

Quarterly Economic Growth

Fourth Quarter, 2014

Tirana, April 3, 2015: According to indicator of Gross Value Added (GVA) the economic activity in the fourth quarter of 2014 in volume terms has increased by 2.42 % compared with the fourth quarter of 2013. The main contribution to this increase gave the branches of the economy such as *Construction* by 1.56 %, *Other Services* 0.95 percentage point, *Trade Hotels and Restaurants* by 0.54 %, *Industry* 0.24 percentage point and *Transport* 0.09 percentage points. The branches that gave a negative contribution are *Agriculture, hunting, forestry and fishing* by -0.67 % and *Post and telecommunication* by -0.30 percentage point. (See Fig.1 p3).

The main branches of the economy for the fourth quarter 2014 compared with fourth quarter 2013 appeared as follows:

Agriculture activity in the fourth quarter of 2014 compared with the same quarter of 2013 decreased by 2.66%.

The industry group activity increased by 1.61 % in the fourth quarter of 2014 compared with the fourth quarter of 2013. In this group, a positive impact gave *Manufacturing Industry* which increased by 3.39 % instead *Extracting Industry* decreased by 0.47 %.

Construction activity in the fourth quarter of 2014 appeared to increase by 10.81 % compared with the respective quarter of 2013.

The group of Trade, Hotels and Restaurants in the fourth quarter of 2014 increased by 3.26 % compared with the same quarter of 2013. In this group, trade had an increase by 3.56 % while hotels and restaurants had an increase by 1.13 %.

Transport activity in the fourth quarter of 2014 had a increase by 3.01 % compared with the respective quarter of 2013.

Post and telecommunication activity decreased by 9.48 % in the current reported quarter compared with the fourth quarter of 2013.

Other Services in the fourth quarter of 2014 increased by 3.21 % compared with the same quarter of 2013. In this group, positive impact gave the sectors like: financial activities and real estate, rent and business support activities, the public administration, health, other collective services, social, cultural services. While in this group the negative performance appeared to education.

As for changes to the preceding quarter, the indicator of Gross Value Added increased by 1.12 % compared with the third quarter of 2014.

Agricultural activity in the fourth quarter of 2014 compared with the previous quarter decreased by 2.77 %.

The industry group increased by 1.43 % in the fourth quarter of 2014 compared with the third quarter of 2014.

Construction activity in the fourth quarter of 2014 increased by 15.28 % compared with the third quarter of 2014.

The Group of Trade, Hotels and Restaurants increased by 0.46 % in the fourth quarter of 2014 compared with the third quarter of 2014.

Transport activity in the fourth quarter of 2014 increased by 2.66 % compared with the previous quarter.

Post and telecommunication appeared to decrease by 7.31 % in the fourth quarter of 2014 compared with the third quarter of 2014.

Other services in the fourth quarter of 2014 increased by 0.41 % compared with the third quarter of 2014.

With the estimation of fourth quarter, INSTAT gave a preliminary estimation for the year 2014 based on the indicator of quarterly Gross Value Added (GVA) appeared to increase about 1.89% compared with year 2013.

Fig. 1 Contribution of the main branches of the economy to real growth rate of GVA (Q4_2014/Q4_2013)

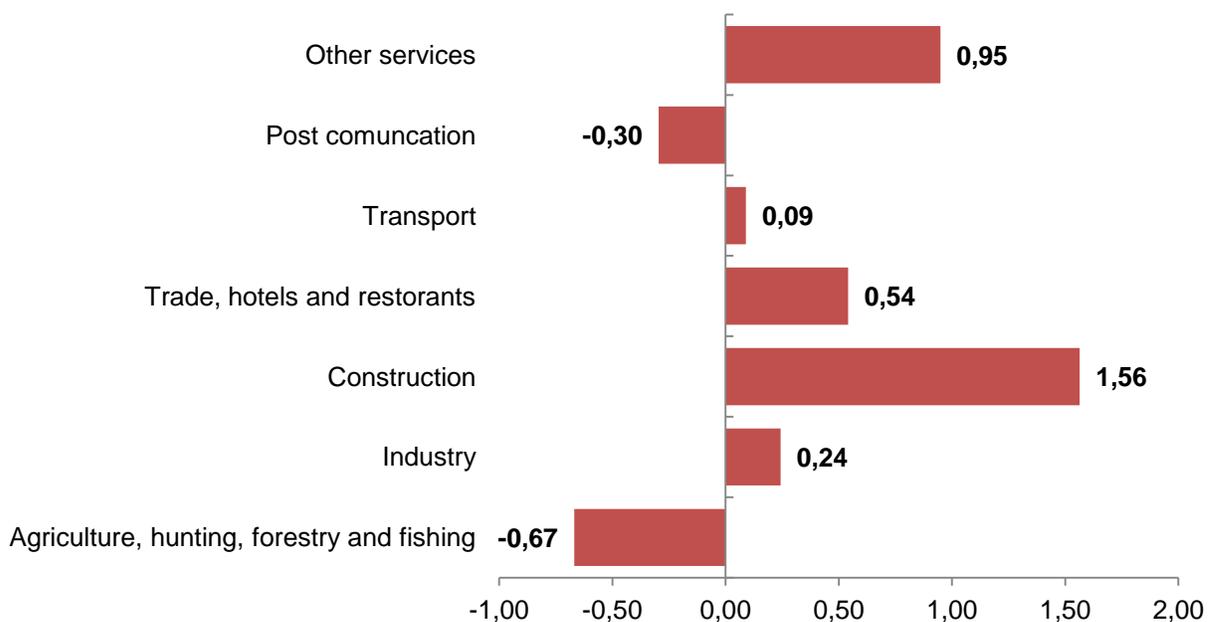


Fig. 2 Changes to the same quarter of 2013 for the main branches of the economy (Q4_2014/Q4_2013)

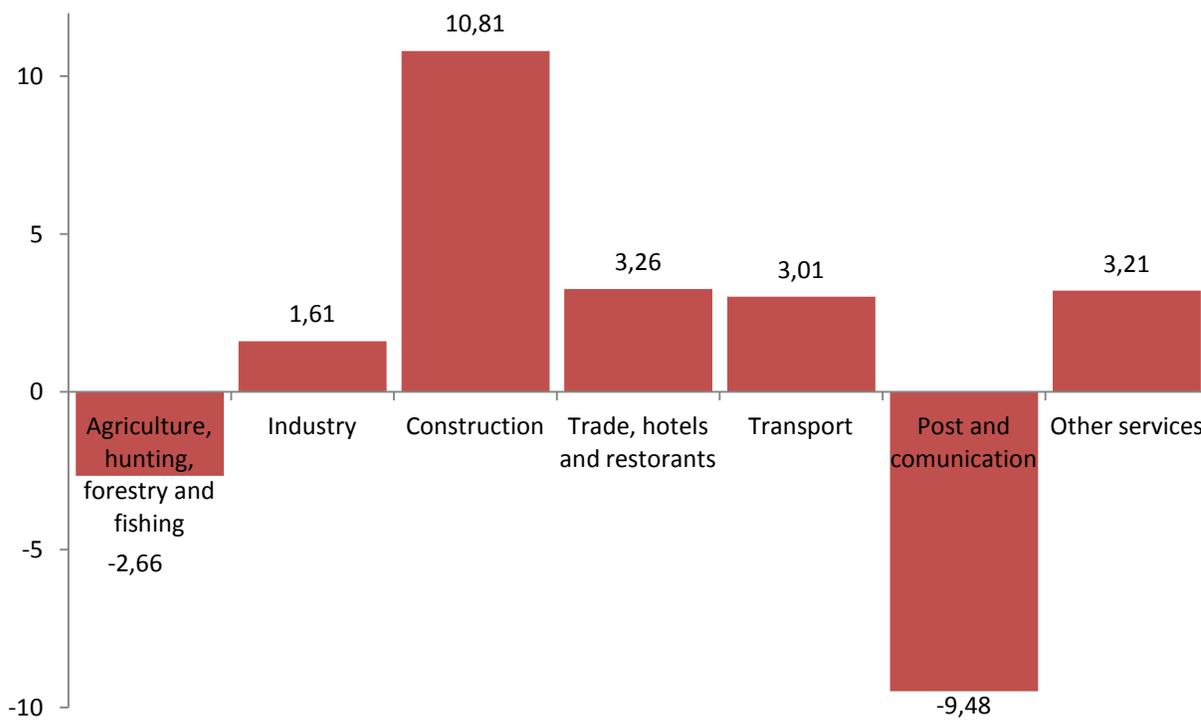


Fig.3 Changes to the third quarter of 2014 for the main branches of the economy

(Q4_2014/Q3_2014)



Methodology

The current and constant measures of Quarterly GVA are consistent with the annual national accounts and are based on the same concepts and principles. The estimates in this publication are based on data available until March 2015. The main data sources that are used to estimate QGVA are in general administrative data and various infra-annual data collected by INSTAT's surveys. The series are subject to revisions in the future as additional or improved information becomes available.

The objective of the quarterly data in time series format is to give dynamic information about the economy. The publication includes estimates of quarterly GVA at constant prices (changes in volume of the quarterly GVA) where taxes and subsidies on products are not accounted for. The volume measures are expressed at average prices of the previous year and chain-linked with the reference year, (2010=100). The estimates of quarterly GVA are compiled in both original and seasonally adjusted formats. The method used to estimate quarterly GVA is considered an indirect method.

Is considered as an indirect method because the available data sources are used to estimate quarterly value added based on the selected quarterly indicators by application of mathematical methods and statistical techniques. Specifically, the applied indirect method is based on the assumption that the proportion between the value added and output is constant within the period of estimation. In some specific branches like Electricity, Public Administration, Education, Health and Financial Activities, is used the direct method which estimates the output and intermediate consumption separately, with subsequent calculation of value added as a difference.

Sequence of compilation

In the indirect method the chronological order may change, but the most used is as follows:

- i. Constructing the quarterly indicators at current and constant prices from different sources for the appropriate recent periods;
- ii. Development of time series for quarterly data at current and constant prices in order to ensure data comparability and consistency over time;
- iii. Benchmarking the non-seasonally adjusted series to the relevant annual series;
- iv. Eliminating the seasonality from the aggregated quarterly time series.

It is worth mentioning that the sum of seasonally adjusted quarters is not necessarily equal to the annual GVA for any particular year. Under normal circumstances, there will be enough variation in seasonality and/or trading day effects to explain a gap between the two.

Volume measures

Quarterly National Accounts, to ensure better consistency with the Annual estimates, as well as complying with ESA 2010, the volume measure of quarterly time series are expressed in average prices of the previous year and chain-linked reference year (2010=100).

General procedure of volume measures calculation consists of two steps: First figures at current prices are converted to previous year's average prices using appropriate price indices. Figures at previous year's prices are then chain-linked, with the reference year (2010=100), in order to obtain comparable time series of volume measures over time. This approach was introduced for the first time in quarterly accounts during the publication of the first quarter 2014. In the past, different approach was applied, where current price data were converted to constant prices of the fixed base year (the base year was 2005).

Chain-linking of quarterly figures is performed using the Annual Overlap technique, i.e. figures at previous year's prices are scaled down to the average price level of the chosen reference year using annual deflators. This technique is used in the majority of member states of the European Union. Chain linking means constructing long run volume measures by cumulating movements in short term indices with different base periods. The chain-linking of quarterly GVA data with fixed reference period (2010=100) allow different periods to be compared in a consistent manner and provide measures of long-run changes. However, the users should be aware of the phenomena of (non- additivity problem) of chained data.

For example if quarterly time series of GVA at current and constant prices with average prices of the previous year are additive, where total GVA is the sum of the components, for chain linking series, with fixed reference period (2010=100) the total GVA will be non-additive.

Following international methodology, the real growth rate is estimated using quarterly chain-linked series, with the reference year 2010 (2010 = 100).

Benchmarking

The aim of benchmarking is to ensure the consistency between Quarterly and Annual National Accounts. It should be applied to both current and constant prices, where quarterly values are expressed at the same base year as the annual data. It has to be underlined that the benchmarking alters the original figures, and consequently the volume growth of the aggregates, influencing in this way the chain-linked adjusted results.

Adjustment of quarterly GVA figures (from Q1 2008 to Q4 2013), according to the revised annual data for the period from 2008 to 2013, was carried out by using the XLPBM Excel programme. The XLPBM Excel programme has been developed by the IMF and provides a set of mathematical and statistical techniques which are used for temporal disaggregation of data series. During the process of adjustment, the discrepancy between estimated quarterly data and final annual data is minimized. The result is the achievement of consistency of quarterly and annual data, that is, the sum of quarterly data is equal to annual data in every year.

Seasonal adjustment

One of the major characteristics and issues of quarterly national accounts is seasonality. There are two methods for eliminating the seasonal effect from quarterly series.

Indirect method:

The level at which series are seasonally adjusted is important, since it has the potential to affect the quality of that seasonally adjusted series. The individual component series of the main economic variables can be seasonally adjusted and then summed to derive totals. This is called an indirect seasonal adjustment. The indirect approach has the advantage of retaining additive, but this applies only to the current price series. Although the indirect approach conceptually also provides additively for volume series.

Direct method:

Alternatively, the main economic variables can be seasonally adjusted at the total level, independently from the seasonal adjustment of their components. The adjustment of the total of an aggregate series is called a direct seasonal adjustment.

The direct approach often gives better results if the component series show similar seasonal patterns. At the most detailed level, the irregular factor may be large compared with the seasonal factor and therefore makes it difficult to perform proper seasonal adjustment.

In a small country such as Albania, irregular events can have strong impact on particular data. However, if the component series show the same seasonal pattern, aggregation often reduces the impact of the irregular factors in the component series. This is particularly relevant for Albania, where many economic series are affected by same seasonal fluctuations in the primary industries. INSTAT applied direct method for seasonal adjustment of quarterly time series.

The program used for seasonal adjustment of time series is JDemetra +, method TRAMO / SEATS, this program was developed by EUROSTAT.

Revisions policy

One of the most important moments of the quarterly series is revisions policies. These revisions are related with quarterly and annual data changes. Revisions to the previously published series may be made each quarter. The frequency and cause of these revisions are as follows:

Quarterly revisions

As additional data become available for the last quarter, they have their impact on the previous quarters because: data reported for the last quarters are supported by additional source data or improvements/corrections to data for previous nearest quarters were performed. It is necessary to mention that most of the data used for quarterly estimations are administrative data.

Including the last quarter data in the series and subsequent application of the seasonal adjustment will result in some changes to the previous quarters.

Annual revisions

Quarterly data are benchmarked to the annual one, and revisions to annual data will influence the quarterly series. Revisions to annual data are subject to arrival of new annual data sources or improvements of the existing ones. One year has three steps of estimation; flesh, semi final and final. Changes that happen during these steps have their direct effect on the quarterly series. The flash estimations of the current year are available 11 months after the end of the reported year, semi final are available with a time discordance of 17 months and the final version - within 29 months. Revisions to quarterly series are linked to the production cycle of annual estimates.

Methodological revisions

Revisions of quarterly series due to changes in methodology are to the extent possible coinciding with the annual cycle of revisions outlined above.

In addition, each of the above causes of revisions, and/or the incorporation of new series in the actual quarterly series, has the potential to alter seasonal factors and therefore may lead to a revision in the seasonally adjusted series.

Tab.1 Quarterly Gross Value Added, current prices

Non-Seasonally Adjusted

Million Lek

NACE Rev1.1	Agriculture, hunting and forestry	Industry			Construction	Services					Gross Value Added at basic prices
		Total	- Extracting	- Manufacturing		Total	Trade, Hotels and Restorants	Transport	Post and communication	Other Services	
		1	2=2a+2b	2a		2b	3	4=5+6+7+8	5	6	
2013*	268,093	179,052	72,037	107,015	143,410	597,982	179,386	40,480	32,041	346,075	1,188,536
2014**	277,747	183,093	74,558	108,534	141,370	622,895	191,275	33,986	31,275	366,360	1,225,105
2013**											
Q1	64,410	44,897	17,119	27,779	27,893	137,637	37,837	8,897	7,392	83,511	274,837
Q2	88,495	48,169	18,239	29,930	39,316	145,163	43,271	10,591	7,271	84,030	321,142
Q3	62,001	41,900	17,751	24,149	30,698	151,448	47,115	12,515	7,977	83,842	286,047
Q4	53,187	44,085	18,928	25,157	45,504	163,733	51,163	8,476	9,402	94,692	306,509
2014**											
Q1	66,730	42,157	18,494	23,663	26,604	139,942	39,279	7,000	7,189	86,474	275,433
Q2	95,914	50,075	20,190	29,885	30,997	152,273	45,994	8,526	6,949	90,804	329,259
Q3	61,664	46,594	19,923	26,670	33,499	159,201	52,710	9,674	8,352	88,466	300,958
Q4	53,439	44,267	15,951	28,316	50,270	171,479	53,292	8,785	8,785	100,616	319,455

2013* Preliminary
2014** Flash

Tab.2. Quarterly Gross Value Added, chain-linked volume measures, reference 2010 year (2010=100)

Non-Seasonally Adjusted

Million Lek

NACE Rev1.1	Agriculture, hunting and forestry	Industry			Construction	Services					Gross Value Added at basic prices
		Total	- Extracting	- Manufacturing		Total	Trade, Hotels and Restaurants	Transport	Post and communication	Other Services	
		1	2	2a		2b	3	4	5	6	
2013*	247,318	173,591	49,956	120,982	141,001	576,689	168,220	38,609	31,864	337,846	1,139,105
2014**	252,223	177,755	55,302	117,123	139,175	590,924	176,672	32,024	31,172	350,877	1,160,685
2013*											
Q1	57,183	38,858	9,713	29,508	27,524	132,839	35,633	8,493	7,288	81,439	256,618
Q2	81,635	46,534	12,515	33,878	38,637	140,114	40,425	10,071	7,168	82,393	306,912
Q3	57,839	42,860	13,275	28,319	30,258	145,919	44,301	11,918	7,865	81,736	277,128
Q4	50,660	45,338	14,453	29,278	44,583	157,817	47,861	8,127	9,543	92,278	298,447
2014**											
Q1	59,265	41,911	13,531	26,814	26,276	133,045	36,097	6,587	7,296	83,196	260,836
Q2	84,662	45,440	13,271	31,353	30,529	144,619	42,396	8,008	6,947	87,241	306,358
Q3	58,985	44,336	14,116	28,688	32,969	151,505	48,757	9,057	8,291	85,198	287,813
Q4	49,311	46,069	14,385	30,269	49,401	161,754	49,421	8,372	8,638	95,242	305,678

2013* Preliminary
2014** Flash

Tab.3 Quarterly Gross Value Added, chain-linked volume measures, reference 2010 year (2010=100), Real Growth Rates, comparison with corresponding quarter of previous year

Non-Seasonally Adjusted

(%)

NACE Rev1.1	Agriculture, hunting and forestry	Industry			Construction	Services					Gross Value Added at basic prices
		Total	- Extracting	- Manufacturing		Total	Trade, Hotels and Restaurants	Transport	Post and communication	Other Services	
2013*	0.61	7.91	12.04	5.26	1.12	0.08	0.62	-8.05	-8.03	1.67	1.45
2014**	1.98	2.40	10.70	-3.19	-1.30	2.47	5.02	-17.06	-2.17	3.86	1.89
2013*											
Q1	-0.91	11.98	-0.28	19.79	-2.35	1.85	0.84	-2.43	4.40	2.65	2.16
Q2	-0.38	15.55	15.38	16.08	18.59	-1.34	0.68	-2.98	-17.00	-0.52	3.36
Q3	2.28	-3.66	2.66	-8.64	-12.13	-0.87	-3.04	-0.50	-16.73	2.05	-2.00
Q4	2.10	9.49	30.56	-2.79	0.79	0.78	4.03	-25.63	-0.44	2.48	2.24
2014**											
Q1	3.64	7.86	39.31	-9.13	-4.53	0.16	1.30	-22.45	0.11	2.16	1.64
Q2	3.71	-2.35	6.04	-7.45	-20.98	3.22	4.88	-20.48	-3.08	5.88	-0.18
Q3	1.98	3.44	6.34	1.30	8.96	3.83	10.06	-24.01	5.41	4.24	3.86
Q4	-2.66	1.61	-0.47	3.39	10.81	2.49	3.26	3.01	-9.48	3.21	2.42

2013* Preliminary
2014** Flash

Tab 4. Quarterly Gross Value Added, chain-linked volume measures, reference 2010 year (2010=100)

Seasonally Adjusted

Million Lek

NACE Rev1.1	Agriculture, hunting and forestry	Industry			Construction	Services					Gross Value Added at basic prices	
		Total	- Extracting	- Manufacturing		Total	Trade, Hotels and Restaurants	Transport	Post and communication	Other Services		
		1	2	2a		2b	3	4	5	6		7
2013*	247,211	173,591	49,975	120,979	140,843	577,030	168,194	38,982	31,788	337,770	1,139,260	
2014**	252,224	177,755	55,334	117,033	137,517	591,243	176,384	32,100	31,000	350,372	1,163,649	
2013*	Q1	60,932	41,494	10,852	30,994	35,429	145,024	42,157	10,345	8,168	83,454	283,691
	Q2	61,102	45,677	12,570	32,881	39,030	143,206	41,723	10,344	7,952	83,924	287,558
	Q3	62,170	42,521	12,610	28,775	30,916	143,649	40,697	10,517	7,796	84,755	280,381
	Q4	63,009	43,898	13,943	28,329	35,468	145,151	43,617	7,776	7,872	85,637	287,631
2014**	Q1	63,221	44,547	14,516	28,164	33,760	145,483	42,711	7,915	7,926	86,424	288,807
	Q2	63,910	44,583	13,410	30,429	31,017	147,645	43,802	7,983	8,024	87,457	288,957
	Q3	63,424	43,997	13,577	29,151	33,788	149,103	44,832	7,995	7,810	88,064	291,317
	Q4	61,669	44,628	13,830	29,288	38,952	149,012	45,038	8,207	7,240	88,427	294,568

Tab. 5 Quarterly Gross Value Added, chain-linked volume measures, reference 2010 year (2010=100), Real Growth Rates, comparison with previous quarter

Seasonally Adjusted

(%)

NACE Rev1.1	Agriculture, hunting and forestry	Industry			Construction	Services					Gross Value Added at basic prices	
		Total	- Extracting	- Manufacturing		Total	Trade, Hotels and Restaurants	Transport	Post and communication	Other Services		
		2013*	0.73	7.91		12.11	5.35	0.86	0.15	0.63		-7.40
2014**	2.03	2.40	10.72	-3.26	-2.36	2.46	4.87	-17.66	-2.48	3.73	2.14	
2013*	Q1	-2.11	3.82	1.57	6.35	0.05	0.43	0.55	-0.05	-3.08	-0.28	0.49
	Q2	0.28	10.08	15.83	6.09	10.16	-1.25	-1.03	-0.01	-2.65	0.56	1.36
	Q3	1.75	-6.91	0.32	-12.48	-20.79	0.31	-2.46	1.66	-1.96	0.99	-2.50
	Q4	1.35	3.24	10.57	-1.55	14.73	1.05	7.17	-26.06	0.98	1.04	2.59
2014**	Q1	0.34	1.48	4.11	-0.58	-4.82	0.23	-2.08	1.78	0.69	0.92	0.41
	Q2	1.09	0.08	-7.62	8.04	-8.13	1.49	2.55	0.86	1.23	1.20	0.05
	Q3	-0.76	-1.32	1.25	-4.20	8.94	0.99	2.35	0.15	-2.66	0.69	0.82
	Q4	-2.77	1.43	1.86	0.47	15.28	-0.06	0.46	2.66	-7.31	0.41	1.12

2013* Preliminary
2014** Flash

2013* Preliminary
2014** Flash