



July 2020

Meet the Manager: An interview with Rob Croce

Roberto Croce, PhD | Head of Risk Parity and Liquid Alts

We sat down with Rob to learn more about what drives his passion for quantitative investing and his journey from academic research to thought leader.

What drew you to quantitative and alternative strategies?

In my last year of graduate school I did an internship with the strategic research group at the Teacher Retirement System of Texas. It was my first hands-on exposure to alternatives: What are alternative approaches? How do institutional investors use them? Before that, I would have told you an indexed approach with low fees and a standard 60/40 allocation is all you need to be successful.

It was interesting to see how institutional investors were using more sophisticated and interesting strategies to build better portfolios. These were people who understood their utility and how they fit into their fiduciary responsibility to do things as cheaply as they can. It was that initial exposure that led me down the path towards alternative and quantitative strategies.

What did you learn from your teaching experience at Ohio State while getting your PhD, and how do you apply it to your approach now?

The interesting thing about teaching at Ohio State was that they threw you in a classroom without much guidance. They didn't tell me what book to use or provide communication skills. So it was completely up to me to decide what and how I was going to teach.

So it was sink or swim – a really great learning experience.

It wasn't always easy. At a certain level I was teaching concepts that I had only recently learned. So my confidence levels were not as high as they would be now that I've been doing econometrics for 15 years. In that situation one has to project a certain air of confidence or else the students will see right through it. Teaching was

also a great opportunity to get comfortable speaking in public and articulating concepts that aren't intuitive to many people. It was good preparation for talking about sophisticated investment strategies to investors who don't have a technical background.

There is a lot of truth to the cliché that the teacher learns more than the students.

How would you describe your investment style and approach?

I think that the best short description is that we are data-driven. We use history as a guide to discern what has worked consistently in a lot of different periods, markets and asset classes. And we try to be as true to what the data tells us as possible. That doesn't mean overfitting and implementing ideas that work in the data without an understanding or intuition as to why they should work in the real world. But it does mean focusing on what we learn from the data and avoiding human biases that could otherwise creep into a less systematic process.

Did anything else reinforce your beliefs?

The academic and practitioner literature is really convincing in this area. The work of Daniel Kahneman and Amos Tversky on behavioral biases, which was summarized in *Thinking Fast and Slow*, makes it really clear. But the best test is to see how you feel inside when you're making money versus when you're losing money. When you're losing money the number one thing you want to do to get the heck out of there. Even if you know that when markets go down they usually come back. And just because it's down a lot over the last week doesn't mean I have any more information about what can happen in the near term. Losing money creates panic and leads to bad behavior.

The same is true when we base our investment on stories. I love this stock because it's a great story or a great company or I really like their product. Does it mean it's a good investment?

It's difficult though. Managers that have stories about a couple of stocks can engage investors much more effectively than someone with a bunch of mathematical formulas. Warren Buffett said it best, "beware of geeks bearing formulas."

What do you look for from a new investment?

The potential to generate return and diversify the strategy. If there's some new stock that I have every reason to believe is going to make money but it behaves just like the S&P 500[®] there would be no reason to add it to our portfolio. So it's not just about the expected return, it's about the entire portfolio. It's the overall outcome that we care about. So we don't focus on one strategy, even if we think it's the very best thing out there, because you're sunk if it stops working. We prefer to have a lot of arrows in our quiver, each with a moderate edge associated with it, and then put them together in a way that can withstand really adverse environments.

How do you view risk and how do you think your approach differs from other investment managers?

A key differentiator of our approach, different even from other systematic investors, is that we attempt to generate a constant level of risk. So what is risk? Risk is the likelihood that I won't have the capital to pay off what I need to pay off ten years from now. We view risk, diversification and portfolio construction through the following lens: how can I achieve our objective for the next ten years. That said, we do use some technical tools as shorthand. We use measures of risk like volatility or standard deviation of returns in order to measure the likelihood that the portfolio will leave us ahead or behind our objectives in the long run. So we do use these technical tools even though we don't think that they are the end all and be all in terms of measuring risk.

On a daily basis we try to deliver portfolios that have the same expected volatility. So we might expect the portfolio to be up or down 1% on any given day. That's

a volatility target. We believe that delivering a constant amount of risk diversifies the outcome across different periods of time because I don't know if this month is going to be better than next month. Since I don't know, why would I allow my portfolio to take more risks this month than next month? One of the best ways to diversify is across time, by taking the same amount of risk every day, week, month, etc.

How do you kind of consistently keep emotion out of it? Is it difficult at times to stick to the system?

It's difficult if you feel in your gut that the positions are wrong, that we may lose money and underperform our peers. We have to remind ourselves that we've designed the system to be extremely adaptive and that the way we look at markets is built in to the models. We have mechanisms in place to observe when market risk has changed significantly versus how we're positioned, and we reduce equity exposure very quickly when market volatility increases sharply. We have done a lot of work in advance to build models that adapt on their own without intervention.

And we are continuously scrutinizing our implementation to ensure that we are taking a constant amount of risk. For example, in 2019 one of our risk parity strategies was up over 50% or so through July. But one month had a return of approximately 14%, which is a four-standard-deviation month for us. Even though it was positive and we felt that the markets were most likely favorable to the strategy, we observed that the portfolio was taking more risk than we intended. We immediately reduced the portfolio's exposure because our primary objective is to take the same amount of risk at all times.

What was the most challenging aspect of that? Sticking to it? Not getting emotional.

All of it. When we're losing money I want to crawl under my desk and hide. The last thing I want to do is get out there and talk to clients about why we lost money, even if the loss is within the range of expectations. I feel worse losing other people's money than I do my own because of our duty to clients. I realize that sounds corny, but it's true. The first rule of the business is you have to stay in front of your clients and provide them with information,

especially when that information is not good. But that doesn't mean it's easy.

Have you ever had moments where you didn't believe in the process or how did you stick to your guns during those moments of uncertainty?

I have. At a prior firm, I was on a team where we had some challenging performance and I observed a very dogmatic approach to dealing with it. The response was: these are the rules that we live by and we live by them and that's it. No matter what comes.

We prefer to be more adaptive. We certainly don't change our process during difficult periods. That's the worst thing you can do. It's as bad as not having a process. We prefer to have a more nuanced approach. We do evolve the way that we implement the portfolios and are constantly looking for better ways to deliver on our clients' objective.

And part of that is being more receptive to what our client's objectives actually are. Do our clients want to stay in the market come hell or high water throughout a month because, for example, we rebalance monthly and we don't want to change the rules of the game? No, we keep our eyes and ears open. However, the answer is not to just respond because you feel something. We try to respond by building tools that give us an unbiased view of the market, and we pay attention. So we're always learning new things. We're always learning that we're supposed to be paying attention to something new or something else that we weren't paying attention to before. Our processes have evolved to do that so that we believe we're not as susceptible to drawdowns as we used to be.

Was experiencing that kind of dogmatic approach a defining moment in your career?

Definitely. Observing that rigid, stick-to-your-guns approach was illuminating. There has to be an if/then, but we hadn't planned for it. Now we have a process for the if/then. Say if we are outside the operating parameters that we have communicated to our clients, then we know what to do. We have a third step that we take.

What do you enjoy most about working at Mellon?

If it's one single thing I get to work with a lot of really smart people. But if it's more than one thing, it's the opportunity to promote what is partly a new line of business for Mellon. Our team was looking for the opportunity to build a new business within an established asset manager in order to take advantage of the scale. We have to be part of a big firm that is capable of strategic partnerships with clients because clients don't want to have more managers. They want fewer, but deeper, relationships with their managers.

How do you envision the future of investment management?

It's going to be more data-driven. So it doesn't mean active management or discretionary management is going away, but there are going to be empirical guardrails around it. We're going to be measuring everything we do and we're going to have a lot better idea of what we're good at. Even in discretionary portfolio management. We need to identify where we have an edge and where we don't and derive more active risks from areas where we have a demonstrable edge.

Learning and improving is an iterative process. But I think that being data-driven gives us ability to do that. We evaluate how we trade in each market so that we get better and reduce transaction costs. We're data-driven when we look at how to respond to changes in the environment.

How do you think portfolio managers will have to adapt?

I would suggest that they're going to have to fit into a more disciplined process. Portfolio managers will need a more rigorous process where all of the active risks that are taken in the portfolio are measured and position sizes are based on something other than gut feel. There needs to be an awareness that the correct position size is 3%, not 10%. That's going to take some of what feels like freedom away from portfolio managers, but it's going to be very clear what the payoff for that is and it's going to be better performance. At the end of the day, we all want to perform as well as we can for clients, so after an initial shock, I think a technical toolkit will be broadly embraced.

Who are the people in the industry that you admire?

Three come immediately to mind who have done a lot for investors and for our industry. Warren Buffett is certainly one. The message I took from Buffet is that things don't need to be complicated. The market price can be totally wrong and you just have to ignore it. John Bogle is another. Most investors would be well served by just focusing on costs and gathering the market return.

The third is Cliff Asness, who has done more for sophisticated institutional investors than anyone. The reason I say that is he has sort of lifted the veil and reduced the amount of smoke and mirrors behind quantitative approaches that had been used to justify higher fees. And it's against his interest. He calls it like he sees it—even if it's not good for his pocketbook. That's the kind of investor I would like to be. Speak your mind, in a reasonable way of course. But call it like you see it and try to do good for the world beyond just delivering great investment results.



Roberto Croce, PhD | Managing Director, Head of Risk Parity & Liquid Alts

Rob is the head of risk parity & liquid alternatives and the portfolio manager for the Risk Parity and Managed Futures strategies at the firm. He is responsible for managing our suite of liquid alternative strategies and the development and maintenance of the underlying quantitative models.

Prior to joining the firm in 2018, Rob was a managing director of quantitative strategies at Salient Partners. He was the lead portfolio manager on Salient's risk parity and managed futures strategies and co-portfolio manager on several other funds. In addition, Rob and his team built Salient's quantitative software and hardware platform from the ground up and continue researching potential strategy improvements and new products. Prior to joining Salient in 2011, Rob taught macroeconomics and finance at Ohio State University, published academic research and served as a research assistant. In 2010, Rob interned in the Strategic Research group at the Teacher Retirement System of Texas.

Rob earned both a master's and doctoral degrees in economics from Ohio State University and a Bachelor of Science in economics from Penn State University.

Disclosure

Mellon Investments Corporation ("Mellon") is a registered investment advisor and subsidiary of The Bank of New York Mellon Corporation ("BNY Mellon"). Any statements of opinion constitute only current opinions of Mellon, which are subject to change and which Mellon does not undertake to update. This publication or any portion thereof may not be copied or distributed without prior written approval from the firm. Statements are correct as of the date of the material only. This document may not be used for the purpose of an offer or solicitation in any jurisdiction or in any circumstances in which such offer or solicitation is unlawful or not authorized. The information in this publication is for general information only and is not intended to provide specific investment advice or recommendations for any purchase or sale of any specific security. Some information contained herein has been obtained from third party sources that are believed to be reliable, but the information has not been independently verified by Mellon. Mellon makes no representations as to the accuracy or the completeness of such information. No investment strategy or risk management technique can guarantee returns or eliminate risk in any market environment and past performance is no indication of future performance. The indices referred to herein are used for comparative and informational purposes only and have been selected because they are generally considered to be representative of certain markets. Comparisons to indices as benchmarks have limitations because indices have volatility and other material characteristics that may differ from the portfolio, investment or hedge to which they are compared. The providers of the indices referred to herein are not affiliated with Mellon, do not endorse, sponsor, sell or promote the investment strategies or products mentioned herein and they make no representation regarding the advisability of investing in the products and strategies described herein. Please see mellon.com for important index licensing information.

For more market perspectives and insights from our teams, please visit www.mellon.com.