

RBC GAM long-term capital market assumptions

2025 update



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The New Year has begun with significant financial-market volatility as a variety of risks cloud the short-term outlook. But history suggests that growth in economies and corporate profits ultimately prevails over the longer term and, as we look past near-term challenges to the very long-term view, return potential for stocks and bonds remains appealing. We recognize, though, that stocks have had a great run over the past couple of years and valuations have swelled especially in U.S. large-cap growth stocks. As a result, our long-term return expectations have moderated across a variety of equity-market regions, most prominently in the U.S.

Last year was a good example of one where markets managed to fend off a variety of risks allowing stocks to continue along their upward trajectory (Exhibit 1). The most prominent macroeconomic risks of 2024 were recession fears, high inflation, monetary tightening and the U.S. presidential election, and all these risks diminished or resolved in a positive way for markets. The economy kept rolling along at an above-trend pace as consumers continued to spend because of a stable labour market and wealth gains from rising asset prices. Inflation, after a brief scare early in the year, carried on moderating towards the 2% central-bank target. The U.S. Federal Reserve (Fed) kicked off its monetary easing campaign, lowering its

Exhibit 1: Asset performance

Calendar year total return the next decade and beyond

2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
5% Growth	25% Small Cap	31% Emerging Markets	0% Aggregate Bonds	31% Value	32% Growth	40% REITS	23% Commodities	29% Growth	35% Growth
2% REITS	18% Mid Cap	26% Developed Markets	-1% Growth	31% Large Cap	25% Gold	39% Commodities	0% Gold	24% Large Cap	27% Gold
1% Large Cap	17% Value	26% Growth	-1% TIPS	30% Growth	18% Large Cap	31% Growth	-5% Value	21% Value	23% Large Cap
0% Aggregate Bonds	12% Emerging Markets	21% Large Cap	-2% Gold	29% REITS	15% Emerging Markets	29% Large Cap	-12% TIPS	17% Developed Markets	12% Mid Cap
0% Developed Markets	11% Commodities	15% Value	-4% Large Cap	24% Mid Cap	12% Mid Cap	27% Small Cap	-13% Aggregate Bonds	14% Mid Cap	12% Value
-2% TIPS	11% Large Cap	14% Mid Cap	-6% REITS	23% Small Cap	11% Small Cap	25% Value	-14% Mid Cap	14% Small Cap	11% Emerging Markets
-2% Small Cap	8% Gold	13% Small Cap	-8% Small Cap	22% Developed Markets	11% TIPS	23% Mid Cap	-15% Developed Markets	13% Gold	9% Commodities
-4% Mid Cap	8% REITS	12% Gold	-9% Value	20% Emerging Markets	9% Developed Markets	12% Developed Markets	-16% Small Cap	11% REITS	7% Small Cap
-4% Value	6% Growth	6% REITS	-12% Mid Cap	18% Gold	7% Aggregate Bonds	6% TIPS	-18% Emerging Markets	8% Emerging Markets	5% REITS
-11% Gold	5% TIPS	4% Commodities	-14% Commodities	16% Commodities	1% Value	1% Emerging Markets	-18% Large Cap	5% Aggregate Bonds	3% Developed Markets
-16% Emerging Markets	3% Aggregate Bonds	4% Aggregate Bonds	-15% Developed Markets	8% Aggregate Bonds	-5% REITS	-2% Aggregate Bonds	-26% REITS	3% TIPS	2% TIPS
-34% Commodities	1% Developed Markets	3% TIPS	-15% Emerging Markets	8% TIPS	-24% Commodities	-4% Gold	-29% Growth	-4% Commodities	1% Aggregate Bonds

Note: As of December 2024. Performance shown in U.S. dollars based on the following ETF tickers: large cap (SPY), mid cap (MID), small cap (IJR), growth (IUSG), value (IUSV), emerging markets (VWO), developed markets (VEA), aggregate bonds (AGG), REITS (VNQ), commodities (GSG), TIPS (TIP), gold (GLD).
Source: Piper Sandler

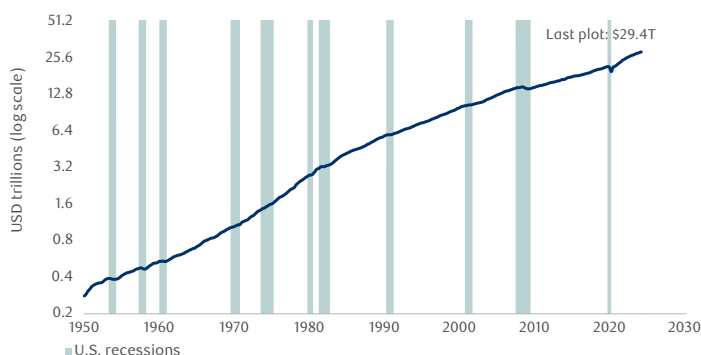
policy rate by 100 basis points to 4.5%, beginning with a 50-basis-point cut in September. The U.S. presidential race took some unexpected turns with the attempt on Trump's life and then when Biden dropped out and endorsed Harris. In the end, Trump won convincingly, and it was a boon for risk-asset prices and revived animal spirits as investors cheered the potential for tax cuts and less regulation.

The enormous growth in AI-related capital expenditures and hype around the promise of AI propelled the stocks of the Magnificent-7 mega-cap tech companies higher, pushing their share of the S&P 500 Index to over one-third and increasing concentration risk. Equity markets, especially those outside of the U.S., experienced more volatility and saw more muted gains. Yields rose sharply in many regions to end the year, with the yield on the U.S. 10-year bond rising 95 basis points from its mid-September low to 4.57%. All asset classes had positive returns in 2024, with U.S. equities and gold as the top performers and aggregate bonds as the worst. Over a long-term horizon, we remain constructive on the outlook for investment returns across a broad range of asset classes over the next decade and beyond, although we recognize that return potential has moderated somewhat given the magnitude of recent gains.

Financial markets and asset prices fluctuate regularly and are often subject to extreme swings that are difficult to anticipate. Forecasting near-term returns is especially challenging given the wide range of potential outcomes and elevated uncertainty over a short period of time. However, a look at history suggests that longer-term trends have been relatively stable. Since 1950, the economy went through 11 cycles of expansion and contraction and, while these periods are difficult to experience in the moment, they are almost imperceptible in a long-term chart of U.S. nominal GDP, which has trended up and to the right in nearly uninterrupted fashion (Exhibit 2). The S&P 500 Index and its earnings per share display similar trends, although with a bit more volatility (Exhibit 3). The upward trend in the stock market and earnings is clear even with eight bear markets, defined as a price decline of 20% or greater from a recent high, over the same time frame. Importantly, the economy, the stock market and earnings have always managed to recover from recessions or bear markets and then resume their upward trend. Since the 1950s, U.S. nominal GDP has grown at over 6% per year, stocks returned around 10% per year on a total-return basis and earnings rose over 6% per annum. These powerful long-term trends are very much core to our thinking and underpin our assumptions for long-term forecasting.

Exhibit 2: U.S. nominal GDP

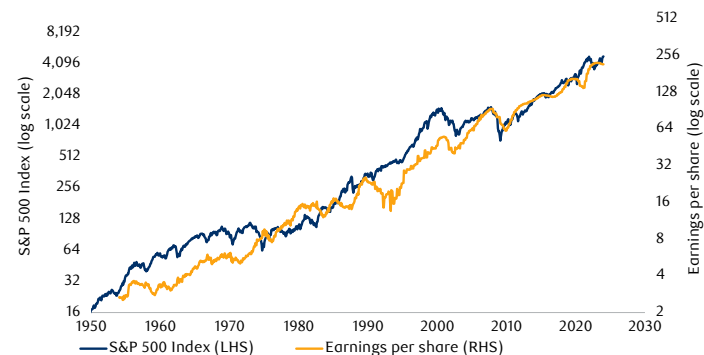
U.S. dollars, seasonally adjusted annual rate (SAAR)



Note: As of September 30, 2024. Source: Bureau of Economic Analysis

Exhibit 3: S&P 500 Index

Monthly data

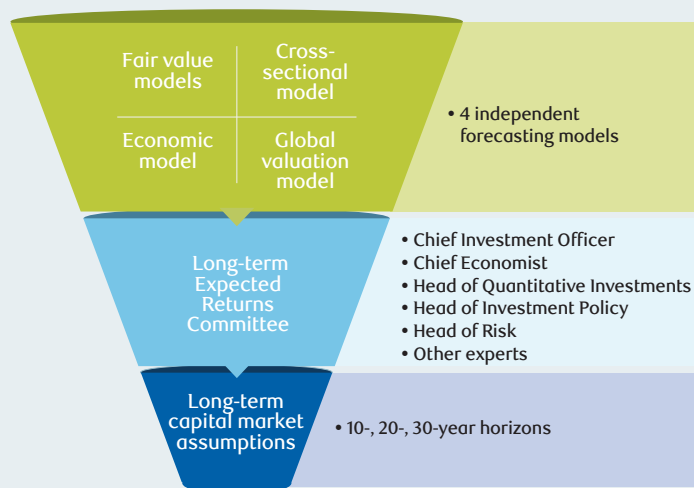


Note: As of December 31, 2024. Source: RBC GAM



With these long-term trends in mind, and using a collection of four distinct models, RBC GAM's Long-Term Expected Returns Committee (LTERC) generates capital-market assumptions spanning the next 10-, 20- and 30-year periods (Exhibit 4). Each model operates independently but shares a common approach of employing forward-looking parameters in the context of historical results and empirical relationships to provide a long-term view on asset classes. The underlying core assumptions, starting points and calculations differ by model but with a common goal of arriving at multidecade return forecasts for various asset classes. Details of these models are beyond the scope of this paper, but one point of common ground across the models is that the starting point of the forecast is critical. While long-term trends and predictions about the future tend to move glacially, financial markets can swing wildly from year to year or even month to month, and performance ultimately hinges on both the beginning and end point of the investment horizon.

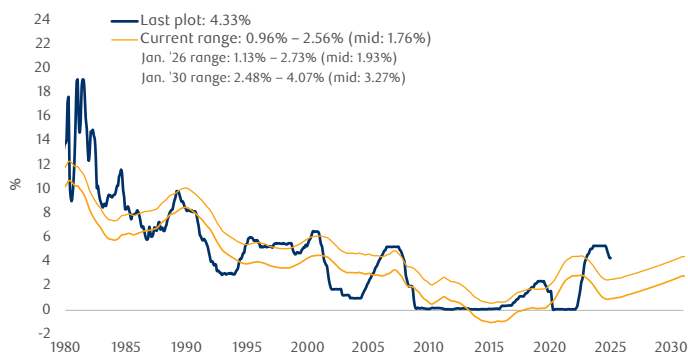
Exhibit 4: Long-term expected returns committee
Multi-model comprehensive approach



Source: RBC GAM

Cash and short-term money market instruments currently offer positive real (or after-inflation) returns for investors, a situation that has seldom occurred following the 2008-2009 Global Financial Crisis (GFC). Aggressive interest-rate hikes by central banks in 2022 and 2023 boosted overnight lending rates to a maximum of 5.50% in the U.S. and not far below that in many other developed markets. Many central banks began to cut interest rates last year after significant progress was made on bringing inflation back to targeted levels. The U.S. federal funds rate now sits at 4.50% after 100 basis points of cuts, a level that still offers investors a real return. In our view, the era immediately following the GFC characterized by near-zero or even slightly negative cash returns, was extraordinary and not likely to be repeated. We expect long-term returns for cash to exceed the expected rate of inflation going forward. That said, our cash return forecasts are slightly below the current short-term interest rates because, in our view, the current high level of interest rates is unlikely to be sustained over the longer term. Indeed, the U.S. federal funds rate is currently situated above the upper bound of our modelled equilibrium (Exhibit 5). We expect returns for cash to be around 3% per year if held over the longer term (i.e. decades) as interest rates, over the course of various cycles, will likely average around a neutral level that neither stimulates nor restricts the economy.

Exhibit 5: U.S. fed funds rate
Equilibrium range



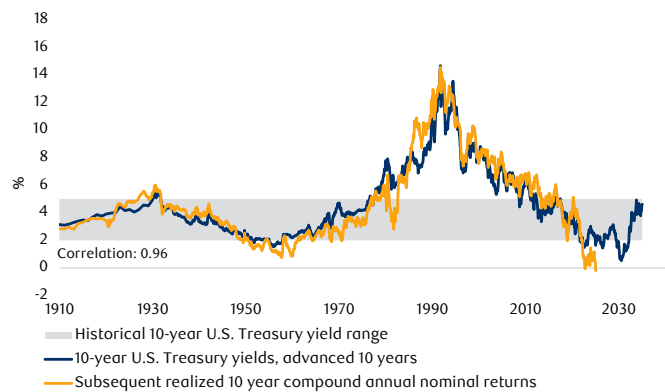
Note: As of January 24, 2025. Source: RBC GAM

Like short-term interest rates, bond yields rose by a meaningful amount since the first rate hike in 2022. Yields on sovereign bonds normalized from very low levels and are now at levels not seen in 17 years (Exhibit 6). This adjustment was painful for bond investors in 2022, but it set up much better return potential going forward. The yield-to-maturity on the U.S. 10-year Treasury bond has historically been an excellent predictor of what an investor would earn from buying and holding this bond for the full term. Looking at over 150 years of history, yields on the 10-year Treasury bond have mostly held in a range from 2% - 5%. Yields spent two and a half years beginning in the summer of 2019 below this range, indicating poor expected return on bonds. Since then, the U.S. 10-year yield has normalized and now sits at around 4.60%, pointing to a more attractive return and one that is consistent with long-term history. Yields rose in most markets to end the year 2024 reflecting economic growth, higher inflation expectations and concerns about unsustainable government debt loads. As a result, fixed-income returns were weak last year, but return expectations improved slightly and valuation risk was reduced.

Credit spreads, the extra yield offered by corporate bonds over corresponding sovereign benchmark bonds, are also important to future returns. Spreads have narrowed since the end of 2022, meaning investors are accepting less compensation for the additional credit risk associated with holding corporate bonds (Exhibit 7). Investment grade (IG) corporate bonds and high yield (HY) bonds are richly valued on this basis with the IG spread at 81 basis points versus the average of 120 basis points, and HY spread at 307 basis points versus the average of 514 basis points. A lower spread reduces the all-in yield, or compensation, available to investors on corporate and high-yield bonds, and any spread widening towards the average would be detrimental to returns. Therefore, our return forecasts for corporate and high-yield bonds were lowered compared to a year ago.

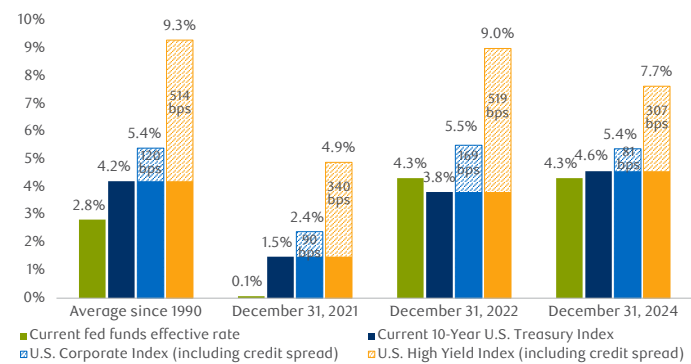
Global equities had an outstanding year in 2024. But much like in 2023, outsized returns were concentrated within the U.S. large-cap growth space as the “Magnificent-7” skyrocketed 56.0% on AI excitement (Exhibit 8). The S&P 500 followed up an impressive 26.3% gain in 2023 with a 23.3% price return in 2024, marking back-to-back years 20% gains – a feat not accomplished in two and a half decades. Non-U.S. stocks performed in line with long-term expectations, rising between 5% and 8% except in Europe, which stood

Exhibit 6: U.S. 10-year Treasury note and returns



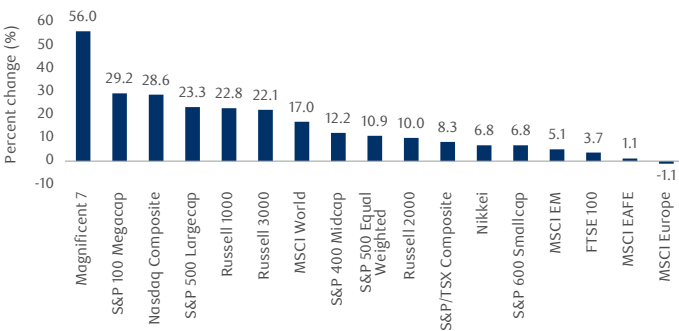
Note: As of January 24, 2025. Source: Deutsche Bank, Macrobond, RBC GAM

Exhibit 7: Yield to maturity



Note: Current spread as of December 31, 2024. Shaded areas within the bars indicate the yield spread versus the U.S. 10-year Treasury bond yield. Source: ICE BofA, RBC GAM

Exhibit 8: Major indices’ price change in USD 2024 calendar year



Note: Magnificent 7 includes Apple, Microsoft, Alphabet, Amazon, Nvidia, Meta and Tesla. Source: Bloomberg, RBC GAM

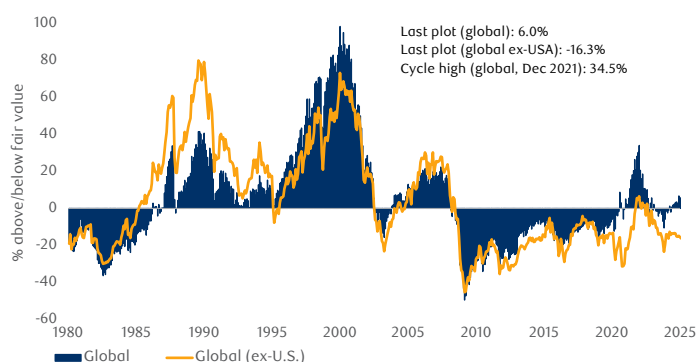
out for being the only major market to suffer a loss in U.S. dollars. The broad gains in equities lifted our composite of global stock markets to 6.0% above fair value, compared to 3.9% below fair value at the end of 2023. Despite the higher valuation, the global stock market composite is still situated near fair value, meaning that stocks are currently not particularly cheap nor expensive (Exhibit 9). When the richly valued U.S. equity market is excluded, this measure shows a 16% discount to fair value, meaning non-U.S. equity markets are especially appealing on this basis.

The starting point for valuations is not a particularly good forecasting tool in the short or medium term, but it is a critical determinant of future returns on equity investments over the very long term. Exhibit 10 shows that 1-year forward returns vary widely no matter how expensive or cheap the stock market is and so has very little forecasting power (Exhibit 10). However, when the time horizon is pushed out to 20 years, the degree of over/under valuation of the S&P 500 explains 70% of the forward realized return for the index (Exhibit 11). Note that the trendline is upward sloping towards the right, meaning that relatively cheap markets are followed by better returns than expensive markets. The current valuation plot is situated near a z-score of 1.3 versus its position of -1.2 in March 2009 as the GFC bear market ended. Average expected total annual returns have rolled down the middle trend line as the z-score has transitioned from deeply negative (i.e. very cheap stocks) to more fully valued. The change in z-scores since the GFC has reduced average expected returns from 15.7% to 6.3% currently, based on a 20-year forward view.

Our equity-valuation model generates current and forward expected fair-value levels for major stock-market indices taking into account factors such as earnings, inflation, short-term and long-term interest rates (Exhibit 12). Our expected return for stocks using this model is calculated as the return that would bring the actual beginning index value to the fair value at the end of the forecasting period. Because of the stability of these factors and their relationships with the stock market, the fair-value band tends to be relatively steady over the longer term. Therefore, it is the starting point for prices that has the largest impact on the return forecast. After another blockbuster year for U.S. equities, the S&P 500 is now starting from a point above the fair-value channel, lowering our return expectations going forward.

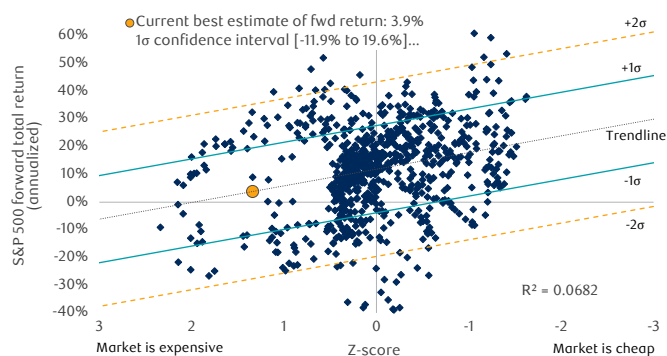
Exhibit 9: Global stock market composite

Equity market indexes relative to equilibrium



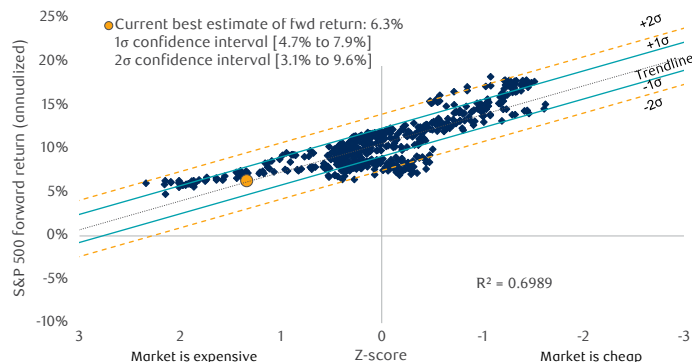
Note: As of January 20, 2025. Source: RBC GAM

Exhibit 10: S&P 500 return versus average valuation metric z-score – 1-year forward total returns



Note: Z-score = number of standard deviations above/below equilibrium. Source: RBC GAM

Exhibit 11: S&P 500 return versus average valuation metric z-score – 20-year forward returns



Note: Z-score = number of standard deviations above/below equilibrium. Source: RBC GAM

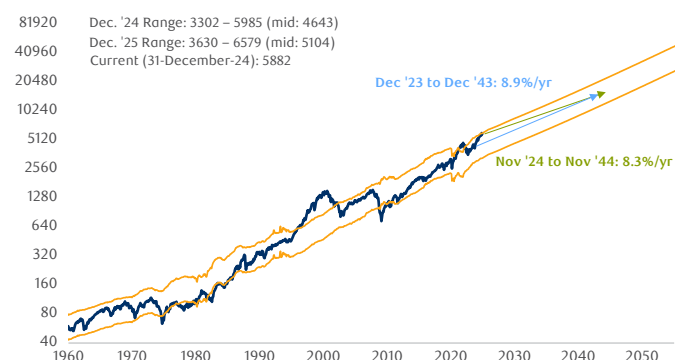
Asset mix and balanced portfolio implications

The equity risk premium, defined as the S&P 500 earnings yield minus the yield on a 10-year U.S. Treasury bond, has been in decline since the COVID pandemic and has recently fallen into negative territory (Exhibit 13). By this measure, stocks are at their least attractive versus bonds in over two decades as equity investors are not being amply compensated for taking additional investment risk. The differential in expected returns between U.S. stocks and bonds has been reduced as a result. Reflecting current and expected levels for interest rates, bond yields, equity prices and economic and corporate profit growth, our latest long-term expected returns are for low-single digit returns for cash, mid-single digit returns for fixed income and mid-single digit to high-single digit returns for equities.

Putting our updated return forecasts together, we expect a sample balanced portfolio to generate an annualized return of 5.8% over the next 20 years, not far below the 6.3% actual return achieved over the decade (Exhibit 14). We believe the change will be in how the balanced fund return is achieved: less from stocks, especially U.S. stocks, and more from bonds. After an incredible 10-year period for U.S. equities that produced an annualized return of 13.1% for the S&P 500, we expect the normalization of rich valuations to bring returns down to 6.1% over the next 20 years. The normalization of valuations had the opposite effect on emerging-market equities, where we expect an improvement to 9.2% annualized returns over the next two decades compared with a paltry 3.6% over the prior decade. Across sovereign fixed income and cash, long-term expected returns should also exceed those in the last decade as short-term and long-term interest rates have returned to higher, more historically normal levels compared to the extraordinary years of artificially suppressed rates. These shifts mean that fixed income should play an increasing role in contributing to overall balanced fund returns in addition to its function in lowering volatility.

Exhibit 12: S&P 500 equilibrium

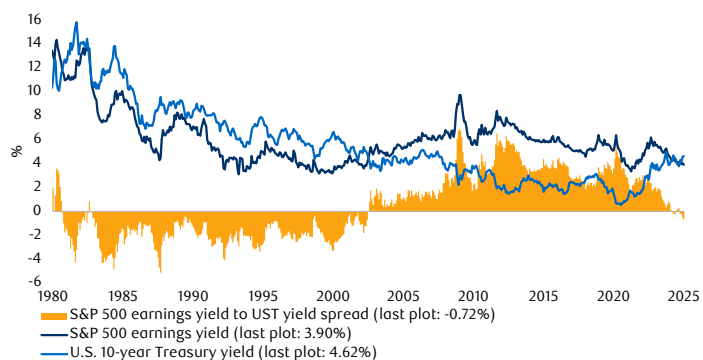
Normalized earnings & valuations



Source: RBC GAM

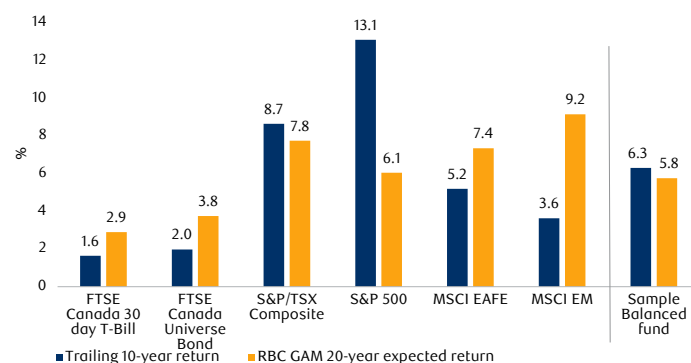
Exhibit 13: S&P 500 earnings yield

12-month trailing earnings/index levels



Note: As of January 22, 2025. Source: RBC GAM

Exhibit 14: Sample balanced fund asset class returns and long-term expected returns



Note: As of December 31, 2024. Sample balanced fund weights: 2% FTSE Canada 30 day T-Bill Index, 38% FTSE Canada Universe Bond Index, 21% S&P/TSX Composite, 22% S&P 500 Index, 13% MSCI EAFE Index and 4% MSCI Emerging Markets Index. Source: Bloomberg, RBC GAM

Asset assumptions

Annualized return expectation

		As of Dec. 2023	As of Nov. 2024		As of Dec. 2023	As of Nov. 2024		As of Dec. 2023	As of Nov. 2024	
		10-year ER (%)	10-year ER (%)	Change	20-year ER (%)	20-year ER (%)	Change	30-year ER (%)	30-year ER (%)	Change
Fixed Income	Reference Index									
US Cash	FTSE CD 1 Month Index	2.90	3.25	▲ 0.35	2.85	3.20	▲ 0.35	2.85	3.25	▲ 0.40
CDN Cash	FTSE Canada 30 day T-Bill Index	2.90	2.95	▲ 0.05	2.80	2.90	▲ 0.10	2.80	2.90	▲ 0.10
GBP Cash	FTSE U.K. Sterling Euro Deposit (1M) (LOC)	3.20	3.45	▲ 0.25	3.00	3.25	▲ 0.25	3.00	3.20	▲ 0.20
Euro Cash	FTSE Euro Euro Deposit (1M) (LOC)	1.75	1.95	▲ 0.20	1.65	1.95	▲ 0.30	1.65	2.00	▲ 0.35
Japan Cash	FTSE Japanese Yen Euro Deposit (1M) (LOC)	0.75	0.70	▼ -0.05	0.70	0.60	▼ -0.10	0.85	0.75	▼ -0.10
EM Cash	JP Morgan ELM1+	3.90	3.85	▼ -0.05	3.90	3.90	▲ 0.00	3.90	3.90	▲ 0.00
CDN Provincial Bonds	FTSE Canada Provincial Bond Index	4.25	4.30	▲ 0.05	3.95	3.90	▼ -0.05	3.90	3.80	▼ -0.10
CDN Federal Bonds	FTSE Canada Federal Bond Index	3.35	3.50	▲ 0.15	3.20	3.15	▼ -0.05	3.20	3.10	▼ -0.10
CDN Government Bonds	FTSE Canada All Government Bond Index	3.80	3.90	▲ 0.10	3.60	3.55	▼ -0.05	3.55	3.45	▼ -0.10
CDN Corporate Bonds	FTSE Canada All Corporate Bond Index	4.85	4.60	▼ -0.25	4.55	4.30	▼ -0.25	4.50	4.25	▼ -0.25
CDN Universe Bonds	FTSE Canada Universe Bond Index	4.10	4.10	▲ 0.00	3.85	3.75	▼ -0.10	3.80	3.65	▼ -0.15
US Government Bonds	ICE BofA 1-10 Year U.S. Treasury Index	4.30	4.50	▲ 0.20	3.95	4.05	▲ 0.10	3.85	3.95	▲ 0.10
US Corporate Bonds	ICE BofA 1-10 Year U.S. Corporate Index	5.20	5.20	▲ 0.00	4.85	4.80	▼ -0.05	4.80	4.75	▼ -0.05
UK Government Bonds	ICE BofA 1-10 Year U.K. Gilt Index	4.45	4.95	▲ 0.50	4.10	4.30	▲ 0.20	4.05	4.15	▲ 0.10
UK Corporate Bonds	ICE BofA 1-10 Year Sterling Corporate Index	5.70	5.90	▲ 0.20	5.50	5.45	▼ -0.05	5.45	5.30	▼ -0.15
Euro Government Bonds	Iboxx EUR Sovereigns	3.75	3.70	▼ -0.05	3.40	3.25	▼ -0.15	3.35	3.15	▼ -0.20
Euro Corporate Bonds	Iboxx EUR Corporates	5.05	4.70	▼ -0.35	4.80	4.30	▼ -0.50	4.75	4.25	▼ -0.50
Asian Bonds	HSBC Asian Local Bond Index LCL	1.90	2.00	▲ 0.10	1.90	2.00	▲ 0.10	1.90	2.00	▲ 0.10
World Government Bonds	FTSE WGBI	4.20	4.35	▲ 0.15	3.40	3.50	▲ 0.10	3.35	3.40	▲ 0.05
HY Bonds	ICE BofA U.S. High Yield Index	6.10	5.80	▼ -0.30	5.90	5.60	▼ -0.30	5.85	5.60	▼ -0.25
EM Bonds	JPM EMBI Global Diversified USD	6.00	5.70	▼ -0.30	5.55	5.40	▼ -0.15	5.45	5.30	▼ -0.15
Global Bonds	Bloomberg Global Aggregate Bond Index	4.60	4.65	▲ 0.05	4.30	4.20	▼ -0.10	4.25	4.10	▼ -0.15
		10-year ER (%)	10-year ER (%)		20-year ER (%)	20-year ER (%)		30-year ER (%)	30-year ER (%)	
Equities										
CDN Equities	S&P/TSX Composite	8.25	7.50	▼ -0.75	8.20	7.75	▼ -0.45	8.35	7.85	▼ -0.50
U.S. Equities	S&P 500	5.60	4.40	▼ -1.20	6.70	6.05	▼ -0.65	7.25	6.90	▼ -0.35
U.S. Mid Caps	S&P 400	9.05	8.20	▼ -0.85	8.45	8.05	▼ -0.40	8.15	7.80	▼ -0.35
U.S. Small Caps	S&P 600	10.40	9.55	▼ -0.85	9.55	8.80	▼ -0.75	9.25	8.40	▼ -0.85
U.K. Equities	FTSE All-Share	9.35	8.85	▼ -0.50	8.75	8.35	▼ -0.40	8.35	7.95	▼ -0.40
Europe Equities ex UK	MSCI Europe ex U.K. LCL	8.75	8.60	▼ -0.15	8.45	8.30	▼ -0.15	8.10	7.95	▼ -0.15
Asian Equities	MSCI AC Asia Pac LCL	6.45	6.00	▼ -0.45	6.20	6.00	▼ -0.20	6.25	6.15	▼ -0.10
Japan Equities	Nikkei 225 Average PR JPY	6.25	6.30	▲ 0.05	5.65	5.75	▲ 0.10	5.45	5.65	▲ 0.20
Australian Equities	S&P/ASX 200	7.70	5.80	▼ -1.90	7.90	6.75	▼ -1.15	8.10	7.20	▼ -0.90
Developed Markets (World)	MSCI World	6.65	5.85	▼ -0.80	7.10	6.65	▼ -0.45	7.35	7.05	▼ -0.30
EM Equities	MSCI EM LCL	9.35	9.00	▼ -0.35	9.40	9.15	▼ -0.25	10.35	10.05	▼ -0.30
EAFE Equities	MSCI EAFE	7.90	7.60	▼ -0.30	7.60	7.35	▼ -0.25	7.35	7.20	▼ -0.15

Notes: Asset assumptions as of November 13, 2024.

1. Fixed income indices may have compositional differences which could impact the comparability of return expectations between regions.
2. Fewer of our models contribute to forecasts for U.S. small cap and U.S. mid cap equities and, as a result, less breadth of information is contained in these figures as compared to other asset classes.
3. History suggests that asset valuations at the onset of an investment holding period have a meaningful impact to subsequent realized returns over long horizons. The rise in global stock markets in 2023 boosted valuations and lowered return potential for equities. By the same token, the rise in bond yields had the opposite effect on valuations and return potential for fixed income on a go-forward basis. As a result, our long-term return expectations are higher for fixed income and lower for equities compared to a year ago.

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