

## February 2022: Canadian Equity – Geopolitical Safe Haven?

- Flow to Canadian ETFs maintained momentum with \$3.9 billion inflow in February, led by Canadian Equity
- Financial, Tech and Materials witnessed redemptions while defensive sectors and Energy had inflows
- Rates dropped amid geopolitical tensions, long-term government bond and cash alternatives were popular
- 19 new ETFs listed in February; two new providers joined the fray

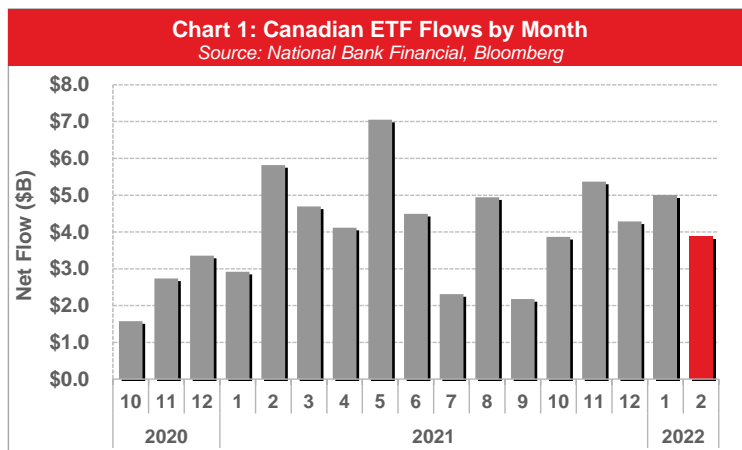
**Summary:** Canadian ETFs gathered \$3.9 billion in net flows in February, a continuation of the strong start to the new year after January's \$5 billion inflow. Equity dominated once again, taking up 80% of the month's total. Stock markets are suffering from one of the worst year-to-date returns after the start of a new year and the rotation from growth into value remains at the forefront; Technology, Financial and Material sector ETFs suffered redemptions whereas Energy, Real Estate, Utilities and Healthcare registered inflows. Canadian Equity is finally making a comeback, possibly as a play on inflation, energy or value. Alternatively, we could be witnessing a global rotation to a source of resource-based returns with relative geopolitical stability.

Fixed Income ETFs enjoyed \$163 million in flows, led by long-term Canadian government bond ETFs and cash alternative ETFs. Spurred by the Russian invasion of Ukraine, concerns over economic growth sent bond yields in both Canada and the U.S. sharply lower.

Demand for Commodity ETFs lost steam in Canada. Even though gold and silver prices are surging amid uncertainty, investors have stayed away from gold and silver bullion ETFs overall, withdrawing \$49 million from the Commodity category in February.

Crypto-Asset ETFs welcomed inflows of \$221 million that came alongside an uptick in Bitcoin and Ethereum prices.

**Flows by Asset Class, Category and Product: (Table 1 & Tables 4 - 11)**



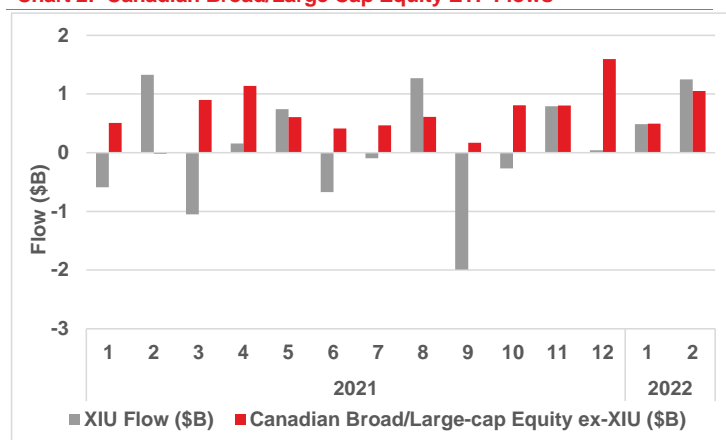
**Table 1 - ETF Flows by Category - YTD February 2022**

Category	AUM (\$M)	Mkt Shr (%)	February 2022		YTD February 2022	
			Flow \$M	Flow/AUM	Flow \$M	Flow/AUM
Equity	\$214,092		\$3,130	1.5%	\$7,673	3.4%
Canada	\$81,787	25%	\$2,280	2.9%	\$3,508	4.4%
United States	\$73,617	23%	\$213	0.3%	\$2,219	2.7%
International	\$58,688	18%	\$637	1.1%	\$1,946	3.0%
Fixed Income	\$87,981	27%	\$163	0.2%	\$219	0.2%
Commodities	\$1,689	1%	-\$49	-3.0%	-\$236	-12.4%
Multi-Asset	\$15,881	5%	\$241	1.5%	\$757	4.8%
Inverse / Levered	\$2,113	1%	\$171	8.9%	\$313	17.8%
Crypto-Asset	\$5,220	2%	\$221	4.8%	\$154	2.6%
<b>Total</b>	<b>\$326,977</b>	<b>100%</b>	<b>\$3,876</b>	<b>1.2%</b>	<b>\$8,880</b>	<b>2.6%</b>

\*Equity Flows include option strategies;

Source: National Bank of Canada, Bloomberg

**Chart 2: Canadian Broad/Large Cap Equity ETF Flows**



Source: NBF ETF Research, Bloomberg. Data as of February 28, 2022

Demand for Equity ETFs surged in February and market cap-weighted passive ETFs registered the highest inflows. Broad Canadian Equity (XIU, XIC, HXT) was the clear favourite, with EAFE Equity (ZEA) and U.S. Equity (VFV, ZSP, QUU) a distant second and third place, respectively. After a period of significant outperformance, financial sector ETFs (XFN, ZEB) took a breather in terms of flows and returns. Technology sector ETFs ceded the driver's seat while outflows from TEC accelerated in February, marking its second month in a row of redemptions. Low volatility ETFs (ZLU) and Multi-Factor ETFs (DGR/B) registered outflows for the fourth consecutive month. U.S. ESG Equity ETF ESGY had an institutional-sized creation of above \$700 million. On the outflow side, ESGY/F registered similar-sized outflows on the same day, indicating a potential currency-switch between the two ETFs. Over the past two years, strong inflows have started to return to Canadian equity ETFs (Chart 2) and creations have accelerated through Q4 of last year and 2022 year-to-date. From the perspective of global investors, Broad Canadian equity may be appealing as an inflation hedge (heavy energy and material sector weight) and value play (lower valuations). In a rising interest rate and central bank tightening environment, Canadian equities remain attractive relative to indices that are heavily growth tilted.

Fixed Income ETFs pulled in net flows of \$163 million. Cash alternative ETFs (e.g., HSAV) enjoyed among the highest inflows among all categories with \$358 million in new money. Interestingly, Horizons announced HSAV would suspend creations in January to preserve the total-return tax benefits of its wider mutual fund corporation. In early February, right before the suspension took effect, the product received another \$317 million in a single day, bringing its assets under management to \$2.07 billion. Investors should note that HSAV will no longer accept creations until its AUM drops back below \$1.5 billion and the product may experience premia to NAV if demand remains high. However, HSAV delivered an outflow of \$61 million in late February, and so far, there has been no disruption to its trading dynamics beyond a slight widening of bid-ask spread.

Long-term Canadian government bond ETF (TCLB) also appeared on the leaderboard with \$447 million in net flows. On the outflow side, Canada aggregate bond ETFs (HBB, XBB, XQB) had a month of outflow at \$425 million.

Commodity ETFs saw a redemption of \$49 million led by gold bullion ETFs (VALT/U). In the Multi-Asset category, all-equity and growth-oriented ETFs (VEQT, VGRO, XEQT) lead inflows over balanced and conservative asset allocation products.

**Flows by Provider and New Launches (Tables 2 - 3):**

Provider	AUM (\$M)	Mkt Shr (%)	February 2022		YTD February 2022	
			Flow (\$M)	Flow/AUM	Flow (\$M)	Flow/AUM
1 RBC iShares	\$97,676	29.9%	\$1,391	1%	\$2,342	2%
2 BMO	\$88,201	27.0%	\$343	0%	\$1,103	1%
3 Vanguard	\$39,669	12.1%	\$677	2%	\$1,667	3%
4 Horizons	\$20,942	6.4%	\$190	1%	\$1,433	7%
5 CI First Asset	\$14,982	4.6%	-\$177	-1%	-\$478	-3%
6 Mackenzie*	\$12,808	3.9%	\$134	1%	\$785	6%
7 TDAM	\$8,198	2.5%	\$307	4%	\$469	6%
8 Purpose	\$6,206	1.9%	\$302	5%	\$361	6%
9 NBI	\$4,950	1.5%	\$175	4%	\$269	5%
10 Invesco	\$4,514	1.4%	-\$14	0%	\$75	2%
11 CIBC	\$2,891	0.9%	\$40	1%	-\$68	-2%
12 Fidelity	\$2,697	0.8%	\$41	2%	\$135	5%
13 Dynamic	\$2,577	0.8%	-\$22	-1%	-\$39	-1%
14 Manulife	\$2,480	0.8%	\$38	2%	\$46	2%
15 PIMCO	\$2,064	0.6%	-\$5	0%	\$23	1%
16 Desjardins	\$2,020	0.6%	\$3	0%	-\$4	0%
17 Harvest	\$1,979	0.6%	\$87	5%	\$136	7%
18 Franklin Templeton	\$1,827	0.6%	-\$52	-3%	-\$248	-11%
19 Evolve Funds	\$1,665	0.5%	\$12	1%	\$37	2%
20 Hamilton	\$1,434	0.4%	\$114	9%	\$255	22%
21 AGF	\$1,399	0.4%	\$1	0%	\$86	6%
22 3iQ	\$1,369	0.4%	\$0	0%	-\$3	0%
23 Scotia Bank	\$1,038	0.3%	\$84	9%	\$217	24%
24 Brompton Funds	\$555	0.2%	\$9	2%	\$17	3%
25 Picton Mahoney	\$513	0.2%	\$24	5%	\$35	7%
26 Ninepoint Partners	\$485	0.1%	\$68	18%	\$96	30%
27 First Trust	\$464	0.1%	\$64	16%	\$56	13%
28 Bristol Gate	\$313	0.1%	\$2	1%	\$2	1%
29 Middlefield	\$271	0.1%	\$17	7%	\$19	7%
30 Emerge	\$167	0.1%	\$1	1%	-\$1	-1%
31 Guardian Capital	\$155	0.0%	\$12	8%	\$25	17%
32 IA Clarington	\$142	0.0%	\$2	1%	\$5	4%
33 Lysander	\$97	0.0%	\$2	2%	-\$1	-1%
34 Accelerate	\$64	0.0%	\$3	4%	\$5	7%
35 Russell Investments	\$51	0.0%	-\$2	-3%	\$1	1%
36 Starlight	\$37	0.0%	\$1	3%	\$0	-1%
37 Arrow Capital	\$33	0.0%	\$0	0%	\$10	44%
38 SmartBe	\$24	0.0%	-\$3	-13%	-\$4	-15%
39 Evermore Capital	\$8	0.0%	\$8	NA	\$8	NA
40 NCM Investments	\$6	0.0%	\$0	0%	\$0	0%
41 Caldwell	\$5	0.0%	\$0	0%	\$5	239%
42 Mulvihill	\$1	0.0%	\$1	NA	\$1	NA
<b>Total</b>	<b>\$326,977</b>	<b>100.0%</b>	<b>\$3,876</b>	<b>1.2%</b>	<b>\$8,880</b>	<b>2.6%</b>

\*Includes Wealthsimple asset and flows. Source: NBF, Bloomberg

RBC iShares, Vanguard and BMO logged the highest three provider inflows in February. Outside the top 10 ETF providers, Harvest, Hamilton, Scotiabank, Ninepoint Partners and First Trust saw the largest flows as percentage of starting assets. CI First Asset suffered redemptions from its multi-factor, gold and alternative ETFs. Franklin Templeton also saw outflows from its global fixed income product.

February 2022 welcomed 19 new ETF launches. Some notable mentions include: Canada's first carbon credit ETFs from Horizons and Ninepoint Partners; additionally, two new providers Evermore and Mulvihill joined the market. Evermore introduced target date asset allocation ETFs and Mulvihill launched a leverage Canadian bank ETF.

*Note: the tables below all use the "new" flows calculation methodology.*

**Table 3: New Launches - February 2022**

Name	Ticker	Mgmt Fee (%)	Focus
1 Evermore Retirement 2025 ETF	ERCV	0.35	Asset Allocation
2 Evermore Retirement 2030 ETF	ERDO	0.35	Asset Allocation
3 Evermore Retirement 2035 ETF	ERDV	0.35	Asset Allocation
4 Evermore Retirement 2040 ETF	EREO	0.35	Asset Allocation
5 Evermore Retirement 2045 ETF	EREV	0.35	Asset Allocation
6 Evermore Retirement 2050 ETF	ERFO	0.35	Asset Allocation
7 Evermore Retirement 2055 ETF	ERFV	0.35	Asset Allocation
8 Evermore Retirement 2060 ETF	ERGO	0.35	Asset Allocation
9 Evolve Canadian Banks and Lifecos Enhanced Yield	BANK	0.60	Levered Covered Call
10 Hamilton Enhanced US Covered Call ETF	HYLD	0.65	Levered Covered Call
11 Hamilton Enhanced US Covered Call ETF USD	HYLD/U	0.65	Levered Covered Call
12 Harvest Diversified Monthly Income ETF	HDIF	0.74*	Levered Covered Call
13 Horizons Carbon Credits ETF	CARB	0.75	Carbon Credit
14 Mackenzie Emerging Markets Equity Index ETF	QEE	0.22	Emerging Markets
15 Mulvihill Canadian Bank Enhanced Yield ETF	CBNK	0.65	Levered Covered Call
16 NBI Sustainable Canadian Short Term Bond ETF	NSSB	0.25	ESG Fixed Income
17 Ninepoint Carbon Credit ETF	CBON	0.75	Carbon Credit
18 Ninepoint Carbon Credit ETF USD	CBON/U	0.75	Carbon Credit
19 Ninepoint Energy Fund - ETF USD	NNRG/U	1.50**	Canadian Energy

\* Estimated based on underlyings' management fees

\*\* This ETF may charge a performance fee; Source: NBF, SEDAR, Providers

**Table 4 - Top Single Long ETF Inflows - February 2022**

Ticker	Name	Flow (\$M)	Flow/AUM
1 XIU	iShares S&P/TSX 60 Index ETF	\$1,249	11%
2 ESGY	BMO MSCI USA ESG Leaders Index ETF	\$741	87%
3 TCLB	TD Canadian Long Term Federal Bond ETF	\$447	142%
4 XIC	iShares Core S&P/TSX Capped Composite Index ETF	\$405	4%
5 HSAV	Horizons Cash Maximizer ETF	\$297	17%
6 HXT	Horizon S&P/TSX 60 Index ETF	\$196	6%
7 ZAG	BMO Aggregate Bond Index ETF	\$135	2%
8 VEV	Vanguard S&P 500 Index ETF	\$119	2%
9 BTCC/U	Purpose Bitcoin ETF	\$119	19%
10 VGRO	Vanguard Growth ETF Portfolio	\$90	3%
11 VEQT	Vanguard All-Equity ETF Portfolio	\$88	5%
12 ZWB	BMO Covered Call Canadian Banks ETF	\$88	3%
13 ZSP	BMO S&P 500 Index ETF	\$83	1%
14 XFR	iShares Floating Rate Index ETF	\$78	26%
15 WXM	CI Morningstar Canada Momentum Index ETF	\$71	8%
16 QUU	Mackenzie US Large Cap Equity Index ETF	\$67	3%
17 ZEA	BMO MSCI EAFE Index ETF	\$66	1%
18 XEQT	iShares Core Equity ETF Portfolio	\$61	6%
19 ZCS	BMO Short Corporate Bond Index ETF	\$56	4%
20 VDY	Vanguard FTSE Canadian High Dividend Yield Index ETF	\$53	3%

Source: National Bank of Canada, Bloomberg;

**Table 5 - Top Single Long ETF Outflows - February 2022**

Ticker	Name	Flow (\$M)	Flow/AUM
1 ESGY/F	BMO MSCI USA ESG Leaders Index ETF	-\$766	-99%
2 HBB	Horizons Cdn Select Universe Bond ETF	-\$506	-34%
3 XUS	iShares Core S&P 500 Index ETF	-\$310	-6%
4 TEC	TD Global Technology Leaders Index ETF	-\$208	-12%
5 XBB	iShares Core Canadian Universe Bond Index ETF	-\$181	-4%
6 XFN	iShares S&P/TSX Capped Financials Index ETF	-\$160	-9%
7 ZEB	BMO Equal Weight Banks Index ETF	-\$154	-6%
8 ZGB	BMO Government Bond Index ETF	-\$119	-16%
9 DGR/B	CI WisdomTree US Quality Dividend Growth Index ETF	-\$106	-33%
10 ZLU	BMO Low Volatility US Equity ETF	-\$105	-6%
11 XGD	iShares S&P/TSX Global Gold Index ETF	-\$97	-8%
12 CMAG	CI Munro Alternative Global Gr	-\$72	-22%
13 FLGA	Franklin Liberty Global Aggregate Bond ETF Cad-Hedged	-\$69	-13%
14 VALT/U	CI Gold Bullion Fund	-\$57	-37%
15 PGL	Invesco Long Term Government Bond Index ETF	-\$54	-17%
16 ZUQ	BMO MSCI USA High Quality Index ETF	-\$51	-8%
17 ZCM	BMO Mid Corporate Bond Index ETF	-\$48	-5%
18 FCIQ	Fidelity International High Quality Index ETF	-\$48	-9%
19 ETHX/U	CI Galaxy Ethereum ETF	-\$44	-13%
20 XQB	iShares High Quality Canadian Bond Index ETF	-\$44	-9%

Source: National Bank of Canada, Bloomberg;

Tables continue next page

**Table 6 - ETF Flows by Category - February 2022**

Asset Class	AUM (\$M)	Mkt Shr	Flow (\$M)	Flow/AUM
Equity	\$214,092	65%	\$3,130	1.5%
Fixed Income	\$87,981	27%	\$163	0.2%
Commodities	\$1,689	1%	-\$49	-3.0%
Multi-Asset	\$15,881	5%	\$241	1.5%
Inverse / Levered	\$2,113	1%	\$171	8.9%
Crypto-Asset	\$5,220	2%	\$221	4.8%
<b>Total</b>	<b>\$326,977</b>	<b>100%</b>	<b>\$3,876</b>	<b>1.2%</b>

\*Equity Flows include option strategies; Source: National Bank of Canada, Bloomberg

**Table 7 - Equity ETF Flows by Geography - February 2022**

Geography	AUM (\$M)	Mkt Shr	Flow (\$M)	Flow/AUM
Canada	\$81,787	38%	\$2,280	2.9%
United States	\$73,617	34%	\$213	0.3%
DM: Broad	\$23,178	11%	\$391	1.7%
DM: Regional & Country	\$6,188	3%	\$161	2.6%
Emerging Markets	\$5,842	3%	\$51	0.8%
Global	\$23,480	11%	\$35	0.1%
<b>Total</b>	<b>\$214,092</b>	<b>100%</b>	<b>\$3,130</b>	<b>1.5%</b>

\*Equity Flows include option strategies; Source: National Bank of Canada, Bloomberg

**Table 8 - Equity ETF Flows by Sector\* - February 2022**

Sector	AUM (\$M)	Mkt Shr	Flow (\$M)	Flow/AUM
Financials	\$11,929	40%	-\$195	-1.6%
Real Estate	\$3,870	13%	\$38	0.9%
Energy	\$2,968	10%	\$65	2.4%
Technology	\$2,950	10%	-\$146	-4.4%
Materials	\$2,624	9%	-\$72	-3.0%
Health Care	\$2,485	8%	\$44	1.8%
Utilities	\$2,388	8%	\$64	2.8%
Other	\$689	2%	\$8	1.3%
<b>Total</b>	<b>\$29,903</b>	<b>100%</b>	<b>-\$193</b>	<b>-0.7%</b>

\*Includes all geo focuses and Covered Call Strategies; Source: NBF, Bloomberg

**Table 9 - Equity ETF Flows by Focus - February 2022**

Focus	AUM (\$M)	Mkt Shr	Flow (\$M)	Flow/AUM
Cap-weighted	\$127,961	60%	\$2,587	2.0%
Dividend / Income	\$23,191	11%	\$425	1.8%
Factor: Low Vol	\$8,339	4%	-\$148	-1.7%
Factor: Multi-factor	\$3,793	2%	-\$87	-2.2%
Factor: Fundamental	\$5,099	2%	\$63	1.2%
Sector	\$29,903	14%	-\$193	-0.6%
Thematic	\$10,083	5%	\$191	1.9%
Other	\$5,724	3%	\$294	5.3%
<b>Total</b>	<b>\$214,092</b>	<b>100%</b>	<b>\$3,130</b>	<b>1.5%</b>

\*Equity Flows include option strategies; Source: National Bank of Canada, Bloomberg

**Table 10 - Fixed Income ETF Flows by Type - February 2022**

Type	AUM (\$M)	Mkt Shr	Flow (\$M)	Flow/AUM
Canada Aggregate	\$25,398	29%	-\$425	-1.6%
Canada Government	\$9,317	11%	\$361	4.0%
Canada Corporate	\$14,125	16%	-\$83	-0.6%
U.S. / North America	\$8,544	10%	-\$81	-0.9%
Foreign	\$9,557	11%	-\$24	-0.2%
Sub-Investment Grade	\$5,077	6%	\$33	0.6%
Preferred/Convertible	\$9,131	10%	\$23	0.2%
Cash Alternative	\$6,832	8%	\$358	5.5%
<b>Total</b>	<b>\$87,981</b>	<b>100%</b>	<b>\$163</b>	<b>0.2%</b>

Source: National Bank of Canada, Bloomberg

**Table 11 - Fixed Income ETF Flows by Maturity - February 2022**

Maturity	AUM (\$M)	Mkt Shr	Flow (\$M)	Flow/AUM
Broad/Mixed	\$44,713	51%	-\$643	-1.4%
Ultra Short Term	\$4,282	5%	\$134	3.2%
Short Term	\$19,563	22%	-\$43	-0.2%
Mid Term	\$6,279	7%	-\$53	-0.8%
Long Term	\$4,497	5%	\$420	10.1%
Real Return	\$1,729	2%	-\$16	-0.9%
Target Maturity	\$86	0%	\$6	7.0%
Cash Alternative	\$6,832	8%	\$358	5.5%
<b>Total</b>	<b>\$87,981</b>	<b>100%</b>	<b>\$163</b>	<b>0.2%</b>

Source: National Bank of Canada, Bloomberg

### A note on Russian exposure in Canadian ETFs:

Russia's invasion of Ukraine on February 24<sup>th</sup> has formed huge ripples through the global financial markets. Canadian ETFs that track emerging market indices or invest in emerging market stocks or bonds may have exposure to Russian securities. Although there is no single-country Russia ETFs listed in Canada, emerging market equity and bond indices have approximately 3%-4% allocation Russian securities as of the end of February. Current exposure percentage will vary based on the available prices as well as the ongoing development of the treatment of Russian securities in Western-based indices and portfolios. By the end of February, Canadian ETFs had \$312 million (or slightly less than 1% of total asset) exposure to Russian securities via stock and bond holdings across equity, fixed income and multi-asset products<sup>1</sup>. While no Canadian ETF is at risk of terminating because of underlying Russian security sanctions, it is possible emerging market products (and to a lesser extent, multi-asset ETFs that hold them) might suffer losses, heightened volatility or wider bid-ask spreads as the situation develops.

### YTD February Flow (Tables 12 - 19):

Canadian ETFs welcomed \$8.9 billion year-to-date, of which a whopping \$7.7 billion went to Equity. Commodity is the only asset class that bled assets with outflows of \$236 million. Canadian equity ETF flows have outpaced their U.S. and international counterparts year-to-date, taking up close to 50% of total Equity inflows. Technology sector ETFs, a market darling for many years, lost assets in 2022 while defensive-oriented Utilities sectors saw re-uptake in demand. Within Fixed Income, the cash alternative ETF category was the clear winner with \$591 million inflows.

Two new ETF providers joined the market, bringing total number of ETF providers to 42.

1. Based on Bloomberg estimates of country allocations. Some actively managed ETFs that do not report full holdings to Bloomberg were omitted from the calculations.

**Table 12 - Top ETF Inflows - YTD February 2022**

Ticker	Name	Flow (\$M)	Flow/AUM
1	XIU iShares S&P/TSX 60 Index ETF	\$1,736	16%
2	ESGY BMO MSCI USA ESG Leaders Index ETF	\$751	82%
3	ZSP BMO S&P 500 Index ETF	\$602	5%
4	ZEA BMO MSCI EAFE Index ETF	\$591	11%
5	HSAV Horizons Cash Maximizer ETF	\$550	36%
6	TCLB TD Canadian Long Term Federal Bond ETF	\$486	166%
7	QCN Mackenzie Canadian Equity Index ETF	\$486	63%
8	VFV Vanguard S&P 500 Index ETF	\$453	7%
9	HXT Horizon S&P/TSX 60 Index ETF	\$417	14%
10	ZCS BMO Short Corporate Bond Index ETF	\$387	30%
11	HXS Horizons S&P 500 Index ETF	\$309	9%
12	VEQT Vanguard All-Equity ETF Portfolio	\$265	15%
13	HXCN Horizons S&P/TSX Capped Composite Index ETF	\$234	12%
14	VGRO Vanguard Growth ETF Portfolio	\$216	7%
15	WSGB Wealthsimple North American Green Bond Index ETF	\$197	NA
16	XEQT iShares Core Equity ETF Portfolio	\$184	21%
17	XSP iShares Core S&P 500 Index ETF CAD- Hedged	\$167	2%
18	ZWB BMO Covered Call Canadian Banks ETF	\$152	6%
19	VIU Vanguard FTSE Developed All Cap ex-North America Index ETF	\$126	4%
20	VDY Vanguard FTSE Canadian High Dividend Yield Index ETF	\$123	9%

Source: National Bank of Canada, Bloomberg;

**Table 13 - Top ETF Outflows - YTD February 2022**

Ticker	Name	Flow (\$M)	Flow/AUM
1	ESGY/F BMO MSCI USA ESG Leaders Index ETF	-\$764	-93%
2	HBB Horizons Cdn Select Universe Bond ETF	-\$484	-31%
3	TEC TD Global Technology Leaders Index ETF	-\$391	-18%
4	XSB iShares Core Canadian Short Term Corporate Bond Index ETF	-\$294	-15%
5	XEF iShares Core MSCI EAFE IMI Index ETF	-\$259	-4%
6	VALT/CI Gold Bullion Fund	-\$251	-72%
7	ZMP BMO Mid Provincial Bond Index ETF	-\$199	-27%
8	FLGA Franklin Liberty Global Aggregate Bond ETF Cad-Hedged	-\$194	-29%
9	XBB iShares Core Canadian Universe Bond Index ETF	-\$189	-4%
10	ZEB BMO Equal Weight Banks Index ETF	-\$189	-7%
11	ZGB BMO Government Bond Index ETF	-\$183	-20%
12	ZLU BMO Low Volatility US Equity ETF	-\$150	-8%
13	XFN iShares S&P/TSX Capped Financials Index ETF	-\$144	-8%
14	ZCN BMO S&P/TSX Capped Composite Index ETF	-\$144	-2%
15	CMUE CIBC Multifactor US Equity ETF	-\$129	-35%
16	DGR/B CI WisdomTree US Quality Dividend Growth Index ETF	-\$106	-32%
17	ZWA BMO Covered Call Dow Jones Industrial Average Hedged to CAI	-\$104	-32%
18	ZLB BMO Low Volatility Canadian Equity ETF	-\$102	-3%
19	MGB Mackenzie Core Plus Global Fixed Income ETF	-\$94	-38%
20	CMCE CIBC Multifactor Canadian Equity ETF	-\$90	-27%

Source: National Bank of Canada, Bloomberg

**Table 14 - ETF Flows by Category - YTD February 2022**

Asset Class	AUM (\$M)	Mkt Shr	Flow (\$M)	Flow/AUM
Equity	\$214,092	65%	\$7,673	3%
Fixed Income	\$87,981	27%	\$219	0%
Commodities	\$1,689	1%	-\$236	-12%
Multi-Asset	\$15,881	5%	\$757	5%
Inverse / Leveraged	\$2,113	1%	\$313	18%
Crypto-Asset	\$5,220	2%	\$154	3%
<b>Total</b>	<b>\$326,977</b>	<b>100%</b>	<b>\$8,880</b>	<b>2.6%</b>

\*Equity Flows include option strategies; Source: National Bank of Canada, Bloomberg

**Table 17 - Equity ETF Flows by Focus - YTD February 2022**

Focus	AUM (\$M)	Mkt Shr	Flow (\$M)	Flow/AUM
Cap-weighted	\$127,961	60%	\$6,113	4%
Dividend / Income	\$23,191	11%	\$844	4%
Factor: Low Vol	\$8,339	4%	-\$301	-3%
Factor: Multi-factor	\$3,793	2%	-\$323	-8%
Factor: Fundamental	\$5,099	2%	\$233	4%
Sector	\$29,903	14%	\$27	0%
Thematic	\$10,083	5%	\$366	3%
Other	\$5,724	3%	\$715	13%
<b>Total</b>	<b>\$214,092</b>	<b>100%</b>	<b>\$7,673</b>	<b>3.4%</b>

\*Equity Flows include option strategies; Source: National Bank of Canada, Bloomberg

**Table 15 - Equity ETF Flows by Geography - YTD February 2022**

Geography	AUM (\$M)	Mkt Shr	Flow (\$M)	Flow/AUM
Canada	\$81,787	38%	\$3,508	4%
United States	\$73,617	34%	\$2,219	3%
DM: Broad	\$23,178	11%	\$1,012	4%
DM: Regional & Country	\$6,188	3%	\$124	2%
Emerging Markets	\$5,842	3%	\$83	1%
Global	\$23,480	11%	\$727	3%
<b>Total</b>	<b>\$214,092</b>	<b>100%</b>	<b>\$7,673</b>	<b>3.4%</b>

\*Equity Flows include option strategies; Source: National Bank of Canada, Bloomberg

**Table 18 - Fixed Income ETF Flows by Type - YTD February 2022**

Type	AUM (\$M)	Mkt Shr	Flow (\$M)	Flow/AUM
Canada Aggregate	\$25,398	29%	-\$539	-2%
Canada Government	\$9,317	11%	\$206	2%
Canada Corporate	\$14,125	16%	-\$27	0%
U.S. / North America	\$8,544	10%	\$11	0%
Foreign	\$9,557	11%	-\$143	-1%
Sub-Investment Grade	\$5,077	6%	\$48	1%
Preferred/Convertible	\$9,131	10%	\$73	1%
Cash Alternative	\$6,832	8%	\$591	9%
<b>Total</b>	<b>\$87,981</b>	<b>100%</b>	<b>\$219</b>	<b>0.2%</b>

Source: National Bank of Canada, Bloomberg

**Table 16 - Equity ETF Flows by Sector\* - YTD February 2022**

Sector	AUM (\$M)	Mkt Shr	Flow (\$M)	Flow/AUM
Financials	\$11,929	40%	-\$21	0%
Real Estate	\$3,870	13%	-\$34	-1%
Energy	\$2,968	10%	\$212	10%
Technology	\$2,950	10%	-\$292	-8%
Materials	\$2,624	9%	-\$58	-2%
Health Care	\$2,485	8%	\$125	5%
Utilities	\$2,388	8%	\$94	4%
Other	\$689	2%	\$1	0%
<b>Total</b>	<b>\$29,903</b>	<b>100%</b>	<b>\$27</b>	<b>0%</b>

\*Includes all geo focuses and Covered Call Strategies; Source: NBF, Bloomberg

**Table 19 - Fixed Income ETF Flows by Maturity - YTD February 2022**

Maturity	AUM (\$M)	Mkt Shr	Flow (\$M)	Flow/AUM
Broad/Mixed	\$44,713	51%	\$913	-2%
Ultra Short Term	\$4,282	5%	\$98	2%
Short Term	\$19,563	22%	\$178	1%
Mid Term	\$6,279	7%	-\$257	-4%
Long Term	\$4,497	5%	\$524	12%
Real Return	\$1,729	2%	-\$7	0%
Target Maturity	\$86	0%	\$5	2%
Cash Alternative	\$6,832	8%	\$591	9%
<b>Total</b>	<b>\$87,981</b>	<b>100%</b>	<b>\$219</b>	<b>0.2%</b>

Source: National Bank of Canada, Bloomberg

### Appendix 1 - Glossary

**AUM (Assets Under Management):** AUM is expressed in local currency, which is the Canadian dollar for the purpose of this report.

**Flow/AUM (Flow as % AUM):** Net flow as a percentage of assets under management from the beginning of the period.

**Flow:** The net dollar amount of fund creations and redemptions for the period based on daily NAV and daily changes in Shares Outstanding. Flows are expressed in local currency, which is the Canadian dollar for the purpose of this report.

**Market Share (%):** category's AUM as % of the total AUM.

**MER (Management Expense Ratio):** Manager's 2020 annual fee for managing and administering the fund, expressed as a percentage of total fund value. In most cases, this includes fees from investing in other ETFs. Where audited MER is unavailable or if the fee has been significantly reduced recently, the MER is estimated using the Stated Management Fee and sales tax.

Canadian MER does not include trading commissions incurred by the ETF, nor does it include trading expenses (such as swap or forward fees). An asterisk (\*) indicates that the fund pays additional expenses such as swap or forward fees, which are normally reported under trading expenses. The asterisk can also indicate that the fund charges a performance fee. Data are sourced from annual fillings.

**NAV (Net Asset Value per share):** ETF price is used when NAV is not available.

*All numbers are as of last month's final business day.*

### Appendix 2 - Equity ETF Categories

We group Equity ETFs into the categories below. These groupings follow NBF's discretion and can differ from the ETF Provider's definition and classification from other sources.

**Cap-Weighted:** A fund that weights securities based on the total or float-adjusted market capitalization of each security.

**Dividend/Income:** A fund with primary goal of providing income. We classify a fund as belonging to the Income category when its strategy focuses on providing income or the fund self-identifies as using an income strategy even though it may incorporate other factors in addition to income.

**Fundamental:** A fund that selects and/or weights securities based on fundamental metrics from a company's financial statements such as balance sheet. Strategies include Value, Growth, Quality, RAFI Fundamental, Earnings, etc.

**Low Vol or Risk:** A fund that aims to achieve reduced portfolio volatility, either by screening for low volatility stocks, low beta stocks and/or minimizing the portfolio volatility.

**Multi-Factor:** ETFs that consider more than one NBF-defined factor including Income, Fundamental and Risk.

**Sector:** ETFs that provide exposure to broad industry sectors classified by the Global Industry Classification Standard (GICS) or other similar classifications. This category contains all sector funds, including ones that screen and/or weight the portfolio using factors.

**Thematic:** ETFs that provide niche exposures such as blockchain technology, infrastructure, Marijuana companies, Socially Responsible Investing, technology sub-sectors, agriculture, water, sentiment & behaviour, etc. This category contains all thematic funds, including ones that screen and/or weight the portfolio using factors.

**Other:** Any non-cap weighted strategy that is not covered by otherwise defined categories. This includes momentum, equal-weight, share buyback, high beta, proprietary, actively managed, tactical rotation, price-weighted, etc.

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