



REPORT ON THE SLOVAK ECONOMY

SEPTEMBER 2018

Published by: © Národná banka Slovenska

Address: Národná banka Slovenska Imricha Karvaša 1, 813 25 Bratislava Slovakia

Contact: info@nbs.sk

http://www.nbs.sk

Discussed by the NBS Bank Board on 25 September 2018.

All rights reserved. Reproduction for educational and non-commercial purposes is permitted provided that the source is acknowledged.

ISSN 1339-9594 (online)



CONTENTS

1	SUMMARY	5	Chart 9	Household consumption –	
2	CDOSS DOMESTIC PRODUCT	_		contributions to annual percentage	
2	GROSS DOMESTIC PRODUCT	6	Clarat 10	changes GDP – contributions to annual	9
3	THE LABOUR MARKET	11	Chart 10	percentage changes	9
3.1	Wages and labour productivity	11	Chart 11	Households' real disposable income	
3.2	Employment and unemployment	13	Chart II	- contributions of selected factors	
3.2	Employment and unemployment	13		to annual percentage changes	9
4	PRICE DEVELOPMENTS	15	Chart 12	Wage levels in the main sectors of	9
•	TRICE DEVELOT MENTS	13	Chart 12	the economy	11
LISTO	FTABLES		Chart 13	Average wage components	11
Table 1	GDP by expenditure	7		Irregular bonuses paid in the Slovak	
Table 2	Wages and labour productivity	12	Chartin	economy	11
Table 3	Annual percentage changes		Chart 15	Factors determining wage growth	12
	in consumer price inflation by			Average wage growth – contributions	
	component	15		of wage components to average	
	•			percentage changes	12
LIST O	F CHARTS		Chart 17	Wages and labour productivity	13
Chart 1	GDP and its components	6		Labour costs in the economy	13
Chart 2	GDP and its components	6	Chart 19	Employment –sectoral contributions	
Chart 3	GDP – sectoral contributions to			to quarter-on-quarter percentage	
	annual percentage changes	7		changes	14
Chart 4	Number and average price of		Chart 20	Perceived labour shortages broken	
	exported passenger cars	7		down by sector	14
Chart 5	Investment in manufacture of		Chart 21	Employment – contributions of	
	motor vehicles	8		principal labour market variables	
Chart 6	Changes in investment and			to quarter-on-quarter changes	14
	inventories	8	Chart 22	Contributions of components to	
Chart 7	Fixed investment – sectoral			annual HICP inflation	15
	contributions to quarter-on-quarter		Chart 23	Components of HICP inflation	15
	percentage changes	8			
Chart 8	Fixed investment – contributions				
	of assets to quarter-on-quarter				
	percentage changes	8			



ABBREVIATIONS

CPI consumer price index

EA euro area

ECB European Central Bank
EC European Commission
EMEs emerging market economies
EONIA euro overnight index average
ESA 2010 European System of Accounts 2010

ESI Economic Sentiment Indicator (European Commission)

EU European Union

EUR euro

EURIBOR euro interbank offered rate

Eurostat statistical office of the European Union

FDI foreign direct investment GDP gross domestic product

GNDI gross national disposable income

GNI gross national income

HICP Harmonised Index of Consumer Prices

IMF International Monetary Fund
MFI monetary financial institutions

MF SR Ministry of Finance of the Slovak Republic

MMF money market fund

MTF NBS's Medium-Term Forecast (published on a quarterly basis)

NACE Statistical Classification of Economic Activities in the European Community (Rev. 2)

NARKS National Association of Real Estate Offices of Slovakia

NBS Národná banka Slovenska
NEER nominal effective exchange rate
NFC non-financial corporation

NPISHs non-profit institutions serving households

OECD Organisation for Economic Co-operation and Development

p.a. per annum p.p. percentage point

PMI Purchasing Managers' Index REER real effective exchange rate

SASS Slovenská asociácia správcovských spoločností – Slovak Association of Asset

Management Companies

SME small and medium-sized enterprise
SO SR Statistical Office of the Slovak Republic

ULC unit labour costs

ÚPSVR Ústredie práce, sociálnych vecí a rodiny – Central Office of Labour, Social Affairs and

Family

ÚRSO Úrad pre reguláciu sieťových odvetví – Regulatory Office for Network Industries

USD US dollar VAT value-added tax

Symbols used in the tables

- . Data are not yet available.
- Data do not exist / data are not applicable.
- (p) Preliminary data





1 SUMMARY

Slovakia's economic growth accelerated in the second quarter of 2018 to 4.2%, year on year, from 3.6% in the previous quarter. The quarter-on-quarter rate of growth reached 1.1%. The main driver of GDP growth was the ongoing rapid increase in investment activity.

Employment growth remained strong in the quarter under review, reaching 2.1% year on year (compared with 2.2% in the previous quarter) and 0.5% quarter on quarter. The highest job

growth was in the sectors of business activities, manufacturing and services. The average wage in the economy increased by 6.4%, year on year, in the second quarter (6.5% in the first quarter). Wage growth was robust in both the private and public sectors.

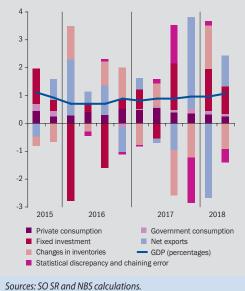
The annual HICP inflation rate continued to accelerate in the second quarter, to 2.9%, largely owing to the continuing increase in energy price inflation.

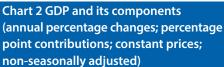


2 Gross domestic product

Slovakia's annual GDP growth increased from 3.6% in the first guarter of 2018 to 4.2% in the second quarter.1 This represented, in real terms,

Chart 1 GDP and its components (quarter-on-quarter percentage changes; percentage point contributions; constant prices)







the most rapid year-on-year growth since the end of 2015. In quarter-on-quarter terms, the economy expanded by 1.1% after seasonal adjustment. As prices continued to rise, nominal GDP growth also accelerated. GDP at current prices increased by 6.8%, year on year, in the second quarter (after rising by 5.8% in the first quarter), which was its largest increase since the end of 2010.

The main driver of annual GDP growth in the second quarter was investment, primarily investment in the automotive industry. Fixed investment at constant prices recorded year-on-year growth of 20.4%, up from 12.5% in the previous quarter. This was its largest increase since the end of 2015, when it rose by 23% amid heavy absorption of EU funds. Investment in manufacture of motor vehicles increased, year on year, by 345% (at current prices) and amounted to €1.2 billion. After its year-and-a-half stable upward trend, real private consumption growth slowed in the second quarter, to 2.2% year on year (from 3.5% in the first quarter). For the first time in two years, private consumption growth was exceeded by government consumption growth, which stood at 2.5% (3.1% in the first quarter). Total exports and imports increased markedly in the second quarter, with exports rising by 8% (2.4% in the first quarter) and imports by 7.8% (3.2%).

Second-quarter GDP calculated on the basis of its expenditure components was higher than GDP calculated using the production approach. Since the production approach is the primary method for determining GDP, a negative statistical discrepancy was applied to the expenditure side. The statistical discrepancy in the second quarter may reflect time differences in the accounting carried out on the two sides of the GDP calculation, resulting from longer-term investment construction. On the production side, producers recorded their outputs over a longer period, while on the expenditure side, investments may have been recorded as one-off factors.

Accelerated growth in value added was recorded in the manufacturing industry and in professional, scientific and technical services. Value added growth in the processing industry was at

¹ The SO SR's flash estimate for August was 4.1%.





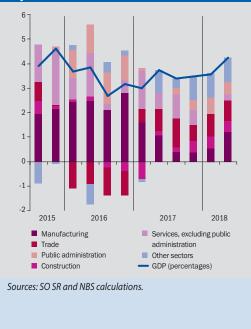
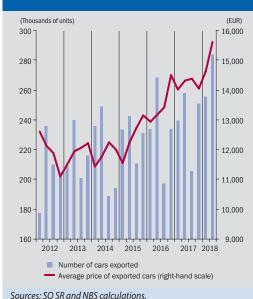


Chart 4 Number and average price of exported passenger cars (quarter-on-quarter changes)



Note: Average of car prices recorded after cars' delivery to the Slovak border, including the transaction prices for the cars and related services (transport, insurance, reloading, storage, etc.).

its highest level for five quarters and was greatly strengthened by the production and exports of new car models in the automotive industry (since the end of the first quarter). Foreign trade figures show that both the number and average price of exported cars increased in the period under review, which may imply a rise in the value added ratio of Slovakia's automotive industry.

The seasonally adjusted quarter-on-quarter rate of economic growth reached 1.1% in the period under review and comprised almost equal contributions from net exports and investment. Exports of goods and services increased by 2.7%

quarter on quarter, and thus more than offset the decline recorded at the beginning of the year (1.5%). Imports of goods and services grew at a slower pace than exports (1.6%, compared with 1.2% at the beginning of the year).

After its strong quarter-on-quarter growth in the first quarter (6.9%), fixed investment continued to increase in the second quarter, by 4.3%. Investment was concentrated in infrastructure construction in the manufacturing industry, whereas in the previous quarter it was spread across all types of assets. Besides the automotive industry, the government sector also recorded strong growth in investment spending.

Table 1 GDP by expenditure (percentage changes compared with the previous period, constant prices)

			2018				
	Q1	Q2	Q3	Q4	Year	Q1	Q2
Gross domestic product	0.8	0.9	0.9	0.9	3.4	1.0	1.1
Final consumption of households and non-profit institutions serving households	1.0	1.1	0.8	0.7	3.6	0.7	0.5
Final consumption of general government	0.1	0.4	0.4	1.0	0.2	0.5	0.4
Gross fixed capital formation	3.4	-2.6	8.0	0.0	3.2	6.9	4.3
Exports of goods and services	1.6	-2.7	2.2	4.5	4.3	-1.5	2.7
Imports of goods and services	1.3	-2.8	3.4	1.3	3.9	1.2	1.6
Source: SO SR.							



Chart 5 Investment in manufacture of motor vehicles (current prices; non-seasonally adjusted)

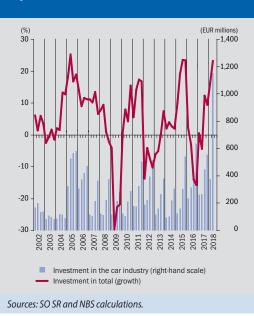


Chart 7 Fixed investment – sectoral contributions to quarter-on-quarter percentage changes (percentage points; current prices; non-seasonally adjusted)

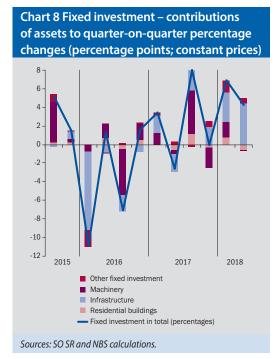


Investment has been marked by higher volatility since the beginning of 2016. The growth and volatility in investment can be attributed to man-

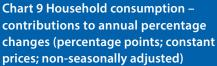
ufacture of motor vehicles, as a result of which the sector's share in total investment increased in the period under review, from 10% to 23%.

Chart 6 Changes in investment and









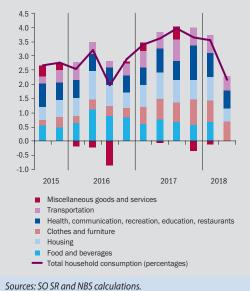
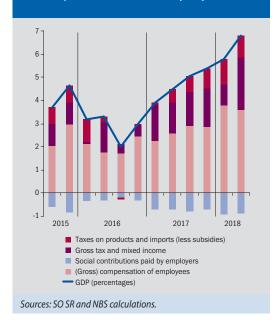


Chart 10 GDP – contributions to annual percentage changes (percentage points; current prices; non-seasonally adjusted)

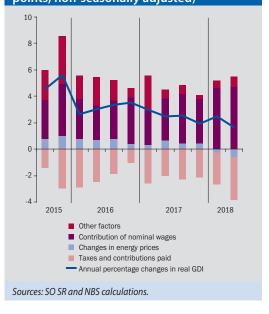


Despite rising employment and wages, private consumption growth weakened unexpectedly in the second quarter of 2018, falling to 2.2% year on year, from 3.5% in the first quarter. This slowdown of 1.4 percentage points (based on unrounded data) was more pronounced than that in any neighbouring country, including the Czech Republic (0.3 percentage point) and Hungary (0.6 percentage point). In Slovakia, half of the slowdown stemmed from a drop in food and beverage consumption.

Household food purchases increased only at current prices, and only to the extent that covered the rise in food prices. The reduction in food purchases was probably associated in part with the concentration of pre-Easter purchases in the previous quarter. Food purchases increased in nominal terms in the first quarter and then corrected in the second quarter; the correction, however, was non-standard, given the exceptional fact that food consumption contributed negatively to consumption growth.

In seasonally adjusted quarter-on-quarter terms, private consumption growth was 0.5% in the second quarter of 2018 (down from 0.7% in the previous quarter).

Chart 11 Households' real disposable income – contributions of selected factors to annual percentage changes (percentage points; non-seasonally adjusted)



Looking at GDP at current prices as calculated using the income approach, the acceleration of GDP growth in the second quarter was reflected in the growth rates for gross profits and mixed income. Employee compensation growth in the



CHAPTER 2

domestic sector, after being boosted by rising GDP growth in the first quarter, moderated in the second quarter.

Year-on-year growth in compensation of employees for all sectors in total, including Slovak residents working abroad (recorded in the household account), remained virtually unchanged in the first half of the year (at 8.5% in the first quarter and 8.6% in the second quarter). These relatively high growth rates, however, were not reflected in households' disposable

income growth, most of which (as in previous quarters) was allocated to social contributions. In nominal terms, the rate of disposable income growth slowed, from 5% in the first quarter to 4.6% in the second quarter. The nominal slowdown took place amid accelerating consumer prices. Adjusted for inflation, real disposable income growth slowed more sharply, from 2.5% in the first quarter to 1.7% in the second quarter. The drop in disposable income growth, accompanied by the slowdown in consumption, did not have a significant impact on the saving ratio.

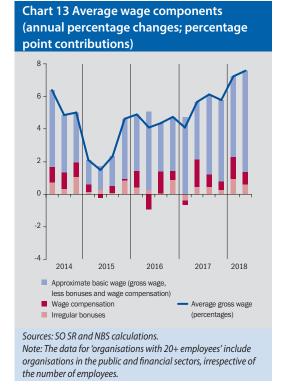


3 THE LABOUR MARKET

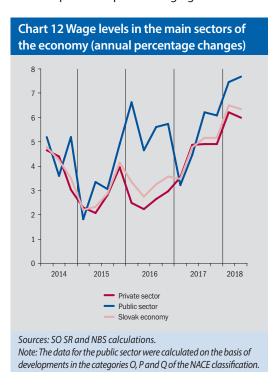
3.1 WAGES AND LABOUR PRODUCTIVITY

Annual average wage growth in Slovakia edged down to 6.4% in the second quarter of 2018, from 6.5% in the first quarter. Wage growth increased in industry, wholesale trade, retail trade, motor vehicle repair services, and construction. The public sector, too, saw robust wage growth, mainly in education (with an increase in irregular bonuses) and healthcare services. Annual wage growth in the public sector in the second quarter was 7.7% (7.5% in the first quarter), reflecting a rise of 4.8% in the contractual wages of government and public service employees since 1 January 2018. On the other hand, wage growth fell in services, mainly in transportation and storage, in accommodation and food service activities, and in real estate activities. Adjusted for inflation, real wages increased year on year by 3.5%.

Wage growth was also stimulated by a statutory increase in wage premia for work performed at night, on public holidays or at weekends; on the other hand, it was dampened by the fact that irregular bonus payments were lower compared with the previous quarter. Wage growth contin-



ued to be supported by wage increases in larger organisations. Smaller firms, those with up to 19 employees, lagged far behind this group as they



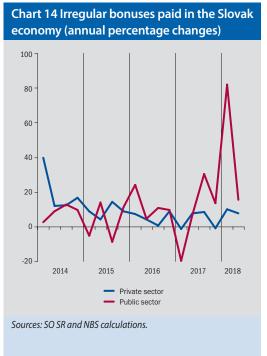




Table 2 Wages and labour productivity (annual percentage changes)									
			2018						
	Q1	Q2	Q3	Q4	Q1-Q4	Q1	Q2		
Average wage (headline)	3.5	4.8	5.2	5.2	4.6	6.5	6.4		
Consumer price inflation	0.9	1.0	1.5	1.8	1.3	2.3	2.8		
Average real wage (headline)	2.6	3.8	3.6	3.3	3.3	4.1	3.5		
Average wage (ESA 2010)	2.6	3.7	4.6	3.7	3.7	6.4	6.2		
Compensation per employee (ESA 2010)	3.1	4.0	5.0	3.9	4.1	6.4	6.4		
Nominal labour productivity (ESA 2010)	1.8	2.3	2.6	3.1	2.5	3.5	4.5		
Real labour productivity (ESA 2010)	0.9	1.6	1.0	1.2	1.2	1.3	2.1		

Sources: SO SR and NBS calculations.

Note: Average wages (headline) are based on data from SO SR statistical reports. Average real wages were calculated on the basis of CPI inflation. Labour productivity (ESA 2010) was calculated as the ratio of nominal GDP to employment as defined in the ESA 2010 methodology.

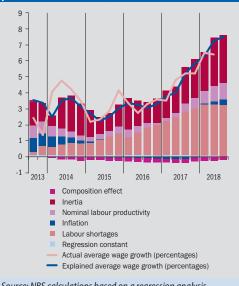
recorded average wage growth of 2.9% year on year.

Compensation per employee (including gross wages and social contributions paid by employers) continued to grow in the second quarter of 2018, at the same pace as in the previous quarter (6.4% year on year). Social contributions paid

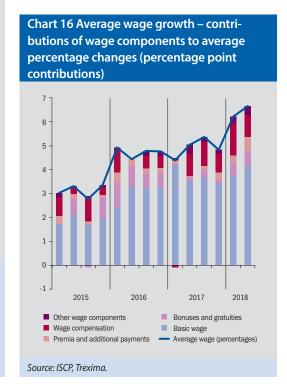
by employers increased, similarly as in the first quarter, by a substantial 9.7%, probably owing to the cancellation of a tax-deductible item from health insurance.

Wage growth in the period under review was influenced by rising demand for labour, which was reflected in the growing number of job vacancies and in the perceived shortage of job seekers qualified to fill them. In nominal terms, labour productivity growth lagged behind wage growth throughout the period. This may

Chart 15 Factors determining wage growth (annual percentage changes; percentage point contributions)



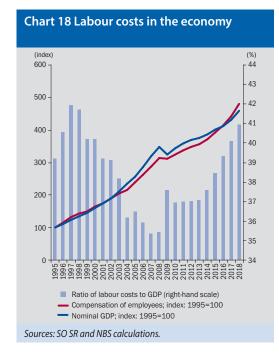
Source: NBS calculations based on a regression analysis. Note: The following variables have been transformed: the four-quarter moving average of labour productivity growth; the four-quarter moving average of CPI inflation recorded three quarters earlier. The figures for labour shortages are based on responses to the European Commission's business sentiment surveys, with the sectors weighted by employment trends. The composition effect is given by the impact of annual employment growth. The data for the third quarter of 2018 are based on NBS's MTF-2018Q3 forecast.







Notes: Wages are based on data from SO SR statistical reports. Nominal labour productivity was calculated from employment according to SO SR statistical reports. Base indices are based on seasonally adjusted data.



gradually exert cost-push pressures on price levels. Average wage growth in the second quarter (amounting to 0.3 percentage point) was positively influenced by wage premia for work performed at night, on public holidays and at weekends,² which started to be paid in May 2018. Their influence, however, differed markedly depending on the specific employer's field of business.

3.2 EMPLOYMENT AND UNEMPLOYMENT

The annual rate of employment growth slowed slightly in the second quarter of 2018, to 2.1% (from 2.2% in the previous quarter). In seasonally adjusted terms, the quarter-on-quarter rate of employment growth maintained its rising trend from the first quarter, reaching 0.5%.

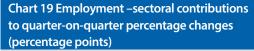
Broken down by sector, employment growth was driven largely by employment in business activities, which rose during the period under review by 0.7% quarter on quarter. Employment in industry maintained its long-running strong growth trend. In quarter-on-quarter terms, the services sector recorded a marked rise in employment (after a fall in the first quarter). On the other hand, employment in construction and in public administration and defence corrected after its above-average rise in the previous period. While there was a marked increase in the number of employees, the number of self-employed persons decreased.

As a result of strong demand for labour, coupled with supply-side constraints (shrinkage of the working-age population, the very small number of unemployed persons), the number of job vacancies reached a historical high of roughly 80,000³ in the period under review. If these job vacancies were filled (e.g. by foreigners, economically inactive persons), the country's GDP would increase by approximately 1.3%.⁴

Employment growth over the last two years has been only partly reflected in the number of hours worked. In the second quarter of 2018, the increase in the number of hours worked, quarter on quarter, was 0.2 percentage point lower than employment growth. This difference may be partly explained by the fact that some retail chains reduced their opening hours, with a resulting quarter-on-quarter drop in the number of hours worked in business activities.

- 2 Source: ISCP, Trexima.
- 3 Source: ÚPSVR, average figure for the first half of 2018.
- 4 The potential increase in GDP resulting from the filling of job vacancies was estimated by calculating new hire costs. It was assumed that a new employee receives a salary amounting to 88% of the average salary at the employer (source: EU-SILC microdata) and that employees are paid the value of their marginal product. This enabled the calculation of the amount of the increase in GDP (and contribution to GDP) that would occur if current job vacancies were all filled.





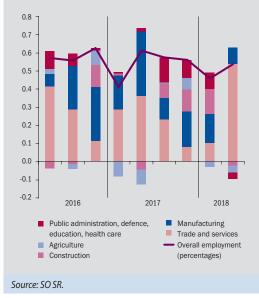
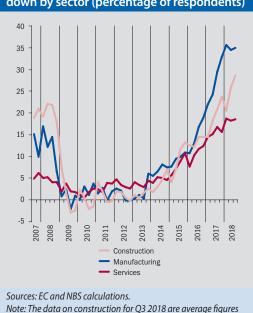


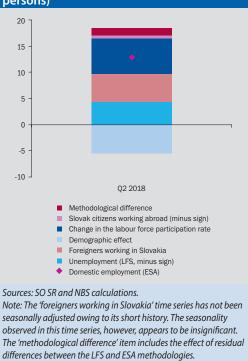
Chart 20 Perceived labour shortages broken down by sector (percentage of respondents)



for July and August 2018.

According to the Labour Force Survey (LFS), the number of unemployed continued to decrease in the second quarter of 2018, but at a slower pace than in previous quarters. The seasonally adjusted number of unemployed dropped by 4,400 persons quarter on quarter. The unemployment rate fell by 0.2 percentage point, to 6.9%. Employers were therefore able to meet some of their labour demand by recruiting unemployed people. Employment growth was also supported by increases in the number of foreign workers, in the number of Slovak citizens returning from employment abroad, and in rising labour force participation.

Chart 21 Employment – contributions of principal labour market variables to quarter-on-quarter changes (thousands of persons)





4 PRICE DEVELOPMENTS

Annual HICP inflation increased in the second quarter of 2018, to 2.9%, owing mainly to increases in vehicle fuel prices in April and May. Demand-pull inflation accelerated, too. The increase in petrol/diesel prices was a result of the continuing rise in global oil prices, which with a minimal lag also put upward pressure on oil derivative prices. Thus, energy prices were the main factor behind the acceleration of inflation in the quarter under review. Given that energy commodity prices increased during the first half of the year, household electricity and gas prices are also expected to increase in 2019.

The acceleration of demand-pull inflation (from 1.9% to 2.3%) was caused by increases in non-energy industrial goods prices and services prices. As for industrial goods, the rates of increase in prices of footwear, pharmaceuticals, furniture and household appliances increased in the period under review. Real household income growth was therefore reflected in rising prices of non-durable and semi-durable goods. Services prices continued to rise as a result of demand-pull and cost-push pressures from the labour market. In particular in April, the increase in services inflation also stemmed from

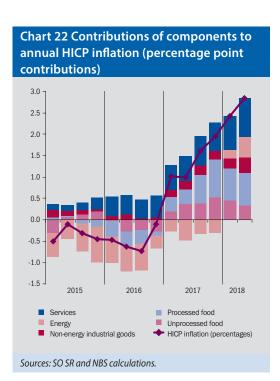




Table 3 Annual percentage changes in consumer price inflation by component										
			2018							
	Q1	Q2	Q3	Q4	Q1-Q4	Q1	Q2			
HICP inflation	1.0	1.0	1.6	2.0	1.4	2.4	2.9			
Unprocessed food	2.1	4.0	4.4	6.3	4.2	5.8	4.6			
Processed food	2.0	2.0	3.8	5.1	3.2	4.2	4.4			
Non-energy industrial goods	0.5	0.7	0.8	0.7	0.7	0.8	1.2			
Energy	-1.9	-3.4	-2.4	-2.2	-2.5	1.4	3.3			
Services	1.8	1.8	2.1	2.1	2.0	2.5	2.9			
Sources: SO SR and NBS calculations.										



CHAPTER 4

rising prices of air tickets for flights to foreign destinations.

Food price inflation slowed slightly in the period under review, partly due to the earlier than usual onset of warm weather this year and consequent moderation of fruit price inflation. This base effect is expected to fully pass through to food prices in the next two quarters. Food inflation is expected to ease considerably and thus contribute to the slowdown in headline inflation in the third and fourth quarters of 2018.