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BETTING AGAINST THE PANDEMIC

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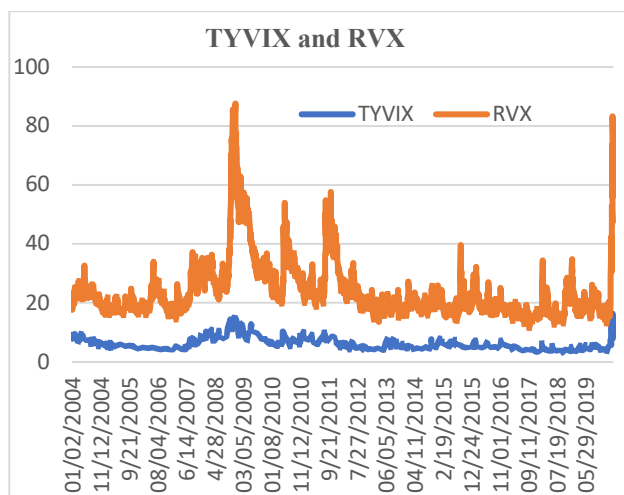
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THE FIXED INCOME ENVIRONMENT

Since late '60s, bond trading has become more and more dynamic. The introduction of computer bond trading at Salomon Brothers and the rise of Bond portfolio theory and active trading turned bond from a dull sport into a vibrant one. This revolution well exemplified by Long Term Capital Management (LTCM), a hedge fund, which in the 90s reached its fortunes using arbitrage bond trading strategies before going bust in summer of 1998 due to the default of Russia. One strategy for example consisted in buying, at discount, futures contract on Treasury bills and selling the underlining asset, Treasury bills, waiting for prices to converge.

Nowadays, the bond market is still a vivacious place, perhaps too much for investors' taste. The Treasury Yield VIX, a volatility index, measured by the Chicago Board Options Exchange (CBOE) has recently touched levels that usually belong to equities.



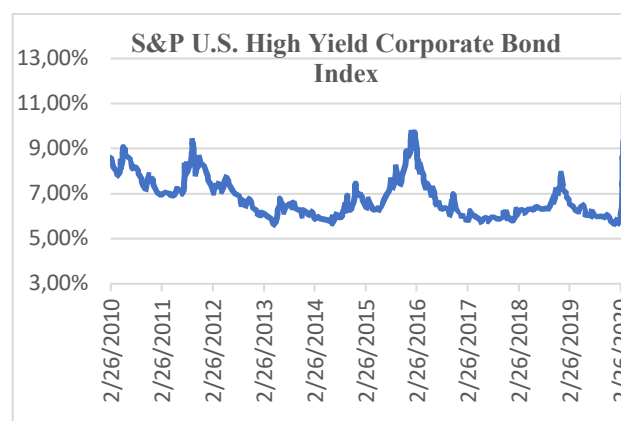
Source CBOE Historical TYVIX and RVX Daily Prices

Unfortunately, volatility is not the only concern for investors; also the structural presence of record low yield is key. The unconventional measures taken in the last decade by central banks around the world has depressed yield to unexplored territories. The hopes in 2018 of a normalization of the interest rate regime have quickly evaporated due to the sudden market sell-off in December 2018. Moreover, the current central bank stand has become further dovish after the outbreak of COVID-19. The ECB (European Central Bank) has started a €750bn asset purchase program and has kept rate unchanged since its reference rate is

already below zero. The FED (Federal Reserve) has cut its benchmark interest rates to near zero and has started an unlimited QE (Quantitative Easing) program. The Harvard's professor and historian Niall Ferguson has labelled this move as QEVID-19. As a response the yield on 10-year treasury have dropped below 1% for the first time in history.



The corporate segment has also seen better times. Due to the impact on the firms profitability COVID-19 has shown the fragilities and risks of leveraging up balance sheets and take advantage of low yields. S&P, a rating agency, has declared that it has recently taken 330 rating actions, at least in part, due to the virus outbreak. Always according to S&P, US speculative grade bond default rate is expected to rise at 10% in the next twelve months from 3.1% of December 2019; in the EU default rates could also reach high single digit. Another hidden risk is the downgrade of BBB rated companies that today account for 60% of the Investment grade spectrum. Nouriel Roubini, an economist, in an interview with Bloomberg has recently warned of a looming recession triggered by shadow banking and corporate debt; in particular, he expects \$1trn of fallen angels due to the downgrade below investment grade.



Source: S&P Dow Jones Indices



BETTING ON CATASTROPHES TO ELUDE THE MARKET

With the bond market, causing more headaches than satisfactions to investors, the insurance market could experience a new growth. Insurance linked Securities (ILS) are financial instruments whose values depends on insurance loss events. ILS returns are uncorrelated with the economic cycle, the interest rates shifts nor the foreign markets fluctuations. Returns instead are linked to claims of insurance and reinsurance companies on natural disasters.

One of the most promising asset class within this market are catastrophe bonds. In these contract investor secure returns for bearing the risk of losing some or the entire capital invested in case of particular catastrophes. These instruments were first introduced in the mid-1990s after hurricane Andrew stroke on southern United States. Today the market has reached a \$30.12bn according to Swiss Re, a reinsurance company. Investor demand in this market environment is solid, in particular institutional investors and pension funds starving for yields.

This market seems to be in a structurally strong position answering the latest investors' requests. It provides yields that nowadays are comparable to the high yield market. During late economic cycle, they are unaffected by market downturns. They are an ESG compliant investment providing aid when it is most needed. In addition, these instruments pour cash in the insurance markets lowering insurance premium and fomenting a virtuous cycle.

THE PANDEMIC OPPORTUNITY

Catastrophe bonds flourished as a result of natural disasters such as Hurricane Katrina in 2005, Tōhoku earthquake in 2011 and 2017 Mexico's earthquake; COVID-19 is not an exception. The pandemic has highlighted an innovative instrument issued in 2017 by the World Bank. The Bank sold \$320m of pandemic bonds in support of 77 developing countries through the fund Pandemic Emergency Facility (PEF). The bid was oversubscribed two times the amount offered showing the investors' attention. The bonds quoted at a discount of 10% of face value when issued back in 2017 where composed in two tranches. A safer class A with a coupon yield of USD LIBOR + 6.5% and a class B yielding USD LIBOR

+ 11.1%. The diseases covered by the senior tranche are coronavirus and flu; the riskier class covers few more. In particular, if the clauses are satisfied, the senior tranche has a redemption of \$37.5m out of \$225m (-16.67%); the junior one instead face an entire wipe out of \$95m.

The bonds, which are privately traded, on February 25 already where quoted at 60% of face value. Class A investors face 16.67% losses, according to Bloomberg, since coronavirus has met a list of criteria such as geographic spread, the declaration of COVID-19 as a pandemic by the WHO and the number of the deaths. Class B investor face a complete wipeout. AIR Worldwide Corp. will decide if the clauses have been satisfied. The process should unlock \$132.5 million by May 15.

Critics argue that the conditions for the triggering are too stringent and that funds will arrive to countries too late. For example, the outbreak of Ebola in the Democratic Republic of Congo last year did not met all the conditions to trigger the bond despite killing more than two thousand people. Although there is a rationale in this argument, it should be considered that these instruments are unique and novel. In addition, more stringent terms in future contract will require higher returns. In addition, pandemic bond encourage authority to better report infections. Looking the pandemic from a financial perspective a dollar spent at the beginning of the pandemic is a financial multiplier since it allows saving more dollar in later phases.

The World Bank is already working on a new fund PEF2.0 and around May, it should start the marketing program. According to Craig Bonder, head of insurance linked securities trading at Beech Hill Securities, "Investors in this market expect that certain bonds take losses at times, it's a robust market that can withstand these kind of losses and continue to grow." We should expect to hear more about pandemic bonds in the coming years.



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