# The Damped Spring Report

"Shifts in growth, inflation, risk premium and positioning all lead to opportunities in markets"

**4/27/2020**

**The SPX is cheap at 2836 and should rally to 3152 soon.**

We are max long US equities as of 4/20/2020. In our last reported we teased that we would describe our valuation reasoning in our next report, so here goes.

First, we should state that our recommendations are primarily based on flow and changes in expectations and we believe valuation is a poor signal for the sort of alpha that we seek. Nonetheless, valuation does matter and we recognize that many in the market are skeptical about market upside because they believe that the market was overvalued going into the crisis, (We did too, but said so in January) and the selloff and rapid recovery has placed stocks into a more overvalued situation than prior to Covid (We disagree).

We value stocks based on the idea that a stock is worth the present value of all future earnings. It's a simple idea with a great deal of power. Many models refine the heck out of this idea by adding various assumptions and qualifications. Feel free to use your own model. We will keep it very basic.

Two things drive our valuation:

- Future earnings
- The discount rate used which we believe is the long-term risk-free rate plus a risk premium

We will break down this analysis by:

- Pick a sensible pre-Covid equity price
- Without any discount rate magic reduce the valuation of equities by the certain short-term earnings loss
- Compare the change in the risk-free rate and the implied risk premium during the 2008 crisis peak to trough with current conditions
- Address the risk premium drivers and earnings expectations today and in 2008
- Provide a range of valuations based on each of these cases

It may surprise most readers to know that in the GFC actual earnings fell from $90 per share on the SPX to $45 but returned to $90 in two years. Let's assume the same for today.

To be clear the conditions in 2008 were completely different and the earnings reaction was involuntary. Today there is an involuntary component of earnings, but initially the closing of the economy was voluntary to protect lives over all other costs. Who knows if the people in charge will protect lives as aggressively in the future? Regardless the assumption of an earnings halving is far more aggressive than sell side research and frankly is mostly illustrative in our case to prove that a severe earnings shock short term has a direct impact on stock prices but not as much as many currently believe.

## Pick a sensible pre-Covid equity price

In order to value stocks post-Covid it is necessary to assume a fair value pre-Covid. Here are 2 decent choices and one horrible one. We will exclude the peak.

| | SPX |
|---|---|
| Pre-Covid Peak | 3,386 |
| 2020 YTD Average | 3,303 |
| Six Month Average | 3,110 |

## Straight up earnings impact

One need not use a fancy model to discount future earnings in the very short term. We use a conservative assumption and simply reduce the value of the SPX by

exactly two years of earnings loss. Fair value immediately falls by $150 per share when the light switch was turned off. Prior to Covid investors expected their holdings to increase retained earnings by $150 per share which evaporated overnight. For those who believe the right answer is to reduce the drop in book value by ($150 x SPX price to book) that number is about 2.5x so reduce SPX prices by $425 or so. We are somewhere in between, noting that Price/Book is like Price/Earnings which is flawed for reasons too numerous to discuss here.

## How does today compare to 2008?

We mentioned above that in 2008 earnings for the SPX halved from peak and then recovered within exactly two years. Using our basic model, we can generate an implied risk premium for equities.

| | 2008 | | 2020 | |
|---|---|---|---|---|
| | Peak | Trough | Peak | Today |
| SPX EPS | 90 | 45 | 150 | 75 |
| SPX Price | 1,560 | 666 | 3,386 | ? |
| Earnings Yield | 5.77% | 6.76% | 4.43% | ? |
| 30 Year Treasury yield | 4.20% | 4.50% | 2.03% | 1.16% |
| Implied RP | 1.57% | 2.26% | 2.40% | ? |

At the trough of the GFC long-term risk-free rates **rose** 30bp. Vs today where rates have **fallen** 87bp. Given that equities are a long-term asset with high duration the difference in valuation should be enormous.

As for risk premiums it is notable that valuations ahead of the GFC were far more stretched than peak 2020. US stocks earned only 157bp points vs 30-year bonds at peak. In fact, the risk premium that was implied by a 666-trough valuation when money was incredibly tight was lower than Feb 10$^{th}$, 2020 risk premium.

At the depths of March 2009, the world seemed quite different than today. For instance, no one was expecting the SPX earnings to recover to pre-crisis levels in two years. If one were, the SPX was trading at a forward P/E of 7.4, ridiculously cheap even by that flawed measure.

Cutting to the chase if you assume that the increase in RP seen at the trough of the financial crisis vs peak was simply added to the risk premium Pre-Covid plus the 30-year yield Post-Covid

$$2.40\%+(2.26\%-1.57\%) + 1.16\% = 4.25\%$$

Remarkably the resulting discount rate is lower than the Pre-Covid Rate of 4.43%

Making no assumption about an earnings recovery consistent with the way people felt in 2008 the fair value for stocks using that discount rate would imply a $1765 level for the SPX Index. This is the truly worst bear case we can conceive of at this time. It suggests a hard floor on the equity market of down 48% from peak. Vs the GFC drawdown of 57%.

As we are bullish equities, we believe that 2020 is very different from 2008.

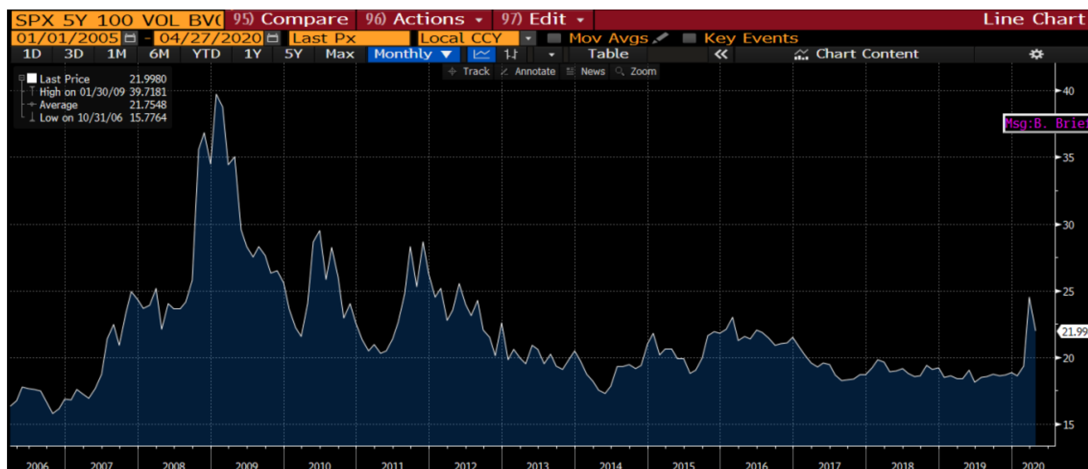
## Risk Premium Drivers and Earnings Expectations

Our framework to build risk premium estimates assumes risk premiums are driven by three principal factors

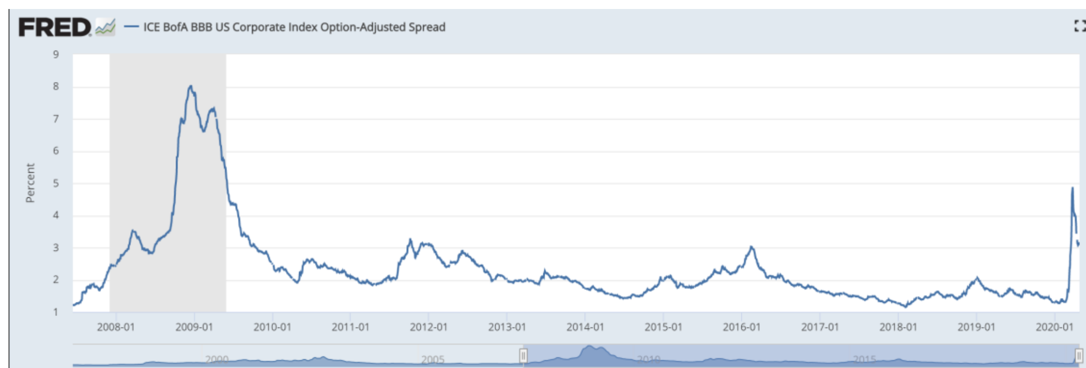
- The supply of money and credit provided by central banks and commercial banks who can print money relative to the demand for investment in financial assets, real economy investment, and consumption
- Expectations for asset volatility and asset price drawdown
- Portfolio volatility

Some proxy measures of risk premium suggest that conditions are much more favorable for asset prices today than in 2009

Long term equity index volatility is well below GFC levels and falling




And BBB Credit spreads are dramatically lower than in 2009 plus the Fed is now using asset purchase to support prices and put further downward pressure on risk premiums




Money and credit is flowing into the market place at many multiples of the GFC and with banks healthy the transmission mechanism to the financial asset market and to fuel private investment and restore consumption is a “Money Tsunami”  We have

written much about this topic but it doesn't surprise us that market based risk premium measure support a conclusion that risk premiums while higher pre Covid should not have risen anywhere near what they did during the GFC.

As for portfolio risk, the 60/40 portfolio has done much better than in the GFC, bond prices have risen as stocks have fallen and while there was a clear deleveraging that took markets to the 2020 low that impact is clearly behind us. Correlations are negative across major asset groups resulting in low and declining portfolio risk.

### Ok, so how does this add up

We believe that fair value for the SPX is 3150. Our range is 2950-3250. We expect to get into that range in the next month possibly hitting fair value by the end of the month of May.

Our prediction is based on:

- A market based conservative estimate of Pre-Covid fair value
- An extremely conservative estimate of the Covid related short term earnings evaporation and its direct impact on fair value
- A recognition of the level of long-term interest rates
- A conservative estimate of current levels of risk premium despite an extremely strong view that risk premium contraction and asset inflation is almost certain given the level of money printing. We did not assume this asset inflation in our SPX forecast. **If we did consider the Money Tsunami directly, the forecast would frankly look silly and irresponsible. But to say we remain max bullish is indeed an understatement**

## Current Model Portfolio performance and Recommendations

| | | | | | | | |
|---|---|---|---|---|---|---|---|
| | Assumed Portfolio size | 100,000,000 | | | | | |
| | LTD P/L | 11,600,447 | | | | | |
| | Total Return | 11.60% | | | | | |
| | Today's Date | 4/27/2020 | | Portfolio Created | | 4/15/2019 | |

| Date | Position | Entry Price | Amount | Worst case loss | MTM | P/L | Open/Closed |
|---|---|---|---|---|---|---|---|
| 4/13/2020 | SPX Sept 2800/3000 call spread | 104 | 96 | 1,000,000 | 104 | - | Open |
| 4/13/2020 | GCU Sept 1750/1850 Call Spread | 34 | 294 | 1,000,000 | 31.2 | (82,353) | Open |
| 4/13/2020 | FV Sept 124/122 Put Spread | 0.296875 | 3368 | 1,000,000 | 0.203125 | (315,789) | Open |
| 4/13/2020 | SPX Sept 2800/3000 call spread | 111 | 90 | 1,000,000 | 104 | (63,063) | Open |
| 4/13/2020 | GCU Sept 1750/1850 Call Spread | 29 | 345 | 1,000,000 | 31.2 | 75,862 | Open |
| 4/13/2020 | FV Sept 124/122 Put Spread | 0.234375 | 4267 | 1,000,000 | 0.203125 | (133,333) | Open |