

**MARKET REPORT
THIRD QUARTER 2024**

Key Points

- The carry trade hit a speed bump.
- Technology didn't lead the quarter.
- The yield curve normalized, finally.
- We continue our series on Risk vs. Uncertainty and the Decision-Making Process.

A Review of the Quarter

After a seamless transition from the second quarter into the third, equity market volatility began spiking when the Bank of Japan (“BOJ”) increased its target rate for short-term interest rates on July 31 to around 0.25%, from a range of 0.00% to 0.10%. This **minuscule** rate increase is credited with disrupting the “carry trade” and contributed to a roughly 6% precipitous decline in the S&P 500 during the early days of August.

A carry trade exists when an investor borrows funds (e.g., Japanese Yen) at a low interest rate and invests the loan proceeds in a potentially higher returning asset (e.g., U.S. Dollar denominated assets like Treasuries, corporate bonds or stocks). Unexpected changes in interest rate and/or currency differentials can change the calculus and cause **short-term** chaos.

Around the same time as the BOJ announcement, there was a flurry of **mixed** U.S. economic data and a large Apple shareholder announced that it had meaningfully reduced its exposure. All of these and other factors seemingly shaped the mood du jour. Soon thereafter, the investing glass was again viewed as **half-full**, rather than half-empty, and U.S. equity averages marched in a zigzag fashion higher into quarter-end. During this short time span

Total Return as of September 30, 2024						
			Annualized			
	QTD	YTD	1 Yr	3 Yr	5 Yr	10 Yr
S&P 500	5.9%	22.1%	36.4%	11.9%	16.0%	13.4%
NASDAQ	2.8%	21.8%	38.7%	8.9%	18.8%	16.2%
Russell 3000						
Index	6.2%	20.6%	35.2%	10.3%	15.3%	12.8%
Value	9.5%	16.2%	27.7%	8.7%	10.6%	9.2%
Growth	3.4%	24.0%	41.5%	11.3%	19.1%	16.0%
Russell Mid Cap						
Index	9.2%	14.6%	29.3%	5.8%	11.3%	10.2%
Value	10.1%	15.1%	29.0%	7.4%	10.3%	8.9%
Growth	6.5%	12.9%	29.3%	2.3%	11.5%	11.3%
Russell 2000 (Small Cap)						
Index	9.3%	11.2%	26.8%	1.8%	9.4%	8.8%
Value	10.2%	9.2%	25.9%	3.8%	9.3%	8.2%
Growth	8.4%	13.2%	27.7%	-0.4%	8.8%	9.0%

when **market psychology** swung from optimistic to pessimistic and back to optimistic – **little changed fundamentally**.

U.S. Equities

The tone of U.S. equity markets changed during the quarter as new market leadership seemingly emerged. Within the S&P 500, interest rate sensitive real estate and utilities took the lead this quarter as short-term rates were anticipated to be and were reduced near quarter's end. Technology and related issues have dominated the market in recent periods but were the weakest performing sectors behind energy during the quarter: energy (-2.3%), technology (1.6%) and communications services (1.7%).

Small and mid-cap value averages **bested** their growth counterparts, as well as large-cap averages. Furthermore, the S&P 500 **equal-weighted** index outpaced the more widely followed **cap-weighted** index by **3.7 percentage points**. Broader market participation is welcome and healthier, in our view, as opposed to having a few pricey large-cap technology companies driving cap-weighted index results.

Fixed Income & Commodities

Corporate bonds' total returns, as measured by the ICE BofA U.S. Corporates 1-10 Yr. index, increased 4.6% during the quarter, bringing the year-to-date return to 6.0%. U.S. Treasuries and Agencies, as measured by a similar index, increased 3.9% for the quarter, bringing the year-to-date return to 4.3%.

After much anticipation, the Federal Reserve (the "Fed") finally cut the overnight rate by 0.50% at its September meeting, bringing the targeted range down to 4.75% - 5.00%. The yield curve, as measured by 2-Year and 10-Year Treasury maturities, normalized. A normal yield curve is upward sloping: longer maturities yield more than shorter maturities. The yield curve had been inverted: shorter maturities yielding more than longer maturities, since July 2022, resulting in the longest inversion on record. Credit spreads (difference in yield between a U.S. Treasury, and for example, a corporate bond of equal maturity) widened slightly in the six-month to two-year range and otherwise generally contracted.

The Fed may reduce **overnight interest** rates **further** in the months ahead. If this occurs, as anticipated, the interest rate paid on short-term deposits and money market funds should decline, bringing **reinvestment risk** (risk of reinvesting at a lower yield) to the forefront. If you have **excess cash** on your business or personal balance sheet, our Income Strategy (which currently consists primarily of corporate bonds) can help manage reinvestment risk.

Overnight rates get a lot of press but may no longer be the lead actor in the Fed's show. The lead spot may very well go to asset purchases, better known as Quantitative Easing. In January 2008, total assets of the Fed stood at roughly \$0.8T and by the end of that year were

up to \$2.2T as the financial crisis unfolded. Assets continued growing until leveling off in January 2015 at around \$4.5T, then hovered around that level for a while before declining in subsequent months to roughly \$3.8T in September 2019. Then, COVID hit the U.S. in the spring of 2020 and brought the U.S. economy to its knees. The Fed stepped in, thankfully, but assets ballooned to \$9.0T by April 2022 before starting a decline to around \$7.0T as of September 30, 2024. Unwinding this large asset base, which equated to roughly 26% of 2023 GDP as of quarter-end, has proven to be a tedious task. During this period – 2008 to present – the Fed has arguably transformed itself from the lender of last resort to a persistent and dominate player in financial markets. Ideally, the Fed will be able to continue reducing its balance sheet in the quarters ahead, potentially reducing inflationary pressures while simultaneously rebuilding its capacity to address future economic and/or market shocks. Additionally, if the Fed can successfully reduce its presence in the markets, price discovery should be enhanced.

Commodities, as measured by the Bloomberg Commodity Index, increased 0.7% for the quarter and were up 5.9% year-to-date. Oil (WTI) decreased 16.4% for the quarter, bringing the year-to-date decline to 4.9%. Weaker Chinese demand for oil due to slower economic growth and strong production from non-OPEC producers (e.g., the U.S.) pressured pricing. These softer prices were despite further deterioration in the Middle East, which historically would have led to a spike in energy prices.

China has the rare-earth minerals market cornered with around 60% of production, more than 90% of processing and significant technological experience. Those minerals are largely used in permanent magnets which have an array of civilian and military uses. China appears to have boosted production and created a **glut** to support its own green initiatives and/or to make it difficult for non-China production to occur profitably. The U.S., via the Defense Production Act, has supported U.S. production and processing of rare-earth minerals in recent years in an effort to loosen China's grip. When governments battle one another for key resources, profits may **not** be the top priority. Investors intrigued by **compelling stories** may sometimes lose as subsidized capital costs can be well below market and allow for unprofitable expansion of capacity. This has occurred numerous times throughout history, like when Japan in the 1980s supported the buildout of its semiconductor industry by providing low-cost loans on favorable terms to technology companies.

A lesson from the 70s is shaping today's behavior: "The oil embargoes of 1973 and 1979 had demonstrated to many Americans the risks of relying on foreign production. When Arab governments cut oil exports to punish America for supporting Israel, the U.S. economy plunged into a painful recession. American foreign policy fixated on the Persian Gulf and

securing its oil supplies.”¹ **Today**, the risk of being held hostage at the pump has been greatly mitigated due, in part, to new energy technologies that evolved in the 2000s.

Semiconductors and rare minerals are arguably the new oil – cheap, commoditized components or raw materials for a component that if not available can prevent expensive equipment from working. While the U.S. is seemingly behind the power curve, the current intense focus should pay dividends for national security in the years ahead.

Risk vs. Uncertainty and the Decision-Making Process

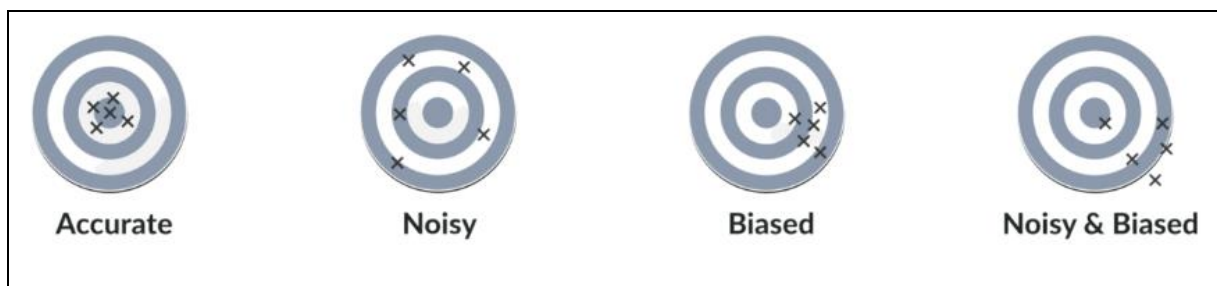
This quarter we continue our series, diving into the concept of “Noise.” We discuss the differences between noise and bias, types of noise, sources of noise and finally noise in everyday situations and how it factors into our investment decision-making process.

Many of the themes discussed in this piece come from the late Daniel Kahneman’s book *Noise: A Flaw in Human Judgement*. Kahneman was well known as a psychologist and Nobel Prize winner in economic sciences. Many of his works (including *Noise*) were centered around decision making, judgement and behavioral finance.

Kahneman starts his book by breaking down the two forms of human error: Noise and Bias. **Noise** is seemingly random and unknowable (much like we have described uncertainty in these pieces). **Bias** is more consistent and knowable.

Noise vs. Bias

The book **illustrates** Noise vs. Bias through four groups firing at a target (illustrated below; left to right). The **first** group was on target. The **second** group was erratic and noisy. The **third** group was biased towards the right side of the target. The **fourth** group showed bias and noise, shooting towards the right but in a wide array.



¹ Miller, C. (2022). *Chip War: The Fight for the World’s Most Critical Technology* (1st ed.). Simon & Schuster.

What do these results tell us? The **Noisy** group tells us how unpredictable the next shot will be. The **Accurate** and **Biased** targets both give us a good indication of where their next shots will land. But what causes divergent shots across the groups? The Accurate and Noisy targets can be distilled down to good and bad shooters, but what would lead all the shots in the Biased target to land so close? One explanation is the gun is biased: it has a bent barrel, or its rear sight is too far to the right.

The illustration shows how Bias and Noise relate to Risk and Uncertainty. Bias and Risk represent outcomes that are **unknown** but **predictable**. Noise and Uncertainty exhibit **unknown** and **unpredictable** outcomes.

Types of Noise

Kahneman breaks down Noise into two categories: Level and Pattern Noise.

Level Noise: occurs when a person's judgements consistently differs from the average person. For example, a judge who is consistently more lenient in sentencing than other judges.

Pattern Noise: a person is affected by specific factors. The judge is instead more lenient towards older criminals.

- Pattern Noise comes in **two forms**: Stable Pattern and Occasion.
 - **Stable Pattern Noise:** comes from internal beliefs, values, knowledge and experiences. Any individual may weigh some factors more than others or react in a certain way to specific cues. These patterns can be stable, but ultimately hard to predict.
 - **Occasion Noise:** refers to random errors that are caused by such things as mood, weather, state of mind and/or how things are presented. These factors can cause random errors in judgement.

Sources of Noise

Noise can stem from a host of places, including but not limited to: Heuristics, the Matching Operation and use of Scales.

Heuristics: mental shortcuts that can facilitate problem solving and judgements. These “rules of thumb” are efficient in many **simple** situations, but judgement errors can arise given more **complex** circumstances. For example, someone takes a new job offer without knowing anything about the company because they are given a higher salary. This could be the right

decision, but it is not a snap decision you would want to make without factoring in the company's reputation, work/life balance, benefits, etc.

The Matching Operation: individuals engage in a process of matching to assign predictions, using the evidence they encounter. Like Heuristics, these can be simple and effective. For instance, you are asked whether it will rain in the next hour. You look up at the sky and give your answer, matching the question with the evidence in the sky. This makes sense, but judgement errors will likely occur when complexity increases. Matching evidence with a conclusion can sometimes yield the right judgement but can lead to ignoring other variables.

Scales: a helpful tool in measuring responses, whether we are rating things five stars, one to ten, etc. However, response scales have a fair bit of noise baked into this subjective rating tool. For example, individuals have different interpretations of what a specific ranking means. Let's say we have a movie and are asked to give it a rating from one to ten. One person thinks it was a great movie and gives it an eight! Another person can come in thinking the movie was good yet give it that same eight. The scale is likely directionally correct, but noise still exists in the ratings.

Noise and the Investment Decision-Making Process

Noise is widespread in everyday areas. Economics is a prime example: it is easy to find two different Nobel winning economists with polar opposite points of view on a given topic. Medicine is also not immune to noise as the same patient can go to different doctors and receive different diagnoses. The hiring process is filled with noise too as it is possible a candidate is hired (or not) depending on whether the interviewer's mood, weather or time of day affected the decision-making process.

Markets and investing are filled with noise. Forecasting is notoriously noisy too. It is easy to find wildly different opinions from "experts" on sales, earnings, GDP growth, etc. at any point in time. Instead of focusing on short-term performance, we find it **most beneficial** to focus on the long-term durability of the companies we own. In our view, analyzing the quality of a company and its competitive advantages are **less noisy** than trying to predict earnings in a given quarter. Our **fundamental** valuation process weighs the long-term durability and growth of a business more heavily than its short-term numbers. As discussed in previous writings, margin of safety or the difference between our estimate of intrinsic value and the market price, when the market price is lower, is critical in our process. A discount to intrinsic value reduces the potential negative impact of noise in our analysis and can help to reduce the risk of a permanent loss of capital.

In summary, noise is everywhere. Easy access to a seemingly endless number of opinions through the news and/or various social media outlets has increased noise exponentially, in our view. Those snippets are often designed to evoke an emotion. As investors we strive to

maintain objectivity by, in part, recognizing that noise surrounds us and doing our best to minimize its impact on our decision-making. Focusing on fundamentals, analyzing competitive advantages and requiring a margin of safety helps accomplish that goal. Next quarter we will close-out our series on Risk vs. Uncertainty and the Investment Decision- Making Process by reviewing what we have covered to date.

Looking Ahead

Given the seemingly tight U.S. presidential race, political drama may be even higher than usual (if that's possible) leading up to and in the days following the November 5 election. Fortunately, any election-induced equity market volatility should be short-lived as markets typically adapt and move on once the outcome is known. We will strive to use any volatility – up or down – to our advantage. If a divided government is the outcome, policy changes will likely come at a slower pace than advertised by either candidate.

We are encouraged by the increased number of investment candidates meeting our criteria that are available for review and the normalization of the yield curve. The monetary policy of several large global central banks has become less restrictive recently and should support economic growth at home and abroad.

Past performance is not indicative of future results and all investments involve some degree of risk. Market and economic data have been provided by third party sources. This data, while believed to be reliable, has not been independently verified by EBS.