### Formula Growth Alpha Fund 2021 Investment Results

#### Highlights:

- ♦ 2021 was a tough year for hedge funds and small-cap growth stocks
- ♦ Very strong returns for large-cap and passive investors
- ◆ Rising interest rates will cool excesses
- ◆ Formula Growth Alpha Fund represents solid relative value

To all Investors,

For the full year 2021, the Formula Growth Alpha Fund ("FGAF") was up 0.2% U.S., net of all expenses, with an average net exposure of 2% while the total return of the S&P 500 and the Russell 2000 was 28.7% and 14.8%, respectively. Of course, these two Indices are 100% exposed to stocks. In terms of the Hedge Fund universe, the average Fundamental Long/Short Hedge Fund manager was up 0.6% in 2021 according to Goldman Sachs.

This letter will review our return attribution, our performance and that of the markets, as well as our investment posture for 2022.

#### FGAF 2021 Attribution

During 2021, our longs contributed approximately 1080 bps of positive gross performance. Long profits were well distributed with the 10 most profitable during the year averaging about 140 bps each on a gross basis. Long profits were augmented by an estimated 140 bps of gross profits from the short book during the year while hedges used to control risk lost approximately 970 bps. While ETFs did manage to control volatility in the Alpha Fund as a hedge against our substantial tech book, the outsized gains in the mega-tech and other favorite large-cap names drove the best known and liquid Indices higher, making their use as hedges counterproductive as they neutralized returns. We are reviewing additional tools to hedge to avoid this issue in the future. Losses were well controlled with the top 10 unprofitable positions losing 950 bps, with the worst one being a long position in Root Inc. at 120 bps, a financial software stock. The top 10 losses were more than offset by 1470 bps of profits from the top 10 winners during the year. Contributors to the Fund's performance during 2021 included consumer led companies, one large communication software take out, several other solid tech names, and a real estate company. Two of the top 10 winners were shorts.

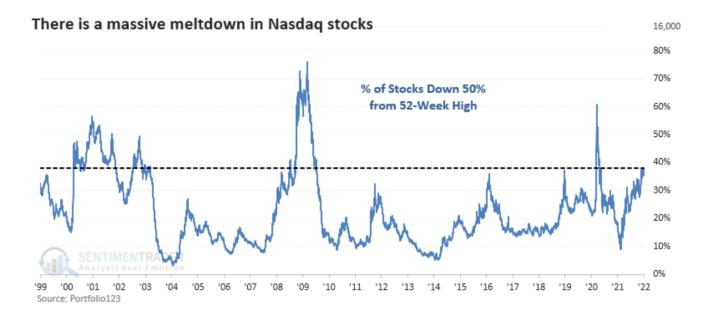
Eight of the top 10 losers were from the long side of the portfolio, this is very unusual over the 10-year life of the FGAF. Even more unusual is the speed at which the losses occurred over the last 2 quarters of the year. Between the exercise of stops and other reductions in position sizes, we have cut the exposure to these stocks by more than approximately 50% with 3 positions entirely eliminated from the portfolio. We think the upside associated with the remaining estimated 720 bps of exposure is significant after having re-scripted our catalysts and targets



# Formula Growth Alpha Fund 2021 Investment Results

subsequent to follow-up research with company executives and other relevant parties.

In sum, a recap of the year reveals mostly mediocre sector allocation with reasonable stock selection. Small-cap sectors we emphasize like technology, consumer and healthcare took a back seat to the perceived safety in large-cap growth stocks. We are pleased with the broad variety of stocks that produced our results in 2021 but like many investors we were fighting a difficult tape both long and short in too many instances during the last 6 months of the year. The difficulty illustrated by the shocking fact that nearly 40% of the 3600 NASDAQ Composite (CCMP) stocks are down 50% from their highs, even as the Composite is down only 6% from its high. Under the surface of most indices there was a great deal of individual carnage among what could be termed the "average stock" during the second half of the year. The Alpha Fund ended the year positioned at 77% gross long, offset by 76% gross short, or gross exposure of 153%.



#### 2021 Market Performance

During 2021, the MSCI World Index was up 20% with the North American markets dominated by the S&P 500, up an even stronger 25%. Astonishingly, 35% of the S&P 500 28.7% gain was from just 7 mega-caps (MSFT, AAPL, NVDA, TSLA, GOOGL, FB, and AMZN) today worth \$12 trillion or 25% of the entire U.S. stock market. Big rallies in these tech behemoths and a series of painful market jolts in certain stocks and sectors created a treacherous trading environment and huge dispersion in hedge fund returns.

Hedge funds generally lagged because they tend to hold only tiny amounts in these tech giants. They also are obliged to short stocks to hedge risk even in a bull market year like 2021 when investors were piling on risk.



## Formula Growth Alpha Fund

At the beginning of 2021, the conditions for this kind of global bull run were not obvious. As the year began and then unfolded, it has been a series of rolling global lock downs. Vaccines of course worked but not quite as well as we thought, reducing severe illness but not eradicating the C-19 virus and its variant cousins completely. The result was whipsawing constraints to the broad economy and to many businesses and labor. Stock markets should have also been spooked by budget deficits soaring to levels not seen since 1945 and by government policies mostly wrong footed but instead markets continued to advance.

The response of course to unprecedented times was a gusher of money from Central Banks and government fiscal policy shoveling money in almost every pocket that could be found. Not wanting to be left out as stock prices rose on the back of free money, global bourses raised \$12 trillion up 50% from 2019 according to the FT and Refinitiv data. The result has been a surge in the price of goods and services across the board and a debate that has shifted to inflation and to the Central Bankers next move.

Interestingly, the one element about 2021 that was congruent with a strong stock market was earnings. In 2021, corporate earnings were very strong, driving up stock valuations in a low interest rate environment. Real interest rates are negative when adjusted for inflation and getting more negative as inflation increases and persists. Accordingly, interest rates will rise, it is only the extent and speed at which they do that is unknown. In this bull market it is likely many investors have over done a good thing in certain sectors and stocks. More than likely there is a "hangover" somewhere out there in the future or at least a pause in momentum.

#### **Outlook**

For stocks to maintain their momentum this year, it will be important for the pandemic to be recognized as an endemic or at least less virulent. New more harmful variants cannot be ruled out though evidence suggests the omicron variant is milder, global immunity is growing and other treatment options such as anti-viral pills are becoming available.

Markets will also need to see price inflation subsiding as supply chains de-clutter and labor gets back to normal. It is not clear if inflation is entirely supply side driven, only time will tell and a China lockdown is a very real possibility. There remains a great deal of global liquidity in the system strengthening demand for goods and services. A misstep by a too aggressive Federal Reserve could take the punch bowl away slowing the economy and corporate earnings growth. Finally, there are higher taxes on the horizon that will put additional pressure on prices and also slow economic growth.

The uncertainty associated with the pandemic and inflation/interest rates keeps our gross exposure cautious in the FGAF. Though we think stocks will still likely outperform bonds in a moderately rising rate environment during 2022, we are treading carefully with our gross exposure. It is our bet that earnings growth will moderate for the strong, pandemic fueled stock market darlings. Slowing growth rates and the fear of rising rates make it likely the mainstream Indices like the S&P 500 and passive investing cool off.



# Formula Growth Alpha Fund 2021 Investment Results

#### **Conclusion**

Within the broad asset class of equities, we think relative valuation favors small-cap stocks and within small-cap stocks we feel the lagging growth segment is best positioned. Evidence of this is the 1000 stocks that comprise the Russell 2000 Growth Index (RUO) that were up just 2.4% in 2021. We feel the overall portfolio valuation of FGHF offers solid upside potential -long and short.

Management teams for holdings in our long book delivered mostly on earnings throughout the year. As we begin 2022, we are reasonably confident in our estimates for this year and next. The average P/E multiple for the long book is an estimated 16-17x 2022 earnings with solid growth rates likely. The inverse of a P/E multiple is called the earnings yield. We believe the Fund's earnings yield of around 6% is far more attractive than bonds and represents excellent value when compared to the S&P 500 Index at 20x earnings and the tech heavy NASDAQ Index at 27x.

Reasonably priced longs, combined with the short side of the ledger, and hedges results in a portfolio we believe to be embedded with less risk. Shorts were profitable this year and we expect shorts to continue to pay off as air is let out of many of the bubble stocks excessively bid up in 2021.

On behalf of the officers and employees of Formula Growth, allow us to take this opportunity to sincerely thank you for your continued support. Please also accept our best wishes for a healthy, happy and prosperous 2022.

Yours truly,

Formula Growth Limited

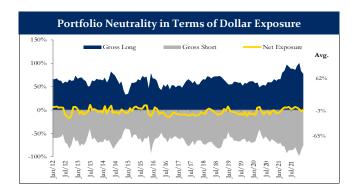
Formula Growth Alpha Fund Class F (US\$) - Monthly and Year-To-Date Net Returns (US\$ Returns)													
Year	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	YTD
2021	2.9%	3.3%	1.4%	(0.4%)	0.8%	2.9%	(1.8%)	(1.0%)	0.1%	(3.5%)	(3.1%)	(1.2%)	0.2%
2020	0.1%	(1.2%)	(8.2%)	4.9%	0.8%	0.2%	0.5%	(2.4%)	(0.1%)	1.6%	1.3%	(1.4%)	(4.4%)
2019	5.6%	0.7%	(1.1%)	0.7%	(1.6%)	(0.1%)	(1.7%)	(0.7%)	4.3%	1.0%	(0.3%)	(0.5%)	6.2%
2018	(1.3%)	1.0%	1.2%	2.1%	(0.2%)	(0.1%)	(0.8%)	(1.4%)	(1.3%)	(0.5%)	0.1%	(3.0%)	(4.1%)
2017	1.0%	(0.4%)	1.3%	(0.6%)	1.7%	1.3%	(0.2%)	0.7%	1.1%	(0.9%)	(2.0%)	0.8%	3.9%
2016	(5.4%)	1.4%	5.2%	0.2%	0.7%	(0.6%)	1.3%	1.8%	2.4%	0.0%	(0.8%)	2.2%	8.4%
2015	0.1%	2.5%	1.4%	2.3%	1.0%	(0.7%)	(1.1%)	1.4%	(1.3%)	0.6%	1.2%	(0.4%)	7.1%
2014	1.6%	2.2%	1.4%	1.4%	3.4%	0.0%	(1.3%)	1.1%	(1.2%)	(4.4%)	(1.2%)	0.0%	2.7%
2013	1.1%	(1.1%)	0.8%	(0.8%)	2.1%	1.1%	1.8%	1.1%	1.5%	4.6%	(0.9%)	0.3%	11.9%
2012	7.0%	6.6%	0.9%	(1.6%)	(1.5%)	(1.8%)	0.1%	0.7%	1.4%	0.9%	2.2%	5.5%	21.9%

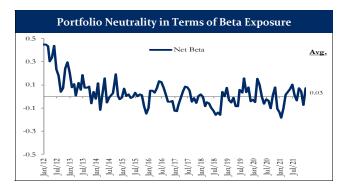


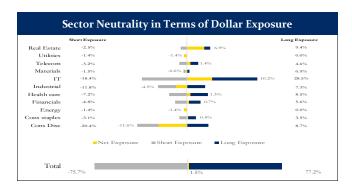
### Formula Growth Alpha Fund Fourth Quarter 2021 Investment Results

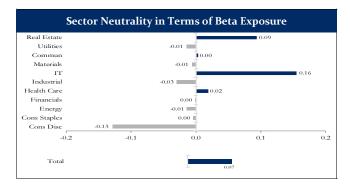
Market and Beta Exposure										
	30-Sep	Q4 Avg.	31-Dec	2021 Avg.						
Gross Long	95.9%	89.9%	77.2%	84.6%						
Gross Short	-91.6%	-88.0%	-75.7%	-86.8%						
Net	4.4%	1.9%	1.5%	-2.2%						
Total Gross	187.5%	178.0%	152.9%	171.4%						
Net Beta	0.07	0.04	0.07	0.02						



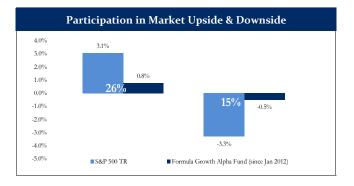












Graphs above are either as at December 31st, 2021 or since inception of the strategy. Please see Notes & Disclaimers on page 5. Do not hesitate to contact us should you have any questions.



### **Glossary of Terms**

- <u>Alpha longs</u>: An investment strategy which involves taking long positions in stocks that are expected (in the opinion of the managers) to increase in value by more than 30% over approximately 12 to 18 months.
- <u>Alpha shorts</u>: An investment strategy which involves taking short positions in stocks that are expected (in the opinion of the managers) to decrease in value by more than 20% over approximately 12 to 18 months.
- <u>Short positions</u>: The sale of a borrowed security, with the expectation that the stock/security will fall in value and the re-purchase will result in a positive investment result.
- <u>Pair trades</u>: An investment strategy whereby an initial investment is made in a stock/security either long or short with a corresponding direct offset, or hedge, against the primary risk of the initial investment.
- <u>Hedges</u>: Hedging is the practice of taking a position in one market or stock/security to offset and balance against the risk adopted by assuming a position in a contrary or opposing market or stock/security.
- <u>Correlation:</u> Correlation in the investment industry is a statistic that measures the degree to which two securities move in relation to each other. Correlation is computed into what is known as the correlation coefficient, which has a value that must fall between 1 and 1. A perfect, positive correlation means that the correlation coefficient is exactly 1. This implies that as one security moves, either up or down, the other security moves in lockstep, in the same direction. A perfect, negative correlation of -1 means that two assets move in opposite directions, while a zero correlation implies no relationship at all.
- Sharpe ratio: The ratio measures the excess return (or risk premium) per unit of deviation in an investment asset or a trading strategy, typically referred to as risk.
- <u>Batting average</u>: Number of positions on which we have a positive return divided by the total number of positions we held during the period.
- <u>Slugging average</u>: Average contribution of positions on which we have a positive return divided by the average contribution of positions on which we have a negative return for the period.
- <u>Upside/Downside Capture</u>: Upside market participation since inception is calculated as the average performance of the fund when the benchmark has a positive month while the downside market participation is calculated as the average performance of the fund when the benchmark has a negative month.



### Notes & Disclaimers

- Performance figures reported from January 1st 2014 onwards represent the US\$ net performance of the Formula Growth Alpha Fund (the "Fund") after all fees and other Fund expenses. Prior returns represent the US\$ net performance of the Formula Growth Alpha II L.P. and are based on an investment in the Fund made on January 1, 2012, the date of the Strategy's inception. The Formula Growth Alpha II L.P. was launched in May 2011. In January 2012, significant changes were made to the risk management and portfolio management guidelines. As risk management and portfolio management guidelines established in January 2012 are relevant only to the current strategy of the Formula Growth Alpha Fund, the statistics do not include the 2011 performance figures which are available upon request. In January 2014, the Formula Growth Alpha II Fund structure was changed from a Canadian Limited Partnership to a Canadian Mutual Fund Trust and the name of the fund was changed to the Formula Growth Alpha Fund.
- Gross portfolio returns discussed are presented after reduction for any investment and Fund accounting related expenses, net interest, other expenses and the reinvestment of dividends, and include any gains or losses from "new issue" securities. Per the Fund's High Water Mark provisions, net performance figures take into account a 1% Management Fee and a 20% incentive allocation. Performance results for particular investors may vary from the performance stated herein as a result of, among other things, the timing of their investment(s) in the Fund, different management and incentive allocation terms and the respective investor's eligibility to participate in "new issue" securities.
- All performance figures contained herein are unaudited estimates and subject to change. Certain information contained herein may have been provided by third party sources including Bloomberg, and, although believed to be reliable, has not been independently verified and cannot be guaranteed. Performance estimates are presented only as of the date referenced above and may have changed materially since such date.
- Market index information shown herein, such as that of the S&P 500 TR, Russell 2000 TR, JPM GABI and HFRI EMN Indices, are included to show relative market performance for the periods indicated and not as standards of comparison, since these are unmanaged, broadly-based indices which differ in numerous respects from the portfolio composition of the Fund. Market index information was compiled from sources that Formula Growth believes to be reliable. No representation or guarantee is made hereby with respect to the accuracy or completeness of such data. The current month's HFRI EH: EMN return is that of the HFRX EH: EMN which is used as a proxy for the HFRI. For more information regarding the indices, please consult https://www.hedgefundresearch.com.
- The analyses, opinions, and conclusions of Formula Growth contained in this report include certain statements, assumptions, estimates and projections that reflect various assumptions by Formula Growth concerning anticipated results that are inherently subject to significant economic, competitive, and other uncertainties and contingencies and have been included solely for illustrative purposes. No representations, express or implied, are made as to the accuracy or completeness of such statements, assumptions, estimates or projections or with respect to any other materials herein.
- Performance attribution figures and returns for individual securities, including ETFs, reflect summations of the respective profits and losses divided by the average of the beginning and end of month total gross Fund assets, and are not inclusive of expenses, management, and incentive fees/allocations. Performance attributions should be considered approximations calculated to the best of our knowledge.



### **Notes & Disclaimers**

- Beta is calculated by Formula Growth Ltd. using the Bloomberg system and is the trailing 6 months daily returns versus the S&P
   500 unadjusted (raw).
- Exposure represents the market value of all equity securities and single-equity-backed instruments (i.e. derivatives) as of the date of this letter/report. Exposure numbers exclude currency hedges.
- Sector and industry classifications are determined by Formula Growth Ltd. using available sources such as Bloomberg. Exposures based on these figures include ETFs and should be considered as approximations calculated to the best of our knowledge.
- Market Capitalization represents the relative market capitalization of long and short positions on a United States dollar adjusted basis using available sources such as Bloomberg. Exposures based on these figures do not include ETFs and should be considered as approximations calculated to the best of our knowledge.
- Formula Growth Ltd. serves as the investment manager for the Fund. Investors should consult the Offering Memorandum (the "Memoranda"), which is available upon request, for more information on the investment strategy, complete disclosures and the terms and conditions relating to an investment in each Fund.
- Any investment in the Fund is speculative and involves substantial risk, including the risk of losing all or substantially all of such investment. No representation is made that the Fund will or is likely to achieve their objectives, that any investor will or is likely to achieve results comparable to the estimated performance shown, will make any profit at all or will be able to avoid incurring substantial losses. Past performance is not necessarily indicative of future results.
- The Fund has monthly liquidity provisions for redemptions and subscriptions. There is no secondary market for the interests in the Fund and none is expected to develop. There are restrictions on transferring interests in the Fund. Formula Growth Ltd. has total trading authority of assets within the Formula Growth Alpha Fund.
- The Fund's fees and expenses may offset its trading profits. The fact that Formula Growth Ltd. is eligible to receive an incentive fee or allocation may create an incentive to make investments on behalf of the Fund that are riskier or more speculative than would be the case in the absence of such priority allocation of profits.
- The Fund may be denominated in a currency that is not the currency of your own jurisdiction and thus may be subject to any fluctuation in exchange rates between your investment in the Fund and the currency of your own jurisdiction. Such fluctuations may have an adverse effect on the value, price or income return of your investment.
- The Fund is subject to conflicts of interest. Please review the "Risk Factors" and "Conflicts of Interest" sections in the Memoranda.
- This document is intended only for the person to whom it has been delivered by Formula Growth Ltd. This document is provided for informational purposes only, may not contain certain material information about the Fund, and is not an offer to sell or a solicitation of an offer to buy any interest or shares in the Fund. Any investment decision in connection with the Funds should be made based on the information contained in the Memoranda. This document is the property of Formula Growth ltd., is strictly confidential and may not be reproduced or redistributed nor may any of its contents be disclosed to any other person under any circumstances. This document is not intended to be, nor should it be construed as, financial, legal, tax, accounting or investment advice or recommendations.