report changing the selection of the Tab Rsv 120-Ult factor on Appendix E, Page 6 and Appendix E, Page 14 to equal the Latest 6 Volume Weighted factor. Please show a comparison of the result to those shown on Exhibit 4, Page 5.

## Rationale for Question:

Peer review of Actuarial Reports goes to reliability of reserves and the extent to which better data might be employed.

## CAC (MPI) 2-2

| Volume: | 3. Al.9 | Page No.: | 4 |
| :--- | :--- | :--- | :--- |
| Topic: | Rate Indications Determined in Accordance with Actuarial <br> Practice in Canada |  |  |
| Sub Topic: |  |  |  |
| Issue: | Investment Income Offset |  |  |

Preamble: Follow up to CAC (MPI) 1-4 and PUB (MPI) 1-61

## Question:

Please provide a revised version of the table on page 4 of section Al.9, keeping the current columns, but adding two columns (rate and change) for the required rates including the average investment income from equity of $\$ 12.7$ million, stated in response to PUB (MPI) 1-61 b), in the calculation.

## Rationale for Question:

Goes to compliance with accepted actuarial practice. MPI should be calculating their rate indication with accepted actuarial practice in Canada. This could be done very easily with the addition of an investment income offset for the investments in excess of those backing the claims liabilities. The investment income on the investments
backing the claims liabilities is taken into account with the discounting of the claims for ratemaking.

## CAC (MPI) 2-3

| Volume: | 3. Al.9 | Page No.: | 4 |
| :--- | :--- | :--- | :--- |
| Topic: | Rate Indications Determined in Accordance with Actuarial <br> Practice in Canada |  |  |
| Sub Topic: |  |  |  |
| Issue: | Forecasting Basis |  |  |

Preamble: Follow up to CAC (MPI) 1-5

## Question:

a) Would the Corporation agree that the current claims forecasting process is a cumbersome methodology that requires the transformation of fiscal year (or calendar year) results into accident year results required for ratemaking?
b) If it is accepted that the Claims Forecasting process of determining trends is acceptable practice would it not save time and make the process more transparent to forecast on an Accident Year ultimate basis, with the Actuarial Reports Ultimates used as the starting point? If not please provide detailed reasons why the current method is superior.

## Rationale for Question:

MPI should be calculating their rate indication with accepted actuarial practice in Canada. This could be done using the Actuarial Report's historical ultimate losses and projecting forward to the rating year in question.

## CAC (MPI) 2-4

| Volume: | 2. Claims Incurred | Page No.: | $\mathbf{1 1}$ |
| :--- | :--- | :--- | :--- |
| Topic: | Weekly Indemnity Ultimate Losses |  |  |
| Sub Topic: |  |  |  |
| Issue: | Do not match to the Appointed Actuary's Report |  |  |

Preamble: Follow up to CAC (MPI) 1-6

## Question:

a) Please confirm the correct source of the Weekly Indemnity ultimates shown on page 11 of the Claims Incurred Section is Vol III AI. 7 Exhibit 2, Sheet 5, which are the Ultimates on a direct basis.
b) Why do the Ultimates shown on Exhibit 2, Sheet 5 not match the Ultimates shown on Exhibit 3, Sheet 5 in the February Actuarial Report?

## Rationale for Question:

To ensure the accuracy of the claims forecast.

## CAC (MPI) 2-5

| Volume: | 2, Claims Incurred | Page No.: | 11 |
| :--- | :--- | :--- | :--- |
| Topic: | Weekly Indemnity Frequency Forecast |  |  |
| Sub Topic: |  |  |  |
| Issue: | Forecast seems high |  |  |

Preamble: Follow up to CAC (MPI) 1-7. On page 11 of the Claims Incurred section the claim counts are forecast using the all year trend excluding the most recent year as clarified in the response to CAC (MPI) 1-7.

## Question:

a) Please explain why the most recent year was excluded from use in the forecasted claim counts.
b) Please show the table on page 11 of the Claims Incurred section if the claim counts were forecast using the all year trend.

## Rationale for Question:

To ensure the accuracy of the claims forecast.

## CAC (MPI) 2-6

| Volume: | 2, Claims Incurred | Page No.: | 15 |
| :--- | :--- | :--- | :--- |
| Topic: | ABO Indexed Frequency Forecast |  |  |
| Sub Topic: |  |  |  |
| Issue: | Forecast seems high |  |  |

Preamble: Follow up to CAC (MPI) 1-9. On page 15 of the Claims Incurred section the claim counts are forecast using the all year trend excluding the most recent year as clarified in the response to CAC (MPI) 1-9.

## Question:

a) Please explain why the most recent year was excluded from use in the forecasted claim counts.
b) Please show the table on page 15 of the Claims Incurred section if the claim counts were forecast using the all year trend.

## Rationale for Question:

To ensure the accuracy of the claims forecast.

## CAC (MPI) 2-7

| Volume: | 2, Claims Incurred | Page No.: | 19 |
| :--- | :--- | :--- | :--- |
| Topic: | ABO Non Indexed Frequency Forecast |  |  |
| Sub Topic: |  |  |  |
| Issue: | Forecast seems high |  |  |

Preamble: Follow up to CAC (MPI) 1-11. On page 19 of the Claims Incurred section the claim counts are forecast using the all year trend excluding the most recent year as clarified in the response to CAC (MPI) 1-11.

## Question:

a) Please explain why the most recent year was excluded from use in the forecasted claim counts.
b) Please show the table on page 19 of the Claims Incurred section if the claim counts were forecast using the all year trend.

## Rationale for Question:

To ensure the accuracy of the claims forecast

## CAC (MPI) 2-8

| Volume: | 2, Ratemaking | Page No.: |  |
| :--- | :--- | :--- | :---: |
| Topic: | Reconciliation of Ratemaking Incurred Claims to those shown <br> in the Claims Incurred Forecast |  |  |
| Sub Topic: |  |  |  |
| Issue: | Reconciliation of Ratemaking Incurred Claims to those shown <br> in the Claims Incurred Forecast |  |  |

Preamble: Follow up to CAC (MPI) 1-13

## Question:

In future can the Corporation commit to providing tables such as that given in response to CAC (MPI) 1-13 to easily follow numbers through the rate requirement calculation? This will avoid the same questions being asked year after year.

## Rationale for Question:

To ensure the accuracy of the claims forecast and to provide better future reporting.

CAC (MPI) 2-9

| Volume: | 2, Claims Incurred | Page No.: | 37, 38 |
| :--- | :--- | :--- | :--- |
| Topic: | Collision Forecast |  |  |
| Sub Topic: |  |  |  |
| Issue: | Reconciling the Calculations on the table on page $\mathbf{3 8}$ |  |  |

Preamble: Follow up to CAC (MPI) 1-14

## Question:

In future can the Corporation commit to providing explanations like that given in response to CAC (MPI) 1-14 to avoid similar questions year over year?

## Rationale for Question:

To ensure the accuracy of the claims forecast and to assist better future reporting.

## CAC (MPI) 2-10

| Volume: | 2, Claims Incurred | Page No.: | 38 |
| :--- | :--- | :--- | :--- |
| Topic: | Collision Forecast |  |  |
| Sub Topic: |  |  |  |
| Issue: | Understanding the Calculations on the table on page $\mathbf{3 8}$ |  |  |

Preamble: Follow up to CAC (MPI) 1-15. The table below shows the claims frequency and severity as per the table on page 38 of the Claims Incurred section. The HTAs are as per page 7 of the Revenues section.

## Question:

Please explain why the ultimates calculated as per the table below do not match the ultimate shown on page 38 of the Claims Incurred section.

| Accident Year | Claim Frequency <br> per HTA Unit (1) | Severity Adjusted <br> for PST (2) | HTA (3) | Calculated <br> Ultimate <br> (1) $\mathbf{x}$ (2) $\mathbf{x}$ (3) |
| :---: | :---: | :---: | :---: | :---: |
| $2005 / 06$ | 0.121 | 2,358 | 713,135 | 203,470 |
| $2006 / 07$ | 0.132 | 2,366 | 721,360 | 225,289 |
| $2007 / 08$ | 0.132 | 2,400 | 735,225 | 232,919 |
| $2008 / 09$ | 0.132 | 2,434 | 751,937 | 241,588 |
| $2009 / 10$ | 0.127 | 2,511 | 763,251 | 243,398 |
| $2010 / 11$ | 0.137 | 2,553 | 774,765 | 270,983 |
| $2011 / 12$ | 0.128 | 2,702 | 791,384 | 273,705 |
| $2012 / 13$ | 0.135 | 2,825 | 811,247 | 309,389 |
| $2013 / 14$ | 0.138 | 3,002 | 822,677 | 340,815 |
| $2014 / 15$ | 0.119 | 3,155 | 834,238 | 313,210 |

## Rationale for Question:

To ensure the accuracy of the claims forecast.

## CAC (MPI) 2-11

| Volume: | III | Page No.: | 6 |
| :--- | :--- | :--- | :--- |
| Topic: | $\mathbf{1}^{\text {st }}$ Quarterly Financial Report, Three Months Ended May 31, <br> 2015 |  |  |
| Sub Topic: | Claims Incurred Forecasts |  |  |
| Issue: | Claims incurred to May 31, 2015 decreased significantly <br> compared to last year. |  |  |

Preamble: Per the $1^{\text {st }}$ Quarterly Report "Claims costs for the three months ended May 31, 2015 decreased by $\$ 49.6$ million compared to last year due primarily to a decrease of $\$ 42.5$ million or $66.7 \%$ in bodily injury claims incurred and a decrease of $\$ 7.7$ million or $6.0 \%$ in physical damage claims incurred".

## Question:

a) Please advise if the favourable claims experience in the $1^{\text {st }}$ quarter of 2015/16 fiscal year would change the 2015/16 forecast as presented in Volume II Pro Formas page 3. If yes, please file an updated Statement of Operations forecast for $2015 / 16$, and if there is an impact on future years' forecasts, please file updates for those as well.
b) If the favourable claims experience to-date does not change the forecasts, please explain and provide the supporting analyses.

## Rationale for Question:

To assess the financial impact of the to-date current year's favourable operating experience on the 2016 GRA financial forecasts.

## CAC (MPI) 2-12

| Volume: | III | Page No.: | 11 |
| :--- | :--- | :--- | :--- |
| Topic: | $\mathbf{1}^{\text {st }}$ Quarterly Financial Report, Three Months Ended May 31, <br> $\mathbf{2 0 1 5}$ |  |  |
| Sub Topic: | Proceeds from Sale of Investments |  |  |
| Issue: | MPI received $\$ 502,506,000$ in proceeds from sale of <br> investments in the $\mathbf{1}^{\text {st }}$ <br> quarter of 2015 compared to <br> $\$ 191,918,000 ~ l a s t ~ y e a r . ~$ |  |  |

Preamble: See issue.

## Question:

a) Please explain the reason(s) for the significant sale of investments in the $1^{\text {st }}$ quarter of 2015.
b) Please provide an analysis of the gains (losses) realized, by issuer, relating to the sale of investments of $\$ 502,506,000$.

## Rationale for Question:

To assess the reason for the significant sale of investments and the financial impact on operations.

## CAC (MPI) 2-13

| Volume: | CAC (MPI) 1-16 (c) | Page No.: |
| :--- | :--- | :--- | :--- |
| Topic: | Physical Damage Repairs |  |
| Sub Topic: | Repair industry investment in re-tooling to be able to repair <br> vehicles built with complex materials |  |
| Issue: | To confirm that the investment in re-tooling is solely funded <br> by the repair industry currently and in future years. |  |

Preamble: The response to CAC (MPI) 1-16 (c) indicates that the claims incurred forecasts do not include a contribution or subsidy by MPI to the repair industry for re-tooling to be able to repair vehicles built with complex materials.

## Question:

Please confirm that the repair industry is expected to fund the re-tooling investments and is not expecting a contribution or subsidy from MPI going forward.

## Rationale for Question:

To confirm that there are no unintended financial impacts on the 2016 GRA presented claims incurred forecasts.

## CAC (MPI) 2-14

| Volume: | CAC (MPI) 1-20 b), <br> response c) and PUB <br> Order 135/14 page 6 | Page No.: | 2 |
| :--- | :--- | :--- | :--- |
| Topic: | Collision Claims Incurred Forecasting |  |  |
| Sub Topic: | Collision costs/savings due to changes in manufacturing <br> vehicle design |  |  |
| Issue: | In PUB Order 135/14 it implied that \$30 million per year had <br> been included in the collision claims incurred forecasts for <br> rate setting purposes. |  |  |

Preamble: In PUB Order 135/14 on page 6 it states: "Basic insurance revenues need to increase because of cost increases due to inflation and higher collision costs due to changes in manufacturer vehicle design in the order of $\$ 30$ million per year in the outlook period." In response to CAC (MPI) 1-20 the Corporation indicates that "The Corporation uses the historical trends to determine growth rates and as these new technologies and manufacturing processes are introduced to the fleet they will be captured in the historical trends and forecasted as such." In the response it further states "As such, the Corporation has not forecasted a claims cost savings for collision avoidance technology."

## Question:

a) Please confirm that the Corporation has not included a $\$ 30$ million increase in collision claims incurred forecasts, for basic insurance rate setting purposes, as a result of changes in manufacturer vehicle design.
b) Please confirm that potential increases in collision claims incurred and potential claims incurred savings as a result of changes in manufacturing vehicle design and introduction of collision avoidance technology will be taken into account in preparing the claims incurred forecasts as they become evident in the claims incurred data used for forecasting and for basic insurance rate setting purposes. If this cannot be confirmed, please explain why not.

## Rationale for Question:

To assess and understand the financial impact of changes in vehicle design and collision avoidance technology included in claims incurred forecasts.

## CAC (MPI) 2-15

| Volume: | CAC (MPI) 1-26 | Page No.: |
| :--- | :--- | :--- |
| Topic: | Actuarial Report as of October 31, 2014 |  |
| Sub Topic: | Appendix H: Reconciliation of Paid and Outstanding Claim <br> Amounts. |  |
| Issue: | Nature of recovered excess payments |  |

Preamble: See issue.

## Question:

Please provide an example of the nature and type of recovered excess payments. In future years, is MPI expecting the recovery of excess payments to increase or decrease compared to the $\$ 4.2$ million recovered in 2014? Please explain.

## Rationale for Question:

To understand the nature of excess claims payments and the potential financial impact on claims incurred forecasts.

## CAC (MPI) 2-16

| Volume: | CAC (MPI) 1-43 | Page No.: |
| :--- | :--- | :--- | :--- |
| Topic: | Legacy Computer Systems |  |
| Sub Topic: | Claims Administration and Reporting System (CARS) |  |
| Issue: | To understand the number and type of claim systems and how <br> these systems interface and interact. Also to assess the <br> available of claims data for analysis purposes. |  |

Preamble: In response to CAC (MPI) 1-43 (a) it states: "CARS (Claims
Administration and Reporting System) is not being replaced by $\mathrm{BI}^{3}$ or as part of PDR.

We are currently planning to replace the Physical Damage claims application with the Fineos product. However, the time line has not yet been established."

## Question:

For greater clarity please explain, in detail, the purpose of each claim system, explain the operational efficiencies achieved by operating multiple claim systems, the claims data that will or is planned to be stored in CARS, BI ${ }^{3}$, PDR and Physical Damage claims application (Fineos product). Also please explain how the various claim systems will be interfaced or interact with each other.

## Rationale for Question:

To better understand the various claim systems, how they interact with each other and also assess whether potential operational efficiencies are achieved or achievable by operating multiple claim systems.

## CAC (MPI) 2-17

| Volume: | CAC (MPI) 1-48 | Page No.: |
| :--- | :--- | :--- | :--- |
| Topic: | PDR Update |  |
| Sub Topic: | Claims Estimates prepared by the repair industry |  |
| Issue: | Repair industry preparing claims estimates at no cost. |  |

Preamble: In response to CAC (MPI) 1-48 (b) it states "The repair trade is not compensated for preparing claims estimates."

## Question:

Please explain and provide the rationale for the repair trade preparing claims estimates for free.

## Rationale for Question:

To assess and understand the motivation of the repair trade to prepare claims estimates for free.

## CAC (MPI) 2-18

| Volume: | CAC (MPI) 1-56b | Page No.: |
| :--- | :--- | :--- | :--- |
| Topic: | Road Safety |  |
| Sub Topic: | Injuries (per billion motor vehicle-kilometers) |  |
| Issue: | Manitoba has one of the highest injuries per billion motor <br> vehicle-kilometers in Canada. |  |

Preamble: For 2013, for example, Manitoba has 840.0 injuries per billion motor vehicle-kilometers, BC has 567.2 and Ontario has 465.6.

## Question:

Please comment and provide insight as to why Manitoba has one of the highest injuries per billion motor vehicle-kilometers in Canada?

## Rationale for Question:

To understand the reason(s) why Manitoba has one of the highest injuries per billion motor vehicle-kilometers in Canada.

## CAC (MPI) 2-19

| Volume: | CAC (MPI) 1-61 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Accounts Receivable-Basic Insurance Annual Report |  |  |
| Sub Topic: | Inter-divisional receivable/payable as at February 28, 2015 |  |  |
| Issue: | The transfer of non Basic retained earnings to Basic <br> Insurance is recorded as an accounts receivable on the Basic <br> Insurance Annual Report. |  |  |

Preamble: The response to CAC (MPI) 1-61 states "The increase of $\$ 75$ million in subrogation and other receivables is due to the $\$ 75.5$ million transfer of non Basic retained earnings to Basic. The offset of this transfer to retained earnings is an increase in other receivables of $\$ 75$ million."

## Question:

a) Please confirm that by booking the non Basic retained earnings transfer of $\$ 75.5$ million to Basic Insurance as a receivable on the Basic Insurance Statement of Financial Position (assuming the non Basic Statement of Financial Position has an offsetting accounts payable), Basic Insurance did not earn investment income relating to the $\$ 75.5$ million transfer from the date of transfer. If this cannot be confirmed please elaborate.
b) Please note that per the Audited Corporate Annual Financial Statements for the fiscal year ended February 28, 2015, page 37, an increase in Basic Insurance Rate Stabilization Reserve of $\$ 75.5$ million and a reduction of $\$ 75.5$ million in Non-Basic Retained Earnings is reported. Please explain the response to CAC (MPI) 1-61 in the context of the reporting in the audited corporate annual financial statements.

## Rationale for Question:

To understand the reporting and booking of the $\$ 75.5$ million non-basic retained earnings transfer to basic RSR and the impact on investment income for basic insurance.

CAC (MPI) 2-20

| Volume: | CAC (MPI) 1-44 and PUB <br> (MPI) 1-28 (c) | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | PDR Program costs |  |  |
| Sub Topic: | PDR program costs: Corporate vs. Basic Insurance |  |  |
| Issue: | Per the response to CAC (MPI) 1-44 a portion of the PDR <br> program cost relate to non-basic. |  |  |

Preamble: See issue.

## Question:

Please update and file the chart filed with PUB (MPI) 1-28 (c) apportioning the PDR program costs between Basic Insurance and non-Basic. Please explain the
methodology used to allocate PDR program costs between basic insurance and nonbasic.

## Rationale for Question:

To detail and clarify the PDR program costs relating to basic insurance.

## CAC (MPI) 2-21

| Volume: | III, Appendix 1, <br>  <br>  <br>  <br>  <br>  <br>  <br>  <br> GRA) (MPI) 1-53 (a) (this PUB 1-18 (last <br> Gear's GRA) PUB Order <br> 98/14, p. 112 and 122. |  |
| :--- | :--- | :--- | :--- |
| Topic: | Loss Prevention and Road Safety |  |
| Sub Topic: | Loss Prevention Strategy \& Framework for Manitoba Public <br> Insurance prepared by IBM |  |
| Issue: | Additional information and clarification |  |

Preamble: In information request CAC 1-53 (a), CAC Manitoba noted that MPI engaged the professional services of IBM to develop the Loss Prevention Governance Framework. It requested that MPI file a copy of the engagement letter, including costs.

MPI declined claiming that "the Corporation is not required to produce operational information relating to the engagement of consultants and the related engagement letters". It cited Board Order 98/143, p. 112 and the ruling of the Board with regard to CAC(MPI) 1-55 (c).

While MPI appears to claim that there is a blanket rule against the filing of engagement letters, this is not the case.

CAC Manitoba agrees that the PUB did rule in CAC (MPI) 1-55 (c) that the MPI was not required to file an engagement letter at that "point in time" for the specific information requested. However, Board Order 98/143 does not state that "the Corporation is not required to produce operational information relating to the engagement of consultants and the related engagement letters".

Indeed in the same Board Order at page 122, MPI was ordered to file a copy of the Request for Proposal for the ALM Study together with the Service Agreement (unsigned) with AON Hewitt. In making its Order, the PUB cited the importance of investment income to the Corporation's revenues and importance of the investment mix to investment income. The Board's decision with regard to the service agreement for AON makes it clear that engagement letters can be relevant.

## Question:

Please file the engagement letter for the IBM assignment in this proceeding originally requested in CAC (MPI) 1-53 (a).

## Rational for Question:

Road Safety and loss prevention investments are an important factor in assisting in the mitigation of the economic and societal costs of accidents.

The question posed will provide insight into the analysis of IBM by assisting in understanding what IBM was asked to do and what it was precluded from doing in the letter of retainer. It will provide insight into the effort to be expended on the research by giving an indication of the hours spent on the project. In addition, it will provide insight into the prudence and reasonableness of the costs incurred by the Corporation by disclosing the magnitude of the expenditure.

## CAC (MPI) 2-22

| Volume: | III, AI.13, Appendix 10 <br> CAC (MPI) 1-55 a (this <br> GRA) PUB/MPI I-18 | Page No.: |
| :--- | :--- | :--- | :--- |
|  | (2015 GRA) PUB Order <br> $98 / 14, ~ p . ~ 112 ~ a n d ~ 122 . ~$ |  |
| Topic: | Loss Prevention and Road Safety |  |
| Sub Topic: | Review of MPI's Road Safety Program Model Additional <br> information and clarification |  |
| Issue: | Additional information and clarification |  |

Preamble: MPI engaged the services of Sirius Strategic Solutions Ltd. to perform a Review of MPI's Road Safety Program Model. In question 1-55 (a), CAC Manitoba asked MPI to provide a copy of Sirius' engagement letter, including costs.

MPI declined claiming that "the Corporation is not required to produce operational information relating to the engagement of consultants and the related engagement letters". It cited Board Order 98/143, p. 112 and the ruling of the Board with regard to CAC(MPI) 1-55 (c).

While MPI appears to claim that there is a blanket rule against the filing of engagement letters, this is not the case.

CAC Manitoba agrees that the PUB did rule in CAC (MPI) 1-55 (c) that the MPI was not required to file an engagement letter at that "point in time" for the specific information requested. However, Board Order 98/143 does not state that "the Corporation is not required to produce operational information relating to the engagement of consultants and the related engagement letters".

Indeed in the same Board Order at page 122, MPI was ordered to file a copy of the Request for Proposal for the ALM Study together with the Service Agreement (unsigned) with AON Hewitt. In making its Order, the PUB cited the importance of investment income to the Corporation's revenues and importance of the investment mix to investment income. The Board's decision with regard to the service agreement for AON makes it clear that engagement letters can be relevant.

## Question:

Please provide a copy of Sirius Strategic Solutions Ltd. engagement letter, including costs originally requested in CAC (MPI) 1-55 (a) of this proceeding.

## Rational for Question:

Road Safety and loss prevention investments are an important factor in assisting in the mitigation of the economic and societal costs of accidents.

The question posed will provide insight into the analysis of Sirius Strategic Solutions Ltd. by assisting in understanding what it was asked to do and what it was precluded from doing in the letter of retainer. It will provide insight into the effort to be expended on the research by giving an indication of the hours spent on the project. In addition, it will provide insight into the prudence and reasonableness of the costs incurred by the Corporation by disclosing the magnitude of the expenditure.

PUB (MPI)

## PUB (MPI) 2-1

| Volume: | PUB/MPI I-1 | Page No.: | PDF Page 4 |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: |  |  |  |
| Issue: | IT spending |  |  |

Preamble: The Corporation's Board of Directors has approved a $\$ 31.67$ million maximum for Corporate Strategic Initiatives in 2015/16.

## Question:

Please reconcile this amount with the forecasted spending on IT reflected in
Appendices 13 and 14 in the Expenses section, by project.

## Rationale for Question:

To understand how MPI is managing its approved IT spending.

## RESPONSE:

The $\$ 31.67$ million is comprised of the following:
In $(\$ 000$ 's)

| Deferred Development Costs | 21,230 |
| :--- | ---: |
| Capital Expenditures | 2,719 |
| Implementation Expenses | 7,720 |
| TOTAL | $\mathbf{3 1 , 6 6 9}$ |

The $\$ 31.67$ million amount is in corporate dollars of which only Deferred Development Costs can be reconciled to Appendix 13 and 14. Appendix 14 shows the Corporate amount of Deferred Development Costs of $\$ 21,230$ on page 40, while Appendix 13 shows the corresponding Basic portion of Deferred Development Costs on page 36 .

The Capital Expenditures ( $\$ 2,719$ ) is only partially reconcilable to Appendix 14. Appendix 14 contains only PDR related capital costs of $\$ 219$ thousand. The
remaining $\$ 2.5$ million relates to building (non IT related) costs for the PD - Centre of Excellence.

Implementation expenses $(\$ 7,720)$ as noted above are not contained in Appendix 13 or Appendix 14.

## PUB (MPI) 2-2

| Volume: | PUB/MPI I-1 | Page No.: | 1-9 |
| :--- | :--- | :--- | :--- |
| Topic: | Financial Overview |  |  |
| Sub Topic: | Financial Information |  |  |
| Issue: | Board of Directors' Meeting Minutes |  |  |

Preamble: Pages 1 to 9, which appear to be Minutes of Board of Directors Meetings or Audit Committee meetings, are undated.

## Question:

a) Please provide the date of each of the Minutes provided and identify the body referenced in the Minutes.
b) Please advise of how the dollar matching reference at item 15-090 on page 6 compares to the hybrid bucketing approach, the cash flow matching approach or the duration matching approach referenced in the Aon reports.
c) Please provide Minutes of Investment Committee meetings relative to the five items listed in PUB/MPI I-1.

## Rationale for Question:

To understand the timing of Corporate decisions that impact Basic.

## RESPONSE:

a) Please see the revised attachment which now includes the meeting minutes' dates for the Board of Directors and Audit Committee. The dates were inadvertently removed from the attachment filed with PUB (MPI) 1-1.
b) Hybrid bucketing, cash flow matching and duration matching are alternative methods of interest rate risk mitigation. Dollar matching is a related but different strategy where the market value of the assets are matched to the discounted value of the liabilities. Dollar matching refers to the quantum of assets while the interest rate mitigation strategies refer to the term/duration of the assets.

Manitoba Public Insurance (MPI) has elected to implement duration matching and dollar matching.

Having said the above, the minute contains a typographical error. The word "dollar" should have read "duration".
c) Please see the attached.

Minutes of the Four Hundred and Twenty-Fifth Meeting October 2, 2014 - Board of Directors
Page 2

Budgeting \&
Operations
Committee
Report -
Data Centre
Global
Resourcing
Option

Budgeting \&
Operations
Committee
Report -
Sybase
Contract
Approval

Moved by Mr. Paterson and seconded by Ms. Johnson that Members ratify the decision of the Budgeting \& Operations Committee approving:

- Waiver of tender for the procurement of software license support and maintenance for Sybase software; and
- A contract award to SAP Canada Inc. in the amount not to exceed \$515,000 (plus applicable taxes).


## CARRIED

Moved by Mr. Paterson and seconded by Mr. Saunders that Members ratify the decision of the Budgeting \& Operations Committee authorizing Management to enter into an agreement with IBM Canada Ltd. to implement Global Resourcing as agreed to in the Data Centre Optimization Statement of Work subject to the negotiation of satisfactory terms and conditions.

CARRIED

Ms. Kempe presented Agenda Item 4.1 "Corporate Sponsorships Cost Containment Strategy". In light of cost containment, the strategy was reviewed to reduce corporate sponsorship expenditures while still achieving the Corporation's sponsorship objectives.

Moved by Ms. Mintz and seconded by Mr. Donkervoort that the Members approve the cost containment strategy to reduce funding for corporate sponsorships by:

- except for Arts and Culture, applying a 30\% reduction to midrange sponsorships, and
- for Arts and Culture, continue the current practice of reviewing each application for opportunities to reduce total funding.

CARRIED

Minutes of the Four Hundred and Twenty-Sixth Meeting November 21, 2014 - Board of Directors Page 4

| Corporate | $14-228$ |
| :--- | ---: |
| Sponsorship |  |
| Cost |  |
| Containment |  |
| Strategy |  |
| Follow-Up |  |
|  |  |

Ms. Kempe presented Agenda Item 5.2 "Corporate Sponsorship Cost Containment Strategy Follow-Up". Following discussion Members received the report as information.

Minutes of the Four Hundred and Twenty-Seventh Meeting December 12, 2014 - Board of Directors Page 3

| Physical Damage Centre of Excellence | 14-238 | Ms. Kempe presented Agenda Item 4.2 "Physical Damage Centre of Excellence". The framework for the Physical Damage Centre of Excellence includes sustainable trades development training ( $\$ 325,500$ ), standards and estimatics ( $\$ 45,000$ annual), quality assurance (to be determined), and research and development ( $\$ 440,000$ ). Additionally, the construction of a new facility is $\$ 4.1$ million plus contingency. <br> Moved by Ms. MacKinnon and seconded by Ms. Johnson that the Members approve the proposed Physical Damage Centre of Excellence initiative with funding of $\$ 6.3$ million. <br> CARRIED |
| :---: | :---: | :---: |


| Physical | 14-239 | Ms. Kempe presented Agenda Item 5.1 "Physical Damage Re- <br> engineering Program Principles". Following discussion, Members <br> Damage Re- <br> engineering <br> Program |
| :--- | :--- | :--- |
|  | received the report as information. |  |

Minutes of the Four Hundred and Twenty-Eighth Meeting January 15/16, 2015 - Board of Directors Page 3


Investment
Committee
Report

The Board discussed the Asset Liability Management Study and indicated its support for the recommendations.

Moved by Ms. Johnson and seconded by Ms. Millis that the Members accept the report of the Investment Committee as presented.

## CARRIED

Ms. Kempe and Ms. Leppky joined the meeting.

Minutes of the Four Hundred and Twenty-Ninth Meeting February 27, 2015 - Board of Directors
Page 2

Transfer to Basic Rate Stabilization Reserve

15-042 Ms. Campbell presented Agenda Item 4.1 "Transfer to Basic Rate Stabilization Reserve".

Moved by Ms. Millis and seconded by Mr. Saunders that the Members approve the transfer of sufficient funds from the Non-Basic Retained Earnings to the Basic Rate Stabilization Reserve to meet its minimum RSR target of $\$ 213$ million based on Total Equity (subject to the exact amount transferred being approved by the Board).

CARRIED

Minutes of the Four Hundred and Thirtieth Meeting April 10, 2015 - Board of Directors
Page 5

| Investment | 15-085 | Moved by Ms. Johnson and seconded by Ms. Millis that the <br> Committee <br> Members ratify the decision of the Investment Committee <br> Report - <br> Investment |
| :--- | :--- | :--- |
| Policy  <br> authorizing Management to recommend to the Minister of Finance  <br> the Investment Policy Statement.  |  |  |
| Statement |  | CARRIED |


|  <br> CEO's | 15-089 | Mr. Guimond continued presenting Agenda 3.1 "President \& CEO's |
| :--- | :--- | :--- | :--- |
| Report <br> (Continued) |  | Report" providing a report on the following: |

2016/17
Basic
Autopac
Program \&
Rates
Mr. Johnston presented Agenda Item 4.1 "2016/17 Basic Autopac Program \& Rates". The forecast net income is $\$ 14.9$ million in 2015/16, ( $\$ 11.4$ million) in 2016/17, and $\$ 12.5$ million in 2017/18. The ALM strategy of dollar matching of fixed income and claims liabilities is to be implemented and there is to be no RSR Rebuilding Fee.

Moved by Mr. Saunders and seconded by Ms. Millis that the Members approve the application to the Public Utilities Board for an overall 0.0\% rate change for 2016/17 Basic Autopac rates.

CARRIED

Minutes of the Four Hundred and Thirty-First Meeting May 15, 2015
Page 2

President \&
CEO's
Report
15-108
Mr. Guimond presented Agenda Item 3.1 "President \& CEO's Report" providing a report on the following items:


Ms. Reichert joined the meeting to discuss cost containment.

2016/17
Basic
Autopac
Program \& Rates

Mr. Johnston presented Agenda Item 4.2 "2016/17 Basic Autopac Program \& Rates".

Moved by Ms. Johnson and seconded by Ms. MacKinnon that the Members approve:

## A. RATE CHANGES

The application to the Public Utilities Board for 2016/17 rates for the Basic Autopac Program as set out below:

1. Classification and experience rate adjustments which result in an overall $0.0 \%$ increase to average rates for Basic Autopac written premiums.
2. Rates for individual risk classifications to be adjusted based on statistically determined experience indicators.
3. Classification changes to be implemented on a revenue neutral basis.

## CARRIED

Moved by Mr. Donkervoort and seconded by Ms. Mintz that the Members approve:

## B. CLASSIFICATION CHANGES

The following classification changes to the Basic Autopac program as of March 1, 2016 for Vehicle Rating Factors:

1. Revisions to the relationship between rates and rate group (Rate Line) for passenger vehicles, light trucks, motor homes, motorcycles, heavy trucks, trailers (over $\$ 2,500$ ) and buses.
2. Adjustments to passenger vehicle and light truck rate groups based on the Canadian Loss Experience Automobile Rating (CLEAR) indicators, as provided by the Insurance Bureau of Canada (IBC). Adjustments will consist of an increase of one rate group for vehicles requiring an increase, and a decrease to the required CLEAR indicator for vehicles requiring a decrease.
3. Passenger vehicle and light truck rate group methodology changes:

- Revision of the CLEAR Collision/Comprehensive weighting from 81/19 to 83/17.

Minutes of the Four Hundred and Thirty-First Meeting May 15, 2015 - Board of Directors
Page 3

Transfer to
Basic Rate Stabilization Reserve

15-111
Ms. Kalinowsky presented Agenda Item 4.3 "Transfer to Basic Rate Stabilization Reserve".

Moved by Mr. Saunders and seconded by Ms. Millis that the Members approve the transfer of $\$ 75.5$ million, effective February 28, 2015, from Extension Retained Earnings to the Basic Rate Stabilization Reserve to meets its minimum RSR target of \$213 million based on total equity.
CARRIED

Cisco
Contract
Approval

## 



Mr. Guimond presented Agenda Item 4.6 "Cisco Contract Approval".
Moved by Ms. MacKinnon and seconded by Ms. Millis that the
4. Annual adjustment to heavy truck rate tables.
5. Motorcycle body style corrections as provided by the Insurance Bureau of Canada.

CARRIED Members approve waive of tender to allow Management to enter into a 3 year contract commencing July 2015 with Cisco Systems Canada Co. to provide support and maintenance for Cisco hardware and software in an amount not to exceed \$960,000 (plus applicable taxes) over the 3 year period.

CARRIED

## Board of Directors - Committee Meeting AUDIT COMMITTEE MINUTES

Date: May 15, 2015
Page: 3 of 6
Reichert, Ms. Campbell, and Ms. Kalinowsky rejoined the meeting.




Dynamic Capital Adequacy Test Update - Basic Autopac

Ms. Reichert presented Agenda Item C. 5 "Dynamic Capital Adequacy Test Update - Basic Autopac". Following discussion, Members received the report as information.

# Investment Committee Working Group 

May 28, 2014 at 11:30 a.m. to 1:30 p.m. MPI Large Meeting Room A

## In Attendance:

G. Bunston
C. Campbell
G. Gibson
D. Guimond
B. Hagan
L. Péloquin
H. Reichert
W. Sprenger
G. Steski
S. Wiebe

Regrets
D. Dunstone

## Meeting Minutes

1. 


2. Asset Liability Management Study RFP

The Working Group discussed the rationale for choosing Aon as the ALM consultant. The Working Group requested some edits to the assessment of the RFP vendors in the submitted document. Subject to these requested changes, the Working Group approved Aon as the ALM consultant.
3.

# Investment Committee Working Group 

September 15, 2014, 8:30 a.m. MPI Large Meeting Room A

In Attendance:

G. Bunston
C. Campbell
D. Dunstone
G. Gibson
D. Guimond
B. Hagan
H. Reichert
W. Sprenger
S. Wiebe

## Regrets

L. Péloquin
G. Steski

## Meeting Minutes

## 1. Asset Liability Management Study - Phase 1

Three Aon Representatives attended the meeting. Julianna Spiropoulos attended in person, John Myrah and Jocelyn Guerin attended via conference call. Luke Johnston, MPl's Chief Actuary, attended for the duration of the presentation.

Ms. Spiropoulos presented the Phase One Analysis of the Interest Rate Risk Hedging Strategy. The Working Group asked various questions during the hour long presentation. After the presentation was completed, the ICWG agreed to discuss this report internally at a later date.

# Investment Committee Working Group 

October 8, 2014, 10:00 a.m. MPI Large Meeting Room A

## In Attendance:

G. Bunston
D. Dunstone
D. Guimond
B. Hagan
H. Reichert
W. Sprenger
G. Steski
S. Wiebe

## Regrets

C. Campbell
L. Péloquin

## Meeting Minutes

1) ALM Study Phase 1 Discussion

The Working Group discussed the internally prepared summary of the ALM Study Phase 1 report. Luke Johnston, Chief Actuary was in attendance during the meeting. The Working Group agreed that the duration matching by buckets hybrid approach would be used as the base scenario in the ALM Phase 2 analysis. The Working Group also approved two other recommendations from the paper. First, the Working Group agreed to include the MfAD (Margin for Adverse Deviation) when hedging the liabilities. Second, the Working Group agreed to calculate the duration weighted average yield on a bond per bond basis.

The Working Group discussed the collaboration required with the Department of Finance in order to operate the new interest rate risk strategy. The Working Group also discussed benchmarking issues.
2)


## 3) ALM Study Phase 2 Discussion

The Working Group discussed the upcoming Phase 2 analysis. The Working Group agreed on three items. First, the Working Group agreed to request Aon Hewitt to provide a first draft of the asset allocation analysis. Second, all asset classes except hedge funds would be modeled in the first draft of the asset allocation analysis. Finally, the Working Group accepted the Capital Assumptions and Methodology provided in the appendix of the Phase 1 report.
4)

5)


Next Meeting - December 17, 2014

# Investment Committee Working Group 

December 17, 2014, 8:30 a.m.
MPI Large Meeting Room A
In Attendance:
G. Bunston
C. Campbell
D. Dunstone
L. Péloquin
H. Reichert
W. Sprenger
G. Steski
S. Wiebe

## Regrets

D. Guimond

## Meeting Minutes


2. ALM Study Phase 2 Report - Part A: Optimization - by phone

Two Aon Hewitt representatives presented the ALM Study Phase 2 Report Part A on Optimization. Julianna Spiropoulos attended in person and Jocelyn Guerin attended by phone. The consultant changed their recommended interest rate risk hedging strategy from a hybrid bucketing approach (from the Phase 1 report) to a perfect duration matching strategy. Aon discussed their methodology for the asset mix optimization, and the rationale for their selected portfolio allocation. The ICWG provided Aon guidance on what material to present to the Investment Committee.

After the Aon representatives left the meeting, the Working Group approved the recommendation to use perfect duration matching for the interest rate risk hedging and Aon's recommended asset mix, which consisted of $70 \%$ fixed income, $15 \%$ equities and $15 \%$ alternatives. The Working Group discussed implementing the perfect duration strategy by the end of Q2 2015/16. The Investment Department will draft an operational ALM policy for perfect

## Investment Committee Working Group

duration matching for the next ICWG meeting based on direction discussed at the meeting.

DOF provided an update on providing MUSH bond pricing and their inquiry to change the term of MUSH bonds.
3. ALM Study Phase 2 Report - Part B: Implementation Discussion

The ALM Study Phase 2 Report Part B on Implementation was provided as information. This report provided analysis and recommendations on ALM implementation topics: asset class ranges, corporate bond allocations, style investing and alternative indexing, withdrawal policies, and an Investment Policy Statement review. These topics will require discussion at later meetings, as required.




b) Asset Liability Management Policy

The draft ALM policy was presented to the ICWG. The Working Group accepted the policy. This policy will go to the Investment Committee at the April $10^{\text {th }}$ IC meeting for information.



March 9, 2015

## Board of Directors - Committee Meeting INVESTMENT COMMITTEE MINUTES

Date: October 2, 2014
Page: 2 of 3


Asset Liability Management Study - Phase 1

Mr. Bunston presented Agenda Item B. 3 "Asset Liability Management Study - Phase 1". AON has submitted an initial draft of the Phase 1 report of the interest rate risk management strategy which is under review by the Investment Committee Working Group. Following discussion, Members received the report as information.


## Board of Directors - Committee Meeting INVESTMENT COMMITTEE MINUTES

Date: January 16, 2015
Page: 2 of 3
$\square$



Asset Liability Management Study

Ms. Julianna Spiropoulos of Aon Hewitt joined the meeting to present Agenda Item B. 2 "Asset Liability Management Study". The policy considerations and risk tolerance were reviewed and the recommendations are:

1 - asset allocation of 70\% fixed income, 15\% equity, and 15\% alternatives;
2 - tighten the current duration matching strategy; and
3 - maximum allocation to illiquid asset classes, including real estate, infrastructure, and non-marketable bonds of $35 \%$ of the total portfolio.

Following discussion, Members received the report as information.

Ms. Spiropoulos withdrew from the meeting.

## Board of Directors - Committee Meeting INVESTMENT COMMITTEE MINUTES

Date: April 10, 2015
Page: 2 of 3


Investment Policy Statement

Ms. Reichert presented Agenda Item C. 1 "Investment Policy Statement". Changes were made to focus asset liability management to best match the assets and liabilities recognizing the primary concern of short term volatility. The mismatch in the changes in assets and liabilities, as a result of changes in interest rates, is expected to be minimized by defining a narrow bandwidth around the actuarially determined duration of the claims liabilities. The AON recommendation of asset allocation was adopted at 70\% fixed income, 15\% equities, and $15 \%$ alternatives.

Moved by Ms. Millis and seconded by Mr. Saunders that the Members authorize Management to recommend to the Minister of Finance the Investment Policy Statement.

## CARRIED

Asset Liability Management Policy

Mr. Bunston presented Agenda Item D. 1 "Asset Liability Management Policy". The policy defines how the duration of the liabilities and the assets will be calculated and provides guidance on the acceptable gap between assets and liabilities in terms of both duration and dollars. Following discussion, Members received the report as information.

## PUB (MPI) 2-3

| Volume: | PUB/MPI I-1 Attachment | Page No.: | 11-14 |
| :--- | :--- | :--- | :--- |
| Topic: | Asset Liability Management Study |  |  |
| Sub Topic: |  |  |  |
| Issue: | Asset Liability Management Study |  |  |

Preamble: Aon Hewitt was hired to review the Corporation's assets and liabilities and to recommend an appropriate risk management strategy. The Corporation reviewed Aon Hewitt's analysis and recommendations and relied upon them in making its decision to continue with a duration matching strategy.

As reflected on page 14, paragraph 2, Aon changed its recommended interest rate risk hedging strategy from a hybrid bucketing approach (from the Phase I report) to a perfect duration matching strategy (from the Phase II report).

## Question:

a) Please explain the rationale for the Aon consultants changing their recommendation from the Phase I hybrid bucket approach to the Phase II perfect duration matching strategy.
b) Please file copies of any draft reports provided to MPI related to the ALM Study.
c) Please file the Curriculum Vitae of each of Julianna Spiropoulos, John Myrah and Jocelyn Guerin of Aon.
d) Please confirm whether each of Julianna Spiropoulos, John Myrah or Jocelyn Guerin will be available to testify at the GRA hearing should the Board wish to hear their evidence.

## Rationale for Question:

To understand the implications for revenue requirement of implementing an alternative interest rate mitigation strategy.

## RESPONSE:

a) As explained in PUB (MPI) 2-35, Aon Hewitt's Phase 1 report was conducted on an asset only basis and therefore was preliminary in nature. The Phase 2 report incorporated both assets and liabilities and was the basis for the recommendation to continue using a duration matching strategy.

As shown graphically on page 34 of Aon Hewitt's Phase 2 - Part A Report and explained on page 40, the duration matching approach is superior to both the cash flow matching approach and the hybrid/bucket approach as the duration matching approach has significantly higher net income with marginally higher levels of risk. The graph on page 37 shows that it is better to select duration matching with a higher allocation to fixed income (70\%) than to select cash flow matching or the hybrid/bucket approach with a lower allocation to fixed income (60\%) as both strategies have similar net income but the duration matching strategy has less risk (under the desired state rules). With no RSR targets duration matching is even more favourable as it has higher net income than cash flow matching and the hybrid/bucket approach.
b) The drafts are the proprietary property of Aon Hewitt and are not MPI's property to produce. The recommendations contained in the reports were based upon their independent analysis of MPI's liabilities and their professional judgement.
c) The requested CV's are attached.
d) No representatives of Aon Hewitt will be available to testify at the hearing.
[John Myrah, CA, CFA] Associate Partner

## Position and Responsibilities

Based in Regina, John is an Associate Partner in the Investment Consulting practice. He is a Chartered Accountant and formerly practiced as a Chartered Insolvency Practitioner and licensed Bankruptcy Trustee. In addition to providing investment consulting services, John is a member of Aon Hewitt's Canadian Investment Thought Leadership Committee.

## Areas of Specialization

John has provided strategic investment advice, performing investment policy reviews, asset allocation studies, asset-liability studies and manager searches for a wide range of clients. John is responsible for providing our quarterly performance monitoring service and other ad hoc services to a number of the company's western clients, including public pension plans, corporate plans, insurance funds, workers compensation funds, trusts, and other special purpose funds.

## Background

John joined Aon Hewitt in August 1997. He received the CFA designation in 2000. Prior to joining Aon Hewitt, John spent 15 years with Deloitte \& Touche in their Calgary and Regina offices, working in the Financial and Special Services practice on engagements in a number of industries, including several in the oil and gas and real estate sectors.
John has presented to seminars of the Canadian Pension and Benefits Institute in Saskatchewan and Alberta, as well as to a broad range of Aon Hewitt clients at Aon Hewitt-hosted investment basics seminars.
He also has a Bachelor of Administration degree from the University of Regina.
[Julianna Spiropoulos, MBA, CFA] Associate Partner

## Position and Responsibilities

Julianna Spiropoulos is an Associate Partner in our Calgary office Financial Risk Consulting practice. Julianna is responsible for delivering asset-liability studies and asset allocation and spending policy reviews to clients based in Western Canada. She is also the Investment Consulting Market Lead for Alberta.

## Areas of Specialization

Julianna focuses on helping clients diagnose and manage their pension investment risk including asset-liability management, dynamic asset solutions, risk monitoring, liability-driven investment solutions, and delegated investment services.

## Background

Julianna joined Aon Hewitt in 2011, bringing over 17 years of pension investment and corporate treasury experience with a major integrated oil and gas company. She holds a Bachelor of Science in Actuarial Science, an MBA, and a Chartered Financial Analyst (CFA) designation.
[Jocelyn Guérin, FCIA, FSA, CFA] Senior Consultant

## Position and Responsibilities

Jocelyn Guérin is a senior consultant in the Investment Consulting Practice of Aon Hewitt's Montreal office. He plays an active role in the research and development of investment strategies and financial risk management. Specialized in asset-liability studies, he has been responsible for the development and maintenance of the asset-liabilities stochastic model since 2005.

## Areas of Specialization

Jocelyn specializes in risk management for institutional pension funds. His fields of expertise include asset/liability studies, statistical analyses and stochastic simulations.

## Background

Jocelyn joined Aon Hewitt in 2002. From 2002 to 2005, he was a member of the Retirement team. During this period, he was involved in the area of pension plan actuarial and financial valuation and acquired expertise in the projection of pension plan outcome/results. In 2005, he joined Aon Hewitt's Investment Management Unit to take up new challenges.
Before joining Aon Hewitt, Jocelyn worked for an HR consulting firm from 1999 to 2002. His main tasks included pension plan actuarial and accounting valuation of pension plans and improvement cost estimates.
Jocelyn is a Chartered Financial Analyst charterholder, a Fellow of the Society of Actuaries (2005), a Fellow of the Canadian Institute of Actuaries (2005), and he holds a Bachelor's Degree in Mathematics from the Université de Montréal (1999). He is a member of the CFA Institute, CFA Montreal, Society of Actuaries, and the Canadian Institute of Actuaries.

## PUB (MPI) 2-4

| Volume: | PUB/MPI I-2 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Basic Financial Statement |  |  |
| Sub Topic: |  |  |  |
| Issue: | Interest Rate Margin for Adverse Deviations |  |  |

## Question:

a) By way of explicit reference to the guidance available from the Canadian Institute of Actuaries (e.g., standards of practice, educational notes), please provide context for the adopted approach for deriving the investment return rate margin for adverse deviations as the low margin level of 25 basis points (described in the material filed as the "minimum risk margin") plus an assumed load for mismatch risk, timing risk and credit risk.
b) Please summarize to what extent consideration was given to the December 2009 Educational Note on Margins for Adverse Deviations for Property and Casualty Insurance in the selection of the forecasted 50 basis point investment return rate margin for adverse deviations, and provide a derivation of an indicated such margin following one of the example methodologies outlined in that educational note.
c) Please provide an outline of what is involved in a Minimum Capital Test based margin setting methodology, and indicate if and when the Corporation anticipates undertaking and reporting on its research in this regard.

## Rationale for Questions:

To understand the impact of changes in margin for adverse deviations on financial reporting.

## RESPONSE:

a) Canadian actuarial standards of practice state the following in 1740.43 and 1740.44:
1740.43 A larger margin of adverse deviation (compared to the best estimate assumption) is appropriate if
the actuary has less confidence in the best estimate assumption, an approximation with less precision is being used, the event assumed is farther in the future, the potential consequence of the event assumed is more severe, or the occurrence of the event assumed is more subject to statistical fluctuation
1740.44 A smaller margin for adverse deviation is appropriate if the opposites are true.

Further, Canadian actuarial standards of practice state the following in 2260.01, 2260.02, and 2260.05 (bold emphasis added by MPI):
2260.01 The actuary should select a margin for adverse deviation for an assumption that is at least as much as the amount defined by the low margin for adverse deviation and is not excessive.
2260.02 The range of margin for adverse deviation would be...

|  | High | Low |
| :--- | :--- | :--- |
| Investment Return Rates | 200 basis points | 25 basis points |

2260.05 A selection below the low margin for adverse deviations may be appropriate in unusual situations. For example, in a situation wherein the best estimate discount rate based on the insurer's asset portfolio is less than 0.25\% per annum, a margin for adverse deviations for investment return rates below that specified in 2260.02 may be reasonable....

Based on the above, the investment return margin used in the valuation of claim liabilities for a Canadian property casualty insurer would be a minimum of 25 basis points, except in unusual situations. Relative to a typical property and casualty insurer, the Corporation's Basic program would be expected to have more significant investment return risk simply because the duration of claims liabilities is much longer due to the PIPP program (e.g. Basic claims duration is approximately 10 years compared to less than 2 years for a typical property and casualty insurer). Based on 1740.43 and 1740.44 (shown above) and the rationale described in PUB (MPI) 1-2, it follows that the minimum investment return margin would not be appropriate for the Corporation's Basic program (i.e. an additional risk load beyond the minimum is required).
b) The Corporation provided an explanation on the rationale for the selection of the investment return margin in PUB (MPI) 1-2(a). The Corporation also indicated in this response that the margin continues to be set based on judgment.

The December 2009 Educational Note on Margins for Adverse Deviations for Property and Casualty Insurance was used as guidance in the selection of the investment return margin. On page 13 of the Educational Note there is a table listing all the considerations in the selection of a margin for investment return rates. The Corporation assessed all of these considerations in its selection of the investment return risk margin. The most important of these considerations have been described in PUB (MPI) 1-2.

As stated on page 13 of the Educational Note [bold emphasis added by MPI]:
"Two alternative formula-based approaches for deriving the margin for investment return are described below. These approaches should not be considered to be an exhaustive list of acceptable methods, but rather as examples of the types of quantitative approaches actuaries could consider when determining an explicit margin for investment returns."

In other words, the Corporation did not interpret the above wording to imply that a formula-based approach was required in the selection of the margin.

Even in the case of the formula-based approaches for deriving the margin, there is still significant judgment required. For example, take the approach described on page 14 of the Educational Note [bold emphasis added by MPI]:
iPM $=$ interest rate for discounting based on notional matching of the individual insurer's portfolio of assets to claims liabilities prior to margin for adverse deviation
iAM = interest rate for discounting after margin for adverse deviations iRFM = interest rate of risk-free bonds, which reasonably match the payout of the claim liabilities, at least measured by duration
$k=\boldsymbol{a}$ factor between 0\% and 100\% to reflect a reasonable estimate as to the percentage by which iRFM would need to be adjusted to reflect a plausible shortening of the uncertain duration of the claim liabilities due to misestimation of the payment pattern coupled with a plausible shift in the yield curve

Where:
$i A M=$ minimum(iPM, iRFM $\times(1.00-k))$
Margin for Adverse Deviation $=i P M-i A M$

In the Corporation's opinion, the above approach does not provide an improvement relative to the existing methodology for selecting the investment return margin. The selection of the factor ' $k$ ' in the above approach is highly judgmental, the approach could lead to constant and unnecessary changes in the margin, and the results give a false sense of precision in the calculation of the margin.

As an example using the above formula-based approach, assume the following inputs:
$i P M=2.92 \%$ (based on the selected discount rate without margin in the February 2015 Appointed Actuary's report)
$i A M=2.17 \%$ (removes the selected 75 basis point margin from the February 2015 Appointed Actuary's report)
iRFP $=2.37 \%$ (assumed to equal the return on Government of Canada bonds used in the February 2015 discount rate calculation)

Solving for the implied value of $k$ :
$2.17 \%=$ minimum $(2.92 \%, 2.37 \% \times(1.00-k))$
$k=.0843$

To demonstrate the sensitivity of the ' $k$ ' assumption, if the value of $k$ was selected as .50, then the implied margin would equal:

$$
\begin{aligned}
& i A M=\operatorname{minimum}(2.92 \%, 2.37 \% \times .50) \\
& i A M=1.19 \%
\end{aligned}
$$

Margin for Adverse Deviation $=2.92 \%-1.19 \%=1.73 \%$
c) The Corporation has not conducted research on a Minimum Capital Test based margin selection methodology. At this time the Corporation does not intend to change its current methodology for selection of the investment return margin.

## PUB (MPI) 2-5

| Volume: | PUB/MPI I-3 | Page No.: | RSF.3, Pgs. 2-3 |
| :--- | :--- | :--- | :--- |
| Topic: | Rate Setting Framework |  |  |
| Sub Topic: | Break-Even Rates |  |  |
| Issue: | Requested Rate |  |  |

Preamble: The responses provided in the first round do not provide the requested information.

## Question:

a) In the first round response to (a), it appears to be acknowledged that the rate level adequacy of policy years 2015/16 and 2017/18 are irrelevant since they do not relate to policy year 2016/17. Despite this, the expected net income for policies issued for policy year 2016/17 is assumed as the average of the projected net income for fiscal year 2016/17 (which is affected by the rate level adequacy of policy year $2015 / 16$ ) and the projected net income for fiscal year 2017/18 (which is affected by the rate level adequacy of policy year 2017/18).

How does this approach of averaging the net income of the 2016/17 and 2017/18 fiscal years account for the rate level adequacy of policy years 2015/16 and 2017/18 being different from that of policy year 2016/17, and the influence of the next GRA on fiscal year 2017/18 rate level adequacy?
b) In the first round response to (b), the requested policy year information is not provided.

Please provide a five year comparative history showing the average of two successive fiscal years and the related policy year, with respect to Total Earned Revenues and Net Claims Incurred.

## Rational for Question:

To assess the reasonableness of the Corporation's break-even metric.

## RESPONSE:

a) The Corporation restates its position (in PUB (MPI) 1-3) that "the rate level adequacy of policy years 2015/16 and 2017/18 are irrelevant since it does not relate to the expected costs associated with policy year 2016/17." The rate level for 2015/16 is used only to determine the required rate change for 2016/17. However, this is done after the required rate for 2016/17 has been determined based on an evaluation of the overall expected costs arising from policies issued for 2016/17.

The reason that the average fiscal year net incomes (for 2016/17 and 2017/18) works out to be approximately zero is because of the assumptions used in the ratemaking methodology. Per PUB (MPI) 1-3, it is assumed that the "expected costs for policies issued for policy year 2016/17... are the average of the projected costs for fiscal years 2016/17 and 2017/18." The required rate for $2016 / 17$ is then determined such that the premiums earned will be sufficient to cover these expected costs, resulting in the average fiscal year net incomes being approximately zero.
b) The Corporation cannot provide the requested policy year information. Net Claims Incurred can be provided on a fiscal year or accident year basis. However, the information is not available on a policy year basis since the Corporation does not perform any of its analysis on that basis. While data is available for paid and reported losses on a policy year basis, we do not currently have loss development factors to project such losses to ultimate. For Total Earned Revenues, the Corporation does not have Service Fees and Other Revenues on a policy year basis. Further, we would have to make assumptions about the split of fiscal year Reinsurance Ceded on a policy year basis.

The response provided in PUB (MPI) 1-3(b) shows the Corporation's assumed "policy year" figures used to determine rates by respective rating year. Specifically, we assume that "policy year" figures are the average of two successive (forecasted) fiscal year figures. We then compared these "policy year" figures to actual as requested.

## PUB (MPI) 2-6

| Volume: | PUB/MPI I-5 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Pro Formas |  |  |
| Sub Topic: | 2014/15 Financial Results |  |  |
| Issue: | Forecasting |  |  |

Preamble: The update provided in Pre-Ask 5 at the 2015 GRA reflected that if there was a reduction in interest rates of 81 basis points, claims incurred would increase by $\$ 89.9$ million while investment income would increase by $\$ 45.5$ million, for a net loss impact of $\$ 44.4$ million.

MPI attributes the changes from Pre-Ask 5 to actual as follows: higher than budgeted PIPP Claims of $\$ 84.8$ million while investment income increased to $\$ 105$ million for a net positive impact of $\$ 20.2$ million.

## Question:

a) Please explain why the changes related to interest rates as reflected in Pre-Ask 5 last year show a negative $\$ 45.5$ million impact, when a larger drop in interest rates than that reflected in Pre-Ask 5 shows a positive impact on 2014/15 actual results of $\$ 20.2$ million. Please ignore the impact of variances not related to interest rate changes and the revision to the interest rate margin.
b) Please provide a comparative summary of 2014/15 actual investment income with that forecast in Pre-Ask 5 last year and explain the differences.
c) Please provide an additional column to PUB/MPI I-5(a) Attachment (GOC 10 year bond rate forecast), comparing the difference in interest rates from October 2014 (Pre-Ask 5) with actual.
d) Please provide the referenced commentary in Volume II, Investments that relates to the comparison between the operating results in PUB I-5(b) Attachment and actual.

## Rationale for Question:

Financial Forecast accuracy is important in assessing how future updates should be assessed.

## RESPONSE:

a) The comparison shown in PUB (MPI) 1-5(b) Attachment page 2 does not fully isolate the impact of interest rates. This analysis compares one scenario to the actual results, and should not be used as the basis to analyze the interest rate hedging strategy. For example, the $\$ 84.8$ million under net claims incurred discussed in the preamble includes impacts other than interest rates.

The table below isolates the impact of interest rates with respect to gain/loss on marketable bonds and the impact on claims liabilities. This information is more appropriate to be used when analyzing the interest rate hedging strategy.

Basic Interest Rate Impact (\$000,000's)

| (in millions of dollars) | $\mathbf{2 0 1 4 / 1 5}$ <br> Pre-Ask 5 | $\mathbf{2 0 1 4 / 1 5}$ <br> Actual |
| :--- | :---: | :---: |
| Change in GoC 10 Year Bonds | $-0.04 \%$ | $-1.13 \%$ |
| Gain(loss) on Marketable Bonds | 6.2 | 84.3 |
| Impact on Claims Liabilities | 11.8 | 122.4 |
| Net Impact of Interest Rate Movements | $\mathbf{( 5 . 6 )}$ | $\mathbf{( 3 8 . 1 )}$ |

b) A comparison of investment income between 2014/15 actual and PUB (MPI) PreAsk 5 have already been provided in an attachment to PUB (MPI) 1-5(b). The attachment includes columns b and c, which represents 2014/15 Pre-Ask 5 interest rate forecast and 2014/15 actual results, respectively.
c) Please see the next page which provides the difference between actual interest rates and the interest rates forecasted at October 2014.

| Calendar Year | Calendar Quarter | Applied to MPI Fiscal Quarter | BMO NB <br> July 2015 | $\begin{aligned} & \text { CIBC } \\ & \text { July } 2015 \end{aligned}$ | Global July 2015 | $\begin{aligned} & \text { RBC } \\ & \text { July } 2015 \end{aligned}$ | $\begin{gathered} \text { Scotia } \\ \text { June } 2015 \end{gathered}$ | $\begin{gathered} \text { TD } \\ \text { July } 2015 \\ \hline \end{gathered}$ | July 2015 <br> Forecast | March <br> 2015 <br> Forecast <br> (Used in <br> 2016 GRA) | Difference | Actual | October 2014 Standard (Average) | March 2014 Standard (Used in 2015 GRA) | Difference | $\begin{gathered} \text { BMO } \\ \text { NB } \\ \text { August } \\ \text { 2015 } \end{gathered}$ | CIBC <br> August <br> 2015 | Global <br> August <br> 2015 | RBC August 2015 | Scotia July 2015 | $\begin{gathered} \text { TD } \\ \text { July } \\ 2015 \\ \hline \end{gathered}$ | August <br> 2015 <br> Forecast <br> (*) | October 2014 Standard (Average) | Actual- <br> October <br> 2014 <br> Forecast |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2014 | Q1 | Q1 2014/15 |  |  |  |  |  |  |  |  |  | 2.25\% | 2.25\% | 2.62\% | -0.37\% |  |  |  |  |  |  |  | 2.25\% | 0.00\% |
|  | Q2 | Q2 2014/15 |  |  |  |  |  |  |  |  |  | 2.00\% | 2.00\% | 2.81\% | -0.81\% |  |  |  |  |  |  |  | 2.00\% | 0.00\% |
|  | Q3 | Q3 2014/15 |  |  |  |  |  |  |  |  |  | 1.86\% | 2.17\% | 2.98\% | -0.81\% |  |  |  |  |  |  |  | 2.17\% | -0.31\% |
|  | Q4 | Q4 2014/15 |  |  |  |  |  |  |  |  |  | 1.30\% | 2.39\% | 3.14\% | -0.74\% |  |  |  |  |  |  |  | 2.39\% | -1.09\% |
| 2015 | Q1 | Q1 2015/16 |  |  |  |  |  |  | 1.62\% | 1.47\% | 0.15\% | 1.62\% | 2.25\% | 2.62\% | -0.37\% |  |  |  |  |  |  | 1.62\% | 2.25\% | -0.63\% |
|  | Q2 | Q2 2015/16 | 1.64\% | 1.75\% | 1.68\% | 1.68\% | 1.80\% | 1.77\% | 1.72\% | 1.70\% | 0.02\% |  | 2.00\% | 2.81\% | -0.81\% |  |  |  |  |  |  | 1.40\% | 2.00\% |  |
|  | Q3 | Q3 2015/16 | 1.67\% | 1.90\% | 1.85\% | 1.80\% | 1.90\% | 1.90\% | 1.84\% | 1.87\% | -0.03\% |  | 1.55\% | 2.98\% | -1.43\% | 1.60\% | 1.50\% | 1.86\% | 1.80\% | 1.65\% | 1.70\% | 1.69\% | 1.55\% |  |
|  | Q4 | Q4 2015/16 | 1.79\% | 2.10\% | 2.02\% | 2.10\% | 1.95\% | 1.95\% | 1.99\% | 2.04\% | -0.06\% |  | 1.66\% | 3.14\% | -1.48\% | 1.77\% | 2.00\% | 2.02\% | 2.10\% | 1.95\% | 1.85\% | 1.95\% | 1.66\% |  |
| 2016 | Q1 | Q1 2016/17 | 1.90\% | 2.00\% | 2.24\% | 2.30\% | 2.15\% | 2.05\% | 2.11\% | 2.21\% | -0.11\% |  | 1.79\% | 3.28\% | -1.49\% | 1.90\% | 1.95\% | 2.24\% | 2.30\% | 2.15\% | 2.00\% | 2.09\% | 1.79\% |  |
|  | Q2 | Q2 2016/17 | 1.98\% | 2.15\% | 2.46\% | 2.50\% | 2.25\% | 2.20\% | 2.26\% | 2.40\% | -0.15\% |  | 1.91\% | 3.42\% | -1.51\% | 1.98\% | 2.05\% | 2.46\% | 2.50\% | 2.25\% | 2.15\% | 2.23\% | 1.91\% |  |
|  | Q3 | Q3 2016/17 | 2.07\% | 2.55\% | 2.62\% | 2.70\% | 2.35\% | 2.30\% | 2.43\% | 2.57\% | -0.14\% |  | 2.04\% | 3.57\% | -1.54\% | 2.07\% | 2.45\% | 2.62\% | 2.70\% | 2.35\% | 2.25\% | 2.41\% | 2.04\% |  |
|  | Q4 | Q4 2016/17 | 2.17\% | 2.65\% | 2.76\% | 2.90\% | 2.45\% | 2.40\% | 2.56\% | 2.70\% | -0.14\% |  | 2.14\% | 3.71\% | -1.57\% | 2.17\% | 2.55\% | 2.76\% | 2.90\% | 2.45\% | 2.40\% | 2.54\% | 2.14\% |  |
| 2017 | Q1 | Q1 2017/18 |  |  | 2.92\% |  |  |  | 2.92\% | 3.22\% | -0.30\% |  | 1.95\% | 3.70\% | -1.76\% |  |  | 2.92\% |  |  |  | 2.92\% | 1.95\% |  |
|  | Q2 | Q2 2017/18 |  |  | 3.17\% |  |  |  | 3.17\% | 3.41\% | -0.24\% |  | 2.11\% | 3.83\% | -1.72\% |  |  | 3.11\% |  |  |  | 3.11\% | 2.11\% |  |
|  | Q3 | Q3 2017/18 |  |  | 3.33\% |  |  |  | 3.33\% | 3.52\% | -0.19\% |  | 2.22\% | 3.97\% | -1.75\% |  |  | 3.27\% |  |  |  | 3.27\% | 2.22\% |  |
|  | Q4 | Q4 2017/18 |  |  | 3.54\% |  |  |  | 3.54\% | 3.55\% | -0.01\% |  | 2.36\% | 4.12\% | -1.76\% |  |  | 3.48\% |  |  |  | 3.48\% | 2.36\% |  |
| 2018 | Q1 | Q1 2018/19 |  |  | 3.60\% |  |  |  | 3.60\% | 3.55\% | 0.05\% |  | 2.40\% | 4.32\% | -1.92\% |  |  | 3.54\% |  |  |  | 3.54\% | 2.40\% |  |
|  | Q2 | Q2 2018/19 |  |  | 3.60\% |  |  |  | 3.60\% | 3.55\% | 0.05\% |  | 2.40\% | 4.50\% | -2.10\% |  |  | 3.54\% |  |  |  | 3.54\% | 2.40\% |  |
|  | Q3 | Q3 2018/19 |  |  | 3.60\% |  |  |  | 3.60\% | 3.55\% | 0.05\% |  | 2.40\% | 4.62\% | -2.22\% |  |  | 3.54\% |  |  |  | 3.54\% | 2.40\% |  |
|  | Q4 | Q4 2018/19 |  |  | 3.60\% |  |  |  | 3.60\% | 3.55\% | 0.05\% |  | 2.40\% | 4.62\% | -2.22\% |  |  | 3.54\% |  |  |  | 3.54\% | 2.40\% |  |
| 2019 | Q1 | Q1 2019/20 |  |  | 3.60\% |  |  |  | 3.60\% | 3.55\% | 0.05\% |  | 2.40\% | 4.62\% | -2.22\% |  |  | 3.54\% |  |  |  | 3.54\% | 2.40\% |  |
|  | Q2 | Q1 2019/20 |  |  | 3.60\% |  |  |  | 3.60\% | 3.55\% | 0.05\% |  | 2.40\% | 4.62\% | -2.22\% |  |  | 3.54\% |  |  |  | 3.54\% | 2.40\% |  |
|  | Q3 | Q1 2019/20 |  |  | 3.60\% |  |  |  | 3.60\% | 3.55\% | 0.05\% |  | 2.40\% | 4.62\% | -2.22\% |  |  | 3.54\% |  |  |  | 3.54\% | 2.40\% |  |
|  | Q4 | Q1 2019/20 |  |  | 3.60\% |  |  |  | 3.60\% | 3.55\% | 0.05\% |  | 2.40\% | 4.62\% | -2.22\% |  |  | 3.54\% |  |  |  | 3.54\% | 2.40\% |  |

( ${ }^{*}$ ) Q1 2015/16 interest rate is an actual GoC 10 year bond yield at the end of MPI's fiscal quarter. Q2 2015/16 is an actual GoC 10 year bond yield as of August 18, 2015.

## Data sources dates (July Forecast):

BMO NB as of July 10, 2015 (Average of Period)
CIBC as of July 13, 2015 (Average of Period) Global Insight, July 2015
RBC as of July 8, 2015 (End of Period)
Scoiabank as of June 26, 2015 (End of Period)
TD as of June 18, 2015 (End of Period)

## Data sources dates (August Forecast)

BMO NB as of August 14, 2015 (Average of Period)
CIBC as of August 11, 2015 (Average of Period)
Global Insight, August 2015
RBC as of August 7, 2015 (End of Period)
Scotiabank as of July 30, 2015 (End of Period)
TD as of July 30, 2015 (End of Period)
d) There is no commentary in Vol II Investments that relates to the comparison between the operating results in PUB (MPI) 1-5(b) Attachment and actual. The narrative, "Detailed explanations along with commentary found in Vol II Investments" as found on PUB (MPI) 1-5(b) attachment was incorrectly included within the response.

## PUB (MPI) 2-7

| Volume: | PUB/MPI I-6 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Ratemaking |  |  |
| Sub Topic: | Major Classification Required Rates |  |  |
| Issue: | Requested Rate |  |  |

Preamble: The analysis provided in the first round response only illustrates that 5 year averages tend to be more volatile than 10 year averages for the noted exceptions.

## Question:

Please provide a comparative analysis of volatility (e.g., comparing coefficients of variation) between the experience for the noted exceptions vs. the experience for the other coverages and/or vehicle classes.

## Rationale for Question:

To assess fairness in rating.

## RESPONSE:

Refer to the attached tables. We have done the comparison of the coefficient of variation (CoVar) as follows:

- Pure premiums for Serious Losses were compared to pure premiums for Other Losses by respective major class and coverage.
- Pure premiums (for Accident Benefits - Other (Indexed) and Income Replacement Indemnity) for the Motorcycles major class were compared to the pure premiums for the Private Passenger major class by respective coverage.
- Pure premiums (for Bodily Injury and Property Damage) for the ORV's major class were compared to the pure premiums for the Private Passenger major class by respective coverage

As shown in the tables, for all comparisons, the CoVar for the test group (i.e. the group with the noted exception) is often higher than that for the control group (i.e. the group being compared to). In fact, most of the comparisons show that the CoVar is significantly higher.

## Comparison of Adjusted Pure Premium Serious Losses vs. Other Losses

| Accident Year | Private Passenger |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Serious Losses |  | Other Losses |  |
|  | Other (Indexed) | IRI | Other (Indexed) | IRI |
| 01/02 | 30.07 | 27.59 | 35.79 | 32.65 |
| 02/03 | 30.76 | 39.63 | 34.15 | 26.85 |
| 03/04 | 34.59 | 38.04 | 34.04 | 26.73 |
| 04/05 | 45.09 | 28.80 | 29.70 | 23.65 |
| 05/06 | 27.35 | 32.41 | 29.73 | 25.48 |
| 06/07 | 40.66 | 53.78 | 31.60 | 26.60 |
| 07/08 | 51.66 | 50.67 | 32.31 | 28.79 |
| 08/09 | 31.57 | 46.62 | 31.69 | 28.77 |
| 09/10 | 20.93 | 32.03 | 35.77 | 26.73 |
| 10/11 | 30.14 | 42.84 | 34.29 | 31.91 |
| 11/12 | 24.35 | 27.42 | 35.44 | 34.46 |
| 12/13 | 19.72 | 22.08 | 41.34 | 41.18 |
| 13/14 | 12.01 | 14.55 | 48.22 | 38.42 |
| 14/15 | 8.97 | 18.57 | 58.86 | 32.03 |
| All Year |  |  |  |  |
| Average | 29.13 | 33.93 | 36.64 | 30.30 |
| Standard Deviation | 11.39 | 11.44 | 7.73 | 4.90 |
| Coeefficient of Variation | 0.39 | 0.34 | 0.21 | 0.16 |
| 10 -Year 31.4 |  |  |  |  |
| Average | 26.74 | 34.10 | 37.92 | 31.44 |
| Standard Deviation | 12.13 | 13.09 | 8.70 | 4.99 |
| Coeefficient of Variation | 0.45 | 0.38 | 0.23 | 0.16 |
| 5 -Year |  |  |  |  |
| Average | 19.04 | 25.09 | 43.63 | 35.60 |
| Standard Deviation | 7.78 | 9.83 | 9.08 | 3.65 |
| Coefficient of Variation | 0.41 | 0.39 | 0.21 | 0.10 |

## Comparison of Adjusted Pure Premium Serious Losses vs. Other Losses (cont'd)

| Accident Year | Commercial |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Serious Losses |  | Other Losses |  |
|  | Other (Indexed) | IRI | Other (Indexed) | \|RI |
| 01/02 | 154.51 | 71.39 | 18.24 | 19.41 |
| 02/03 | 82.75 | 38.63 | 19.62 | 26.00 |
| 03/04 | 28.37 | 50.94 | 28.57 | 25.47 |
| 04/05 | 46.27 | 35.03 | 23.55 | 38.06 |
| 05/06 | 19.20 | 46.69 | 21.25 | 30.18 |
| 06/07 | 6.91 | 53.13 | 17.09 | 22.89 |
| 07/08 | 42.04 | 97.12 | 22.87 | 32.84 |
| 08/09 | 87.29 | 71.73 | 19.69 | 40.03 |
| 09/10 | 12.91 | 27.21 | 28.27 | 27.07 |
| 10/11 | 6.61 | 20.69 | 18.97 | 22.07 |
| 11/12 | 37.20 | 36.18 | 28.10 | 39.14 |
| 12/13 | 25.72 | 93.65 | 29.25 | 41.54 |
| 13/14 | 60.74 | 48.96 | 35.82 | 41.50 |
| 14/15 | 7.40 | 19.51 | 33.10 | 33.35 |
| All Year |  |  |  |  |
| Average | 44.14 | 50.77 | 24.60 | 31.40 |
| Standard Deviation | 39.82 | 23.79 | 5.69 | 7.45 |
| Coeefficient of Variation | 0.90 | 0.47 | 0.23 | 0.24 |
| 10-Year |  |  |  |  |
| Average | 30.60 | 51.48 | 25.44 | 33.06 |
| Standard Deviation | 25.37 | 26.64 | 6.04 | 7.05 |
| Coefficient of Variation | 0.83 | 0.52 | 0.24 | 0.21 |
| 5-Year |  |  |  |  |
| Average | 27.53 | 43.79 | 29.05 | 35.52 |
| Standard Deviation | 20.21 | 27.18 | 5.74 | 7.36 |
| Coefficient of Variation | 0.73 | 0.62 | 0.20 | 0.21 |

## Comparison of Adjusted Pure Premium Serious Losses vs. Other Losses (cont'd)

| Accident Year | Public |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Serious Losses |  | Other Losses |  |
|  | Other (Indexed) | \|RI | Other (Indexed) | \|R| |
| 01/02 | 28.96 | 19.06 | 61.37 | 33.83 |
| $02 / 03$ | 13.83 | 21.50 | 71.35 | 49.20 |
| 03/04 | 18.40 | 103.90 | 72.29 | 50.00 |
| $04 / 05$ | 1.16 | 36.27 | 64.34 | 97.25 |
| 05/06 | 24.57 | 46.44 | 71.49 | 46.01 |
| 06/07 | 4.57 | 23.11 | 56.54 | 28.81 |
| $07 / 08$ | 50.72 | 181.60 | 62.01 | 57.96 |
| 08/09 | 33.92 | 125.97 | 53.17 | 38.64 |
| 09/10 | 109.52 | 56.44 | 118.14 | 120.27 |
| 10/11 | 23.86 | 23.78 | 79.60 | 74.61 |
| 11/12 | 10.74 | 20.59 | 153.00 | 95.63 |
| 12/13 | 186.14 | 77.02 | 113.31 | 119.84 |
| 13/14 | 0.00 | 0.00 | 159.64 | 105.41 |
| 14/15 | 76.30 | 51.18 | 139.03 | 84.89 |
| All Year |  |  |  |  |
| Average | 41.62 | 56.20 | 91.09 | 71.60 |
| Standard Deviation | 49.73 | 48.53 | 36.24 | 30.95 |
| Coefficient of Variation | 1.19 | 0.86 | 0.40 | 0.43 |
| 10-Year |  |  |  |  |
| Average | 52.03 | 60.61 | 100.59 | 77.21 |
| Standard Deviation | 55.16 | 52.46 | 38.92 | 31.70 |
| Coefficient of Variation | 1.06 | 0.87 | 0.39 | 0.41 |
| 5 -Year |  |  |  |  |
| Average | 59.41 | 34.51 | 128.92 | 96.08 |
| Standard Deviation | 68.57 | 26.78 | 29.33 | 15.73 |
| Coefficient of Variation | 1.15 | 0.78 | 0.23 | 0.16 |

## Comparison of Adjusted Pure Premium Serious Losses vs. Other Losses (cont'd)

| Accident Year | Motorcycles |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Serious Losses |  | Other Losses |  |
|  | Other (Indexed) | IRI | Other (Indexed) | IRI |
| 01/02 | 101.96 | 150.80 | 58.74 | 106.75 |
| 02/03 | 47.04 | 202.79 | 50.53 | 92.51 |
| 03/04 | 43.88 | 16.96 | 79.06 | 122.78 |
| 04/05 | 10.57 | 204.68 | 43.57 | 47.40 |
| 05/06 | 88.39 | 119.59 | 50.44 | 98.97 |
| 06/07 | 422.20 | 307.10 | 77.53 | 123.38 |
| 07/08 | 106.08 | 123.07 | 75.68 | 130.36 |
| 08/09 | 33.03 | 256.82 | 64.89 | 133.88 |
| 09/10 | 52.99 | 158.84 | 83.54 | 110.18 |
| 10/11 | 246.91 | 179.33 | 123.71 | 187.71 |
| 11/12 | 41.91 | 15.72 | 73.60 | 115.29 |
| 12/13 | 1.19 | 32.43 | 87.54 | 78.42 |
| 13/14 | 134.17 | 187.54 | 135.50 | 162.46 |
| 14/15 | 42.63 | 59.84 | 99.38 | 199.43 |
| All Year |  |  |  |  |
| Average | 98.07 | 143.96 | 78.84 | 122.11 |
| Standard Deviation | 108.15 | 85.79 | 25.68 | 39.14 |
| Coefficient of Variation | 1.10 | 0.60 | 0.33 | 0.32 |
| 10-Year |  |  |  |  |
| Average | 116.95 | 144.03 | 87.18 | 134.01 |
| Standard Deviation | 121.24 | 89.28 | 24.67 | 36.52 |
| Coefficient of Variation | 1.04 | 0.62 | 0.28 | 0.27 |
| 5-Year |  |  |  |  |
| Average | 93.36 | 94.97 | 103.95 | 148.66 |
| Standard Deviation | 88.27 | 73.64 | 22.79 | 45.48 |
| Coefficient of Variation | 0.95 | 0.78 | 0.22 | 0.31 |

## Comparison of Adjusted Pure Premiums <br> Motorcycles vs. Private Passenger

| Accident Year | Other Losses |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Motorcycles |  | Private Passenger |  |
|  | Other (Indexed) | \|RI | Other (Indexed) | \|R1 |
| 01/02 | 58.74 | 106.75 | 35.79 | 32.65 |
| 02/03 | 50.53 | 92.51 | 34.15 | 26.85 |
| 03/04 | 79.06 | 122.78 | 34.04 | 26.73 |
| $04 / 05$ | 43.57 | 47.40 | 29.70 | 23.65 |
| 05/06 | 50.44 | 98.97 | 29.73 | 25.48 |
| 06/07 | 77.53 | 123.38 | 31.60 | 26.60 |
| $07 / 08$ | 75.68 | 130.36 | 32.31 | 28.79 |
| 08/09 | 64.89 | 133.88 | 31.69 | 28.77 |
| 09/10 | 83.54 | 110.18 | 35.77 | 26.73 |
| 10/11 | 123.71 | 187.71 | 34.29 | 31.91 |
| 11/12 | 73.60 | 115.29 | 35.44 | 34.46 |
| 12/13 | 87.54 | 78.42 | 41.34 | 41.18 |
| 13/14 | 135.50 | 162.46 | 48.22 | 38.42 |
| 14/15 | 99.38 | 199.43 | 58.86 | 32.03 |
| All Year |  |  |  |  |
| Average | 78.84 | 122.11 | 36.64 | 30.30 |
| Standard Deviation | 25.68 | 39.14 | 7.73 | 4.90 |
| Coefficient of Variation | 0.33 | 0.32 | 0.21 | 0.16 |
| 10-Year |  |  |  |  |
| Average | 87.18 | 134.01 | 37.92 | 31.44 |
| Standard Deviation | 24.67 | 36.52 | 8.70 | 4.99 |
| Coefficient of Variation | 0.28 | 0.27 | 0.23 | 0.16 |
| 5-Year |  |  |  |  |
| Average | 103.95 | 148.66 | 43.63 | 35.60 |
| Standard Deviation | 22.79 | 45.48 | 9.08 | 3.65 |
| Coefficient of Variation | 0.22 | 0.31 | 0.21 | 0.10 |

## Comparison of Adjusted Pure Premiums ORV vs. Private Passenger

| Accident | ORV |  | Private Passenger |  |
| :---: | :---: | :---: | :---: | :---: |
| Year | Bodily Injury | Property Damage | Bodily Injury | Property Damage |
| $01 / 02$ | 23.83 | 2.17 | 6.91 | 51.81 |
| $02 / 03$ | 19.33 | 1.45 | 5.91 | 54.08 |
| 03/04 | 3.50 | 1.70 | 5.29 | 54.70 |
| 04/05 | 5.35 | 1.31 | 7.78 | 53.23 |
| 05/06 | 8.29 | 1.89 | 5.22 | 51.32 |
| 06/07 | 8.10 | 1.65 | 4.88 | 56.10 |
| $07 / 08$ | 0.20 | 1.56 | 4.96 | 54.63 |
| 08/09 | 3.13 | 1.75 | 3.23 | 55.62 |
| 09/10 | 0.04 | 1.11 | 4.84 | 52.11 |
| 10/11 | 16.93 | 1.47 | 4.85 | 53.12 |
| 11/12 | 8.03 | 0.91 | 2.32 | 51.28 |
| 12/13 | 1.55 | 1.54 | 5.08 | 53.87 |
| 13/14 | 1.40 | 0.91 | 4.67 | 56.46 |
| 14/15 | 19.41 | 0.78 | 4.86 | 46.75 |
| All Year |  |  |  |  |
| Average | 8.51 | 1.44 | 5.06 | 53.22 |
| Standard Deviation | 7.77 | 0.39 | 1.27 | 2.42 |
| Coefficient of Variation | 0.91 | 0.27 | 0.25 | 0.05 |
| 10-Year |  |  |  |  |
| Average | 6.71 | 1.36 | 4.49 | 53.12 |
| Standard Deviation | 6.53 | 0.37 | 0.89 | 2.78 |
| Coefficient of Variation | 0.97 | 0.28 | 0.20 | 0.05 |
| 5-Year |  |  |  |  |
| Average | 9.46 | 1.12 | 4.36 | 52.29 |
| Standard Deviation | 7.54 | 0.32 | 1.03 | 3.23 |
| Coefficient of Variation | 0.80 | 0.28 | 0.24 | 0.06 |

Manitoba Public Insurance

## PUB (MPI) 2-8

| Volume: | PUB/MPI I-9 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Ratemaking |  |  |
| Sub Topic: | Special Adjustments |  |  |
| Issue: | Requested Rate |  |  |

Preamble: The first round response indicated that the current methodology uses the determined experience adjustment for the significantly larger rating category, and makes a special adjustment to the smaller rating category.

## Question:

a) Please discuss the implications of the current methodology with respect to fairness in rating for the smaller rating categories affected.
b) Please discuss the rationale for the three apparent exceptions made to the current methodology (i.e., Territory 5 rates for All Purpose Motorcycle - Sport Touring, 500 cc or less; Territory 3 rates for Pleasure Motorcycle - Sport Touring, 501 cc to 1000 cc ; and Territory 4 rates for Pleasure Motorhome).

## Rationale for Question:

To assess fairness in rating.

## RESPONSE:

a) The Corporation agrees that there are other methods of adjusting the rates to deal with the relative ranking rules, including the use of a weighted average for each "pair" of rating categories. However, the Corporation has chosen the current methodology for two reasons. First, it ensures that the rates for the least amount of vehicles will require a "special" adjustment. Also, in regards to the issue of fairness, the required rates for the largest number of vehicles are fairly determined using a consistent ratemaking methodology.
b) The Corporation will review its procedure for dealing with relative ranking rules in regards to these exceptions in the next GRA. Most of the exceptions, i.e. the 86 pleasure motorhomes in territory 4, will benefit from this in the form of lower rates.

## PUB (MPI) 2-9

| Volume: | PUB/MPI I-10 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Ratemaking |  |  |
| Sub Topic: | Exceptions |  |  |
| Issue: | Requested Rate |  |  |

## Question:

a) With respect to the noted exceptions made for Motorcycles, please discuss the implications of these adjustments with respect to fairness in rating for the rating categories affected.
b) With respect to the noted exception made for Off-Road Vehicles, please discuss how the result of the judgmental adjustment applied compares to the result of approximately restating experience prior to 1 March 2014 for the estimated impact of the increase in Basic Third Party Liability limit.

## Rationale for Question:

To assess fairness in rating.

## RESPONSE:

a) In respect of motorcycles with a Motorscooter body style and an engine displacement less than or equal to 500 cc's, and mopeds, the Corporation will review its methodology for determining the experience adjustments in the next GRA. Specifically, the Corporation will look into determining a combined experience adjustment (by respective territory) for these two classifications to maintain the synchronization of rates.

The Corporation will also review its methodology in regards to motorcycles with an engine displacement greater than 1000 cc's. The Corporation cannot just use a combined experience adjustment approach since there is evidence that the risk associated with engine displacement greater than 1000 cc's is higher than engine
displacement between 500 to 1000 cc's. The Corporation does not yet have an alternative solution to this issue.
b) The Corporation does not have sufficient claims experience to credibly determine the impact of this change in coverage. From 2001 to 2014, as of February 28, 2015, the Corporation has only paid the maximum amount on 10 claims i.e. less than one claim a year. These 10 claims are very unevenly distributed across the 14 years, with 3 claims in 2001, 2 claims each in 2002, 2010 and 2011, and 1 claim in 2014. The Corporation judgmentally decided to set the decrease at $0.00 \%$, rather than reducing the rate by $\$ 2$ per unit.

## PUB (MPI) 2-10

| Volume: | PUB/MPI I-11 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Ratemaking |  |  |
| Sub Topic: | Pure Premium Trends |  |  |
| Issue: | Forecasting Accuracy |  |  |

## Question:

Please provide a table comparing the selected pure premium trends by coverage with those selected in the two previous GRAs.

## Rationale for Question:

To assess forecasting accuracy.

## RESPONSE:

Refer to the table below.

|  | 2016 GRA | "Prior" 2016 <br> GRA [a] | 2015 GRA | 2014 GRA |
| :--- | ---: | ---: | ---: | ---: |
| Income Replacement Indemnity | $0.75 \%$ | $0.75 \%$ | $0.75 \%$ | $0.00 \%$ |
| Accident Benefits - Other (Indexed) | $0.75 \%$ | $0.75 \%$ | $1.00 \%$ | $0.75 \%$ |
| Accident Benefits - Other (Non-Indexed) | $0.00 \%$ | $0.00 \%$ | $0.75 \%$ | $1.00 \%$ |
| Bodily Injury | $0.00 \%$ | $0.00 \%$ | $0.00 \%$ | $0.00 \%$ |
| Collision | $3.75 \%$ | $2.75 \%$ | $3.00 \%$ | $2.25 \%$ |
| Comprehensive | $1.50 \%$ | $0.75 \%$ | $1.50 \%$ | $2.50 \%$ |
| Property Damage [b] | $2.25 \%$ | $1.25 \%$ | $1.50 \%$ | $0.75 \%$ |

Notes:
[a] The basis of determining the trend for Bodily Injury, Collision, Comprehensive and Property Damage was revised. In prior GRA's, the trend was based on all units. For the 2016 GRA, the trend was based only on HTA Units. (See also Volume II, Ratemaking, Page 30.) This column shows the selected trend had the basis not been revised.
[b] 2016 GRA selected based on all-year trend. Prior GRA's selected based on 10-year trend. By comparison, 2015 and 2014 based on all-year trend is $2.00 \%$ and $2.00 \%$ respectively.

## PUB (MPI) 2-11

| Volume: | PUB/MPI I-15(b) | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Value Equation |  |  |
| Sub Topic: |  |  |  |
| Issue: | New or Enhanced Basic Services |  |  |

Preamble: The Corporation has provided cost information relative to each of the new or enhanced services listed, but the Corporation has not provided information on the benefits to the Corporation of each of those services.

## Question:

a) Please advise of the benefits to the Corporation, if any, of the new or enhanced services referenced.
b) Please provide the Corporation's post-implementation report on the PIPP Mediation program, including savings attributable to the program, both to date and as forecast through the outlook period.

## Rationale for Question:

The Board must be provided with sufficient information relative to Basic services to enable the Board to consider necessity and prudence of the expenditure.

## RESPONSE:

a) With reference to the Corporation's Value Equation, the new or enhanced services described were implemented to provide value and benefits for claimants. The benefits of the enhancements to the Personal Injury Protection Plan, including the shared care residence initiative in Brandon, were designed to either provide increased financial protection for claimants against economic loss resulting from motor vehicle accidents, or, in the case of the amended regulation relating to permanent impairments, to permit faster, more efficient claims adjudication. For additional benefits related to the Brandon shared care residence, please refer to the aforementioned description in CAC (MPI) 1-17.
b) A formal post-implementation review of the PIPP Mediation Pilot Project has not been undertaken.

## PUB (MPI) 2-12

| Volume: | PUB/MPI I-17 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Compliance with Board Order 135/14 |  |  |
| Sub Topic: |  |  |  |
| Issue: | BI $^{\mathbf{3}}$ Benchmarks |  |  |

## Question:

Please provide the historical data that supports the selection of each of the $58 \%$ benchmark for Rehabilitation Management and the 43\% benchmark for Serious and Long Term Care.

## Rationale for Question:

The Board must be provided with sufficient information relative to benchmarking measures within Basic to enable the Board to consider necessity and prudence of Basic expenditures.

## RESPONSE:

These stretch benchmarks are based on Manitoba Public Insurance's (MPI) experience and a continuous claim review process that identifies claims five years and older that have potential for claims cost reduction. Opportunities for claims cost reduction include application of legislated offsets such as Canada Pension Plan Disability benefits, completing a residual capacity determination earnings and/or graduated return to work earnings. These benchmarks are internal and are used to estimate claims costs on older claims where the claimant will not return to his/her pre-accident employment. The success of these mitigation efforts are impacted by non-claim related factors such as the customer's geographic location, work history, Canada Pension Plan contributions, personal health (pre and post claim), and transferrable skills.

## PUB (MPI) 2-13

| Volume: | PUB/MPI I-18(c) | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Benchmarking |  |  |
| Sub Topic: |  |  |  |
| Issue: | Benchmarking Metrics |  |  |

Preamble: The explanation of the change in the ratio of claims expense per number of claims provides a description of the mechanics of how the calculation is determined but does not provide insight on underlying causes for the changes in claims expense.

## Question:

a) To what extent are claims expenses variable versus fixed?
b) Please explain how a change in the number of claims impacts the level of claims expenses. In particular, please explain why claims costs did not decline when the number of claims was lower.
c) Please provide a comparison of the claims expenses between 2014/15 and 2015/16, by cost element, excluding all improvement initiatives, immobilizer expenses and amortization of prior improvement initiatives, and explain the major differences.

## Rationale for Question:

To understand changes in trends that impact revenue requirement.

## RESPONSE:

a) There are very few claims expenses that are variable. The primary variable claims expense would be overtime. The majority of fixed claims expenses consist of salaries, benefits, buildings, data processing and other allocated expenses.
b) Claims costs did not decline when the number of claims were lower as the majority of claims expenses are fixed, therefore, the change in the number of claims will not impact the total claims expenses.
c) Please refer to (a) above and Vol II Expenses Appendix 1 pages 2-4.

## PUB (MPI) 2-14

| Volume: | AI.12 | Page No.: | 1-4 |
| :--- | :--- | :--- | :--- |
| Topic: | Benchmarking |  |  |
| Sub Topic: |  |  |  |
| Issue: | Staffing Levels - Metric 1.1.3 |  |  |

## Question:

a) Please provide a separate table and extend MPI's trend analysis to include Metric 1.1.3 (FTEs per $\$ 100$ million of GPW) for 2014/15, and forecast for 2015/16 and 2016/17 and provide commentary on the trend.
b) Please provide all supporting calculations for the determination of this ratio for all years in (a).

## Rationale for Question:

To understand changes in trends that impact revenue requirement.

## RESPONSE:

a) The Ward benchmarking results have not been reported to the Corporation yet for the 2014/15 year. Years 2015/16 and 2016/17 are not available since the Ward benchmarking process does not involve future forecasting of any metrics.
b) See above.

## PUB (MPI) 2-15

| Volume: | PUB/MPI I-19 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Benchmarking Metrics |  |  |
| Sub Topic: |  |  |  |
| Issue: | Benchmarking Metrics |  |  |

## Question:

a) Please provide the metrics developed for Physical Damage and the Contact Centre and explain how the metrics have been used for controlling costs.
b) Please provide a comparison of the metrics relative to actual results for the past fiscal year and current year to date, and provide an interpretation of the results.

## Rationale for Question:

To understand changes in trends that impact revenue requirement.

## RESPONSE:

a) This information request references PUB (MPI) 1-19 from the first round of information requests. In that response, we referred to productivity metrics, both in the Physical Damage (Service Centre Operations) area as well as the Contact Centre Operations. These metrics shown below provide information at the employee level, identifying areas of the respective operations where individuals may or may not be performing at the expected level of output, both in terms of productivity and in quality.

This information has enabled us to hold individuals accountable for working at optimal levels, and has resulted in Manitoba Public Insurance (MPI) being able to absorb periodic increases in demand with little to no increase in manpower/cost.

| SCO Metrics |
| :--- |
| Number of estimates written per estimator per day / week / month |
| Number of supplements processed per estimator per day / week / month |
| Number of appointments per adjuster per day / week / month |
| Number of Total Loss Settlements per T/L Adjuster per day / week / month |
| \% Error Rate Front Counter |
| Contact Centre Metrics |
| Average Handle Time per agent per day / week / month |
| Call Quality Scores per agent per month |
| Occupancy |

b) The following table illustrates our average performance for these metrics in 2014/15 as well as YTD 2015. Overall, we have seen an improvement year over year in most key indicators. While the number of estimates and supplements appear to show a worsening of performance, we experienced significant overtime to manage our volume in 2014/15, so the number of estimates / supplements per day was skewed due to longer working "days." The same holds true for Total Loss Adjusting.

| SCO Metrics |  | $2014 / 15$ | 2015 YTD |
| :--- | :--- | :---: | :---: |
| Average Number of estimates written per estimator | Day | 9.9 | 9.27 |
|  | Week | 36.63 | 33.87 |
|  | Month | 125.94 | 121.17 |
| Average Number of supplements processed per estimator | Day | 10.21 | 9.53 |
|  | Week | 34.12 | 33.17 |
|  | Month | 118.15 | 113.33 |
| Average Number of appointments per adjuster | Day | 11.04 | 11.54 |
|  | Week | 47.98 | 51.28 |
|  | Month | 207.31 | 229.9 |
| Average Number of Total Loss Settlements per T/L Adjuster | Day | 4.17 | 3.62 |
|  | Week | 10.98 | 9.78 |
| \% Error Rate Front Counter | Month | 28.99 | 28.3 |
| Contact Centre Metrics |  | 8.59 | 5.6 |
| Average Handle Time per agent |  |  |  |
| Call Quality Scores |  | $8: 01$ | $7: 41$ |
| Occupancy |  | $95.70 \%$ | $95.90 \%$ |

As a result of closer attention to individual metrics, overtime has been reduced across both SCO and Contact Centre operations, the number of vehicles in our compound has been significantly reduced, resulting in quicker estimates and turnaround times, and a reduction in Loss of Use payments. As well, salvage sales have improved due to greater, quicker availability of inventory.

In the Contact Centre, attention to both Call Quality and Average Handle Time has resulted in improved performance by our Brokers. This improvement has resulted in approximately 200,000 less calls to the Contact Centre, along with a corresponding decrease in FTE required.

## PUB (MPI) 2-16

| Volume: | PUB/MPI I-21 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | IT Benchmarking |  |  |
| Sub Topic: |  |  |  |
| Issue: | IT Expenses |  |  |

Preamble: On several of the recommendations made by Gartner, MPI has indicated that it has not yet evaluated the recommendation because it has been deemed a lower priority relative to other IT risks presently being addressed.

## Question:

a) Please provide a full description of the IT risk evaluation criteria utilized by the Corporation in ranking IT spending and management effort.
b) Please provide a full listing of the IT Risks, the priority ranking, and the action plan in place to address each risk.
c) Please advise of when the Corporation intends to review and act upon each of the recommendations not yet evaluated, including recommendations $1.20,1.22$, $2.01,2.04,2.06,3.02,3.03,3.04,4.03,4.08,4.09$ and 4.10.

## Rationale for Question:

To understand how MPI manages IT risk and prioritizes Capital Spending.

## RESPONSE:

a) To clarify: In PUB (MPI) 1-21 Attachment, the comment "Deemed lower priority relative to other IT risks the Corporation is presently addressing." should be adjusted to "Deemed lower priority relative to other IT opportunities the Corporation is presently addressing." This better represents the Gartner recommendations; as a list of potential opportunities and not as a comprehensive, set of IT risks.

Gartner recommendations are selected for further evaluation based upon anticipated effort, potential return, overall level of complexity, availability of resources to perform the assessment, and the impact on approved corporate initiatives.
b) A full listing of IT risks, in priority order, with associated action plans, is not currently available. The Security Program is currently developing the framework which will facilitate this.
c) A review of these recommendations will occur in November 2015, with Gartner, and at that time recommendations will either be prioritized for review in 20162017 or rejected (resulting in removal from the list).

## PUB (MPI) 2-17

| Volume: | PUB/MPI I-21, <br> PUB/MPI I-28 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | IT Benchmarking |  |  |
| Sub Topic: |  |  |  |
| Issue: | IT Expenses |  |  |

Preamble: Recommendation 3.04 suggests that MPI should ensure a culturally appropriate future state architecture exists, that a baseline of MPI's current state exists, and that a gap analysis be performed. MPI has not yet acted on this recommendation but it is budgeting to spend $\$ 33.3$ million for the Technology Modernization Initiative.

## Question:

a) Please explain why the Corporation has not yet evaluated Recommendation 3.04.
b) Please explain why the Corporation intends to spend on IT projects without the gap analysis referenced in Recommendation 3.04.

## Rationale for Question:

To understand progress made over achievement of IT cost containment.

## RESPONSE:

a) Manitoba Public Insurance (MPI) has created our future state architecture as per the IT Strategy submitted in Volume I of the GRA. The architecture is in alignment with our team player (Vol I, ITS.1.3. page 20) culture.
b) As stated in response (a), MPI is applying a culturally appropriate model in determining its future state architecture as shared in the IT Strategy submitted in volume I of the GRA.

## PUB (MPI) 2-18

| Volume: | PUB/MPI I-22 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: |  |  |  |
| Issue: | IT Expenses |  |  |

## Question:

Please provide a schedule for the last five years reflecting a breakdown of Corporate staff and contractors working on IT.

## Rationale for Question:

To understand whether cost containment efforts extend to the delivery of IT infrastructure, a major area of costs incurred by the Corporation.

## RESPONSE:

| Year | $\mathbf{2 0 1 0 / 2 0 1 1}$ | $\mathbf{2 0 1 1 / 2 0 1 2}$ | $\mathbf{2 0 1 2 / 2 0 1 3}$ | $\mathbf{2 0 1 3 / 2 0 1 4}$ | $\mathbf{2 0 1 4 / 2 0 1 5}$ |
| :--- | ---: | ---: | ---: | ---: | ---: |
| Internal FTE | $250 *$ | 215 | 227 | 212 | 210 |
| Consultants | $106^{*}$ | 98 | 129 | 120 | 110 |
| Total | $\mathbf{3 5 6}$ | $\mathbf{3 1 3}$ | $\mathbf{3 5 6}$ | $\mathbf{3 3 2}$ | $\mathbf{3 2 0}$ |

* Budget figure used. This year represented the initial year of the Gartner Scorecarding process and hence budget figures were used rather than incomplete or partial actual amounts.


## PUB (MPI) 2-19

| Volume: | PUB/MPI I-23 (d) | Page No.: | 3 |
| :--- | :--- | :--- | :--- |
| Topic: | Cost Containment |  |  |
| Sub Topic: |  |  |  |
| Issue: | Staffing Levels |  |  |

## Question:

Please provide a table to supplement the retirement information provided in (d) including the number of employees eligible to retire in each of the last five years and the percentage of employees that have retired.

## Rationale for Question:

To understand the forecast of staffing levels through the test years and outlook.

## RESPONSE:

The supplemental table requested in PUB/MPI I-23 (d) is as follows:

| Fiscal Year | Number of <br> Retirements | Employees at Rule of 80 (and <br> minimum age of 55) at beginning of <br> fiscal year | Percentage of eligible <br> employees who retired in the <br> given fiscal year |
| :---: | :---: | :---: | :---: |
| $2010 / 11$ | 71 | 188 | $38 \%$ |
| $2011 / 12$ | 58 | 186 | $31 \%$ |
| $2012 / 13$ | 63 | 185 | $34 \%$ |
| $2013 / 14$ | 60 | 165 | $36 \%$ |
| $2014 / 15$ | 58 | 128 | $45 \%$ |
| $2015 / 16$ | $22^{1}$ | 126 | n/a |

Notes to supplemental table:

- Data inputs are from two different Human Resource Information Systems. Data from fiscal year 2010/11 to part way through 2013/14 is from Manitoba Public Insurance's (MPI) prior system and the figures may include employees on extended leave. The data from the current HRMS excludes employees on any type of leave.

[^0]- The retirement data in the table focuses on those employees who meet the 'Rule of $80^{\prime}($ age + service $=80)$ and are at least 55 years of age. Employees who meet these criteria are eligible for an unreduced pension.
- The Corporation cautions the reader not to assume that positions vacated through retirement can be eliminated from the staff complement. Every position vacated whether through retirement or otherwise is reviewed prior to filling.


## PUB (MPI) 2-20

| Volume: | PUB/MPI I-25 (a \& b) | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: |  |  |  |
| Issue: | Deferred Development Costs |  |  |

Preamble: MPI appears to be forecasting making multi - year investments in technology modernization totalling $\$ 33.3$ million.

## Question:

a) Please explain why the $\mathrm{BI}^{3}$ product cycle is only three years.
b) Please provide a full accounting of the spending and amortization on $\mathrm{BI}^{3}$ and the amortization of that project since inception.
c) Please provide the Business Charter to support the $\$ 33.3$ million provision forecast for the Technology Modernization Initiative. If not complete, please provide any supporting documentation for the proposed provision.

## Rationale for Question:

To assess the reasonableness of budgeted capital expenditures.

## RESPONSE:

a) To remain on a vendor supported version of the $\mathrm{BI}^{3}$ software, upgrades are required at specified intervals. Initially, it was anticipated that upgrades would be required every three (3) years following the completion of the current upgrade. Recently, the anticipated duration between the current upgrade and future upgrades has been determined to be four (4) years. This change has not been reflected in the 2016 General Rate Application. This change will mean that the next upgrade will happen later than currently forecasted, but because the amortization of the next upgrade was not slated to begin until 2019/20 which is after the 2016 rating years, this change will not impact 2016 rates.
b) At a Corporate level, the initial $\mathrm{BI}^{3}$ project had Deferred Development Costs totaling $\$ 22.95$ million. The initial $\mathrm{BI}^{3}$ project was completed in 2010/11 and amortization will end in 2015/16.

At a Basic level and at the time of the rate application, it was anticipated that the current $\mathrm{BI}^{3}$ upgrade project Deferred Development Costs would total \$1.95 million along with Expenses totaling $\$ 0.240$ million. The $\mathrm{BI}^{3}$ upgrade project is scheduled for completion in 2015/16 with amortization to begin in 2016/17.
c) The Business Charter is currently under development and will be provided in a future GRA when completed.

## PUB (MPI) 2-21

| Volume: | PUB/MPI I-25 (d) | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: |  |  |  |
| Issue: | Amortization Expense |  |  |

## Question:

a) Please elaborate on the tracking of the Optimized Repair Phase of PDR and how and why the tracking led to a retroactive adjustment in 2014/15.
b) Please provide the accounting entry relative to the retroactive adjustment and the corresponding impact of the transaction on revenue requirement.

## Rationale for Question:

To understand the nature of the transaction impacting amortization expense.

## RESPONSE:

a) As the PDR project was further reviewed, it was determined that some subprojects would complete and be put into production or be in use before the completion of the full project. Therefore, separate deferred development accounts were set up to account for these separate assets, including Phase $1 \& 2$ and Optimized Repair. The retroactive Deferred Development cost adjustment was to account for these assets accordingly. Thus, this was a re-distribution of deferred development costs within the overall PDR scope which required the retroactive adjustment in 2014/15.
b) The accounting entry was an adjustment between different deferred development accounts for PDR. As a result of separating these assets (subprojects) within PDR, amortization costs will be incurred earlier than initially anticipated when PDR was one asset. Please refer to Vol II Expense Appendix 13 page 37 for the expenses resulting from earlier recognition of these assets. For 2016/17, the amortization that would be expensed is approximately $\$ 2.2$ million. This has been
factored into the zero per cent rate submission for the 2016 General Rate Application.

## PUB (MPI) 2-22

| Volume: | PUB/MPI I-26 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: | Deferred Development Costs |  |  |
| Issue: | Provision for Projects |  |  |

## Question:

Please identify and provide a cost breakdown of the specific projects included within the $\$ 2.848$ million (2016/17) and $\$ 8.136$ million (2017/18) provisions for future projects.

## Rationale for Question:

To understand the reasonableness of forecast capital spending.

## RESPONSE:

Please refer to PUB (MPI) 1-26 from the 2016 GRA and PUB (MPI) 1-74(b) 2015 GRA as it relates to details for the provision and why the Corporation includes it in their annual forecasts. Anticipated projects for 2016/17 and 2017/18 have not yet been formalized.

## PER: 2015 GRA, PUB (MPI) 1-74(b) in 2015 GRA

The provision for future project expenses is a management forecast of project expenses that have yet to be formalized. The Corporation is committed to continual improvements in service and efficiency through the application of technology. As such, it is to be expected that projects will be undertaken in the future and adequate provision for these projects should be included in the forecast.

## PUB (MPI) 2-23

| Volume: | PUB/MPI I-28(b) | Page No.: | 3 |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: |  |  |  |
| Issue: | Physical Damage Re-Engineering |  |  |

Preamble: The revised forecast savings appears to be a reallocation among different sources of the same level of savings, which indicates additional analysis was prepared to support the total.

## Question:

a) Please explain the $\$ 1$ million or $28 \%$ reduction of process improvement internal savings.
b) Please elaborate on the adjusting process change in support of the $\$ 1$ million forecast of savings.
c) Please elaborate on the change in loss of use strategy and how the PDR will realize an additional $\$ 1.7$ million in savings.

## Rationale for Question:

Capital costs of projects impact MPI operations and revenue requirement.

## RESPONSE:

a) These savings were tied to a number of improvements on the adjusting processes leading to a potential reduction in work effort sufficient to reduce staffing levels. On closer analysis, these reductions do not eliminate the work sufficiently to actually reduce the associated adjusting staff to the levels originally projected based on the current program scope. Accordingly, PDR is now focusing more on the adjusting changes discussed in part (b) below which will generate sufficient savings in loss experience to offset the reduction above.
b) This is a system and process change to incorporate a more accurate estimate for salvage value in the calculation for determining reparability of a vehicle. The analysis shows that a more accurate estimate for salvage will lead to fewer vehicles being written off and more vehicles repaired leading to a positive impact on the loss experience for Basic. The estimate for this impact is $\$ 1$ million.
c) The new Fair Allocation Loss of Use model allows shops to manage the duration of loss of use by managing the repair cycle. By managing the cycle time for repairs, shops can reduce the amount of time loss of use will be required. The model allows Manitoba Public Insurance (MPI) to share any savings in Loss of Use with the shops providing a strong incentive for them to manage their repair durations sufficiently to generate savings for MPI and for themselves. The analysis shows that the new model (along with other improvements through PDR) will incent and enable shops to drive down cycle time sufficiently to generate this level of savings in loss of use.

## PUB (MPI) 2-24

| Volume: | PUB/MPI I-28(c) <br> Expenses, Appendix 13 | Page No.: | Pg $\mathbf{3 6}$ |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: | Capital Expenditures |  |  |
| Issue: | Physical Damage Re-Engineering |  |  |

## Question:

Please reconcile the forecast deferred development spending by year with that presented in Expenses, Appendix 13 page 36.

## Rationale for Question:

Capital costs of projects impact Basic operations and revenue requirement.

## RESPONSE:

The information contained in PUB (MPI) 1-28 is corporate costs whereas the information contained in Appendix 13 is basic costs only. To provide reasonableness of the deferred development costs the following has been provided:

Total actual corporate deferred development (2012/13 to 2014/15) costs for the 2016 GRA presented in PUB (MPI) 1-28 = \$23,173 * estimated basic allocation of 90\% = \$20.8 million.

Total actual basic deferred development (2012/13 to 2014/15) costs for the 2016 GRA presented in Appendix 13, page 36 = $\mathbf{\$ 2 0 . 8}$ million.

## PUB (MPI) 2-25

| Volume: | PUB/MPI I-30 <br> Attachment | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: |  |  |  |
| Issue: | Staffing Levels |  |  |

Preamble: MPI's forecasts of staffing levels appear to be overstated when compared to actual staffing levels in each of the last five years.

## Question:

a) Please confirm that the staffing budget provided in the analysis represents that used in establishing the rates for each of those respective years. If not, please provide a comparison of the forecast in the respective application rating year with actual.
b) Please indicate the extent to which the variance between forecast and actual is representative of payroll costs.
c) Please provide the same analysis as in PUB/MPI I-30 for total corporate staffing levels.
d) Please provide the detail of the staffing budget by category for the 1,898 FTE for 2015/16.
e) Given the actual staffing level for $2014 / 15$ was $1,874.8$, please indicate whether the forecast staffing level for 2015/16 needs to be adjusted, and if so, by how much.

## Rationale for Question:

To understand actual and forecast changes in staffing levels.

## RESPONSE:

a) Confirmed.
b) The forecasted staffing budget is higher than the last five year actual results due to the inclusion of a vacancy allowance.
c) Please refer to attachment.
d) Please refer to attachment.
e) The actual FTE counts are continually lower than forecast due to forecasted staffing levels being represented without the vacancy allowance adjustment. The vacancy allowance is however applied against the salary expenses used to prepare the 2015/16 budget. Please refer to Vol II Expenses page 17 for a 5-year historical table of actual vs. budget staffing and discussion on vacancy allowance.

CORPORATE STAFFING LEVELS

| AVERAGE ACTUAL STAFF IN 2010/2011 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CATEGORY | 2010/11 Total Staff Actuals (FTE) |  |  |  |  |  |  |
|  | Service Operations | Strategy \& Innovation | Claims Control \& Safety Ops | Finance | Management Committee \& Internal Audit | Community \& Corporate Relations | Total |
| Management | 35.9 | 38.2 | 26.0 | 11.6 | 10.0 | 20.8 | 142.4 |
| Supervisory | 68.9 | 22.6 | 22.6 | - | - | 5.7 | 119.8 |
| Technical/Professional | 276.0 | 328.2 | 169.6 | 45.2 | 9.9 | 107.3 | 936.2 |
| Clerical | 393.7 | 94.0 | 129.1 | 13.8 | 1.0 | 41.4 | 673.0 |
| Total | 774.5 | 483.0 | 347.3 | 70.6 | 20.9 | 175.2 | 1,871.4 |
| STAFFING BUDGET IN 2010/2011 |  |  |  |  |  |  |  |
|  | 2010/11 Total Budget (FTE) |  |  |  |  |  |  |
| CATEGORY | Service Operations | Business Innovations \& Insur. Ops. | Claims Ops \& Service Delivery | Finance | Management Committee \& Internal Audit | Community \& Corporate Relations | Total |
| Management | 36.0 | 44.3 | 28.0 | 13.0 | 11.0 | 22.0 | 154.3 |
| Supervisory | 68.0 | 35.2 | 20.0 | - | - | 2.0 | 125.2 |
| Technica//Professional | 278.1 | 367.7 | 173.4 | 48.0 | 9.0 | 99.9 | 976.1 |
| Clerical | 379.1 | 118.2 | 137.7 | 15.3 | 1.0 | 24.8 | 676.1 |
| Total | 761.2 | 565.4 | 359.1 | 76.3 | 21.0 | 148.7 | 1,931.7 |
| COMPARISON ACTUAL VS. BUDGET 2010/2011 |  |  |  |  |  |  |  |
| 2010/11 variance from budget to actuals (FTE) |  |  |  |  |  |  |  |
| CATEGORY | Service Operations | Business Innovations \& Insur. Ops. | Claims Ops \& Service Delivery | Finance | Management Committee \& Internal Audit |  <br> Corporate <br> Relations | Total |
| Management | (0.1) | (6.1) | (2.0) | (1.4) | (1.0) | (1.4) | (11.9) |
| Supervisory | 0.9 | (12.6) | 2.6 | - | - | 3.7 | (5.4) |
| Technical/Professional | (2.1) | (39.5) | (3.8) | (2.8) | 0.9 | 7.4 | (39.9) |
| Clerical | 14.6 | (24.2) | (8.6) | (1.5) | - | 16.6 | (3.1) |
| Total | 13.3 | (82.4) | (11.8) | (5.7) | (0.1) | 26.4 | (60.3) |

Explanation of variance: Actual FTE counts were less than budget due to active Management of vacancies to control costs. Variances within divisions represent in year reorganization.

| CORPORATE STAFFING LEVELS |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| AVERAGE ACTUAL STAFF IN 2011/2012 |  |  |  |  |  |  |  |
| CATEGORY | 2011/12 Total Staff Actuals (FTE) |  |  |  |  |  |  |
|  | Service Operations | Strategy \& Innovation | Claims Control \& Safety Ops | Finance | Management Committee \& Internal Audit |  <br> Corporate <br> Relations | Total |
| Management | 50.1 | 41.0 | 22.8 | 11.2 | 9.9 | 23.8 | 158.8 |
| Supervisory | 79.8 | 7.0 | 16.7 | - | - | 5.3 | 108.8 |
| Technical/Professional | 420.3 | 213.8 | 154.4 | 46.1 | 10.9 | 119.9 | 965.4 |
| Clerical | 463.0 | 25.2 | 100.4 | 14.8 | 1.0 | 40.9 | 645.3 |
| Total | 1,013.2 | 287.0 | 294.3 | 72.1 | 21.8 | 189.9 | 1,878.3 |
| STAFFING BUDGET IN 2011/2012 |  |  |  |  |  |  |  |
|  | 2011/12 Total Budget (FTE) |  |  |  |  |  |  |
| CATEGORY | Service Operations | Strategy \& Innovation | Claims Control \& Safety Ops | Finance | Management Committee \& Internal Audit | Community \& Corporate Relations | Total |
| Management | 50.0 | 42.0 | 25.0 | 13.0 | 10.0 | 25.0 | 165.0 |
| Supervisory | 97.0 | 8.0 | 17.0 | - | - | 6.0 | 128.0 |
| Technical/Professional | 390.7 | 267.5 | 167.1 | 48.0 | 9.0 | 117.8 | 1,000.1 |
| Clerical | 465.6 | 29.0 | 107.7 | 15.3 | 1.0 | 41.0 | 659.6 |
| Total | 1,003.3 | 346.5 | 316.8 | 76.3 | 20.0 | 189.8 | 1,952.7 |
| COMPARISON ACTUAL VS. BUDGET 2011/2012 |  |  |  |  |  |  |  |
| 2011/12 variance from budget to actuals (FTE) |  |  |  |  |  |  |  |
| CATEGORY | Service Operations | Strategy \& Innovation | Claims Control \& Safety Ops | Finance | Management Committee \& Internal Audit |  <br> Corporate <br> Relations | Total |
| Management | 0.1 | (1.0) | (2.2) | (1.8) | (0.1) | (1.2) | (6.2) |
| Supervisory | (17.2) | (1.0) | (0.3) | - | - | (0.7) | (19.2) |
| Technical/Professional | 29.6 | (53.7) | (12.7) | (1.9) | 1.9 | 2.1 | (34.7) |
| Clerical | (2.6) | (3.8) | (7.3) | (0.5) | - | (0.1) | (14.3) |
| Total | 9.9 | (59.5) | (22.5) | (4.2) | 1.8 | 1.1 | (74.4) |

Explanation of variance: Actual FTE counts were less than budget due to active Management of vacancies to control costs. In addition, within the Strategy \& Innovation division, activity that was budgeted to occur with internal staff was delayed and/or completed by the use of consultants.

CORPORATE STAFFING LEVELS

| AVERAGE ACTUAL STAFF IN 2012/2013 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2012/13 Total Staff Actuals (FTE) |  |  |  |  |  |  |
| CATEGORY | Service Operations | Strategy \& Innovation | Claims Control \& Safety Ops | Finance | Management Committee \& Internal Audit |  <br> Corporate <br> Relations | Total |
| Management | 52.4 | 39.3 | 12.0 | 12.9 | 9.3 | 29.5 | 155.4 |
| Supervisory | 81.6 | 7.8 | 7.2 | 1.0 | - | 10.2 | 107.8 |
| Technical/Professional | 457.2 | 241.6 | 79.2 | 62.8 | 11.7 | 158.7 | 1,011.2 |
| Clerical | 462.4 | 31.6 | 52.5 | 18.5 | 1.0 | 71.5 | 637.5 |
| Total | 1,053.6 | 320.2 | 150.9 | 95.2 | 22.0 | 269.9 | 1,911.8 |
| STAFFING BUDGET IN 2012/2013 |  |  |  |  |  |  |  |
| 2012/13 Total Budget (FTE) |  |  |  |  |  |  |  |
| CATEGORY | Service Operations | Strategy \& Innovation | Claims Control \& Safety Ops | Finance | Management Committee \& Internal Audit |  <br> Corporate <br> Relations | Total |
| Management | 52.0 | 39.0 | 27.0 | 12.0 | 10.0 | 25.0 | 165.0 |
| Supervisory | 93.0 | 8.0 | 16.0 | - | - | 5.0 | 122.0 |
| Technical/Professional | 406.5 | 289.3 | 164.5 | 50.0 | 10.0 | 121.8 | 1,042.1 |
| Clerical | 457.8 | 25.3 | 103.3 | 15.3 | 1.0 | 40.0 | 642.7 |
| Total | 1,009.3 | 361.6 | 310.8 | 77.3 | 21.0 | 191.8 | 1,971.8 |
| COMPARISON ACTUAL VS. BUDGET 2012/2013 |  |  |  |  |  |  |  |
| 2012/13 variance from budget to actuals (FTE) |  |  |  |  |  |  |  |
| CATEGORY | Service Operations | Strategy \& Innovation | Claims Control \& Safety Ops | Finance | Management Committee \& Internal Audit | Community \& Corporate Relations | Total |
| Management | 0.4 | 0.3 | (15.0) | 0.9 | (0.7) | 4.5 | (9.7) |
| Supervisory | (11.4) | (0.2) | (8.8) | 1.0 | - | 5.2 | (14.2) |
| Technical/Professional | 50.7 | (47.7) | (85.3) | 12.8 | 1.7 | 36.9 | (30.9) |
| Clerical | 4.6 | 6.3 | (50.8) | 3.2 | - | 31.5 | (5.2) |
| Total | 44.3 | (41.4) | (159.9) | 17.9 | 1.0 | 78.1 | (60.0) |

Explanation of variance: Actual FTE counts were less than budget due to active management of vacancies to control costs. Variances within divisions represent in year reorganization. During 2012/13 the Claims Control and Safety Operations Division was dissolved and various departments moved to mainly Service Operations and Community and Corporate Relations.

| CORPORATE STAFFING LEVELS |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| AVERAGE ACTUAL STAFF IN 2013/2014 |  |  |  |  |  |  |  |
|  | 2013/14 Total Staff Actuals (FTE) |  |  |  |  |  |  |
| CATEGORY | Service Operations | Strategy \& Innovation | Claims Control \& Safety Ops | Finance | Management Committee \& Internal Audit | Community \& Corporate Relations | Total |
| Management <br> Supervisory <br> Technical/Professional <br> Clerical | $\begin{array}{r} \hline 58.5 \\ 108.0 \\ 481.9 \\ 446.4 \end{array}$ | $\begin{array}{r} \hline 36.3 \\ 6.0 \\ 256.0 \\ 34.3 \end{array}$ | - - - - | $\begin{array}{r} \hline 16.1 \\ 1.0 \\ 82.2 \\ 28.3 \end{array}$ | $\begin{array}{r} \hline 8.1 \\ - \\ 12.1 \\ 1.0 \end{array}$ | $\begin{array}{r} \hline 36.6 \\ 12.0 \\ 181.5 \\ 99.0 \end{array}$ | $\begin{array}{r} 155.6 \\ 127.0 \\ 1,013.7 \\ 609.0 \end{array}$ |
| Total | 1,094.8 | 332.6 | - | 127.6 | 21.2 | 329.1 | 1,905.3 |
| STAFFING BUDGET IN 2013/2014 |  |  |  |  |  |  |  |
| 2013/14 Total Budget (FTE) |  |  |  |  |  |  |  |
| CATEGORY | Service Operations | Strategy \& Innovation | Claims Control \& Safety Ops | Finance | Management Committee \& Internal Audit | Community \& Corporate Relations | Total |
| Management <br> Supervisory <br> Technical/Professional <br> Clerical | $\begin{array}{r} \hline 61.0 \\ 111.0 \\ 459.9 \\ 466.6 \\ \hline \end{array}$ | $\begin{array}{r} \hline 44.0 \\ 8.0 \\ 274.7 \\ 29.3 \\ \hline \end{array}$ | - - - - | $\begin{array}{r} 16.0 \\ 3.0 \\ 84.5 \\ 26.3 \\ \hline \end{array}$ | $\begin{array}{r} 10.0 \\ - \\ 10.0 \\ 1.0 \\ \hline \end{array}$ | $\begin{array}{r} \hline 33.0 \\ 13.0 \\ 197.2 \\ 102.7 \end{array}$ | $\begin{array}{r} 164.0 \\ 135.0 \\ 1,026.3 \\ 625.9 \\ \hline \end{array}$ |
| Total | 1,098.5 | 356.0 | - | 129.8 | 21.0 | 345.9 | 1,951.2 |
| COMPARISON ACTUAL VS. BUDGET 2013/2014 |  |  |  |  |  |  |  |
| 2013/14 variance from budget to actuals (FTE) |  |  |  |  |  |  |  |
| CATEGORY | Service Operations | Strategy \& Innovation | Claims Control \& Safety Ops | Finance | Management Committee \& Internal Audit | Community \& Corporate Relations | Total |
| Management <br> Supervisory <br> Technical/Professional <br> Clerical | $\begin{gathered} \hline(2.5) \\ (3.0) \\ 22.0 \\ (20.2) \\ \hline \end{gathered}$ | $\begin{array}{r} \hline(7.7) \\ (2.0) \\ (18.7) \\ 5.0 \end{array}$ | - | $\begin{gathered} \hline 0.1 \\ (2.0) \\ (2.3) \\ 2.0 \\ \hline \end{gathered}$ | (1.9) - 2.1 | $\begin{array}{r} \hline 3.6 \\ (1.0) \\ (15.7) \\ (3.7) \end{array}$ | $\begin{array}{r} \hline(8.4) \\ (8.0) \\ (12.6) \\ (16.9) \end{array}$ |
| Total | (3.7) | (23.4) | - | (2.2) | 0.2 | (16.8) | (45.9) |

Explanation of variance: Actual FTE counts were less than budget due to active management of vacancies to control costs and less use of internal staff.

CORPORATE STAFFING LEVELS

| AVERAGE ACTUAL STAFF IN 2014/2015 |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CATEGORY | 2014/15 Total Staff Actuals (FTE) |  |  |  |  |  |  |  |
|  | Customer Service | Business Development \& Communication | Human Resources | Finance | Management, Internal Audit \& Regulatory | General Counsel | $I T \& B T$ | Total |
| Management | 61.9 | 29.7 | 6.1 | 23.7 | 13.4 | 2.0 | 27.2 | 164.0 |
| Supervisory | 125.9 | 6.7 | - | 1.0 | - | 1.0 | 5.6 | 140.2 |
| Technical/Professional | 505.2 | 126.0 | 33.6 | 92.7 | 9.5 | 19.2 | 213.6 | 999.8 |
| Clerical | 478.6 | 44.1 | - | 35.0 | 1.0 | 6.9 | 15.8 | 581.4 |
| Total | 1,171.6 | 206.5 | 39.7 | 152.4 | 23.9 | 29.1 | 262.2 | 1,885.4 |
| STAFFING BUDGET IN 2014/2015 |  |  |  |  |  |  |  |  |
|  | 2014/15 Total Budget (FTE) |  |  |  |  |  |  |  |
| CATEGORY | Customer Service | Business Development \& Communication | Human Resources | Finance | Management, Internal Audit \& Regulatory | General Counsel | $I T \& B T$ | Total |
| Management | 64.0 | 32.0 | 6.0 | 24.0 | 10.0 | 2.0 | 32.0 | 169.0 |
| Supervisory | 120.0 | 8.0 | - | 1.0 | - | 1.0 | 3.0 | 133.0 |
| Technical/Professional | 506.4 | 123.0 | 35.4 | 93.0 | 10.0 | 18.8 | 245.7 | 1,032.9 |
| Clerical | 498.0 | 49.6 | 3.0 | 37.8 | 1.0 | 6.0 | 13.5 | 609.3 |
| Total | 1,188.4 | 212.6 | 44.4 | 155.8 | 21.0 | 27.8 | 294.2 | 1,944.2 |


| COMPARISON ACTUAL VS. BUDGET 2014/2015 |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2014/15 variance from budget to actuals (FTE) |  |  |  |  |  |  |  |
| CATEGORY | Customer Service | Business Development \& Communication | Human Resources | Finance | Management, Internal Audit \& Regulatory | General Counsel | $I T \& B T$ | Total |
| Management | (2.1) | (2.3) | 0.1 | (0.3) | 3.4 | - | (4.8) | (5.0) |
| Supervisory | 5.9 | (1.3) | - | - | - | - | 2.6 | 7.2 |
| Technical/Professional | (1.2) | 3.0 | (1.8) | (0.3) | (0.5) | 0.4 | (32.1) | (33.1) |
| Clerical | (19.4) | (5.5) | (3.0) | (2.8) | - | 0.9 | 2.3 | (27.9) |
| Total | (16.8) | (6.1) | (4.7) | (3.4) | 2.9 | 1.3 | (32.0) | (58.8) |

[^1]NORMAL OPERATIONS STAFFING LEVELS

| STAFFING BUDGET IN 2015/2016 |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2015/16 Total Budget (FTE) |  |  |  |  |  |  |  |
| CATEGORY | Customer Service | Business <br>  <br> Communications | Human Resources | Finance | Management, Internal Audit \& Regulatory | General Counsel | $I T \& B T$ | Total |
| Management | 62.0 | 27.0 | 6.0 | 23.0 | 10.0 | 2.0 | 31.0 | 161.0 |
| Supervisory | 118.0 | 9.0 | - | 1.0 | - | 1.0 | 3.0 | 132.0 |
| Technical/Professional | 484.4 | 145.0 | 35.4 | 95.0 | 10.0 | 18.8 | 224.2 | 1,012.8 |
| Clerical | 477.7 | 55.9 | 3.0 | 37.8 | 1.0 | 4.0 | 13.5 | 592.9 |
| Total | 1,142.1 | 236.9 | 44.4 | 156.8 | 21.0 | 25.8 | 271.7 | 1,898.7 |


| IMPROVEMENT INITIATIVE STAFFING LEVELS |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CATEGORY | 2015/16 Total Budget (FTE) |  |  |  |  |  |  |  |
|  | Customer Service | Business Development \& Communications | Human Resources | Finance | Management, Internal Audit \& Regulatory | General Counsel | $I T \& B T$ | Total |
| Management | - | - | - | - | - | - | - | - |
| Supervisory | - | - | - | - | - | - | - | - |
| Technical/Professional | - | - | - | - | - | - | 12.5 | 12.5 |
| Clerical | - | - | - | - | - | - | - | - |
| Total | - | - | - | - | - | - | 12.5 | 12.5 |
| CORPORATE STAFFING LEVELS |  |  |  |  |  |  |  |  |
| 2015/16 Total Budget (FTE) |  |  |  |  |  |  |  |  |
| CATEGORY | Customer Service | Business Development \& Communications | Human Resources | Finance | Management, Internal Audit \& Regulatory | General Counsel | $I T \& B T$ | Total |
| Management | 62.0 | 27.0 | 6.0 | 23.0 | 10.0 | 2.0 | 31.0 | 161.0 |
| Supervisory | 118.0 | 9.0 | - | 1.0 | - | 1.0 | 3.0 | 132.0 |
| Technical/Professional | 484.4 | 145.0 | 35.4 | 95.0 | 10.0 | 18.8 | 236.7 | 1,025.3 |
| Clerical | 477.7 | 55.9 | 3.0 | 37.8 | 1.0 | 4.0 | 13.5 | 592.9 |
| Total | 1,142.1 | 236.9 | 44.4 | 156.8 | 21.0 | 25.8 | 284.2 | 1,911.2 |

## PUB (MPI) 2-26

| Volume: | PUB/MPI I-31, I-32 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Expenses |  |  |
| Sub Topic: |  |  |  |
| Issue: | Vacancy Allowance |  |  |

## Question:

a) Please expand the table in PUB/MPI I-31(b) to indicate the detail of the vacancy allowance determination in each of the years, including the total wages, the percentage of total wages and vacancy dollar amount for the years 2011 to 2015 and forecast for 2016 and 2017.
b) Provide the same analysis in (a) for total Corporate Expense.
c) Please indicate, with supporting calculations, how the targeted $\$ 5.981$ million vacancy allowance was determined.

## Rationale for Question:

To understand how the vacancy rate forecast and savings are incorporated in the application.

## RESPONSE:

a) Please refer to table below.

## Corporate Normal Operations

## - Budget vs. Actual Salaries and Vacancy Allowance

|  | 2011A | 2012A | 2013 A | 2014A | 2015A | 2016B | 2017F |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| Budgeted Salaries | 107,825 | 114,794 | 118,842 | 120,195 | 122,679 | 124,599 | 129,427 |
| Actual Salaries | 104,460 | 109,875 | 114,190 | 115,344 | 116,457 | 118,618 | $\mathbf{1 2 3 , 2 1 4}$ |
| Actual Vacancy <br> Allowance | 3,365 | 4,919 | 4,652 | 4,851 | 6,222 | 5,981 | 6,213 |
| Actual / Budgeted (\%) | $96.9 \%$ | $95.7 \%$ | $96.1 \%$ | $96.0 \%$ | $94.9 \%$ | $95.2 \%$ | $95.2 \%$ |

(C\$000s, except where noted)
b) Please refer to table below.

## Corporate - Budget vs. Actual Salaries and Vacancy Allowance

|  | 2011A | 2012A | 2013A | 2014A | 2015A | 2016B | 2017F |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| Budgeted Salaries | 108,725 | 116,681 | 121,209 | 121,168 | 124,809 | 125,637 | 130,096 |
| Actual Salaries | 105,243 | 110,870 | 114,876 | 116,192 | 117,224 | 119,356 | 123,883 |
| Actual Vacancy <br> Allowance | 3,482 | 5,811 | 6,333 | 4,976 | 7,585 | 6,281 | 6,213 |
| Actual / Budgeted (\%) | $96.8 \%$ | $95.0 \%$ | $94.8 \%$ | $95.9 \%$ | $93.9 \%$ | $95.0 \%$ | $95.2 \%$ |

(C\$000s, except where noted)
c) The vacancy provision of $\$ 5.981$ million in $2015 / 16$ was determined based on the budgeted amount in 2014/15. As a reduction of 30 FTE is included in the salary budget for 2015/16, a further change to the vacancy allowance as compared to 2014/15 was not applied. The Corporation continues to utilize vacancy management as a means of containing/maintaining cost.

## PUB (MPI) 2-27

| Volume: | PUB/MPI 2-21(a) 2015 <br> GRA, VoI. 2 Appendix 8 | Page No.: | 26-28 |  |
| :--- | :--- | :--- | :--- | :---: |
| Topic: | Cost Allocation Methodology |  |  |  |
| Sub Topic: |  |  |  |  |
| Issue: | Cost Allocation Methodology Changes |  |  |  |

Preamble: It appears that there have been changes in the cost allocation methodology from that presented in response to last year's PUB/MPI 2-21.

## Question:

a) Please provide a comparison with the cost allocation definitions presented last year with this year's application, and explain any changes.
b) Please explain why MPI changed the allocator for the $\mathrm{BI}^{3}$ Fineos Upgrade this year from last year, which saw a reduction in the amount allocated from $100 \%$ last year to $92.5 \%$ this year.

## Rationale for Question:

To understand changes in the cost allocation methodology.

## RESPONSE:

a) There were no changes for cost allocations for normal operations. Please see page 2 for a comparison of cost allocations for initiatives. The only change in allocation is in relation to $\mathrm{BI}^{3}$ (see below). Changes in percentage allocation does not correspond to a change in the approved method or the approved allocators; but rather reflects changes in the allocators results year over year. For example, claims incurred percentages change year over year, but the allocation method or allocator (claims incurred) has not changed.
b) Review of the benefits of the $\mathrm{BI}^{3}$ system determined that the $\mathrm{BI}^{3}$ application was similar to injury claims management - PIPP which is allocated to insurance lines of business based on Claims Incurred (Basic \& Extension).

| Initiatives | 2015 GRA |  | 2016 GRA |  |
| :---: | :---: | :---: | :---: | :---: |
| Category | Board Approved Method | Basic \% | Board Approved Method | Basic \% |
| AOL PUB Release | Insurance 100\% Operating Basic | 100\% | Insurance 100\% Operating Basic | 100\% |
| PIPP Mediation | Insurance 100\% Claims Basic | 100\% | Insurance 100\% Claims Basic | 100\% |
| Autotheft Suppression <br> High School Driver Education | Insurance based on Claims Incurred <br> (B,E\&SRE) then 100\% Road Safety/Loss Prevention | 86.30\% | Insurance based on Claims Incurred <br> (B,E\&SRE) then 100\% Road Safety/Loss Prevention | 87.7\% |
| Physical Damage Centre of Excellence |  |  | Insurance based on Claims Incurred (B,E\&SRE) then 100\% Claims | 87.7\% |
| $\mathrm{BI}^{3}$ Fineos Upgrade | Insurance 100\% Claims Basic | 100\% | Insurance based on Claims Incurred (B\&E) then 100\% Claims | 92.5\% |
| Disaster Recovery <br> EDMS Kofax Capture <br> Enterprise Data Masking <br> Enterprise Telecomm <br> HR Management System (all Phases) <br> IT Optimization <br> Legal Management <br> Ongoing Initiative costs <br> Predictive Analytics <br> Provision for Future Projects <br> PCI-DSS Compliance of Credit Card handing requirement <br> Security Strategy | Insurance and NonInsurance based on WCCCR then Insurance based on Claims Incurred (B,E\&SRE) then Claims and Operating based on FTE percentage | 79.88\% | Insurance and Non- <br> Insurance based on WCCCR then Insurance based on Claims <br> Incurred ( $B, E \& S R E$ ) then Claims and Operating based on FTE percentage | 81.36\% |
| Physical Damage Reengineering | Insurance based on Claims Incurred (Basic \& Ext) then 100\% Claims | 91.30\% | Insurance based on Claims Incurred (Basic \& Ext) then 100\% Claims | 92.50\% |

## PUB (MPI) 2-28

| Volume: | PUB/MPI I-34 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Alternate Rate Scenarios |  |  |
| Sub Topic: |  |  |  |
| Issue: | Financial Results |  |  |

Preamble: The responses provided in the first round do not provide the requested information.

## Question:

From Volume II Claims Incurred CI.8.5, it is expected that at least 2014/15 actual information shown in the Statement of Operations in (a), (b) and (c) may affected by separating out amounts related to the premium deficiency reserves. Similarly, it would appear to be possible that forecasted information in the Statements of Operations and Statements of Financial Position may be affected by separating out amounts related to the premium deficiency reserves, in general and most particularly in (c). Providing this response will assist with better understanding the interplay between rate level adequacy and the need for premium deficiency reserves in the Corporation's financial model.
a) Please provide a restated PF.1, PF. 2 and PF.3, separating out amounts related to the premium deficiency reserves.
b) Using the presentation from (a) above, please provide a restated PF.1, PF. 2 and PF. 3 with a 1.0\% rate change in 2016/17.
c) Using the presentation from (a) above, please provide a restated PF.1, PF. 2 and PF. 3 with a $-1.0 \%$ rate change in 2016/17.
d) Please provide PF.1, PF. 2 and PF. 3 indicating the rate increase required to approximately break even for 2016/17.

## Rationale for Question:

To assess the adequacy of revenue requirements at alternate rate levels.

## RESPONSE:

a) Please refer to Attachment A.
b) Please refer to Attachment B.
c) Please refer to Attachment C.
d) Please refer to Attachment D.

## Manitoba Public Insurance Multi-year - Statement of Operations

## For the Years Ended February,

Restated Financial Statements with Premium Deficiency / Reserves
(C\$ 000s, except where noted)

## BASIC <br> Motor Vehicles <br> Drivers <br> Reinsurance Ceded <br> Total Net Premiums Written

Net Premiums Earned
Motor Vehicles
Drivers
Reinsurance Ceded
Total Net Premiums Earned
Service Fees \& Other Revenues
Total Earned Revenues
Net Claims Incurred
Claims Expense
Road Safety/Loss Prevention
Total Claims Costs
Expenses
Operating
Commissions
Premium Taxes
Regulatory/Appeal
Total Expenses
a Underwriting Income (Loss)
b Investment Income
c Net Income (Loss) from Operations
d Add: Premium (Deficiency)/Reserves
e Net Income (Loss)

For the Years Ended February,

| $\underline{\text { 2015A }}$ | $\underline{\mathbf{2 0 1 6 P}}$ | $\underline{\mathbf{2 0 1 7 P}}$ | $\underline{\mathbf{2 0 1 8 P}}$ | $\underline{\text { 2019P }}$ | $\underline{\mathbf{2 0 2 0 P}}$ |
| ---: | ---: | ---: | ---: | ---: | ---: |
|  |  |  |  |  |  |
| 794,052 | 854,303 | 893,543 | 935,826 | 978,889 | $1,024,366$ |
| 44,642 | 48,269 | 51,128 | 54,021 | 56,626 | 59,164 |
| $(13,829)$ | $(12,396)$ | $(12,644)$ | $(12,897)$ | $(13,155)$ | $(13,418)$ |
| $\mathbf{8 2 4 , 8 6 5}$ | $890, \mathbf{1 7 6}$ | $\mathbf{9 3 2 , 0 2 7}$ | $\mathbf{9 7 6 , 9 5 0}$ | $\mathbf{1 , 0 2 2 , 3 6 1}$ | $\mathbf{1 , 0 7 0 , 1 1 2}$ |


| 774,785 | 828,135 | 875,453 | 916,334 | 959,037 | $1,003,401$ |
| ---: | ---: | ---: | ---: | ---: | ---: |
| 42,926 | 46,782 | 49,704 | 52,580 | 55,329 | 57,900 |
| $(13,829)$ | $(12,396)$ | $(12,644)$ | $(12,897)$ | $(13,155)$ | $(13,418)$ |
| 803,883 | 862,520 | 912,514 | 956,017 | $\mathbf{1 , 0 0 1 , 2 1 1}$ | $\mathbf{1 , 0 4 7 , 8 8 4}$ |
| 19,475 | 20,922 | 22,350 | 24,052 | 25,965 | 28,125 |
| $\mathbf{8 2 3 , 3 5 7}$ | $\mathbf{8 8 3 , 4 4 3}$ | $\mathbf{9 3 4 , 8 6 4}$ | $\mathbf{9 8 0 , 0 6 9}$ | $\mathbf{1 , 0 2 7 , 1 7 6}$ | $\mathbf{1 , 0 7 6 , 0 0 8}$ |
|  |  |  |  |  |  |
| 745,837 | 559,784 | 677,253 | 687,066 | 826,774 | 859,792 |
| 116,578 | 121,045 | 127,985 | 131,211 | 136,683 | 136,416 |
| 11,359 | 11,496 | 11,433 | 10,540 | 11,393 | 11,403 |
| $\mathbf{8 7 3 , 7 7 3}$ | $\mathbf{6 9 2 , 3 2 4}$ | $\mathbf{8 1 6 , 6 7 1}$ | $\mathbf{8 2 8 , 8 1 8}$ | $\mathbf{9 7 4 , 8 4 9}$ | $\mathbf{1 , 0 0 7 , 6 1 1}$ |


| 74,283 | 71,401 | 74,574 | 77,146 | 79,969 | 80,405 |
| ---: | ---: | ---: | ---: | ---: | ---: |
| 32,845 | 35,405 | 36,774 | 37,290 | 38,981 | 40,727 |
| 24,531 | 26,247 | 27,755 | 29,067 | 30,431 | 31,839 |
| 3,935 | 3,154 | 3,210 | 3,273 | 3,338 | 3,404 |
| $\mathbf{1 3 5 , 5 9 5}$ | $\mathbf{1 3 6 , 2 0 8}$ | $\mathbf{1 4 2 , 3 1 2}$ | $\mathbf{1 4 6 , 7 7 7}$ | $\mathbf{1 5 2 , 7 1 9}$ | $\mathbf{1 5 6 , 3 7 5}$ |
|  |  |  |  |  |  |
| $(\mathbf{1 8 6 , 0 1 1 )}$ | $\mathbf{5 4 , 9 1 1}$ | $\mathbf{( 2 4 , 1 1 9 )}$ | $\mathbf{4 , 4 7 5}$ | $\mathbf{( 1 0 0 , 3 9 2 )}$ | $\mathbf{( 8 7 , 9 7 8 )}$ |
|  |  |  |  |  |  |
| 188,451 | $(11,429)$ | 12,828 | 12,850 | 100,950 | 108,647 |
|  |  |  |  |  |  |
| $\mathbf{( 5 , 1 4 4 )}$ | $\mathbf{1 4 , 2 4 8}$ | $\mathbf{( 1 1 , 0 2 1 )}$ | $\mathbf{1 2 , 8 2 0}$ | $\mathbf{3 , 6 9 8}$ | $\mathbf{1 8 , 2 1 6}$ |
| 7,584 | 29,233 | $(271)$ | 4,505 | $(3,141)$ | 2,453 |
| $\mathbf{2 , 4 4 0}$ | $\mathbf{4 3 , 4 8 2}$ | $\mathbf{( 1 1 , 2 9 1 )}$ | $\mathbf{1 7 , 3 2 5}$ | $\mathbf{5 5 7}$ | $\mathbf{2 0 , 6 6 9}$ |
|  |  |  |  |  |  |

Note: Rounding may affect totals
$e=a+b$
$c=e-d$

Manitoba
Public Insurance

## Manitoba Public Insurance Multi-year - Statement of Financial Position

## Restated Financial Statements with Premium Deficiency / Reserves

(C\$ 000s, except where noted)
BASIC
Assets
Cash and investments
Equity investments
Investment property
Due fromother insurance companies
Accounts receivable
Prepaid expenses
Deferred policy acquisition costs
Reinsurers' share of unearned premiums
Reinsurers' share of unearned claims
Property and equipment
Deferred development costs

Liabilities
Due to other insurance companies
Accounts payable and accrued liabilites
Financing lease obligation
Unearned premiums and fees
Provision for employee current benefits
Provision for employee future benefits
Provision for unpaid claims

For the Years Ended February,

| For the Years Ended February, |  |  |  |  |  |  |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| $\mathbf{2 0 1 5 A}$ | $\underline{\mathbf{2 0 1 6 P}}$ | $\underline{\mathbf{2 0 1 7 P}}$ | $\underline{\mathbf{2 0 1 8 P}}$ | $\underline{\mathbf{2 0 1 9 P}}$ | $\underline{\mathbf{2 0 2 0 P}}$ |  |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| $1,593,442$ | $1,566,586$ | $1,553,681$ | $1,548,909$ | $1,622,604$ | $1,704,329$ |  |
| 598,842 | 618,648 | 628,856 | 637,667 | 667,162 | 699,709 |  |
| 35,073 | 35,115 | 34,934 | 33,809 | 32,416 | 31,095 |  |
| 108 | - | - | - | - | - |  |
| 273,197 | 270,333 | 282,190 | 294,535 | 306,878 | 319,832 |  |
| - | 291 | 291 | 291 | 291 | 291 |  |
| - | 15,281 | 16,139 | 21,860 | 19,958 | 23,719 |  |
| - | - | - | - | - | - |  |
| 2,565 | - | - | - | - | - |  |
| 90,474 | 87,247 | 91,067 | 91,553 | 90,273 | 88,648 |  |
| 56,992 | 66,092 | 73,175 | 81,730 | 86,029 | 97,255 |  |
| $\mathbf{2 , 6 5 0 , 6 9 3}$ | $\mathbf{2 , 6 5 9 , 5 9 2}$ | $\mathbf{2 , 6 8 0 , 3 3 1}$ | $\mathbf{2 , 7 1 0 , 3 5 3}$ | $\mathbf{2 , 8 2 5 , 6 1 0}$ | $\mathbf{2 , 9 6 4 , 8 7 7}$ |  |


| - | 1 | 1 | 1 | 1 | 1 |
| ---: | ---: | ---: | ---: | ---: | ---: |
| 34,157 | 37,993 | 39,659 | 41,394 | 43,129 | 44,950 |
| 3,224 | 2,955 | 2,892 | 2,825 | 2,753 | 2,681 |
| 426,137 | 461,757 | 484,685 | 509,301 | 534,423 | 560,937 |
| 16,240 | 16,253 | 16,880 | 17,520 | 18,175 | 18,845 |
| 286,581 | 289,816 | 303,510 | 318,434 | 334,015 | 350,309 |
| $1,671,275$ | $1,588,436$ | $1,576,050$ | $1,542,629$ | $1,605,378$ | $1,669,117$ |
| $\mathbf{2 , 4 3 7 , 6 1 4}$ | $\mathbf{2 , 3 9 7 , 2 1 2}$ | $\mathbf{2 , 4 2 3 , 6 7 7}$ | $\mathbf{2 , 4 3 2 , 1 0 3}$ | $\mathbf{2 , 5 3 7 , 8 7 3}$ | $\mathbf{2 , 6 4 6 , 8 4 0}$ |

Equity

Retained earnings
Basic Insurance Retained Earnings
Rate Stabilization Reserve
Retained Earnings
Add: Premium (Deficiency) / Reserves
Accumulated Other Comprehensive Income
Total Equity

| 165,600 | 178,300 | 186,700 | 195,700 | 204,800 | 214,300 |
| ---: | ---: | :---: | ---: | :---: | ---: |
| 12,217 | 42,999 | 23,307 | 31,633 | 23,090 | 34,260 |
| 7,584 | 29,233 | $(271)$ | 4,505 | $(3,141)$ | 2,453 |
| 35,262 | 41,082 | 46,647 | 50,918 | 59,847 | 69,478 |
| 213,079 | 262,380 | 256,655 | 278,250 | 287,737 | 318,038 |
|  |  |  |  |  |  |
| $\mathbf{2 , 6 5 0 , 6 9 3}$ | $\mathbf{2 , 6 5 9 , 5 9 2}$ | $\mathbf{2 , 6 8 0 , 3 3 1}$ | $\mathbf{2 , 7 1 0 , 3 5 3}$ | $\mathbf{2 , 8 2 5 , 6 1 0}$ | $\mathbf{2 , 9 6 4 , 8 7 7}$ |

Note: Rounding may affect totals

## Manitoba Public Insurance Multi-Year - Statement of Changes in Equity

Restated Financial Statements with Premium Deficiency / Reser ves
(C\$ 000s, except where noted)

## RATE STABILIZATION RESERVE (RSR)

Basic Insurance Rate Stabilization Reserve
Beginning Balance
Transfer from (to) Basic Retained Eamings
Ending Balance

Retained Ear nings
Beginning Balance
Net Income (Loss) from annual operations
Transfer from Extension Retained Eamings
Retained Eamings Prior to Transfers
Transfer from (to) Rate Stabilization Reserve

Balance of Fund

Total Basic Retained Earnings

Total Accumulated Other Comprehensive Income
Total Equity

| Minimum RSR based on PUB rules | 82,900 | 89,300 | 93,500 | 98,000 | 102,600 | 107,400 |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: |
| Max imum RSR based on PUB rules | 165,600 | 178,300 | 186,700 | 195,700 | 204,800 | 214,300 |
| MPI Total Equity Target | 213,000 | 213,000 | 213,000 | 213,000 | 213,000 | 213,000 |
| MPI Max Target (MCT) | 325,000 | 325,000 | 325,000 | 325,000 | 325,000 | 325,000 |

Note: Rounding may affect totals

Manitoba Public Insurance

## Manitoba Public Insurance Multi-year - Statement of Operations For the Years Ended February,

Restated Financial Statements with Premium Deficiency / Reserves and 2016/17 rate change of $+1.0 \%$
(C\$ 000s, except where noted)
BASIC
Motor Vehicles
Drivers
Reinsurance Ceded
Total Net Premiums Written
Net Premiums Earned
Motor Vehicles
Drivers
Reinsurance Ceded
Total Net Premiums Earned
Service Fees \& Other Revenues
Total Earned Revenues
Net Claims Incurred
Claims Expense
Road Safety/Loss Prevention
Total Claims Costs
Expenses
Operating
Commissions
Premium Taxes
Regulatory/Appeal
Total Expenses
a Underwriting Income (Loss)
b Investment Income
c Net Income (Loss) from Operations
d Add: Premium (Deficiency) / Reserves
e Net Income (Loss)

For the Years Ended February,

| For the Years Ended February, |  |  |  |  |  |  |
| ---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\mathbf{2 0 1 5 A}$ | $\underline{\mathbf{2 0 1 6 P}}$ | $\underline{\mathbf{2 0 1 7 P}}$ | $\underline{\mathbf{2 0 1 8 P}}$ | $\underline{\mathbf{2 0 1 9 P}}$ | $\underline{\mathbf{2 0 2 0 P}}$ |  |
| 794,052 | 854,303 | 902,526 | 945,226 | 988,715 | $1,034,641$ |  |
| 44,642 | 48,269 | 51,128 | 54,021 | 56,626 | 59,164 |  |
| $(13,829)$ | $(12,396)$ | $(12,644)$ | $(12,897)$ | $(13,155)$ | $(13,418)$ |  |
| $\mathbf{8 2 4 , 8 6 5}$ | $\mathbf{8 9 0 , 1 7 6}$ | $\mathbf{9 4 1 , 0 1 0}$ | $\mathbf{9 8 6 , 3 5 0}$ | $\mathbf{1 , 0 3 2 , 1 8 6}$ | $\mathbf{1 , 0 8 0 , 3 8 7}$ |  |


| 774,785 | 828,135 | 880,295 | 925,541 | 968,666 | $1,013,469$ |
| ---: | ---: | ---: | ---: | ---: | ---: |
| 42,926 | 46,782 | 49,704 | 52,580 | 55,329 | 57,900 |
| $(13,829)$ | $(12,396)$ | $(12,644)$ | $(12,897)$ | $(13,155)$ | $(13,418)$ |
| 803,883 | 862,520 | 917,356 | 965,225 | $\mathbf{1 , 0 1 0 , 8 4 0}$ | $\mathbf{1 , 0 5 7 , 9 5 1}$ |
| 19,475 | 20,922 | 22,350 | 24,106 | 26,023 | 28,187 |
| 823,357 | 883,443 | $\mathbf{9 3 9 , 7 0 6}$ | $\mathbf{9 8 9 , 3 3 0}$ | $\mathbf{1 , 0 3 6 , 8 6 3}$ | $\mathbf{1 , 0 8 6 , 1 3 8}$ |
| 745,837 | 559,784 | 673,318 | 686,761 | 826,310 | 859,473 |
| 116,578 | 121,045 | 127,985 | 131,209 | 136,566 | 136,413 |
| 11,359 | 11,496 | 11,433 | 10,540 | 11,382 | 11,403 |
| $\mathbf{8 7 3 , 7 7 3}$ | $\mathbf{6 9 2 , 3 2 4}$ | $\mathbf{8 1 2 , 7 3 6}$ | $\mathbf{8 2 8 , 5 1 0}$ | $\mathbf{9 7 4 , 2 5 8}$ | $\mathbf{1 , 0 0 7 , 2 8 9}$ |


| 74,283 | 71,401 | 74,574 | 77,146 | 79,896 | 80,405 |
| ---: | ---: | ---: | ---: | ---: | ---: |
| 32,845 | 35,405 | 36,900 | 37,587 | 39,292 | 41,052 |
| 24,531 | 26,247 | 27,900 | 29,344 | 30,720 | 32,141 |
| 3,935 | 3,154 | 3,210 | 3,273 | 3,337 | 3,404 |
| $\mathbf{1 3 5 , 5 9 5}$ | $\mathbf{1 3 6 , 2 0 8}$ | $\mathbf{1 4 2 , 5 8 4}$ | $\mathbf{1 4 7 , 3 5 0}$ | $\mathbf{1 5 3 , 2 4 5}$ | $\mathbf{1 5 7 , 0 0 2}$ |
|  |  |  |  |  |  |
| $\mathbf{( 1 8 6 , 0 1 1 )}$ | $\mathbf{5 4 , 9 1 1}$ | $\mathbf{( 1 5 , 6 1 4 )}$ | $\mathbf{1 3 , 4 7 0}$ | $\mathbf{( 9 0 , 6 4 0})$ | $\mathbf{( 7 8 , 1 5 3 )}$ |
| $\mathbf{1 8 8 , 4 5 1}$ | $(11,429)$ | 12,607 | 12,492 | $\mathbf{1 0 1 , 2 7 0}$ | 109,450 |
|  |  |  |  |  |  |
| $\mathbf{( 5 , 1 4 4 )}$ | $\mathbf{1 4 , 2 4 8}$ | $\mathbf{( 6 , 6 6 4 )}$ | $\mathbf{2 1 , 3 7 3}$ | $\mathbf{1 3 , 4 6 2}$ | $\mathbf{2 8 , 6 9 5}$ |
| $\mathbf{7 , 5 8 4}$ | 29,233 | 3,656 | 4,589 | $(2,832)$ | 2,602 |
| $\mathbf{2 , 4 4 0}$ | $\mathbf{4 3 , 4 8 2}$ | $\mathbf{( 3 , 0 0 7 )}$ | $\mathbf{2 5 , 9 6 2}$ | $\mathbf{1 0 , 6 3 0}$ | $\mathbf{3 1 , \mathbf { 2 9 7 }}$ |

Note: Rounding may affect totals
$e=a+b$
$\mathrm{c}=\mathrm{e}-\mathrm{d}$

## Manitoba Public Insurance Multi-year - Statement of Financial Position

Restated Financial Statements with Premium Deficiency/Reserves and 2016/17 rate change of $+1.0 \%$
(C\$ 000s, except where noted)

BASIC
Assets
Cash and investments
Equity investments
Investment property
Due from other insurance companies
Accounts receivable
Prepaid expenses
Deferred policy acquisition costs
Reinsurers' share of unearned premiums
Reinsurers' share of unearned claims
Property and equipment
Deferred development costs

Liabilities
Due to other insurance companies
Accounts payable and accrued liabilites
Financing lease obligation
Unearned premiums and fees
Provision for employee current benefits
Provision for employee future benefits
Provision for unpaid claims

Equity
Retained earnings
Basic Insurance Retained Earnings
Rate Stabilization Reserve
Retained Earnings

Accumulated Other Comprehensive Income Total Equity

Retained Eaming

For the Years Ended February,

| For the Years Ended February, |  |  |  |  |  |  |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| $\mathbf{2 0 1 5 A}$ | $\underline{\mathbf{2 0 1 6 P}}$ | $\underline{\mathbf{2 0 1 7 P}}$ | $\underline{\mathbf{2 0 1 8 P}}$ | $\underline{\mathbf{2 0 1 9 P}}$ | $\underline{\mathbf{2 0 2 0 P}}$ |  |
|  |  |  |  |  |  |  |
| $1,593,442$ | $1,566,586$ | $1,558,780$ | $1,560,844$ | $1,642,422$ | $1,732,643$ |  |
| 598,842 | 618,648 | 630,307 | 641,022 | 672,719 | 707,624 |  |
| 35,073 | 35,115 | 34,961 | 33,862 | 32,495 | 31,196 |  |
| 108 | - | - | - | - | - |  |
| 273,197 | 270,333 | 284,365 | 296,810 | 309,257 | 322,320 |  |
| - | 291 | 291 | 291 | 291 | 291 |  |
| - | 15,281 | 20,324 | 26,141 | 24,560 | 28,483 |  |
| - | - | - | - | - | - |  |
| 2,565 | - | - | - | - | - |  |
| 90,474 | 87,247 | 91,067 | 91,553 | 90,273 | 88,648 |  |
| 56,992 | 66,092 | 73,175 | 81,730 | 86,029 | 97,255 |  |
| $\mathbf{2 , 6 5 0 , 6 9 3}$ | $\mathbf{2 , 6 5 9 , 5 9 2}$ | $\mathbf{2 , 6 9 3 , 2 6 8}$ | $\mathbf{2 , 7 3 2 , 2 5 2}$ | $\mathbf{2 , 8 5 8 , 0 4 5}$ | $\mathbf{3 , 0 0 8 , 4 6 0}$ |  |


| - | 1 | 1 | 1 | 1 | 1 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 34,157 | 37,993 | 39,965 | 41,714 | 43,463 | 45,299 |
| 3,224 | 2,955 | 2,892 | 2,825 | 2,753 | 2,681 |
| 426,137 | 461,757 | 488,826 | 513,634 | 538,952 | 565,674 |
| 16,240 | 16,253 | 16,880 | 17,520 | 18,175 | 18,845 |
| 286,581 | 289,816 | 303,510 | 318,434 | 334,015 | 350,309 |
| $1,671,275$ | $1,588,436$ | $1,576,041$ | $1,542,399$ | $1,604,994$ | $1,668,563$ |
| $\mathbf{2 , 4 3 7 , 6 1 4}$ | $\mathbf{2 , 3 9 7 , 2 1 2}$ | $\mathbf{2 , 4 2 8 , 1 1 5}$ | $\mathbf{2 , 4 3 6 , 5 2 6}$ | $\mathbf{2 , 5 4 2 , 3 5 3}$ | $\mathbf{2 , 6 5 1 , 3 7 2}$ |


| 165,600 | 178,300 | 188,400 | 197,500 | 206,700 | 216,300 |
| ---: | ---: | ---: | ---: | ---: | ---: |
| 12,217 | 42,999 | 29,891 | 46,753 | 48,183 | 69,880 |
| 177,817 | 221,299 | 218,291 | 244,253 | 254,883 | 286,180 |
| 35,262 | 41,082 | 46,862 | 51,473 | 60,809 | 70,907 |
| 213,079 | 262,380 | 265,153 | 295,726 | 315,692 | 357,088 |
|  |  |  |  |  |  |
| $\mathbf{2 , 6 5 0 , 6 9 3}$ | $\mathbf{2 , 6 5 9 , 5 9 2}$ | $\mathbf{2 , 6 9 3 , 2 6 8}$ | $\mathbf{2 , 7 3 2 , 2 5 2}$ | $\mathbf{2 , 8 5 8 , 0 4 5}$ | $\mathbf{3 , 0 0 8 , 4 6 0}$ |

Manitoba
Public Insurance

## Manitoba Public Insurance Multi-Year - Statement of Changes in Equity

Restated Financial Statements with Premium Deficiency/Reserves and 2016/17 rate change of $+1.0 \%$
(C\$ 000s, except where noted)

## RATE STABILIZATION RESERVE (RSR)

Basic Insur ance Rate Stabilization Reserve
Beginning Balance
Transfer from (to) Basic Retained Eamings
Ending Balance

Red Earnings
Beginning Balance
Net Income (Loss) from annual operations
Transfer from Ex tension Retained Eamings
Retained Eamings Prior to Transfers
Transfer from (to) Rate Stabilization Reserve

Balance of Fund

Total Basic Retained Earnings

Total Accumulated Other Comprehensive Income
Total Equity

| Minimum RSR based on PUB rules | 82,900 | 89,300 | 94,400 | 99,000 | 103,600 |
| :--- | ---: | ---: | ---: | ---: | ---: |
| Max imum RSR based on PUB rules | 165,600 | 178,300 | 188,400 | 197,500 | 206,700 |
| 216,300 |  |  |  |  |  |
| MPI Total Equity Target | 213,000 | 213,000 | 213,000 | 213,000 | 213,000 |
| MPI Max Target (MCT) | 325,000 | 325,000 | 325,000 | 325,000 | 325,000 |

Note: Rounding may affect totals

Manitoba Public Insurance

# Manitoba Public Insurance Multi-year - Statement of Operations For the Years Ended February, 

Restated Financial Statements with Premium Deficiency / Reserves and 2016/17 rate change of-1.0\%
(C\$ 000s, except where noted)

## BASIC

Motor Vehicles
Drivers
Reinsurance Ceded
Total Net Premiums Written
Net Premiums Earned
Motor Vehicles
Drivers
Reinsurance Ceded
Total Net Premiums Earned
Service Fees \& Other Revenues
Total Earned Revenues
Net Claims Incurred
Claims Expense
Road Safety/Loss Prevention
Total Claims Costs
Expenses
Operating
Commissions
Premium Taxes
Regulatory/Appeal
Total Expenses
a Underwriting Income (Loss)
b Investment Income
c Net Income (Loss) from Operations
d Add: Premium(Deficiency)/Reserves
e Net Income (Loss)

For the Years Ended February,

| For the Years Ended February, |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 2015A | 2016P | 2017P | 2018P | 2019P | $\underline{2020 P}$ |
| 794,052 | 854,303 | 884,560 | 926,427 | 969,064 | 1,014,091 |
| 44,642 | 48,269 | 51,128 | 54,021 | 56,626 | 59,164 |
| $(13,829)$ | $(12,396)$ | $(12,644)$ | $(12,897)$ | $(13,155)$ | $(13,418)$ |
| 824,865 | 890,176 | 923,045 | 967,551 | 1,012,535 | 1,059,837 |


| 774,785 | 828,135 | 870,612 | 907,126 | 949,408 | 993,334 |
| ---: | ---: | ---: | ---: | ---: | ---: |
| 42,926 | 46,782 | 49,704 | 52,580 | 55,329 | 57,900 |
| $(13,829)$ | $(12,396)$ | $(12,644)$ | $(12,897)$ | $(13,155)$ | $(13,418)$ |
| 803,883 | 862,520 | 907,672 | $\mathbf{9 4 6 , 8 1 0}$ | 991,582 | $\mathbf{1 , 0 3 7 , 8 1 6}$ |
| 19,475 | 20,922 | 22,350 | 23,998 | 25,907 | 28,062 |
| $\mathbf{8 2 3 , 3 5 7}$ | $\mathbf{8 8 3 , 4 4 3}$ | $\mathbf{9 3 0 , 0 2 2}$ | $\mathbf{9 7 0 , 8 0 8}$ | $\mathbf{1 , 0 1 7 , 4 8 9}$ | $\mathbf{1 , 0 6 5 , 8 7 7}$ |
|  |  |  |  |  |  |
| 745,837 | 559,784 | 681,189 | 687,371 | 827,161 | 860,260 |
| 116,578 | 121,045 | 127,985 | 131,213 | 136,685 | 136,531 |
| 11,359 | 11,496 | 11,433 | 10,540 | 11,393 | 11,415 |
| $\mathbf{8 7 3 , 7 7 3}$ | $\mathbf{6 9 2 , 3 2 4}$ | $\mathbf{8 2 0 , 6 0 6}$ | $\mathbf{8 2 9 , 1 2 4}$ | $\mathbf{9 7 5 , 2 3 9}$ | $\mathbf{1 , 0 0 8 , 2 0 6}$ |


| 74,283 | 71,401 | 74,574 | 77,146 | 79,969 | 80,478 |
| ---: | ---: | ---: | ---: | ---: | ---: |
| 32,845 | 35,405 | 36,648 | 36,994 | 38,671 | 40,403 |
| 24,531 | 26,247 | 27,609 | 28,791 | 30,142 | 31,537 |
| 3,935 | 3,154 | 3,210 | 3,273 | 3,338 | 3,404 |
| $\mathbf{1 3 5 , 5 9 5}$ | $\mathbf{1 3 6 , 2 0 8}$ | $\mathbf{1 4 2 , 0 4 1}$ | $\mathbf{1 4 6 , 2 0 4}$ | $\mathbf{1 5 2 , 1 2 0}$ | $\mathbf{1 5 5 , 8 2 2}$ |
|  |  |  |  |  |  |
| $(\mathbf{1 8 6 , 0 1 1 )}$ | $\mathbf{5 4 , 9 1 1}$ | $(32,625)$ | $\mathbf{( 4 , 5 2 0 )}$ | $(109,870)$ | $(98,151)$ |
|  |  |  |  |  |  |
| 188,451 | $(11,429)$ | 13,060 | 13,209 | 100,590 | 107,817 |
|  |  |  |  |  |  |
| $(5,144)$ | 14,248 | $(15,366)$ | $\mathbf{4 , 2 6 5}$ | $(5,905)$ | $\mathbf{7 , 5 1 1}$ |
| 7,584 | 29,233 | $(4,199)$ | 4,423 | $(3,375)$ | 2,156 |
| $\mathbf{2 , 4 4 0}$ | $\mathbf{4 3 , 4 8 2}$ | $(19,565)$ | $\mathbf{8 , 6 8 8}$ | $(9,280)$ | 9,667 |
|  |  |  |  |  |  |

Note: Rounding may affect totals
$e=a+b$
$c=e-d$

## Manitoba Public Insurance Multi-year - Statement of Financial Position

Restated Financial Statements with Premium Deficiency / Reserves and 2016/17 rate change of -1.0\%
(C\$ 000s, except where noted)

BASIC

Assets
Cash and investments
Equity investments
Investment property
Due from other insurance companies
Accounts receivable
Prepaid expenses
Deferred policy acquisition costs
Reinsurers' share of unearned premiums
Reinsurers' share of unearned claims
Property and equipment
Deferred development costs

Liabilities
Due to other insurance companies
Accounts payable and accrued liabilites
Financing lease obligation
Unearned premiums and fees
Provision for employee current benefits
Provision for employee future benefits
Provision for unpaid claims

For the Years Ended February,

| $\underline{\text { 2015A }}$ | $\underline{\mathbf{2 0 1 6 P}}$ | $\underline{\mathbf{2 0 1 7 P}}$ | $\underline{\mathbf{2 0 1 8 P}}$ | $\underline{\mathbf{2 0 1 9 P}}$ | $\underline{\mathbf{2 0 2 0 P}}$ |  |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| $\mathbf{1 , 5 9 3 , 4 4 2}$ | $1,566,586$ | $1,548,582$ | $1,536,978$ | $1,602,902$ | $1,675,978$ |  |
| 598,842 | 618,648 | 627,404 | 634,310 | 661,645 | 691,763 |  |
| 35,073 | 35,115 | 34,908 | 33,756 | 32,338 | 30,990 |  |
| 108 | - | - | - | - | - |  |
| 273,197 | 270,333 | 280,015 | 292,259 | 304,500 | 317,345 |  |
| - | 291 | 291 | 291 | 291 | 291 |  |
| - | 15,281 | 11,952 | 17,579 | 15,431 | 18,881 |  |
| - | - | - | - | - | - |  |
| 2,565 | - | - | - | - | - |  |
| 90,474 | 87,247 | 91,067 | 91,553 | 90,273 | 88,648 |  |
| 56,992 | 66,092 | 73,175 | 81,730 | 86,029 | 97,255 |  |
| $\mathbf{2 , 6 5 0 , 6 9 3}$ | $\mathbf{2 , 6 5 9 , 5 9 2}$ | $\mathbf{2 , 6 6 7 , 3 9 3}$ | $\mathbf{2 , 6 8 8 , 4 5 5}$ | $\mathbf{2 , 7 9 3 , 4 0 8}$ | $\mathbf{2 , 9 2 1 , 1 5 1}$ |  |


| - | 1 | 1 | 1 | 1 | 1 |
| ---: | ---: | ---: | ---: | ---: | ---: |
| 34,157 | 37,993 | 39,354 | 41,074 | 42,795 | 44,600 |
| 3,224 | 2,955 | 2,892 | 2,825 | 2,753 | 2,681 |
| 426,137 | 461,757 | 480,544 | 504,967 | 529,893 | 556,200 |
| 16,240 | 16,253 | 16,880 | 17,520 | 18,175 | 18,845 |
| 286,581 | 289,816 | 303,510 | 318,434 | 334,015 | 350,309 |
| $1,671,275$ | $1,588,436$ | $1,576,056$ | $1,542,858$ | $1,605,760$ | $1,669,670$ |
| $\mathbf{2 , 4 3 7 , 6 1 4}$ | $\mathbf{2 , 3 9 7 , 2 1 2}$ | $\mathbf{2 , 4 1 9 , 2 3 7}$ | $\mathbf{2 , 4 2 7 , 6 7 9}$ | $\mathbf{2 , 5 3 3 , 3 9 1}$ | $\mathbf{2 , 6 4 2 , 3 0 6}$ |

Equity
Retained earnings
Basic Insurance Retained Earnings
Rate Stabilization Reserve
Retained Earnings
Accumulated Other Comprehensive Income Total Equity

| 165,600 | 178,300 | 184,900 | 193,800 | 201,142 | 210,809 |
| ---: | ---: | ---: | ---: | ---: | ---: |
| 12,217 | 42,999 | 16,834 | 16,622 | - | - |
| 177,817 | 221,299 | 201,734 | 210,422 | 201,142 | 210,809 |
| 35,262 | 41,082 | 46,423 | 50,354 | 58,874 | 68,037 |
| 213,079 | 262,380 | 248,156 | 260,776 | 260,016 | 278,845 |
|  |  |  |  |  |  |
| $\mathbf{2 , 6 5 0 , 6 9 3}$ | $\mathbf{2 , 6 5 9 , 5 9 2}$ | $\mathbf{2 , 6 6 7 , 3 9 3}$ | $\mathbf{2 , 6 8 8 , 4 5 5}$ | $\mathbf{2 , 7 9 3 , 4 0 8}$ | $\mathbf{2 , 9 2 1 , 1 5 1}$ |

Note: Rounding may affect totals

Manitoba
Public Insurance

## Manitoba Public Insurance Multi-Year - Statement of Changes in Equity

Restated Financial Statements with Premium Deficiency / Reserves and 2016/17 rate change of-1.0\%
(C\$ 000s, except where noted)

## RATE STABILIZATION RESERVE (RSR)

Basic Insurance Rate Stabilization Reserve
Beginning Balance
Transfer from (to) Basic Retained Eamings
Ending Balance

Red Ear nings
Beginning Balance
Net Income (Loss) from annual operations
Transfer from Extension Retained Eamings
Retained Eamings Prior to Transfers
Transfer from (to) Rate Stabilization Reserve
Balance of Fund

Total Basic Retained Earnings

Total Accumulated Other Comprehensive Income
Total Equity

| Minimum RSR based on PUB rules | 82,900 | 89,300 | 92,600 | 97,100 | 101,600 | 106,400 |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: |
| Max imum RSR based on PUB rules | 165,600 | 178,300 | 184,900 | 193,800 | 202,800 | 212,300 |
| MPI Total Equity Target | 213,000 | 213,000 | 213,000 | 213,000 | 213,000 | 213,000 |
| MPI Max Target (MCT) | 325,000 | 325,000 | 325,000 | 325,000 | 325,000 | 325,000 |

Note: Rounding may affect totals

Manitoba Public Insurance

## Manitoba Public Insurance Multi-year - Statement of Operations For the Years Ended February,

Restated Financial Statements with Premium Deficiency / Reserves and 2016/17 rate change of $+1.36 \%$ for breakeven
(C\$ 000s, except where noted)

## BASIC <br> Motor Vehicles Drivers Reinsurance Ceded Total Net Premiums Written

Net Premiums Earned
Motor Vehicles
Drivers
Reinsurance Ceded
Total Net Premiums Earned
Service Fees \& Other Revenues
Total Earned Revenues
Net Claims Incurred
Claims Expense
Road Safety/Loss Prevention
Total Claims Costs
Expenses
Operating
Commissions
Premium Taxes
Regulatory/Appeal
Total Expenses
a Underwriting Income (Loss)
b Investment Income
c Net Income (Loss) from Operations
d Add: Premium (Deficiency)/Reserves
e Net Income (Loss)

For the Years Ended February,

| 2015A | 2016P | 2017P | 2018P | 2019P | 2020P |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 794,052 | 854,303 | 905,764 | 948,614 | 992,257 | 1,038,345 |
| 44,642 | 48,269 | 51,128 | 54,021 | 56,626 | 59,164 |
| $(13,829)$ | $(12,396)$ | $(12,644)$ | $(12,897)$ | $(13,155)$ | $(13,418)$ |
| 824,865 | 890,176 | 944,249 | 989,738 | 1,035,728 | 1,084,091 |


| 774,785 | 828,135 | 882,041 | 928,860 | 972,138 | $1,017,098$ |
| ---: | ---: | ---: | ---: | ---: | ---: |
| 42,926 | 46,782 | 49,704 | 52,580 | 55,329 | 57,900 |
| $(13,829)$ | $(12,396)$ | $(12,644)$ | $(12,897)$ | $(13,155)$ | $(13,418)$ |
| 803,883 | 862,520 | 919,101 | 968,544 | $\mathbf{1 , 0 1 4 , 3 1 1}$ | $\mathbf{1 , 0 6 1 , 5 8 1}$ |
| 19,475 | 20,922 | 22,350 | 24,125 | 26,043 | 28,209 |
| $\mathbf{8 2 3 , 3 5 7}$ | $\mathbf{8 8 3 , 4 4 3}$ | $\mathbf{9 4 1 , 4 5 1}$ | $\mathbf{9 9 2 , 6 6 9}$ | $\mathbf{1 , 0 4 0 , 3 5 5}$ | $\mathbf{1 , 0 8 9 , 7 9 0}$ |
|  |  |  |  |  |  |
| 745,837 | 559,784 | 671,900 | 687,051 | 825,766 | 859,671 |
| 116,578 | 121,045 | 127,985 | 131,096 | 136,566 | 136,412 |
| 11,359 | 11,496 | 11,433 | 10,529 | 11,382 | 11,403 |
| $\mathbf{8 7 3 , 7 7 3}$ | $\mathbf{6 9 2 , 3 2 4}$ | $\mathbf{8 1 1 , 3 1 8}$ | $\mathbf{8 2 8 , 6 7 6}$ | $\mathbf{9 7 3 , 7 1 3}$ | $\mathbf{1 , 0 0 7 , 4 8 6}$ |


| 74,283 | 71,401 | 74,574 | 77,075 | 79,896 | 80,405 |
| ---: | ---: | ---: | ---: | ---: | ---: |
| 32,845 | 35,405 | 36,946 | 37,694 | 39,404 | 41,69 |
| 24,531 | 26,247 | 27,952 | 29,443 | 30,824 | 32,250 |
| 3,935 | 3,154 | 3,210 | 3,273 | 3,337 | 3,404 |
| $\mathbf{1 3 5 , 5 9 5}$ | $\mathbf{1 3 6 , 2 0 8}$ | $\mathbf{1 4 2 , 6 8 2}$ | $\mathbf{1 4 7 , 4 8 5}$ | $\mathbf{1 5 3 , 4 6 1}$ | $\mathbf{1 5 7 , 2 2 7}$ |
|  |  |  |  |  |  |
| $(186,011)$ | $\mathbf{5 4 , 9 1 1}$ | $(12,548)$ | $\mathbf{1 6 , 5 0 8}$ | $\mathbf{( 8 6 , 8 2 0}$ | $(74,924)$ |
|  |  |  |  |  |  |
| 188,451 | $(11,429)$ | 12,549 | 12,384 | 101,404 | 109,804 |
|  |  |  |  |  |  |
| $\mathbf{( 5 , 1 4 4 )}$ | $\mathbf{1 4 , 2 4 8}$ | $\mathbf{( 5 , 0 7 0 )}$ | $\mathbf{2 4 , 6 7 3}$ | $\mathbf{1 6 , 9 2 7}$ | $\mathbf{3 2 , 5 3 8}$ |
| 7,584 | 29,233 | 5,072 | 4,219 | $(2,343)$ | 2,343 |
| $\mathbf{2 , 4 4 0}$ | $\mathbf{4 3 , 4 8 2}$ | $\mathbf{1}$ | $\mathbf{2 8 , 8 9 2}$ | $\mathbf{1 4 , 5 8 5}$ | $\mathbf{3 4 , 8 8 0}$ |

Note: Rounding may affect totals

```
e= a+b
c=e-d
```


## Manitoba Public Insurance Multi-year - Statement of Financial Position

Restated Financial Statements with Premium Deficiency / Reserves and 2016/17 rate change of $\mathbf{+ 1 . 3 6 \%}$ for breakeven
(C\$ 000s, except where noted)

## BASIC

Assets
Cash and investments
Equity investments
Investment property
Due from other insurance companies
Accounts receivable
Prepaid expenses
Deferred policy acquisition costs
Reinsurers' share of unearned premiums
Reinsurers' share of unearned claims
Property and equipment
Deferred development costs

Liabilities
Due to other insurance companies
Accounts payable and accrued liabilites
Financing lease obligation
Unearned premiums and fees
Provision for employee current benefits
Provision for employee future benefits
Provision for unpaid claims
For the Years Ended February,

| 2015A | 2016P | 2017P | 2018P | 2019P | 2020P |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1,593,442 | 1,566,586 | 1,560,631 | 1,565,315 | 1,649,701 | 1,743,042 |
| 598,842 | 618,648 | 630,833 | 642,294 | 674,767 | 710,534 |
| 35,073 | 35,115 | 34,970 | 33,884 | 32,525 | 31,234 |
| 108 |  |  |  |  |  |
| 273,197 | 270,333 | 285,149 | 297,631 | 310,114 | 323,217 |
| - | 291 | 291 | 291 | 291 | 291 |
| - | 15,281 | 21,832 | 27,284 | 26,196 | 29,865 |
| 2,565 |  | - |  |  |  |
| 90,474 | 87,247 | 91,067 | 91,553 | 90,273 | 88,648 |
| 56,992 | 66,092 | 73,175 | 81,730 | 86,029 | 97,255 |
| 2,650,693 | 2,659,592 | 2,697,948 | 2,739,980 | 2,869,896 | 3,024,085 |


|  |  |  |  |  | 1 |
| ---: | ---: | ---: | ---: | ---: | ---: |
| - | 1 | 1 | 1 | 1 | 1 |
| 34,157 | 37,993 | 40,075 | 41,829 | 43,584 | 45,425 |
| 3,224 | 2,955 | 2,892 | 2,825 | 2,753 | 2,681 |
| 426,137 | 461,757 | 490,319 | 515,196 | 540,585 | 567,381 |
| 16,240 | 16,253 | 16,880 | 17,520 | 18,175 | 18,845 |
| 286,581 | 289,816 | 303,510 | 318,434 | 334,015 | 350,309 |
| $1,671,275$ | $1,588,436$ | $1,576,038$ | $1,542,315$ | $1,604,855$ | $1,668,363$ |
| $\mathbf{2 , 4 3 7 , 6 1 4}$ | $\mathbf{2 , 3 9 7 , 2 1 2}$ | $\mathbf{2 , 4 2 9 , 7 1 5}$ | $\mathbf{2 , 4 3 8 , 1 2 0}$ | $\mathbf{2 , 5 4 3 , 9 6 8}$ | $\mathbf{2 , 6 5 3 , 0 0 6}$ |

Equity
Retained earnings
Basic Insurance Retained Earnings
Rate Stabilization Reserve
Retained Earnings
Accumulated Other Comprehensive Income Total Equity

| 165,600 | 178,300 | 189,100 | 198,200 | 207,400 | 217,100 |
| ---: | ---: | ---: | ---: | ---: | ---: |
| 12,217 | 42,999 | 32,200 | 51,991 | 57,376 | 82,556 |
| 177,817 | 221,299 | 221,300 | 250,191 | 264,776 | 299,656 |
| 35,262 | 41,082 | 46,933 | 51,668 | 61,152 | 71,423 |
| $\mathbf{2 1 3 , 0 7 9}$ | $\mathbf{2 6 2 , 3 8 0}$ | $\mathbf{2 6 8 , 2 3 3}$ | $\mathbf{3 0 1 , 8 5 9}$ | $\mathbf{3 2 5 , 9 2 8}$ | $\mathbf{3 7 1 , 0 7 9}$ |
|  |  |  |  |  |  |
| $\mathbf{2 , 6 5 0 , 6 9 3}$ | $\mathbf{2 , 6 5 9 , 5 9 2}$ | $\mathbf{2 , 6 9 7 , 9 4 8}$ | $\mathbf{2 , 7 3 9 , 9 8 0}$ | $\mathbf{2 , 8 6 9 , 8 9 6}$ | $\mathbf{3 , 0 2 4 , 0 8 5}$ |

[^2]
## Manitoba Public Insurance Multi-Year - Statement of Changes in Equity

Restated Financial Statements with Premium Deficiency / Reser ves and 2016/17 rate change of $+1.36 \%$ for breakeven
(C\$ 000s, except where noted)

## RATE STABILIZATION RESERVE (RSR) <br> ATE STABILIZATION RESERVE (RSR)

Basic Insurance Rate Stabilization Reserve

| Basic Insurance Rate Stabilization Reserve |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Beginning Balance |  | 99,877 |  | 165,600 |  | 178,300 |  | 189,100 |  | 198,200 |  | 207,400 |
| Transfer from (to) Basic Retained Eamings |  | 65,723 |  | 12,700 |  | 10,800 |  | 9,100 |  | 9,200 |  | 9,700 |
| Ending Balance |  | 165,600 |  | 178,300 |  | 189,100 |  | 198,200 |  | 207,400 |  | 217,100 |
| Retained Earnings |  |  |  |  |  |  |  |  |  |  |  |  |
| Beginning Balance |  | - |  | 12,217 |  | 42,999 |  | 32,200 |  | 51,991 |  | 57,376 |
| Net Income (Loss) from annual operations |  | 2,440 |  | 43,482 |  | 1 |  | 28,892 |  | 14,585 |  | 34,880 |
| Transfer from Ex tension Retained Eamings |  | 75,500 |  | - |  | - |  | - |  | - |  | - |
| Retained Eamings Prior to Transfers |  | 77,940 |  | 55,699 |  | 43,000 |  | 61,091 |  | 66,576 |  | 92,256 |
| Transfer from (to) Rate Stabilization Reserve |  | $(65,723)$ |  | $(12,700)$ |  | $(10,800)$ |  | $(9,100)$ |  | $(9,200)$ |  | $(9,700)$ |
| Balance of Fund |  | 12,217 |  | 42,999 |  | 32,200 |  | 51,991 |  | 57,376 |  | 82,556 |
| Total Basic Retained Earnings | \$ | 177,817 | \$ | 221,299 | \$ | 221,300 | \$ | 250,191 | \$ | 264,776 | \$ | 299,656 |
| Total Accumulated Other Comprehensive Income Total Equity | \$ | 35,262 | \$ | 41,082 | \$ | 46,933 | \$ | 51,668 | \$ | 61,152 | \$ | 71,423 |
|  | \$ | 213,079 | \$ | 262,380 | \$ | 268,233 | \$ | 301,859 | \$ | 325,928 | \$ | 371,079 |
| Minimum RSR based on PUB rules Maximum RSR based on PUB rules MPI Total Equity Target MPI Max Target (MCT) |  | 82,900 |  | 89,300 |  | 94,700 |  | 99,300 |  | 103,900 |  | 108,800 |
|  |  | 165,600 |  | 178,300 |  | 189,100 |  | 198,200 |  | 207,400 |  | 217,100 |
|  |  | 213,000 |  | 213,000 |  | 213,000 |  | 213,000 |  | 213,000 |  | 213,000 |
|  |  | 325,000 |  | 325,000 |  | 325,000 |  | 325,000 |  | 325,000 |  | 325,000 |


| For the Years Ended February, |  |  |  |  |  |  |  |
| :--- | :--- | :--- | :--- | :--- | :--- | :---: | :---: |
| $\underline{2015 \mathrm{~A}} \quad \underline{2016 \mathrm{P}} \quad \underline{2017 \mathrm{P}} \quad \underline{2018 \mathrm{P}} \quad \underline{2019 \mathrm{P}}$ | $\underline{2020 \mathrm{P}}$ |  |  |  |  |  |  |

Note: Rounding may affect totals

## PUB (MPI) 2-29

| Volume: | PUB/MPI I-37 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Road Safety and Loss Prevention |  |  |
| Sub Topic: | High School Driver Education Program \& Graduated Driver <br> Licensing Program |  |  |
| Issue: | Program Effectiveness |  |  |

Preamble: The Corporation has not advised of the resultant costs and benefits to the changes to the High School Driver Education Program, as requested.

## Question:

Please provide the expected resultant costs and benefits of the proposed changes to the High School Driver Education Program.

## Rationale for Question:

Road Safety and Loss Prevention costs are incurred with a view to reducing collisions, and in turn claims costs, and have a dual impact upon Basic Rates; as both expenditures and a potential savings mechanism. The Board must be provided with sufficient information relative to those initiatives to enable the Board to consider necessity and prudence of the expenditures and potential savings.

## RESPONSE:

Please refer to the High School Driver Education Program Redevelopment Program Charter filed in the 2015 GRA Vol III AI. 10 HSDE. The project costs and anticipated resulting operational cost savings and benefits (intended outcomes) are outlined in the Charter and have not changed.

## PUB (MPI) 2-30

| Volume: | PUB/MPI I-45 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Investment Income |  |  |
| Sub Topic: |  |  |  |
| Issue: | Interest Rate Forecasting |  |  |

## Question:

a) Please discuss any concerns that the Corporation may have with respect to the discontinuity in 2017 Q1 in the selected interest rate forecast.

b) Please file an updated interest rate forecast comparing it with that currently included in the application and discuss the net income impact of the changed forecast on 2015/16, 2016/17 and 2017/18.
c) Please file an update to PF.1, PF2 and PF. 3 based on the updated interest rate forecast from (a) above.
d) Please expand the table in (a) above to include the long-term forecasts currently available from the major Banks, the Conference Board of Canada and Spatial Economics, to be filed in confidence with the Board as needed.
e) Please advise of why the Corporation dismisses the use of the Spatial Economics forecast on the basis that it is a semi-annual forecast.
f) Please discuss the merits of utilizing multiple long-term interest rate forecasts and why the Corporation does not do so.

## Rationale for Question:

Interest rate forecasting is an important variable for rate setting.

## RESPONSE:

a) The Corporation does not have significant issues with the discontinuity of the various banks from Q4 2016 to Q1 2017. This year, the Corporation reduced interest rate risk by fully matching the claims and fixed income duration. As a result, the impact of incorrect long-term interest rate forecasts has been reduced. PUB (MPI) 1-45(b) quantified this impact: "If the average forecasted interest rate was increased or decreased by $+20 \mathrm{bps} /-20 \mathrm{bps}$, the impact on basic net income would be $\$ 6.9$ million/- $\$ 7.1$ million in 2017/18. On average over the rating years, the Basic net income impact would be approximately $\$ 3.5$ million/- $\$ 3.6$ million."
b) The table below provides a comparison of the basic net income impact of the August 2015 interest rate forecast and the March 2015 forecast (used in the 2016 GRA). The average rating year net income impact is $\$(2.9)$ million.

## Basic Net Income Comparison

| $\mathbf{2 0 1 5 / 1 6}$ | $\mathbf{2 0 1 6 / 1 7}$ | $\mathbf{2 0 1 7 / 1 8}$ |
| :---: | :---: | :---: |
| 11,510 | $(15,002)$ | 10,484 |
| 14,964 | $(11,401)$ | 12,585 |
| $\mathbf{( 3 , 4 5 4 )}$ | $\mathbf{( 3 , 6 0 0})$ | $(\mathbf{2 , 1 0 1 )}$ |

The table on the next page provides the updated interest rate forecast as of August and a comparison to the 2016 GRA interest rate forecast as of March 2015.

Government of Canada 10 Year Bond Rate Forecast as of August 2015

| Cal. <br> Year | Cal. Quarter | Applied to MPI Fiscal Quarter | $\begin{gathered} \text { BMO } \\ \text { NB } \end{gathered}$ | CIBC | Global | RBC | Scotia | TD | August 2015 Forecast (*) | March 2015 <br> Forecast (Used in 2016 GRA) | Difference |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2015 | Q1 | Q1 2015/16 |  |  |  |  |  |  | 1.62\% | 1.47\% | 0.15\% |
|  | Q2 | Q2 2015/16 |  |  |  |  |  |  | 1.40\% | 1.70\% | -0.30\% |
|  | Q3 | Q3 2015/16 | 1.60\% | 1.50\% | 1.86\% | 1.80\% | 1.65\% | 1.70\% | 1.69\% | 1.87\% | -0.18\% |
|  | Q4 | Q4 2015/16 | 1.77\% | 2.00\% | 2.02\% | 2.10\% | 1.95\% | 1.85\% | 1.95\% | 2.04\% | -0.09\% |
| 2016 | Q1 | Q1 2016/17 | 1.90\% | 1.95\% | 2.24\% | 2.30\% | 2.15\% | 2.00\% | 2.09\% | 2.21\% | -0.12\% |
|  | Q2 | Q2 2016/17 | 1.98\% | 2.05\% | 2.46\% | 2.50\% | 2.25\% | 2.15\% | 2.23\% | 2.40\% | -0.17\% |
|  | Q3 | Q3 2016/17 | 2.07\% | 2.45\% | 2.62\% | 2.70\% | 2.35\% | 2.25\% | 2.41\% | 2.57\% | -0.17\% |
|  | Q4 | Q4 2016/17 | 2.17\% | 2.55\% | 2.76\% | 2.90\% | 2.45\% | 2.40\% | 2.54\% | 2.70\% | -0.16\% |
| 2017 | Q1 | Q1 2017/18 |  |  | 2.92\% |  |  |  | 2.92\% | 3.22\% | -0.30\% |
|  | Q2 | Q2 2017/18 |  |  | 3.11\% |  |  |  | 3.11\% | 3.41\% | -0.30\% |
|  | Q3 | Q3 2017/18 |  |  | 3.27\% |  |  |  | 3.27\% | 3.52\% | -0.25\% |
|  | Q4 | Q4 2017/18 |  |  | 3.48\% |  |  |  | 3.48\% | 3.55\% | -0.07\% |
| 2018 | Q1 | Q1 2018/19 |  |  | 3.54\% |  |  |  | 3.54\% | 3.55\% | -0.01\% |
|  | Q2 | Q2 2018/19 |  |  | 3.54\% |  |  |  | 3.54\% | 3.55\% | -0.01\% |
|  | Q3 | Q3 2018/19 |  |  | 3.54\% |  |  |  | 3.54\% | 3.55\% | -0.01\% |
|  | Q4 | Q4 2018/19 |  |  | 3.54\% |  |  |  | 3.54\% | 3.55\% | -0.01\% |
| 2019 | Q1 | Q1 2019/20 |  |  | 3.54\% |  |  |  | 3.54\% | 3.55\% | -0.01\% |
|  | Q2 | Q1 2019/20 |  |  | 3.54\% |  |  |  | 3.54\% | 3.55\% | -0.01\% |
|  | Q3 | Q1 2019/20 |  |  | 3.54\% |  |  |  | 3.54\% | 3.55\% | -0.01\% |
|  | Q4 | Q1 2019/20 |  |  | 3.54\% |  |  |  | 3.54\% | 3.55\% | -0.01\% |

(*) Q1 2015/16 interest rate is an actual GoC 10 year bond yield at the end of MPI's fiscal quarter. Q2 2015/16 is an actual GoC 10 year bond yield as of August 18, 2015.

## Data sources dates:

BMO NB as of August 14, 2015 (Average of Period)
CIBC as of August 11, 2015 (Average of Period)
Global Insight, August 2015
RBC as of August 7, 2015 (End of Period)
Scotiabank as of July 30, 2015 (End of Period)
TD as of July 30, 2015 (End of Period)
c) Please refer to attachment.
d)


## Omissions

- Scotia and TD did not respond to the request for a longer-term interest rate forecast.
- RBC provided their long-term interest rate forecast but requested that the forecast only be reflected in the average. They declined a request to provide the forecast in confidence to the Public Utilities Board. RBC's long-term interest rate forecast is included in the "Average With All Available Long-Term Forecasts" line in the chart above.
- There is a one-time cost of $\$ 2,500$ to receive Spatial Economic's long-term interest rate forecast. Since Spatial's long-term interest rate forecast is only updated on a semi-annual basis this forecast was not included. Part e) of this question addresses why Spatial Economic's semi-annual interest rate forecast is not suitable.
e) When the interest rate methodology was being reviewed internally in March 2014, the Conference Board of Canada's March 2014 forecast was delayed. Their March forecast only became available after the methodology was finalized. This illustrates the importance of regular interest rate forecasts, especially when interest rate movements are volatile. The Conference Board of Canada's December 2013 forecast was outdated as interest rates declined significantly in January (GoC 10-year bond rate was $2.76 \%$ as of December 31, 2013). By January 31, 2014, the GoC 10-year bond rate fell by $0.42 \%$ to $2.34 \%$ due to changing market conditions. Current interest rate forecasts are preferred to stale forecasts especially when the market is volatile. Therefore, semi-annual forecasts from Spatial Economics are not suitable.
f) Additional long-term sources for the interest rate forecast for years 3, 4, and 5 of the outlook period would be preferred if these forecasts were consistently available on a monthly basis and were approved for public disclosure. When the interest rate methodology was reviewed last year, Global Insight was the only suitable long-term interest rate forecaster because it provided the forecast on a consistent monthly basis. Since interest rate volatility can be extreme from month to month, it is preferred that the most current (ie: monthly) interest rate forecasts are used instead of stale forecasts.

If other long-term interest rate forecasters were included and their forecasts were stale during a volatile market such as in 2009, the overall interest rate forecast would not portray a reasonable reflection of current market conditions. As a result, either the stale forecasts would need to be included to remain consistent, or judgement would be required to remove these stale forecasts. By using consistent monthly updated forecasts, judgement is not necessary when setting the interest rate forecast and the forecasts remain reflective of current market conditions.

As shown in the graph in part (d) of this question, the "Average with All Available Long-Term Forecasts" was relatively close to the 2016 GRA Methodology. The impact of using the "Average with All Available Long-Term Forecasts" instead of the 2016 GRA interest rate methodology had a - $\$ 1.9$ million dollar Basic net income impact on average over the rating years. This modest impact indicates that adding additional long-term interest rate forecasters to the average forecast is not likely to have a material average rating year impact on basic net income. Compared to previous rate applications, the Corporation's interest rate risk has been significantly reduced because the Corporation now fully matches the fixed income duration to the claims duration.

## Manitoba Public Insurance Multi-Year - Statement of Operations

Revised inter est rate forec ast as at August 2015

| (C\$ 000s, except where noted) | For the Years Ended February, |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2015A | 2016P | 2017P | 2018P | 2019P | 2020P |
| BASIC |  |  |  |  |  |  |
| Motor Vehicles | 794,052 | 854,303 | 893,543 | 935,826 | 978,889 | 1,024,366 |
| Drivers | 44,642 | 48,269 | 51,128 | 54,021 | 56,626 | 59,164 |
| Reinsurance Ceded | $(13,829)$ | $(12,396)$ | $(12,644)$ | $(12,897)$ | $(13,155)$ | $(13,418)$ |
| Total Net Premiums Written | 824,865 | 890,176 | 932,027 | 976,950 | 1,022,361 | 1,070,112 |
| Net Premiums Ear ned |  |  |  |  |  |  |
| Motor Vehicles | 774,785 | 828,135 | 875,453 | 916,334 | 959,037 | 1,003,401 |
| Drivers | 42,926 | 46,782 | 49,704 | 52,580 | 55,329 | 57,900 |
| Reinsurance Ceded | $(13,829)$ | $(12,396)$ | $(12,644)$ | $(12,897)$ | $(13,155)$ | $(13,418)$ |
| Total Net Premiums Ear ned | 803,883 | 862,520 | 912,514 | 956,017 | 1,001,211 | 1,047,884 |
| Service Fees \& Other Revenues | 19,475 | 20,922 | 22,350 | 24,052 | 25,965 | 28,125 |
| Total Earned Revenues | 823,357 | 883,443 | 934,864 | 980,069 | 1,027,176 | 1,076,008 |
| Net Claims Incurred | 745,837 | 602,497 | 684,345 | 680,208 | 817,262 | 862,215 |
| Claims Expense | 116,578 | 121,045 | 128,114 | 131,460 | 136,822 | 136,661 |
| Road Safety/Loss Prevention | 11,359 | 11,496 | 11,444 | 10,563 | 11,404 | 11,427 |
| Total Claims Costs | 873,774 | 735,037 | 823,903 | 822,231 | 965,488 | 1,010,303 |
| Expenses |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| Operating | 74,283 | 71,401 | 74,643 | 77,289 | 80,043 | 80,552 |
| Commissions | 32,845 | 35,405 | 36,774 | 37,290 | 38,981 | 40,727 |
| Premium Taxes | 24,531 | 26,247 | 27,755 | 29,067 | 30,431 | 31,839 |
| Regulatory/Appeal | 3,935 | 3,154 | 3,210 | 3,273 | 3,338 | 3,404 |
| Total Expenses | 135,595 | 136,208 | 142,382 | 146,920 | 152,793 | 156,522 |
|  |  |  |  |  |  |  |
| Under writing Income (Loss) | $(186,011)$ | 12,198 | $(31,421)$ | 10,918 | $(91,104)$ | $(90,817)$ |
| Investment Income | 188,451 | (688) | 16,419 | (434) | 93,508 | 107,108 |
| Net Income (Loss) from Operations | 2,440 | 11,510 | $(15,002)$ | 10,484 | 2,404 | 16,291 |

## Manitoba Public Insurance Multi-Year - Statement of Operations

Revised inter est rate forec ast as at August 2015

| (C\$ 000s, except where noted) | For the Years Ended February, |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2015A | 2016P | 2017P | 2018P | 2019P | 2020P |
| BASIC |  |  |  |  |  |  |
| Assets |  |  |  |  |  |  |
| Cash and investments | 1,593,442 | 1,569,716 | 1,552,794 | 1,537,730 | 1,606,153 | 1,687,424 |
| Equity investments | 598,842 | 609,583 | 628,565 | 634,816 | 662,906 | 695,282 |
| Investment property | 35,073 | 35,085 | 34,912 | 33,782 | 32,386 | 31,063 |
| Due from other insurance companies | 108 |  | - |  |  | - |
| Accounts receivable | 273,197 | 270,333 | 282,190 | 294,535 | 306,878 | 319,832 |
| Prepaid ex penses | - | 291 | 291 | 291 | 291 | 291 |
| Deferred policy acquisition costs |  |  | - |  |  | - |
| Reinsurers' share of uneamed premiums | - |  | - |  |  | - |
| Reinsurers' share of uneamed claims | 2,565 | - | - | - | - | - |
| Property and equipment | 90,474 | 87,247 | 91,067 | 91,553 | 90,273 | 88,648 |
| Deferred development costs | 56,992 | 66,092 | 73,175 | 81,730 | 86,029 | 97,255 |
|  | 2,650,693 | 2,638,347 | 2,662,994 | 2,674,436 | 2,784,915 | 2,919,794 |
| Liabilities |  |  |  |  |  |  |
| Due to other insurance companies | - | 1 | 1 | 1 | 1 | 1 |
| Accounts payable and accrued liabilites | 34,157 | 37,993 | 39,659 | 41,394 | 43,129 | 44,950 |
| Financing lease obligation | 3,224 | 2,955 | 2,892 | 2,825 | 2,753 | 2,681 |
| Uneamed premiums and fees | 426,137 | 461,757 | 484,685 | 509,301 | 534,423 | 560,937 |
| Provision for employee current benefits | 16,240 | 16,253 | 16,880 | 17,520 | 18,175 | 18,845 |
| Provision for employee future benefits | 286,581 | 289,816 | 303,510 | 318,434 | 334,015 | 350,309 |
| Provision for unpaid claims | 1,671,275 | 1,601,916 | 1,596,891 | 1,552,107 | 1,608,485 | 1,672,194 |
|  | 2,437,614 | 2,410,691 | 2,444,518 | 2,441,581 | 2,540,980 | 2,649,917 |
| Equity |  |  |  |  |  |  |
| Retained eamings |  |  |  |  |  |  |
| Basic Insurance Retained Eamings |  |  |  |  |  |  |
| Rate Stabilization Reserve | 165,600 | 178,300 | 174,325 | 184,809 | 187,214 | 203,504 |
| Retained Eamings | 12,217 | 11,027 | - | - | - | - |
|  | 177,817 | 189,327 | 174,325 | 184,809 | 187,214 | 203,504 |
| Accumulated Other Comprehensive Income | 35,262 | 38,329 | 44,150 | 48,045 | 56,721 | 66,373 |
| Total Equity | 213,079 | 227,656 | 218,476 | 232,855 | 243,935 | 269,877 |
|  | 2,650,693 | 2,638,347 | 2,662,994 | 2,674,436 | 2,784,915 | 2,919,794 |

## Manitoba Public Insurance Multi-Year - Statement of Operations

Revised inter est rate forec ast as at August 2015
(C\$ 000s, except where noted)
For the Years Ended February,

## RATE STABILIZATION RESERVE (RSR)

Basic Insurance Rate Stabilization Reserve
Beginning Balance
Transfer from (to) Basic Retained Eamings
Transfer to Basic Retained Eamings
Ending Balance

| 99,877 | 165,600 | 178,300 | 174,325 | 184,809 | 187,214 |
| :---: | ---: | :---: | :---: | :---: | :---: |
| 65,723 | 12,700 | $(3,975)$ | 10,484 | 2,404 | 16,291 |
| - | - | - | - | - | - |
| $\mathbf{1 6 5 , 6 0 0}$ | $\mathbf{1 7 8 , 3 0 0}$ | $\mathbf{1 7 4 , 3 2 5}$ | $\mathbf{1 8 4 , 8 0 9}$ | $\mathbf{1 8 7 , 2 1 4}$ | $\mathbf{2 0 3 , 5 0 4}$ |

Retained Ear nings
Beginning Balance
Net Income (Loss) from annual operations
Transfer from Extension Retained Eamings
Retained Eamings Prior to Transfers
Transfer from (to) Rate Stabilization Reserve

| - | 12,217 | 11,027 | - | - | - |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 2,440 | 11,510 | $(15,002)$ | 10,484 | 2,404 | 16,291 |
| 75,500 |  |  |  |  |  |
| 77,940 | 23,727 | $(3,975)$ | 10,484 | 2,404 | 16,291 |
| $(65,723)$ | $(12,700)$ | 3,975 | $(10,484)$ | $(2,404)$ | $(16,291)$ |
|  |  |  |  |  |  |
| $\mathbf{1 2 , 2 1 7}$ | $\mathbf{1 1 , 0 2 7}$ | - | - | - | - |

Total Basic Retained Earnings

| $\$$ | 177,817 | $\$$ | 189,327 | $\$$ | 174,325 | $\$$ | 184,809 | $\$$ | 187,214 | $\$$ |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |

Total Accumulated Other Comprehensive Income
Total Equity

| $\$$ | 35,262 | $\$$ | 38,329 | $\$$ | 44,150 | $\$$ | 48,045 | $\$$ | 56,721 | $\$$ |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| $\$$ | 213,079 | $\$$ | 227,656 | $\$$ | 218,476 | $\$$ | 232,855 | $\$$ | 243,935 | $\$$ |


| Minimum RSR based on PUB rules | 82,900 | 89,300 | 92,600 | 97,100 | 101,600 | 106,400 |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: |
| Max imum RSR based on PUB rules | 165,600 | 178,300 | 184,900 | 193,800 | 202,800 | 212,300 |
| MPI Total Equity Target | 213,000 | 213,000 | 213,000 | 213,000 | 213,000 | 213,000 |
| MPI Max Target (MCT) | 325,000 | 325,000 | 325,000 | 325,000 | 325,000 | 325,000 |

Note: Rounding may affect totals

## PUB (MPI) 2-31

| Volume: | PUB/MPI I-47 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Investment Income |  |  |
| Sub Topic: |  |  |  |
| Issue: | Pension Expense |  |  |

Preamble: The Pension discount rate of $3.6 \%$ is static throughout the forecast period.

## Question:

a) Please file PF. 1 PF. 2 and PF. 3 reflecting a change in pension discount rate logically consistent with the movement of interest rates used in the GRA forecast.
b) Please provide details of the determination of the pension discount rate, pension expense and investment income in (a) above.

## Rationale for Question:

To understand the impact of interest rate forecast changes on investment income.

## RESPONSE:

a) and b)

In order to re-file PF.1, PF. 2 and PF. 3 with an updated pension discount rate, it would require the engagement of the external pension actuary to determine the pension actuarial impacts due to a change in the interest rates. This is not feasible in a short time frame. Further, any forecasted changes to the pension valuation flow through Other Comprehensive Income and not net income. Rates are based on forecasted net income.

## PUB (MPI) 2-32

| Volume: | PUB/MPI I-49 | Page No:: | Attachment |
| :--- | :--- | :--- | :--- |
| Topic: | Investment Income |  |  |
| Sub Topic: | Asset Liability Management Study |  |  |
| Issue: | Aon Recommendations |  |  |

## Question:

Please explain why, in each case, MPI did not address certain Aon recommendations in its Investment Policy Statement.

## Rationale for Question:

To understand the extent MPI has adopted recommendations made by Aon in the Asset Liability Management Study.

## RESPONSE:

Please see PUB (MPI) 2-33 for explanations of why certain Aon recommendations were not adopted in the Investment Policy Statement.

## PUB (MPI) 2-33

| Volume: | PUB/MPI I-49 and <br> PUB/MPI I-50 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Investments |  |  |
| Sub Topic: |  |  |  |
| Issue: | Asset Liability Management Study |  |  |

## Question:

Please provide an update to the attachment to PUB/MPI I-49 including all recommendations made in the appendices filed in PUB/MPI I-50.

## Rationale for Question:

To understand the extent MPI has adopted recommendations made by Aon in the Asset Liability Management Study.

## RESPONSE:

The following has been updated to include the recommendations contained in Aon Hewitt's Phase 2 - Part B ALM Report.

| Report | Recommendation | Page \# | Status of compliance |
| :---: | :---: | :---: | :---: |
| AON Phase I | Amend the formulation of the MfAD to reduce or eliminate the impact on duration | 20 | In the Corporation's 2015/16 forecast, it was assumed that a reduction of $0.25 \%$ in the investment margin will occur in the October 2015 Appointed Actuary's report. However, the Appointed Actuary has yet to sign off the reduction on the margin. |
|  | Change the calculation of the portfolio yield used for the valuation to adopt the revised duration weighted average yield methodology | 20 | Implemented |
|  | Work with the fixed income manager to assess and align its capabilities to implement a tighter hedging strategy in light of the provided list of characteristics and tools required | 20 | Implemented |
|  | Adopt a tighter hedging strategy and favor a more flexible approach with key rates matching | 21 | A tighter hedging strategy was implemented. The key rate matching approach that was favored by Aon was not implemented, as in Phase II, their final recommendation was to implement a duration matching approach. |
|  | The hedging strategy should hedge the liabilities that include the MfAD as this is the measure that drives the volatility in premiums. | 21 | Implemented |
|  | The recommended benchmark should be the return on the present value of cash flows over the measument period | 44 | This recommendation is in the process of being implemented |

AON Phase II - Part A
Provide in the policies that surplus distributions be spread over time

Revise RSR targets

Adoption of portfolio \#2
15 The adoption of portfolio \#2 is in progress.

| Report | Recommendation | Page \# | Status of compliance |
| :---: | :---: | :---: | :---: |
| AON Phase II - Part B | Adopt acceptable ranges of Corporate bonds within the Fund's Asset Allocation targets | 4 | The Corporation plans to study this topic in greater detail before making a decision. Pending the outcome of that internal research, it is possible that a specific allocation to Corporate bonds may be established within the Investment Policy Statement. |
|  | Provide Treasury with strategic and tactical guidance |  |  |
|  | a. Communicate views regarding greater corporate bond exposure | 5 | Our view on corporate bonds (including credit and term) is pending the |
|  | b. Communicate interest in exposures to lower quality credit and longer term Corporates | 5 | outcome of the study mentioned above |
|  | c. Indicate expectation that Treasury employ tactical under- and over-weights to take advantage of favorable market conditions | 5 | Tactical under and over weights will be considered in the study mentioned above |
|  | Discontinue Canadian equity passive mandate, allocate funds from liquidated mandate in conjunction with the implementation of the new asset mix target weights | 7 | Implemented |
|  | Determine objectives for the U.S. equity allocation | 7 | The recommendation is in the process of being implemented |

## 2014 Asset Liability Study <br> IPS Review and <br> withdrawal policy <br> Provide a broader perspective of risk <br> Inclusion of MUSH bonds in the statement of investment beliefs

Changes in the investment fund strategy statement in regard to fixed income investments as a result of the new direction taken around active management of credit and/or duration

In Conflict of Interest section, gender neutral wording may be more appropriate

2 Included in new Investment Policy Statement-April 2015

2 Addressed in new Investment Policy Statement-April 2015

2 Addressed in new Investment Policy Statement-April 2015

3 Addressed in new Investment Policy Statement-April 2015

| Report | Recommendation | Page \# | Status of compliance |
| :---: | :---: | :---: | :---: |
| 2014 Asset Liability Study IPS Review and withdrawal policy (cont'd) | Broaden the prohibition on related party transactions | 3 | Addressed in new Investment Policy Statement-April 2015 |
|  | Expansion of the liabilities definition by referencing pension liabilities | 3 | Addressed in new Investment Policy Statement-April 2015 |
|  | Addition of consideration of risk relative to liabilities | 3 | Addressed in new Investment Policy Statement-April 2015 |
|  | Definition of timeframes to which the investment objectives are to be measured | 3 | Addressed in new Investment Policy Statement-April 2015 |
|  | Update references to DEX indices to account for the new re-branded versions under FTSE Group's family indices | 3 | Addressed in new Investment Policy Statement-April 2015 |
|  | Adoption of the new IPD Canadian Property Fund Index as a benchmark for the real estate allocation | 4 | The Investment Department researched the status of the development of that index during its annual Investment Policy Review in March 2015. As a result of that review, it was determined that the new index was relatively small in comparison to the IPD Canada Index, that real estate pooled fund manager represented a significant portion of the index, and the index had extremely limited historical returns. On that basis the index was deemed unsuitable at the current time. |
|  | Investment in infrastructure pooled funds should be deemed a permitted investment category | 4 | Addressed in new Investment Policy Statement-April 2015 |
|  | Merge sections 6.10 and section 6.11 (Private Equity) | 4 | Addressed in new Investment Policy Statement-April 2015 Both sections were merged into section 6.10 |
|  | Expand use of leverage to include infrastructure investments | 4 | Addressed in new Investment Policy Statement-April 2015 |
|  | Removal of last sentence in section 6.14 in regard to debt obligations that are in default of principal or interest, given rating requirement in section 8.6 | 4 | Not addressed in new Investment Policy Statement-April 2015 as this change would weaken the rule as currently written |


| Report | Recommendation | Page \# | Status of compliance |
| :---: | :---: | :---: | :---: |
| 2014 Asset Liability Study IPS Review and | Changes to Section VII-Asset Allocation based on results of the ALM Study | 4 | Addressed in new Investment Policy Statement-April 2015. Table 7.1 was modified to reflect the new asset allocation. |
| (cont'd) | Inclusion of a corporate bonds target range within the fixed income portfolio | 5 | The Corporation plans to study this topic in greater detail before making a decision |
|  | Review of acceptable duration range relative to liabilities | 5 | Addressed in new Investment Policy Statement-April 2015 |
|  | Addition of treatment of currency risk derived from holdings of Canadian issued foreign pay bonds in section 8.5 | 5 | Not addressed in new Investment Policy Statement-April 2015 as the section is general enough to cover fixed income investments as currently written |
|  | Addition of greater clarity to expectations regarding downgrades in new section 8.7 | 5 | Addressed in new Investment Policy Statement-April 2015 |
|  | Specification of a monitoring cycle for investment managers | 5 | Addressed in new Investment Policy Statement-April 2015 |
|  | Inclusion of a fund withdrawal policy as an industry best practice | 6 | The Investment Department reviewed the policy recommended by AON and adapted it to the Corporation's unique characteristics. |

## PUB (MPI) 2-34

| Volume: | PUB/MPI I-50(a) | Page No.: | Attachments C and B |
| :--- | :--- | :--- | :--- |
| Topic: | Investments |  |  |
| Sub Topic: |  |  |  |
| Issue: | Asset Liability Management Study |  |  |

Preamble: Aon has indicated that MPI's Bond Portfolio is underweighted in Corporate Bonds relative to its peers SGI and ICBC.

MPI at February 28, 2014 had $\$ 0.5$ million in Corporate Bonds or about $5.5 \%$ of the total Bond Portfolio.

Aon has noted that long-term Corporate bonds offer a consistent yield advantage and forward looking assumptions suggest that they may offer opportunity for enhanced returns.

## Question:

a) Please provide a table that indicates the current and proposed weighting in corporate bonds and compare that with ICBC and SGI.
b) Please indicate whether MPI intends on increasing its weighting in Corporate Bonds under the updated portfolio.
c) Please explain why the Corporation has not established a range of investments in Corporate Bonds in the Investment Policy Statement as recommended by Aon.
d) Please provide updated tables 3.3.1.3 and 3.3.1.4 (Investment Income, pages 21 - 22) adding additional columns providing corporate bond yield and spread information.
e) Please obtain from each of Saskatchewan Auto Fund and the Insurance Corporation of British Columbia an indication of what approach they use with respect to asset liability management.

## Rationale for Question:

To understand how MPI has acted upon Aon recommendations.

## RESPONSE:

a) At July 31, 2015 the Corporation held $\$ 45.6$ million in corporate bonds, which represented $4.3 \%$ of the marketable bond portfolio. Regarding the proposed weighting to corporate bonds, please see the response to PUB 2-34 B. We do not have information regarding ICBC and SGI's allocation to Corporate bonds.
b) The Corporation noted Aon Hewitt's recommendation on this topic and plans to study this issue in greater detail before making a decision. Pending the outcome of our research it is possible that a specific allocation to Corporate bonds may be established within the Investment Policy Statement.
c) Please see the response to PUB (MPI) 2-34(b).
d) The revised Table 3.3.1.3 that includes corporate bond yield to maturity is located on the next page. The marketable bond yield to maturity shown in the second column had some corrections from the Table 3.3.1.3 in the Investment Income document.

Table 3.3.1.3
Marketable and Corporate Bond Spread over GoC 10 Year Bonds

|  | Marketable Bond YTM | GOC 10 yr | Marketable Bond Spread | Corporate Bond YTM | Spread Corporate Bond YTM |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 13-Mar | 2.68\% | 1.87\% | 0.81\% | 3.85\% | 1.98\% |
| 13-Apr | 2.65\% | 1.70\% | 0.95\% | 3.60\% | 1.90\% |
| 13-May | 2.70\% | 2.06\% | 0.64\% | 3.96\% | 1.90\% |
| 13-Jun | 2.76\% | 2.44\% | 0.32\% | 3.96\% | 1.52\% |
| 13-Jul | 3.06\% | 2.45\% | 0.61\% | 4.33\% | 1.88\% |
| 13-Aug | 3.17\% | 2.62\% | 0.55\% | 4.48\% | 1.86\% |
| 13-Sep | 3.02\% | 2.54\% | 0.48\% | 4.49\% | 1.95\% |
| 13-Oct | 2.93\% | 2.42\% | 0.51\% | 4.29\% | 1.87\% |
| 13-Nov | 2.98\% | 2.56\% | 0.42\% | 4.42\% | 1.86\% |
| 13-Dec | 2.99\% | 2.76\% | 0.23\% | 4.59\% | 1.83\% |
| 14-Jan | 2.73\% | 2.34\% | 0.39\% | 4.19\% | 1.85\% |
| 14-Feb | 2.80\% | 2.43\% | 0.37\% | 4.20\% | 1.77\% |
| 14-Mar | 2.84\% | 2.46\% | 0.38\% | 4.19\% | 1.73\% |
| 14-Apr | 2.81\% | 2.40\% | 0.41\% | 4.14\% | 1.74\% |
| 14-May | 2.86\% | 2.25\% | 0.61\% | 4.05\% | 1.80\% |
| 14-Jun | 2.90\% | 2.24\% | 0.66\% | 3.81\% | 1.57\% |
| 14-Jul | 2.87\% | 2.16\% | 0.71\% | 3.99\% | 1.83\% |
| 14-Aug | 2.76\% | 2.00\% | 0.76\% | 3.57\% | 1.57\% |
| 14-Sep | 2.85\% | 2.15\% | 0.70\% | 3.69\% | 1.54\% |
| 14-Oct | 2.82\% | 2.05\% | 0.77\% | 3.62\% | 1.57\% |
| 14-Nov | 2.67\% | 1.86\% | 0.81\% | 3.44\% | 1.58\% |
| 14-Dec | 2.60\% | 1.79\% | 0.81\% | 3.40\% | 1.61\% |
| 15-Jan | 2.22\% | 1.25\% | 0.97\% | 3.21\% | 1.96\% |
| 15-Feb | 2.27\% | 1.30\% | 0.97\% | 2.91\% | 1.61\% |
|  |  | 3 Year Average | 0.62\% |  | 1.76\% |
|  |  | 3 Year Max | 0.97\% |  | 1.98\% |
|  |  | 3 Year Min | 0.23\% |  | 1.52\% |

The marketable bond portfolio had a $4.3 \%$ weight in corporate bonds as of February 28,2015 . Please note that the model uses the marketable duration yield spread over the GoC 10 year bond rate in Table 3.3.1.4 for the entire marketable bond portfolio. Updating Table 3.3.1.4 with Corporate bonds is for information only since the model does not distinguish between issuer types in the marketable bond portfolio (such as provincial bonds, federal bonds, municipal bonds and corporate bonds).

## Assumptions for Updated Table 3.3.1.4

Historical duration data as of February 28, 2015 was not available for corporate bonds. Therefore, the original Table 3.3.1.4 for marketable bond duration yield spread will not be directly comparable to the updated table since the data will be as of August 26, 2015. Here are the assumptions used to update Table 3.3.1.4 with Corporate bonds:

- As of July 31, 2015, the duration of the Corporate bonds in Manitoba Public Insurance's (MPI) portfolio was 14.0 years while the yield to maturity was $3.12 \%$.
- Corporate bonds as of August 26, 2015 were downloaded from Bloomberg. The corporate bonds were filtered by:
- Credit rating: A- to AAA rated
- Maturity type: Bullet
- Denomination: Canadian dollars

The graph below indicates the Corporate bond yield by duration as of August 26, 2015.


There is a relatively positive linear relationship for corporate bonds from 0 to 9 years. For years $10+$, the relationship is relatively flat. In this case, the Corporate bond duration spread would be flat in table 3.3.1.4 for years 10 to 15 .

## Updated Table 3.3.1.4 with Corporate Bonds

Corporate Duration Yield Spread over GoC 10-Year Bond Rate

| Corporate <br> Bond <br> Duration | Spread $*$ |
| :---: | :---: |
| 10.0 years | 174 bps |
| 11.0 years | 174 bps |
| 12.0 years | 174 bps |
| 13.0 years | 174 bps |
| 14.0 years | 174 bps |
| 15.0 years | 174 bps |

*Spread: Average Corporate yield for duration 10 - 15 years (3.92\%) - GoC 10 Year Bond Rate August 26, 2015 (1.38\%) = 1.74\%.
e) As indicated in the response to PUB (MPI) 1-50(b), the ALM strategy recommended by Aon Hewitt was specific to Manitoba Public Insurance's (MPI) unique liability profile. ICBC operates in a tort environment and as a result has very short duration liabilities. Therefore, ICBC's liability structure is very different than MPI's and their ALM strategy is of little relevance. The duration of SGI's liabilities is longer than ICBC's but still shorter than MPI's.

## PUB (MPI) 2-35

| Volume: | PUB/MPI I-50 (a) | Page No.: | Attachments D and E |
| :--- | :--- | :--- | :--- |
| Topic: | Investments |  |  |
| Sub Topic: |  |  |  |
| Issue: | Asset Liability Management Study |  |  |

## Question:

Please provide a supplementary explanatory narrative with respect to the abovereferenced attachments, including references to other sections and attachments of the Aon report as appropriate, regarding the recommendation for Portfolio \#2 over the other portfolios analyzed.

## Rationale for Question:

To understand the approaches used in other jurisdictions for asset liability management.

## RESPONSE:

The referenced attachments relate to the asset only optimization. These attachments were provided prior to the completion of Phase 1 of the ALM study. This asset only optimization did not incorporate claims liabilities in the analysis. Instead, the referenced attachments were provided as an initial starting point to the more complex analysis to be completed in Phase 2.

The asset-liability optimization conducted in Phase 2 incorporated both assets and liabilities. This full optimization completed for Phase 2 became the basis for the recommended portfolio \#2.

## PUB (MPI) 2-36

| Volume: | PUB/MPI I-51 <br> PUB/MPI I-18 (2015 <br> GRA) | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Investment Income |  |  |
| Sub Topic: |  |  |  |
| Issue: | Asset Liability Management Study |  |  |

Preamble: At last year's GRA, MPI was ordered to file, and did file a copy of the Request for Proposal for the ALM Study together with the Service Agreement (unsigned) with Aon Hewitt.

While the Board in Order 98/14 did not require that MPI respond to CAC/MPI I-56(c), wherein an engagement letter/service contract was requested, it is not the case that this directive should be interpreted as a general rule that the Corporation is not required to produce information relating to the engagement of consultants, including the filing of engagement letters.

## Question:

a) Please file the engagement letter for the Aon assignment in this proceeding.
b) Please file the statement of work for the Asset Liability Management Study and detail any changes to the scope of the study from that filed last year as PUB/MPI I-18 Attachment B.

## Rationale for Question:

Given the importance of investment income to the Corporation's forecasted net financial result for rate setting purposes, and the significant impact that the portfolio mix has upon MPI's investment income, the Board must understand fully the recommendations of Aon, and the scope of its review.

## RESPONSE:

a) and b)

Please see 2015 GRA PUB (MPI) 1-18(a) Attachment B page 5065.

Link to 2015 GRA:
http://www.mpi.mb.ca/en/Newsroom/Rate-Application/Pages/2015/GRA/2015 GRA.pdf

There are no changes to the scope of the study. This document serves as the only contract, (or engagement letter or Statement of Work) between MPI and Aon Hewitt.

## PUB (MPI) 2-37

| Volume: | PUB/MPI I-52 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Investment Income |  |  |
| Sub Topic: |  |  |  |
| Issue: | Asset Liability Management Study |  |  |

Preamble: The Corporation has stated that Aon Hewitt presented to it the Phase 1 draft ALM report on September 15, 2014, that the Corporation received an update on October 1, 2014 and that the final draft of the Phase 1 report was received on October 6, 2014.

At last year's GRA hearing, Mr. Dan Guimond testified on October 23, 2014 (commencing at page 383 of the transcript) that there were some meetings with Aon to go over some preliminary information, which he characterized as "a preliminary discussion in terms of options. And so no -- no clear direction or decision at this point in time" (relative to cash flow matching).

At last year's GRA hearing, Ms. Heather Reichert testified on October 29, 2014 (commencing at page 1113 of the transcript) as follows:
"Q: And as Mr. Guimond told us last week, Phase 1 is on track to be completed by the end of 2014. The Corporation doesn't have any preliminary findings or conclusions yet?

A: That's correct."

## Question:

Please reconcile the response to PUB/MPI I-52, and in particular the fact that the Corporation had received the final Phase 1 report on October 6, 2014, with the oral evidence referenced above.

## Rationale for Question:

To understand the process related to the review of the report by the Corporation.

## RESPONSE:

As indicated in the response to PUB (MPI) 2-35, the Phase 1 analysis was based on an asset only optimization and was preliminary in nature, which is why the recommended interest rate hedging strategy changed between the Phase 1 report and the Phase 2 report. The more complex analysis conducted in Phase 2 that incorporated both assets and liabilities was not completed until December 2014. This full optimization completed for Phase 2 became the basis for the recommended portfolio \#2 and the duration matching strategy.

## PUB (MPI) 2-38

| Volume: | PUB/MPI I-53, <br> Investment Income <br> Attachment C | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Investment Income |  |  |
| Sub Topic: |  |  |  |
| Issue: | Asset Liability Management Study |  |  |

## Question:

a) With respect to the chart shown on Investment Income - Attachment C Page 34:
i. Please summarize the significant differences in modeling assumptions and approaches between the Base Case scenario modeled by AON, and the Basic GRA forecast based on the Corporation's financial model.
ii. Please indicate whether the horizontal $x$-axis relates to average annual volatility of Corporate or Basic retained earnings.
iii. Please provide details for the calculation of "average annual volatility of retained earnings", and an explanatory description of the proper interpretation of a given value on this scale.
iv. Please confirm that the hedging strategies being tested (cash flow match, bucket, duration match) are being modeled for the Corporation as a whole, and not for Basic in isolation.
b) With respect to Investment Income - Attachment C - Appendices B and C, please reconcile and explain the $\$ 58$ million difference in mean Basic Net Income for 2014/15 for the Base Case scenario on page 74 versus that of the Recommended Portfolio on page 87.
c) With reference to Investment Income - Attachment C Appendix E as appropriate, please discuss the advantages and disadvantages of segregating the Basic investment portfolio (from that supporting the competitive lines and the pension
obligations), both in general and specifically with respect to addressing Basic interest rate risk.

## Rationale for Question:

To understand the implications for revenue requirement of implementing an alternative interest rate mitigation strategy.

## RESPONSE:

a)
i. Please see table below.

Summary of Significant Differences in Modeling Assumptions and Approaches

|  | Aon Hewitt | MPI Financial Model (2016 GRA) |
| :--- | :--- | :--- |
| Purpose | First, risk diagnosis in the base case. <br> Second, optimization of liability hedging <br> strategy and composition of the growth <br> portfolio. | To determine basic rates on a break-even <br> basis |
| Starting Point and <br> Outlook Period | February 28, 2014 with a 10 year outlook | February 28, 2015 with a 5 year outlook. |
| Forecasting <br> Methodology | 1,000 scenarios were stochastically <br> generated using Aon's proprietary <br> economic scenario generator | Model is run on a deterministic basis based <br> on best estimates |
| Capital Market <br> Assumptions | See Investment Document Attachment C <br> PDF page 101 for capital market <br> assumptions as of as of August 2014. | See Investment Income Document <br> Sections 2 to 8. Capital market <br> assumptions are based on data up to <br> February 28, 2015. |
| Interest Rate <br> Hedging Strategy | In the base scenario, the Fixed Income <br> portfolio is assumed to follow a Bucket <br> Approach to liability matching. | Full duration matching of fixed income and <br> claims liabilities |
| RSR Assumptions | The Desired State rules apply to the RSR - <br> the targets are 100\% of the MCT value for <br> the upper bound and 65\% of the MCT <br> value for the lower bound (as a proxy to <br> DCAT modeling methodology) | The upper target is 100\% MCT. The lower <br> target is based on DCAT results for total <br> equity. |

Detailed information on Aon Hewitt's assumptions and methodologies are provided in the Investment document, Attachment C, Appendix D of the ALM Phase 2 report (PDF pages 97 to 103).
ii. The horizontal $x$-axis is basic retained earnings.
iii. The Average Annual Volatility of Retained Earnings is the average, over the projection period, of the yearly standard deviations of Basic Retained Earnings. For example, the value for the Base Case on Investment Income - Attachment C page 34 is 124 . This number is the average of the "Standard Deviation" row on page 26, excluding the first year, as it is not stochastic. This statistic captures the variability of Retained Earnings, which ultimately translates into volatility of premium adjustments. As far as interpretation: the lower the number, the more retained earnings are expected to be within a small range. Visually, a lower standard deviation of retained earnings corresponds to a "thinner" funnel graph on page 26; likewise, a higher standard deviation of retained earnings corresponds to a "fatter" funnel graph.
iv. Yes, the hedging strategies were tested for the Corporation as a whole. However, Basic net income and Basic retained earnings were referenced in the main report since rate setting is based on the Basic line of business.
b) Two items explain the $\$ 58$ million difference in mean Basic Net Income for 2014/15 for the Base Case scenario on page 74 versus that of the Recommended Portfolio on page 87.

First, approximately $\$ 19$ million more is transferred from AOCI for the recommended portfolio than in the Base Case. This is because changing from the previous asset allocation to the recommended portfolio causes higher turnover within the equity portfolio, therefore a higher portion of the previously unrealized gains are realized.

Secondly, for the recommended portfolio, the "Adjustment for Change in Liabilities" is approximately \$40M higher than for the Base Case. This item captures the change in liabilities due to the projected change in the liabilities discount rate year over year. The discount rate is 20 basis points higher for the recommended portfolio vs. the Base Case because the recommended portfolio uses the duration matching approach which is assumed to yield 20 basis points more than the Base Case (which uses the Bucket Approach).

Therefore, the liabilities are approximately $\$ 40 \mathrm{M}$ lower in the case of the recommended portfolio due to the higher discount rate and this flows through as additional net income.

The sum of these two items accounts for the difference in the Net Income between the Base Case and the recommended portfolio.
c) Basic interest rate risk is managed by matching the dollar amount and duration of the fixed income portfolio to the dollar amount and duration of the claims liabilities.

The idea of creating a segregated investment portfolio by line of business was considered (see Appendix E of Phase 2 - Part A Report). However, that would require matching only fixed income assets to the claims liability and the loss of growth assets would significantly reduce the return attributable to the basic line of business. A rate increase might be required to make up for the lower investment income.

The remaining growth assets would be matched to the competitive lines of business and to the pension liability. This portfolio containing equities, real estate and infrastructure would have a risk profile that is excessive with highly volatile returns. Some equities would likely need to be sold and replaced with bonds in order to reduce the volatility of the portfolio, which would further reduce investment income.

The compromise is to retain a co-mingled fund with a single asset allocation for all lines of business and the pension plan. As Aon pointed out in Appendix E,

- If a separate trust is established, this will increase administration and other costs. In addition, trust and funding rules would apply.
- Even if the separation is informal (ie: on paper), the structure will be more complex for monitoring and reporting.
- In order to invest in bonds in the pension plan's IPS, it is critical to separate the portfolio in a way that will not impact the insurance liability discount rate.
- MPI must determine if the additional complexity is worth the effort.

Adopting a unique investment policy for each line of business would require wholesale change, new bank accounts, changes to our holdings, etc. It was determined that the additional complexity was not worth the effort as the aggregate of the unique portfolio's for each line of business may not be significantly different than our current co-mingled fund.

## PUB (MPI) 2-39

| Volume: | PUB/MPI I-13, REV.1.2 | Page No.: | REV.1.2, Pg. 11 |
| :--- | :--- | :--- | :--- |
| Topic: | Motor Vehicle Premiums |  |  |
| Sub Topic: |  |  |  |
| Issue: | Upgrade Factor |  |  |

## Question:

Please provide a table indicating the actual upgrade factor for the last ten fiscal years (if data is readily available) and the prime interest rate prevalent during each of those years, and test the strength of any correlation between the two time series.

## Rationale for Question:

To understand whether there is a correlation between borrowing costs and the upgrade of vehicles, to assess the reasonableness of the upgrade factor used in light of the lower interest rate environment.

## RESPONSE:

Vehicle upgrade factor and the prime interest rate are statistically significantly correlated at the 0.05 level of significance. However, it is not clear if the prime rate is influencing the declining vehicle upgrade. There may be other contributing factors that would create this decline in vehicle upgrade. See the table below.

| Insurance Year | Vehicle Upgrade | Prime Rate |
| :---: | :---: | :---: |
| $2005 / 06$ | $4.14 \%$ | $5.25 \%$ |
| $2006 / 07$ | $3.28 \%$ | $6.00 \%$ |
| $2007 / 08$ | $3.90 \%$ | $5.75 \%$ |
| $2008 / 09$ | $3.78 \%$ | $3.00 \%$ |
| $2009 / 10$ | $2.90 \%$ | $2.25 \%$ |
| $2010 / 11$ | $2.72 \%$ | $3.00 \%$ |
| $2011 / 12$ | $2.60 \%$ | $3.00 \%$ |
| $2012 / 13$ | $2.56 \%$ | $3.00 \%$ |
| $2013 / 14$ | $2.58 \%$ | $3.00 \%$ |
| $2014 / 15$ | $2.58 \%$ | $2.85 \%$ |
| Correlation | $68.27 \%$ |  |



## PUB (MPI) 2-40

| Volume: | CAC/MPI I-73, First <br> Quarter Report AI.6 | Page No.: |  |
| :--- | :--- | :--- | :--- |
| Topic: | Financial Forecast |  |  |
| Sub Topic: |  |  |  |
| Issue: | Interest Rate Forecasting |  |  |

## Preamble:

The ten year Canada interest rate increased during the first three months of the fiscal year resulting in $\$ 50.3$ million unrealized loss of FVTPL bonds. MPI has indicated that it has adopted Aon Hewitt's recommendation regarding the calculation of the discount rate for the claims liabilities as of March 2015.

## Question:

a) Please indicate how interest rates changed during the quarter and the impact on the provision for Basic unpaid claims at the quarter-end, Basic investment income for the quarter and Basic net income for the quarter.
b) Please provide a comparison of the discount rate prepared under the previous method with that adopted in March 2015.
c) Please provide the supporting calculations with explanation of the determination of the discount rate used at May 31, 2015.
d) Please provide a back test of the financial model utilizing actual 2014/15 experience to parameterize the model looking forward from February 28, 2014, comparing the model output with actual 2014/15 results, discussing any significant differences.

## Rationale for Question:

To assess whether the financial model is reasonably forecasting the impact of changes in interest rates on financial results.

## RESPONSE:

a) The unrealized loss of $\$ 50.3$ million for FVTPL bonds over the fiscal quarter is for MPI's combined lines of business; the unrealized loss attributable to the Basic line of business is $\$ 41.9$ million ( $83.3 \% \times \$ 50.3$ million). Claim liabilities decreased by $\$ 41.7$ million over the quarter. The duration of the bond portfolio exceeded the duration of the claims liabilities by 0.2 years over fiscal Q1. As a result, the fixed income portfolio was more sensitive to changes in interest rates than the claims liabilities which caused the market value of the total fixed income portfolio to fall by more than the claims liabilities.

The market yield on the FVTPL bonds changed from 2.27\% at February 28, 2015 to $2.61 \%$ at May 31, 2015. The 34 basis point increase in interest rates led to investment income of $-\$ 17.7$ million for the combined lines of business (Basic investment income was - $\$ 15.2$ million). The discount rate for the claims liabilities rose by $0.25 \%$ for the quarter (from 2.92\% in February 28, 2015 to $3.17 \%$ at May 31, 2015); the increase in the discount rate led to a decrease in claim liabilities over the quarter of $\$ 41.7$ million. The net income for the combined lines of business was $\$ 23.0$ million (Basic net income was $\$ 19.8$ million).
b) The new methodology for calculating the discount rate on a bond by bond basis was implemented March 2015. The table below compares the new methodology with the actual discount rate for Fiscal Years 2013/14 and 2014/15.

|  | New Methodology (Bond by Bond Back tested Results) | MPI Actual Discount Rate (Old method) | Difference |
| :---: | :---: | :---: | :---: |
| Mar-13 | 3.70\% | 3.51\% | 0.19\% |
| Apr-13 | 3.68\% | 3.53\% | 0.15\% |
| May-13 | 3.63\% | 3.53\% | 0.10\% |
| Jun-13 | 3.80\% | 3.74\% | 0.07\% |
| Jul-13 | 3.83\% | 3.75\% | 0.09\% |
| Aug-13 | 3.93\% | 3.85\% | 0.09\% |
| Sep-13 | 4.04\% | 3.92\% | 0.12\% |
| Oct-13 | 4.02\% | 3.90\% | 0.13\% |
| Nov-13 | 4.03\% | 3.89\% | 0.14\% |
| Dec-13 | 3.99\% | 3.88\% | 0.11\% |
| Jan-14 | 3.77\% | 3.66\% | 0.11\% |
| Feb-14 | 3.76\% | 3.68\% | 0.08\% |
| Mar-14 | 3.83\% | 3.73\% | 0.10\% |
| Apr-14 | 3.79\% | 3.68\% | 0.11\% |
| May-14 | 3.71\% | 3.64\% | 0.07\% |
| Jun-14 | 3.71\% | 3.65\% | 0.06\% |
| Jul-14 | 3.69\% | 3.63\% | 0.06\% |
| Aug-14 | 3.57\% | 3.50\% | 0.07\% |
| Sep-14 | 3.64\% | 3.57\% | 0.07\% |
| Oct-14 | 3.62\% | 3.54\% | 0.08\% |
| Nov-14 | 3.47\% | 3.39\% | 0.08\% |
| Dec-14 | 3.42\% | 3.35\% | 0.07\% |
| Jan-15 | 2.94\% | 2.94\% | 0.00\% |
| Feb-15 | 2.98\% | 2.91\% | 0.07\% |

c) The discount rate for the claims liabilities is calculated by using the Excel function "=SUMPRODUCT". The SUMPRODUCT function allows for two or more arrays (or sets) of numbers to be multiplied by their corresponding items within the arrays and returns the sum of the results.

Three arrays are used: Market Yield, Duration, and Weighted Average \% of Market Value of the Corporation's bond portfolio; each array is determined on a security by security basis.

The calculation is as follows:
Interest Rate to discount claims liabilities (\%) =

SUMPRODUCT(Market Yield, Duration, Weighted Average \% of Market Value) / SUMPRODUCT(Duration, Weighted Average \% of Market Value)

As at May 31, 2015, the Corporation's bond portfolio consisted of 1,384 securities with an approximate market value of over $\$ 1.68$ billion, and duration adjusted weighted average yield of $3.25 \%$.
d) The 2014/15 financial model was back-tested using actual 2014/15 results and the comparison is located in the table below.

## Manitoba Public Insurance

## Multi-year - Statement of Operations

| 2014/15 Actual Interest Rate Experience (C\$ 000s, except where noted) | For the Years Ended February, |  |  |
| :---: | :---: | :---: | :---: |
|  | Back Test 2015A | $\begin{aligned} & \text { Base } \\ & \text { 2015A } \end{aligned}$ | Diff |
| BASIC |  |  |  |
| Motor Vehicles | 794,052 | 794,052 | - |
| Drivers | 44,642 | 44,642 | - |
| Reinsurance Ceded | -13,829 | -13,829 | - |
| Total Net Premiums Written | 824,865 | 824,865 | - |
| Net Premiums Earned |  |  |  |
| Motor Vehicles | 774,785 | 774,785 | - |
| Drivers | 42,926 | 42,926 | - |
| Reinsurance Ceded | -13,829 | -13,829 | - |
| Total Net Premiums Earned | 803,882 | 803,882 | - |
| Service Fees \& Other Revenues | 19,475 | 19,475 | - |
| Total Earned Revenues | 823,357 | 823,357 | - |
| Net Claims Incurred | 746,517 | 745,837 | 680 |
| Claims Expense | 116,578 | 116,578 | - |
| Road Safety/Loss Prevention | 11,359 | 11,359 | - |
| Total Claims Costs | 874,453 | 873,774 | 679 |
| Expenses |  |  |  |
| Operating | 74,283 | 74,283 | - |
| Commissions | 32,845 | 32,845 | - |
| Premium Taxes | 24,531 | 24,531 | - |
| Regulatory/Appeal | 3,935 | 3,935 | - |
| Total Expenses | 135,594 | 135,594 | - |
| Underwriting Income (Loss) | -186,691 | -186,011 | 680 |
| Investment Income | 185,045 | 188,451 | 3,406 |
| Net Income (Loss) from Operations | -1,645 | 2,440 | 4,085 |

The back test showed that Investment Income had the largest variance compared to actual results ( $\$ 3.4$ million). This investment income variance is primarily due to the large interest rate movements and a simultaneous increase in marketable bond duration over the fiscal year.

- The Government of Canada 10 year bond rate decreased by 1.13\% (from 2.43\% to $1.30 \%$ ) in 2014/15.
- The average duration of the marketable bond portfolio increased from 8.3 years in Q1 2014/15 to 10.9 years in Q4 2014/15.

The investment model estimates the gain or loss on marketable bonds using both the average duration and the change in interest rates on a quarterly basis. Since both of these factors changed by relatively large amounts throughout the fiscal year and individual trades within the bond portfolio are not captured by the model, some of the capital gain/loss impacts of changes in interest rates on the marketable bond portfolio are not captured in the quarterly model.

Overall, the $\$ 3.4$ million variance between the modeled investment income and the actual investment income is reasonable relative to the size of the total investment portfolio ( $0.13 \%$ of a $\$ 2,602$ million portfolio).

Net claims incurred had the next largest variance compared to actual results of $\$ 0.7$ million. This difference is largely due to the model discounting all unpaid claims while actual results only discount bodily injury claims as they are affected the most by discounting.


[^0]:    ${ }^{1}$ Retirements year to date as of July 31st

[^1]:    Explanation of variance: Actual FTE counts were less than budget due to active management of vacancies to control costs.
    *due to reorganization occurring in June /2014 average actual counts represent a 9 month average

[^2]:    Note: Rounding may affect totals

