ADDENDA CAPITAL

Toronto Investment Board

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Presented on March 9, 2021

Discussion Topics

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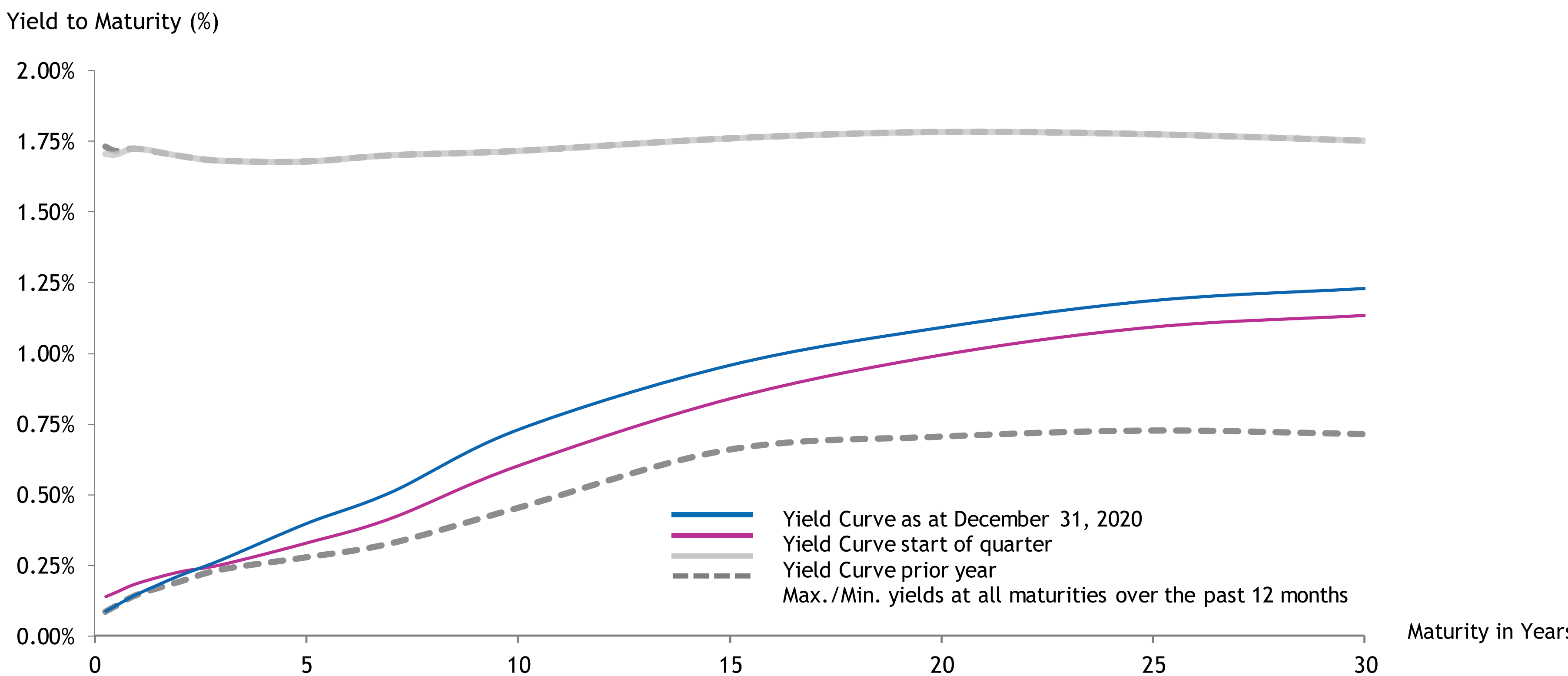
Market Review

Government of Canada Interest Rates in 2020

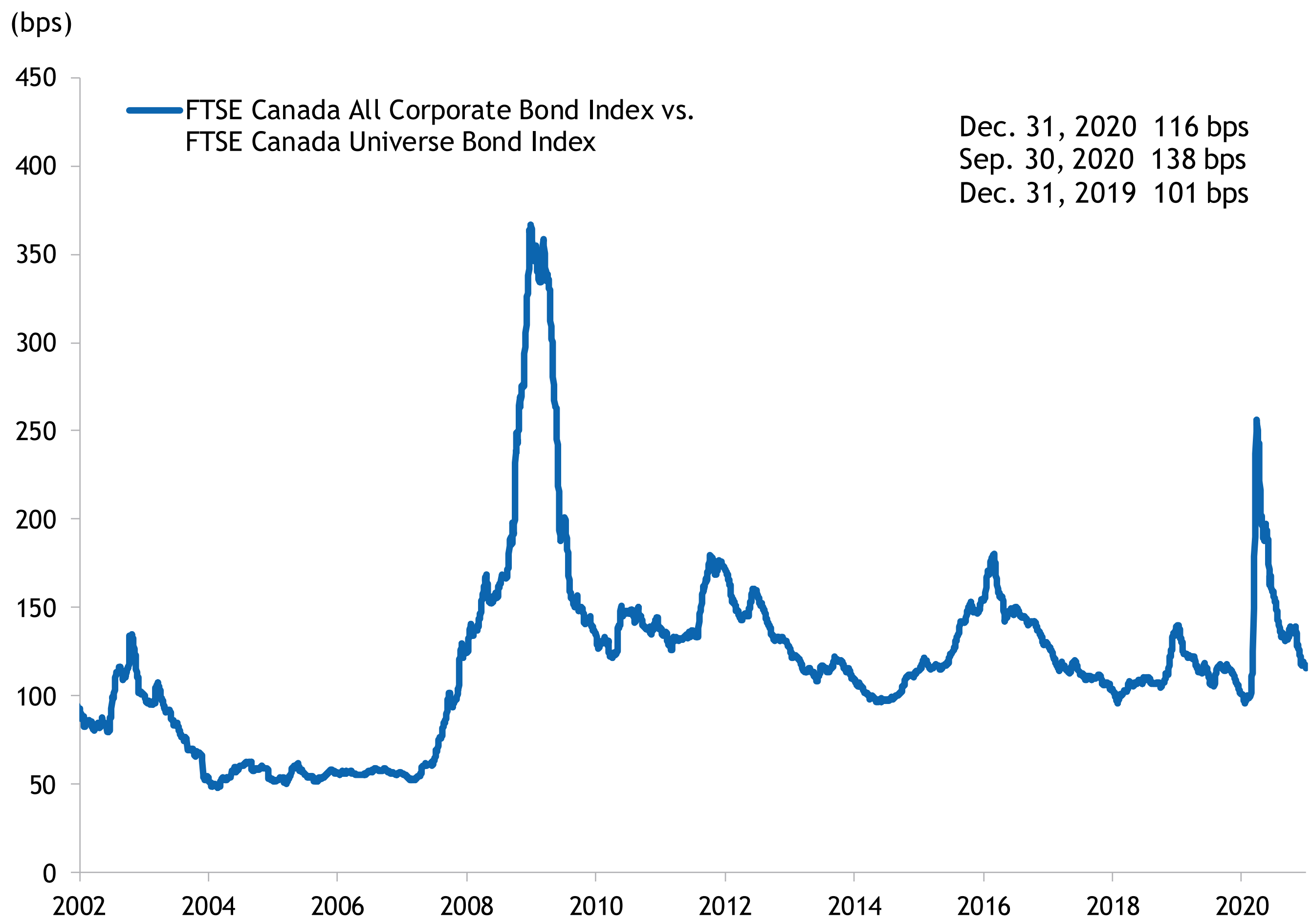


	CAN 3m	CAN 6m	CAN 1y	CAN 2y	CAN 3y	CAN 5y	CAN 7y	CAN 10y	CAN 15y	CAN 20y	CAN 25y	CAN 30y
2020-12-31	0.09%	0.11%	0.15%	0.21%	0.27%	0.40%	0.51%	0.73%	0.96%	1.09%	1.19%	1.23%
2020-09-30	0.14%	0.16%	0.19%	0.23%	0.25%	0.33%	0.42%	0.60%	0.84%	0.99%	1.09%	1.13%
2019-12-31	1.71%	1.70%	1.72%	1.70%	1.68%	1.68%	1.70%	1.72%	1.76%	1.79%	1.78%	1.75%

As at December 31, 2020

Note: Yields are calculated using constant maturity par yields generated by the Addenda Capital yield curve algorithm. The estimated yield curves are based on FTSE Canada daily prices.
Sources: FTSE Canada, Addenda Capital

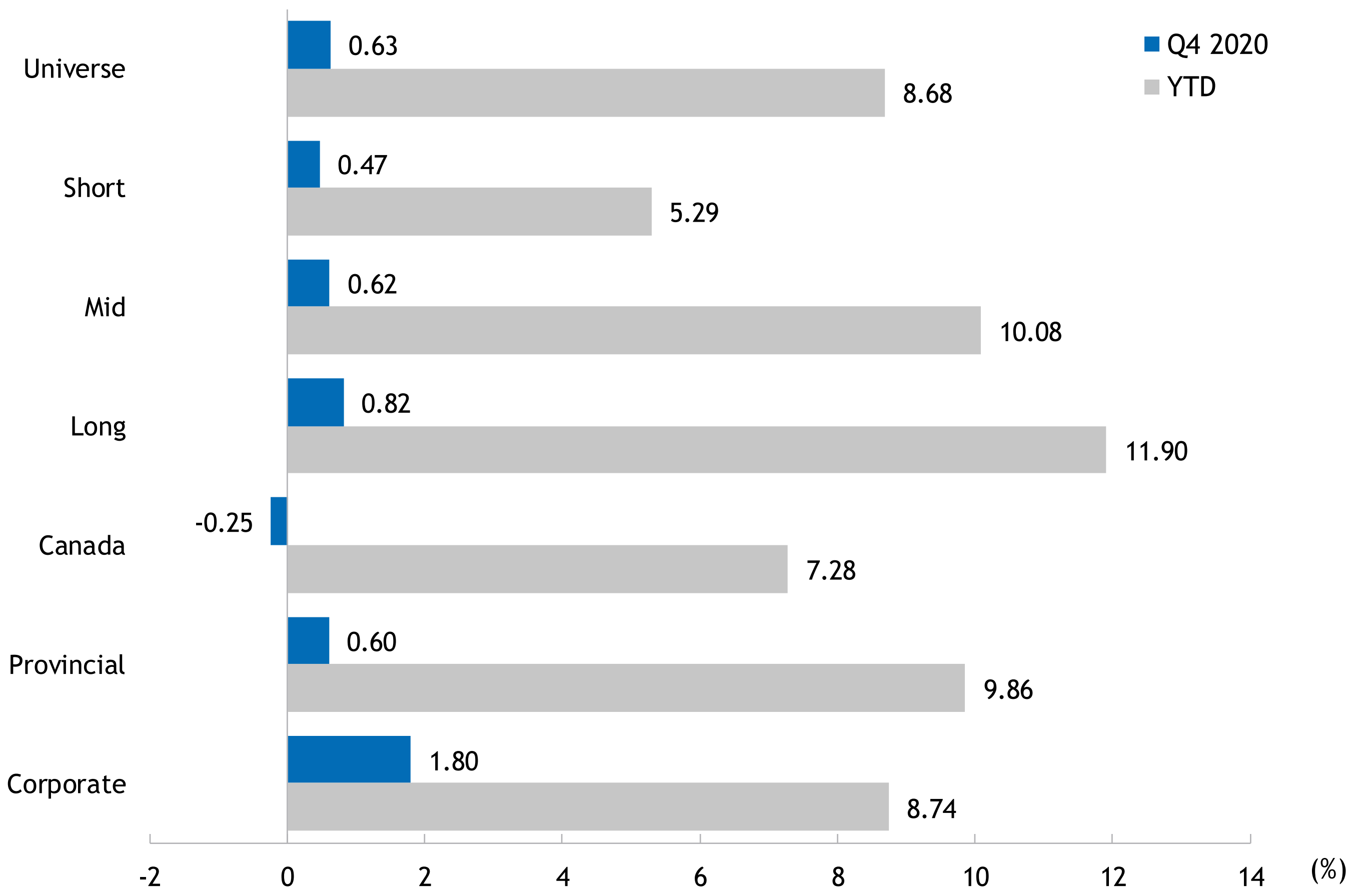
Universe Corporate Bond Spreads



As at December 31, 2020

Sources: FTSE Canada, Addenda Capital

Canadian Bond Market Returns

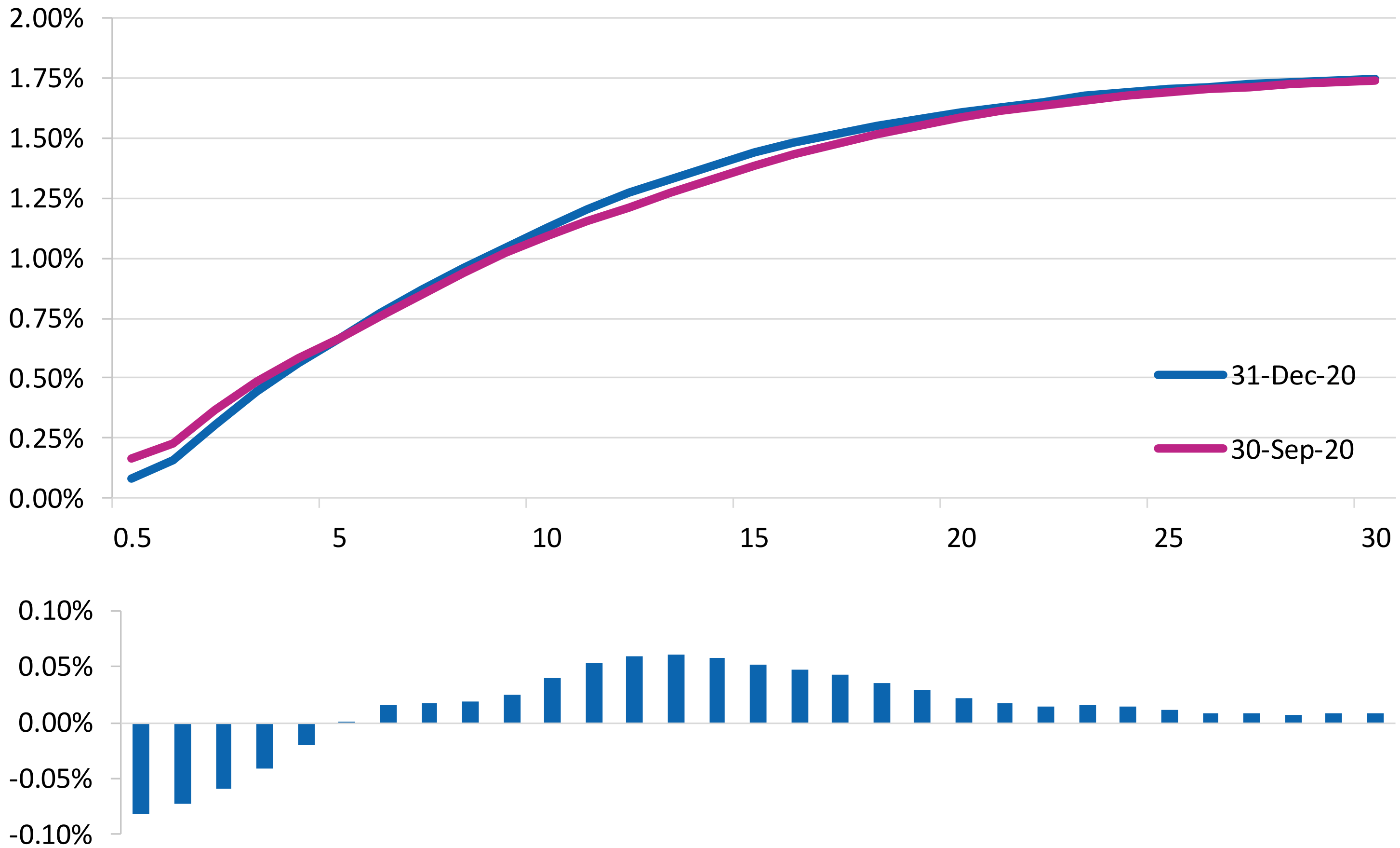


As at December 31, 2020

Source: FTSE Canada

Portfolio Performance and Characteristics

Liability Discount Curve*



As at December 31, 2020

*Discount Curve Composition 43% Federal, 43% Provincial, 14% Corporate

Source: Addenda Capital

Master Account Sinking Fund – Q3 2020 Returns

City of Toronto - Master account Sinking Fund
Account Number: A1327
Currency: CAD

Summary of Performance Results
For the periods ending September 30, 2020

City of Toronto - Master account Sinking Fund

	1 month	Quarter to date	Year to date	1 yr	ANNUALIZED RETURNS 2 yrs	3 yrs	4 yrs	5 yrs	Start (2019-06-30)
A1327	0.35%	0.03%	8.58%	7.53%	-	-	-	-	7.13%
Benchmark Index *	0.58%	-0.24%	11.56%	9.21%	-	-	-	-	9.13%
Added Value	-23	27	-298	-168	-	-	-	-	-200

	ANNUAL RETURNS AS OF DECEMBER 31 2019	2018	2017	2016	2015	2014	2013	2012	2011
A1327	-	-	-	-	-	-	-	-	-
Benchmark Index *	-	-	-	-	-	-	-	-	-
Added Value	-	-	-	-	-	-	-	-	-

The portfolio's performance returns are calculated using the time-weighted rate of return methodology and represent total returns (including income, realized and non-realized gains and losses). The performance results exclude the portfolio's management and custodian fees. Valuations and rates of returns are computed and stated in the portfolio's base currency.
For the Addenda Pooled Funds, the investment performance is net of the Funds' administrative expenses (custodian, audit, and others). In addition, certain series are net of the Funds' management and performance fees, if applicable.

* Benchmark Index : Toronto Aggregate Liability Benchmark

- Outperformance in the quarter was primarily driven by narrowing credit spreads as stimulus hopes and commitments to easy monetary policy support risk assets
- The yield curve steepened modestly in the period with long rates rising which contributed negatively to performance as the portfolio is weight more heavily in long maturities in order to keep aggregate duration in line with the benchmark

Master Account Sinking Fund – Q4 2020 Returns

City of Toronto - Master account Sinking Fund

Account Number: A1327
Currency: CAD

Summary of Performance Results

For the periods ending December 31, 2020

City of Toronto - Master account Sinking Fund

					ANNUALIZED RETURNS				
	1 month	Quarter to date	Year to date	1 yr	2 yrs	3 yrs	4 yrs	5 yrs	Start (2019-06-30)
A1327	0.21%	0.72%	9.36%	9.36%	-	-	-	-	6.41%
Benchmark Index *	0.08%	0.28%	11.87%	11.87%	-	-	-	-	7.74%
Added Value	13	44	-251	-251	-	-	-	-	-133

	ANNUAL RETURNS AS OF DECEMBER 31								
	2020	2019	2018	2017	2016	2015	2014	2013	2012
A1327	9.36%	-	-	-	-	-	-	-	-
Benchmark Index *	11.87%	-	-	-	-	-	-	-	-
Added Value	-251	-	-	-	-	-	-	-	-

The portfolio's performance returns are calculated using the time-weighted rate of return methodology and represent total returns (including income, realized and non-realized gains and losses). The performance results exclude the portfolio's management and custodian fees. Valuations and rates of returns are computed and stated in the portfolio's base currency.
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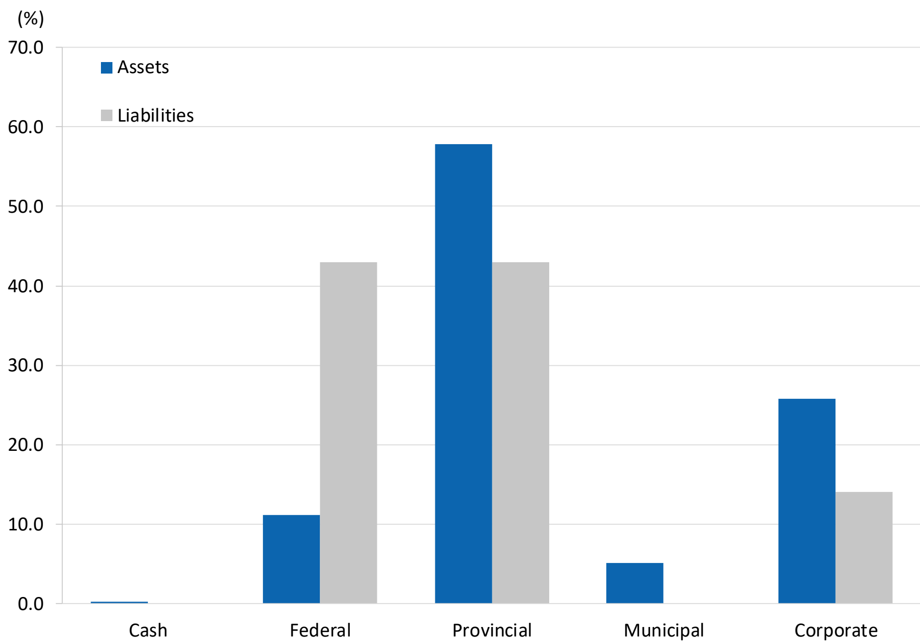
* Benchmark Index : Toronto Aggregate Liability Benchmark

- The factors at play in Q3 carried over into Q4 as the yield curve continued to steepen with long rates rising and credit spreads continued to benefit not only from policy responses, but positive news on the vaccination front as well as significant demand from investors for any incremental yield
- Narrowing provincial spreads were the main contributor to outperformance in the period

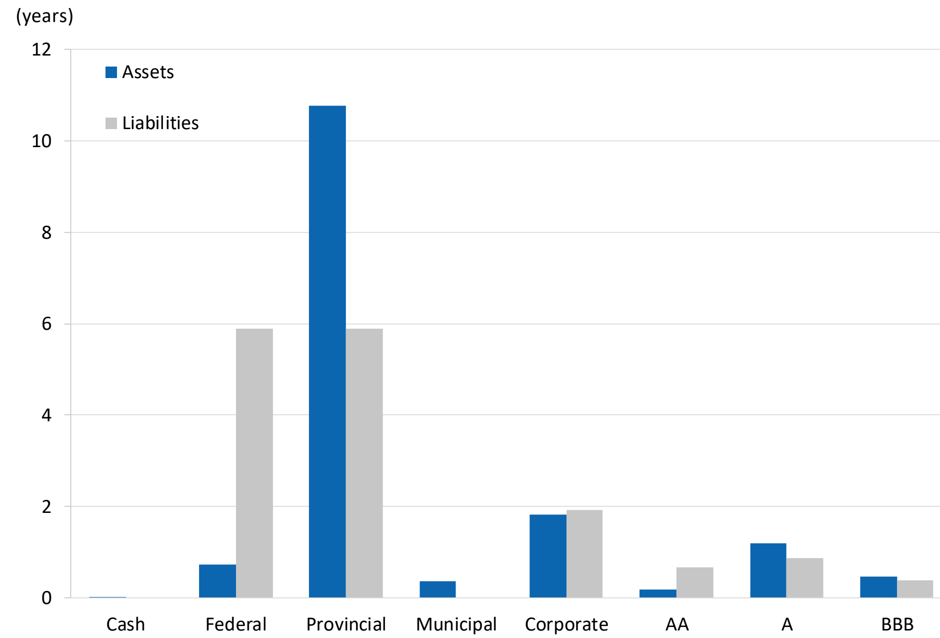
Portfolio Characteristics

Sector Weights



Weights	Assets	Liabilities
Cash	0.3%	0.0%
Federal	11.1%	43.0%
Provincial	57.9%	43.0%
Municipal	5.1%	0.0%
Corporate	25.7%	14.0%

Sector Duration Contribution



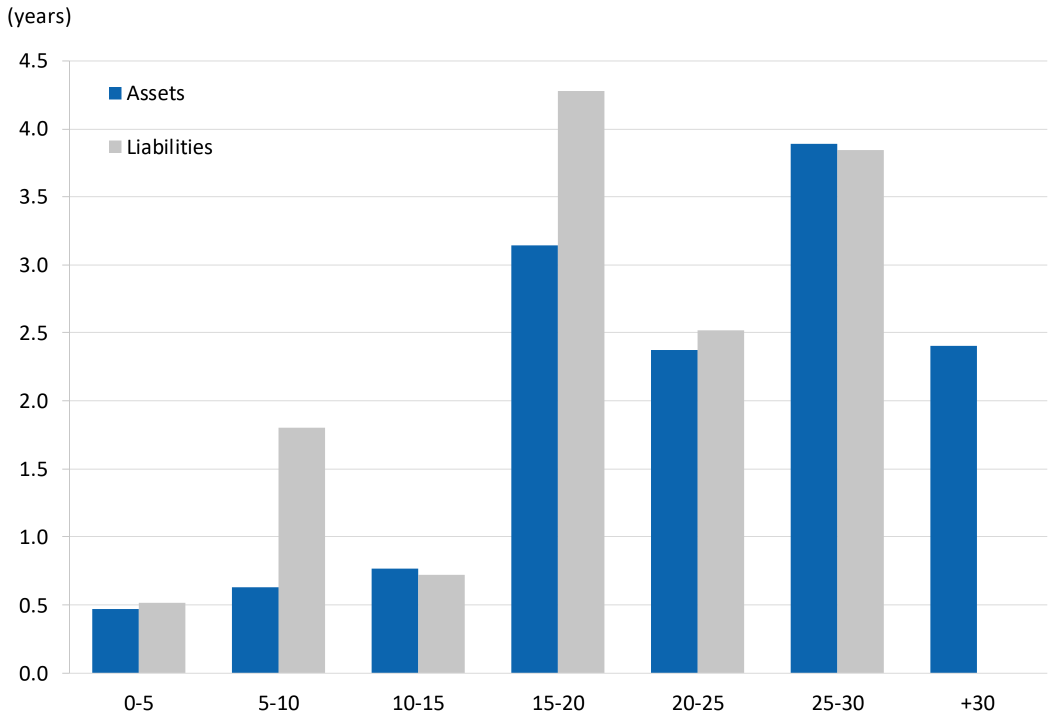
Duration Contribution	Assets	Liabilities
Cash	0.00	0.00
Federal	0.72	5.88
Provincial	10.77	5.88
Municipal	0.37	0.00
Corporate	1.82	1.91
AA	*0.17*	*0.67*
A	*1.20*	*0.86*
BBB	*0.45*	*0.38*

As at December 31, 2020

Source: Addenda Capital

Risk Characteristics

Key Rate Durations



Risk Summary	Assets	Liabilities
Duration	13.67	13.45
Convexity		254.5
Average Term	14.5	13.3
Average Yield	1.58%	1.18%
Internal Rate of Return		1.62%

Key Rate Durations	Assets	Liabilities
0-5	0.47	0.51
5-10	0.63	1.80
10-15	0.76	0.72
15-20	3.14	4.28
20-25	2.37	2.52
25-30	3.89	3.84
+30	2.41	0.00

As at December 31, 2020

Source: Addenda Capital

Portfolio Activity Summary

- Allocated large sinking fund contributions in September ($166.0M) and December ($45.0M)
- Funds were used to improve key rate exposures in the 10-15 years and 15-20 years areas of the curve. As previously highlighted the large funding status mismatch requires an emphasis on long maturity exposures which presents curve risk. The contributions were used to mitigate some of this risk.
- Corporate credit spread duration was reduced further as credit spreads narrowed
- Corporate bond trades included sales of energy positions to add to infrastructure, renewable power and financials
- Asset duration was reduced modestly to align closer with the liability duration
- Although four new liabilities were added to the benchmark in the second half of the year, the weighted average liability duration finished unchanged at 13.45

Upcoming

- The portfolio will fund two principal repayments totaling $248.0M over the course of 2021

Impact Positioning

Impact Investments Exposure in the Portfolio

Impact Themes and Categories	Market Values ($M)	Weight (%)
Climate Change	178.7	24.0
Clean Transportation	7.0	0.9
Renewable Energy	171.7	23.1
Community Development	10.4	1.4
Credit Unions	8.0	1.1
Development Finance	2.4	0.3
Health and Wellness	4.3	0.6
Hospitals	4.3	0.6
Total	193.4	26.0

As at December 31, 2020

Market Outlook

2021 Macro Themes and Risks

Growth

- Economic growth supported by fiscal stimulus and historically high savings rate.
- Unemployment rate declines slowly as pandemic related closures reopen.

Inflation

- Inflation will experience cyclical pressure due to base effects as measures reflect the rebound from the depths of the pandemic lockdown period.
- Cyclical inflation may cause the yield curve to steepen.

Policy

- Central Bank monetary policy remains at effective lower bound and bond purchase programs continue.
- Modifications to quantitative easing programs could include a managed rate environment via yield curve control strategies.
- Fiscal stimulus is now present via sizable programs with potentially meaningful contributions to growth

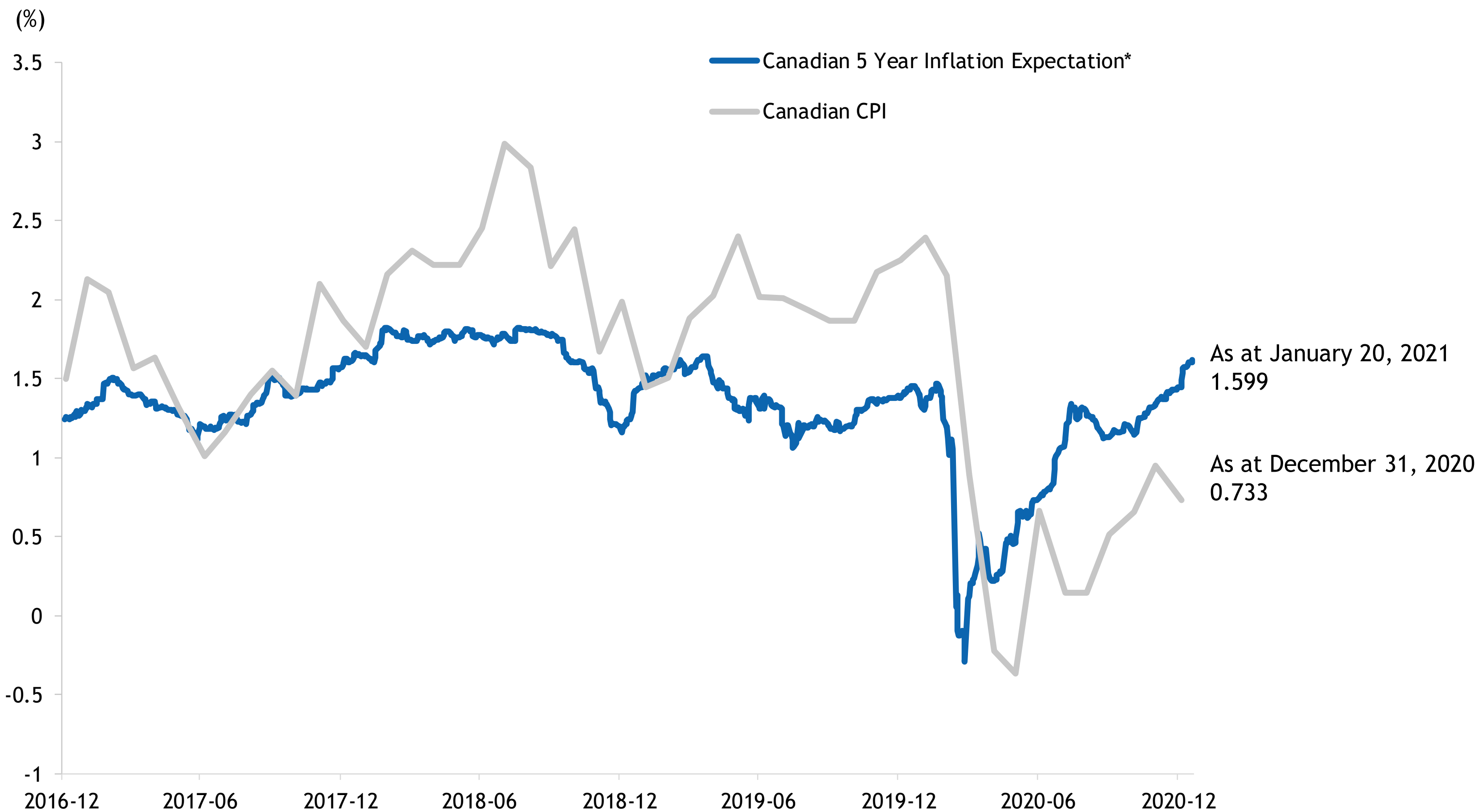
Risks

- Impact and timing of wide scale distribution of the various vaccines remains uncertain.
- Democrat control of all three branches of US Government may lead to more regulation and higher corporate taxes.
- Cyclical inflation resulting from supportive monetary and fiscal policy may drive longer term interest rates higher than expected.

Appendix

Reflation

Canadian 5 Year Inflation Expectation vs Canadian CPI

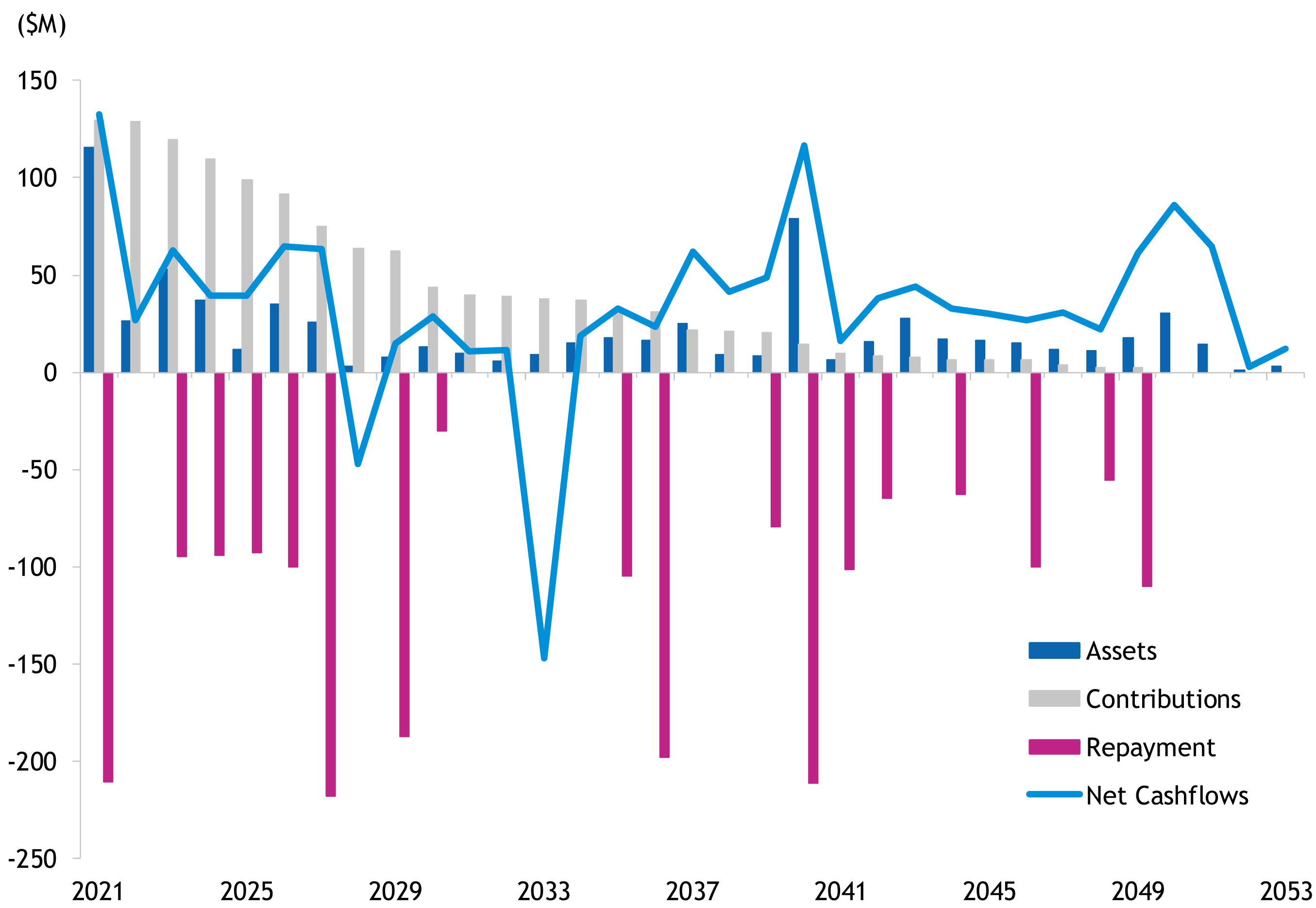


As at January 20, 2021

*Canadian 5 year nominal yield less real return bond yield

Source: Bloomberg

Cash Flow Present Values - Annual



As at February 12, 2021

Source: Addenda Capital

Liability Benchmark Composition Changes

Date	Benchmark Activity	Related Issue	Par Issue Amount	Benchmark Notional Liability
02-Jul-19	Maturity	4.50% 2019-12-02	-280,000,000	-140,000,000
01-Nov-19	Addition	2.65% 2029-11-09	300,000,000	105,000,000
01-Nov-19	Addition	2.60% 2039-09-24	200,000,000	70,000,000
22-Nov-19	Addition	2.80% 2049-11-22	350,000,000	122,500,000
16-Dec-19	Addition	2.65% 2029-11-09	100,000,000	35,000,000
15-May-20	Addition	2.65% 2029-11-09	200,000,000	70,000,000
30-Jun-20	Addition	1.60% 2030-12-02	100,000,000	35,000,000
14-Aug-20	Addition	0.00% 2040-07-10	6,250,000	2,187,500
25-Aug-20	Addition	2.15% 2040-08-25	300,000,000	105,000,000
09-Nov-20	Addition	2.80% 2049-11-22	250,000,000	87,500,000
16-Dec-20	Addition	2.60% 2039-09-24	130,000,000	45,500,000

As at December 31, 2020

Source: Addenda Capital

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FTSE Canada

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Refer to the Pooled Fund investment policies for more details regarding investment constraints.

Unless otherwise specified, assets are presented in Canadian dollars.