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The bank
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SUPPLY SIDE DISRUPTION, SOME HOPEFUL SIGNS

The current business cycle is atypical and this influences the analytical approach, with a focus on the supply side and whether it will be able to meet the level of demand in the economy, rather than on the demand side. Supply side disruption has been a key issue but recent PMI data suggest that we may have seen the worst. In the euro area and the US, the percentage of companies that are confronted with rising input prices and are contemplating to increase their output prices has started to decline and delivery lags are shortening. The Federal Reserve of New York's global supply chain pressures index seems to have peaked. However, anecdotal evidence suggests visibility remains very low. Given the importance of supply disruption for the growth and inflation outlook, it implies that forecast uncertainty will remain very high.

Business cycle analysis generally focuses on the demand side of the economy and tries to answer the question whether growth will be subdued or strong by looking at household income, the labour market, confidence, corporate profits, interest rates and other variables

This approach makes sense. After all, production in the economy changes because demand changes. It is only in the mature stage of the cycle that the supply side may take centre stage in the cyclical analysis, when bottlenecks appear in labour or product markets and risk triggering a pick-up in wage growth and inflation. The current business cycle is atypical and this influences the analytical approach.

The (expected) sanitary situation – through its influence on spending, mobility, production – is of course key in the assessment of the cyclical outlook, but once this factor has been taken into account, the emphasis is on the supply side and whether it will be able to meet the level of demand in the economy, rather than on the demand side.

Strength of demand in the near term appears to be beyond doubt in most advanced economies¹ whereas for many months already, supply disruption has been and continues to be a constraint on demand and hence a headwind to growth. Such a situation creates many issues.

The outlook for growth depends to a large degree on whether the supply constraints will be eased or not. Assessing the true state of demand becomes difficult. For the US, this is illustrated in the latest FOMC minutes: *"Housing demand remained strong...Shortages of construction materials appeared to have hampered building completions..."*. Corporate investment is also suffering from supply constraints: *"Growth in business fixed investment appeared to be rising at a slow pace again in the fourth quarter, as supply bottlenecks continued to weigh on business equipment spending, and the limited availability of construction materials was still holding back spending on nonresidential structures."*

1. Household spending should be supported by income growth, confidence, a decline in the unemployment rate, low interest rates and accumulated savings during lockdown, with high inflation being a negative factor. Corporate investment should benefit from the increase in company profits, rising capacity utilization, good demand prospects, low interest rates and easy access to finance. Moreover, in the euro area, fiscal policy will also support growth.

Evaluating possible inflation developments is also more complex² and inflation forecasts are suffering from a higher degree of uncertainty than previously. This was acknowledged by Isabel Schnabel of the ECB in a recent interview. *"We are well aware of the uncertainty around our inflation projections. There is a risk to the upside."*³ She also emphasized the increased role of survey data. *"Most economists hadn't expected the extent of the increase in inflation. That's why we are increasingly relying on surveys of companies and households to better understand what is happening. Some companies are telling us they expect the supply chain bottlenecks to last into 2023."*

EURO AREA: MANUFACTURING PMI PRICE PRESSURES

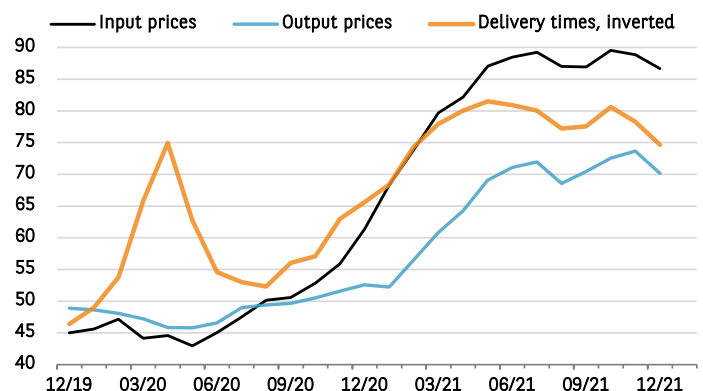


CHART 1

SOURCE: IHS MARKIT, BNP PARIBAS

2. To illustrate this point: historically, the cyclical amplitude of the PMI surveys of input and output prices had been rather stable, but since the pandemic, these surveys have moved outside the historical bandwidth. These means that the previous statistical relationships between the surveys and producer and consumer prices may no longer prevail, so inflation forecasting has become more difficult.

3. *Le Monde*, interview with Isabel Schnabel, Member of the Executive Board of the ECB, conducted by Eric Albert on 16 December and published on 22 December 2021.



Although supply side tensions remain very high, there are some hopeful signs that they have started to ease.



The recent PMI data suggest that we may have seen the worst of the supply disruption (charts 1 and 2). In the euro area and the US, the percentage of companies that are confronted with rising input prices and are contemplating to increase their output prices has started to decline. Besides, delivery lags are shortening. This suggests that price pressures seem to be abating, whilst staying at very elevated levels. The Federal Reserve of New York's global supply chain pressures index allows for a more comprehensive assessment. It is based on indicators on cross-border transportation costs and on the manufacturing purchasing managers' indices (PMI)⁴. The former are captured by the Baltic Dry Index – which tracks the cost of shipping raw materials –, the Harpex index – which tracks container shipping rates – and outbound and inbound airfreight price indices for air transport between the US on the one hand and Asia and Europe on the other hand. From the PMI surveys, three series are used: delivery time, order backlog and purchased stocks, which measures the extent of inventory accumulation⁵. Moreover, the PMI data are corrected for the influence of changes in demand⁶. According to the researchers at the Fed of New York, the index "seems to suggest that global supply chain pressures, while still historically high, have peaked and might start to moderate somewhat going forward." However, visibility is very low. A recent FT article⁷ quotes industry sources saying that congestion at ports may continue for quite some time. In addition, the Omicron variant may cause further disruption with high infection rates causing a shortage of staff. Given the importance of supply disruption for the growth and inflation outlook, it implies that forecast uncertainty will remain very high.

William De Vijlder

UNITED STATES: MANUFACTURING PMI PRICE PRESSURES

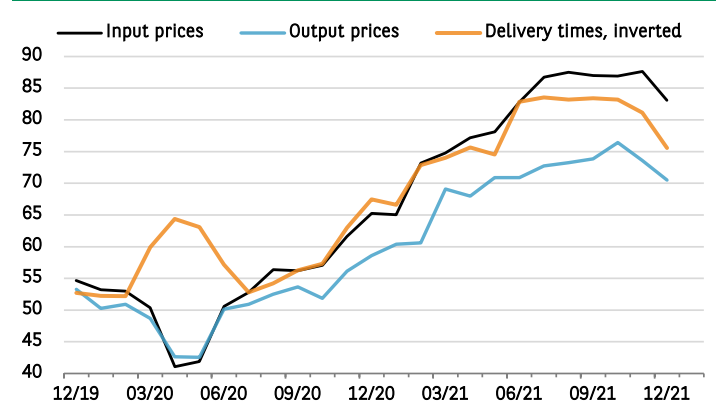


CHART 2 SOURCE: IHS MARKIT, BNP PARIBAS

GLOBAL SUPPLY CHAIN PRESSURES INDEX

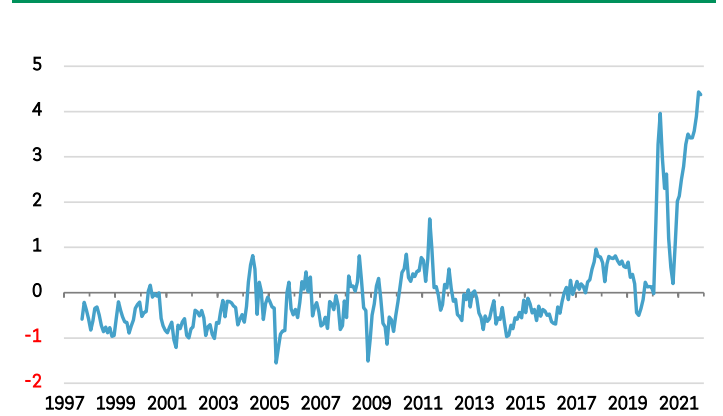


CHART 3 SOURCE: FEDERAL RESERVE OF NEW YORK, BNP PARIBAS

4. Source: Gianluca Benigno, Julian di Giovanni, Jan J. J. Groen, and Adam I. Noble, *A New Barometer of Global Supply Chain Pressures*, Federal Reserve Bank of New York Liberty Street Economics, January 4, 2022, <https://libertystreeteconomics.newyorkfed.org/2022/01/a-new-barometer-of-global-supply-chain-pressures/>.

5. The geographical coverage is: the euro area, China, Japan, South Korea, Taiwan, the UK and the US.

6. This is done by running a regression between the supply chain PMI measures (delivery time, backlogs, and purchased stocks) and the 'new orders' PMI as explanatory variable. The residuals from these regressions, which reflect the pure supply side effect, are then used as inputs in the global supply chain pressure index.

7. *Is there an end in sight to supply chain disruption?*, Financial Times, 9 January 2022.



MARKETS OVERVIEW

OVERVIEW

Week 31-12 21 to 7-1-22

➔ CAC 40	7 153	▶ 7 219	+0.9 %
➔ S&P 500	4 766	▶ 4 677	-1.9 %
➔ Volatility (VIX)	17.2	▶ 18.8	+1.5 pb
➔ Euribor 3M (%)	-0.57	▶ -0.58	-0.4 bp
➔ Libor 3M (%)	0.21	▶ 0.24	+2.7 bp
➔ OAT 10y (%)	0.12	▶ 0.21	+8.3 bp
➔ Bund 10y (%)	-0.18	▶ -0.08	+10.4 bp
➔ US Tr. 10y (%)	1.50	▶ 1.77	+27.1 bp
➔ Euro vs dollar	1.14	▶ 1.13	-0.2 %
➔ Gold (ounce, \$)	1 822	▶ 1 792	-1.7 %
➔ Oil (Brent, \$)	78.4	▶ 81.9	+4.4 %

MONEY & BOND MARKETS

Interest Rates

	highest 22	lowest 22	Yield (%)
€ ECB	0.00 at 03/01	0.00 at 03/01	0.01 at 07/01
€ Eonia	-0.51 at 03/01	-0.51 at 03/01	-0.60 at 07/01
€ Euribor 3M	-0.58 at 04/01	-0.58 at 05/01	-0.08 at 07/01
€ Euribor 12M	-0.49 at 07/01	-0.50 at 05/01	0.21 at 07/01
\$ FED	0.25 at 03/01	0.25 at 03/01	0.95 at 07/01
Libor 3M	0.24 at 07/01	0.21 at 03/01	0.79 at 06/01
Libor 12M	0.66 at 07/01	0.58 at 03/01	1.77 at 07/01
£ BoE	0.25 at 03/01	0.25 at 03/01	5.20 at 07/01
Libor 3M	0.49 at 07/01	0.26 at 03/01	0.84 at 07/01
Libor 12M	0.81 at 03/01	0.81 at 03/01	1.18 at 07/01

Yield (%)

	highest 22	lowest 22
€ AVG 5-7y	0.01 at 07/01	-0.04 at 03/01
Bund 2y	-0.60 at 07/01	-0.64 at 05/01
Bund 10y	-0.08 at 07/01	-0.13 at 04/01
OAT 10y	0.21 at 07/01	0.15 at 04/01
Corp. BBB	0.95 at 07/01	0.90 at 05/01
\$ Treas. 2y	0.81 at 06/01	0.70 at 04/01
\$ Treas. 10y	1.77 at 07/01	1.63 at 03/01
High Yield	5.20 at 07/01	5.07 at 03/01
£ gilt. 2y	0.84 at 07/01	0.69 at 03/01
gilt. 10y	1.18 at 07/01	0.97 at 03/01

EXCHANGE RATES

1€ =	highest 22	lowest 22	2022
USD	1.13 at 07/01	1.13 at 03/01	-0.2%
GBP	0.84 at 03/01	0.83 at 04/01	-0.4%
CHF	1.04 at 07/01	1.03 at 04/01	+0.7%
JPY	131.22 at 04/01	130.20 at 03/01	+0.2%
AUD	1.58 at 07/01	1.56 at 05/01	+1.3%
CNY	7.23 at 07/01	7.20 at 03/01	-0.2%
BRL	6.42 at 06/01	6.40 at 03/01	+1.3%
RUB	85.38 at 06/01	84.45 at 03/01	+0.1%
INR	84.32 at 07/01	83.85 at 03/01	-0.2%

At 7-1-22

COMMODITIES

Spot price, \$	highest 22	lowest 22	2022	2022(€)
Oil, Brent	82.0 at 06/01	79.0 at 03/01	+4.4%	+4.7%
Gold (ounce)	1 792 at 05/01	1 792 at 07/01	-1.7%	-1.5%
Metals, LME	4 524 at 04/01	4 489 at 06/01	+0.5%	+0.7%
Copper (ton)	9 692 at 04/01	9 543 at 06/01	-0.5%	-0.3%
wheat (ton)	290 at 04/01	285 at 06/01	+21.8%	+22.1%
Corn (ton)	234 at 04/01	226 at 03/01	+0.2%	+2.6%

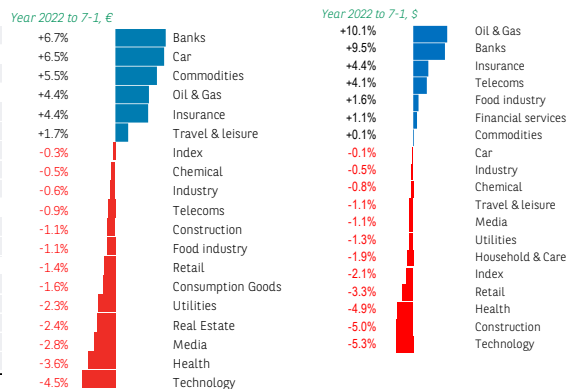
At 7-1-22

EQUITY INDICES

Index	highest 22	lowest 22	2022
World			
MSCI World	3 178 at 04/01	3 178 at 07/01	-1.7%
North America			
S&P500	4 677 at 03/01	4 677 at 07/01	-1.9%
Europe			
EuroStoxx50	4 306 at 05/01	4 306 at 07/01	+0.2%
CAC 40	7 219 at 05/01	7 217 at 03/01	+0.1%
DAX 30	15 948 at 05/01	15 948 at 07/01	+0.4%
IBEX 35	8 752 at 04/01	8 752 at 07/01	+0.0%
FTSE100	7 485 at 05/01	7 385 at 03/01	+0.1%
Asia			
MSCI, loc.	1 146 at 05/01	1 142 at 06/01	+0.0%
Nikkei	28 479 at 05/01	28 479 at 07/01	-1.1%
Emerging			
MSCI Emerging (\$)	1 226 at 04/01	1 217 at 06/01	-0.0%
China	82 at 03/01	80 at 05/01	-1.6%
India	863 at 05/01	856 at 03/01	+2.1%
Brazil	1 400 at 03/01	1 372 at 06/01	-0.9%
Russia	749 at 03/01	737 at 06/01	-0.9%

At 7-1-22

PERFORMANCE BY SECTOR (Eurostoxx50 & S&P500)

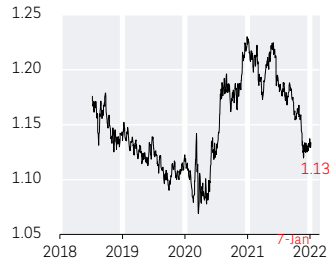


SOURCE: REFINITIV, BNP PARIBAS,



MARKETS OVERVIEW

EURO-DOLLAR



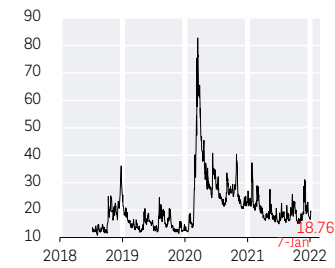
EUROSTOXX50



S&P500



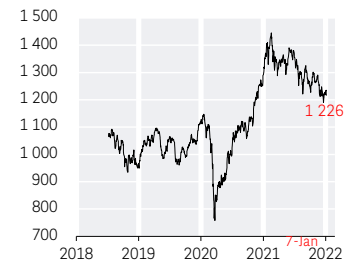
VOLATILITY (VIX, S&P500)



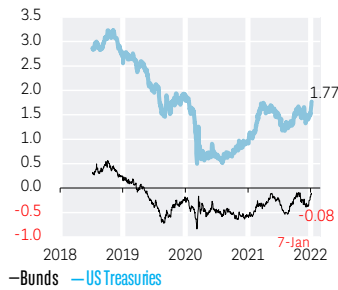
MSCI WORLD (USD)



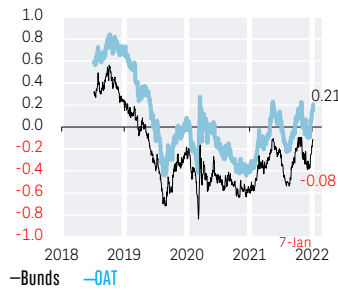
MSCI EMERGING (USD)



10Y BOND YIELD, TREASURIES VS BUND



10Y BOND YIELD



10Y BOND YIELD & SPREADS

Year 2022 to 7-1		
1.93%	Greece	200 bp
1.28%	Italy	135 bp
0.66%	Spain	73 bp
0.60%	Portugal	67 bp
0.21%	France	28 bp
0.21%	Belgium	28 bp
0.12%	Finland	19 bp
-0.01%	Austria	6 bp
-0.03%	Ireland	4 bp
-0.08%	Germany	
-0.10%	Netherlands	-3 bp

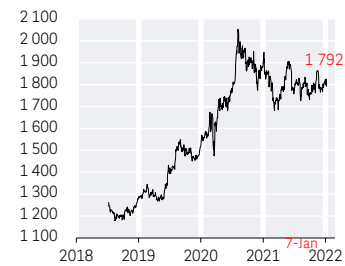
OIL (BRENT, USD)



METALS (LMEX, USD)



GOLD (OUNCE, USD)



SOURCE: REFINITIV, BNP PARIBAS



PMI: MANUFACTURING PRICE PRESSURES CONTINUE TO EASE BUT REMAIN ELEVATED

The global manufacturing PMI was stable in December and has hardly moved since the spring of 2021. However, this masks significant differences between countries. Focusing on the most recent data, the US and the euro area saw a slight decline. Data for France and Germany were essentially stable whereas Italy and the Netherlands recorded a decline. Italy continues to have the highest score of euro area countries. The Czech Republic and Poland saw a further increase. China is doing better than last month whereas India saw a rather considerable decline. The services PMI declined slightly in the US but dropped in the euro area, Germany, Ireland, Italy and Spain. The index hardly changed in France. The UK also saw a big decline. These developments reflect the impact of the Omicron wave. Japan and, even more so, India recorded considerable declines. The dynamics of the composite PMIs have been dominated by developments in the services sector, hence weaker data for the euro area, Germany, Ireland, Italy and Spain and an index that hardly changed in France. The UK was also confronted with a big decline.

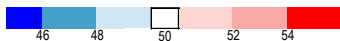
Judging by the manufacturing employment PMI, the labour market outlook continues to be favourable in the advanced economies. Data for the US and the euro area improved and jumped in Germany. The Netherlands recorded quite a decline. The Czech Republic and Poland benefitted from a big increase. The index was stable in China but remains slightly below 50, which is a source of concern. New export orders were stable in the US and weaker in the euro area, which, amongst its members saw contrasting developments (better in France, significantly down in Germany and Spain). The index remains at a subdued level in the UK and China. Brazil, Mexico, the Czech Republic, Indonesia and Vietnam recorded big increases.

The input prices PMI remains at very elevated levels across the board but after declining in November, a new decline was recorded in the US, the euro area, France, Germany, Ireland. In several other countries, the December data also moved lower. In the services sector, input prices pressures eased in the euro area but moved higher in the US. The high levels show that a vast majority of companies continue to face rising prices. The global output prices PMI declined for the second month in a row with considerable declines in the US, the euro area and several euro area countries. The picture is very diverse in the emerging economies.

William De Vijlder

		Developed Markets																	Emerging countries																		
		NA		Europe							Asia-Oceania				LATAM		Eurasia			Middle East & Africa			Asia														
		World	CANADA	USA	EURO ZONE		AUSTRIA	DENMARK	FRANCE	GERMANY	GREECE	IRELAND	ITALY	NETHERLANDS	SPAIN	SWITZERLAND	UK	AUSTRALIA	NEW ZEALAND	JAPAN	SINGAPORE	BRAZIL	MEXICO	CZECH REPUBLIC	POLAND	RUSSIA	TURKEY	EGYPT	LEBANON	SAUDI ARABIA	SOUTH AFRICA	UAE	CHINA	HONG KONG	INDIA	INDONESIA	VIETNAM
Mar-21	55.0	58.5	59.1	62.5	63.4	66.0	59.3	66.6	51.8	57.1	59.8	64.7	56.9	66.3	58.9	59.9	64.1	52.7	50.8	52.8	46.6	58.0	54.3	51.1	52.6	48.0	46.4	53.3	58.5	52.6	50.6	50.5	55.4	53.2	53.6		
Apr-21	55.9	57.2	60.5	62.9	64.7	67.0	58.9	66.2	54.4	60.8	60.7	67.2	57.7	69.5	60.9	61.7	58.2	53.6	50.9	52.3	48.4	58.9	53.7	50.4	50.4	47.7	47.1	55.2	58.1	52.7	51.9	50.3	55.5	54.6	54.7		
May-21	56.0	57.0	62.1	63.1	66.4	65.9	59.4	64.4	58.0	64.1	62.3	69.4	59.4	69.9	65.6	61.8	58.4	53.0	50.7	53.7	47.6	61.8	57.2	51.9	49.3	48.6	47.9	56.4	58.3	52.3	52.0	52.5	50.8	55.3	53.1		
Jun-21	55.5	56.5	62.1	63.4	67.0	65.6	59.0	65.1	58.6	64.0	62.2	68.8	60.4	66.7	63.9	63.2	60.0	52.4	50.8	56.4	48.8	62.7	59.4	49.2	51.3	49.9	47.5	56.4	57.5	52.2	51.3	51.4	48.1	53.5	44.1		
Jul-21	55.4	56.2	63.4	62.8	63.9	69.8	58.0	65.9	57.4	63.3	60.3	67.4	59.0	71.1	60.4	60.8	62.5	53.0	51.0	56.7	49.6	62.0	57.6	47.5	54.0	49.1	47.0	55.8	43.5	54.0	50.3	51.3	55.3	40.1	45.1		
Aug-21	54.1	57.2	61.1	61.4	61.8	67.5	57.5	62.6	59.3	62.8	60.9	65.8	59.5	67.7	60.3	51.6	39.8	52.7	50.9	53.6	47.1	61.0	56.0	46.5	54.1	49.8	46.6	54.1	56.2	53.8	49.2	53.3	52.3	43.7	40.2		
Sep-21	54.1	57.0	60.7	58.6	62.8	65.6	55.0	58.4	58.4	60.3	59.7	62.0	58.1	68.1	57.1	51.2	51.5	51.5	50.8	54.4	48.6	58.0	53.4	49.8	52.5	48.9	46.9	58.6	54.7	53.3	50.0	51.7	53.7	52.2	40.2		
Oct-21	54.2	57.7	58.4	58.3	60.6	71.9	53.6	57.8	58.9	62.1	61.1	62.5	57.4	65.4	57.8	50.4	54.2	53.2	50.8	51.7	49.3	55.1	53.8	51.6	51.2	48.7	46.6	57.7	53.6	55.7	50.6	50.8	55.9	57.2	52.1		
Nov-21	54.2	57.2	58.3	58.4	58.1	68.1	55.9	57.4	58.8	59.9	62.8	60.7	57.1	62.5	58.1	54.8	50.6	54.5	50.6	49.8	49.4	57.1	54.4	51.7	52.0	48.7	46.1	56.9	57.2	55.9	49.9	52.6	57.6	53.9	52.2		
Dec-21	54.2	56.5	57.7	58.0	58.7	64.4	55.6	57.4	59.0	58.3	62.0	58.7	56.2	62.7	57.9			54.3	50.7	49.8	49.4	59.1	56.1	51.6	52.1	49.0	46.7	53.9	55.6	50.9	50.8	55.5	53.5	52.5			

		Developed Markets																	Emerging countries			
		World	USA	EURO ZONE		FRANCE	GERMANY	IRELAND	ITALY	SPAIN	UK	AUSTRALIA	JAPAN	BRAZIL	RUSSIA	LEBANON	CHINA	HONG KONG	INDIA			
Mar-21	54.7	60.4	49.6	48.2	51.5	54.6	48.6	48.1	56.3	58.7	48.3	44.1	55.8	46.4	54.3	50.5	54.6					
Apr-21	57.0	64.7	50.5	50.3	49.9	57.7	47.3	54.6	61.0	61.0	49.5	42.9	55.2	47.1	56.3	50.3	54.0					
May-21	59.5	70.4	55.2	56.6	52.8	62.1	53.1	59.4	62.9	61.2	46.5	48.3	57.5	47.9	55.1	52.5	46.4					
Jun-21	57.4	64.6	58.3	57.8	57.5	63.1	56.7	62.5	62.4	57.8	48.0	53.9	56.5	47.5	50.3	51.4	41.2					
Jul-21	56.3	59.9	59.8	56.8	61.8	66.6	58.0	61.9	59.6	51.8	47.4	54.4	53.5	47.0	54.9	51.3	45.4					
Aug-21	52.8	55.1	59.0	56.3	60.8	63.7	58.0	60.1	55.0	45.6	42.9	55.1	49.3	46.6	46.7	53.3	56.7					
Sep-21	53.8	54.9	56.4	56.2	56.2	63.7	55.5	56.9	55.4	45.7	47.8	54.6	50.5	46.9	53.4	51.7	55.2					
Oct-21	55.6	58.7	54.6	56.6	52.4	63.4	52.4	56.6	59.1	47.6	50.7	54.9	48.8	46.6	53.8	50.8	58.4					
Nov-21	55.6	58.0	55.9	57.4	52.7	59.3	55.9	59.8	58.5	49.6	53.0	53.6	47.1	46.1	52.1	52.6	58.1					
Dec-21	57.6	53.1	57.0	48.7	55.4	53.0	55.8	53.2			51.1	53.6	49.5	46.7		50.8	55.5					



SOURCE: MARKIT, BNP PARIBAS



BNP PARIBAS

The bank
for a changing
world

COMPOSITE PMI*

	Developed Markets																	Emerging countries																	
	WD	NA		Europe							Asia-Oceania				LATAM		Eurasia			Middle East & Africa			Asia												
	World	CANADA	USA	EURO ZONE	AUSTRIA	DENMARK	FRANCE	GERMANY	GREECE	IRELAND	ITALY	NETHERLANDS	SPAIN	SWITZERLAND	UK	AUSTRALIA	NEW ZEALAND	JAPAN	SINGAPORE	BRAZIL	MEXICO	CZECH REPUBLIC	POLAND	RUSSIA	TURKEY	EGYPT	LEBANON	SAUDI ARABIA	SOUTH AFRICA	UAE	CHINA	HONG KONG	INDIA	INDONESIA	VIETNAM
Mar-21	54.8		59.7	53.2			50.0	57.3		54.5	51.9		50.1	56.4			49.9		45.1					54.6							53.1		56.0		
Apr-21	56.7		63.5	53.8			51.6	55.8		58.1	51.2		55.2	60.7			51.0		44.5					54.0						54.7		55.4			
May-21	58.5		68.7	57.1			57.0	56.2		63.5	55.7		59.2	62.9			48.8		49.2					56.2						53.8		48.1			
Jun-21	56.6		63.7	59.5			57.4	60.1		63.4	58.3		62.4	62.2			48.9		54.6					55.0						50.6		43.1			
Jul-21	55.8		59.9	60.2			56.6	62.4		65.0	58.6		61.2	59.2			48.8		55.2					51.7						53.1		49.2			
Aug-21	52.5		55.4	59.0			55.9	60.0		62.6	59.1		60.6	54.8			45.5		54.6					48.2						47.2		55.4			
Sep-21	53.3		55.0	56.2			55.3	55.5		61.5	56.6		57.0	54.9			47.9		54.7					50.5						51.4		55.3			
Oct-21	54.5		57.6	54.2			54.7	52.0		62.5	54.2		56.2	57.8			50.7		53.4					49.5						51.5		58.7			
Nov-21	54.8		57.2	55.4			56.1	52.2		59.3	57.6		58.3	57.6			53.3		52.0					48.4						51.2		59.2			
Dec-21			57.0	53.3			55.8	49.9		56.5	54.7		55.4	53.2			51.8		52.0					50.2						56.4		56.4			

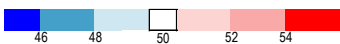
*manufacturing & services

MANUFACTURING PMI - EMPLOYMENT

	Developed Markets																	Emerging countries															
	WD	NA		Europe							Asia-Oceania				LATAM		Eurasia			Middle East & Africa			Asia										
	World	CANADA	USA	EURO ZONE	AUSTRIA	DENMARK	FRANCE	GERMANY	GREECE	IRELAND	ITALY	NETHERLANDS	SPAIN	SWITZERLAND	UK	AUSTRALIA	NEW ZEALAND	JAPAN	SINGAPORE	BRAZIL	MEXICO	CZECH REPUBLIC	POLAND	RUSSIA	TURKEY	EGYPT	LEBANON	SAUDI ARABIA	SOUTH AFRICA	UAE	CHINA	INDIA	INDONESIA
Mar-21	51.6	53.7	54.5	54.8	57.7	58.0	56.2	54.1	51.0	55.7	55.3	55.1	53.2	54.4	55.7	53.3	53.7	50.0	48.5	47.1	54.7	53.2	50.1	54.2	48.9	49.9	45.7	49.5	49.5	47.2	49.8	52.1	
Apr-21	52.6	53.2	55.7	56.6	59.1	58.0	54.1	57.3	53.8	57.7	55.9	59.6	55.6	54.6	54.5	55.8	53.0	50.5	51.8	48.9	55.5	53.4	50.2	52.7	47.6	50.6	55.7	49.4	50.7	49.7	49.6	53.4	
May-21	52.5	54.4	54.3	57.7	60.1	59.7	53.2	58.6	56.3	60.0	58.6	60.7	55.8	56.2	60.6	55.8	52.6	51.0	53.0	46.6	57.0	54.7	51.8	51.7	48.3	50.3	50.7	49.8	50.1	49.0	50.3	51.4	
Jun-21	52.6	53.0	53.0	58.3	63.7	60.7	54.7	59.3	56.4	59.4	57.7	61.2	56.5	57.7	58.8	55.0	56.7	51.2	55.8	48.4	57.5	54.8	48.0	52.2	48.7	51.1	52.5	50.6	50.8	49.8	50.3	42.7	
Jul-21	52.7	53.5	55.1	58.5	61.3	62.2	53.1	61.7	54.5	57.7	56.7	60.1	55.4	61.2	58.8	55.3	57.8	51.2	54.4	49.6	56.7	54.0	47.2	52.3	50.3	50.2	49.1	50.7	50.1	50.6	43.1	43.9	
Aug-21	52.0	53.2	52.8	57.3	62.6	58.0	54.0	58.2	54.7	58.0	55.9	61.6	55.7	63.1	57.8	52.8	54.1	51.7	53.5	47.8	55.4	51.1	47.0	54.8	50.2	50.3	48.5	51.6	49.8	49.9	45.5	41.1	
Sep-21	51.4	52.8	53.1	55.4	62.2	58.4	50.1	56.5	54.4	55.6	56.3	57.1	53.4	62.0	51.5	54.5	54.0	52.1	54.8	46.9	56.2	50.3	48.5	53.6	50.3	50.5	47.2	50.6	48.9	49.4	45.8	37.8	
Oct-21	51.8	53.2	52.7	55.4	63.1	57.8	51.2	55.7	56.0	55.7	56.4	59.5	52.2	60.1	54.5	53.4	51.7	52.6	54.1	47.3	52.4	50.5	50.4	52.9	50.5	50.3	47.0	50.8	49.7	49.5	50.1	42.7	
Nov-21	51.4	53.0	52.0	54.9	62.0	57.4	53.1	53.8	56.4	55.0	58.3	57.2	51.8	59.5	56.1	52.9	48.2	52.7	51.0	47.0	53.6	49.6	51.9	52.7	48.5	50.9	50.6	50.1	48.9	50.2	50.3	45.6	
Dec-21	51.6	52.9	52.8	55.3	59.8	63.4	52.6	56.0	57.0	54.3	57.3	55.7	51.6	60.8	55.7	53.0		53.1	50.6	46.6	57.9	52.5	51.0	53.7	49.5	50.3	50.6	48.7	49.3	50.0	50.7		

MANUFACTURING PMI - NEW EXPORT ORDERS

	Developed Markets																	Emerging countries																	
	WD	NA		Europe							Asia-Oceania				LATAM		Eurasia			Middle East & Africa			Asia												
	World	CANADA	USA	EURO ZONE	AUSTRIA	DENMARK	FRANCE	GERMANY	GREECE	IRELAND	ITALY	NETHERLANDS	SPAIN	SWITZERLAND	UK	AUSTRALIA	NEW ZEALAND	JAPAN	SINGAPORE	BRAZIL	MEXICO	CZECH REPUBLIC	POLAND	RUSSIA	TURKEY	EGYPT	ISRAEL	LEBANON	SAUDI ARABIA	SOUTH AFRICA	UAE	CHINA	HONG KONG	INDIA	INDONESIA
Mar-21	53.4	54.4	53.5	63.0	61.4		56.4	69.1	46.8	54.6	61.3	66.5	55.0	51.6	51.3		50.8	51.0	50.1	42.6	56.0	56.7	49.0	51.4	48.7	42.9	48.7	46.2	46.7	50.7	51.4	46.1	53.8	46.5	55.1
Apr-21	54.7	53.4	56.2	62.4	64.6		55.6	67.5	49.3	56.6	60.2	65.9	56.5	53.7	58.8		53.8	51.4	50.6	44.0	55.1	55.8	49.5	51.2	53.1	60.0	49.3	50.7	52.5	51.7	51.8	46.3	54.9	53.0	54.7
May-21	54.9	53.6	57.9	62.0	67.5		56.5	64.4	53.0	57.6	62.0	68.1	57.8	59.7	48.9		53.8	51.2	50.9	45.0	54.2	55.3	50.4	48.8	52.7	69.6	50.0	56.5	51.4	49.7	52.3	50.4	53.6	52.5	53.7
Jun-21	53.2	53.5	54.0	61.4	66.4		55.5	64.5	57.1	57.3	59.7	66.2	58.1	55.2	60.2		53.3	51.3	51.7	46.9	56.8	56.6	45.3	52.2	53.2	46.6	48.0	54.5	49.4	45.2	50.1	47.6	48.8	50.6	44.0
Jul-21	52.7	52.9	54.8	60.4	57.5		54.4	63.0	52.8	61.5	59.2	67.1	58.7	53.9	53.6		52.3	51.4	50.2	47.0	56.3	52.9	43.0	56.3	52.6	44.2	50.3	54.1	47.1	49.4	50.3	47.4	54.8	26.6	44.8
Aug-21	51.0	54.3	52.8	59.1	55.3		53.9	61.0	56.4	59.3	60.3	64.7	55.1	54.5	45.1		49.3	51.3	49.7	46.5	57.3	53.3	40.2	56.1	50.4	48.7	48.2	52.3	49.8	49.2	48.0	49.5	50.6	34.6	37.2
Sep-21	51.0	53.8	54.9	55.8	57.8		50.5	56.3	56.7	55.1	58.6	59.6	54.7	49.7	51.9		50.5	51.2	48.9	45.2	54.4	49.1	45.2	54.9	46.3	52.2	48.1	52.8	49.0	52.6	47.7	49.1	51.5	44.5	27.4
Oct-21	50.6	55.6	50.4	55.4	54.3		50.3	56.2	56.2	51.7	60.9	57.0	52.3	49.5	46.1		50.3	51.0	48.1	45.0	49.8	49.2	44.4	53.9	44.4	48.9	48.3	54.8	44.9	51.2	48.1	48.9	52.7	49.6	51.5
Nov-21	51.3	53.7	51.0	54.9	51.3		52.2	54.2	56.0	51.6	60.7	56.1	54.1	49.0	54.6		52.8	50.9	50.5	44.5	52.1	48.5	50.1	51.6	50.7	44.5	45.7	56.2	48.5	51.6	49.9	47.9	51.7	48.6	51.9
Dec-21	51.2	53.9	51.0	54.1	52.9		52.7	53.0	54.9	51.5	60.0	55.0	52.1	49.2			51.1	51.0	53.3	49.5	54.4	50.8	49.1	51.7	54.9		47.2	51.7	45.8	50.6	49.9	50.3	51.3	53.1	54.0



SOURCE: MARKIT, BNP PARIBAS



BNP PARIBAS

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PMI MANUFACTURING - INPUT PRICES

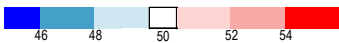
WD	Developed Markets																Emerging countries																		
	NA		Europe								Asia-Oceania				LATAM		Eurasia				Middle East & Africa			Asia											
	World	CANADA	USA	EURO ZONE		AUSTRIA	DENMARK	FRANCE	GERMANY	GREECE	IRELAND	ITALY	NETHERLANDS	SPAIN	SWITZERLAND	UK	AUSTRALIA	NEW ZEALAND	JAPAN	SINGAPORE	BRAZIL	MEXICO	CZECH REPUBLIC	POLAND	RUSSIA	TURKEY	EGYPT	LEBANON	SAUDI ARABIA	SOUTH AFRICA	UAE	CHINA	HONG KONG	INDIA	INDONESIA
Mar-21	68.4	69.5	74.8	79.7	82.3	82.6	75.8	83.7	78.4	75.2	75.9	83.8	74.8		80.6	71.3		59.9	50.8	87.3	57.0	81.9	81.2	72.6	74.2	51.7		51.5		52.9	61.5	51.8	57.3	63.4	64.6
Apr-21	69.7	71.7	77.2	82.2	85.7	84.5	79.0	84.3	81.8	76.3	81.6	86.3	78.3		80.4	74.1		60.4	50.9	86.8	60.3	85.8	84.5	76.3	70.3	55.1		52.7		51.1	62.0	53.8	59.4	62.9	64.3
May-21	71.7	72.5	78.1	87.1	91.3	86.4	79.8	93.1	81.9	78.9	83.7	90.1	80.1		87.6	82.1		62.4	51.0	81.1	57.0	93.0	85.0	74.4	71.4	55.2		53.2		50.6	64.4	56.0	57.0	62.8	65.4
Jun-21	70.7	72.5	82.8	88.5	91.5	81.1	80.3	92.5	83.0	80.5	89.2	93.9	83.6		89.2	78.8		63.2	51.1	84.0	59.6	93.5	88.2	76.0	75.7	55.9		53.0		51.8	56.7	55.2	57.0	63.5	57.8
Jul-21	71.2	72.0	86.7	89.2	93.0	75.3	84.1	93.7	81.7	79.5	88.6	96.7	79.6		87.5	84.6		66.7	51.3	81.0	62.6	96.7	84.9	71.8	77.1	53.9		51.5		52.3	55.6	55.4	56.7	65.5	66.6
Aug-21	70.3	77.2	87.5	87.0	88.1	84.3	80.3	93.0	78.8	74.6	84.1	93.5	80.7		86.4	81.3		64.5	51.4	79.1	59.4	89.1	79.4	65.8	70.0	57.9		51.4		52.0	56.2	55.3	56.3	66.2	65.7
Sep-21	71.2	77.4	87.0	86.9	90.2	79.7	85.5	90.3	89.6	82.9	82.3	87.8	82.7		84.4	78.1		68.0	51.7	78.1	55.3	86.5	78.1	65.0	70.2	59.3		52.5		51.4	58.6	57.3	57.5	65.7	66.0
Oct-21	74.4	77.3	86.9	89.5	91.5	71.6	88.4	91.3	92.3	87.8	86.6	91.2	87.7		87.4	81.8		70.4	51.8	77.6	62.9	88.5	80.8	63.7	74.8	64.5		52.6		51.1	65.1	56.7	60.3	69.5	67.5
Nov-21	71.5	74.5	87.6	88.9	89.5	84.1	84.6	91.0	94.5	84.5	88.0	90.4	89.0		89.7	78.3		72.3	51.7	81.4	62.4	90.7	82.3	66.6	87.3	63.7		52.4		50.9	52.3	56.5	60.1	71.0	70.4
Dec-21	69.7	71.7	83.1	86.7	85.1	79.9	81.0	88.9	86.6	83.1	87.8	88.6	85.9		86.0			71.9	51.4	77.5	67.8	85.0	81.9	66.7	92.1	59.3		53.0		52.3	50.8	57.0	58.8	71.4	59.4

PMI SERVICES - INPUT PRICES

WD	World	USA	EURO ZONE		FRANCE	GERMANY	IRELAND	ITALY	SPAIN	UK	AUSTRALIA	JAPAN	BRAZIL	RUSSIA	CHINA	INDIA
Mar-21	62.5	72.7	55.6	52.4	59.0	60.6	54.4	54.6	64.0	64.7	54.3	69.6	65.1	53.7	56.8	
Apr-21	63.2	73.3	57.6	55.6	60.5	59.9	52.6	60.2	64.9	69.7	54.0	69.3	62.2	54.5	57.8	
May-21	65.3	77.1	59.6	54.8	63.0	65.3	58.2	61.3	67.3	68.1	52.9	66.5	68.3	56.6	56.7	
Jun-21	64.1	74.2	63.2	56.0	70.0	66.5	60.0	64.4	71.8	65.4	52.5	67.5	62.4	50.9	56.5	
Jul-21	64.1	72.3	63.1	58.0	67.7	68.5	61.3	63.2	74.2	74.1	53.8	64.2	61.8	54.8	56.7	
Aug-21	63.8	72.5	63.3	58.5	68.7	70.3	59.9	62.5	72.3	71.5	53.7	68.5	61.2	52.1	57.1	
Sep-21	65.2	74.1	65.2	63.9	67.9	70.8	60.9	65.2	73.5	64.5	54.0	73.2	63.1	53.0	55.7	
Oct-21	65.4	71.7	67.5	66.5	70.0	73.1	62.7	68.3	78.7	73.6	54.7	72.6	64.7	53.6	57.5	
Nov-21	68.5	75.7	71.4	67.5	73.9	72.6	69.5	75.4	82.0	65.3	57.7	74.4	64.9	55.6	57.6	
Dec-21		77.4	69.6	67.2	70.4	71.5	68.7	73.0	76.4		58.2	65.9	65.8		57.0	

PMI MANUFACTURING - OUTPUT PRICES

WD	Developed Markets																Emerging countries																		
	NA		Europe								Asia-Oceania				LATAM		Eurasia				Middle East & Africa			Asia											
	World	CANADA	USA	EURO ZONE		AUSTRIA	DENMARK	FRANCE	GERMANY	GREECE	IRELAND	ITALY	NETHERLANDS	SPAIN	SWITZERLAND	UK	AUSTRALIA	NEW ZEALAND	JAPAN	SINGAPORE	BRAZIL	MEXICO	CZECH REPUBLIC	POLAND	RUSSIA	TURKEY	EGYPT	LEBANON	SAUDI ARABIA	SOUTH AFRICA	UAE	CHINA	HONG KONG	INDIA	INDONESIA
Mar-21	59.3	61.6	69.1	60.9	60.8	66.8	58.3	62.8	61.2	58.1	59.9	63.3	58.5		63.7			51.9		73.3	46.7	58.7	66.0	65.3	62.1	50.4	58.3	49.0		49.5		49.7	52.0	53.1	54.6
Apr-21	59.8	63.3	68.0	64.3	62.4	66.9	63.8	64.4	64.6	62.8	65.5	66.7	62.6		65.3			51.4		77.2	48.6	61.6	69.0	67.1	61.8	51.8	56.2	50.7		51.1		49.3	54.2	52.9	56.9
May-21	62.6	65.9	70.9	69.1	67.9	68.9	65.8	70.6	66.3	64.6	72.0	70.4	65.1		68.3			51.5		76.5	47.5	65.5	73.8	66.9	62.3	51.3	50.8	51.0		49.8		52.7	53.3	51.5	58.0
Jun-21	60.8	64.9	70.9	71.1	68.4	64.5	66.4	73.7	69.5	66.3	71.6	77.1	67.1		73.2			51.6		72.5	49.3	68.7	76.2	66.2	66.4	51.0	54.6	51.1		50.1		52.5	52.1	52.9	50.8
Jul-21	60.3	65.2	72.8	71.9	73.2	69.5	66.8	75.1	64.9	68.9	72.6	77.1	63.9		73.1			53.3		69.5	50.0	72.6	72.6	61.1	64.7	50.7	55.1	51.9		50.4		52.1	51.7	53.2	53.6
Aug-21	60.1	65.1	73.2	68.6	69.0	60.8	61.6	72.6	61.0	66.0	68.1	72.4	62.7		71.6			54.4		69.3	49.5	72.6	72.0	62.3	61.1	54.4	52.0	53.1		49.6		54.8	52.3	53.5	53.9
Sep-21	60.9	67.7	73.9	70.4	73.0	57.6	66.7	73.3	67.7	69.3	68.4	74.9	64.8		71.9			54.9		66.3	48.6	70.6	71.4	57.2	61.6	52.2	50.9	51.1		48.7		53.7	52.0	54.3	51.3
Oct-21	63.7	67.1	76.4	72.6	73.3	78.8	66.1	75.6	77.2	70.2	71.5	78.4	68.8		74.2			56.6		67.2	51.0	71.8	75.2	58.5	67.2	54.6	51.3	53.7		49.0		53.1	52.3	54.0	54.7
Nov-21	61.3	65.8	73.6	73.7	71.1	64.6	68.2	76.3	76.5	71.7	73.4	79.5	70.7		74.0			56.1		66.2	48.8	72.3	71.4	58.4	78.3	54.3	51.9	52.6		48.5		52.6	52.1	54.0	59.3
Dec-21	59.9	63.7	70.5	70.2	70.4	60.9	62.7	70.9	72.8	69.9	73.2	76.6	69.6		74.3			55.9		65.9	52.6	70.9	72.2	59.8	79.9	53.5	53.4	52.6		49.0		54.8	51.0	53.7	55.3



SOURCE: MARKIT, BNP PARIBAS



BNP PARIBAS

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ECONOMIC PULSE

9

UNITED STATES: LATEST MINUTES RAISE THE ALARM

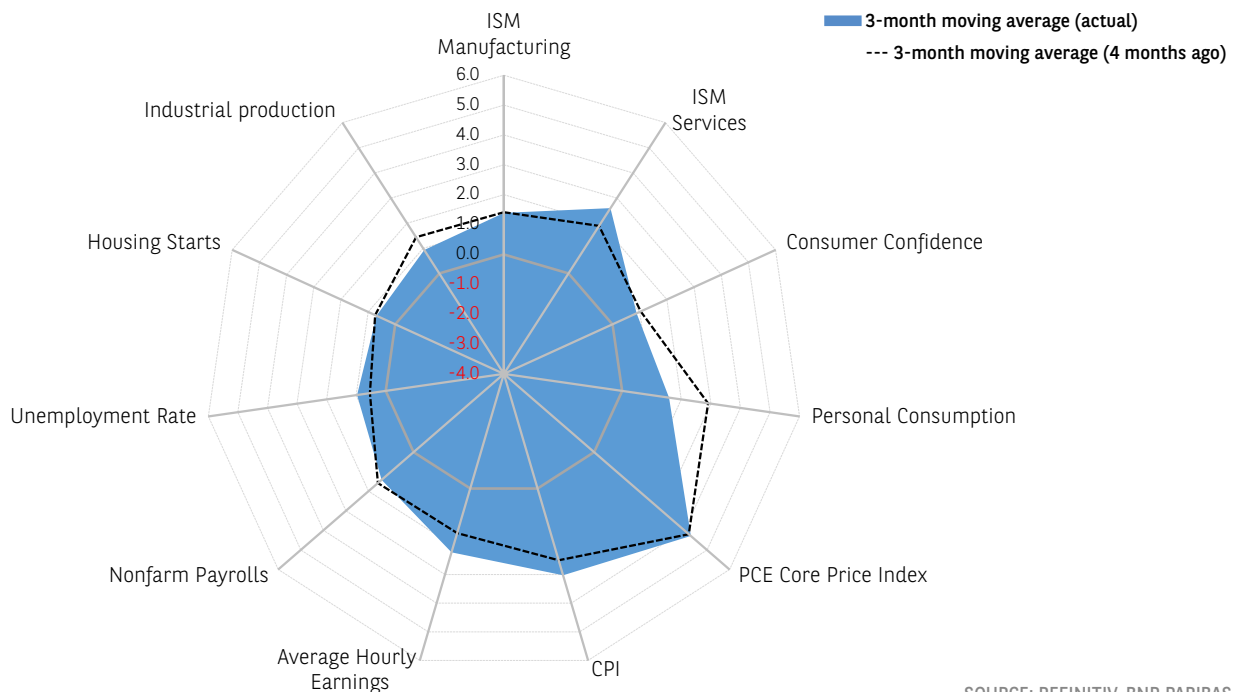
The Fed gets serious. Faced with an unprecedented increase in inflation (6.9% y/y in November, probably scarcely less in December) the Federal Reserve will tighten monetary policy more than previously expected.

With the ending of Quantitative Easing already having been brought forward, the latest minutes of the Federal Open Market Committee (FOMC) indicate that *“the appropriate pace of balance sheet runoff would likely be faster than it was during the previous normalization episode”* and *could come “at some point after the first increase in the target range for the federal funds rate”* (FOMC, 2021). The markets now expect rates to be ratcheted up by a quarter of a point in March, followed by at least two further increases later in 2022. Having thus far been unmoved by the Fed’s announcements, yields on 10-year Treasuries rose. At 1.70% on 6 January, they have gained 20 basis points since the beginning of the year.

Over and above the inflation figures, it was the situation in the labour market, described as “tight” by FOMC members, that drove this change of direction. The latest Bureau of Labor Statistics employment report does little to challenge this observation. For the first time since January 2019, the unemployment rate fell below the 4% mark in December (3.9%), whilst the number of jobs created (199,000 in December) was once again revised upwards. In 2021, nearly 6.5 million of the 9.4 million jobs lost in 2020 were recovered, with many of the active population (slightly over 2 million, mostly discouraged or prevented by Covid-19) missing out. Given the exceptionally high number of vacant positions (down slightly, but still nearly 10 million) and the increase in wages (an annualised 6% on an hourly basis in the final quarter of 2021), the situation is indeed tight.

Jean-Luc Proutat

UNITED STATES: QUARTERLY CHANGES



The indicators in the radar are all transformed into ‘z-scores’ (deviations from the long-term average, as standard deviations). These z-scores have mean zero and their values are between -4 and +6. In the radar chart, the blue area shows the actual conditions of economic activity. It is compared with the situation four months earlier (dotted-line). An expansion of the blue area compared to the dotted area signals an increase in the variable.



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ECONOMIC PULSE

GERMANY: SLOWDOWN CONFIRMED

The indicators currently available for the end of last year suggest that Germany recorded weak growth at best in Q4 2021: a GDP contraction cannot be ruled out. Industrial orders remained at a relatively strong level, but production continued to be held back significantly by supply problems for certain components. According to the latest PMI report from Markit, supplier delivery times in the manufacturing sector remain longer than during the first lockdown in 2020, although tensions have eased somewhat since the summer of 2021. The manufacturing PMI closed 2021 at 57.4, its lowest level for twelve months.

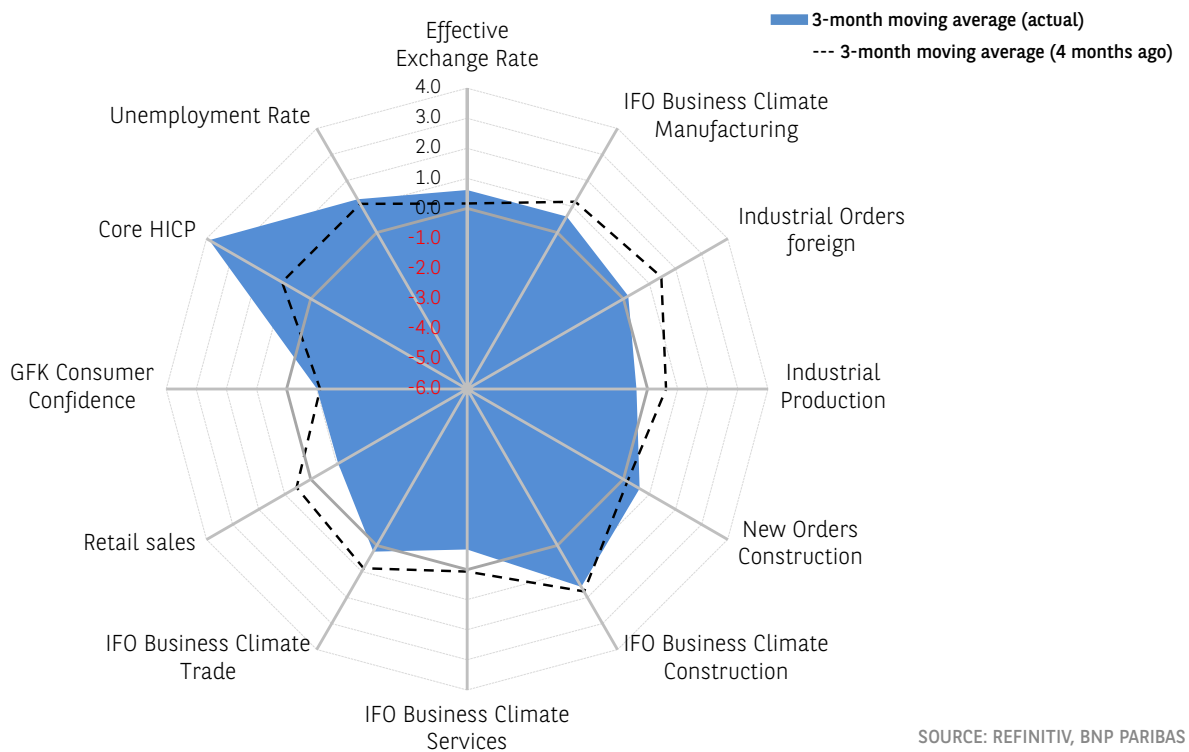
The deterioration of business confidence was even more marked in services. This reflects the tightening of conditions of access to shops and other 'non-essential' facilities for unvaccinated people introduced by the government in early December. The services PMI dropped to 48.7 in December, falling below the threshold of 50 which indicates a contraction in activity for the first time in eight months. The same trends emerge from the Ifo institute survey: in December, the services index recorded its biggest monthly fall since the end of the first lockdown in the spring of 2020.

The drop in the business surveys has had no tangible effect on the labour market so far. Unemployment continued to fall in December, down by 23,000 according to the Federal Ministry of Labour. The number of people out of work fell by 386,000 over the course of 2021, making up for approximately two thirds of the 501,000 increase in 2020. The unemployment rate was 5.2% of the active population in December, which is slightly higher than at the end of 2019.

Against a background of widespread increases in inflation in Europe, Germany is experiencing some of the biggest rises. Inflation in the country is currently much higher than in France, for example, at 5.7% compared to France's 3.4% on the harmonised measure in December. This is due in part to a bigger jump in energy prices (electricity, gas, petrol), but also to stronger price rises for food, medical products and cultural and leisure goods and services in 2021. Furthermore, there are base effects due to the temporary VAT cut between July and December 2020; these effects will drop out of the inflation data from January 2022.

Guillaume Derrien

GERMANY: QUARTERLY CHANGES



The indicators in the radar are all transformed into 'z-scores' (deviations from the long-term average, as standard deviations). These z-scores have mean zero and their values are between -6 and +4. In the radar chart, the blue area shows the actual conditions of economic activity. It is compared with the situation four months earlier (dotted-line). An expansion of the blue area compared to the dotted area signals an increase in the variable.



ECONOMIC PULSE

RECORD NUMBERS OF NEW COVID-19 CASES AROUND THE WORLD

10.5 million new cases were reported worldwide between 30 December 2021 and 5 January 2022. This was 79% higher than in the previous week. Although all regions of the world recorded an increase, the biggest rises came in South America (162%) and North America (101%). They were followed by Europe (69%), Asia (54%) and Africa (5%) (chart 1).

The highest number of new cases in a single country (chart 4, black line) was the was the United States (3,141,071, a 100% increase from the previous week). It was followed by the UK (1,138, 259; +40%), France (1,128,914; +111%), Italy (682,546; +147%), and Spain (654,891; +90%). Some 9.33 billion Covid-19 vaccine doses have been administered worldwide since vaccination campaigns began in the fourth quarter of 2020, including 547 million booster doses. Nearly 60% of the world's population has now received at least one dose of a Covid-19 vaccine (chart 2).

Looking beyond the recent disruption relating to the holiday season, visits to retail and leisure facilities remained on a downward trend in France, Germany, Belgium, Italy, Spain, the United Kingdom and the United States, whilst in Japan, the trend remains positive (chart 3, blue line).

Lastly, the trend in the weekly proxy indicator of GDP has remained negative in Germany, Belgium, Spain and Italy, and to a lesser extent in France and the USA. It remains positive in Japan and has stabilised in the UK (chart 3, black line). This indicator is produced by the OECD on the basis of data from Google Trends for searches relating to consumption, the labour and property markets, industrial activity and uncertainty. The OECD Tracker is based on Google Trends resulting from queries on consumption, the labour market, housing, industrial activity as well as uncertainty. The OECD calculates the tracker over a 2-year period to avoid the base effects linked to a comparison with the 2020 data.

Tarik Rharrab

* Google Mobility Reports show how visits and length of stay at different places change compared to a baseline. The baseline is the median value, for the corresponding day of the week, during the 5-week period Jan 3–Feb 6, 2020. A figure of negative 30% indicates that traffic was down 30% compared to a baseline. The reports show trends over several weeks with the most recent data representing approximately 2-3 days ago—this is how long it takes to produce the reports. In order to smooth the series, we use a seven-day moving average of the raw data in the Google Mobility Reports. Source: Google.

DAILY CONFIRMED COVID-19 CASES (7-DAY MOVING AVERAGE)

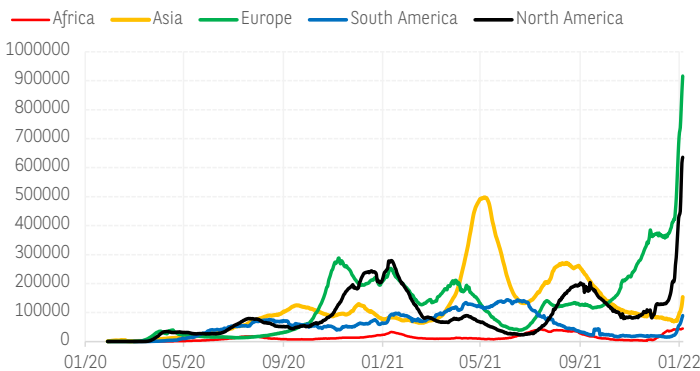


CHART 1

SOURCE: JOHNS-HOPKINS UNIVERSITY (01/06/2022), BNP PARIBAS

SHARE OF PEOPLE WHO RECEIVED AT LEAST ONE DOSE OF VACCINE

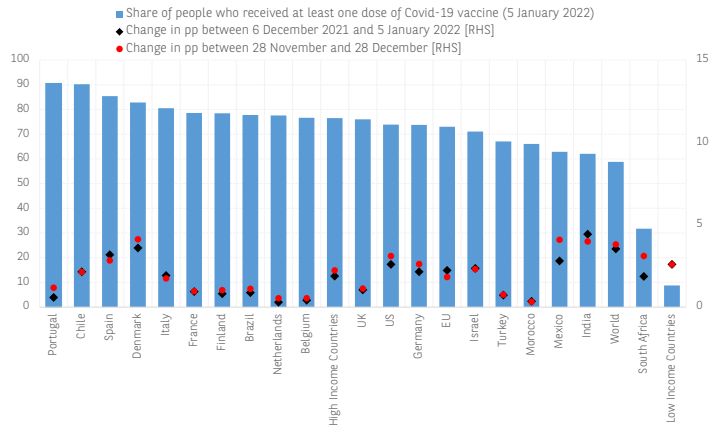


CHART 2

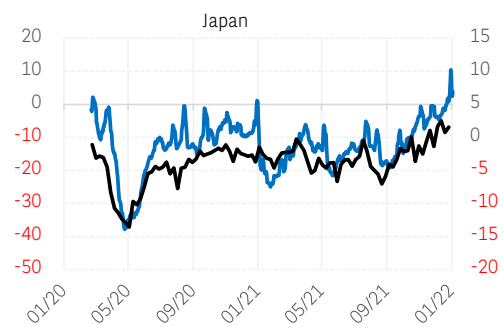
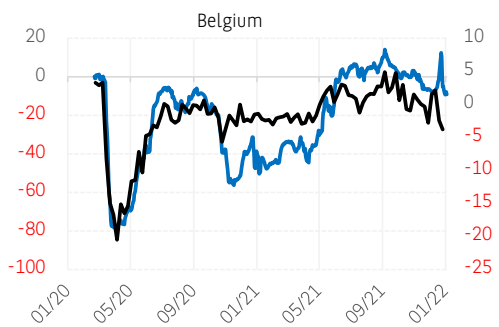
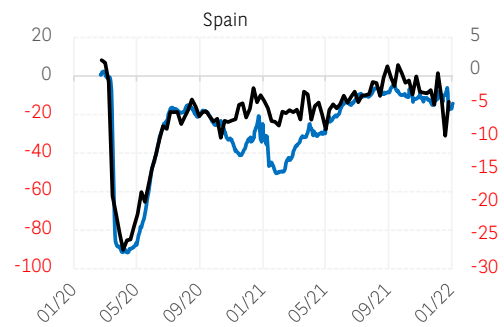
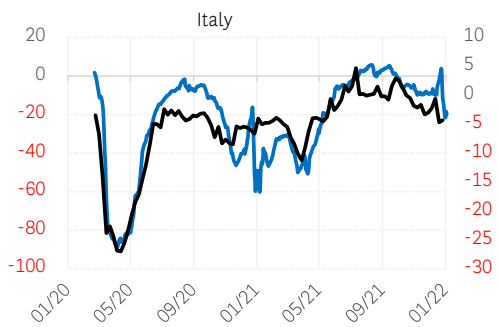
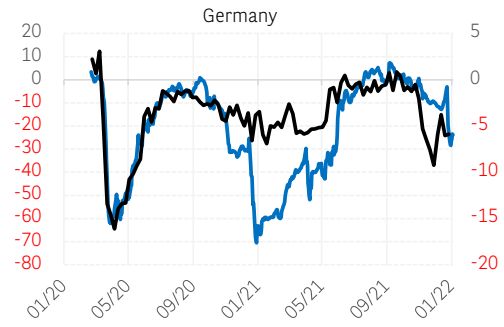
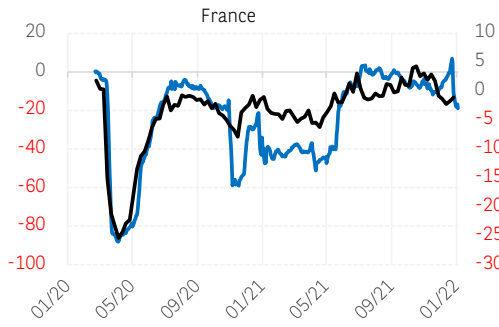
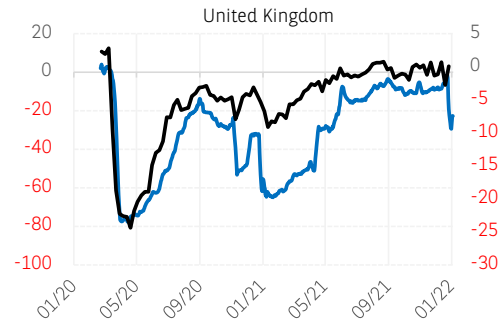
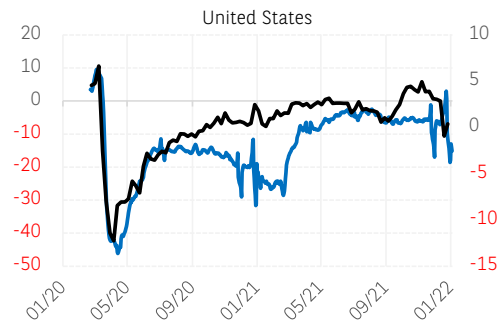
SOURCE: OUR WORLD IN DATA (01/06/2022), BNP PARIBAS



RETAIL AND RECREATION MOBILITY & OECD WEEKLY TRACKER

— Retail and recreation mobility (7-day moving average, % from baseline*)

— OECD Weekly tracker, y/2y GDP growth [RHS]

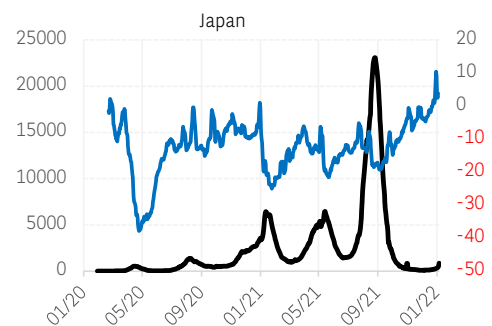
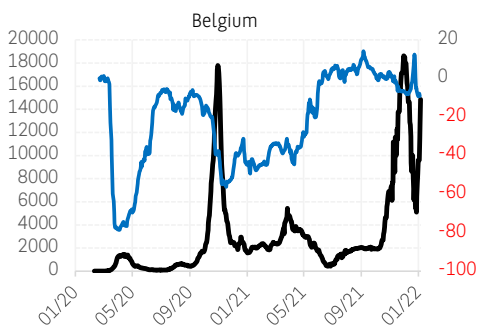
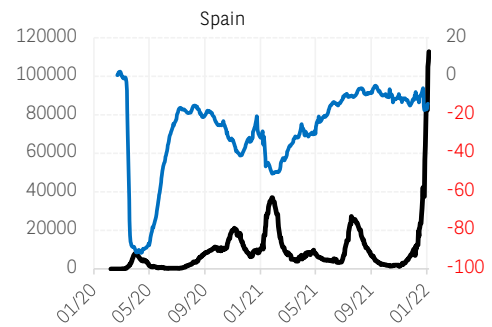
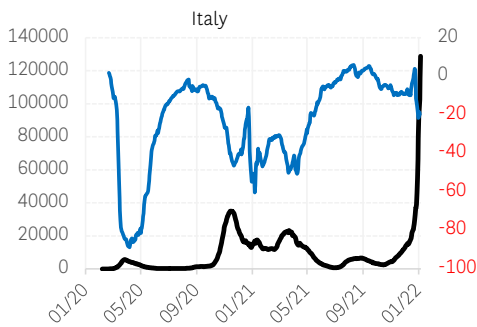
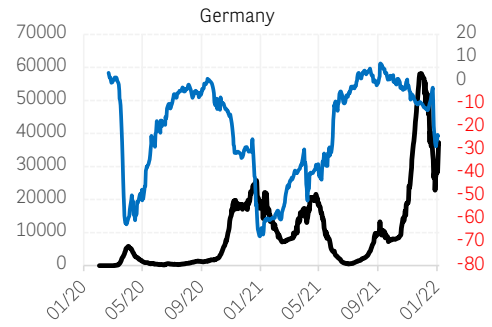
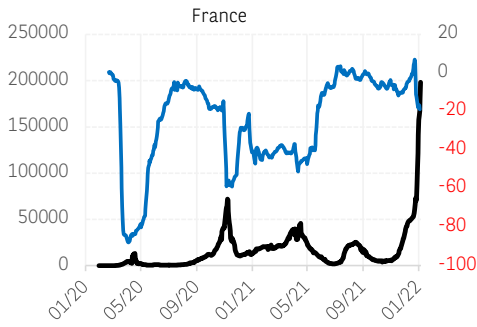
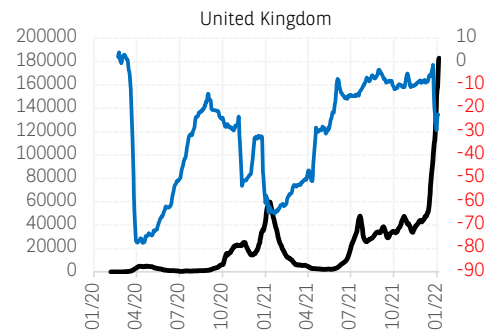
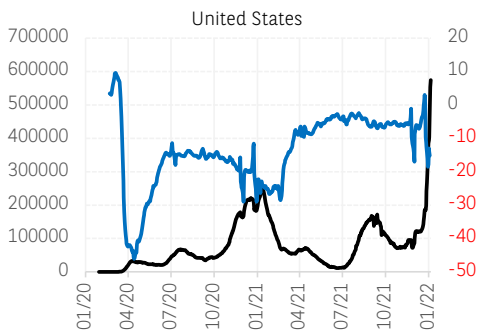


SOURCE: OECD (01/06/2022), GOOGLE (01/06/2022), BNP PARIBAS



DAILY NEW CASES & RETAIL AND RECREATION MOBILITY

— Daily new confirmed cases of Covid-19 (7-day moving average)
 — Retail and recreation mobility (7-day moving average, % from baseline*)[RHS]



SOURCE: JOHNS-HOPKINS UNIVERSITY (01/06/2022), GOOGLE (01/06/2022), BNP PARIBAS



ECONOMIC SCENARIO

14

UNITED STATES

Albeit in a rather uneven manner, the US economy has bounced back swiftly from the Covid-19 pandemic and is now stronger than in 2019. Its growth rate, at 5.5% in 2021, is likely to return gradually to normal. Longer and stronger than expected, the upturn in inflation is also likely to ease, if only due simply to the basis of comparison (once prices stop being compared to their depressed levels of 2020). The return towards the 2% target could, however, be hampered by rising prices for services, particularly rents. The situation in the labour market has improved: with a rising activity rate and unemployment dropping significantly below 5% of the active population, the economy is approaching full employment.

CHINA

Economic growth has slowed markedly since last summer. Export performance remains strong and supports manufacturing investment. However, the other components of domestic demand are constrained by a host of factors: the effects of the H1 tightening in fiscal policy and domestic credit conditions, the toughening of regulations in various services, the crisis in the property sector, supply constraints in the industry, and the resurgence of the epidemic. In the short term, industrial production growth should recover. Moreover, the authorities should increase their support to domestic activity through prudent monetary and fiscal policy measures, while continuing regulatory tightening and maintaining their objective of rebalancing the real estate market. The contraction in housing sales and the "zero covid" strategy should continue to weigh on private consumption.

EUROZONE

Growth in the eurozone remained strong in Q3 2021, in line with expectations (2.2% q/q). However, the outlook for Q4 is much less bright. According to our most recent forecast dated 25 November, we expect growth to slow down to 0.4% q/q. In addition to the awaited normalization, headwinds have increased (supply-side problems, surging inflation and uncertainties arising from the new wave of the pandemic). Nevertheless, business conditions surveys have shown resilience so far. Although the downside risks have increased, our scenario for 2022 remains fairly optimistic. This is because there is no shortage of tailwinds – supportive policy mix, a build-up of forced savings, scope for the service sector to catch-up, the need for companies to invest and rebuild inventories – assuming that supply-side problems ease from the second half of the year. Above all, growth will remain well above its trend rate in 2022. We also expect it to be not much lower than its 2021 figure (4.2% versus 5%). Compared with our September scenario, we have cut our growth forecasts and raised our inflation forecasts, taking the view that behind the current temporary pressures on prices, more sustained and widespread factors are also at play. We expect average inflation to be higher in 2022 than in 2021 (3.1% versus 2.5%), although we see inflation falling over the course of next year.

FRANCE

What is happening at the aggregate eurozone level is representative of what is happening in France, and vice-versa. Although the figures are different, our analysis and view of the economic outlook are identical. In Germany, the headwinds are stronger, while France is less exposed. French growth was strong in Q3 2021 – beating expectations at 3% q/q according to INSEE's initial estimate – but we expect it to slow to 0.6% q/q in Q4. In 2022, we anticipate growth of 4.2% in annual average terms (vs. 6.7% in 2021) and inflation of 2.5% (vs. 2%).

RATES AND EXCHANGE RATES

In the US, the Federal Reserve has started tapering and this should lead to net asset purchases ending by the middle of next year, although the exact timing depends on how the economy will evolve. Given current particularly elevated inflation, the inflation outlook and the prospect of a further decline in the unemployment rate, we expect a first rate hike in July 2022, followed by two additional hikes in 2022 and four more in 2023. This should put upward pressure on Treasury yields.

In the eurozone, the ECB has announced in December that it will stop net purchases under the PEPP in March 2022. On that occasion, the monthly volume under the traditional asset purchase program will be increased temporarily to avoid market disruption. Given the strength of the recovery, we expect underlying price pressures to build further. We expect that the ECB will hike its deposit rate in June 2023, considering that by then the three conditions for a rate hike would be met. Two additional hikes should follow in the second half of 2023. This, in combination with the influence from higher US Treasury yields, should lead to higher Bund yields and some widening of sovereign spreads.

The Bank of Japan is expected to maintain its current policy stance over the forecast horizon, whilst allowing the 10-year JGB yield to drift higher under the influence of globally rising yields, towards about 20bp, which is in the upper end of its target range of 0 to 25bp.

We expect the dollar to strengthen versus the euro, driven by widening yield differentials and the growing monetary policy divergence between the Federal Reserve and the ECB. The divergence will also increase between the Fed and the BoJ, which explains our forecast of an appreciation of the dollar versus the yen.

GROWTH & INFLATION

%	GDP Growth			Inflation		
	2021 e	2022 e	2023 e	2021 e	2022 e	2023 e
United-States	5,5	4,7	2,8	4,7	4,6	2,1
Japan	1,7	2,6	1,6	-0,2	0,7	0,5
United-Kingdom	7,1	5,4	2,1	2,5	4,5	2,1
Euro Area	5,0	4,2	3,0	2,5	3,1	2,0
Germany	2,6	3,6	3,6	3,1	3,4	2,2
France	6,7	4,2	2,5	2,0	2,5	2,1
Italy	6,3	4,9	3,0	1,8	2,9	1,7
Spain	4,3	5,4	3,5	3,0	3,7	1,7
China	7,9	5,3	5,5	0,9	2,1	2,5
India*	8,0	11,0	6,0	5,4	5,7	5,0
Brazil	4,8	0,5	2,0	8,3	8,3	4,3
Russia	4,5	3,0	1,8	7,0	6,3	4,1

SOURCE: BNP PARIBAS GROUP ECONOMIC RESEARCH (E: ESTIMATES & FORECASTS)
*FISCAL YEAR FROM 1ST APRIL OF YEAR N TO MARCH 31ST OF YEAR N+1

INTEREST & EXCHANGE RATES

Interest rates, %

End of period		Q1 2022 e	Q2 2022 e	Q3 2022 e	Q4 2022 e	Q4 2023 e
US	Fed Funds (upper limit)	0.25	0.25	0.75	1.00	2.00
	T-Notes 10y	1.70	1.80	1.90	2.00	2.30
	Deposit rate	-0.50	-0.50	-0.50	-0.50	-0.10
Ezone	Bund 10y	0.00	0.05	0.05	0.10	0.40
	OAT 10y	0.45	0.40	0.35	0.45	0.70
	BTP 10y	1.35	1.45	1.45	1.55	2.00
	BONO 10y	0.75	0.85	0.90	1.05	1.45
	Base rate	0.25	0.50	0.50	0.75	1.25
UK	Gilts 10y	1.10	1.20	1.30	1.45	1.75
	BoJ Rate	-0.10	-0.10	-0.10	-0.10	-0.10
Japan	JGB 10y	0.12	0.14	0.15	0.18	0.20

Exchange Rates

End of period		Q1 2022 e	Q2 2022 e	Q3 2022 e	Q4 2022 e	Q4 2023 e
USD	EUR / USD	1.13	1.12	1.11	1.09	1.09
	USD / JPY	115	116	117	118	120
	GBP / USD	1.35	1.35	1.35	1.33	1.36
EUR	EUR / GBP	0.84	0.83	0.82	0.82	0.80
	EUR / JPY	130	130	130	129	131

Brent

End of period		Q1 2022 e	Q2 2022 e	Q3 2022 e	Q4 2022 e	Q4 2023 e
Brent	USD/bbl	84	80	79	80	85

SOURCE: BNP PARIBAS GLOBAL MARKETS (E: ESTIMATES)



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CALENDAR

15

LATEST INDICATORS

In China, the PMI data picked up in December and were better than expected. In the euro area, the services PMI was only slightly down from the previous month. Producer price inflation slowed a lot on a monthly basis but was higher than expected. On an annual basis, producer price inflation moved significantly higher, reaching 23.7%. Consumer price inflation, on an annual basis, increased as well, and reached 5.0% in December. Core inflation was stable at 2.6%. Retail sales did well in November. Monthly growth accelerated whereas the consensus had expected a slight decline. The European Commission surveys recorded a decline of economic confidence on the back of a drop in services confidence – related to the Omicron wave of infections – whereas industrial confidence improved. In France, inflation was stable in December but consumer confidence created a welcome surprise by improving. The services PMI was essentially stable in France and in Germany it even edged higher. The PMI data improved slightly in Japan and the UK. In the US, the ISM index for the manufacturing sector declined but, importantly, the prices paid series dropped. The ISM services index saw a large decline. Job creation slowed somewhat in December and was well below the consensus but the unemployment rate created a positive surprise by moving below 4.0%.

DATE	COUNTRY	INDICATOR	PERIOD	CONSENSUS	ACTUAL	PREVIOUS
01/03/2022	France	Markit France Manufacturing PMI	Dec	54.9	55.6	54.9
01/03/2022	Germany	Markit/BME Germany Manufacturing PMI	Dec	57.9	57.4	57.9
01/03/2022	Germany	Markit Germany Services PMI	Dec	48.4	48.7	48.4
01/03/2022	Germany	Markit/BME Germany Composite PMI	Dec	50.0	49.9	50.0
01/03/2022	Eurozone	Markit Eurozone Manufacturing PMI	Dec	58.0	58.0	58.0
01/03/2022	United States	Markit US Manufacturing PMI	Dec	57.7	57.7	57.8
01/04/2022	Japan	Jibun Bank Japan PMI Mfg	Dec	--	54.3	54.2
01/04/2022	China	Caixin China PMI Mfg	Dec	50.0	50.9	49.9
01/04/2022	Germany	Retail Sales MoM	Nov	-0.3%	0.6%	0.1%
01/04/2022	France	CPI EU Harmonized MoM	Dec	0.4%	0.2%	0.4%
01/04/2022	France	CPI EU Harmonized YoY	Dec	3.5%	3.4%	3.4%
01/04/2022	Germany	Unemployment Change (000's)	Dec	-15.0k	-23.0k	-34.0k
01/04/2022	United States	ISM New Orders	Dec	60.4	60.4	61.5
01/04/2022	United States	ISM Prices Paid	Dec	79.3	68.2	82.4
01/04/2022	United States	ISM Manufacturing	Dec	60.0	58.7	61.1
01/04/2022	United States	ISM Employment	Dec	53.6	54.2	53.3
01/04/2022	United States	JOLTS Job Openings	Nov	11079k	10562k	11091k
01/04/2022	United States	Wards Total Vehicle Sales	Dec	13.10m	12.44m	12.86m
01/05/2022	Japan	Consumer Confidence Index	Dec	39.0	39.1	39.2
01/05/2022	France	Consumer Confidence	Dec	97.0	100.0	98.0
01/05/2022	France	Markit France Services PMI	Dec	57.1	57.0	57.1
01/05/2022	France	Markit France Composite PMI	Dec	55.6	55.8	55.6
01/05/2022	Eurozone	Markit Eurozone Services PMI	Dec	53.3	53.1	53.3
01/05/2022	Eurozone	Markit Eurozone Composite PMI	Dec	53.4	53.3	53.4
01/05/2022	United States	Markit US Composite PMI	Dec	--	57.0	56.9
01/05/2022	United States	Markit US Services PMI	Dec	57.5	57.6	57.5
01/05/2022	United States	FOMC Meeting Minutes	Dec			



DATE	COUNTRY	INDICATOR	PERIOD	CONSENSUS	ACTUAL	PREVIOUS
01/06/2022	Japan	Jibun Bank Japan PMI Services	Dec	--	52.1	51.1
01/06/2022	Japan	Jibun Bank Japan PMI Composite	Dec	--	52.5	51.8
01/06/2022	China	Caixin China PMI Services	Dec	51.7	53.1	52.1
01/06/2022	China	Caixin China PMI Composite	Dec	--	53.0	51.2
01/06/2022	United Kingdom	Markit/CIPS UK Services PMI	Dec	53.2	53.6	53.2
01/06/2022	United Kingdom	Markit/CIPS UK Composite PMI	Dec	53.2	53.6	53.2
01/06/2022	Eurozone	PPI MoM	Nov	1.5%	1.8%	5.4%
01/06/2022	Eurozone	PPI YoY	Nov	23.2%	23.7%	21.9%
01/06/2022	Germany	CPI EU Harmonized MoM	Dec	0.2%	0.3%	0.3%
01/06/2022	Germany	CPI EU Harmonized YoY	Dec	5.6%	5.7%	6.0%
01/06/2022	United States	Initial Jobless Claims	Jan	195k	207k	200k
01/06/2022	United States	Continuing Claims	Dec	1678k	1754k	1718k
01/06/2022	United States	ISM Services Index	Dec	67.0	62.0	69.1
01/06/2022	United States	Cap Goods Orders Nondef Ex Air	Nov	--	0.0%	-0.1%
01/07/2022	Japan	Tokyo CPI Ex-Fresh Food, Energy YoY	Dec	-0.3%	-0.3%	-0.4%
01/07/2022	Japan	Household Spending YoY	Nov	1.2%	-1.3%	-0.6%
01/07/2022	Germany	Current Account Balance	Nov	17.0b	18.9b	17.6b
01/07/2022	France	Consumer Spending MoM	Nov	0.5%	0.8%	-0.6%
01/07/2022	Eurozone	Retail Sales MoM	Nov	-0.5%	1.0%	0.3%
01/07/2022	Eurozone	CPI Estimate YoY	Dec	4.8%	5.0%	4.9%
01/07/2022	Eurozone	CPI MoM	Dec	0.3%	0.4%	0.4%
01/07/2022	Eurozone	CPI Core YoY	Dec	2.5%	2.6%	2.6%
01/07/2022	Eurozone	Consumer Confidence	Dec	--	-8.3	-8.3
01/07/2022	Eurozone	Economic Confidence	Dec	116.0	115.3	117.6
01/07/2022	Eurozone	Industrial Confidence	Dec	14.1	14.9	14.3
01/07/2022	Eurozone	Services Confidence	Dec	16.1	11.2	18.3
01/07/2022	United States	Change in Nonfarm Payrolls	Dec	450k	199k	249k
01/07/2022	United States	Average Hourly Earnings YoY	Dec	4.2%	4.7%	5.1%
01/07/2022	United States	Average Weekly Hours All Employees	Dec	34.8	34.7	34.7
01/07/2022	United States	Labor Force Participation Rate	Dec	61.9%	61.9%	61.9%
01/07/2022	United States	Underemployment Rate	Dec	--	7.3%	7.7%
01/07/2022	United States	Unemployment Rate	Dec	4.1%	3.9%	4.2%

SOURCE: BLOOMBERG



CALENDAR: THE WEEK AHEAD

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COMING INDICATORS

The week will see the publication of inflation data in China, the US and France. The data in the US will be eagerly awaited after the hawkish message in the recently published FOMC minutes. In Japan we will have the EcoWatchers' survey and in France the Banque de France industrial sentiment index. The Federal Reserve will publish its beige book in the run-up to the next FOMC meeting. Also noteworthy in the US are retail sales, capacity utilisation and University of Michigan sentiment.

DATE	COUNTRY	INDICATOR	PERIOD	CONSENSUS	PREVIOUS
01/10/2022	Eurozone	Unemployment Rate	Nov	--	7.30%
01/11/2022	United States	NFIB Small Business Optimism	Dec	--	98.4
01/11/2022	France	Bank of France Ind. Sentiment	Dec	--	104
01/12/2022	China	PPI YoY	Dec	11.30%	12.90%
01/12/2022	China	CPI YoY	Dec	1.80%	2.30%
01/12/2022	Japan	Eco Watchers Survey Outlook SA	Dec	--	53.4
01/12/2022	Japan	Eco Watchers Survey Current SA	Dec	--	56.3
01/12/2022	United States	CPI MoM	Dec	0.40%	0.80%
01/12/2022	United States	CPI Ex Food and Energy MoM	Dec	0.50%	0.50%
01/12/2022	United States	CPI YoY	Dec	--	6.80%
01/12/2022	United States	CPI Ex Food and Energy YoY	Dec	--	4.90%
01/12/2022	United States	U.S. Federal Reserve Releases Beige Book			
01/13/2022	United States	PPI Ex Food and Energy YoY	Dec	--	7.70%
01/13/2022	United States	PPI Final Demand YoY	Dec	--	9.60%
01/13/2022	United States	PPI Ex Food and Energy MoM	Dec	0.40%	0.70%
01/13/2022	United States	PPI Final Demand MoM	Dec	0.40%	0.80%
01/13/2022	United States	Initial Jobless Claims	Jan	--	--
01/14/2022	United Kingdom	Monthly GDP (MoM)	Nov	--	0.10%
01/14/2022	United Kingdom	Monthly GDP (3M/3M)	Nov	--	0.90%
01/14/2022	France	CPI EU Harmonized MoM	Dec	--	0.20%
01/14/2022	France	CPI EU Harmonized YoY	Dec	--	3.40%
01/14/2022	United States	Retail Sales Advance MoM	Dec	0.00%	0.30%
01/14/2022	United States	Retail Sales Control Group	Dec	--	-0.10%
01/14/2022	United States	Capacity Utilization	Dec	77.10%	76.80%
01/14/2022	United States	U. of Mich. Sentiment	Jan	70.3	70.6
01/14/2022	United States	U. of Mich. Current Conditions	Jan	--	74.2
01/14/2022	United States	U. of Mich. Expectations	Jan	--	68.3
01/14/2022	United States	U. of Mich. 1 Yr Inflation	Jan	--	4.80%
01/14/2022	United States	U. of Mich. 5-10 Yr Inflation	Jan	--	2.90%

SOURCE: BLOOMBERG



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Euros in our pockets: looking back, looking ahead	EcoTVWeek	7 January 2022
European Union : New year, new fiscal rules for Europe?	Chart of the Week	5 January 2022
Global : 2022: assessing upside and downside risks	EcoWeek	3 January 2022
Economic analyses and economic forecasts for a selection of countries.	EcoPerspectives	17 December 2021
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Egypt: persistent vulnerabilities	EcoConjoncture	1 December 2021
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High inflation, optionality and central bank patience	EcoWeek	29 November 2021
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United States: reallocation of bank portfolios towards the Eurozone since Brexit	Chart of the Week	24 November 2021
European labour market bottlenecks: structural aspects	EcoWeek	22 November 2021
Services support French growth: towards a (big) comeback?	EcoTVWeek	19 November 2021



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