ECOWEEK

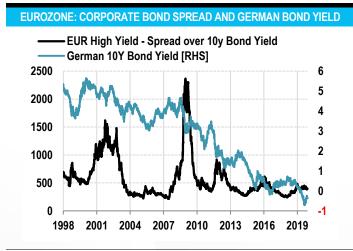
No. 19-44, 29 November 2019

Eurozone: QE and market instability risks

■ The ECB's monetary policy meeting account illustrates the dilemma it is facing: inflation is subdued and risks to growth are tilted to the downside, yet the financial stability implications of the very accommodative policy need to be closely monitored ■ These implications are covered in sobering detail in the ECB's Financial Stability Review ■ A possible side effect of very low to negative interest rates is that borrowing and spending become more procyclical ■ Quantitative easing (QE), by modifying the risk structure of investment portfolios (less government bonds and more exposure to assets with a higher risk), will probably increase the sensitivity of portfolio returns to the business cycle.

Many people would probably enjoy having a glass of wine (or beer) in the evening now and then. Two glasses may make them feel even cheerier. Having too much of a good thing, however, causes a hangover the following morning. There are similarities with a prolonged period of very accommodative monetary policy. First, there is joy about the boost to growth and ensuing job creation. Then, concerns mount about the side effects, a euphemism for the unintended consequences.

As a coincidence, last week saw quite some communication on this topic. Bundesbank President Jens Weidmann, speaking at a conference in Frankfurt, neatly summarised the issue: "Beyond its impact on bank profitability, a prolonged period of low interest rates may also induce investors in search of yield to take on undue risks that could sow the seeds of financial imbalances. Eventually, this could undercut the central bank's ability to maintain price stability." A similar point was made in the ECB monetary policy meeting account: "It was noted, however, that the financial stability implications needed to be monitored closely as declining bank lending rates could squeeze banks' margins beyond adequate risk coverage. Moreover, the point was made that more attention needed to be paid to the



Source: Datastream, Bank of America Merrill Lynch, BNP Paribas

non-bank financial sectors, where looser market-based financing conditions and the search for yield also posed risks." Nevertheless, "there was broad agreement that monetary policy had to remain highly accommodative for an extended period of time in the face of a protracted weakness in the economy and subdued inflation developments." It illustrates to what extent the ECB is between a rock (risk of unanchoring of inflation expectations) and a hard place (risks to financial stability).





ECONOMIC RESEARCH DEPARTMENT



The bank for a changing world



Concerning the latter, the latest ECB's Financial Stability Review, also published last week, makes for sobering reading. Focussing on the specific area of financial markets, the Review offers a long list of attention points¹. These can be summarised into one sentence: a prolonged period of very expansionary monetary policy increases the procyclicality of the economy because investors are pushed into taking more risk when chasing returns whereas debt issuers are seizing the opportunity of declining borrowing costs to increase leverage and return on equity, which in turn supports equity valuations. A subdued inflation outlook means that these mutually reinforcing dynamics will not come to an end because of increases in official interest rates but rather by worries about the earnings growth outlook.

Investment portfolios are also subject to procyclicality as a consequence of quantitative easing. Remember that an intermediate objective of this policy is to lower government bond yields by driving down the term premium. As an example, when the ECB buys bonds from an insurance company, the duration of the latter's assets drops. This is called 'duration extraction'. It implies that a source of return (the extra yield over and above the short term interest rate) has gone. This obviously forces the insurer to increase exposure to other sources of risk. In doing so, it seeks to maintain the expected return of its portfolio. This is called the 'portfolio rebalancing channel', which is another key transmission mechanism of QE. Examples of other sources of risk are credit risk (by investing in corporate bonds) or equity risk². At first glance, it looks as if credit or equity risks are simple substitutes for duration risk. However, they behave very differently depending on the phase of the business cycle. When growth is accelerating and expectations of monetary policy tightening are increasing, government bonds suffer far more than corporate bonds (the corporate bond spread narrows) whereas equities thrive due to an improved outlook for corporate earnings. At present, we should however be more interested in what would happen should growth severely slow down. In that case, government bond yields decline and government bond prices rise significantly, but asset owners who have sold part of their holdings to the ECB benefit less than before. On the other hand, they suffer more than before from the decline in corporate bonds (due to spread widening) and equity prices considering the purchases they had made after having sold their government bonds to the ECB.

To conclude, duration extraction, which results from central bank asset purchases, causes a substitution of duration risk with other sources of risk. Investment portfolios become less diversified, due to reduced exposure to government bonds, and the procyclicality of portfolio returns increases. In case of a severe growth slowdown, this implies increased downside risk, which investors may seek to pre-empt by reducing positions in risky assets, thereby accelerating their decline.

William De Vijlder

² The ECB Financial Stability Review reports that "insurers' holdings of high-yield and BBB securities account for 3% and 37% of their total bond holdings, compared with 4% and 27% at the end of 2013."



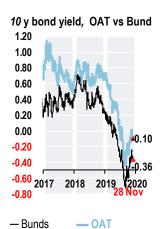
¹ Source: ECB, Financial Stability Review, November 2019. Some quotes: "markets currently assess the risk of a sudden increase in interest rates as being remote. At the same time, pricing in riskier financial market segments (e.g. equities) is increasingly based on expectations of low future benchmark rates, with a limited perceived risk of upward surprises", "Equity and corporate bond prices continued to appreciate, despite short-lived fluctuations in response to uncertainty surrounding trade tariffs.", "the strong performance of equities, corporate bonds and lower-rated sovereign bonds this year has so far surpassed measures of expected earnings growth or business sentiment", "model estimates suggest economic developments in the year to date have only had a limited impact on riskier asset prices. Indeed, the risk of an imminent recession in the euro area implied by financial market variables continued to increase over the summer", "Low or negative interest rates are expected to lead to search-for-yield behaviour and higher riskier asset prices, as investors seek a higher return from assets with lower credit quality and longer maturities", "the persistence of a low yield environment can lead to some valuations becoming misaligned, and therefore being at risk of abrupt correction in the future", "valuations of riskier assets are consistent with, but highly dependent on, the historically low level of the benchmark yield curve.", "Low funding costs incentivise higher levels of corporate leverage, which might amplify market corrections in a severe economic downturn", "high levels of corporate leverage may prove unsustainable if the earnings outlook deteriorates in a more protracted manner", "With increasingly limited scope for euro area benchmark rates to decline to the extent seen over recent years, equity and credit valuations are becoming more sensitive to deteriorations in the macroeconomic outlook or in investor risk appetite."



Markets overview

The essentials

Week 22-11 19 > 28-11-19								
对 CAC 40	5 893	•	5 913	+0.3	%			
⊅ S&P 500	3 110	•	3 154	+1.4	%			
→ Volatility (VIX)	12.3	•	11.8	-0.6	pb			
↗ Euribor 3M (%)	-0.40	•	-0.40	+0.6	bp			
▲ Libor \$ 3M (%)	1.92	•	1.91	-0.3	bp			
■ OAT 10y (%)	-0.09	•	-0.10	-0.8	bp			
■ Bund 10y (%)	-0.36	•	-0.36	-0.5	bp			
■ US Tr. 10y (%)	1.78	•	1.78	-0.5	bp			
Euro vs dollar	1.10	•	1.10	-0.2	%			
Sold (ounce, \$) ■ 3. Solution Solution	1 466	•	1 456	-0.7	%			
→ Oil (Brent, \$)	63.3	•	63.4	+0.1	%			





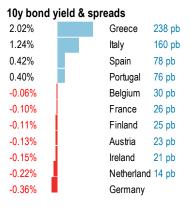


Money & Bond Markets

Interest Rates	3	high	nest' 19	lowest' 19		
€ECB	0.00	0.00	at 01/01	0.00	at 01/01	
Eonia	-0.45	-0.25	at 07/06	-0.47	at 03/10	
Euribor 3M	-0.40	-0.31	at 24/01	-0.45	at 03/09	
Euribor 12M	-0.28	-0.11	at 06/02	-0.40	at 21/08	
\$ FED	1.75	2.50	at 01/01	1.75	at 31/10	
Libor 3M	1.91	2.81	at 01/01	1.89	at 01/11	
Libor 12M	1.94	3.04	at 21/01	1.85	at 04/10	
£ BoE	0.75	0.75	at 01/01	0.75	at 01/01	
Libor 3M	0.79	0.93	at 29/01	0.75	at 29/08	
Libor 12M	0.93	1.19	at 11/01	0.81	at 03/09	

At 28-11-19

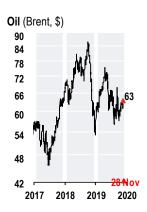
Yield (%) highest' 19 lowest' 19 € AVG 5-7y -0.01 0.68 at 09/01 -0.36 at 03/09 Bund 2y -0.64 -0.53 at 05/03 -0.92 at 02/09 Bund 10y -0.36 0.25 at 01/01 -0.72 at 28/08 OAT 10y -0.10 0.73 at 08/01 -0.44 at 28/08 Corp. BBB 2.15 at 08/01 0.64 at 30/08 0.90 \$ Treas. 2v 2.62 at 18/01 1.39 Treas. 10y 1.78 2.78 at 18/01 1.46 at 04/09 Corp. BBB 3.23 4.65 at 01/01 3.15 at 04/09 £ Treas. 2y **0.50** 0.83 at 27/02 0.31 at 08/10 Treas. 10y **0.67** 1.35 at 18/01 0.33 at 03/09 At 28-11-19

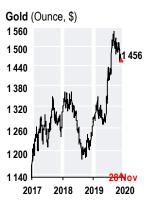


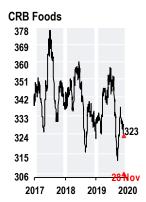
Commodities

Spot price in o	low	2019(€)			
Oil, Brent	63.4	53.1	at	01/01	+23.9%
Gold (ounce)	1 456	1 268	at	02/05	+18.0%
Metals, LMEX	2 755	2 718	at	07/08	+2.1%
Copper (ton)	5 869	5 585	at	03/09	+2.5%
CRB Foods	323	312	at	11/09	+3.6%
w heat (ton)	209	166	at	30/08	+10.1%
Corn (ton)	141	128	at	24/04	+7.5%
4 20 11 10				* *	

At 28-11-19 Variations







Exchange Rates

		J -					
1€ =		high	est' 19	low	est'	19	2019
USD	1.10	1.15	at 10/01	1.09	at	30/09	-3.7%
GBP	0.85	0.93	at 12/08	0.85	at	14/03	-5.0%
CHF	1.10	1.14	at 23/04	1.08	at	04/09	-2.5%
JPY	120.57	127.43	at 01/03	116.08	at	03/09	-3.9%
AUD	1.63	1.66	at 07/08	1.57	at	18/04	+0.2%
CNY	7.74	7.96	at 27/08	7.51	at	25/04	-1.4%
BRL	4.68	4.70	at 26/11	4.18	at	31/01	+5.6%
RUB	70.53	79.30	at 01/01	70.22	at	24/09	-11.1%
INR	78.82	82.00	at 04/02	76.37	at	01/08	-1.2%
4t 28-	11-19					Var	iations

Equity indices

	- 9								
	Index	high	est	' 19	low	est'	19	2019	2019(€)
CAC 40	5 913	5 939	at	15/11	4 611	at	03/01	+25.0%	+25.0%
S&P500	3 154	3 154	at	27/11	2 448	at	03/01	+25.8%	+30.7%
DAX	13 246	13 289	at	07/11	10 417	at	03/01	+25.4%	+25.4%
Nikkei	23 409	23 520	at	12/11	19 562	at	04/01	+17.0%	+21.7%
China*	80	86	at	09/04	68	at	03/01	+13.6%	+17.9%
India*	589	612	at	03/06	526	at	22/08	+8.4%	+9.8%
Brazil*	2 116	2 354	at	10/07	1 862	at	17/05	+19.4%	+13.0%
Russia*	753	793	at	07/11	572	at	01/01	+22.9%	+36.7%
At 28-11-19 Variations									

* MSCI index

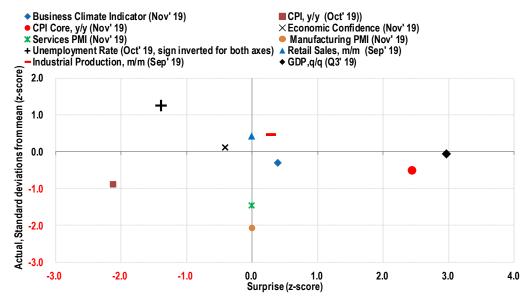




Pulse

Eurozone: Do the difficulties in manufacturing start to impact the services sector?

While many observers have been worried since several months about the health of the manufacturing sector, the activity in services still shows resilience and keeps growing at a pretty decent pace. Nevertheless, the latest economic indicators send a less favourable signal. The Purchasing Managers Index (PMI) for the services sector indeed decreased in November to 51.5 (against 52.2 in October). This level is quite low regarding the historical average. The outlook for economic growth in the coming months, by and large, depends on the resilience of the labour market and the ability to create new jobs.



Note: z-score is a score which indicates how many standard deviations an observation is from the mean: $z=(x-\mu)/\sigma$ where x: observation, μ : mean, σ : standard deviation. On the X-axis, x corresponds at the last known surprie for each indictor represented on the graph, μ and σ corresponds respectively to the mean and the standard deviation of the last 24 value for monthly data and the last 8 quarters for quarterly data. On the Y-axis, x corresponds at the last known value of indicator, μ and σ corresponds respectively to the mean and the standard deviation for this indicator since 2000 (for China since 2011).

Indicators preview

It's the start of a new month and this means a very heavy schedule of data releases. The highlight of the week is, as usual, the US labour market report but before that, we will have seen the purchasing managers indices (manufacturing, services, composite) in several countries as well as, for the US, the data from the Institute of Supply Management.

Date	e Country/Region Event		Period	Survey	Prior	
12/02/2019	Switzerland	Caixin China Manufacturing PMI	Nov	51.2	51.7	
12/02/2019	France	Markit France Manufacturing PMI	Nov	-	51.6	
12/02/2019	Germany	Markit/BME Germany Manufacturing PMI	Nov		43.8	
12/02/2019	Eurozone	Markit Eurozone Manufacturing PMI	Nov	-	46.6	
12/02/2019	United States	ISM Manufacturing	Nov	49.5	48.3	
12/04/2019	Switzerland	Caixin China PMI Composite	Nov		52.0	
12/04/2019	France	Markit France Services PMI	Nov		52.9	
12/04/2019	France	Markit France Composite PMI	Nov		52.7	
12/04/2019	Germany	Markit Germany Services PMI	Nov	-	51.3	
12/04/2019	Germany	Markit/BME Germany Composite PMI	Nov	-	49.2	
12/04/2019	Eurozone	Markit Eurozone Services PMI	Nov		51.5	
12/04/2019	Eurozone	Markit Eurozone Composite PMI	Nov	-	50.3	
12/04/2019	United States	ISM Non-Manufacturing Index	Nov	54.5	54.7	
12/05/2019	Germany	Factory Orders MoM	Oct		1.3%	
12/05/2019	Eurozone	Retail Sales MoM	Oct		0.1%	
12/05/2019	Eurozone	Employment YoY	3Q		1.0%	
12/05/2019	United States	Durable Goods Orders	Oct		-	
12/06/2019	Germany	Industrial Production SA MoM	Oct		-0.6%	
12/06/2019	United States	Change in Nonfarm Payrolls	Nov	190000	1E+05	
12/06/2019	United States	Unemployment Rate	Nov	3.6%	3.6%	
12/06/2019	United States	U. of Mich. Sentiment	Dec	96.5	96.8	

Source: Bloomberg, BNP Paribas





Economic scenario

UNITED STATES

- Growth is slowing and this trend is expected to continue under the influence of corporate investment (slower profits growth, uncertainty) and housing (declining trend of affordability). Consumer spending should be more resilient. The trade dispute with China acts as an additional drag but recent progress might imply this effect would wane.
- We expect one more Fed Funds target rate cut this year and two additional cuts in 2020.

CHINA

- Economic growth continues to slow and our GDP forecasts have been revised down since June. Industrial activity and exports have been hard hit by US tariff hikes. Domestic demand has also decelerated.
- The central bank is easing liquidity and credit conditions, though the reduction in financial-instability risks should remain a priority and banks seem to remain prudent. Fiscal policy is expansionary through increased infrastructure spending and a rising number of household/corporate tax cuts.
- In the short term, exports and private domestic investment should continue to decelerate. Tax measures should have some success in supporting consumer spending.

EUROZONE

- The economic slowdown is continuing in the eurozone, especially in Germany, due to the international environment and elevated uncertainty. The recent stabilization of business surveys provides some hope but needs to be confirmed.
- Inflation is now expected to decrease while core CPI is hardly moving. The
 activity slowdown also implies that the pick-up in core inflation should be slower
 than expected until recently.
- Faced with an outlook of subdued inflation, the very accommodative monetary policy will be maintained as long as inflation hasn't converged sufficiently, in a convincing and lasting way, towards the ECB's objective.

FRANCE

- Growth is slowing although the economy shows resilience. Households' consumption should get a boost from the tax cuts and the jobs recovery. Business investment dynamics remain favourable. The global backdrop is less supportive.
- A slight rise in core inflation is appearing but remains to be confirmed.

INTEREST RATES AND FX RATES

- In the US, we expect the Fed to cut its official rate again in December in reaction to a slowing economy, moderate inflation and high uncertainty. 2020 should see two more cuts. Treasury yields are to decline further in the coming months. Eventually, in the course of 2020 they should move up again in anticipation of a pick-up in growth.
- In the eurozone, the ECB's state-dependent forward guidance and the sluggishness of the inflation process imply that the very accommodative environment will remain in place for a long time. This will exert downward pressure on bond yields, although these will also be influenced by yield movements in the US.
- No policy rate change expected in Japan.
- We expect little change in EUR/USD even though euro's fair value is quite higher than current pricing. The yen should strengthen on the back of stable BoJ policy and high market volatility.

	GE	GDP Growth			Inflation			
%	2018	2019 e	2020 e	2018	2019 e	2020 e		
Advanced	2.2	1.6	1.0	2.1	1.4	1.3		
United-States	2.9	2.2	1.5	2.4	1.8	1.8		
Japan	0.8	1.2	0.2	1.0	0.6	0.3		
United-Kingdom	1.4	1.1	0.6	2.5	1.9	1.8		
Euro Area	1.9	1.1	0.7	1.8	1.1	0.8		
Germany	1.4	0.4	0.2	1.9	1.4	1.0		
France	1.7	1.2	1.0	2.1	1.2	1.0		
Italy	0.7	0.1	0.0	1.2	0.6	0.5		
Spain	2.6	2.2	1.6	1.7	0.8	0.7		
Emerging	4.4	3.8	4.2	4.7	4.8	4.5		
China	6.6	5.9	5.6	2.1	2.4	2.8		
India*	6.8	6.5	6.3	2.9	3.0	3.3		
Brazil	1.1	0.5	2.0	3.7	3.7	3.5		
Russia	2.3	1.2	2.0	2.9	4.8	3.8		
0 0110.0	" 0				0.6			

Source: BNP Paribas Group Economic Research (e: Estimates & forecasts)

^{*} Fiscal year from April 1st of year n to March 31st of year n+1

Interd	est rates, %	2019						
	-							
End of	period	Q1	Q2	Q3	Q4e	2018	2019e	2020e
US	Fed Funds	2.50	2.50	2.00	1.50	2.50	1.50	1.00
	Libor 3m \$	2.60	2.32	2.09	1.70	2.81	1.70	1.25
	T-Notes 10y	2.42	2.00	1.67	1.00	2.69	1.00	1.50
Ezone	deposit rate	-0.40	-0.40	-0.50	-0.60	-0.40	-0.60	-0.60
	Euribor 3m	-0.31	-0.35	-0.42	-0.60	-0.31	-0.60	-0.60
	Bund 10y	-0.07	-0.32	-0.57	-0.80	0.25	-0.80	-0.50
	OAT 10y	0.26	-0.01	-0.28	-0.55	0.71	-0.55	-0.30
UK	Base rate	0.75	0.75	0.75	0.75	0.75	0.75	0.75
	Gilts 10y	1.00	0.84	0.40	0.55	1.27	0.55	0.75
Japan	BoJ Rate	-0.06	-0.08	-0.06	-0.10	-0.07	-0.10	-0.10
	JGB 10y	-0.09	-0.16	-0.22	-0.40	0.00	-0.40	-0.25

Source: BNP Paribas GlobalMarkets (e: Forecasts)

Exch	ange Rates	2019						
End of	period	Q1	Q2	Q3	Q4e	2018	2019e	2020e
USD	EUR/USD	1.12	1.14	1.09	1.11	1.14	1.11	1.14
	USD/JPY	111	108	108	102	110	102	96
	GBP / USD	1.30	1.27	1.23	1.23	1.27	1.23	1.36
	USD / CHF	1.00	0.98	1.00	0.99	0.99	0.99	1.00
EUR	EUR / GBP	0.85	0.89	0.89	0.90	0.90	0.90	0.84
	EUR / CHF	1.12	1.11	1.09	1.10	1.13	1.10	1.14
	EUR/JPY	124	123	118	113	125	113	109

Source: BNP Paribas GlobalMarkets (e: Forecasts)



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