ECONOMIC SITUATION AND STRATEGY

22. October 2021

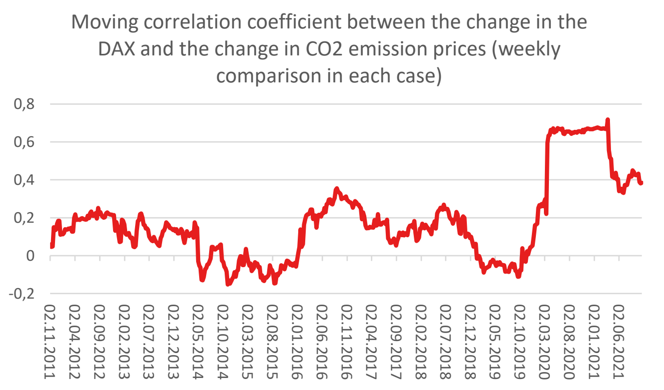
Weatherproofing Your Portfolio

Climate change has been a hot topic for a long time. Yet, while many other urgent issues tend to fade into oblivion over time, climate change is here to stay. It should therefore come as no surprise that climate change and related subjects are taking the limelight in portfolio management and construction issues. The central subject is how and to what extent asset managers can take climate change into account. Climate change can impact portfolios in various ways. For instance, there are individual stocks and whole industries that are directly impacted by rising prices for carbon emissions credits. This particularly affects countries and regions where emissions are limited via carbon emissions trading. Such regions include Europe and China. There are also individual stocks and sectors that are impacted by actual climate effects like the insurance industry that can be massively hit by extreme weather events. On the other side of the looking glass are individual stocks and entire sectors that actually benefit from climate change and any resulting government regulation including subsidies and changing demand structures.

At first glance it should be simple enough to just avoid securities with climate risk exposure and realize any opportunities from lowering the portfolio's carbon footprint. However, this is not a perfect solution. Insurance companies, for instance, have rather small carbon footprints but harbor major climate risk on a medium-term horizon. Ideally, every stock in a given investment universe should come with its own climate score comprising a carbon sensitivity component and other soft factors. That would be a great help in constructing portfolios with significantly lower climate risk than the benchmark. Whosoever thinketh - Eureka! - has another think coming. A portfolio thus optimized would harbor a whole new set of risks owing to sector allocations or factor skylines that deviate significantly from the benchmark. Realigning these parameters, however, will raise the climate risk factors again. Short selling, if it were allowed, would open up a little bit more leeway. If one could short sell stocks with high climate risk whilst raising gross exposure to over 100 percent, one could construct portfolios whose target conflict between positive climate factors and other objectives would largely resolve. One should keep in mind, though, that such portfolio constructions are not feasible for the vast majority of investors and are purely hypothetical at best.

There are, however, some interesting real-life options to hedge the climate risk in a portfolio at least partially. Assuming that some part of the actual risk depends on the development of carbon emission credit prices, it seems possible to directly hedge these risks by buying EU emissions credits. Although EU emissions credits cannot be booked directly into a portfolio; there are by now instruments that closely model EU emission credit prices and these can be used as portfolio admixtures. This comes with its own can of worms, though. The problem is how much to hedge the portfolio with these EU emission credit instruments. Empirical econometric data fall rather short in answering this question. For instance, the correlation between the weekly yields on EU emission credits and weekly yields on the DAX over the weekly moving yearly averages show positive correlation coefficients since the end of 2010 in 441 of 521 moving yearly averages.

From an economic perspective, this does not seem plausible at first as rising carbon emission credit prices per se should be bad for stock price development. One the other hand, carbon emission credit prices and stock prices have several common drivers. Such drivers include the economic cycle as well as investors' general risk tolerance. It is therefore not particularly practical to determine a presumably perfect hedge based on simple regression models. It rather makes more sense to determine a suitable investment grade for EU emission credits as a hedge.



Just holding EU emission credits in your portfolio may make you think that this is already plenty green enough based on the following reasoning: Buying emission credits raises their prices and thus makes them scarcer with fewer new issues. And if one even holds the emission credits directly, they cannot be used for covering industrial sinners' excess carbon emissions. That would hit two birds with one stone. Almost sound logic, but no cigar.

One the one hand, emission credits will hardly be used less just because they become more expensive. The EU emissions trade conceptually works from the quantity angle not the price angle. Policy determines how many emission credits will be made available for offsetting emissions while the price determines who gets to hold and use these emission credits. If the price rises, some companies that hold these emission credits may feel tempted to sell them and there will always be a buyer who can still profitably use them to legitimize excess emissions. After all, this is by definition a market determined price and for every seller there is a buyer. It is inconceivable in such a market that expensive rights are being purchased just to be held long-term rather than being used or sold on – that would be economic nonsense. Eventually, every valid emission credit held by an economically reasonable company will be used to legitimize emissions. Consequently, any change in emission credit prices has very little effect on reducing carbon emissions.

Temporarily withholding emission credits from the market by keeping them in a portfolio for a few years also does not help the environment. Climate protection involves emission control over many decades. It does not really make a difference to the climate whether emissions happen now or seven to ten years later. The decisive factor is total emission while the distribution over time is rather secondary. One can see this playing out in the many and highly varied pathways to carbon reduction as outlined by the World Climate Council that all are compatible with a 1.5°C global warming target. Looking at it from all angles, managing climate risks is no easy task. There are no simple answers and solutions here or anywhere. The subject is complex and challenging. Nonetheless, it should not and cannot be ignored. Climate change and resulting economic and investment challenges are here to stay. It is a tough path to travel and the learning curve must not be underestimated. However, challenges exist to be mastered. Bring it on!

Market Data

Stock marktes	As of 22.10.2021 08:41	Change versus 30.09.2021 -1 week	06.09.2021 -1 month	06.07.2021 -3 months	06.10.2020 -1 year	31.12.2020 YTD
Dow Jones	35603	5,2%	0,7%	3,0%	28,2%	16,3%
S&P 500	4550	5,6%	0,3%	4,7%	35,4%	21,1%
Nasdaq	15216	5,3%	-1,0%	3,8%	36,4%	18,1%
DAX	15473	1,4%	-2,9%	-0,3%	19,9%	12,8%
MDAX	34717	1,0%	-4,1%	0,5%	25,5%	12,7%
TecDAX	3780	1,0%	-4,7%	5,0%	21,5%	17,7%
EuroStoxx 50	4156	2,7%	-2,1%	2,5%	28,5%	17,0%
Stoxx 50	3616	3,3%	-0,8%	2,7%	23,8%	16,3%
SMI (Swiss Market Index)	12039	3,4%	-3,1%	0,6%	17,6%	12,5%
Nikkei 225	28805	-2,2%	-2,9%	0,6%	22,9%	5,0%
Brasilien BOVESPA	107735	-2,9%	-8,6%	-13,9%	12,7%	-9,5%
Russland RTS	1868	5,1%	7,6%	13,6%	59,9%	34,6%
Indien BSE 30	61121	3,4%	4,8%	15,6%	54,4%	28,0%
China CSI 300	4961	1,9%	0,5%	-2,4%	8,1%	-4,8%
MSCI Welt (in €)	3152	4,4%	1,4%	5,4%	34,2%	23,6%
MSCI Emerging Markets (in €)	1293	2,7%	-0,4%	-2,3%	18,9%	5,6%
Bond markets						
Bund-Future	168,25	-157	-700	-535	-602	-939
Bobl-Future	134,03	-90	-90	-35	-111	-115
Schatz-Future	112,08	-13	-17	-10	-20	-20
3 Monats Euribor	-0,55	3	2	2	-4	4
3M Euribor Future, Dec 2017	-0,54	0	0	-1	0	0
3 Monats $ Libor	0,12	-1	1	-1	-11	-11
Fed Funds Future, Dec 2017	0,08	0	0	-2	3	0
10 year US Treasuries	1,67	15	35	31	93	76
10 year Bunds	-0,09	10	28	22	41	48
10 year JGB	0,09	2	5	6	7	7
10 year Swiss Government	-0,07	10	25	20	43	43
US Treas 10Y Performance	692,88	0,1%	-1,6%	-0,8%	-4,5%	-3,2%
Bund 10Y Performance	662,94	-0,1%	-1,8%	-1,0%	-2,6%	-3,2%
REX Performance Index	490,28	-0,3%	-1,1%	-0,8%	-1,7%	-1,8%
US mortgage rate	0,00	0	0	0	0	0
IBOXX AA, €	0,34	1	14	11	19	32
IBOXX BBB, €	0,72	4	15	10	-17	16
ML US High Yield	4,76	8	17	20	-116	-22
Convertible Bonds, Exane 25	8153	0,0%	-2,4%	-2,8%	3,8%	-2,1%
Commodities						
MG Base Metal Index	435,13	0,7%	-1,3%	0,4%	41,9%	22,7%
Crude oil Brent	84,10	7,1%	16,6%	12,6%	96,7%	62,1%
Gold	1791,41	1,7%	-1,7%	-0,6%	-6,4%	-5,6%
Silver	22,54	2,1%	-8,9%	-13,8%	-5,4%	-14,6%
Aluminium	2883,75	1,5%	4,6%	15,0%	65,8%	46,1%
Copper	9052,60	1,2%	-4,1%	-2,5%	39,0%	16,8%
Iron ore	122,89	2,7%	-15,1%	-43,5%	0,9%	-21,1%
Freight rates Baltic Dry Index	4653	-9,9%	21,7%	46,4%	121,9%	240,6%
Currencies						
EUR/ USD	1,1632	0,5%	-2,0%	-1,7%	-1,4%	-5,2%
EUR/ GBP	0,8433	-1,9%	-1,7%	-1,6%	-7,2%	-5,8%
EUR/ JPY	132,55	2,2%	1,7%	1,2%	6,4%	4,8%
EUR/ CHF	1,0669	-1,5%	-1,8%	-2,4%	-1,0%	-1,2%
USD/ CNY	6,3935	-0,9%	-1,0%	-1,3%	-5,9%	-2,1%
USD/ JPY	111,43	0,1%	1,4%	0,7%	5,5%	7,9%
USD/ GBP	0,73	-2,2%	0,3%	0,1%	-5,9%	-0,9%

Source: Refinitiv Datastream

Carsten Klude
+49403282-2572
cklude@mmwarburg.com

Dr. Rebekka Haller
+49 40 3282-2452
rhaller@mmwarburg.com

Martin Hasse
+49 40 3282-2411
mhasse@mmwarburg.com

Dr. Christian Jasperneite
+49 40 3282-2439
cjasperneite@mmwarburg.com

Mark Simon Landt
+49 40 3282-2988
mlandt@mmwarburg.com