

Canada Persistence Scorecard

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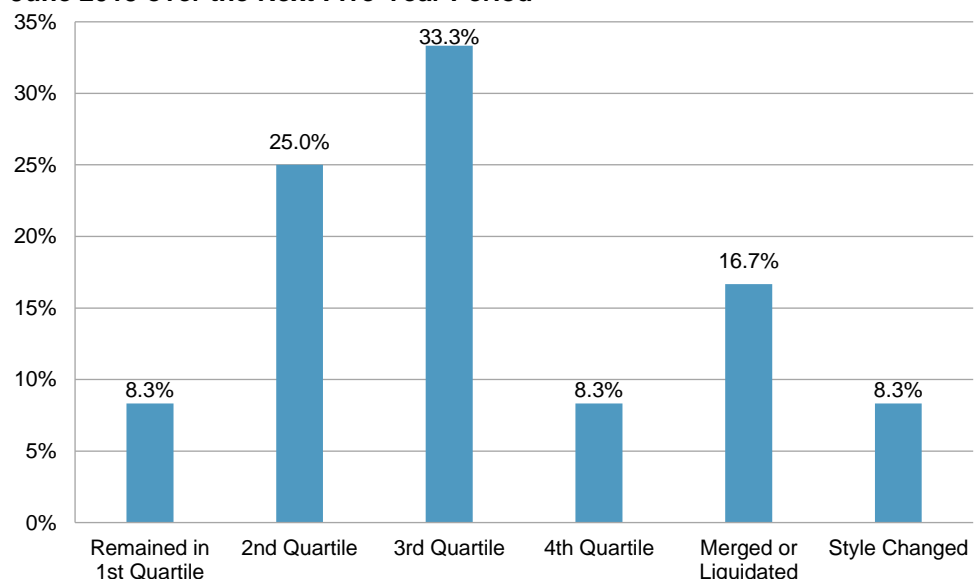
SUMMARY

Our widely followed [SPIVA® Canada Scorecard](#) typically shows that most Canadian active managers underperform their benchmarks most of the time. However, if an active manager beats a benchmark, how do we know whether the result is a product of genuine skill or merely of good luck? Genuine skill is likely to persist, while luck is random and can soon dissipate.

The Persistence Scorecard attempts to distinguish luck from skill by measuring the consistency of active managers' success. The Canada Persistence Scorecard shows that, **regardless of asset class or style focus, few Canadian fund managers have consistently outperformed their peers.**

For example, of the Canadian Equity funds that finished in the top quartile in terms of cumulative returns for the period from June 2010 to June 2015, only 8.3% finished in the top quartile for the period from June 2015 to June 2020. In fact, **it was more likely for a top-quartile fund to close its doors or change style (25% combined) than to remain in the top quartile** (see Report 5).

Exhibit 1: Outcomes of the Top-Quartile Domestic Funds from June 2010 to June 2015 over the Next Five-Year Period



Source: S&P Dow Jones Indices LLC, Fundata Canada Inc. Data as of June 30, 2020. CIFSC categorizations are used. Financial information provided by Fundata Canada Inc. Chart is provided for illustrative purposes. Past performance is no guarantee of future results.

Even when using a less-restrictive metric for success, just 37.5% of Canadian Equity funds in the top half of the distribution for the period from June 2010 to June 2015 managed to repeat their top-half performance over the next five years (see Report 6).

This was hardly an outlier for any category or time period. Three-year transition matrices showed that in only one category (Global Equity) did more than 50% of funds repeat their top-half performance from the June 2014 to June 2017 period in the subsequent three years (see Report 4).

When looking at annual consistency, **in five out of the seven categories tracked, none of the funds in their category's top quartile in June 2016 maintained that status annually through June 2020.** Over shorter time periods, no International Equity or U.S. Equity fund even managed to retain their top-quartile status for the next two years (see Report 2).

Some statistically minded readers might find support for the notion that fund performance is not randomly distributed. For example, the odds that a fund could remain in the top quartile for n consecutive years might be calculated as $(25\%)^n = 25\%$, 6.25%, 1.56%, and 0.39% for one, two, three, and four years, respectively. While the persistence numbers in Reports 1 and 2 did intermittently top these thresholds, they remained quite low on an absolute basis. As such, while the Persistence Scorecard has not proven that fund performance is completely random, from a practical or decision-making perspective, it has reinforced the notion that choosing between active funds on the basis of previous outperformance can be a misguided strategy.

Unsurprisingly, **the one pattern that did hold across categories was the tendency of the poorest funds to close.** Calculating across all categories, there were 458 funds tracked over the period from June 2010 to June 2015. Observing their fates **through June 2020, while just 8.6% of top-quartile funds ended up closing, 40.5% of funds in the bottom quartile did so.** Seemingly coming in for the most opprobrium from their investors, 76.2% of bottom-quartile Canadian Focused Equity funds disappeared (see Report 5).

Style changes did not appear to be correlated with fund performance. Top, middle, and bottom performers within a category all generally had similar chances of style drift over the three- or five-year periods. Over the five-year period, Canadian Dividend & Income Equity funds had the highest percentage of style change (8.5%), with International Equity funds leading the way over the three-year period (5.4%) (see Reports 5 and 3).

ABOUT THE PERSISTENCE SCORECARD

The phrase “past performance is no guarantee of future results” (or some variation thereof) can be found in the fine print of most mutual fund literature. Yet many investors and advisors consider past performance and related metrics to be important factors in fund selection. So does past performance really matter?

To answer this question, the semiannual S&P Persistence Scorecard tracks the degree to which historical relative performance is predictive of future relative performance. As in our widely followed SPIVA Scorecards, Fundata Canada serves as our underlying data source. This scorecard highlights performance persistence over three and five consecutive 12-month periods and two non-overlapping three- and five-year periods.

Key features of the S&P Persistence Scorecard include:

- **Historical rankings without survivorship bias:** For anyone making an investment decision, all funds available at the time of that decision are part of the initial opportunity set. Ignoring funds that liquidate or merge during a period of study biases measurements of persistence. Using the Fundata Canada database, the S&P Persistence Scorecard ranks all funds available at each point in time and tracks the top-quartile and top-half performers throughout the time period.
- **Clean universe:** The mutual fund universe used in these reports comprises actively managed Canadian equity funds. Index funds, sector funds, and index-based dynamic (bull or bear) funds are excluded from the sample. To avoid double counting multiple share classes, only the share class with the highest previous period return of each fund is used.
- **Transition matrices:** Transition matrices show the movements between quartiles and halves over non-overlapping three- and five-year periods. They also track the percentage of funds that have merged or liquidated. In addition, we monitor movements across capitalization levels. This helps us capture, for example, the conversion of some large-cap funds to mid- and small-cap funds.
- **Tracking reports of top performers:** The tracking reports show the percentages of funds that remain in the top-quartile or top-half rankings over consecutive three- and five-year periods.

S&P Dow Jones Indices chooses funds that have, at any point in the previous 120 months, been classified in at least one of the following seven Canadian Investment Funds Standards Committee (CIFSC)¹ categories.

- Canadian Equity
- Canadian Small-/Mid-Cap Equity
- Canadian Dividend & Income Equity
- U.S. Equity
- International Equity
- Global Equity
- Canadian Focused Equity

¹ Refer to www.cifsc.org for additional information regarding CIFSC and its categories.

The categories reviewed in this report represent the major areas of interest for Canadian market participants. As a result of the foreign content limit removal in 2005, an increasing number of Canadian market participants started redeploying funds outside of Canada to gain international equity exposure. Funds in the Canadian Focused Equity category include non-Canadian equity exposure.

REPORTS

Report 1: Performance Persistence of Domestic Equity Funds over Three Consecutive 12-Month Periods			
FUND CATEGORY	FUND COUNT AT START (JUNE 2018)	PERCENTAGE REMAINING IN TOP QUARTILE	
		JUNE 2019	JUNE 2020
TOP QUARTILE			
Canadian Dividend & Income Equity	12	16.67	0.00
Canadian Equity	13	23.08	15.38
Canadian Focused Equity	20	45.00	30.00
Canadian Small-/Mid-Cap Equity	8	25.00	12.50
Global Equity	36	47.22	44.44
International Equity	13	23.08	15.38
U.S. Equity	26	38.46	34.62
FUND CATEGORY	FUND COUNT AT START (JUNE 2018)	PERCENTAGE REMAINING IN TOP HALF	
		JUNE 2019	JUNE 2020
TOP HALF			
Canadian Dividend & Income Equity	23	39.13	26.09
Canadian Equity	25	40.00	32.00
Canadian Focused Equity	36	36.11	27.78
Canadian Small-/Mid-Cap Equity	16	56.25	25.00
Global Equity	72	47.22	38.89
International Equity	26	42.31	30.77
U.S. Equity	52	59.62	50.00

Source: S&P Dow Jones Indices LLC, Fundata Canada Inc. Data as of June 30, 2020. CIFSC categorizations are used. Financial information provided by Fundata Canada Inc. Table is provided for illustrative purposes. Past performance is no guarantee of future results.

Report 2: Performance Persistence of Domestic Equity Funds over Five Consecutive 12-Month Periods						
FUND CATEGORY	FUND COUNT AT START (JUNE 2016)	PERCENTAGE REMAINING IN TOP QUARTILE				
		JUNE 2017	JUNE 2018	JUNE 2019	JUNE 2020	
TOP QUARTILE						
Canadian Dividend & Income Equity	12	50.00	8.33	0.00	0.00	
Canadian Equity	16	37.50	12.50	0.00	0.00	
Canadian Focused Equity	23	21.74	4.35	4.35	0.00	
Canadian Small-/Mid-Cap Equity	9	55.56	22.22	22.22	11.11	
Global Equity	39	10.26	10.26	10.26	10.26	
International Equity	15	6.67	0.00	0.00	0.00	
U.S. Equity	27	7.41	0.00	0.00	0.00	
FUND CATEGORY	FUND COUNT AT START (JUNE 2016)	PERCENTAGE REMAINING IN TOP HALF				
		JUNE 2017	JUNE 2018	JUNE 2019	JUNE 2020	
TOP HALF						
Canadian Dividend & Income Equity	24	66.67	41.67	16.67	16.67	
Canadian Equity	32	40.63	18.75	9.38	6.25	
Canadian Focused Equity	44	43.18	25.00	18.18	15.91	
Canadian Small-/Mid-Cap Equity	16	56.25	31.25	18.75	6.25	
Global Equity	78	28.21	17.95	12.82	12.82	
International Equity	29	20.69	6.90	0.00	0.00	
U.S. Equity	53	41.51	28.30	16.98	15.09	

Source: S&P Dow Jones Indices LLC, Funddata Canada Inc. Data as of June 30, 2020. CIFSC categorizations are used. Financial information provided by Funddata Canada Inc. Table is provided for illustrative purposes. Past performance is no guarantee of future results.

Report 3: Three-Year Transition Matrix – Performance over Two Non-Overlapping Three-Year Periods (Based on Quartile)							
QUARTILE	FUND COUNT AT START (JUNE 2017)	THREE-YEAR PERCENTAGES AT END (JUNE 2020)					
		1ST QUARTILE (%)	2ND QUARTILE (%)	3RD QUARTILE (%)	4TH QUARTILE (%)	MERGED/LIQUIDATED (%)	STYLE CHANGED (%)
CANADIAN DIVIDEND & INCOME EQUITY							
1st Quartile	12	41.67	8.33	25.00	8.33	0.00	16.67
2nd Quartile	11	0.00	36.36	27.27	18.18	18.18	0.00
3rd Quartile	12	16.67	25.00	8.33	33.33	16.67	0.00
4th Quartile	12	8.33	8.33	16.67	25.00	41.67	0.00
CANADIAN EQUITY							
1st Quartile	15	26.67	26.67	20.00	6.67	13.33	6.67
2nd Quartile	15	6.67	33.33	33.33	6.67	20.00	0.00
3rd Quartile	15	6.67	6.67	0.00	26.67	53.33	6.67
4th Quartile	15	13.33	0.00	13.33	33.33	40.00	0.00
CANADIAN FOCUSED EQUITY							
1st Quartile	22	31.82	13.64	22.73	9.09	18.18	4.55
2nd Quartile	22	9.09	9.09	18.18	13.64	50.00	0.00
3rd Quartile	22	22.73	22.73	4.55	4.55	45.45	0.00
4th Quartile	22	0.00	13.64	18.18	22.73	36.36	9.09
CANADIAN SMALL-/MID-CAP EQUITY							
1st Quartile	9	22.22	22.22	22.22	22.22	11.11	0.00
2nd Quartile	8	37.50	12.50	0.00	37.50	12.50	0.00
3rd Quartile	8	25.00	0.00	50.00	12.50	12.50	0.00
4th Quartile	9	0.00	33.33	11.11	11.11	44.44	0.00
GLOBAL EQUITY							
1st Quartile	34	61.76	14.71	11.76	11.76	0.00	0.00
2nd Quartile	33	21.21	33.33	15.15	21.21	6.06	3.03
3rd Quartile	33	3.03	18.18	33.33	15.15	30.30	0.00
4th Quartile	34	0.00	11.76	23.53	35.29	23.53	5.88
INTERNATIONAL EQUITY							
1st Quartile	14	28.57	35.71	21.43	0.00	0.00	14.29
2nd Quartile	14	21.43	14.29	7.14	28.57	28.57	0.00
3rd Quartile	14	7.14	14.29	21.43	21.43	35.71	0.00
4th Quartile	14	14.29	7.14	14.29	21.43	35.71	7.14
U.S. EQUITY							
1st Quartile	26	34.62	26.92	7.69	15.38	15.38	0.00
2nd Quartile	25	20.00	12.00	32.00	24.00	8.00	4.00
3rd Quartile	25	24.00	24.00	12.00	24.00	16.00	0.00
4th Quartile	26	0.00	15.38	26.92	15.38	42.31	0.00

Source: S&P Dow Jones Indices LLC, Fundata Canada Inc. Data as of June 30, 2020. CIFSC categorizations are used. Financial information provided by Fundata Canada Inc. Table is provided for illustrative purposes. Past performance is no guarantee of future results.

Report 4: Three-Year Transition Matrix – Performance over Two Non-Overlapping Three-Year Periods (Based on Halves)					
HALF	FUND COUNT AT START (JUNE 2017)	THREE-YEAR PERCENTAGES AT END (JUNE 2020)			
		TOP HALF (%)	BOTTOM HALF (%)	MERGED/LIQUIDATED (%)	STYLE CHANGED (%)
CANADIAN DIVIDEND & INCOME EQUITY					
Top Half	23	43.48	39.13	8.70	8.70
Bottom Half	24	29.17	41.67	29.17	0.00
CANADIAN EQUITY					
Top Half	30	46.67	33.33	16.67	3.33
Bottom Half	30	13.33	36.67	46.67	3.33
CANADIAN FOCUSED EQUITY					
Top Half	44	31.82	31.82	34.09	2.27
Bottom Half	44	29.55	25.00	40.91	4.55
CANADIAN SMALL-/MID-CAP EQUITY					
Top Half	17	47.06	41.18	11.76	0.00
Bottom Half	17	29.41	41.18	29.41	0.00
GLOBAL EQUITY					
Top Half	67	65.00	29.85	2.99	1.49
Bottom Half	67	16.42	53.73	26.87	2.99
INTERNATIONAL EQUITY					
Top Half	28	50.00	28.57	14.29	7.14
Bottom Half	28	21.43	39.29	35.71	3.57
U.S. EQUITY					
Top Half	51	47.06	39.22	11.76	1.96
Bottom Half	51	31.37	39.22	29.41	0.00

Source: S&P Dow Jones Indices LLC, Fundata Canada Inc. Data as of June 30, 2020. CIFSC categorizations are used. Financial information provided by Fundata Canada Inc. Table is provided for illustrative purposes. Past performance is no guarantee of future results.

Report 5: Five-Year Transition Matrix – Performance over Two Non-Overlapping Five-Year Periods (Based on Quartile)								
QUARTILE	FUND COUNT AT START (JUNE 2015)	FIVE-YEAR PERCENTAGES AT END (JUNE 2020)						
		1ST QUARTILE (%)	2ND QUARTILE (%)	3RD QUARTILE (%)	4TH QUARTILE (%)	MERGED/LIQUIDATED (%)	STYLE CHANGED (%)	
CANADIAN DIVIDEND & INCOME EQUITY								
1st Quartile	12	25.00	16.67	25.00	16.67	8.33	8.33	
2nd Quartile	11	45.45	27.27	0.00	0.00	18.18	9.09	
3rd Quartile	12	0.00	25.00	16.67	16.67	33.33	8.33	
4th Quartile	12	8.33	8.33	33.33	25.00	16.67	8.33	
CANADIAN EQUITY								
1st Quartile	12	8.33	25.00	33.33	8.33	16.67	8.33	
2nd Quartile	12	25.00	16.67	16.67	25.00	16.67	0.00	
3rd Quartile	12	16.67	16.67	8.33	8.33	50.00	0.00	
4th Quartile	12	0.00	8.33	16.67	33.33	25.00	16.67	
CANADIAN FOCUSED EQUITY								
1st Quartile	21	28.57	9.52	19.05	19.05	19.05	4.76	
2nd Quartile	20	15.00	15.00	10.00	15.00	35.00	10.00	
3rd Quartile	21	9.52	23.81	4.76	9.52	52.38	0.00	
4th Quartile	21	0.00	0.00	19.05	4.76	76.19	0.00	
CANADIAN SMALL-/MID-CAP EQUITY								
1st Quartile	9	33.33	33.33	33.33	0.00	0.00	0.00	
2nd Quartile	8	12.50	12.50	25.00	12.50	25.00	12.50	
3rd Quartile	8	0.00	12.50	12.50	25.00	37.50	12.50	
4th Quartile	9	0.00	11.11	0.00	33.33	55.56	0.00	
GLOBAL EQUITY								
1st Quartile	31	51.61	25.81	6.45	9.68	3.23	3.23	
2nd Quartile	30	13.33	13.33	26.67	23.33	13.33	10.00	
3rd Quartile	31	16.13	25.81	16.13	16.13	16.13	9.68	
4th Quartile	31	3.23	9.68	25.81	22.58	35.48	3.23	
INTERNATIONAL EQUITY								
1st Quartile	11	45.45	9.09	18.18	18.18	0.00	9.09	
2nd Quartile	11	9.09	9.09	9.09	27.27	36.36	9.09	
3rd Quartile	11	0.00	9.09	36.36	27.27	18.18	9.09	
4th Quartile	12	16.67	50.00	8.33	8.33	16.67	0.00	
U.S. EQUITY								
1st Quartile	20	35.00	25.00	15.00	10.00	10.00	5.00	
2nd Quartile	19	26.32	31.58	10.53	15.79	15.79	0.00	
3rd Quartile	19	5.26	15.79	36.84	21.05	21.05	0.00	
4th Quartile	20	10.00	5.00	15.00	30.00	40.00	0.00	

Source: S&P Dow Jones Indices LLC, Fundata Canada Inc. Data as of June 30, 2020. CIFSC categorizations are used. Financial information provided by Fundata Canada Inc. Table is provided for illustrative purposes. Past performance is no guarantee of future results.

Report 6: Five-Year Transition Matrix – Performance over Two Non-Overlapping Five-Year Periods (Based on Halves)					
HALF	FUND COUNT AT START (JUNE 2015)	FIVE-YEAR PERCENTAGES AT END (JUNE 2020)			
		TOP HALF (%)	BOTTOM HALF (%)	MERGED/LIQUIDATED (%)	STYLE CHANGED (%)
CANADIAN DIVIDEND & INCOME EQUITY					
Top Half	23	56.52	21.74	13.04	8.70
Bottom Half	24	20.83	45.83	25.00	8.33
CANADIAN EQUITY					
Top Half	24	37.50	41.67	16.67	4.17
Bottom Half	24	20.83	33.33	37.50	8.33
CANADIAN FOCUSED EQUITY					
Top Half	41	34.15	31.71	26.83	7.32
Bottom Half	42	16.67	19.05	64.29	0.00
CANADIAN SMALL-/MID-CAP EQUITY					
Top Half	17	47.06	35.29	11.76	5.88
Bottom Half	17	11.76	35.29	47.06	5.88
GLOBAL EQUITY					
Top Half	61	52.46	32.79	8.20	6.56
Bottom Half	62	27.42	40.32	25.81	6.45
INTERNATIONAL EQUITY					
Top Half	22	36.36	36.36	18.18	9.09
Bottom Half	23	39.13	39.13	17.39	4.35
U.S. EQUITY					
Top Half	39	58.97	25.64	12.82	2.56
Bottom Half	39	17.95	51.28	30.77	0.00

Source: S&P Dow Jones Indices LLC, Fundata Canada Inc. Data as of June 30, 2020. CIFSC categorizations are used. Financial information provided by Fundata Canada Inc. Table is provided for illustrative purposes. Past performance is no guarantee of future results.

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