

Quarterly Bulletin 4/2019 December



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Monetary policy report

Report for the attention of the Governing Board of the Swiss National Bank for its quarterly assessment of December 2019

The report describes economic and monetary developments in Switzerland and explains the inflation forecast. It shows how the SNB views the economic situation and the implications for monetary policy it draws from this assessment. The first section ('Monetary policy decision of 12 December 2019') is an excerpt from the press release published following the assessment.

This report is based on the data and information available as at 12 December 2019. Unless otherwise stated, all rates of change from the previous period are based on seasonally adjusted data and are annualised.

1

Monetary policy decision of 12 December 2019

Swiss National Bank leaves expansionary monetary policy unchanged

The Swiss National Bank is keeping the SNB policy rate and interest on sight deposits at the SNB at -0.75%. It remains willing to intervene in the foreign exchange market as necessary, while taking the overall currency situation into consideration. The expansionary monetary policy continues to be necessary given the inflation outlook in Switzerland.

The trade-weighted exchange rate of the Swiss franc is practically unchanged compared with September 2019. The franc thus remains highly valued, and the situation on the foreign exchange market is still fragile. Negative interest and the willingness to intervene counteract the attractiveness of Swiss franc investments and thus ease the upward pressure on the currency. In this way, the SNB stabilises price developments and supports economic activity.

The new conditional inflation forecast for the coming quarters is slightly lower than in September (cf. chart 1.1). The longer-term forecast is virtually unchanged. For 2019 the forecast stands at 0.4%, for 2020 at 0.1% and for 2021 at 0.5% (cf. table 1.1). The conditional inflation forecast is based on the assumption that the SNB policy rate remains at -0.75% over the entire forecast horizon.

International trade tensions and political uncertainty have weighed on the global economy in recent months. Accordingly, economic growth around the world was again slightly below average in the third quarter. The increase in manufacturing output was modest in many countries, this being accompanied by subdued capital spending and lacklustre global trade in goods.

Various central banks eased their monetary policy in the autumn in light of modest inflation and the economic risks. Moreover, they signalled that they would probably leave their policy rates at a low level for an extended period of time

The SNB is maintaining its existing baseline scenario for the global economy, and expects momentum to remain modest over the short term The monetary policy easing is likely to contribute to the economy – and thus also inflation – picking up again over the medium term.

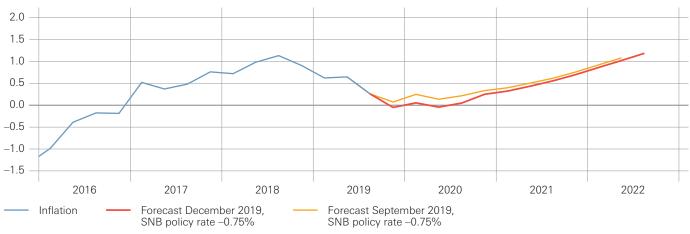
Risks to the global economy remain tilted to the downside. Chief among them are still trade tensions and the possibility of the persisting weakness in manufacturing activity spreading to the economy as a whole.

According to the initial estimate, the Swiss economy grew by 1.6% in the third quarter. This growth was primarily driven by manufacturing, where value added increased significantly thanks to strong growth in the exports of pharmaceutical products. The other industries in the manufacturing sector recorded a more modest expansion, in line with the slowdown in manufacturing worldwide. The labour market continues to be a mainstay of the economy. Employment figures rose again slightly, and the unemployment rate persisted at a low level through to November.

Chart 1.1

CONDITIONAL INFLATION FORECAST OF DECEMBER 2019

Year-on-year change in Swiss consumer price index in percent



Sources: SFSO, SNB

GDP is likely to expand by around 1% in 2019, and the SNB expects growth of between 1.5% and 2% in 2020. The stronger expansion next year reflects the gradual firming expected in global economic activity as well as an exceptional effect. The latter stems from the fact that the forecast includes the revenue generated by major international sporting events, which is likely to increase growth by around half a percentage point.

Imbalances persist on the mortgage and real estate markets. Both mortgage lending and prices for single-family homes and privately owned apartments continued to rise slightly in recent quarters, while prices in the residential investment property segment stagnated. Nevertheless, due to the strong price increases in recent years and growing vacancy rates there is the risk of a correction in this segment in particular. The SNB therefore welcomes the latest revision of the self-regulation guidelines for banks in the area of investment properties, which enters into force in January 2020. The SNB will continue to monitor developments on the mortgage and real estate markets closely, and will regularly reassess the need for an adjustment of the countercyclical capital buffer.

Monetary policy strategy at the SNB

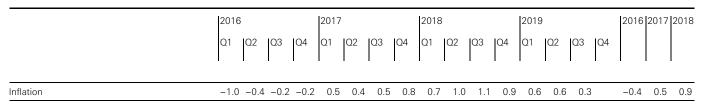
The SNB has a statutory mandate to ensure price stability while taking due account of economic developments.

The SNB has specified the way in which it exercises this mandate in a three-part monetary policy strategy. First, it regards prices as stable when the Swiss consumer price index (CPI) rises by less than 2% per annum. This allows it to take account of the fact that the CPI slightly overstates actual inflation. At the same time, it allows

inflation to fluctuate somewhat with the economic cycle. Second, the SNB summarises its assessment of the situation and of the need for monetary policy action in a quarterly inflation forecast. This forecast, which is based on the assumption of a constant short-term interest rate, shows how the SNB expects the CPI to move over the next three years. As the third element in implementing its monetary policy the SNB sets the SNB policy rate, and seeks to keep the secured short-term Swiss franc money market rates close to this rate.

Table 1 1

OBSERVED INFLATION IN DECEMBER 2019



Source: SFSO

CONDITIONAL INFLATION FORECAST OF DECEMBER 2019

	2019 Q1 Q2 Q3		2020 Q4 Q1 Q2 Q3		3 Q4 Q1 Q2 Q3		03 C	2022 3 Q4 Q1 Q2 Q3			Q3 Q	2019 2020 2021			
Forecast September 2019, SNB policy rate –0.75%	0.3	0.1 0	0.2 0.1	0.2	0.3	0.4	0.5	0.6	0.8	0.9	1.1	•	0.4	0.2	0.6
Forecast December 2019, SNB policy rate –0.75%		-0.1 0	0.1 0.0	0.0	0.3	0.3	0.4	0.6	0.7	0.9	1.0	1.2	0.4	0.1	0.5

Source: SNB

2 Global economic environment

International trade tensions and political uncertainty have weighed on the global economy in recent months. Accordingly, economic growth around the world was again slightly below average in the third quarter. The increase in manufacturing output was modest in many countries, this being accompanied by subdued capital spending and lacklustre global trade in goods (cf. chart 2.1).

Against this backdrop, employment growth in the advanced economies was slower than a few quarters ago, and unemployment fell only slightly. However, it is already very low in many countries, and is thus lending support to consumer demand.

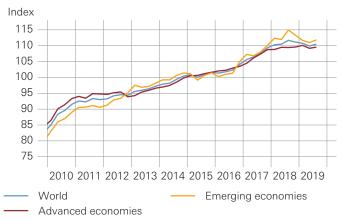
Various central banks eased their monetary policy in the autumn in light of modest inflation and the economic risks. Moreover, they signalled that they would probably leave their policy rates at a low level for an extended period of time.

The SNB is maintaining its existing baseline scenario for the global economy, and expects momentum to remain modest over the short term. The monetary policy easing is likely to contribute to the economy – and thus also inflation – picking up again over the medium term.

Chart 2.1

GLOBAL GOODS TRADE

Average of depicted period = 100



Sources: CPB Netherlands Bureau for Economic Policy Analysis, Thomson Reuters

Table 2.1

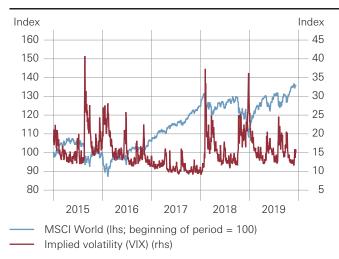
BASELINE SCENARIO FOR GLOBAL ECONOMIC DEVELOPMENTS

					Scenario	
	2015	2016	2017	2018	2019 2	2020
GDP, year-on-year change in percent						
Global ¹	3.5	3.5	4.0	4.0	3.3	3.4
US	2.9	1.6	2.4	2.9	2.3	2.0
Euro area	2.0	1.9	2.7	1.9	1.2	0.9
Japan	1.3	0.5	2.2	0.3	1.0	0.3
Oil price in USD per barrel	52.5	43.8	54.3	71.0	63.6	61.0

¹ PPP-weighted (US, euro area, UK, Japan, China, South Korea, India, Brazil and Russia).

Sources: SNB, Thomson Reuters Datastream

STOCK MARKETS

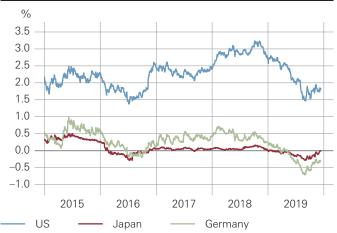


Source: Thomson Reuters Datastream

Chart 2.3

INTERNATIONAL LONG-TERM INTEREST RATES

10-year government instruments

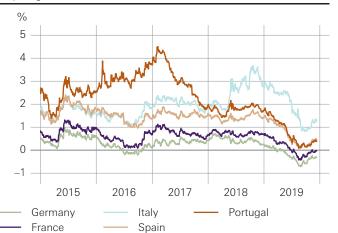


Source: Thomson Reuters Datastream

Chart 2.4

EUROPEAN LONG-TERM INTEREST RATES

10-year government instruments



Source: Thomson Reuters Datastream

Risks to the global economy remain tilted to the downside. Chief among them are still trade tensions and the possibility of the persisting weakness in manufacturing activity spreading to the economy as a whole.

The SNB's forecasts for the global economy are based on assumptions about oil prices and the EUR/USD exchange rate. The SNB is assuming an oil price for Brent crude of USD 61 per barrel, as in September. It assumes an exchange rate of USD 1.11 to the euro, compared to USD 1.12 in September. Both correspond to the 20-day average when the current baseline scenario was drawn up.

INTERNATIONAL FINANCIAL AND COMMODITY MARKETS

Since mid-September, financial market events have been dominated by the volatile developments in the trade dispute between the US and China. Overall, trade tensions between the two nations have eased slightly, contributing to an improvement in market sentiment. After a temporary spike in October, the implied volatility of US stocks as measured by option prices (VIX) fell again (cf. chart 2.2).

Stock markets developed positively, with the MSCI World Index reaching a new historical high. Yields on ten-year government bonds in the advanced economies also recovered slightly on the back of the uptick in sentiment (cf. charts 2.3 and 2.4).

The US dollar and euro trended sideways on a tradeweighted basis, while the pound sterling gained considerable ground amid the declining risk of a disorderly Brexit. The yen, by contrast, depreciated in trade-weighted terms, given that it was less sought after as a safe-haven currency than three months previously (cf. chart 2.5).

Oil prices initially fell somewhat, as the threat of an oil shortage – which had arisen following the impairment of production in Saudi Arabia – subsided. However, prices subsequently received support as concerns over a global economic downturn eased and OPEC announced oil output restrictions. Prices for industrial metals again fluctuated strongly and were latterly lower than three months earlier (cf. chart 2.6).

UNITED STATES

At 2.1%, the US economy continued to expand in line with potential in the third quarter (cf. chart 2.7). Private consumption remained robust. In addition, construction investment staged a recovery after an extended decline. Corporate investment, meanwhile, declined further. The uncertainty associated with the trade tensions and lower growth forecasts for the global economy contributed to the dampening effect. The situation on the labour market remained favourable, however, with employment figures rising further over recent months and unemployment receding to 3.5% in November (cf. chart 2.10).

According to the indicators, private consumption slowed somewhat in the fourth quarter. Nevertheless, the fundamental factors influencing consumption remain positive. Disposable income, for instance, continued to exhibit strong growth, and household confidence, too, was still very high. Industry surveys reveal that manufacturing activity, by contrast, is likely to remain muted in the short term (cf. chart 2.9). The SNB is therefore leaving its growth forecast for the US unchanged at 2.3% for 2019 and 2.0% for 2020 (cf. table 2.1).

Annual inflation as measured by the consumer price index climbed to 2.1% in November (cf. chart 2.11), while core inflation remained stable at 2.3% (cf. chart 2.12). At 1.3%, core inflation as measured by the personal consumption expenditure deflator index stayed below the US Federal Reserve's target value in October.

Following two interest rate cuts in July and September, the Fed again lowered the target range for its policy rate by 25 basis points in October, bringing it to 1.5–1.75% (cf. chart 2.13). With this move, it aims to counter the threat of a sharp economic downturn. In December, the Fed signalled that its current level of easing is appropriate for meeting its inflation target, and it is therefore not planning any further interest rate adjustments for the time being.

Chart 2.5

EXCHANGE RATES

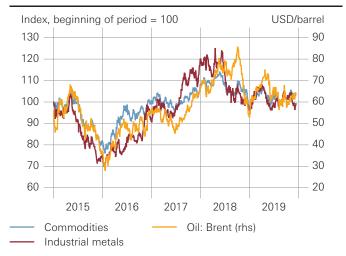
Trade-weighted



Source: Thomson Reuters Datastream

Chart 2.6

COMMODITY PRICES

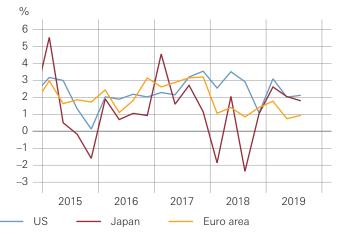


Source: Thomson Reuters Datastream

Chart 2.7

REAL GDP: ADVANCED ECONOMIES

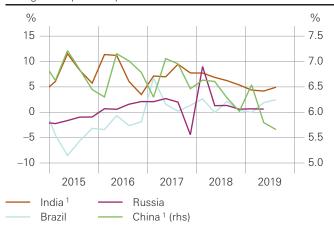
Change from previous period



Source: Thomson Reuters Datastream

REAL GDP: EMERGING ECONOMIES

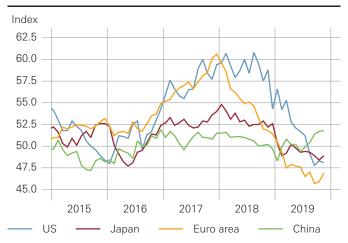
Change from previous period



1 Seasonal adjustment: SNB Sources: CEIC, Thomson Reuters Datastream

Chart 2.9

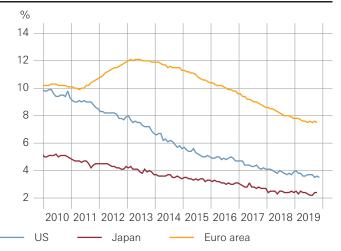
PURCHASING MANAGERS' INDICES (MANUFACTURING)



Sources: Institute for Supply Management (ISM), Markit Economics Limited

Chart 2.10

UNEMPLOYMENT RATES



Source: Thomson Reuters Datastream

EURO AREA

At 0.9%, third-quarter GDP growth in the euro area was again below potential (cf. chart 2.7). Activity in the services sector underpinned growth, while manufacturing activity receded further. Owing to modest economic momentum, the rise in employment continued to slow in the third quarter, while unemployment remained at a record low of 7.5% in October (cf. chart 2.10).

Economic activity is likely to remain muted in the short term. Export expectations are still on the decline. The subdued sentiment in manufacturing as well as falling capacity utilisation are weighing on the investment outlook. By contrast, the favourable labour market situation looks set to shore up private consumption. The SNB is leaving its growth forecast for the euro area virtually unchanged at 1.2% for 2019 and 0.9% for 2020 (cf. table 2.1). In the medium term, economic growth is likely to pick up again somewhat, underpinned by an expansionary monetary policy and more robust global economic growth.

Consumer price inflation in the euro area changed little and stood at 1.0% in November (cf. chart 2.11). Although energy price inflation declined, core inflation increased to 1.3% (cf. chart 2.12).

After lowering its deposit rate in September, the European Central Bank left its key rates unchanged in October (cf. chart 2.13). It intends to maintain its key rates at their present levels or lower until inflation dynamics are sufficiently robust. As announced, the ECB began to increase its securities holdings in November, having left them unchanged since the end of 2018. The net asset purchases are expected to end shortly before the ECB raises its key rates again.

At 1.8%, third-quarter GDP growth in Japan was still above potential (cf. chart 2.7). An anticipation effect in private consumption ahead of the consumption tax hike on 1 October (from 8% to 10%) made a significant contribution to growth. Corporate investment also increased. By contrast, exports and manufacturing activity contracted. Private consumption can therefore expect to see a countermovement in the fourth quarter.

Uncertainty about the global economic outlook as well as the tax hike have contributed to a drop in consumer and business confidence and are likely to weigh on growth next year. Stimulus measures in the amount of 1% of GDP – including infrastructure investment and a free education programme – should cushion the dampening effect of the tax increase. In addition, the government is currently putting together a new fiscal package to mitigate downside risks to the economy. The SNB anticipates GDP growth of 1.0% for 2019, which is slightly above potential, and 0.3% for 2020 (cf. table 2.1).

Consumer price inflation declined in the wake of falling energy price inflation, and stood at 0.2% in October, while core inflation stayed at 0.3% (cf. charts 2.11 and 2.12). The government's free education programme largely offset the inflation effect of the consumption tax increase in October. The longer-term inflation expectations derived from company surveys trended sideways and remained significantly below the Japanese central bank's inflation target of 2%.

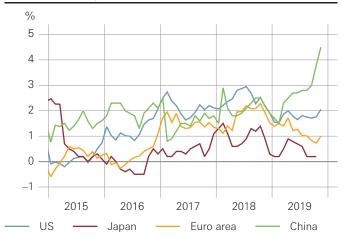
The Bank of Japan intends to maintain interest rates at a low level for as long as progress towards its inflation target is at risk. Additionally, it stressed that it was willing to take further easing action if necessary.

CHINA

In China, GDP expansion stabilised at 5.7% in the third quarter (cf. chart 2.8). The pace of growth in manufacturing remained subdued; in addition to the trade dispute with the US, weak domestic demand for motor vehicles weighed considerably on manufacturing activity. The services sector, by contrast, again exhibited robust growth.

CONSUMER PRICES

Year-on-year change

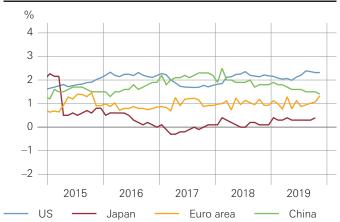


Source: Thomson Reuters Datastream

Chart 2.12

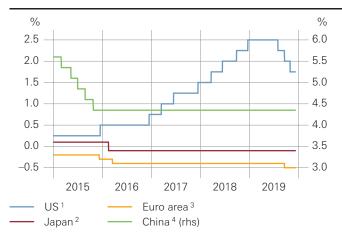
CORE INFLATION RATES 1

Year-on-year change



1 Excluding food and energy. Source: Thomson Reuters Datastream

OFFICIAL INTEREST RATES

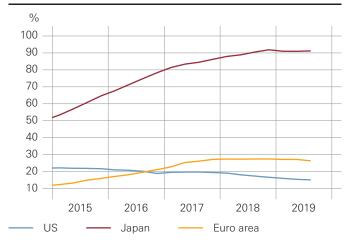


- Federal funds rate (upper limit of target range)
- Call money target rate
- Source: Thomson Reuters Datastream
- 3 Deposit facility rate
- 4 One-year lending rate

Chart 2.14

MONETARY BASE

Relative to GDP



Source: Thomson Reuters Datastream

The outlook for the Chinese economy continues to be muted. Growth of just under 6% is still expected for the quarters ahead. The trade tensions with the US will continue to hold back the economy. Moreover, demand for automobiles does not look set to recover in the near term. Prospects for the services sector, meanwhile, remain favourable.

Fiscal policy measures are expected to provide positive impetus for growth. In spring of this year, the government decided to substantially increase infrastructure spending in the current year and to lower taxes for companies and individuals. The monetary policy stance, too, remains slightly expansionary overall. The SNB anticipates GDP expansion of 6.1% for 2019 and 5.8% for 2020. Given that the structural changes in the Chinese economy are accompanied by a slower increase in potential output, the gradual slowdown in growth seen in recent years is likely to continue in the longer term.

Consumer price inflation in China rose considerably in recent months and stood at 4.5% in November (cf. chart 2.11). This can be attributed to rising food prices, especially for pork, as a result of swine fever. At 1.4%, core inflation remained modest (cf. chart 2.12).

BRAZIL, INDIA AND RUSSIA

Third-quarter GDP growth in India was once again significantly below potential (cf. chart 2.8). The downturn largely reflects the problems in the country's banking sector. The substantial tightening of credit conditions weighed on economic activity. According to the indicators, growth is likely to have remained subdued in Russia as well. In Brazil, GDP expansion recovered further, driven primarily by increased domestic demand.

Overall, the outlook for the quarters ahead remains muted. In India, the available indicators on manufacturing activity, car sales and lending point to below-average growth. The expansionary economic policy is expected to lend the economy new momentum in the medium term. India's central bank lowered its key rates this year by 1.35 percentage points overall, and the government reduced corporate taxes in October. In Russia, weak foreign demand is set to hold back growth in the short term, while in Brazil, growth is likely to pick up further on the back of the expansionary monetary policy and economic reforms.

Economic developments

in Switzerland

The Swiss economy continued to grow at a moderate rate in the fourth quarter. According to the initial estimate, GDP expanded by 1.6%. This growth was primarily driven by manufacturing, where value added increased significantly thanks to strong growth in the exports of pharmaceutical products. The other industries in the manufacturing sector recorded a more modest expansion, in line with the slowdown in manufacturing worldwide.

The labour market continues to be a mainstay of the economy. Employment figures rose again slightly, and the unemployment rate persisted at a low level through to November.

GDP is likely to expand by around 1% in 2019, and the SNB expects growth of between 1.5% and 2% in 2020. The stronger expansion next year reflects the gradual firming expected in global economic activity as well as an exceptional effect. The latter stems from the fact that the forecast takes into account the revenue generated by major international sporting events, which is likely to increase growth by around half a percentage point.

OUTPUT AND DEMAND

The SNB takes a wide range of information into account when assessing the economic situation. Contrary to expectations in September, the economy did not slow further in the third quarter. GDP growth in the third quarter of 2019 was thus also somewhat higher than anticipated.

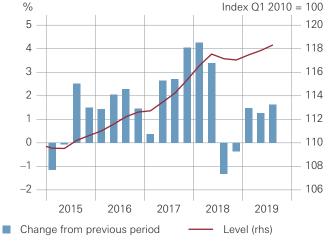
Solid GDP growth in third quarter

According to the initial estimate by the State Secretariat for Economic Affairs (SECO), GDP increased by 1.6% (cf. chart 3.1). Once again, the main growth driver was the pharmaceuticals industry, which reacts considerably less sensitively to global economic conditions than the other industries. An increase in energy production also made a significant contribution to growth. Developments in most other industries remained muted, however.

On the expenditure side, growth was broad based in the third quarter. Expansion was strongest in foreign trade and equipment investment.

Chart 3.1

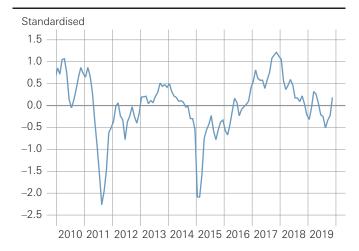
REAL GDP



Source: SECO

Chart 3.2

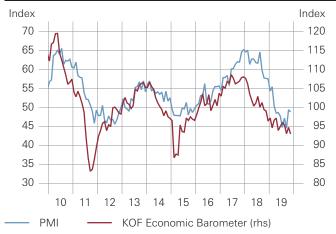
SNB BUSINESS CYCLE INDEX



Source: SNB

Chart 3.3

MANUFACTURING PMI AND KOF ECONOMIC BAROMETER



Sources: Credit Suisse, KOF Swiss Economic Institute

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Economic indicators signal stabilisation

A wide range of information shows that the economy has stabilised in recent months, after having slowed considerably since the beginning of last year. This is suggested, for instance, by the SNB's Business Cycle Index, which offers a comprehensive overview of economic momentum (cf. chart 3.2). In November, the index was once again close to zero, indicating an average pace of growth. The talks held by the SNB's delegates for regional economic relations with companies also indicate a stabilisation of growth momentum in the fourth quarter (cf. 'Business cycle signals', pp. 28 et seq.).

The KOF Economic Barometer and the manufacturing purchasing managers' index (PMI) point to the downward trend coming to a halt for the time being (cf. chart 3.3). Through to November, however, the KOF Economic Barometer remained persistently below 100, i.e. the level that corresponds to average growth over the long term. Although the manufacturing PMI calculated by Credit Suisse recovered in October and November, it was still slightly below the growth threshold of 50.

Table 3.1

REAL GDP AND COMPONENTS

Growth rates on previous period in percent, annualised

	2015	2016	2017	2018	2017	2018				2019		
					Q4	Q1	Q2	Q3	Q4	Q1 (Ω2	Q3
Private consumption	1.7	1.4	1.2	1.0	0.7	1.0	1.0	0.2	1.0	1.2	1.3	0.7
Government consumption	1.1	1.3	1.2	0.3	1.7	-1.5	0.3	-0.5	1.6	2.1	0.4	2.2
Investment in fixed assets	2.3	2.5	3.4	1.1	3.2	4.1	-1.6	-5.1	-2.1	6.9	-2.1	2.2
Construction	1.6	-0.2	1.5	1.2	4.4	-1.2	2.9	-0.3	-0.8	1.4	-1.0	0.9
Equipment	2.7	4.3	4.6	1.1	2.5	7.4	-4.1	-7.8	-2.9	10.4	-2.7	2.9
Domestic final demand	1.8	1.7	1.8	0.9	1.5	1.5	0.2	-1.3	0.2	2.8	0.3	1.3
Change in inventories ¹	-0.4	-1.4	0.0	0.6	12.5	-5.6	6.2	-0.3	-11.3	1.8	1.0	0.5
Total exports ²	2.6	6.5	3.8	4.5	-6.0	17.1	-6.6	-8.3	21.1	2.2	-0.7	3.2
Goods ²	2.6	5.9	5.2	5.9	-8.7	21.4	-5.6	-12.8	38.4	-0.4	-0.7	2.7
Goods excluding merchanting ²	0.7	5.8	5.8	4.4	2.1	6.9	4.3	-11.3	28.8	3.1	0.8	3.3
Services	2.4	7.6	1.1	1.6	-0.6	9.2	-8.7	1.2	-7.7	7.9	-0.9	4.4
Total imports ²	3.0	4.4	4.4	2.4	14.7	2.3	-1.8	-10.8	1.9	9.5	-1.1	4.2
Goods ²	0.0	3.8	5.2	6.2	25.1	7.9	0.8	-13.4	3.7	13.1	-5.5	4.4
Services	8.8	5.5	2.8	-4.3	-2.8	-7.5	-6.9	-5.2	-1.6	2.7	8.3	3.8
Net exports ³	0.1	1.6	0.2	1.4	-9.8	8.4	-3.0	0.2	10.7	-2.9	0.1	0.0
GDP	1.3	1.7	1.8	2.8	4.1	4.3	3.4	-1.3	-0.4	1.5	1.3	1.6

¹ Contribution to growth in percentage points (including statistical discrepancy).

3 Contribution to growth in percentage points.

Source: SECO

² Excluding valuables (non-monetary gold and other precious metals, precious stones and gems as well as works of art and antiques).

The situation on the labour market remained favourable overall. The unemployment rate stayed at a low level, and employment figures rose moderately.

Unemployment stable

The number of people registered as unemployed at the regional employment offices changed very little in recent months. Excluding seasonal fluctuations, around 106,000 people were recorded as unemployed at the end of November, while the seasonally adjusted unemployment rate published by SECO stood at 2.3% (cf. chart 3.4).

In addition, the Swiss Federal Statistical Office (SFSO) calculates unemployment figures in line with the International Labour Organization (ILO) definition, based on data provided by the Swiss Labour Force Survey (SLFS), a household survey conducted quarterly. This survey includes people who are looking for work but are not registered, or are no longer registered, as unemployed with the regional employment offices. The SFSO unemployment rate calculated in accordance with the ILO definition is therefore higher than the one published by SECO. In the third quarter of 2019, the seasonally adjusted unemployment rate remained at 4.4%.

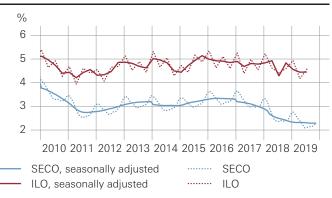
Moderate employment growth

According to the Employment Statistics (ES), the seasonally adjusted number of persons employed rose slightly in the third quarter; however, at 0.3%, growth was below the long-term average of 1.1% (cf. chart 3.5). The ES measure the number of employed persons on the household side and are based primarily on SLFS data.

The national job statistics (JOBSTAT), by contrast, measure employment on the company side and are based on a survey of firms. According to these statistics, the number of full-time equivalent positions registered moderate growth of 0.6% in the third quarter. Employment was up in all the major sectors (cf. chart 3.6).

Chart 3.4

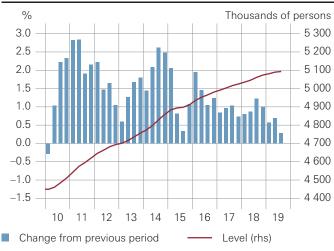
UNEMPLOYMENT RATE



SECO: Unemployed persons registered with the regional employment offices, as a percentage of the labour force (economically active persons). The number of economically active persons is based on the 2000 and 2010 censuses and the three-year averages of the 2012–2014 and 2015–2017 structural surveys. ILC: Unemployment rate based on International Labour Organization definition. Sources: SECO, SFSO

Chart 3.5

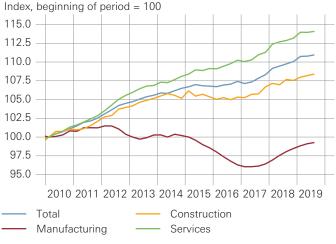
EMPLOYED PERSONS



Source: SFSO; seasonal adjustment: SNB

Chart 3.6

FULL-TIME EQUIVALENT JOBS



Source: SFSO; seasonal adjustment: SNB

OUTPUT GAP

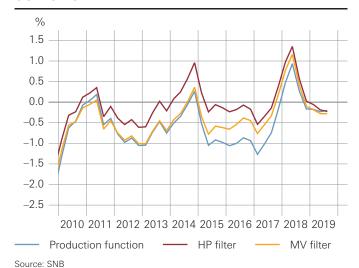
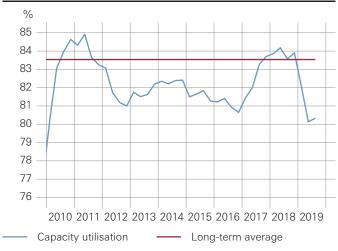


Chart 3.8

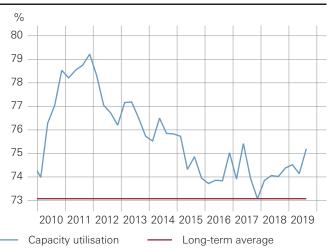
CAPACITY UTILISATION IN MANUFACTURING



Source: KOF Swiss Economic Institute

Chart 3.9

CAPACITY UTILISATION IN CONSTRUCTION



Source: KOF Swiss Economic Institute

CAPACITY UTILISATION

Output gap closed

The output gap, which is defined as the percentage deviation of actual GDP from estimated aggregate potential output, shows how well the production factors in an economy are being utilised. Based on the quarterly figures for GDP, the estimates suggest the gap has closed. Potential output as estimated by means of a production function shows an output gap of -0.2% for the third quarter of 2019, unchanged from the previous quarter. Estimates using other methods to establish potential output (Hodrick-Prescott filter and multivariate filter) confirm that the gap is practically closed at present (cf. chart 3.7).

Surveys continue to paint mixed picture

The various surveys on the utilisation of production factors presented a very mixed picture for the third quarter. Overall, however, they suggested that capacity utilisation in the Swiss economy was at a normal level.

According to the KOF survey, utilisation of technical capacity in manufacturing stabilised in the third quarter. Yet, at 80.3%, it was still considerably below the long-term average (cf. chart 3.8). Data from other sources do not confirm the pronounced underutilisation, however. The KOF survey also asks companies for an assessment of current technical capacity. Respondents reported that technical capacity in the third quarter was adequate. Machine utilisation in construction advanced in the third quarter, thus remaining above its long-term average (cf. chart 3.9). In services, too, the surveys point to an above-average level of technical capacity utilisation.

With regard to personnel, staff shortages persist. Surveys on the labour situation carried out in services and construction indicate that filling vacant positions continues to be somewhat of a challenge for companies. In manufacturing, meanwhile, the situation has eased slightly in recent months.

The outlook for the Swiss economy is cautiously optimistic. There are still no discernible signs of the global manufacturing cycle or international trade picking up pace again (cf. chart 3.10). Nevertheless, the Swiss franc has depreciated again somewhat since the high for the year recorded in August, thus improving the price competitiveness of the export industry. The employment outlook also remains positive (cf. chart 3.12), which indicates consistently favourable labour market conditions.

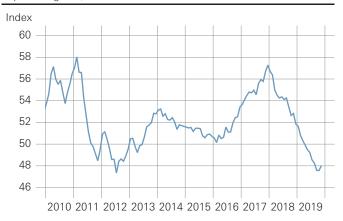
The economy is likely to continue to expand at a moderate pace in the fourth quarter and – over the course of next year – gradually pick up in step with global economic developments, as described in the baseline scenario for the world economy (cf. chapter 2). Unemployment is expected to stay low, and utilisation looks set to remain more or less within a normal range.

GDP is likely to expand by around 1% in 2019. The SNB expects growth of between 1.5% and 2% in 2020. In addition to a gradual firming in global economic activity, an exceptional effect, in particular, is also set to contribute to a stronger expansion in Switzerland next year. This effect stems from the fact that the forecast takes into account the revenue generated by international sporting events, which is likely to increase growth by around half a percentage point.

Chart 3.10

MANUFACTURING PMI ABROAD

Export-weighted, 27 countries

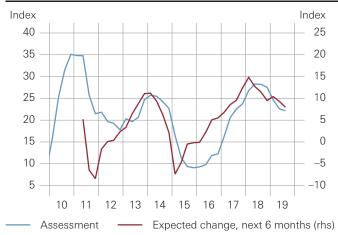


Sources: International Monetary Fund – Direction of Trade Statistics (IMF – DOTS), SNB, Thomson Reuters Datastream

Chart 3.11

BUSINESS SITUATION

Average across all KOF surveys

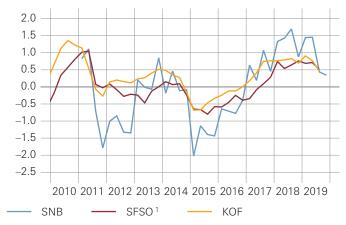


Source: KOF Swiss Economic Institute

Chart 3.12

EMPLOYMENT OUTLOOK

Seasonally adjusted, standardised



1 Seasonal adjustment: SNB

Sources: KOF Swiss Economic Institute, SFSO, SNB regional network

Prices and inflation expectations

The annual inflation rate as measured by the CPI has declined considerably since mid-2019 and was slightly into negative territory in October and November. Core inflation rates, by contrast, were comparatively stable, remaining in low positive territory.

Although short and long-term inflation expectations declined slightly over the course of the year, they are still within the range consistent with price stability, which the SNB equates to a rise in the CPI of less than 2% per year.

CONSUMER PRICES

Falling annual inflation rate

The annual CPI inflation rate decreased further in the second half of 2019 (cf. chart 4.1, table 4.1) and, at -0.3%, slipped back into negative territory in October for the first time since 2016. It recovered slightly in November, but remained negative at -0.1%. With the exception of housing rents, all of the main CPI components contributed to this reduction.

Negative inflation for imported products

Inflation for imported goods and services fell significantly and stood at -1.5% in November. Prices for both oil products and other imported products were below their year-back level in November.

Inflation for domestic products only slightly above zero Inflation for domestic goods and services also decreased and stood at 0.2% in October (cf. chart 4.2). The slight pick-up to 0.3% in November was solely due to rent inflation. Inflation rates for domestic goods and for other domestic services remained very low.

Table 4.1

SWISS CONSUMER PRICE INDEX AND COMPONENTS

Year-on-year change in percent								
	2018	2018	2019			2019		
		Ω4	Q1	Q2	Q3	September	October	November
Overall CPI	0.9	0.9	0.6	0.6	0.3	0.1	-0.3	-0.1
Domestic goods and services	0.4	0.5	0.6	0.7	0.4	0.4	0.2	0.3
Goods	0.8	1.2	0.9	0.9	0.5	0.4	-0.1	-0.1
Services	0.3	0.3	0.5	0.6	0.4	0.4	0.3	0.4
Private services excluding housing rents	0.7	0.7	0.7	0.9	0.5	0.6	0.5	0.5
Housing rents	0.4	0.4	0.4	0.5	0.5	0.5	0.5	1.0
Public services	-0.8	-0.7	0.1	-0.1	-0.4	-0.5	-0.7	-0.7
Imported goods and services	2.4	2.1	0.7	0.6	-0.1	-0.5	-1.5	-1.5
Excluding oil products	1.1	0.6	0.6	0.7	0.4	0.3	-0.4	-0.1
Oil products	11.9	12.5	1.1	0.1	-4.0	-5.9	-8.7	-10.2

Sources: SFSO, SNB

Rise in rent inflation

Having remained around 0.5% in the preceding months, rent inflation rose in November to 1%. The reference interest rate used for rent adjustments based on mortgage rate fluctuations has been unchanged at 1.5% since June 2017 (cf. chart 4.3).

Core inflation higher than annual CPI inflation

Overall, core inflation rates have changed very little since autumn 2017. Given the decline in CPI inflation, core inflation rates are now clearly back above the annual CPI inflation rate for the first time since 2016 (cf. chart 4.4). In November, the trimmed mean calculated by the SNB (TM15) stood at 0.3%, with rents being the only main component to make a positive contribution to inflation. The SFSO's core inflation rate (SFSO1) was marginally higher, at 0.4%,

The SFSO1 and TM15 rates are both based on the prices of a reduced basket of goods. When calculating SFSO1, energy and fuel as well as fresh and seasonal products are excluded. TM15 excludes the products with the most extreme price changes every month (15% at either end of the distribution curve of annual rates of change in product prices).

PRODUCER AND IMPORT PRICES

Declining producer and import prices

Producer and import prices have receded further since the beginning of 2019. In November, the corresponding inflation rate stood at -2.5% (cf. chart 4.5). This development was largely attributable to the reduction in import prices; these fell much more sharply than producer prices.

Chart 4 1

CPI: DOMESTIC AND IMPORTED GOODS AND **SERVICES**

Year-on-year change in CPI in percent. Contribution of individual components, in percentage points.

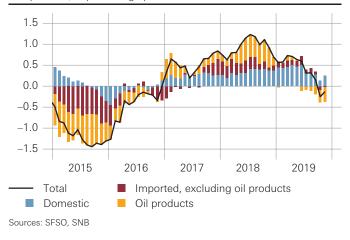
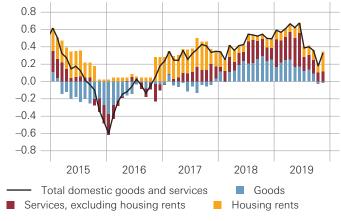


Chart 4.2

CPI: DOMESTIC GOODS AND SERVICES

Year-on-year change in domestic CPI in percent. Contribution of individual components, in percentage points



Sources: SFSO, SNB

Chart 4.3

HOUSING RENTS



Reference mortgage rate

Sources: Federal Office for Housing (FOH), SFSO

CORE INFLATION RATES

Year-on-year change

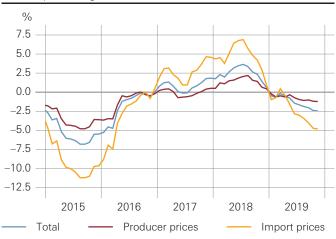


Sources: SFSO, SNB

Chart 4.5

PRODUCER AND IMPORT PRICES

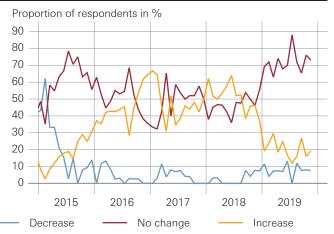
Year-on-year change



Source: SFSO

Chart 4.6

CS-CFA SURVEY: SIX-MONTH INFLATION EXPECTATIONS



Sources: CFA Society Switzerland, Credit Suisse

INFLATION EXPECTATIONS

Inflation expectations consistent with price stability

Inflation expectations fell slightly during the course of 2019. Nevertheless, they remain consistent with the objective of price stability, which the SNB equates to a rise in the CPI of less than 2% per year.

Fall in short-term inflation expectations

According to the joint monthly financial market survey by Credit Suisse and the CFA Society Switzerland, the significant majority of analysts questioned in November 2019 expected inflation rates to remain unchanged in the next six months. Meanwhile, roughly one-fifth of the respondents anticipated a rise in inflation and only very few thought inflation rates would fall (cf. chart 4.6). Given that annual CPI inflation has decreased in recent months, the consistently high proportion of respondents expecting unchanged inflation rates indicates a decline in short-term inflation expectations.

The talks conducted by the SNB's delegates for regional economic relations with companies from all sectors also suggest lower short-term inflation expectations. In the fourth quarter of 2019, company representatives expected on average an annual inflation rate of 0.3% for the next six to twelve months (Q3 2019: 0.5% and Q4 2018: 0.8%).

The quarterly survey of households conducted by SECO in October 2019 shows that more than half of the respondents anticipated a rise in prices over the next twelve months, while slightly less than 40% expected them to remain unchanged. At just under 10%, the proportion expecting prices to fall was up slightly on the July survey but remained low.

Longer-term expectations slightly above short-term expectations

Longer-term inflation expectations are still slightly higher than short-term expectations.

According to the biannual survey by Deloitte, conducted with CFOs of companies in Switzerland in the second half of 2019, participants anticipated an inflation rate of 1.0% in two years' time. This compares to 1.1% in the corresponding survey from the first half of the year.

Company representatives interviewed by the SNB's delegates also revised their longer-term inflation expectations slightly downwards. In the fourth quarter, on average they put the inflation rate in three to five years at 0.7% (Q3 2019: 0.8% and Q4 2018: 1.1%).

Monetary developments

At its quarterly assessment of 19 September 2019, the SNB left its policy rate unchanged and reaffirmed its policy stance. Its monetary policy thus continued to be based on the negative interest on sight deposits held by banks at the SNB and on the SNB's willingness to intervene in the foreign exchange market as necessary.

At the beginning of November, the adjustment made to the way in which exemption thresholds for the negative interest are calculated led to higher volatility in short-term money market rates. That aside, money market rates consistently remained close to the SNB's policy rate of -0.75%.

Having reached a historic low in August 2019, long-term rates rose in line with the interest rate developments abroad. Bolstered by the low interest rate expectations, the stock market indices posted new record highs. On the foreign exchange market, the Swiss franc remained largely flat against the euro and the US dollar.

As in the previous quarter, the M3 monetary aggregate and bank loans grew at a moderate pace.

SUMMARY OF MONETARY POLICY SINCE THE LAST ASSESSMENT

Expansionary monetary policy remains unchanged

The SNB confirmed its expansionary monetary policy stance at its assessment of 19 September 2019. It left unchanged, at -0.75%, the SNB policy rate and the interest rate on sight deposits held by banks and other financial market participants at the SNB which exceed a given threshold. Furthermore, the SNB reaffirmed that it will remain active in the foreign exchange market as necessary, while taking the overall currency situation into consideration.

Adjustment in the calculation of the exemption thresholds

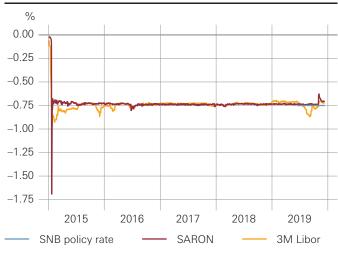
The SNB also announced an adjustment to the basis for calculating negative interest, which took effect from 1 November 2019. Since then, many banks have been benefiting from higher exemption thresholds and have an incentive to take on liquidity via the money market. As expected, this demand for liquidity led to higher trading volumes and a slight rise in SARON and other short-term repo rates in the week following the introduction of the new calculation basis. The SNB was active in the repo market from time to time in order to keep SARON close to the SNB policy rate.

Sight deposits at the SNB virtually unchanged

Since the September monetary policy assessment, total sight deposits held at the SNB have remained virtually unchanged. In the week ending 6 December 2019 (last calendar week before the December assessment), they amounted to CHF 587.8 billion, somewhat lower than in the last calendar week preceding the mid-September assessment (CHF 592.4 billion). Between the assessments in September and December 2019, sight deposits at the SNB averaged CHF 590.9 billion. Of this amount, CHF 493.0 billion were sight deposits of domestic banks and the remaining CHF 97.9 billion were other sight deposits.

Statutory minimum reserves averaged CHF 17.5 billion between 20 August and 19 November 2019. Overall, banks exceeded the minimum reserve requirement by some CHF 474.4 billion (previous period: CHF 459.2 billion). Banks' surplus reserves thus remain very high.

SNB POLICY RATE AND MONEY MARKET RATES



Sources: Bloomberg, SIX Swiss Exchange Ltd, SNB

Chart 5.2

10-YEAR SWISS CONFEDERATION BOND YIELD

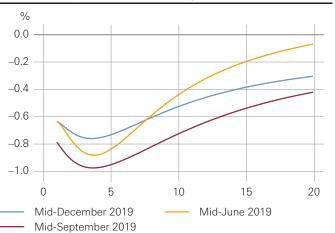


Source: SNB

Chart 5.3

TERM STRUCTURE OF CONFEDERATION BONDS

Years to maturity (hor. axis); Nelson-Siegel-Svensson method



Source: SNB

MONEY AND CAPITAL MARKET INTEREST RATES

Money market rates largely unchanged

In the last three months, money market rates have remained largely unchanged. The adjustment to the way in which the negative interest exemption thresholds are calculated led to a temporary increase in volatility in SARON at the start of November 2019 (cf. chart 5.1). After briefly rising somewhat, SARON now stands at -0.71%, close once again to the SNB policy rate of -0.75%.

Increase in capital market rates

After reaching new historical lows in August, long-term interest rates rose again in recent months. At present, yields on ten-year Confederation bonds are around -0.5%, which roughly corresponds to the values latterly recorded in July (cf. chart 5.2).

The renewed rise in Confederation bond yields primarily reflected global factors. Yields on government bonds in the US and other major advanced economies have also increased since August.

Upward shift in yield curve

The yield curve for Confederation bonds has shifted upwards since the monetary policy assessment in September (cf. chart 5.3). At the same time, it has again flattened slightly further. Confederation bond yields across all maturities covered are in negative territory.

Real interest rates still low

Real interest rates are the relevant determinant for saving and investment decisions of companies and households. The development of the yield curve for Confederation bonds in combination with the survey measures of inflation expectations indicate that real interest rates remain at a very low level.

Swiss franc largely unchanged against euro and US dollar

The exchange rates of the Swiss franc against the euro and the US dollar have fluctuated very little since the monetary policy assessment of September. In mid-December, the Swiss franc stood at 1.09 to the euro and 0.98 to the dollar, thus corresponding by and large to the mid-September rates (cf. chart 5.4).

The exchange rate fluctuations were mostly driven by changes in risk sentiment, which were frequently attributable to developments in the trade dispute between the US and China. The ECB's monetary policy easing of mid-September and the Fed's interest rate reductions of mid-September and end-October only led to a temporary Swiss franc appreciation against the euro and the dollar.

Nominal external value of Swiss franc slightly below 2019 high

The nominal trade-weighted external value of the Swiss franc also remained quite stable in the last three months. Compared to the high for the year recorded in August, the Swiss franc has lost around 2% in value in nominal, trade-weighted terms (cf. chart 5.5).

Real external value still high

With the nominal depreciation of the Swiss franc since August, its real trade-weighted external value also decreased (cf. chart 5.6). As the inflation rate in Switzerland is lower than in other countries, the real external value fell somewhat more than the nominal value.

In a longer-term comparison, the value of the Swiss franc remains high.

Chart 5 4

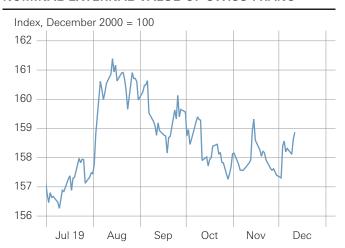
EXCHANGE RATES



Source: SNB

Chart 5.5

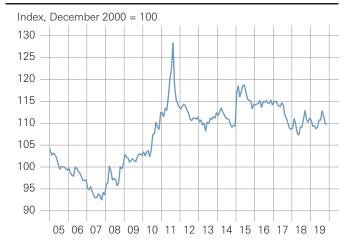
NOMINAL EXTERNAL VALUE OF SWISS FRANC



Source: SNB

Chart 5.6

REAL EXTERNAL VALUE OF SWISS FRANC



Source: SNB

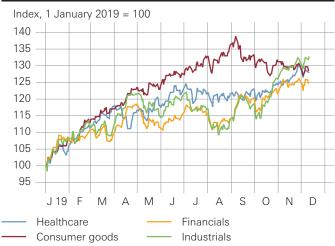
SHARE PRICES AND VOLATILITY



Sources: Bloomberg, Thomson Reuters Datastream

Chart 5.8

SELECTED SPI SECTORS

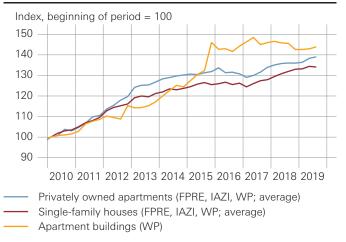


Source: Thomson Reuters Datastream

Chart 5.9

HOUSING TRANSACTION PRICES

Nominal (hedonic)



Sources: Fahrländer Partner Raumentwicklung (FPRE), IAZI, Wüest Partner (WP)

SHARE AND REAL ESTATE PRICES

Rising share prices

In the fourth quarter of 2019, share prices of the largest Swiss companies resumed the positive momentum from the beginning of the year (cf. chart 5.7). In November, the Swiss Market Index (SMI) reached a new all-time high, and in mid-December stood around 3% higher than at the time of the September quarterly assessment.

Low level of market uncertainty

The volatility index derived from options on SMI futures contracts is an indicator of how investors gauge uncertainty on the stock market (cf. chart 5.7). After a temporary increase, the volatility index declined considerably in October and remained at a low level in November. This movement reflects a typical pattern: rising share prices tend to go hand in hand with decreasing uncertainty, while falling share prices are generally associated with growing uncertainty.

Movements in sectoral indices

Chart 5.8 shows the movements of important sub-indices in the broader-based Swiss Performance Index (SPI). With the exception of the sectoral index for consumer goods, all the important sectors represented in the SPI registered considerable price gains. Since the beginning of the year, all four sectoral indices have gained more than 20% in value.

Little change in residential real estate prices

Transaction prices for residential real estate remained virtually unchanged in the third quarter (cf. chart 5.9). Looking back over a longer period, prices for single-family houses and privately owned apartments have risen in the last three years, while prices for apartment buildings have hardly changed in the wake of a marked expansion in supply and growing vacancy rates since the end of 2015.

MONETARY AND CREDIT AGGREGATES

Rise in the monetary base

The monetary base, which consists of banknotes in circulation and sight deposits of domestic banks held at the SNB, has increased since August, averaging CHF 583.8 billion in November 2019 (cf. chart 5.10). Banknotes in circulation rose by CHF 1.4 billion, while sight deposits of domestic banks expanded by CHF 29.4 billion.

Unlike sight deposits of domestic banks, other sight deposits held at the SNB have fallen since August. Total sight deposits at the SNB remained practically unchanged.

Slowdown in growth of broad monetary aggregates

Growth rates for the broad monetary aggregates have slowed in recent months. In November 2019, M1 (currency in circulation, sight deposits and transaction accounts) was still 1.4% above its year-back level (cf. table 5.1). In the same period, M2 (M1 plus savings deposits) rose by 0.7% and M3 (M2 plus time deposits) by 1.3%.

Changes in money supply growth are consistent with movements in long-term interest rates. After increasing in the first half of the year with the fall in long-term interest rates, growth rates for monetary aggregates declined again in the second half of the year with the renewed rise in these interest rates.

Virtually unchanged lending growth

Bank lending (domestic bank offices, all currencies) was up 3.4% year-on-year in the third quarter of 2019, compared to 3.3% in the previous quarter. Lending growth thus remained largely unchanged (cf. table 5.1).

Banks' mortgage claims, which make up roughly 85% of all bank lending to domestic customers, were 3.5% higher than in Q3 2018. Growth in mortgage lending has stabilised since the start of the year, having risen in 2018 (cf. chart 5.11).

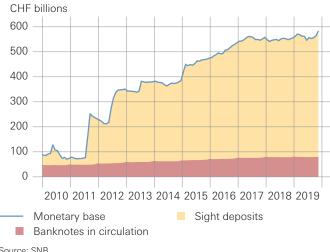
Demand for mortgages continues to be supported by low mortgage interest rates. The ten-year mortgage interest rate published by banks has fallen further since autumn 2018 and, at an average of 1.3% in October 2019, was only marginally above the all-time low recorded in August.

Lending growth by sector

Both households and non-financial companies have benefited from favourable financing conditions since the beginning of the financial and economic crisis, as reflected by a steady rise in bank loans extended to these two important customer groups (cf. chart 5.12).

Chart 5 10

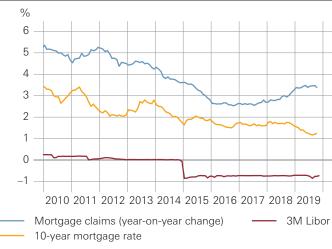
MONETARY BASE



Source: SNB

Chart 5.11

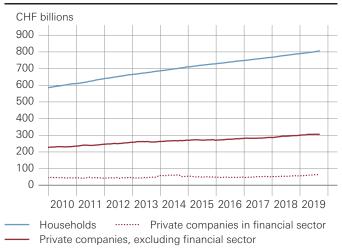
MORTGAGE CLAIMS AND INTEREST RATES



Sources: Bloomberg, SNB

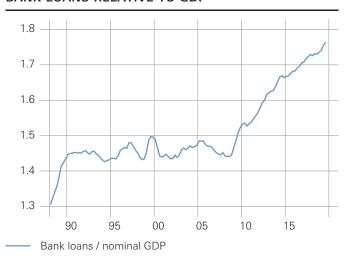
Chart 5.12

LOANS TO HOUSEHOLDS AND COMPANIES



Source: SNB

BANK LOANS RELATIVE TO GDP



Source: SNB

At the end of September 2019, loans to households – of which 95% are mortgage loans – recorded a year-on-year increase of CHF 23.2 billion (3%). Over the same period, loans to non-financial companies (of which, 77% mortgage loans) registered a rise of CHF 9.0 billion (3%). Loans to financial companies (of which, 34% mortgage loans), which exhibit greater volatility at a significantly lower volume, grew by CHF 8.9 billion (16%).

Rising loan ratio

Although lending growth rates have been moderate in recent quarters, the loan ratio (i.e. the ratio of bank loans to nominal GDP) has continued to rise. Chart 5.13 shows how the loan ratio has developed over the longer term. Following a sharp rise in the 1980s, this ratio remained largely unchanged until 2008. Since the beginning of the financial and economic crisis, bank loans have again exceeded nominal GDP growth.

MONETARY AGGREGATES AND BANK LOANS

Year-on-year change in percent

	2018	2018	2019			20	19		
		Q4	Q1	Q2	Q3	Se	ptember Oc	tober No	vember
M1		5.8	5.1	5.1	5.1	4.1	3.5	2.3	1.4
M2		3.2	3.1	3.3	3.7	3.0	2.6	1.7	0.7
M3		2.9	2.8	3.4	3.5	2.9	2.7	1.9	1.3
Bank loans, total ^{1, 3}		3.3	3.4	3.6	3.3	3.4	3.5	3.2	
Mortgage claims ^{1, 3}		2.9	3.1	3.4	3.4	3.5	3.5	3.4	
Households ^{2, 3}		2.6	2.7	2.8	2.8	2.8	2.8		
Private companies ^{2, 3}		3.8	4.4	5.2	5.6	5.5	5.5		
Other loans ^{1, 3}		5.4	5.1	4.6	2.7	3.4	3.4	2.3	
Secured ^{1, 3}		3.9	0.6	0.7	-2.1	2.8	3.8	4.3	
Unsecured ^{1, 3}		6.6	8.6	7.6	6.5	3.8	3.1	0.8	

Source: SNB

Monthly balance sheets (domestic bank offices, positions vis-à-vis domestic non-banks, all currencies).
Credit volume statistics (domestic bank offices, positions vis-à-vis domestic non-banks, all currencies).
Growth rates for the bank loans item and its components include information provided by banks on changes in their classification practices. Consequently, they may deviate from growth rates published on the SNB's data portal, data.snb.ch.

Business cycle signals

Results of the SNB company talks

Fourth quarter of 2019

Report submitted to the Governing Board of the Swiss National Bank for its quarterly assessment.

The appraisals presented here are based on discussions between the SNB's delegates for regional economic relations and company managers throughout Switzerland. In its evaluation, the SNB aggregates and interprets the information received. A total of 241 company talks were conducted between mid-October and the end of November.

Regions

Central Switzerland
Eastern Switzerland
Fribourg/Vaud/Valais
Geneva/Jura/Neuchâtel
Italian-speaking Switzerland
Mittelland
Northwestern Switzerland
Zurich

Delegates

Gregor Bäurle Urs Schönholzer Aline Chabloz Jean-Marc Falter Fabio Bossi Roland Scheurer Daniel Hanimann Rita Kobel

Key points

- The Swiss economy resumed its moderate expansionary course in the fourth quarter. There was no further slowdown in real turnover growth.
- Overall, utilisation of technical capacity and infrastructure were at normal levels. In manufacturing, capacity utilisation is slightly below average.
- The labour market situation has eased. Headcounts are approximately in line with needs, and recruitment problems have waned somewhat.
- The pressure on profit margins has increased slightly. For the most part, however, profit margins are reported as being 'sustainable' to 'comfortable'.
- Looking to the next two quarters, company representatives expect moderate growth in turnover, staff levels and investment.
- There is considerable uncertainty with regard to future developments. The impact of trade policy tensions and a further slowdown in the global economy are mentioned as being among the main risks.

No further slowing

According to the SNB's company talks in Q4 2019, the slowing observed in the preceding quarters did not continue. There is considerable uncertainty, however, as to how the situation will develop.

Real turnover grew a little more strongly than in the preceding quarter (cf. chart 1; for guidance on interpreting the charts, refer to the relevant section at the end of this report). This tallies with the assessment of many company representatives, who mentioned the second or third quarter of 2019 as marking the low point for new orders and turnover growth.

Export-oriented companies are emphasising the fact that business with the US remains favourable. Exports to emerging economies are also developing well overall. At the same time, business with China has been mixed, with some companies feeling the impact of the US—China trade dispute and the protests in Hong Kong more than others. Exports to Germany continue to suffer as a result of German economic weakness. Companies in the pharmaceuticals, medtech and air transport industries have performed especially well.

Utilisation of production capacity normal

Utilisation of technical capacity remains at a normal level overall (cf. chart 2). Capacity utilisation is reported as being normal in the services sector and it remains above average in the construction sector. Capacity is slightly underutilised in manufacturing, however, where the supply bottlenecks cited at the start of the year no longer exist.

Appropriate staffing levels

According to the company representatives, staff numbers are now roughly in line with needs, whereas in the preceding quarters they had been rated as on the low side. Some companies have reduced the number of temporary positions.

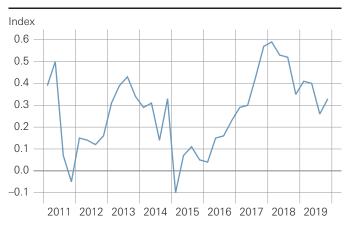
Although many sectors are still finding it difficult to recruit personnel, the situation in this regard has eased. There was less mention of the lack of specialists. However, demand remains strong for IT and other technical specialists. Many of the representatives say their companies are giving high priority to in-house training and to enhancing their appeal as employers.

Increased pressure on profit margins

The pressure on profit margins has increased slightly. For the most part, however, margins are reported as being at 'sustainable' to 'comfortable' levels.

Chart 1

TURNOVER COMPARED TO PREVIOUS QUARTER



Developments in real turnover compared to the previous quarter. Positive (negative) index values signal an increase (decrease).

Source: SNB

Chart 2

CAPACITY UTILISATION



Current utilisation of technical capacity / business infrastructure compared to a normal level. A positive (negative) index value signals utilisation is higher (lower) than normal.

Source: SNB

DEVELOPMENTS IN INDIVIDUAL INDUSTRIES

According to the company talks, real turnover in the trade sector was up on the previous quarter. In retail, however, infrastructure remains underutilised and profit margins below usual levels. Online sales channels are reporting high growth rates overall.

In the financial sector – i.e. among banks, insurers and asset managers – business volumes have increased both quarter-on-quarter and year-on-year. Profit margins, however, are lower than the levels considered to be normal. Banking infrastructure is underutilised. Both the interest margin business and the competitive environment remain challenging.

Business performance in the hospitality industry remains robust, driven by rising demand from US visitors. Demand from Asia also continues to provide support, though the number of Chinese guests is slightly lower at present.

Turnover in the ICT industry is significantly higher than a year ago. This development is the result of digital transformation, a trend towards cloud-based services, cybersecurity requirements and rising demand from the fintech area. Specialist staff remain in short supply in this industry.

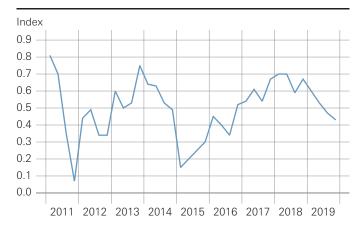
Companies in the healthcare sector report dynamic business performance.

In manufacturing, many industries are reporting higher turnover than in the previous quarter. Turnover has risen substantially in the pharmaceuticals industry in particular, with both capacity utilisation and margins also higher than usual. Although mechanical engineering is reporting slightly higher turnover compared with the previous quarter, profit margins are under considerable pressure. By contrast, turnover is flat in metal processing and among producers of electrical equipment. Suppliers in the automotive industry are continuing to feel the impact of the uncertainties stemming from technological change and heightened environmental awareness.

In construction, seasonally adjusted turnover stagnated at the level reported for the preceding quarter. Utilisation of production capacity remains high in all three segments (structural engineering, civil engineering and the finishing trade).

The talks held during the current quarter indicate that there are signs of a slowdown in new residential building activity. Construction firms, however, see the growing demand for renovation and refurbishment of buildings and infrastructure as offering possibilities for offsetting this. Fairly high vacancy rates are additionally driving the demand for renovation of older buildings. Moreover, some construction companies are seeking to shift the focus of their activities towards civil engineering and infrastructure projects.

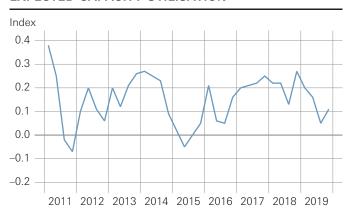
EXPECTED TURNOVER



Expected developments in real turnover over the coming two quarters. Positive (negative) index values indicate turnover is expected to be higher (lower).

Chart 4

EXPECTED CAPACITY UTILISATION



Expected developments in utilisation of technical capacity / business infrastructure over the coming two quarters. Positive (negative) index values indicate utilisation is expected to be higher (lower).

Source: SNB

Chart 5

EXPECTED EMPLOYMENT



Expected developments in staff numbers over the coming two quarters. Positive (negative) index values indicate an expected increase (decrease).

Source: SNB

OUTLOOK

Cautious optimism

Companies expect turnover to continue rising in the next two quarters (cf. chart 3). This reflects a certain degree of optimism with regard to the business outlook. In light of global uncertainties, however, since mid-2018 companies have increasingly tended towards caution in their predictions of turnover growth.

In keeping with the slightly improved turnover expectations, company representatives anticipate utilisation of their technical production capacity and infrastructure to increase slightly (cf. chart 4).

Persisting caution regarding investment

Companies' willingness to invest remains modest. In all three sectors (manufacturing, construction and services), they envisage small increases in expenditure on equipment and construction in the next twelve months. A quarter of the firms in the sample intend to use these investments to expand production capacity; until recently, this figure was in the region of 30%. The low interest rate environment is continuing to support investment, which is focused above all on the expansion and modernisation of IT. A significant proportion of this can be attributed to digitalisation projects.

Stable price expectations

For the next two quarters, representatives from all three sectors are expecting purchase and sales prices to remain stable. The upward pressure on raw material and preliminary product prices still visible in the spring has since dissipated. Capacity utilisation among suppliers was high until recently, but the situation has since normalised.

Planned expansion in staff numbers

Representatives say their companies are planning to further increase staff numbers over the coming two quarters, albeit not to the same extent as in recent quarters (cf. chart 5). Somewhat more than a third of the companies want to hire more staff. Headcount increases are planned in the IT industry as well as in auditing, accountancy and engineering offices in particular.

Based on the answers available, companies are planning to increase wages by an average of 1.1% in 2020.

The company representatives consider the international environment to be relatively uncertain. They see the main risks as being the US—China trade dispute, protectionist tendencies, the unrest in Hong Kong and other threats of a geopolitical nature. In addition, a large number of other political and structural problems are clouding the general risk perception. Companies regard the challenging position still faced by central banks—and the persisting low interest rate environment resulting from this—with concern. At the same time, companies are welcoming the low interest rates as they facilitate investments and help counter the Swiss franc's tendency to appreciate.

On the whole, companies are devoting more attention to their positioning in terms of sustainability, with many recognising potential for new fields of business amid this structural trend.

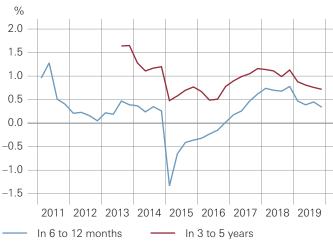
Digitalisation efforts are under way in many areas and are, for the most part, seen as an opportunity. At the same time, many companies point to growing cyber risks.

INFLATION EXPECTATIONS

The delegates also ask company representatives about their short and long-term inflation expectations as consumers.

Chart 6

EXPECTED INFLATION



Source: SNB

Short-term inflation expectations – measured in terms of the consumer price index – have decreased slightly. The average for the next six to twelve months is 0.3% (blue line in chart 6), compared to 0.5% in the previous quarter. Inflation expectations for the medium term – i.e. for a time horizon of three to five years (red line in chart) – also fell marginally, to an average 0.7% as against 0.8% in the previous quarter. In this regard, numerous company representatives expressed their conviction that price levels in Switzerland must continue to converge with those abroad.

About this report

Approach

Each quarter, the SNB's delegates for regional economic relations hold talks with managers of companies throughout Switzerland. The main results of these discussions are summarised in the 'Business cycle signals' report.

Approximately 240 companies are visited every quarter. The selection of companies reflects the industrial structure of the Swiss economy based on GDP and employment. Industries subject to stronger cyclical fluctuations are somewhat overrepresented, while the public sector and agriculture are not taken into consideration. Different companies are visited from one quarter to the next.

In the talks, the SNB's delegates capture primarily qualitative information. The discussions are nevertheless structured in such a way as to allow the delegates to grade part of the qualitative information received according to a numeric scale. This enables the results to be aggregated and represented graphically.

The five-tier scale ranges from 'substantially higher' or 'much too high' (+2), 'slightly higher' or 'somewhat high' (+1), 'the same' or 'normal' (0), 'slightly lower' or 'somewhat low' (–1), to 'substantially lower' or 'much too low' (-2).

Interpreting the charts

The charts are to be regarded as a numeric summary of the qualitative information received. The index value shown represents the average of the findings from all companies visited. When interpreting the curves, particular relevance should be attached to their overall development, rather than to their numeric level or individual changes.

Additional information

Further information on the 'Business cycle signals' report is available at www.snb.ch, *The SNB, SNB regional network*.

Acknowledgements

The SNB would like to thank the representatives from around 900 companies that have consented to take part in interviews with the delegates for regional economic relations during the course of 2019. In doing so, they have made a significant contribution to the evaluation of economic developments. The companies listed below have agreed that their names may be published:

Α

A. Marchon SA. A. Tschümperlin AG. A.H. Meyer & Cie AG. Aare Energie AG. AargauHotels.ch. Aargauische Kantonalbank. Aarvia Gruppe. abacon Sicherheit AG. ABB Schweiz AG. Abraxas Informatik AG. Accuro Trust (Switzerland) SA. adidas sport gmbh. AdNovum Informatik AG. Adobe Systems. Aduno Gruppe. AEK Bank 1862 Genossenschaft. Agility Logistics AG. Agustoni Cesare Trucks SA. Aimé Pouly SA. aire h SA. AISA Automation Industrielle SA. Albergo Losone. Alder + Eisenhut AG. Aldo Lepori SA Impresa Costruzioni. Alex Gemperle AG. Alfred Müller AG. Allreal Generalunternehmung AG. Alpine Rose Resort AG. Alpiq Holding. Alternative Bank Schweiz AG. Altes Tramdepot Brauerei Restaurant AG. Aluminium Laufen AG. Aluwag AG. AMC International AG. Amcor Flexibles Rorschach AG. Ampac Flexibles AG. Amstein + Walthert Lausanne SA. André SA. Angenstein Estech AG. Anliker AG. Antalis AG. API SA. APP Unternehmensberatung AG. Appenzeller Kantonalbank. Arab Bank (Switzerland) Ltd. Area City Quinto SA. Argor-Heraeus SA. Argus Data Insights Schweiz AG. Arlanxeo Switzerland SA. Arnold & Co AG Sand und Kieswerke. Arnold & Partner AG. Arnold Magnetic Technologies AG. Art Deco Hotel Montana. Ascensia Diabetes Care Holding. atelier ribo sa. Atmoshaus Gruppe. Atos AG. ATP Hydraulik AG. Atupri Gesundheitsversicherung. Audemars Piguet. Auto AG Group. Automobiles Senn SA. Autoverkehr Grindelwald AG. AXA Agence Générale David Mounir. AZ Direct.

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Bien-Air Dental SA. bioanalytica AG. Biondi Gastronomie AG. Bless Art Raumsysteme AG. BLS AG. BMW (Schweiz) AG. BNC Business Network Communications AG. BNP Paribas (Suisse) SA. Boccard Parc et Jardins SA. Bolliger Nutzfahrzeuge AG. Bommer + Partner Treuhandgesellschaft. Bon Chic Bon Genre Holding SA. Boost Group AG. Boschung Group. Boss Info AG. Boulangerie Industrielle Bisa SA. Boulangerie Michellod SA. BP (Switzerland). Brauch Transport AG. Brauerei Schützengarten AG. brodbeck roulet architectes associés sa. Bühler + Scherler AG. Bühler AG. Bulgari Horlogerie SA. Bunge SA. Burckhardt+Partner AG. Bureau d'ingénieurs civils Daniel Willi SA. BÜWE Tiefbau AG.

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Chevalley. Groupe Buchard Voyages. Groupe H Architecture et Ingénierie SA. Groupe JPF. Groupe Minoteries SA. Groupe Phida. Groupe Posse. Groupe R Management SA. Groupe Recomatic. Groupe Rey, Hôtellerie & Immobilier. Groupe T2i. Groupe Zuttion SA. Grünenthal Firmen Schweiz. Gruyère Energie SA. Gunvor SA. GVB Privatversicherungen AG.

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IBSA Institut Biochimique SA. Ifolor AG. Ilem SA. Imbach + Cie AG. Imerys Graphite & Carbon Switzerland SA. Immer AG. Implenia Schweiz AG. Induni & Cie SA. Industrie Biomediche Insubri SA. Infra-Com Swiss AG. ING Belgique. Inova Solutions AG. Integra Biosciences AG. Intersport Schweiz AG. Inventx AG. Ipsos SA. Irtec SA. Iseli & Co AG Schötz. Ismeca Europe Semiconductor SA. ISS Schweiz AG. Itris. IVECO (Schweiz) AG. IVF Hartmann AG.

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S

SABAG Luzern AG. Sage Schweiz AG. Saint-Gobain Isover. Sajet SA. Salanitro SA. Salt. Samvaz SA. Sandro Sormani SA. Sandro Vanini SA. Sapa Prodotti Plastici Sagl (Gruppo Baxter). Sarna Plastec AG. Scintilla AG Werk, St. Niklaus. Scrasa SA. Securitas Gruppe Schweiz. Sefa SA. Sekisui Alveo AG. Semadeni AG. Sercab SA. Serconet SA. Services industriels de Lausanne. Servier (Suisse) SA. Settelen AG. Seven Gastro Group Ascona. Shopping Arena. Sicpa SA. Siegfried Evionnaz SA. Siegfried Holding AG. Sigg Switzerland Bottles AG. Sigrist-Photometer AG. Similasan. Sinomedica. Sintetica SA. SIX. Skynight SA. Smart Gorla Services SA. SMB Medical SA. Société Electrique de la Vallée de Joux SA. Socorex Isba SA. Softcom Technologies SA.

Solo Swiss SA. Solvias AG. Somazzi Dario materiali da costruzione sa. SonarSource SA. Sonova Holding AG. Sontex SA. Soprod SA. Sotax AG. SPAG Schnyder, Plüss AG. Spaghetti Gastro Group. Spagyros AG. Sparcassa 1816 Genossenschaft. Speno International SA. Sphinx Werkzeuge AG. SPIE ICS AG. Spinelli SA. Spirig HealthCare AG. Spitalzentrum Biel AG. Spitex Region Interlaken AG. Spitex Region Thun AG. SQLI Suisse SA. SR Technics Switzerland. SSI Schäfer AG. Südpack Bioggio SA. Suisselearn Media AG. Suiten Hotel Parco Paradiso. Sutter Begg. Swatch Group SA. Swiss Automotive Group AG. Swiss Capital Alternative Investments AG. Swiss Caps AG. Swiss Holiday Park AG. Swiss Krono AG. Swiss Life Schweiz. Swiss Medical Network. swissconnect ag. SwissOptic AG. Swissôtel Zürich. swisspor Romandie SA. Swissterminal ag. Switel SA. SWS Medien AG Print. Symbiotics SA. Syngenta.

SCH

Schaub Maler AG. Schenk Bruhin AG. Schenker Storen AG. Scherrer Haustechnik AG. Schibli-Gruppe. Schiller AG. Schlagenhauf Gruppe. Schlumpf AG. Schmid Gruppe. Schmiedewerk Stooss AG. Schmoll AG. Schmolz + Bickenbach Stahlcenter AG. Schneider und Cie AG. Schulthess Maschinen AG. Schurter Holding AG. Schüwo AG. Schwarz Kitchen Selection SA. Schweizer Zucker AG. Schwob AG. Schwyzer Kantonalbank.

ST

St. Galler Kantonalbank. Stadler Rail AG. Steeltec AG. Steinel Solutions AG. Steiner Transport AG. STH Swiss Tech Holding AG. Stiftung Gurten-Park im Grünen. Stirnimann AG Baumaschinen. STMicroelectronics SA. Stobag AG. Stöckli the Swiss Ski. Stoppani Metalltechnik AG. Stoppani Systembau AG. Straumann Holding. Strellson AG. Streuli Bau AG. Studio d'ingegneria Visani Rusconi Talleri SA. Studio Ingegneria Sciarini SA. Stutz Holding AG.

Т

TAG Aviation SA. Taiana SA. Tarchini Group. Tecnopinz SA. Tecsedo SA. Telsonic AG. Teo Jakob AG. TESA Technology. Textilcolor AG. THE Machines Yvonand SA. Theiler Druck AG. Thierry Koulbanis Restaurants McDonald's. Thurgauer Kantonalbank. thyssenkrupp Materials Schweiz AG. tibits ag. Ticino Hotels Group. Tillotts Pharma AG. Tisca Tischhauser AG. Titanium Holding Sàrl. TNT Swiss Post GmbH. Toggenburger Unternehmungen. Toldo Strassen- und Tiefbau AG. Topnet SA. Tornos SA. Totsa Total Oil Trading SA. TPN SA. Trafag AG. Traveco Transporte AG. Treier AG. Trelleborg Sealing Solutions Stein am Rhein AG. Trendcommerce (Schweiz) AG. Tri-Star Electronics (Europe) SA. Triumph Holding AG. Trivadis. Trumpf Schweiz AG. Turck Duotec SA. Two Spice AG.

U

UBS AG. Uditis SA. UEFA. Ugo Bassi SA. Uhde Inventa-Fischer AG. Ultra Marine Food SA. Unifil AG. Unigestion SA. Uniman SA. Unione Farmaceutica Distribuzione SA. Unitechnologies AG. United Grinding Group AG. update Fitness AG. Urner Kantonalbank. USFA - Falegnamerie Associate società cooperativa.

V

Valcambi SA. Valiant Bank AG. Valora AG. Valtube SA. Vaudoise Assurances Holding SA. VC999 Verpackungssysteme AG. Vebego SA. Veco Group SA. Vedia SA. Vending Service AG. Veronelli SA. Vetropack SA. Victorinox AG. Viking Cruises. Viseca Card Services SA. Vitogaz Switzerland AG. Vogt AG. Vogt-Schild Druck AG. Volvo Car Switzerland AG. VP Bank (Schweiz) AG.

w

W+P Weber und Partner AG. Walder Wyss AG. Warteck Invest AG. Wäsche-Perle AG. Waser + Co AG. Wegmüller AG Holz- und Kartonverpackungen. Weidmann Medical Technology AG. Wenger Fenster AG. Wetter Gruppe. Wey Technology AG. Wiederkehr AG. Willisau Switzerland, Tisch & Stuhl Willisau AG. Wincasa AG. Winteler SA. Wirz AG Bauunternehmung. Woodpecker Holding AG. Work in Progress Holding AG. Wyniger Gruppe. Wyon AG. Wyss Holding AG.

Υ

Ypsomed AG.

Z

zb Zentralbahn AG. Ziemer Ophthalmic Systems AG. Zimmer Biomet. Zindel Gruppe AG. Zingg Industrie-abfälle AG. ZLE Betriebs AG. Zuger Kantonalbank. Zürcher Frères SA. Zürcher Kantonalbank. Zürich Marriott Hotel. Zürich Schweiz. Zweifel Pomy-Chips AG.

2

25hours Hotel Company Zürich AG.

Ш

II-VI Laser Enterprise GmbH.

Company talks by SNB delegates: Objectives and methods

Hans-Ueli Hunziker and Attilio Zanetti¹

The one-on-one exchange of information between the SNB and companies has a long-standing tradition. It is an ideal complement to the other available economic data and allows the SNB to better understand the challenges facing the economy. The most precise information possible, both on the current state of the economy and the outlook going forward, form the basis for shaping monetary policy.

The delegates for regional economic relations represent the SNB in the regions and regularly conduct company talks. Since 2010, the SNB has used a structured approach to collect and evaluate the information obtained during these talks. This provides a standardised procedure and facilitates a systematic evaluation of the information collected, in both qualitative and quantitative terms. The results of these talks are summarised and published at regular intervals on the SNB's website and in its *Quarterly Bulletin*.

This study describes the approach used.

¹ The authors would like to thank Carlos Lenz, Patrick Muhl, Robert Oleschak, Enzo Rossi, Martin Schlegel, Fabio Sonderer and Jacqueline Thomet for their valuable comments.

1. INTRODUCTION

The Swiss National Bank's monetary policy is aimed at ensuring price stability while taking due account of economic developments. Each quarter, the SNB Governing Board conducts an in-depth economic assessment in determining its monetary policy stance. To optimally shape its monetary policy, the SNB is dependent on the most precise information possible, both on the current state of the economy and the outlook going forward.

The SNB draws on a number of different sources and tools. For its analysis, it uses a range of official statistics and publicly available surveys from research institutes and trade associations. In addition, with a view to the quarterly assessment, it collects information on the latest developments by conducting regular talks directly at company level.

This one-on-one exchange of information between the SNB and companies has a long-standing tradition. It dates back to shortly after the foundation of the SNB in 1907 and has been maintained over the decades. To this day, the SNB still regards company talks as an ideal complement to other available economic data. In particular, the exchange allows the SNB to better understand the challenges facing the economy.

Over the course of time, the methods used to collect, consolidate and evaluate the information obtained from the corporate world have changed, however. Today, the SNB's eight delegates for regional economic relations are responsible for conducting company talks and for representing the SNB in the regions. Since 2010, they have used a structured set of guidelines for this purpose, which provides a standardised procedure and facilitates a systematic evaluation of the information collected, in both qualitative and quantitative terms. The results of these talks are summarised and published at regular intervals on the SNB's website and in its *Quarterly Bulletin*, notably with the 'Business cycle signals' report and special reports, as well as with time series.¹

This study documents the methodology used for collecting and evaluating information obtained from the company talks conducted by the SNB's delegates. In the event of any significant changes, the online version of the study will be updated to reflect these.²



Figure 1: Regional division and economic relevance

¹ The 'Business cycle signals' report is published as part of the SNB's Quarterly Bulletin. Depending on their size, special reports are either integrated into the 'Business cycle signals' report or published separately on the website, cf. www.snb.ch, The SNB, SNB regional network, Publications. Publicly available time series from company talks can be found on the SNB's data portal, cf. www.snb.ch, Statistics, SNB data portal.

² Cf. www.snb.ch, The SNB, SNB regional network, Publications.

2. THE SNB'S REGIONAL PRESENCE

The SNB maintains a network of eight representative offices in the following regions: Geneva/Jura/Neuchâtel, Fribourg/ Vaud/Valais, Mittelland, Zurich, Northwestern Switzerland, Eastern Switzerland, Central Switzerland and Italian-speaking Switzerland. Economically speaking, the regions are not all the same size. The regional division dates back to the time of decentralised structures, which were of relevance for the country's cash distribution and supply. Over time, the division was adapted to the needs of economic monitoring in such a way that the differences in size tended to be smaller. Linguistic and geographical factors nevertheless remain an essential feature of the division. Figure 1 shows the eight regions and, in brackets, the individual regions' shares of GDP.

In each region, the SNB is represented by a delegate for regional economic relations. The delegates belong to the Economic Analysis unit in the Economic Affairs division, which is primarily responsible for economic analysis and for preparing the monetary policy decision. The SNB representative offices are located in the two head offices in Berne and Zurich, as well as in Basel, Geneva, Lausanne, Lucerne, Lugano and St Gallen.

In their dual function as ambassador and observer, the delegates explain the SNB's policy to local economic players and authorities, and monitor economic developments in their respective regions. This is primarily done through regular, in-depth talks with company management. In addition, the delegates are supported in their tasks by Regional Economic Councils.

3. OBJECTIVE AND CONTENT OF COMPANY TALKS

The aim of the company talks is to receive the most up-to-date, precise and comprehensive quarterly assessment possible of the present state of Switzerland's economy and the outlook going forward. The talks not only provide a detailed insight into the current course of business of the relevant companies, they also enable an evaluation of the prospects, with the associated opportunities and risks, as seen from a company's perspective (cf. Hunziker and Zanetti, 2015). By piecing together the information from the various talks, the SNB gets a picture of how companies see the overall economic situation.

The talks are generally held on company premises and last around 90 minutes. Company representatives are members of executive management, typically the CEO or CFO. The SNB's delegates conduct the talks using a standardised set of guidelines. This structured approach enables the SNB to collate and evaluate the information from the various regions and industries in a systematic manner.

The guidelines are not designed as a questionnaire for the companies to complete themselves, and it is up to the delegates to capture the information from the talks. The guidelines are made up of both open and closed questions, and cover different aspects of business development: turnover, prices, margins, production capacity, staff policy, investment plans. In addition, company representatives are asked for their personal inflation expectations. Where necessary, delegates enquire about developments in real (i.e. price-adjusted) terms. Company representatives are also asked to exclude possible seasonal effects from their assessment.³

Regional Economic Councils

The SNB has a Regional Economic Council in each of the eight regions. The councils are made up of three to four local entrepreneurs or managers, depending on the size and economic structure of a region, and are elected by the SNB Bank Council. They are tasked with analysing the economic situation and the effect of monetary policy in their regions, and reporting the results to the SNB's Governing Board. They support the SNB's delegates for regional economic relations in monitoring economic developments and explaining the SNB's policy in the regions. Persons elected to the Regional Economic Councils must have business experience and recognised knowledge of their

respective industries. Given their function, they are not only in a position to provide expert information on their own businesses, their network of contacts also provides them with a good overview of regional economic developments. Each quarter, the SNB's delegates meet with their Regional Economic Councils for an in-depth assessment of the economic situation in the regions and to explain the SNB's policy. The information obtained during these talks supplements what the delegates glean from their company talks, thus helping them form a more complete picture. In exceptional circumstances, the delegates may also include the businesses of the Regional Economic Council members in their company talks.

³ For most time series, it is therefore not necessary to conduct a seasonal adjustment using a statistical method. There are exceptions in this regard in the construction sector, specifically quarter-on-quarter turnover growth and capacity utilisation.

The talks commence with a short review of performance in the recent past, before moving on to discuss in greater detail the current course of business and the outlook for the quarters ahead.

Closed questions may be answered either with predefined qualitative assessments or with a figure (as in the case of inflation expectations or salary increases, for instance). Moreover, responses may always be supplemented by explanatory comments, such as what factors drive demand or which events have affected margins.

Open questions deal, for example, with specific opportunities, risks or problems. Additional comments may be provided here, too. Furthermore, basic information about the company is also recorded – staff numbers, the share of turnover that is exported and the breakdown of billing currencies.

Another objective of this dialogue with companies is to give them the opportunity to comment on or ask about the SNB's monetary policy. Where necessary, the SNB also uses this network of contacts to discuss special topics.

Numerous central banks around the world also rely on regional networks to collect economic information from companies. They have gathered valuable experience using similar approaches. The US Federal Reserve's *Beige Book* – to name but one – is based on surveys from the various Federal Reserve Districts and has been used for decades as a reference source by financial market participants. 5

4 Cf. for example Eckersley and Webber (1997), Martin (2004), Ellis and Pike (2005), Kallum et al. (2005), Brekke and Halvorsen (2009), as well as Hokkanen et al. (2012).

4. RECORDING PERIODS, SAMPLE STRUCTURE AND COMPANY PROFILES

4.1. RECORDING PERIODS

As mentioned above, the SNB Governing Board conducts an in-depth economic assessment towards the end of each quarter in order to determine its monetary policy stance. Accordingly, four rounds of company talks are held annually by the SNB's delegates. It takes around seven weeks to conduct the talks, and they are completed two weeks before the monetary policy assessment.

4.2. SAMPLE STRUCTURE AND COMPANY PROFILES

In every round of company talks, the delegates conduct 30 interviews each. Thus, in any given quarter, roughly 240 talks across all the regions provide information. Only in the third quarter are the number of talks reduced to 208, as there are fewer company representatives available owing to holiday absences.

Company participation in the talks is voluntary. This notwithstanding, the response rate is very high, at over 90%. In the event of a talk being cancelled or postponed to another quarter, the delegates ask other companies of the same industry to supplement the information, thus ensuring that there is always a complete sample.

The confidentiality with which the SNB handles the information it receives is an important factor when it comes to being granted access to the companies and is the reason why participating companies are not named on a quarterly basis. However, each year, in the December issue of the *Quarterly Bulletin*, the SNB lists all the companies that took part in the talks in the course of the year and agreed to have their names published.

Special topics

Although the structure of the guidelines remains essentially unchanged from one quarter to the next, company talks are nevertheless a very flexible tool. Alongside the standard questions, there is also scope for addressing special topics and for discussing them in detail.

For instance, the effects of Swiss franc appreciation and company reactions were a point of focus on a number of occasions (2010, 2011 and 2015). Another special topic looked at the impact of the acceptance

of the mass immigration initiative (2014). In addition, by means of targeted talks, sales problems experienced by automotive companies and their suppliers in the wake of new testing standards in these industries were reviewed with the relevant representatives (2018).

Where time is of the essence, delegates also have the option to discuss special topics over the phone with company representatives. This method is used, for example, when trying to determine how the Christmas trade in retailing has progressed, as this needs to be done as promptly as possible.

⁵ Cf. Armesto et al. (2009).

The samples aim to reflect, in as representative a manner as possible, Switzerland's economic structure relative to the individual industries' shares of value added and employment. However, as non-market-oriented industries, the public sector and agriculture are not taken into consideration. The sample structure is determined using the four steps outlined below:

1) Industry selection: An industry is taken into account if its economic significance – measured in terms of GDP and employment ratios – exceeds an average of 1% or if the correlation between its value added and GDP growth is at least 0.5.7 Multi-year averages from the value added statistics and job statistics of the Swiss Federal Statistical Office (SFSO) are used for this evaluation.

Table 1

SAMPLE STRUCTURE BROKEN DOWN BY MAIN INDUSTRY

	Industry	%
Industry	Manufacture of basic metals	6
	Precision instruments, including watches and clocks	8
	Manufacture of machinery and equipment n.e.c., electrical equipment	8
	Manufacture of rubber/plastic/glass products	3
	Chemicals, pharmaceuticals	3
	Other manufacturing	8
	Construction	7
Service	Trade of motor vehicles	2
	Retail trade	4
	Wholesale trade	8
	Transportation, logistics, storage	5
	Hospitality	8
	IT, telecommunications	4
	Banks	6
	Insurance, other financial service activities	3
	Legal and accounting activities	7
	Rental and leasing activities, employment activities, travel agency activities	5
	Other services	5
	Total	100

These two steps produce a national structure with a number of prescribed visits per industry. This countrywide sample structure remains fixed from one quarter to the next. The percentage breakdown of the visits across the main industries is presented in table 1.

3) Regional breakdown: Based on the national structure, the number of company visits to be conducted for each industry are divided between the eight regions. For this purpose, information on the geographical distribution of companies per industry is taken from the SFSO's Business and Enterprise Register (BER). The company visits are allocated to the regions according to the number of companies in a given industry, i.e. the greater the relative significance of an industry in a region, the more company visits will be allotted to said industry. This means, for example, that companies from the pharmaceutical industry will not only be visited in Northwestern Switzerland, the region in which they are by far the most important industry, but also in other regions.

²⁾ Industry weighting: The SNB is interested in an indication of the aggregate economic fluctuations. For this reason, owing to the strength of their cyclical fluctuations – in other words, a value added with a particularly high or low correlation to GDP – certain industries are somewhat over or under-represented in the samples. Each quarter, a maximum of 20 company talks are conducted per industry. This ensures that the interviews are spread across as many different industries as possible.

⁶ Industry structure in accordance with the Swiss Federal Statistical Office's General Classification of Economic Activities (Noga 2008).

⁷ For example, in the current structure, the automotive industry is taken into account because its economic significance has reached around 2% in terms of its share of both GDP and employment. The textile and clothing industry, by contrast, with a GDP and employment share of less than 1%, is considered because the correlation between its value added and GDP comes in at around 0.7. Meanwhile, the publishing, programming and broadcasting industries do not fulfil either of the selection criteria and are therefore not included.

⁸ Over-represented industries (Noga category in brackets): Manufacture of textiles, apparel (13–15), Manufacture of rubber and plastics products, and other non-metallic mineral products (22–23), Manufacture of basic metals (24–25), Precision instruments, watches and clocks (26), Manufacture of machinery and equipment n.e.c. (28), Manufacture of furniture, other manufacturing (31–33), Food and beverage service activities (56).

Under-represented industries: Manufacture of food products (10–12), Manufacture of refined petroleum products, chemicals and chemical products (19–20), Retail trade (47), Warehousing and support activities for transportation (52), Human health activities (86), Creative, arts and entertainment activities (90–93), Activities of membership organisations (94–96).

⁹ Renamed in January 2019 as the Swiss Business Enterprise Register (SBER).

4) Company selection: Based on the eight regional structures, each delegate comes up with a specific selection of companies, using their own regional databases, built up over the years. Furthermore, using the BER, the SFSO randomly selects per region and quarter three companies from the set list of industries which are to be visited by the delegates. This introduces a certain element of randomness into the sample. These selections also allow the knowledge of the corporate landscape to be continually expanded. The companies considered for the sample generally have at least 50 employees. In some regions and industries, however, this rule of thumb needs to be treated rather flexibly, as there would otherwise not be enough companies to visit.

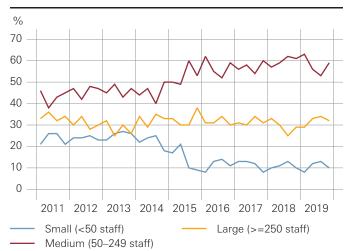
Chart I shows how the breakdown by company size has developed in the last few years. Over the course of time, less emphasis has been placed on smaller companies. Compared with the national corporate landscape, small companies are therefore considerably under-represented. Placing the focus on medium-sized and large companies is a necessary consequence of the limited sample. The chart also shows that the proportions of the three size categories fluctuate over time.

In contrast to the defined minimum size of a company, there is no explicit requirement regarding the proportion of export-oriented companies in the sample. These proportions come about as a result of the highly representative sample structure. Their fluctuations are only marginal over time. Chart 2 shows the average distribution of companies broken down by export share.

Another important feature of the SNB's company talks is that the selection of companies changes every quarter. This minimises the burden on individual companies. One part of the sample is based on companies that had been interviewed regularly in the past. However, no company is asked to participate more than once a year. The majority of recurring visits take place at an average interval of six quarters. There are also several first-time visits every quarter. In recent years, their proportion has fluctuated between 20% and 40%.

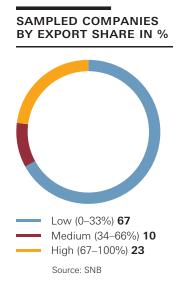
Chart 1

COMPANY TALKS BY SIZE CATEGORY



Source: SNB

Chart 2



CAPACITY UTILISATION



Current utilisation of technical capacity / business infrastructure compared to a normal level. A positive (negative) index value signals utilisation is higher (lower) than normal.

Source: SNB

5. EVALUATION AND PRESENTATION

The results of every company talk are recorded in electronic form. The subsequent evaluation is based not only on answers to the closed questions, but also on the textual information provided in response to the open questions and the comments.

For the closed questions, the answers are captured on a qualitative five-tier scale. They are subsequently allocated quantitative values. The numeric scale ranges from -2 to +2. The answers are converted into numeric form - for instance questions concerning capacity utilisation - as follows:

Disregarding specific seasonal factors, how do you assess the current utilisation of technical capacity/infrastructure?

 Substantial overutilisation 	\rightarrow Value: +2
 Slight overutilisation 	\rightarrow Value: +1
 Normal utilisation or nearly normal 	
utilisation	\rightarrow Value: 0
 Slight underutilisation 	\rightarrow Value: -1
 Substantial underutilisation 	\rightarrow Value: -2

The focus of the evaluation is on the overall national economic perspective. Quantitative information is aggregated by calculating the average of all answer values for each question in a particular industry. The values for the three main sectors 10 – services, manufacturing and construction – are also determined by taking the average of all the results from the corresponding industries. Taking the corresponding share of GDP represented by these sectors, these mean values can then be used to give a national index value.

This information can be presented as shown in chart 3. Using the example of capacity utilisation, the chart tracks the course of the answers' mean values over time for the economy as a whole. Positive and negative index values indicate a utilisation level that is either higher or lower than what the companies considered to be a normal level of utilisation.

The 'Business cycle signals' report published in the SNB's *Quarterly Bulletin* summarises the results of the company talks. In addition to the numeric evaluation, the report also includes anecdotal information – based on comments provided during the talks – which contributes to a better understanding of the overall picture.

¹⁰ Primarily developments in these main sectors are reported in the 'Business cycle signals' report. In addition, the analysis also looks at individual industries on a case-by-case basis.

6. CONCLUSION

The company talks conducted by the SNB's delegates for regional economic relations are based on a structured approach. This allows the information obtained to be combined into an overall picture of the Swiss economy and enables the numerous anecdotal elements to be taken into account.

Although the information collected by the delegates is, in contrast to official statistics, based on a comparatively small sample, it has the clear advantage of being available more promptly. Furthermore, the time series are not subject to revisions. The knowledge gained from the talks also allows informative cross-comparisons to be made with model-based economic analyses, which in turn helps either substantiate such analyses or put them into perspective.

From a monetary policy point of view, the company talks by the SNB's delegates thus represent a highly valuable tool for assessing the economic situation. Moreover, from an institutional standpoint, the talks make a significant contribution to the understanding of the SNB's tasks and activities.

Appendix: Bibliography

Armesto, Michelle T., Ruben Hernandez-Murillo, Michael T. Owyang and Jeremy Piger (2009), Measuring the Information Content of the Beige Book: A Mixed Data Sampling Approach, *Journal of Money, Credit and Banking*, 41 (1), pp. 35–55.

Brekke, Henriette and Kaj W. Halvorsen, (2009), Norges Bank's regional network: fresh and useful information, Norges Bank *Penger og Kreditt*, 2.

Eckersley, Phil, and Pamela Webber, (1997), The Bank's regional Agencies, Bank of England, *Quarterly Bulletin*, November.

Ellis, Colin and Tim Pike, (2005), Introducing the Agents' scores, Bank of England, *Quarterly Bulletin*, Winter.

Federal Reserve, *Beige Book*, cf. www.federalreserve.gov/monetarypolicy/beige-book-default.htm

Hokkanen, Jyry, Tore Melin and Alexander Nilson, (2012), The Riksbank's business survey – a quick indicator of economic activity, Sveriges Riksbank, *Economic Review*, 3.

Hunziker, Hans-Ueli and Attilio Zanetti, (2015), Die Delegierten der Nationalbank messen den Puls der Wirtschaft, *Die Volkswirtschaft*, 5.

Kallum, Jan-Reinert, Maja Björnstad Sjatil and Kjersti Haugland (2005), Norges Bank's regional network, Norges Bank, *Economic Bulletin*, Q3.

Martin, Monica, The Bank of Canada's Business Outlook Survey, (2004), Bank of Canada, *Review*, Spring.

Swiss Federal Statistical Office (SFSO) (2016), General Classification of Economic Activities (Noga), October.

Swiss Federal Statistical Office (SFSO), Full-time job equivalent per sector, various years.

Swiss Federal Statistical Office (SFSO), Marktwirtschaftliche Unternehmen nach Wirtschaftsabteilungen und Grössenklasse, various years.

Swiss Federal Statistical Office (SFSO), *Produktionskonto nach Branchen der volkswirtschaftlichen Gesamtrechnung*, various years.

Swiss Federal Statistical Office (SFSO), *Structural Business Statistics STATENT*, various years.

Swiss National Bank (2019), Business cycle signals, Swiss National Bank, *Quarterly Bulletin*, 4.

Chronicle of monetary events

The chronicle summarises the most recent monetary events. For events dating further back, please refer to SNB press releases and the *Annual Report* at www.snb.ch.

At its quarterly assessment of 12 December, the SNB leaves its policy rate and the interest rate on sight deposits with the SNB at -0.75%. The SNB reaffirms that it will remain active in the foreign exchange market, as necessary. In the SNB's view, the Swiss franc is highly valued, and the situation on the foreign exchange market is still fragile. Negative interest and the willingness to intervene serve to counteract the attractiveness of Swiss franc investments and thus ease pressure on the currency. In this way, the SNB stabilises price developments and supports economic activity.

December 2019

At its quarterly assessment of 19 September, the SNB leaves its policy rate and the interest rate on sight deposits with the SNB at -0.75%. The SNB also adjusts the basis for calculating negative interest, thereby raising the exemption threshold for the banking system and reducing negative interest income for the SNB. The SNB reaffirms that it will remain active in the foreign exchange market, as necessary. In the SNB's view, the Swiss franc is highly valued, and the situation on the foreign exchange market is still fragile. Negative interest and the willingness to intervene serve to counteract the attractiveness of Swiss franc investments and thus ease pressure on the currency. In this way, the SNB stabilises price developments and supports economic activity.

September 2019

At its quarterly assessment of 13 June, the SNB leaves the interest rate on sight deposits with the SNB at -0.75%. The SNB reaffirms that it will remain active in the foreign exchange market, as necessary. In the SNB's view, the Swiss franc is highly valued, and the situation on the foreign exchange market is still fragile. The negative interest rate and the SNB's willingness to intervene in the foreign exchange market as necessary are intended to keep the attractiveness of Swiss franc investments low and ease pressure on the currency. The expansionary monetary policy aims to stabilise price developments and support economic activity.

June 2019

On 13 June, the SNB introduces the SNB policy rate and announces that it will use this rate in taking and communicating its monetary policy decisions going forward. The SNB policy rate replaces the target range for the three-month Libor. Interest on sight deposits held by banks at the SNB currently corresponds to the SNB policy rate and remains at -0.75%. The SNB will seek to keep the secured short-term Swiss franc money market rates close to the SNB policy rate.

March 2019

At its quarterly assessment of 21 March, the SNB leaves the interest rate on sight deposits with the SNB at -0.75% and its target range for the three-month Libor at between -1.25% and -0.25%. The SNB reaffirms that it will remain active in the foreign exchange market, as necessary. In the SNB's view, the Swiss franc is highly valued, and the situation on the foreign exchange market is still fragile. The negative interest rate and the SNB's willingness to intervene in the foreign exchange market as necessary are intended to keep the attractiveness of Swiss franc investments low and ease pressure on the currency. The expansionary monetary policy aims to stabilise price developments and support economic activity.

December 2018

At its quarterly assessment of 13 December, the SNB leaves the interest rate on sight deposits with the SNB at -0.75% and its target range for the three-month Libor at between -1.25% and -0.25%. The SNB reaffirms that it will remain active in the foreign exchange market, as necessary. In the SNB's view, the Swiss franc is highly valued, and the situation on the foreign exchange market is still fragile. The negative interest rate and the SNB's willingness to intervene in the foreign exchange market as necessary are intended to keep the attractiveness of Swiss franc investments low and ease pressure on the currency. The expansionary monetary policy aims to stabilise price developments and support economic activity.

Published by

Swiss National Bank Economic Affairs Börsenstrasse 15 P.O. Box CH-8022 Zurich

Design

Interbrand Ltd, Zurich

Typeset by

Neidhart + Schön Group AG, Zurich

Language versions:

The *Quarterly Bulletin* is available in printed form in German (ISSN 1423-3789), French (ISSN 1423-3797) and Italian (ISSN 2504-3544), either as single copies or on subscription, from: Swiss National Bank, Library P.O. Box, CH-8022 Zurich Telephone +41 58 631 11 50 Fax +41 58 631 50 48 Email: library@snb.ch

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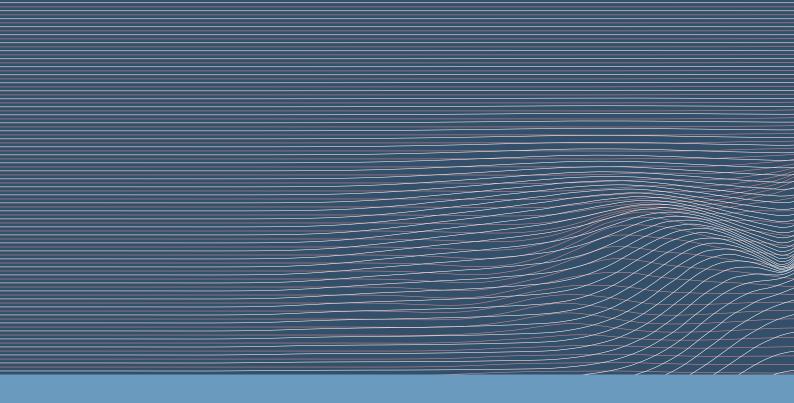
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