WHO BENEFITS FROM THE CAP?

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Introduction

The Common Agricultural Policy (CAP) constitutes a major public intervention in the European Union (EU) which generates large redistributive effects. Significant resources are being transferred among producers and consumers of agricultural products and the taxpayers. The geographic distribution of these three groups (producers, consumers, taxpayers) in the different member states generates also transfers among the member states.

The distribution of benefits and losses under the CAP has attracted the interest of researchers in the past. During the 1980s, Buckwell *et al* (1982) and Brown (1989) dealt with this issue, when the rules of the 'traditional' CAP were very much in place. In the 1990s, Ackrill, Hine, Rayner and Suardi (1997) obtained estimates of the impact of the 1992 CAP reform on the existing distribution of benefits and losses. However, their analysis is *ex ante* in nature and it concentrates on the most important products included in the 1992 reform of the CAP, excluding the mediterranean products. Tarditi and Zanias (1997 and 2000) do include the mediterranean products and obtain *ex post* results up to 1995 for the EU regions. Zanias

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(2002) includes the mediterranean products, produces results at national levels up to 1999 and simulates the potential impact of a partial re-nationalisation of the CAP.

Renewed interest for the issue exists for three reasons: 1) Negotiations currently take place in the EU about the 2007-2013 financial framework and the initial positions of the large budget contributors call for a reduction in the EU own resources, which is opposed by some other member states. Since the financing of the CAP attracts nearly half of the EU budget, the distribution of the CAP benefits has important implications for these negotiations. 2) Three major reforms of the CAP have taken place (1992, 1999, 2003), which have changed the philosophy of the CAP, moving away from price intervention and towards direct subsidies to the farmers and rural development measures. Yet the distribution results so far stop in 1999 and a need for more recent results exists. 3) It is useful to have a benchmarking of the distribution of benefits before the implementation of the latest CAP reform (2003) and the gradual application of the CAP to the new member states.

This study extends the results of Zanias (2002) regarding the distribution of benefits among member states covering the period 1988-2003, and focuses on the "anatomy" of the generated transfers and their determinants.

The methodology

The transfers from consumers to producers take place via the price wedge that exists under the CAP between domestic and international prices. This price wedge is maintained by border trade measures and budgetary expenditures for export restitutions and storage facilities. The transfers from taxpayers to producers involve the direct budgetary payments to producers and rural development expenditures. Because both intra and extra EU trade in agricultural

products takes place at higher than world prices and the CAP is financed from a common budget, transfers among member states also take place.

The calculation of transfers among member states usually concentrates on modeling trade protection measures. However, because the trade protection element of the CAP evolves declining, it is chosen here to work with a measurement approach based on a definition of the Producer/Consumer Subsidy Equivalent (PSE/CSE) which includes the impact a wide range of policies. The definition used is rather narrower than that used by the OECD because the aim of this study is the estimation of transfers caused by the CAP, ignoring other levels of public intervention. Using this approach, the transfers under the CAP are measured in 'income' rather than 'real income' terms with the latter differing from the former by taking into account the variation in the producers' and/or consumers' marginal evaluation of the resources affected by the protection.

Adopting a PSE/CSE framework, the net transfers to each member state consist of the sum of transfers to its producers minus the cost borne, under the CAP, by domestic consumers and taxpayers. These can be represented by the following equation for each member state (i):

$$NetTransfer_{i} = \left[\sum_{j} \left(Q_{ij}(P_{j} - P_{wj}) + DP_{ij}\right)\right] - \left[\sum_{j} \left(Q_{ij} + II_{ij} + IT_{ij} - XI_{ij} - XT_{ij}\right)(P_{j} - P_{wj})\right] - \left[BC_{i}\right] \quad (1)$$

where: j refers to the individual commodities;

Q = quantity of domestic production;

P = domestic price;

 P_w = international price;

DP = value of direct payments to the producers;

II = quantity of imports from other member states;

IT = quantity of imports from third countries;

XI = quantity of exports to other member states;

XT = quantity of exports to third countries;

Q+II+IT-XI-XT= quantity of apparent consumption;

BC = budgetary contribution of member state for CAP purposes.

(P-P_w) = the price gap between domestic and international prices.

Equation (1) gives the net transfer of resources under the CAP to each member state by subtracting the losses to the domestic consumers and taxpayers from the gains to the domestic producers. Thus, the first square bracket gives the gain to the producers, which arises from receiving the higher, compared to the international, domestic prices (P-P_w) and the direct payments from the budget (DP). The latter corresponds approximately to what the 2003 reform terms as the Single Farm Payment. The second bracket gives the loss to the consumers, which arises from paying the higher domestic price (P-P_w) for the quantities consumed from each product (approached here with apparent consumption). Taxpayers contribute for CAP purposes to the EU budget an amount equal to BC (third square bracket). BC is calculated as the total contribution of the member state to the own resources of the EU budget multiplied by the share of the FEOGA Guarantee Section in the general EU budget.

Equation (1) gives the net transfers to each member state as the summation of the benefits and losses of the three social groups involved. However, a better idea about *the way* the transfers take place can be obtained by rewriting equation (1) in the following form:

$$NetTransfer_{i} = \left[\sum_{j} DP_{ij} - BC_{i}\right] + \left[\sum_{j} \left(XI_{ij} - II_{ij}\right)(P_{j} - P_{w_{j}})\right] + \left[\sum_{j} \left(XT_{ij} - IT_{ij}\right)(P_{j} - P_{w_{j}})\right]$$
(2)

The three square brackets of equation (2) give the Net Transfer to each member state as the sum of the three ways in which resources are transferred from the operation of the CAP. Thus, the first square bracket gives the net direct budgetary transactions of each member state resulting from the operation of the CAP (the sum of receipts minus the budgetary contribution). The second and third square brackets give the resources transferred through trading at the higher domestic prices (P) rather than the international prices (P_w). The second square bracket measures the resources transferred among member states through intra-EU trade. Thus, the consumers of the importing member state transfer resources to the producers of the exporting member state. The third square bracket gives the benefit (in the case of a net exporting member state) from trading at higher than world prices with third countries or the loss (in the case of a net importing member state).

Data Inputs

The quantitative analysis covers the period 1988-2003. All information but the price data were obtained from EU sources². The price data used in the calculation of the price gaps between

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¹ Exports at higher than world prices are made possible through the export refunds paid from the EU budget and imports at higher than world prices involve the collection of agricultural levies that are deposited to the EU budget. For this reason, and in order to avoid double counting of benefits and costs, the export refunds and the agricultural levies are not included in the transactions of each member state with the EU budget. The same applies to other budgetary items also like market intervention expenditure, storage costs, promotion measures and other minor items which are used to maintain the higher domestic prices and the benefits and costs associated with them are included here in the price wedge. The calculations also avoid double counting by appropriately adjusting the producer and consumer transfers for cereals used as feedingstuffs. Thus, the market transfers to the livestock producers are reduced by a proportion of the market transfers to the cereals producers. Similar is the adjustment for the consumer transfers. For this purpose the cereal usage and feedingstuffs allocation by livestock category data used by the OECD in the calculation of PSE/CSEs were employed.

² Trade data were obtained from the COMMEXT database of Eurostat. EU budget expenditure data from the Financial Report of the Guarantee Section of FEOGA. EU budget national contributions from CEC (1998), and various EC budget reports. Other data from the Agricultural Situation in the European Union.

domestic and international prices were taken from the PSE database of OECD for the commodities covered by this database. The mediterranean products olive oil, wine, fruits and vegetables, cotton and tobacco were added to this list because of their importance for the Southern EU member states. Although the bulk of the support for these products is given in the form of direct payments, border protection also exists for some of them during parts of the period considered in this study. Because of the difficulties in obtaining domestic and international representative prices to be used in the calculation of the nominal protection rates in these cases, an indirect approach was used. Thus, protection rates were obtained as the ratio of the expenditure for export refunds for each one of these products and the value of exports of each product to third countries. In this way, protection rates for all products covered by the CAP were calculated and they are presented in table 6 in the appendix.

Results and Discussion

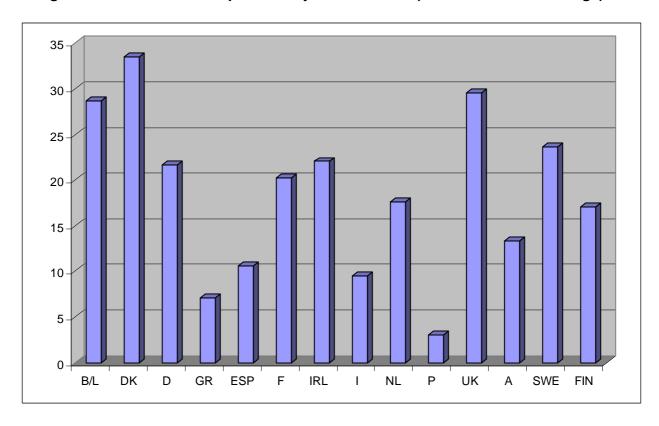
The results show that about half of the member states gain from the operation of the CAP in EU-15 and the other half suffer net losses (figure 1, and tables 1 and 2 in the appendix). Throughout the period covered by this study (1988-2003), Ireland is by far the largest beneficiary country under the CAP. The net benefit is in fact rising with the largest being recorded at the end of the period (65,2% of gross value added of agriculture (GVA) in 2002-2003). At the end also of the period, six more member states record a net benefit: Denmark (24,2%), Greece (20,1%), Finland (10,1), France (8,9%), Austria (8,1%) and Spain (7,3%). Ireland, Denmark and Greece have been on the side of the gainers throughout the period considered. France and Spain switched from losers to gainers after the MacSharry reform (implemented gradually from 1993/4 to 1995/6). Austria and Finland experienced losses during the first years of their membership but quickly turned into net beneficiaries.

70%-60% 50% 40% 30% 20% 10% 0% -10% -20% -30% -40% B/L D **IRL** NL UK **SWE**

Figure 1. Net benefit/Loss by Member State (%GVA - 2002/2003 average)

Figure 2. Producer Benefit per AWU by Member State ('000€- 2002/2003 average)

ESP



Eight member states recorded a negative net transfer to other member states in 2002-2003. In fact, all eight countries have been associated with negative transfers thought the period considered. Germany, Sweden, Belgium/Luxembourg³ and the United Kingdom⁴ are the countries associate with the largest negative transfers.

The results on the transfer mechanisms (budgetary transactions, internal trade, external trade) are shown in table 3 in the appendix. According to these results, and despite the policy shift towards lower administered prices and farmer compensation through direct payments, resource transfers through trade are still very important and, in some cases, more important than before. This is due to both increases in trade volumes and reductions in the international prices of some products which lead to large price gaps with domestic prices. This is clearly shown in tables 6 and 7 in the appendix where the nominal protection rates and the international prices respectively are shown. In particular the beef/veal prices in 2003 were at about half their level in 1995. The prices of pork meat also dropped significantly. Mainly as a result of these "external" factors, the net benefits for the two largest beneficiaries of the CAP (Ireland and Denmark) doubled from the middle 1990s (1995/96) to the early 2000s (2002/03). Ireland benefited from the reduction in beef/veal prices and Denmark from these and pork prices also. Because of these price gaps, as shown in table 3, the benefits of Denmark come almost exclusively from trading at higher than world prices. On the other hand, countries like Greece are not affected much by movements in international prices, which was the second, to Ireland, largest beneficiary of the CAP in the 1990s, because its most important products (cotton, olive oil, tobacco) are covered by direct subsidies from the budget.

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³ The results for the Netherlands and Belgium should be interpreted with some caution because of the

[&]quot;Rotterdam-Antwerp effect" which credits more exports to these countries, affecting the calculation of the trade transfers, and which is a problem that all analyses of this kind faces.

The distribution of the cost of the CAP between consumers and taxpayers must have been also affected by the evolution in international prices. Thus, the relative importance of CT (consumer transfers) compared to BT (budgetary transfers) in table 4 remains about the same (about 1,23) between 1995/96 (when the implementation of the MacSharry reform was completed) and 2002/03 (after the 1999 reform). On the contrary, it was reduced from 1,84 to 1,24 between 1988/89 (before the reform) and 1995/96 (when, in fact, world prices were high).

The success of the CAP reforms during the 1990s is shown by the evolution, during the period considered, of the net benefits and losses for the individual member states. The rule is that benefits tend to increase and losses tend to decrease. The policy mix that has been adopted after the reforms and the movements in international prices are responsible for this. The partial disassociation of benefits from levels of production has increased budgetary payments to the producers, reduced the scope for open-ended support, curtailed increases in the budgetary cost of the CAP (and therefore national contributions to the budget).

The case of Germany deserves special attention. Towards the end of the period considered the negative net transfers of Germany have been reduced considerably (in fact about halved as a proportion of the gross value added of its agricultural sector). This is mainly due to the significant increase of the budgetary payments to its producers and, at the same time, a decrease in its contribution to the EU budget own resources. The latter has to do with the reduction in the EU total own resources in 2001-2003 at a level somewhat lower than the

⁴ The United Kingdom rebate is maintained throughout this study.

1996-1998. Since Germany contributes about one-fifth of the EU budget own resources, its own contribution is reduced significantly and the improvement in its net position obtains.

The future of the German losses under the CAP depends on the negotiations about the finances of the EU budget after 2007, which are currently under way, and the fate of the EU Commission proposal on a new system preventing excessive negative budgetary imbalances in the EU (EC 2004). The Commission proposal purports to generalize the system which give for the last two decades the budget rebate to the United Kingdom. Since Germany has been overtaken in terms of economic prosperity by some other member states, if the proposal is adopted by the Council, it will have some favorable impact on the net German budgetary position. On the other hand the next financial framework needs more resources to accommodate the EU enlargement.

As shown in table 5, the transfers to the producers of agricultural products (PT) are rising throughout this period. At the same time their number is continuously decreasing (also in table 5). These developments have resulted to a sharp increase in the CAP transfers per person employed in the European agriculture (full time equivalent) from 6600 euros in 1988/89 to 14530 euros in 2002/03. Equally important is also the distribution of these transfers per person employed among the member states. As shown in table 5, the operation of the CAP in 2002/03 transferred to a full time farmer in Denmark eleven times more euros compared to a full time farmer in Portugal.

Concluding Remarks

The results of this study show that about half of the EU member states transfer resources to the other half through the operation of the CAP. However, the policy mix that was adopted through reforms during the 1990s, assisted by movements in international prices, has increased the number of member states who receive positive transfers and reduced the cost to the net losers. Germany seems to have improved its negative position and may improve it further if the Commission proposal to preventing excessive negative budgetary imbalances goes ahead.

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APPENDIX

Table 1. Net Benefit/Loss under the CAP by Member State

Member			Average	
State		1988/89	1995/96	2002/03
B/L	MECUs	-795,1	-830,2	-594,7
D/L	%GVA	-29,9%	-28,2%	-21,6%
DK	MECUs	231,7	541,5	742,7
	%GVA	7,5%	13,9%	24,2%
D	MECUs	-5.558,5	-8.018,5	-3.241,2
D	%GVA	-43,3%	-49,5%	-20,3%
GR	MECUs	586,7	1.584,7	1.660,9
OK .	%GVA	6,7%	19,1%	20,1%
ESP	MECUs	-627,2	1.458,5	1.861,6
LOI	%GVA	-4,1%	7,2%	7,3%
${f F}$	MECUs	-1.271,9	1.623,4	2.774,5
ľ	%GVA	-4,9%	5,3%	8,9%
IRL	MECUs	611,1	985,4	1.663,0
	%GVA	31,5%	32,2%	65,2%
I	MECUs	-2.284,7	-1.627,5	-2.109,5
1	%GVA	-9,1%	-6,4%	-7,3%
NL	MECUs	-256,1	-1.031,8	-826,7
1112	%GVA	-3,4%	-10,8%	-9,1%
P	MECUs	-257,6	-222,9	-129,8
1	%GVA	-12,4%	-8,0%	-4,0%
UK	MECUs	-3.029,2	-2.349,8	-2.307,4
	%GVA	-30,4%	-19,2%	-20,5%
A	MECUs		-536	220,4233
Α.	%GVA		-16,8%	8,1%
SWE	MECUs		-808,977	-509,972
SWE	%GVA		-47,9%	-32,3%
FIN	MECUs		-294,246	153,937
T 11N	%GVA		-18,0%	10,1%

Table 2. Net benefit/Loss under the CAP by Member State (1988-2003) $\,$

	UNIT	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003
B/L	mil €	-897,5	-692,7	-609,1	-724,8	-712,5	-840,2	-1.007,4	-818,1	-842,3	-853,4	-794,3	-872,8	-725,8	-1.053,3	-497,5	-691,8
	%GVA	-36,8%	-23,1%	-21,1%	-25,1%	-24,4%	-28,4%	-32,8%	-28,0%	-28,3%	-28,2%	-27,3%	-31,9%	-24,8%	-35,2%	-18,5%	-24,8%
DK	mil€	291,3	172,1	388,4	314,0	72,1	179,9	371,8	549,3	533,6	576,8	591,6	1.025,9	723,3	645,6	752,8	732,7
	%GVA	10,0%	5,0%	11,1%	9,3%	2,2%	5,7%	11,0%	14,1%	13,6%	15,4%	19,4%	34,4%	20,9%	16,6%	24,3%	24,1%
D	mil€	-5.715,4	-5.401,7	-4.354,8	-6.938,1	-7.255,9	-8.875,2	-9.756,7	-7.637,8	-8.399,1	-7.365,4	-5.209,3	-4.921,5	-6.047,9	-4.636,5	-2.276,0	-4.206,4
	%GVA	-45,1%	-41,5%	-32,6%	-52,0%	-54,6%	-63,5%	-68,1%	-48,4%	-50,5%	-44,9%	-33,3%	-31,6%	-34,6%	-23,1%	-13,9%	-26,8%
GR	mil€	412,7	760,6	929,5	1.171,6	1.291,2	1.548,1	1.589,9	1.366,2	1.803,1	1.704,4	1.452,5	1.524,0	1.622,7	1.583,4	1.686,5	1.635,3
	%GVA	4,7%	8,6%	12,5%	13,2%	16,6%	21,8%	20,0%	16,2%	22,0%	20,2%	17,8%	18,2%	19,8%	18,8%	20,3%	19,9%
ESP	mil€	-432,6	-821,8	-621,4	-81,4	-197,9	383,8	1.052,3	1.878,8	1.038,2	1.101,7	1.697,0	1.490,5	1.411,0	2.074,3	1.846,3	1.877,0
	%GVA	-2,6%	-5,6%	-3,1%	-0,4%	-1,1%	2,2%	5,5%	9,8%	4,7%	4,8%	7,4%	6,9%	6,1%	8,3%	7,6%	7,0%
F	mil€	-1.188,1	-1.355,7	602,8	-487,0	119,3	-95,2	209,1	1.791,5	1.455,4	1.451,4	2.851,2	3.238,8	1.278,9	1.289,1	2.712,0	2.837,0
	%GVA	-4,9%	-5,0%	2,1%	-1,9%	0,4%	-0,4%	0,7%	5,8%	4,7%	4,7%	8,9%	10,2%	4,0%	4,1%	8,6%	9,3%
IRL	mil€	554,0	668,1	836,1	733,0	994,8	757,7	745,8	1.019,8	951,0	1.486,4	1.370,2	1.884,1	1.427,2	1.260,0	1.553,2	1.772,9
	%GVA	28,5%	34,6%	29,4%	27,4%	32,3%	25,1%	24,8%	33,3%	31,0%	49,0%	47,6%	72,1%	50,2%	47,1%	62,3%	68,2%
I	mil €	-2.022,7	-2.546,7	-1.988,3	-3.677,5	-2.571,1	-3.577,7	-1.960,9	-1.636,4	-1.618,5	-1.025,2	-2.607,0	-2.041,2	-2.197,3	-2.267,0	-1.570,1	-2.648,8
	%GVA	-8,6%	-9,7%	-7,6%	-12,6%	-9,1%	-14,8%	-8,0%	-6,8%	-5,9%	-3,6%	-9,2%	-7,1%	-7,8%	-7,7%	-5,5%	-9,1%
NL	mil€	-464,4	-47,9	423,1	-544,6	-613,5	-777,8	-1.389,6	-932,0	-1.131,6	-1.090,0	-1.020,3	-882,2	-1.262,0	-1.488,4	-712,7	-940,6
	%GVA	-6,2%	-0,6%	4,8%	-6,0%	-6,8%	-9,2%	-15,1%	-9,6%	-12,1%	-12,3%	-11,2%	-10,1%	-13,6%	-15,6%	-7,9%	-10,3%
P	mil€	-272,5	-242,7	-325,0	-379,5	-424,3	-489,3	-535,6	-236,3	-209,4	-130,5	-24,4	-268,7	-265,7	-81,4	-131,2	-128,4
	%GVA	-14,5%	-10,2%	-12,0%	-13,7%	-18,7%	-23,9%	-21,3%	-8,8%	-7,3%	-5,0%	-1,0%	-9,4%	-9,9%	-2,5%	-4,1%	-3,9%
UK	mil €	-2.900,4	-3.157,9	-3.013,4	-1.871,8	-2.684,1	-3.019,5	-1.549,3	-2.549,5	-2.150,0	-1.497,2	-2.377,9	-2.139,6	-3.992,1	-1.389,4	-2.487,3	-2.127,5
	%GVA	-30,4%	-30,3%	-30,2%	-18,0%	-25,3%	-26,5%	-13,0%	-20,8%	-17,7%	-12,6%	-21,6%	-19,7%	-36,9%	-12,8%	-22,3%	-18,8%
A	mil€								-945,9	-126,1	-344,5	-286,6	-92,7	-86,1	-21,1	255,7	185,1
	%GVA								-29,3%	-4,3%	-12,5%	-10,9%	-3,5%	-3,2%	-0,7%	9,3%	6,9%
SWE	mil €								-923,1	-694,8	-528,9	-576,5	-568,0	-759,6	-652,1	-403,0	-617,0
	%GVA								-55,6%	-40,2%	-30,3%	-35,1%	-39,7%	-47,2%	-42,5%	-25,6%	-39,1%
FIN	mil€								-491,4	-97,1	-173,5	-200,1	-144,1	-1,9	87,2	172,2	135,7
	%GVA								-29,9%	-6,1%	-11,3%	-18,1%	-11,3%	-0,1%	5,7%	10,9%	9,3%

Source: Own calculations

Table 3. Net transfers among member states by transfer mechanism

Member		1988, 19	89 average			1995, 1996	6 average			2002, 200	3 average)
State	В	IT	TT	NT	В	IT	TT	NT	В	IT	TT	NT
B/L	-822,1	135,6	-108,6	-795,1	-1.260,9	16,7	414,0	-830,2	-1.155,1	193,3	367,2	-594,7
DK	-365,3	250,5	346,5	231,7	-53,4	158,6	436,3	541,5	-8,9	232,1	519,5	742,7
D	-5.848,9	-28,9	319,2	-5.558,5	-7.647,8	-338,8	-31,8	-8.018,5	-3.626,2	365,2	19,8	-3.241,2
GR	835,4	-214,9	-33,8	586,7	1.829,1	-238,6	-5,8	1.584,7	2.014,2	-330,1	-23,2	1.660,9
ESP	-771,2	123,9	20,1	-627,2	1.361,7	65,5	31,3	1.458,5	1.945,9	-34,7	-49,5	1.861,6
F	-3.702,1	1.216,4	1.213,9	-1.271,9	-325,9	1.013,1	936,2	1.623,4	1.360,3	649,9	764,4	2.774,5
IRL	-38,0	315,8	333,2	611,1	300,0	356,8	328,6	985,4	902,0	562,1	198,9	1.663,0
I	-873,5	-1.258,8	-152,4	-2.284,7	-858,8	-717,7	-50,9	-1.627,5	-736,8	-1.102,8	-269,9	-2.109,5
NL	-1.275,9	-228,5	1.248,2	-256,1	-2.024,6	331,7	661,0	-1.031,8	-1.774,6	644,0	303,9	-826,7
P	-91,3	-61,3	-105,0	-257,6	-48,7	-132,2	-42,0	-222,9	56,2	-159,7	-26,4	-129,8
UK	-2.553,3	-134,7	-341,3	-3.029,2	-2.125,3	-102,5	-121,9	-2.349,8	-1.397,8	-635,9	-273,7	-2.307,4
A	-	_	_	_	-537,7	1,9	-0,2	-536,0	127,4	76,6	16,4	220,4
SWE	_	_	_	_	-738,9	-47,3	-22,8	-809,0	-362,4	-130,0	-17,6	-510,0
FIN	_	-	-	_	-284,8	-25,0	15,6	-294,2	141,0	-23,1	36,0	153,9

Source: Own calculations

Table 4. Distribution of CAP benefits/costs by social group and by member state

Member		1988, 1989	average			1995, 1996	average			2002, 2003	average	
State	PT	CT	BT	CT/BT	PT	CT	BT	CT/BT	PT	CT	BT	CT/BT
B/L	1.738,0	1.437,3	1.095,7	1,31	1.778,7	1.098,2	1.510,8	0,73	2.164,9	1.085,8	1.673,8	0,65
DK	1.994,1	1.203,3	559,1	2,15	2.243,5	991,9	710,1	1,40	2.380,4	793,3	844,4	0,94
D	10.534,6	9.166,9	6.926,3	1,32	12.111,1	8.775,8	11.353,8	0,77	13.433,3	7.769,7	8.904,8	0,87
GR	2.661,7	1.781,3	293,7	6,06	3.824,0	1.692,0	547,3	3,09	3.803,1	1.442,9	699,3	2,06
ESP	5.811,6	4.613,7	1.825,1	2,53	8.347,3	4.491,0	2.397,8	1,87	10.346,0	5.056,6	3.427,8	1,48
F	13.111,6	8.940,7	5.442,8	1,64	17.364,4	9.038,4	6.702,6	1,35	19.858,7	9.987,3	7.096,8	1,41
IRL	1.902,4	1.076,9	214,5	5,02	2.548,7	1.169,4	393,9	2,97	3.490,9	1.300,6	527,3	2,47
I	10.021,8	8.506,1	3.800,4	2,24	9.740,5	6.894,9	4.473,0	1,54	10.973,7	7.452,0	5.631,1	1,32
NL	3.853,0	2.472,0	1.637,1	1,51	3.821,3	2.650,6	2.202,5	1,20	3.641,4	2.274,1	2.194,0	1,04
P	1.072,5	1.093,0	237,0	4,61	1.417,4	1.113,5	526,8	2,11	1.567,2	1.091,6	605,4	1,80
UK	7.310,5	6.816,2	3.523,4	1,93	8.191,2	6.037,0	4.503,9	1,34	9.100,9	6.662,9	4.745,3	1,40
A	_	-	-	_	1.689,5	1.156,0	1.069,6	1,08	2.188,0	1.055,2	912,4	1,16
SWE		-		-	1.279,8	1.073,3	1.015,4	1,06	1.771,8	1.160,0	1.121,7	1,03
FIN	-	-	-	-	1.180,0	922,6	551,6	1,67	1.661,5	887,9	619,6	1,43
EU	60.011,8	47.107,5	25.555,1	1,84	75.537,4	47.104,6	37.959,2	1,24	86.381,7	48.020,0	39.003,7	1,23

Note: $PT = Producer\ transfers\ (benefit);\ CT = Consumer\ transfers\ (loss);\ BT = Budgetary\ transfers\ (loss)$

Source: Own calculations

Table 5. Producer Benefit per AWU by Member State

Member	19	88, 1989 ave	rage	19	95, 1996 avei	rage	20	02, 2003 aver	rage
State	PT	AWU	PT / AWU	PT	AWU	PT / AWU	PT	AWU	PT / AWU
B/L	1.738,0	106,0	16,40	1.778,7	86,8	20,49	2.164,9	75,5	28,67
DK	1.994,1	104,2	19,14	2.243,5	88,9	25,24	2.380,4	71,0	33,53
D	10.534,6	811,9	12,98	12.111,1	777,1	15,58	13.433,3	621,4	21,62
GR	2.661,7	828,1	3,21	3.824,0	634,5	6,03	3.803,1	539,3	7,05
ESP	5.811,6	1.365,2	4,26	8.347,3	1.103,5	7,56	10.346,0	980,3	10,55
F	13.111,6	1.500,1	8,74	17.364,4	1.134,0	15,31	19.858,7	979,5	20,27
IRL	1.902,4	256,1	7,43	2.548,7	232,0	10,99	3.490,9	158,3	22,05
I	10.021,8	1.941,8	5,16	9.740,5	1.430,0	6,81	10.973,7	1.157,0	9,48
NL	3.853,0	229,5	16,79	3.821,3	224,2	17,04	3.641,4	206,2	17,66
P	1.072,5	1.013,8	1,06	1.417,4	657,1	2,16	1.567,2	511,4	3,06
UK	7.310,5	444,0	16,47	8.191,2	387,8	21,12	9.100,9	307,8	29,57
A				1.689,5	193,0	8,75	2.188,0	164,4	13,31
SWE				1.279,8	89,0	14,38	1.771,8	74,8	23,69
FIN				1.180,0	126,8	9,31	1.661,5	97,5	17,04
EU	60.011,8	9.093,2	6,60	75.537,4	7.164,7	10,54	86.381,7	5.944,3	14,53

Note: PT in million euros, PT/AWU in 000 euros.

Source: Own calculations and EUROSTAT – NewCronos Database

Table 6. Nominal Protection Rates in EU Agriculture (1988-2003)

PRODUCT	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003
Wheat	69,9	26,0	46,0	105,0	68,0	54,3	39,7	14,5	0,0	0,0	23,1	32,4	8,9	3,1	0,0	1,3
Maize	71,1	55,1	91,0	103,0	103,8	68,9	44,9	52,6	13,7	19,4	31,9	38,6	20,9	10,3	0,2	22,7
Barley	79,2	41,2	85,2	106,1	103,4	105,2	99,9	41,0	2,1	7,6	64,6	43,5	2,2	0,0	0,0	2,3
Rice	107,2	100,7	106,5	94,4	129,3	136,5	132,2	87,8	32,6	30,7	17,7	0,0	0,0	40,9	27,3	29,3
Oilseeds	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0
Sugar	118,2	53,5	78,1	116,9	141,7	109,1	74,9	73,0	87,2	92,3	116,8	148,2	103,0	90,1	124,0	157,4
Olive Oil	26,5	33,5	39,0	34,3	11,4	18,0	12,1	7,4	8,3	6,1	4,2	0,4	0,0	0,0	0,0	0,0
Wine	2,3	2,1	2,6	2,7	3,7	4,6	3,4	1,6	1,6	1,8	1,1	0,7	0,5	0,5	0,5	0,4
F & V	3,1	3,7	3,6	3,6	4,6	6,8	6,9	9,0	3,1	2,5	1,5	1,6	1,5	1,5	1,2	0,8
Milk	94,4	87,6	153,3	131,9	132,5	125,2	119,2	105,3	94,7	89,3	124,0	96,2	65,2	63,8	85,7	95,3
Beef & Veel	74,8	75,6	91,7	144,2	86,8	59,8	50,5	66,6	67,4	115,7	116,0	119,7	111,2	135,0	155,8	167,4
Porkmeat	25,1	8,5	-0,7	5,9	-6,4	9,2	9,8	11,6	16,1	12,3	14,9	43,9	31,4	24,3	22,4	26,7
Poultrymeat	33,5	37,4	46,3	38,1	63,7	68,2	77,3	88,9	70,7	47,7	36,1	64,3	51,1	48,4	53,6	51,0
Sheepmeat	187,6	155,0	137,6	108,6	99,9	33,9	50,2	72,2	44,9	26,8	35,1	33,3	24,6	42,0	30,9	35,1
Eggs	12,8	21,7	3,9	4,8	7,2	4,7	-3,5	7,0	4,4	0,1	7,3	11,6	1,9	-0,7	0,0	-1,3
Tobacco	23,8	29,7	23,3	19,4	15,3	9,9	13,3	10,5	0,6	-0,7	0,0	0,0	0,0	0,0	0,0	0,0
Cotton	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0	0,0

Source: Own calculations based on OECD PSE database data.

Table 7. World Prices for Selected Products (1988-1993)

PRODUCT	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003
Wheat	100	141	109	80	100	101	104	126	153	135	100	91	114	124	119	124
Maize	103	114	95	94	85	94	100	106	139	113	98	97	112	120	126	112
Barley	87	112	81	72	75	68	66	93	126	111	66	78	109	113	101	106
Rice	154	166	142	146	144	155	154	191	276	243	249	285	302	201	220	226
Sugar	17	26	23	18	16	18	23	23	22	21	17	14	18	21	18	14
Milk	131	149	104	110	115	124	129	143	155	155	131	143	183	197	169	156
Beef & Veel	1.483	1.590	1.303	938	1.291	1.536	1.610	1.613	1.478	1.159	1.154	1.127	1.223	944	936	894
Porkmeat	872	1.338	1.344	1.197	1.522	1.030	1.055	1.145	1.333	1.385	918	665	1.006	1.284	1.041	923
Poultrymeat	721	733	581	638	520	528	507	435	615	692	667	481	623	713	642	633
Sheepmeat	1.233	1.457	1.348	1.351	1.508	2.259	2.158	1.774	2.497	2.951	2.360	2.412	2.847	2.885	3.166	3.083
Eggs	664	666	795	825	715	793	814	674	929	875	709	624	908	943	956	1.137

Source: OECD – PSE Database.