

Soviet heritage and development of Baltic agriculture: Evaluation of the impact

Explanatory note to the Common statement of the Baltic Ministries of Agriculture

Tallinn, Riga, Vilnius. October 2002

1. Background

On September 16, 2002 in Mezotne, Latvia, Ministers of Agriculture of Estonia, Latvia and Lithuania have agreed on the common views and joint strategies for joining the EU. The principles of fair competition and equal treatment for Baltic States' agricultural producers are in the basis of the **Common Statement signed by the Baltic Ministers of Agriculture**.

It was emphasized in the Statement, the **accession conditions should be fitted to the background of the specific situation in the Baltic States caused by the splitting from Soviet empire** and deep economic reforms started afterwards.

Separation from Soviet Unions first of all requested all the available resources to set up the institutional structures necessary for an independent country - establishment of defense and security structures, democratic parliamentary, municipal and governmental institutions, development of international cooperation. In addition to that, the replacement of the centrally commanded administrative system to a free market one, transformation of farming structure, reorientation to the new input and output markets, as well as introduction of national support policies were carried out in agricultural sector. Several additional shocks like banking crisis and Russian economic crisis also have given their impact on the development perspectives.

In the context of that, in order to enjoy the results of the radical economic reforms in the sector and to ensure the sustainable development of agriculture in the Baltic States after the accession to the EU, the proposed reference period of 1995-1999 can only be used if a comparable correction based on recovery and on local specifics is made, taking into account the additional impact of Soviet heritage in the Baltic countries, which were occupied by Soviet Union and have been an integral part of commanding economy for the decades.

This document is an explanatory note to the Common statement of the Baltic Ministries of Agriculture. It elaborates the arguments behind the Statement about the background of the specific situation in the Baltic States comparing with other Candidate Countries faced the transition.

The present document provides the quantitative assessment of the impact of Soviet heritage on the speed of transition and development levels of agriculture in the Baltic States and some recommendations.

2. Baltic countries versus other transitional countries of Central Europe (CEC-5)¹ - qualitative description: common and different

All 8 currently acceding CEE Countries (CEEC-8) have passed long way of transition to the market economy, including deep reforms of agricultural sector.

However, among the all EU candidate countries (CC) only Estonia, Latvia and Lithuania were occupied by Soviet Union and were an integral part of commanding economy up to 1991 and have undergone the deepest and fastest restructuring since 1990s, including ownership, management and land reforms and also setting of completely new market and economic environment, independent from Soviet deliveries' system. During the transition period, the Baltic States have replaced the fully state run and centrally administered agricultural system with a free market economy.

There is no other Central and East European country, except Baltics, which was obliged to make so **dramatic reforming of agricultural structures in so short period of time**. The privatisation of agricultural land and state entities has followed the segregation from the common economic (related to the production, distribution and trade) and political system created in Former Soviet Union (FSU).

The necessity to carry out both: secession from FSU and at the same time the radical changes in agricultural markets led to the experience of double shock in Baltic States compared to the other transitional countries in Central Europe.

The **double shock** involved:

- **Overall restructuring of agriculture** due to the restitution of land and property ownership rights;
- **Shrinking of the internal agricultural and food market** due to the separation from the former Soviet market and the decline in local consumption caused by the drop in purchasing power;

It has resulted in **slow and prolonged recovery** of agricultural productivity levels due to the fragmentation of land use and establishment of new family farm based agricultural system, according to European patterns and finalised in sharp decrease in the total agricultural production.

During both the restructuring process and the transition of agriculture from the planned to the market economy in Baltic's the **price-cost squeeze** effect became an obstacle to efficient structural changes. After the regaining of Baltic's independence, the input price levels considerably increased, because of the immediate switch from supply of resources at low prices from Soviet Union to the supplies from Western companies at world prices, which followed by only slow increase in the price level for food products due to the low purchasing power of people, earning money from not adjusted to the world market Baltic economy and the possibility to use the stocks of livestock grown till the price shock came.

As a result, the Baltic agricultural producers became much less competitive even on Eastern agricultural and food markets (mostly on the territories of FSU), where the production was still based on inputs at low price, and **highly supported food deliveries from EU and USA replaced the Baltic originated products** in their former markets. Therefore, a considerable

¹ Here and after: 5 other acceding countries - Czech Republic, Hungary, Poland, Slovakia, and Slovenia, which also have past the transition from socialist economy to the market oriented one.

reduction of agricultural production was observed in Baltic states, where more than 50 % of livestock production formerly were produced for the Russian consumers.

3. Quantitative substantiation of Common Statements of the Baltic Ministers

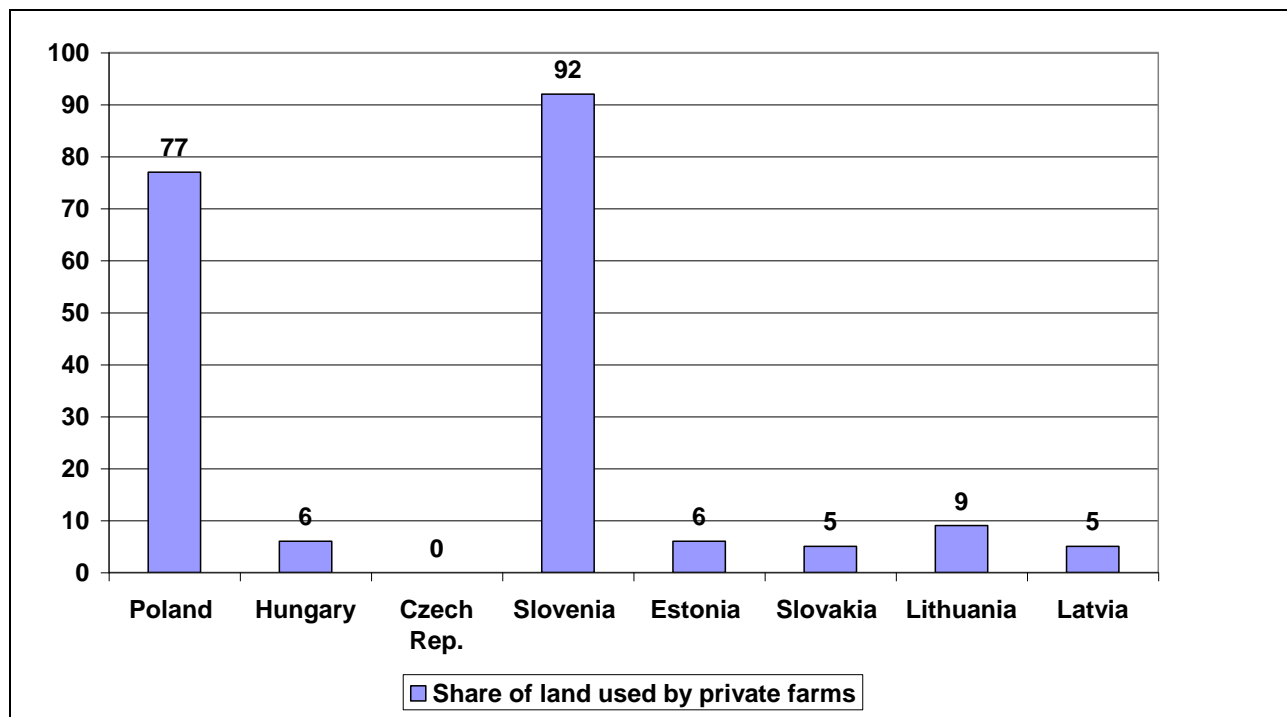
After regaining the independence each Baltic country had similar economic circumstances and were had to address a similar set of tasks. Let's discover some of them.

3.1. Structural changes

“Each Baltic country has transformed the farming structure from fully state owned to fully private-owned farms.”

Changes in the economic situation of the Baltic States in the beginning of 90ies as well as the restructuring of the ownership types radically affected the agricultural situation in Latvia, Lithuania and Estonia. The most part of state and collective farms were abolished and individual private farms were established. As it is reflected in Table 1 of Anex1, in Baltic States the share of cultivated land used by state farms and collective farms was one of the highest in pre-transition period compared to other CEECs. At the same time only the Baltics were obliged to follow so-called the Soviet agricultural model and were the countries with a predominantly collectivized agriculture state management, as it was pointed out also in the study of European Commission from 1998 “Agricultural Situation and Prospects in the Central and Eastern European Countries, Summary report”.

Figure 1. Share of cultivated land used by private farms in pre-transition in various CEEC countries, %



Source: European Commission Directorate General for Agriculture (DG VI), Agricultural Situation and Prospects in the Central and Eastern European Countries, Summary report, 24 p.

While in the pre-transition the share of land used by cooperatives in Hungary, the Czech and Slovak Republics is comparable with Baltics or for some of countries is even higher (for instance in Hungary up to 80%), these cooperatives or collective farms played more important role and enjoyed a much higher degree of freedom than it was allowed for Baltic States. In case

of Poland and Slovenia the private sector kept a dominant position in agriculture even under central planning circumstances (see figure 1). We should take into mind, private farms did not farm even that tiny share of land in private use, in Baltics, but it was some type of in-kind compensation to the workers of state and collective farms.

As the consequence of the land reform, the farming structure was transformed from fully state owned to fully private-owned farms in Baltic countries. Other Central and Eastern European countries, which had not been part of the Soviet Union, did not undergo that radical change in the land ownership structure.

3.2. Support policies

“...During 90'ties the producer subsidy equivalent changed from +80 to -100 (in some cases even to -250) “

It's difficult to carry out in-depth comparing analysis of the impact of agricultural state support in different countries, indeed. Probably, only widely used monitoring studies, done by OECD according to the same methodology, can give some really comparable assessment.

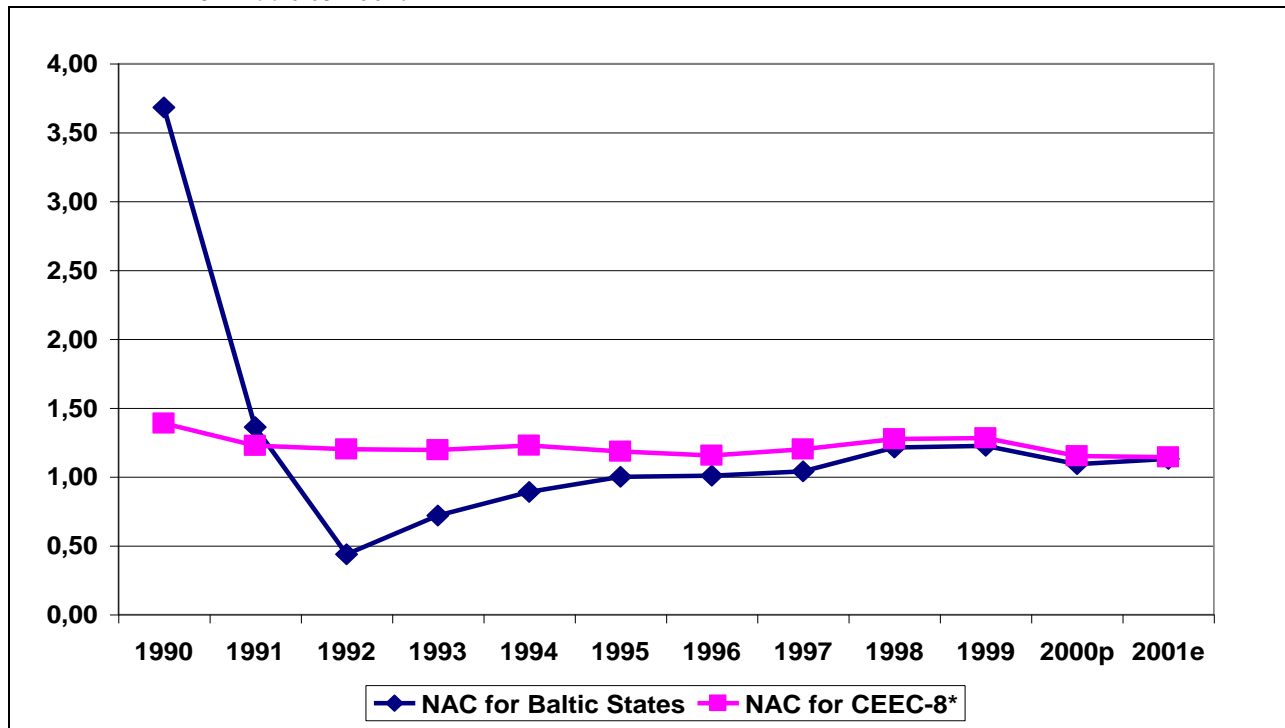
When Baltic States are compared to other candidate countries, tremendous difference can be observed between Latvia, Lithuania, Estonia and other candidate countries in terms of impact of state support onto the farming sector. It can be characterised very clearly with the OECD calculated producer Nominal Assistance Coefficient (NACp) (Figure 2).

The average weighted NACs² for Baltic States (BS-3) versus NACs for transitional countries in Central Europe (including Baltics) (CEEC-8) indicate the difference in the levels of state support to agriculture. Inasmuch as support was slightly fluctuated in CEEC-8 during 1992 – 2001 keeping up to 20% level in average, the agricultural producers in Baltic States were obliged to deal with agricultural production and increase of efficiency without any state support until the middle of 90-ies. **Up to 1995 the Baltic agriculture was even taxed heavily instead of supporting.**

Only since 1996 state support level started to increase gradually in Baltic States as well. However after Russian crises in 1998 the effective support to farmers was reduced again to the level of 9% that is by 5% lower than in CEEC-8 average.

² weighted by total value of production (at farm gate)

Figure 2. Aggregate producer nominal assistance coefficient (NACp) for CEEC-8³ and Baltic States from 1990 to 2001.



*For year 1990 and 1991 CEEC-7 in calculated, data for Slovenia are no available

Source: LSIAE (Latvian State Institute of Agrarian Economics) calculations on the base of OECD data (Agricultural Policies in Transition Economies. Trends in Policies and Support, OECD, 2002 80 p.; Agricultural Policies in Transition Economies. Trends in Policies and Support, OECD, 2002 132, 135, 138, 147 p; Agricultural policies in OECD countries 2002. Monitoring and evaluation: 184, 190, 211,214 p.)

4. Baltic “Soviet heritage” adjustment coefficient: background and calculation

Having regard all the factors described above, additional pressure on Agriculture sector development had been created in Baltic states, which resulted in changes of Gross Agricultural Output.

4.1. Agriculture production development. GAO dynamics

The radical reforms had a direct impact on all three Baltic countries resulting in a substantial contraction of the agricultural sector, particularly during the reference period 1995 – 1999 (see Figure 3).

All Baltic States experienced much more significant drop in agriculture production between 1990 and 2000 comparing to all other candidate countries.

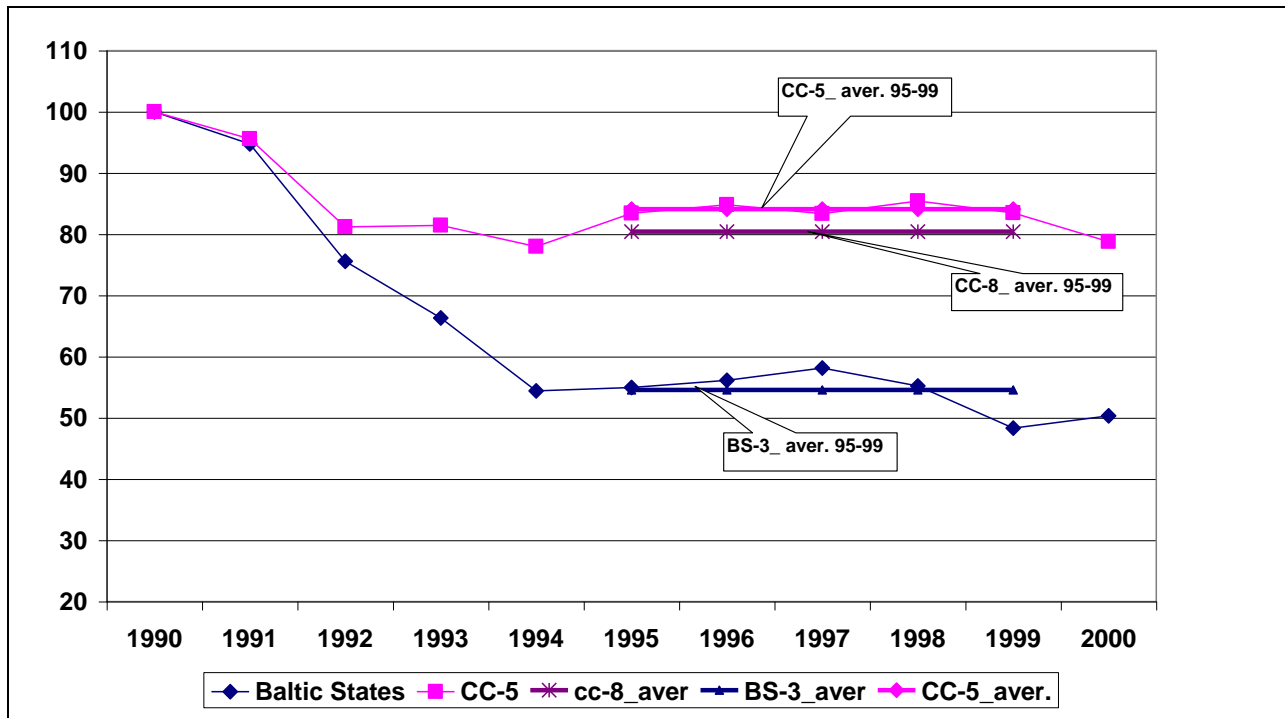
As it is shown on Figure 3 during the period mentioned in CEEC-5 countries the agricultural output till 1999 has decreased by 21% from the level of 1990, giving drop by 16 % as average for 1995-1999. In the same time period in case of Baltic states the agricultural output had 50 % decrease, giving 46% drop as average for 1995-1999. For all CEE candidate countries the average decrease of GAO in 1995-1999 was 19,6%.

This illustrates the impact of necessity to overcome the impact of Soviet heritage in addition to just switching from command to the market economy.

³ Here: 8 Central European and Eastern European Candidate Countries: CEEC-5 and 3 Baltic countries (BS-3) – as Estonia, Latvia and Lithuania.

This can be quantified as the “Soviet heritage adjustment” coefficient.

Figure 3. Dynamic of Gross Agricultural output in Baltic States and CC-5 from 1990 to 2000, % (1990=100)



Source: LVAEI calculations on the base of OECD (Agricultural Policies in Transition Economies. Trends in Policies and Support, OECD, 2002: 93 p.) and AGRIS database (Agricultural output for each of CEEC in 1998)

4.2. The bases for “Soviet heritage adjustment” coefficient calculation and the information used.

Having regard, the impact of all the factors described above (agrarian reform, state support policies, macroeconomic environment) is summing up in the dynamic of gross agricultural product, the indexes or GAO changes, as widely available cross-country indicators can be used as a base for calculation of “Soviet heritage” adjustment coefficient. Where the ratio of average level of GAO in Baltic state in 1995-1999 to that in 1990 as in last pre-transition year is compared to the same indicator for all the transition countries.

There are several databases, where the information about the dynamics of agricultural production is included. The FAO and OECD databases are those, where the information about the sector output changes from the prereform period are available- the EU AGRIS database starts only with 1995.

Insomuch as in OECD database there is reliable and comparable information about the agricultural output annual changes for all transitional Central and Eastern European countries and the national statistical experts have taken part in creating and updating that database, it was decided to use the time series of Total Gross Agricultural Output indexes (per cent change from previous year) from this database. However the absolute values of GAO, needed for calculation of average weighted indices, were not available there. Therefore the EU AGRIS database was used to get the Agricultural output data at value in producer prices for individual countries. The only year, where the relevant indicator was shown for all the countries analyzed, 1998 was found.

4.3. Methodology of calculation and interpretation of the results

Taking into account the reference period 1995 – 1999 suggested to all Candidate Countries by European Commission as well as tremendous changes have happen in transitional Central and Eastern European countries since 1989-1990, the main tendencies were analyzed from 1990 to 2000, but the adjustment coefficient was calculated for the averages of 1995 – 1999 to the level of 1990.

The dynamics of GAO indexes and absolute values for GAO in 1998 for each of CEEC-8 country (see Table 3 in Annex) were the basic information for calculation of average weighted GAO indexes for two groups of countries as Baltic States and CEEC-8.

Wherewith the ratio of average weighted GAO indexes of CEEC-8 countries versus the correspondent average weighted index for Baltic States gives opportunity to estimate adjustment coefficient for Baltic States, which characterized specificity in development of Baltic States comparing average level of development among all Central and Eastern European Candidate countries undergone (faced) the transition.

According to the calculation results the average weighted indexes of CEEC-8 and Baltic States, which calculated for 1995-1999 versus 1990, were 0,804 and 0,546 correspondently. Therefore, the “Soviet heritage” adjustment coefficient can be estimated on the level of 1,47.

The ratio mentioned illustrates the difference between the development of CEEC-8 countries in average and Baltic States

5. Common proposals (suggestions) to EU Commission

Having regard the significant market disturbances caused by transition from command to market economic system after regaining the independence in Baltic States comparing with other CEEC and on the ground of coefficient estimated, the reference levels of quotas and other supply management instruments calculated according to the standard approach applied to all the Candidate countries, should be corrected by the value of “Soviet heritage” adjustment coefficient for all Baltic States.

In light of significant market disturbance caused by adjustment to new economic environment after regaining independence of Baltic States, corrections must be made to reference levels of quotas and other supply management instruments proportionally. Making specific adjustment, country specific situation has to be taken into account, however the total impact of adjustments to the sub-sectors concerned must be in the range of the abovementioned coefficient.

Annex 1

Table 1. CEC farm structure according to land use

	share in total agricultural area (%)								latest census
	cooperatives*		state farms**		other corporate farms***		private/individ. farms****		
	Pre-transition	Current	pre-transition	current	pre-transition	current	pre-transition	current	
Poland	4	3	19	7		8	77	82	1996
Hungary	80	28	14	4		14	6	54	May-96
Czech Rep.	61	43	38	2		32	0	23	1995
Slovenia			8	4			92	96	1997
Estonia	57		37			37	6	63	1997
Slovakia	69	60	26	15		20	5	5	1994
Lithuania ¹	65	8	26	1		1	9	90	2002
Latvia	54		41	1		4	5	95	1997

* collective pre-transition, transformed into private (producer) cooperatives/associations currently

** state farms pre-transition, remaining state farms and state held/controlled enterprises currently

*** joint stock, limited liability companies and other business entities currently

**** household plots pre-transition, individual (part time) farms currently

¹Here: data for Lithuania provided by Lithuanian Institute of Agrarian Economics

Source: European Commission Directorate General for Agriculture (DG VI), Agricultural Situation and Prospects in the Central and Eastern European Countries, Summary report, 24 p.

Table 2. Producer nominal assistance coefficient (NACp) for candidate countries, CEEC-8 and Baltic States from 1990 to 2001.

Countries	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001
Estonia	3,40	2,42	0,53	0,76	0,91	1,00	1,07	1,06	1,25	1,07	1,08	1,15
Latvia	4,10	3,28	0,41	0,71	1,07	1,05	1,03	1,05	1,24	1,28	1,18	1,19
Lithuania	3,60	0,25	0,42	0,71	0,81	0,98	0,98	1,03	1,19	1,25	1,06	1,10
Slovakia	2,20	1,53	1,39	1,36	1,30	1,22	1,12	1,15	1,35	1,34	1,31	1,12
Slovenia	N.A.	N.A.	1,47	1,33	1,42	1,53	1,37	1,47	1,73	1,94	1,65	1,67
Czech	2,20	2,07	1,45	1,38	1,24	1,14	1,15	1,10	1,26	1,31	1,19	1,20
Hungary	1,30	1,13	1,19	1,26	1,32	1,16	1,10	1,08	1,15	1,30	1,25	1,13
Poland	0,80	1,01	1,23	1,18	1,23	1,21	1,19	1,28	1,30	1,24	1,08	1,11
Baltic States	3,68	1,36	0,44	0,72	0,89	1,00	1,01	1,04	1,21	1,22	1,09	1,13
CEEC-8*	1,39	1,23	1,20	1,19	1,23	1,18	1,16	1,20	1,27	1,28	1,15	1,14

* For year 1990 and 1991 CEEC-7 in calculated, data for Slovenia are no available

Source: LSIAE (Latvian State Institute of Agrarian Economics) calculations on the base of OECD data (Agricultural Policies in Transition Economies. Trends in Policies and Support, OECD, 2002 80 p.; Agricultural Policies in Transition Economies. Trends in Policies and Support, OECD, 2002 132, 135, 138, 147 p; Agricultural policies in OECD countries 2002. Monitoring and evaluation: 184, 190, 211,214 p.)

Table 3. The basic information for assessment of “Soviet heritage” adjustment coefficient

	Gross Agricultural Output indexes (% change from previous year)												Agr. Output in value at producer price (Mio EUR)
	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	
Latvia	-10,2%	-4,0%	-15,6%	-22,2%	-17,7%	-6,1%	-6,8%	1,0%	-9,3%	-0,11	0,05	0,05	458,91
Lithuania	-4,4%	-5,8%	-23,4%	-5,4%	-20,2%	6,0%	10,3%	6,5%	-3,3%	-0,15	0,06	-0,09	1183,07
Estonia	-13,1%	-5,8%	-19,5%	-12,2%	-12,9%	-0,9%	-6,3%	-1,5%	-5,0%	-0,08	-0,02	0,00	383,95
Slovakia	-7,8%	-9,0%	-21,7%	-8,1%	4,8%	2,3%	2,0%	-1,0%	-5,9%	-0,03	-0,14	n/a	1515,86
Slovenia	3,5%	0,4%	-10,1%	-0,7%	20,2%	-0,1%	0,7%	-0,1%	2,2%	-0,01	0,02	n/a	934,01
Czech	-2,3%	-8,9%	-12,1%	-2,3%	-6,0%	5,0%	-1,3%	-5,1%	0,8%	0,01	-0,05	0,03	2901,93
Hungary	-4,7%	-6,2%	-20,2%	-9,7%	3,2%	2,6%	6,3%	-3,8%	-2,1%	0,04	-0,05	n/a	4438,55
Poland	-2,2%	-1,6%	-12,7%	6,8%	-9,3%	10,7%	0,7%	-0,2%	5,9%	-0,05	-0,06	n/a	12191,15

Source: LVAEI calculations on the base of OECD (Agricultural Policies in Transition Economies. Trends in Policies and Support, OECD, 2002: 93 p.) and AGRIS database (Agricultural output for each of CEEC in 1998).