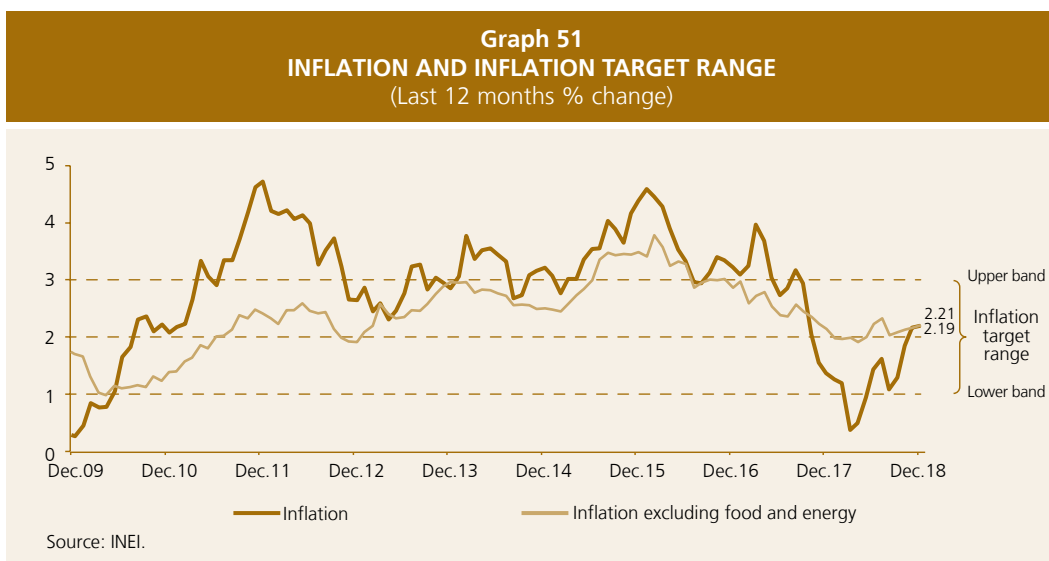


INFLATION IV

In 2018, annual inflation, measured by the variation in the consumer price index (CPI) of Metropolitan Lima, was 2.19 percent. This value was close to the midpoint of the target range (1 - 3 percent) in a context in which economic activity remained below its potential and inflation expectations were anchored within the inflation target range.

Inflation remained within the target range during most of the year. However, it was temporarily below the lower level of the target range between the months of March and May of 2018 as a result of a base effect associated with the impact of El Niño Costero event of 2017. This fact was observed basically due to the evolution of food prices, which went from showing an increase of 0.3 percent in December 2017 to showing a decline of 2.6 percent in March, increasing thereafter to 2.0 percent in December 2018. The inflation indicator excluding these components is therefore a better indicator of the inflationary trend. This indicator continued to remain around the center of the target, growing slightly from 2.15 percent in 2017 to 2.21 percent in 2018.



Graph 52
CONTRIBUTIONS TO ANNUAL CPI VARIATION
(% points)

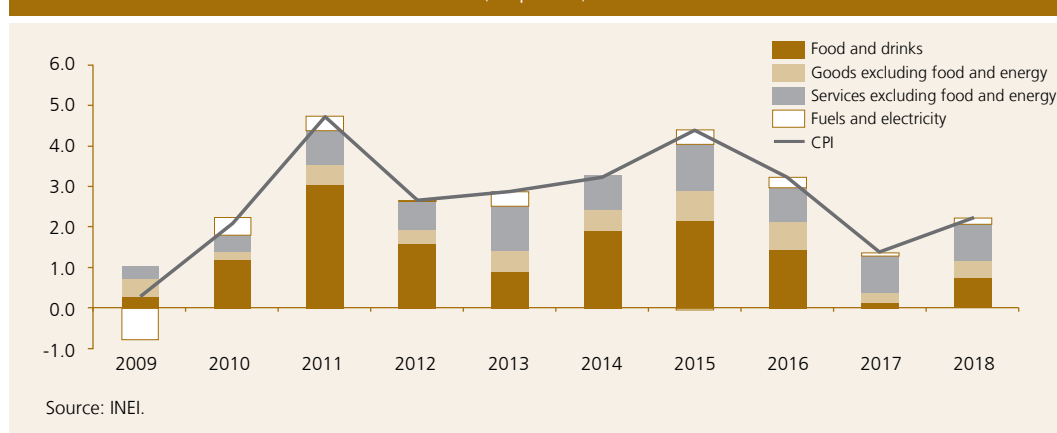


Table 59
INFLATION
(% change)

	Weight	2016	2017	2018	Average % chg. 2002-2018 1/
CPI	100.0	3.23	1.36	2.19	2.79
1. CPI excluding food and energy	56.4	2.87	2.15	2.21	2.17
a. Goods	21.7	3.41	1.24	2.25	1.83
Textiles and footwear	5.5	1.71	1.53	0.92	2.16
Domestic appliances	1.3	0.54	0.89	1.32	-0.34
Other industrial products	14.9	4.29	1.16	2.83	1.80
b. Services	34.8	2.54	2.70	2.19	2.44
<i>Of which:</i>					
Education	9.1	4.96	4.58	4.73	4.08
Rent	2.4	1.79	0.38	1.27	0.59
Health	1.1	5.00	1.83	1.76	2.90
Transportation	8.9	1.67	1.38	1.09	2.58
Water rates	1.6	0.00	13.04	0.00	4.71
2. Food and energy	43.6	3.66	0.46	2.17	3.42
a. Food and beverages	37.8	3.54	0.31	1.95	3.39
<i>Of which:</i>					
Chicken meat	3.0	3.17	-4.83	-1.32	1.94
Bread	1.9	0.76	0.87	0.94	3.68
Rice	1.9	1.62	2.11	-0.23	1.67
Sugar	0.5	10.03	-3.67	-11.45	2.00
Noodles	0.5	1.28	0.71	2.54	2.44
Oils	0.5	2.24	4.84	-2.10	3.28
Potatoes	0.9	1.75	-38.99	27.16	4.52
Fresh and frozen fish	0.7	9.92	-7.23	-5.95	2.76
Meals outside the home	11.7	4.61	3.65	2.19	3.77
b. Fuels and electricity	5.7	4.48	1.55	3.67	3.63
Fuels	2.8	0.61	3.95	5.35	3.45
Gasoline and lubricants	1.3	-1.13	5.05	7.75	2.91
Gas	1.4	1.64	3.08	3.28	2.18
Electricity	2.9	7.53	-0.21	2.39	3.11

1/ Inflation Targeting since 2002.
Source: INEI.

The item that had the highest incidence in year-on-year inflation was tuition and education fees (0.49 percentage points) since these prices were adjusted in private schools, private universities,

and higher education institutes at the beginning of the school year. The item that ranked second in terms of its contribution to inflation was meals outside the home, with 0.3 percentage points. It should be pointed out, however, that the price increase in this item category has been the lowest seen in the last 10 years. On the other hand, the high contribution to annual inflation of items such as vehicles, soft drinks, and cigarettes, reflected the increase in the excise tax, whereas in the cases of other goods, such as potatoes and onions, it was explained by lower cultivation. These increases were offset in part by the drop in the prices of eggs, sugar, telephone rates, fish, and chicken.

Table 60
ITEMS WITH THE HIGHEST WEIGHTED CONTRIBUTION TO INFLATION: 2018

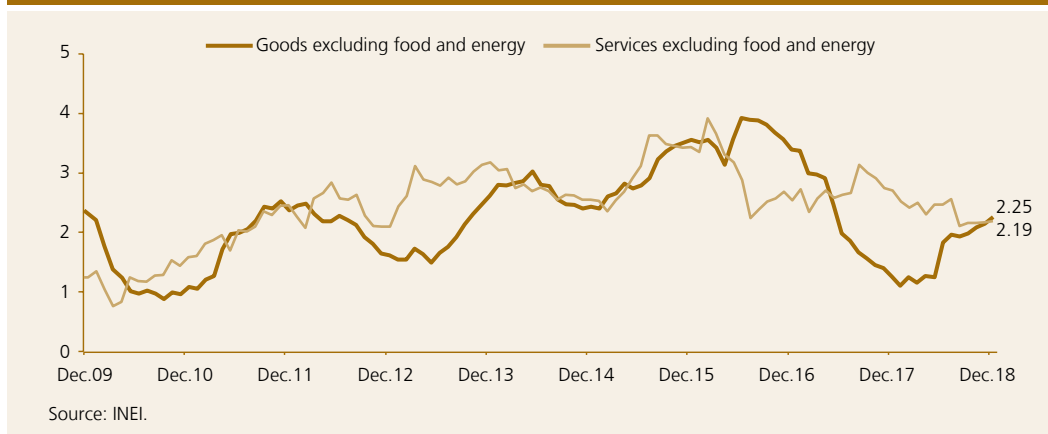
Positive contribution	Weight	% chg.	Contribution	Negative contribution	Weight	% chg.	Contribution
Education costs (tuition and fees)	8.8	4.9	0.49	Eggs	0.6	-18.9	-0.10
Meals outside the home	11.7	2.2	0.30	Sugar	0.5	-11.4	-0.07
Potatoes	0.9	27.2	0.21	Telephone rates	2.9	-2.9	-0.05
Car prices	1.6	12.2	0.19	Fresh and frozen fish	0.7	-6.0	-0.04
Onions	0.4	54.3	0.17	Poultry meat	3.0	-1.3	-0.04
Gasoline and lubricants	1.3	7.7	0.09	Bananas	0.3	-7.8	-0.03
Urban fares	8.5	1.0	0.08	Other beans	0.2	-7.8	-0.02
Electricity rates	2.9	2.4	0.08	Tangerines	0.2	-5.8	-0.01
Carbonated beverages	1.3	5.1	0.07	Other dairy products	0.4	-3.1	-0.01
Cigarettes	0.1	21.3	0.05	Beans	0.1	-6.9	-0.01
Total			1.73	Total			-0.38

Source: INEI.

1. Inflation Excluding Food and Energy

Inflation excluding food and energy, indicator reflecting trend inflation, was within the target range in 2018. The goods component rose from 1.2 percent in 2017 to 2.3 percent in 2018 due mostly to the increase in the prices of vehicles. On the other hand, the services component showed a lower growth rate, declining from 2.7 percent in 2017 to 2.2 percent in 2018, this result being mainly explained by the reduction of telephone rates.

Graph 53
PRICE CHANGE OF GOODS AND SERVICES EXCLUDING FOOD AND ENERGY PRICES
(Last 12 months % change)



Source: INEI.



Goods

The highest price increases registered in the goods component were observed in cigarettes (21.3 percent) and vehicles (12.2 percent), these increases being associated with the rise in the excise tax and the increase of the exchange rate in the year (3.6 percent).

The excise tax on blond and black tobacco cigarettes was raised in May from S/ 0.18 to S/ 0.27 soles, while the excise tax on gasoline-powered cars was raised from 0 to 10 percent and the excise car on oil-powered cars from 30 to 40 percent.

Services

The reduction in **telephone service rates** (-2.9 percent) stands out in 2018. This reduction was due to the price regulation by productivity factor regime that was applied to fixed telephony services in June, as well as to other measures, such as the reduction of the rates for calls from land lines to mobile phones, approved by Osiptel, the regulating body, in March.

Urban fares, which includes the prices charged for transport services provided by buses, minibuses, taxis and motor taxis, showed an increase of 1.0 percent. This lower increase than those observed in previous years (1.4 percent in 2017, 1.9 percent in 2016, and 2.9 percent in 2015) is explained by the strong competition existing in this sector.

The price of **education –tuition and education fees–** increased 4.9 percent, showing a slightly higher increase than in 2017 (4.7 percent). Price increases were observed at the beginning of the school year in private schools (7.2 percent), private universities (3.6 percent), and higher education institutes (1.9 percent).

2. Food and Energy Prices

The prices of food and energy, whose variations are mainly associated with supply factors, showed a volatile behavior during 2018. On the one hand, the increase in the prices of potatoes and onions was noteworthy due to lower cultivation in the supplier regions and, on the other hand, the prices of chicken, sugar, eggs, and fish decreased due to a greater supply. In addition to this, electricity rates and fuel prices were raised. As a result, food and energy inflation rose from 0.46 percent in 2017 to 2.17 percent in 2018.

Foodstuffs

Potatoes and **onions** were among the products with the highest weighted contribution to inflation in 2018.

The price of **potatoes** increased 27.2 percent, mainly due to the lower supply of potatoes from Huánuco to Metropolitan Lima. Cultivation in that region –one of the main suppliers of potatoes– decreased 9 percent in the August 2017-July 2018 crop year compared to the previous year. On the other hand, the price of **onions** increased 54.3 percent because plantings in Arequipa –the largest onion-producing region– decreased 12 percent in the same period. It is worth mentioning that the lower prices registered in the previous crop year influenced decisions of lower cultivation of these two crops.

These increases were partially offset by the lower prices of **eggs, sugar and chicken meat** given the greater supply of these goods. Egg production grew 8 percent compared to 2017, while sugar production grew 9.5 percent in the same period. As for chicken meat, placements of baby chicken in 2018 grew 8.1 percent with respect to the previous year.

Energy

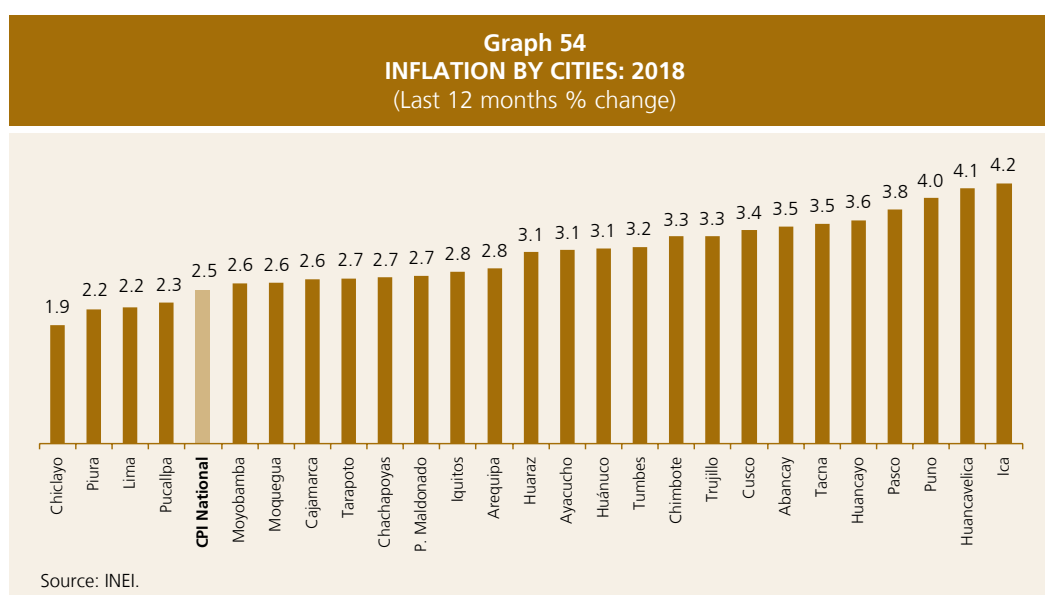
The increases in **electricity rates** are mainly explained by the updating of the costs of the generation and distribution components, which were affected by variables such as the exchange rate and the wholesale price index, as well as by the review of tolls and unit charges included in transmission costs and the costs of the commercial start-up of transmission lines.

The rise in the prices of **gasoline and lubricants** reflected the higher margins of local refineries and retail distribution. Another factor that also contributed to this was the increase of the excise tax on fuels in the month of May, which burdened the prices of the most polluting fuels (diesel and low octane gasoline).

3. Domestic Inflation

In 2018, domestic inflation showed a rate of 2.48 percent, a higher rate than in 2017 (when inflation registered 1.50 percent, the lowest inflation rate observed since 2009). This strong difference is mainly explained by the fact that the prices of some agricultural foodstuffs decreased in 2017 due to the reversal of the supply shocks originated mainly by weather alterations in 2016. Moreover, inflation excluding food and energy at the national level registered 2.4 percent in 2018, a similar rate to that recorded in 2017. With these results, inflation at the national level continues to come close to the inflation level of Lima.

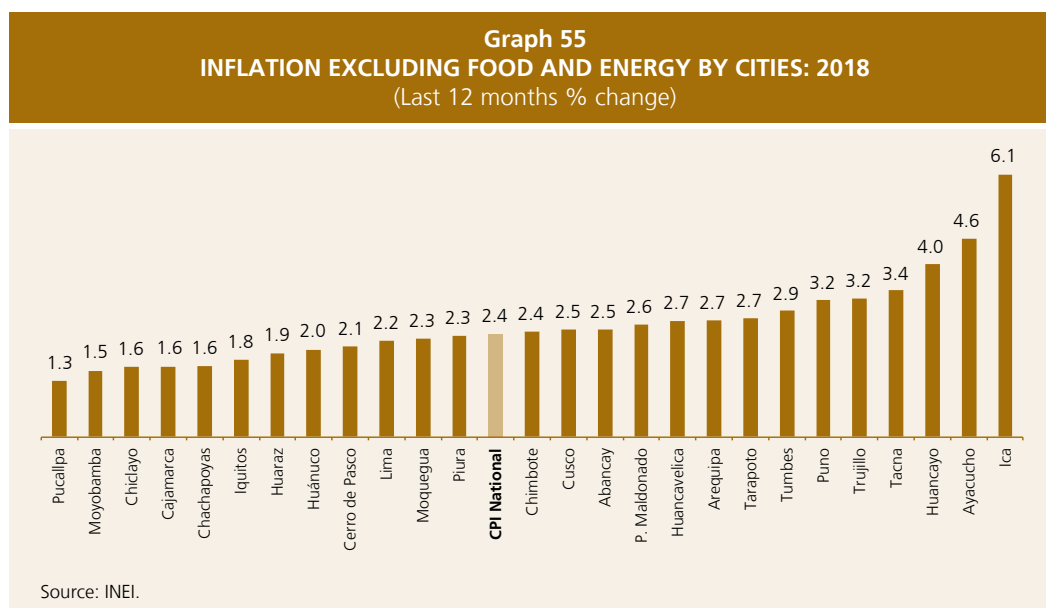
Domestic inflation is calculated as the average inflation rate of the 26 major cities in the country. In 2018, 23 cities showed higher inflation rates than Lima, while two cities showed lower rates.



The cities that showed the higher inflation rates in 2018 were Ica (4.2 percent), Huancavelica (4.1 percent), Puno (4.0 percent), and Cerro de Pasco (3.8 percent).

Meals consumed outside the home are one of the items with a higher contribution to inflation in these four cities. In Ica and Huancavelica, the rise in urban transport fares had an impact on the CPI, while tuition and education fees was another of the items that recorded the higher contribution to inflation in Ica, Huancavelica, and Cerro de Pasco. Moreover, the increase in the prices of soft drinks due to the rise of the excise tax was also relevant in Puno and Cerro de Pasco.

As regards variations in the CPI excluding food and energy, 16 cities showed higher inflation rates than Lima, whereas 9 cities registered lower inflation rates.



Ica, Ayacucho, Huancayo, and Tacna are the cities with the highest rates of inflation excluding food and energy, with urban fares and tuition and education fees being the items with the higher contributions to this indicator. In addition, affected by the rise in the excise tax and by the exchange rate, vehicle prices are another of the items that show the higher weighted contribution to inflation excluding food and energy in the departments of Huancayo and Tacna.



Pancho Fierro (1809-1879)
Vendedora de pescado en burro. S. XIX
Watercolor, 0.31 x 0.24 m.