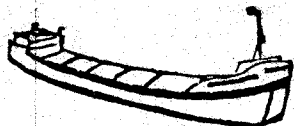


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SUMMARY

Chapter 1 describes the background development of international intra-Community goods transport by "Hire and Reward" road hauliers from 1981 to 1986. On an intra-EUR-10 basis, traffic grew by 26% and addition of Spain and Portugal in 1986 increased the market by a further 27%. Inclusion of cross-trades recorded under the Community Quota, which were growing faster than bilateral movements, added a further 3.4% in 1986 to give a total market of 100×10^9 t-km.

The use of Community Quota authorisations from 1983 to 1987 is examined in Chapter 2. Use of Community Quota authorisations rose by 65% from 1983 to 1986 on an intra-EUR-10 basis and by a further 26% in 1986 to 15.5×10^9 t-km including Spain and Portugal. Provisional results indicate a further 29% increase in 1987 to 20×10^9 t-km. The share of total traffic held by Community Quota rose from 10.5% in 1983 to 15.5% in 1986.

Cross-trading movements as a share of all Community Quota movements rose slightly from 20.3% in 1983 to 21.9% in 1986 but as a percentage of total traffic rose more rapidly from 2.1% in 1983 to 3.4% in 1986. Only on the relation between Belgium and Italy did cross-trades have more than 10% of the market in 1986.

The economic impact of the Community Quota from 1987 to 1989 is assessed in Chapter 3. The growth of total traffic from 1986 to 1989 is assumed to be 5% per annum and different growth rates for hauliers from each Member State have been derived using results from a PROGNOS study.

Two alternative scenarios are evaluated for the number of Community Quota authorisations in 1988, 13477 (that valid from 3 March 1988 onwards, "1988 B") and 17153 (the compromise proposal on the Council table of 14 March 1988, "1988 C"). For 1989 a linear 40% increase to 24021 is evaluated.

Allowing for some decrease in the average use of Community Quota authorisations, the use is forecast to be 25×10^9 t-km under scenario 1988 B and 31×10^9 t-km under scenario 1988 C (if this applied for the full year); in 1989 the forecast is 42×10^9 t-km. Corresponding to these forecasts, the share of the Community Quota in total traffic is expected to rise from 15.5% in 1986 to 19.0% in 1987, 23% under 1988 B, 28% under 1988 C (if this applied for the full year) and 36% in 1989.

In 1986 the share of the Community Quota in total traffic by haulier from each Member State varied from 10% for Netherlands and Greece to over 35% for Luxembourg, Ireland and Denmark. By 1989, the lowest share is forecast to be for France and Netherlands, 27%, while for Luxembourg, Ireland, Denmark and Portugal the share is forecast to be 70% or over; full details for all Member States in Table 3.4

CHAPTER 1

Trends in international intra-Community road haulage 1981-1986

1.1 Introduction

As explained in the introduction of the 1987 Analysis and Forecasts Report, the analysis of the role of the Community Quota in international intra-Community road haulage is best carried out in tonne-kilometres rather than tonnes.

In the previous report, prepared in March 1987, statistical data relating to the Road Directive (78/546) was not completely available for 1985 so that the principal analyses carried out related to 1984. Although the delivery of data for 1986 to the Statistical Office of the European Communities (SOEC) is similarly delayed, it was considered essential to incorporate data for 1986 so as to include Spain and Portugal as fully as possible in the analysis and to avoid some of the difficulties that occurred in the previous Report (see section 3.2.2 of the 1987 Analysis and Forecasts Report).

While the Commission has submitted a proposal to the Council to include "cross-trades" as well as "bilateral" data in Directive 78/546, this has not yet been adopted; it therefore follows, as last year, that details of bilateral movements are taken from Directive 78/546 and the (partial) data on cross-trades are taken from the Community Quota Statistics supplied under Regulation 3164/76.

At the time of writing, the 1986 Directive data has still not been fully checked by the SOEC; the analysis presented here is thus limited to international intra-Community movements by "Hire and Reward" hauliers and some of the figures are provisional. Details of "own account" together with national transport for 1986 will be given in the 1987 Annual Report.

Community Quota authorisations are valid for journeys throughout the Community; it is therefore appropriate to switch from EUR-10 (up to 1985) to EUR-12 (for 1986 onwards) when examining the share of the Community Quota in the total "Hire and Reward" market. Such an approach makes it difficult to examine trends, so that in some tables figures for both intra-EUR-10 and intra-EUR-12 movements will be presented for 1986.

1.2 Trends of "bilateral" international intra-Community road haulage by "Hire and Reward" hauliers 1981-1986.

Table 1.1 shows the trends of international intra-Community tonne-kilometres carried out by "Hire and Reward" road hauliers from each Member State on bilateral movements, i.e. cross-trades and movements by hauliers from non-Member States are excluded, as are all movements on "own account".

Table 1.1 (which corresponds to Table 1.3 in the 1987 Analysis and Forecasts Report) contains columns for 1986 on both intra-EUR-10 and intra-EUR-12 basis. This enables trends to be examined on a consistent basis for 1981 to 1986 for EUR-10 hauliers as well as giving the EUR-12 figures needed for comparisons elsewhere in this Report.

The results show a 26 % increase in bilateral international intra-Community transport by "Hire and Reward" hauliers from 1981 to 1986, or almost 5 % per annum. The rate of increase is faster during the period 1981 to 1983 than in the later period, 1983 to 1986 but it must be emphasized that this relates to bilateral transport only (the inclusion of cross-trades is examined in the sections below)

There is a considerable variation for hauliers from different Member States about the Community average increase of 26 %, with very considerable increases for the Benelux countries, United Kingdom, and especially, Ireland, small growth for France and a fall for Italy (it must however be mentioned that all Italian figures are estimates, based on tonnages recorded in trade data combined with average distance of hauliers from the partner Member State, so that care should be taken in interpreting the Italian figures).

It can also be seen that the effect of increasing the Community from 10 to 12 in 1986 was to increase the size of the (bilateral) market, as measured in tonne-kilometres, by 27%.

Table 1.1 Tonne-kilometres achieved by each Member State of haulier on international intra-Community traffic by "Hire and Reward" hauliers (x mio t-km).

Member State of haulier	intra-EUR-10							intra-EUR-12
	1981	1982	1983	1984	1985	1986	% change 86/81	
D	12208	13731	14236	14792	15628	15979	+ 31	17696
F	12260	11261	11881	12922	13234	13785	+ 12	15444
I (est)	11928	12058	13463	13047	12255	11118	- 7	12022p
NL	11057	12568	13368	14518	15672	17107	+ 55	17536
B	5463	6010	6401	6936	7364	7808	+ 43	8201
L	352e	323	323p	323p	354	544	+ 55	546
UK	2422	2539	3151	3168	2990	3568	+ 47	3963
IRL	320	356	458	451	533	693	+ 117	725
DK	2901	3119	3491	3529	3498	3775	+ 30	3978
GR	1742	2306	2718	2516	2265	2116	+ 21	2123
E	-	-	-	-	-	-	-	12870p
P	-	-	-	-	-	-	-	1746
Total	60653	64271	69490	72202	73793	76491	+ 26	96850p
Annual Change		+ 6.0%	+ 8.1%	+ 3.9%	+ 2.2%	+ 3.7%		

Note: p = provisional

1.3 Trends in "cross-trades" between Member States as reported in the Community Quota Statistics, 1983-1986

Statistics on cross-trades under Community Quotas have only been established since 1983 for t-km, while figures for cross-trades outside the Community Quota must await the extension of the Statistical Directive (Commission proposal including, inter alia, this extension published in OJ N° C4 of 8.1.88, p. 4).

Table 1.2 shows the development of this (restricted form of) cross-trading from 1983 to 1986. The 1986 figures have already been published in the 1986 Annual Report (Table 2.14 B) on an EUR-12 basis, but the results in Table 1.2 show that just over half of the extra cross-trades in 1986 were due to the adhesion of Spain and Portugal to the Community. Note especially, however, that Spanish and Portuguese hauliers had a very low propensity to cross-trade, and that nearly 60% of the extra cross-trading was carried out by French hauliers due, evidently, to their strategic position between the Iberian peninsula and the rest of the Community.

Table 1.2. Tonne-kilometres achieved in cross-trading by each Member State of haulier under Community Quota authorisations (x mio t-km)

Member State of haulier	intra EUR-10					% change 86/83	cross-trades involving E and P 1986	intra EUR-12
	1983	1984	1985	1986	1986			
D	56	63	60	99	+ 77	7	106	
F	137	158	256	250	+ 82	366	616	
I	3	2	3	36	+ 1088	4	40	
NL	689	726	886	1091	+ 58	73	1164	
B	399	439	577	781	+ 96	96	877	
L	99	112	209	302	+ 205	36	338	
UK	61	60	77	82	+ 34	6	88	
IRL	24	31	44	46	+ 91	7	53	
DK	52	51	77	78	+ 50	12	90	
GR	0	0	0	0	0	0	0	
E	x	x	x	x	x	25	25	
P	x	x	x	x	x	4	4	
Total	1520	1642	2188	2765	+ 82	636	3401	

1.4 Trends in total international intra-Community road haulage by "Hire and Reward" hauliers, 1983-1986

Table 1.3 combines the results of the bilateral movements (Table 1.1) and the cross-trades as reported under the Community Quota (Table 1.2) to give what will be called "total t-km" by "Hire and Reward" hauliers.

The increase from 1983 to 1986 for total tonne-kilometres on an EUR-10 basis (11.6%) corresponds to an average rate of 3.7% per annum. This compares with an increase of 10.1% (or 3.3% per annum) from 1983 to 1986 on the basis of bilateral movements alone, i.e. inclusion of the (partial) cross-trades increases the growth rate by almost 0.5% and indicates the danger of not recording cross-trades completely.

Table 1.3 also shows that from 1983 to 1986 the percentage increase in total t-km varied considerably between Member States, from -22% for GR to +100% for L. These divergent results are similar to those observed in Table 1.1 over a slightly longer period.

With the presentation of 1986 figures on an EUR-10 and EUR-12 basis, the importance of the admission of Spain and Portugal can be examined for hauliers from each Member State. Spanish and Portuguese hauliers have 70% of the tonne-kilometres and of the remaining 30%, French and German hauliers each with just under 10%, dominate the market.

Table 1.3. Total tonne-kilometres "Hire and Reward" (x mio t-km)

Member State of haulier	intra EUR-10					trips involving E and P 1986	intra EUR-12 1986
	1983	1984	1985	1986	% change 86/83		
D	14292	14855	15688	16078	+ 12	1724	17802
F	12018	13080	13490	14035	+ 17	2025	16060
I	13466	13049	12258	11154	- 17	908p	12062p
NL	14057	15244	16558	18198	+ 29	502	18700
B	6800	7375	7941	8589	+ 26	489	9078
L	422p	435p	563	846	+ 100	38	884
UK	3212	3228	3067	3650	+ 14	401	4051
IRL	482	482	577	739	+ 53	39	778
DK	3543	3580	3575	3853	+ 9	215	4068
GR	2718	2516	2265	2116	- 22	7	2123
E	x	x	x	x	x	12895p	12895p
P	x	x	x	x	x	1750	1750
Total	71010	73844	75982	79258	+ 11.6	20993p	100251p
Annual change	+4.0%	+2.9%	+4.3%				

1.5 Trends in Member State shares 1983-1986

Table 1.4 shows the trends in Member State shares of total tonne-kilometres by "Hire and Reward hauliers". These trends reflect the different growth rates shown in the "% change 86/83" column of Table 1.3, i.e. Luxembourg, Ireland, Netherlands and Belgium exhibit the greatest increases (on intra-EUR-10 basis) while Greece and Italy show the greatest losses (on the same basis).

Inclusion of movements with Spain and Portugal improves the relative share of Germany and, especially, France at the expense, principally, of Netherlands; this is shown in the left hand column under "intra-EUR-12" in Table 1.4. This column has been included since including Spanish and Portuguese hauliers (as shown in the final column of Table 1.4) naturally reduces the shares of all other Member States.

Table 1.4 Share of total tonne-kilometres "Hire and Reward", 1983-1986

Member State of haulier	intra EUR-10				intra EUR-12	
	1983	1984	1985	1986	1986 (provisional) EUR-10 hauliers only	
D	20.1	20.1	20.6	20.3	20.8	17.8
F	16.9	17.7	17.8	17.7	18.8	16.0
I	18.9	17.7	16.1	14.1	14.1	12.0
NL	19.8	20.6	21.8	23.0	21.8	18.7
B	9.6	10.0	10.5	10.8	10.6	9.1
L	0.6p	0.6p	0.7	1.1	1.0	0.9
UK	4.5	4.4	4.0	4.6	4.7	4.0
IRL	0.7	0.7	0.8	0.9	0.9	0.8
DK	5.0	4.8	4.7	4.9	4.8	4.1
GR	3.8	3.4	3.0	2.7	2.5	2.1
E	x	x	x	x		12.9
P	x	x	x	x		1.7
Total	100	100	100	100	100	100

CHAPTER 2

Use of Community Quota authorisations, 1983-1987

2.1 Introduction

Detailed examination of the 1984 Community Quota Statistics was presented in Chapter 2 of the 1987 Analysis and Forecasts Report (March 1987) together with summary information for 1981 to 1985. Summary information for the 1986 Community Quota Statistics was presented in Section 2.3 of the 1986 Annual Report (November 1987).

It had been hoped to carry out a detailed analysis of the 1986 situation including comparisons with the results from the 1986 Statistical Directive, but delays in finalising the Spanish and Portuguese figures makes this impractical at the moment, as one of the main reasons for moving the basis of the detailed analysis to 1986 was to include Spain and Portugal for the first time.

In this chapter, the following analyses will be presented:

- trends in use of Community Quota by Member State of haulier, 1983-1987
- share of Community Quota in total t-km by Member State of haulier, 1983-1986
- trends in cross-trading under Community Quota by Member State of haulier, 1983-1986
- trends in use of Community Quota by Member State of loading, 1984-1986
- trends for relations with important use of Community Quota, 1984 and 1986
- trends for relations with important cross-trades, 1984 and 1986
- trends for relations with important "largest cross-trader", 1984 and 1986

It should be stressed that the figures on the use of Community Quota for 1987 are provisional and include some estimates by the Commission Services.

2.2 Trends in use of Community Quotas by Member State of haulier, 1983 - 1987

In Table 2.1 are reproduced the total t-km carried by each Member State of haulier under Community Quota since 1983. As in Chapter 1, figures for 1986 are presented both on EUR-10 and EUR-12 basis.

The rapid increase in the use of Community Quota from 1983 to 1986 (up 65% on an EUR-10 basis) reflects the large increase in the number of authorisations. While most of the percentage increases are close to the Community average, those for L, IRL and GR are more than double the Community average; this is due to the fact that these Member States received much larger proportionate increases in the number of authorisations. The possibility of movements involving Spain and Portugal in 1986 increased the use of the Community Quotas by a further 26% (up from 12308 to 15537 mio t-km). Almost 60% out of the extra 3229 mio t-km were performed by Spanish and Portuguese hauliers, and of the remaining 40%, 16% was by French hauliers.

The figures for 1987 (as explained in the introduction) are provisional and contain some estimates by the Commission Services, generally only for the 4th quarter. It is thus necessary to be especially careful in interpreting these figures and no detailed analysis (by relation, etc.) will be attempted at this stage.

The (provisional) figure for 1987, 19985 mio t-km, represents a nearly 29% increase over 1986. This is somewhat smaller than the 41% increase in the number of authorisations (7437 in 1986 to an average of 10490.5 in 1987) indicating an average drop of 8 to 9% in the average use of a Community Quota authorisation.

It may be recalled that in the 1987 Analysis and Forecasts Report (Section 3.4), it was stated that the average use per authorisation must surely fall sooner or later; this point is further examined in Table 2.2 which shows the average use per authorisation by hauliers from each Member State.

Table 2.1 Tonne-kilometres achieved by hauliers from each Member State under Community Quota authorisations (x mio t-km).

Member State of haulier	intra EUR-10					trips involving E and P 1986	intra EUR-12	
	1983	1984	1985	1986	% change 86/83		1986	1987 (prov)
D	1593	1640	2125	2548	+ 60	174	2722	3104
F	821	854	1489	1348	+ 64 (a)	505	1853	2407
I	1127	1165	1491	1828	+ 62	74	1902	2312
NL	1180	1194	1479	1797	+ 52	111	1908	2753
B	818	810	1084	1334	+ 63	140	1474	2309
L	165	176	294	405	+145	40	445	610
UK	600	637	770	959	+ 60	73	1032	1209
IRL	104	121	204	251	+141	29	280	368
DK	1011	1022	1255	1627	+ 61	149	1776	1953
GR	52	101	160	211	+306	6	217	222
E	x	x	x	x	x	1549	1549	2116
P	x	x	x	x	x	380	380	622
Total	7471	7720	10350	12308	+ 65	3229	15537	19985

Notes: General: EUR totals and changes have been calculated from the more precise figures provided by Member States.

(a) The French figures for 1983 and 1984 are not comparable with later figures.

Table 2.2 shows that there was a general increase in average use from 1983 to 1986 except for DK which fell back 14% from the exceptional levels seen in 1983 and 1984. The largest increase was for GR (up 114%), but this was from an exceptionally low value in 1983. For other Member States, the largest increases (excluding F where the results up to 1984 and later are not comparable) were for L and IRL (up 22% and 17% respectively) which is surprising given that these two Member States (together with GR) received the largest number of extra authorisations.

Regarding 1987, the (provisional) results indicate considerable reductions in average use for D, I, DK and especially GR, while only B recorded an increase. Again it must be emphasized that these results are provisional, but it is necessary to use these provisional 1987 figures to make the economic impact assessment for the Community Quota for 1987 and to serve as the basis for the assessment for 1988 and 1989.

Table 2.2 Average tonne-kilometres per Community Quota authorisation (000^t)

Member State of haulier	1983	1984	1985	1986	% change 86/83	1987 (prov)	% change 87/86 (prov)
D	2192	2256	2325	2448	+12	1955	-20
F	1252	1302	1859	1936	+55(a)	1766	- 9
I	1988	2055	2068	2155	+ 8	1777	-18
NL	1884	1908	1883	1998	+ 6	1936	- 3
B	1885	1886	1901	2085	+11	2426	+16
L	1487	1588	1640	1814	+22	1720	- 5
UK	1376	1460	1398	1533	+11	1455	- 5
IRL	1176	1378	1387	1372	+17	1229	-10
DK	3314	3350	2676	2842	-14	2342	-18
GR	596	1144	1218	1275	+114	849	-33
E	x	x	x	2302	x	2296	- 0
P	x	x	x	1884(b)	x	1715	- 9

(a) see Table 2.1

(b) adjusted for the fact that authorisations were not issued during the first 7 weeks of 1986

Table 2.3 shows the trend in Member State shares of tonne-kilometres under Community Quota from 1983 to 1987, the 1987 figures are provisional. The arrangement of the columns so as to give 1986 figures on an EUR-10 and EUR-12 basis is the same as Table 1.4. The main results over the whole period from Table 2.3 are:

the increasing share of L
the decreasing share of D and DK

Table 2.3 Share of tonne-kilometres under Community Quota, 1983-1987

Member State of haulier	intra EUR-10				intra EUR-12		
	1983	1984	1985	1986	1986 EUR-10 hauliers only		1987 (prov)
D	21.3	21.2	20.5	20.7	20.0	17.5	15.5
F (a)	11.0	11.1	14.4	11.0	13.6	11.9	12.0
I	15.1	15.1	14.4	14.9	14.0	12.2	11.6
NL	15.8	15.5	14.3	14.6	14.0	12.3	13.8
B	10.9	10.5	10.5	10.8	10.8	9.5	11.6
L	2.2	2.3	2.8	3.3	3.3	2.9	3.1
UK	8.0	8.3	7.4	7.8	7.6	6.6	6.0
IRL	1.4	1.6	2.0	2.0	2.1	1.8	1.8
DK	13.5	13.2	12.1	13.2	13.1	11.4	9.8
GR	0.7	1.3	1.5	1.7	1.6	1.4	1.1
E	x	x	x	x	x	10.0	10.6
P	x	x	x	x	x	2.4	3.1
Total	100	100	100	100	100	100	100

Notes: (a) The French figures for 1983 and 1984 are not comparable with later figures (this affects figures for all other Member States marginally).

2.3 Share of Community Quota in total t-km by Member State of haulier, 1983 - 1986

The growth in the tonne-kilometres achieved by each Member State of haulier under the Community Quota (Table 2.1) being much more rapid than the growth of total international intra-Community "Hire and Reward" traffic (Table 1.3) implies a rapidly growing share held by the Community Quota. The shares, for each Member State of haulier, are shown in Table 2.4, for the period 1983 to 1986. (It should be noted that this table is slightly different from Table 2.2 in the 1987 Analysis and Forecasts Report where the divisor was "bilateral" movements not "all" movements by "Hire and Reward" hauliers).

The results in Table 2.4 show an increase of 5% on an EUR-10 basis between 1983 (10.5%) and 1986 (15.5%); there is a considerable variation between Member States in this increase (1.5% for NL up to 13.7% for DK), but there is even more variation between Member States in the actual percentage shares for different Member States in any given year. This point was also made in Section 3.6 of the 1987 Analysis and Forecasts Report.

Change from EUR-10 to EUR-12 makes little difference to the percentage shares in Table 2.4 except for France (up from 9.6 to 11.5%), although one must note that, as the percentage share for France was 11.0 in 1985, the 1986 results indicate a decided shift towards traffic with the Iberian peninsula.

Table 2.4 Percentage share of Community Quota in total international "Hire and Reward" traffic for hauliers from each Member State.

Member State of haulier	intra EUR-10					intra EUR-12
	1983	1984	1985	1986	difference 86/83	1986
D	11.1	11.0	13.5	15.8	+ 4.7	15.3
F	6.8	6.5	11.0	9.6	+ 2.8(a)	11.5
I	8.4	8.9	12.2	16.4	+ 8.0	15.8p
NL	8.4	7.8	8.9	9.9	+ 1.5	10.2
B	12.0	11.0	13.7	15.5	+ 3.5	16.2
L	39.1p	40.5p	52.2	47.9	+ 8.8p	50.3
UK	18.7	19.7	25.1	26.3	+ 7.6	25.5
IRL	21.6	25.1	35.4	34.0	+ 12.4	36.0
DK	28.5	28.5	35.1	42.2	+ 13.7	43.7
GR	1.9	4.0	7.1	10.0	+ 8.1	10.2
E	x	x	x	x	x	12.0p
P	x	x	x	x	x	21.7
Total	10.5	10.5	13.6	15.5	+ 5.0	15.5p

(a) The French figures for 1983 and 1984 are not comparable with later figures (see Table 2.1).

It is also possible to compare the percentage shares for 1986 with the estimates forecast last year; these are shown in Table 2.5 below.

Table 2.5 Comparison of 1986 percentage shares under Community Quota (in t-km).

Member State of haulier	1987 'A&F' Report (Section 3.6)	Outturn	Difference (rounded)
D	14	15.3	+ 1
F	11	11.5	< 1
I	12	15.8p	+ 4
NL	10	10.2	< 1
B	15	16.2	+ 1
L	62	50.3	-12
UK	25	25.5	< 1
IRL	48	36.0	-12
DK	40	43.7	+ 4
GR	7	10.2	+ 3
E	16	12.0p	- 4p
P	24	21.7	- 2
EUR-12	14.6	15.5p	+ 0.9

While the outturn in Table 2.5 for EUR-12 was quite close to the estimated forecast last year there were differences for individual Member States, the most notable of which were:

L and IRL, which were overestimated by 12% and GR, which was underestimated by 3% (due to fall in total traffic by GR hauliers)

2.4 Trends in cross-trading under Community Quota by Member State of haulier, 1983-1986

Statistics on cross-trading under Community Quota by Member State of haulier for 1983 to 1986 have already been given in Table 1.2 so as to be able to derive "total tonne-kilometres" by Member State of haulier; this table will not be repeated.

Comparison of Table 1.2 with Table 2.1, however, enables the share of cross-trades in total tonne-kilometres under the Community Quota to be evaluated. These results are shown in Table 2.6. Figures for 1983 to 1985 and 1986 (EUR-12 basis) were given in Table 2.16 of the 1986 Annual Report, but the new table allows the presentation on both EUR-10 and EUR-12 basis for 1986. This latter presentation demonstrates quite clearly that the large increase in the share of cross-trades for F was due to the admission of Spain and Portugal to the Community (as stated, without proof, in the 1986 Annual Report).

Table 2.6 Share of cross-trades in total t-km under Community Quota authorisations

Member State of haulier	intra EUR-10				intra EUR-12
	1983	1984	1985	1986	1986
D	3.5	3.8	2.8	3.9	3.9
F	16.7	18.5	17.2	18.5	33.3
I	0.3	0.2	0.2	2.0	2.1
NL	58.4	60.8	59.9	60.7	61.0
B	48.7	54.3	53.2	58.5	59.5
L	59.9	63.4	71.2	74.6	76.0
UK	10.2	9.4	9.9	8.6	8.5
IRL	22.8	25.8	21.8	18.3	19.0
DK	5.1	5.0	6.2	4.8	5.1
GR	0	0	0	0	0
E	x	x	x	x	1.6
P	x	x	x	x	0.9
Total	20.3	21.3	21.1	22.5	21.9

It is also interesting to examine the share of cross-trading in total tonne-kilometres for hauliers from each Member State. This is done by comparing the figures in Table 1.2 with those in Table 1.3; the results are given in Table 2.7. Figures for 1985 and 1986 (on an EUR-12 basis) have already been given in the last two columns of Table 2.15 of the 1986 Annual Report - but there are revisions for 1986 (these are marked r).

Table 2.7 Share of cross-trades in total t-km by Member State of haulier, 1983-1986

Member State of haulier	intra EUR-10				intra EUR-12
	1983	1984	1985	1986	1986
D	0.4%	0.4%	0.4%	0.6%	0.6%
F (a)	1.1%	1.2%	1.9%	1.8%	3.8%
I	0.1%	0.1%	0.1%	0.3%	0.3%
NL	4.9%	4.8%	5.4%	6.0%	6.2%
B	5.9%	6.0%	7.3%	9.1%	9.7% ^r
L	23.5% ^p	25.7% ^p	37.1%	35.7%	38.2%
UK	1.9%	1.9%	2.5%	2.2%	2.2%
IRL	5.0%	6.4%	7.6%	6.2%	6.8% ^r
DK	1.5%	1.4%	2.2%	2.0%	2.2% ^r
GR	0%	0%	0%	0%	0%
E	x	x	x	x	0.2%
P	x	x	x	x	0.2%
Total	2.1%	2.2%	2.9%	3.5%	3.4%

(a) The French figures for 1983 and 1984 are not comparable with later figures.

2.5 Trends in use of Community Quota by Member State of loading, 1984-1986

While the main interest in the analysis is the role of the Community Quota relating to "Member State of haulier" (Section 2.4), it is also of considerable interest to examine the role of the Community Quota in terms of the Member State of loading (or unloading). Figures for 1984 and 1985 have been presented in Section 2.3.4 of the 1985 and 1986 Annual Reports respectively. Here the 1986 results are given together with 1984 and 1985 for comparison.

Because the detailed figures from the Statistical Directive still have to be finalized for Spain and Portugal, the analysis presented here for 1986 only relates to EUR-10 since, on a Member State of loading basis, a change in the figures for Spanish or Portuguese hauliers will change the total figures for every Member State of loading on an EUR-12 basis. (Note this is different from the "Member State of haulier" basis presented earlier where the detailed figures for Spanish and Portuguese hauliers by relation are not required.)

The figures by Member State of loading (on an EUR-10 basis) are given in Table 2.8 for 1984, 1985 and 1986, and the corresponding percentages in Table 2.9.

As noted in the earlier Annual Reports, the share of the Community Quota in total t-km shows less differences on a "Member State of loading" basis than on a "Member State of haulier" basis.

Cross trades form a particularly high share of Community Quota movements loaded in B and a particularly low share in DK and GR.

The Community Quota plays a particularly important role for goods loaded in DK, IRL and I (34%, 31% and 24% respectively in 1986) but a minor role for goods loaded in NL, GR and F (9%, 10% and 11% respectively in 1986).

Finally it can be seen that cross-trades play a particularly important role in total movements loaded in I, B and IRL and that the role of cross-trades has increased substantially in these three Member States from 1984 to 1986. Cross-trades play a marginal role in total movements loaded in NL and, especially, GR.

Table 2.8 Tonne-kilometres international intra EUR-10 (Hire and Reward only - million tonne-kilometres)

Member State of loading	Year	All movements				Using C.Q. Authorizations
		hauliers loading	from Member States unloading	cross-trades	of: total	
D	1984	7560	9651	327	17538	1817
	1985	8078	10023	459	18560	2424
	1986	8091	10417	538	19046	2928
F	1984	7001	7315	275	14591	1101
	1985	7012	7410	324	14746	1557
	1986	7302	7608	372	15282	1678
I	1984	6855	6961	479	14295	2243
	1985	6295	7270	635	14200	2982
	1986	5902	7664	863	14429	3482
NL	1984	7953	3094	148	11195	693
	1985	8621	3082	199	11902	939
	1986	9433	3066	234	12733	1099
B	1984	3924	4088	288	8300	719
	1985	4150	4318	393	8861	994
	1986	4456	4404	519	9379	1225
L	1984	179	242	7	428	56
	1985	222	273	12	507	73
	1986	338	283	17	638	91
UK	1984	1589	1307	64	2960	382
	1985	1502	1275	81	2858	482
	1986	1766	1410	124	3300	639
IRL	1984	223	61	8	292	55
	1985	251	62	20	333	103
	1986	341	74	26	441	137
DK	1984	1976	556	43	2575	584
	1985	1906	625	51	2582	691
	1986	2015	573	61	2649	897
GR	1984	1313	354	6	1673	68
	1985	1231	187	15	1433	104
	1986	1148	202	10	1360	130

Table 2.9 Percentage of movements by Member State of loading by type (EUR-10 basis), 1984-1986

Member State of loading	Cross-trades as % of all Comm. Quota movements			Comm. Quota movements as % of all H&R movements			Cross-trades as % of all H&R movements		
	84	85	86	84	85	86	84	85	86
D	18.0	18.9	18.4	10.4	13.1	15.4	1.9	2.5	2.8
F	24.7	20.8	22.2	7.5	10.6	11.0	1.9	2.2	2.4
I	20.9	21.3	24.8	15.7	21.0	24.1	3.3	4.5	6.0
NL	21.5	21.2	21.3	6.2	7.9	8.6	1.3	1.7	1.8
B	40.0	39.5	42.4	8.7	11.2	13.1	3.5	4.4	5.5
L	13.0	16.1	18.7	13.1	14.4	14.3	1.6	2.4	2.7
UK	16.5	16.9	19.4	12.9	16.7	19.4	2.1	2.8	3.8
IRL	14.0	19.2	19.0	18.8	30.9	31.1	2.7	6.0	5.9
DK	7.4	7.3	6.8	22.7	26.8	33.9	1.7	2.0	2.3
GR	10.4	14.1	7.7	4.1	7.3	9.6	0.4	1.0	0.7
Total	21.3	21.1	22.5	10.5	13.6	15.5	2.2	2.9	3.5

2.6 Trends for relations with important use of Community Quota, 1984 and 1986

In Section 2.4 of the 1987 Analysis and Forecasts report, a detailed analysis was presented (Tables 2.4 and 2.5) on the role of the Community Quota for all relations (Member State to Member State movements); additionally two tables (2.6A and 2.6B) gave the share of the Community Quota for the "most important" relations (those with "more than 1%" and "0.3% to 1%", respectively, of the total t-km for all relations). To extend this analysis to examine trends would lead to some very extensive tables, so an alternative method similar to that used in Table 2.9 in the 1987 Analysis and Forecasts Report on "Relations with important cross-trades" has been adopted.

Table 2.10 thus shows the (ranked) 16 relations with the highest tonne-kilometres under Community Quota in 1986. Also shown is the share of total "Hire and Reward" tonne-kilometres for each relation concerned.

Table 2.10 also shows similar figures for 1984, and as the order of the relations is also the 1986 ranking, it is easy to see when the ranking has changed (e.g. B/I has a higher ranking in 1986 than 1984).

It can also be seen that, except for the relations between "D and F" and between "F and I" all relations with an important use of Community Quota had a much higher share than that for all relations (shown at the foot of the table as 15.5%). Because the "Top 14" are based on the ranked values of t-km under the Community Quota, it is, of course, to be expected that the average share of total "Hire and Reward" for the "Top 14" (22%, as also shown at the foot of the table) should be higher than that for all relations (15.5%).

The final column of Table 2.10 shows the increase between 1984 and 1986 of tonne-kilometres under Community Quota for each of the relations considered. (Note that E and P hauliers are included in the tonne-kilometres on relations between EUR-10 in 1986 but not, obviously, in 1984; however since E and P hauliers total cross-trade movements in 1986 account for only 29 of the 12308 (mio) intra EUR-10 tonne-kilometres, the error introduced by this approximation is negligible.) The ratios in the final column of Table 2.10 vary little from the overall (intra EUR-10) average (1.59) except for the high ratios I/F (1.94), B/I (1.84) and the low ratios DK/I (1.25) and I/DK (1.31).

Table 2.10 Relations with important use of Community Quota

Relation	1984		1986		t-km ratio 1986 to 1984
	t-km (mio)	Share of total H&R	t-km (mio)	Share of total H&R	
I/D	1052	19%	1488	28%	1.41
D/I	852	20%	1372	30%	1.61
B/I	382	29%	701	48%	1.84
F/D	442	10%	664	14%	1.50
D/F	405	10%	639	14%	1.58
NL/I	340	15%	567	22%	1.67
I/UK	309	18%	550	33%	1.78
I/B	271	25%	444	39%	1.64
E/D	-	-	440	n.a.	-
UK/I	233	18%	394	32%	1.69
DK/I	298	79%	372	77%	1.25
D/E	-	-	371	n.a.	-
I/F	180	4%	349	9%	1.94
F/I	194	4%	316	7%	1.63
I/DK	241	66%	316	78%	1.31
B/D	182	8%	278	11%	1.53
<u>Intra-EUR-10</u>					
Top 14	5381	n.c.	8450	22%	1.57
All	7720	10.5%	12308	15.5%	1.59
<u>Intra EUR-12</u>					
Top 16	-	-	9261	n.a.	-
All	-	-	15537	15.5%	

n.c.= not calculated
n.a.= not available

2.7 Trends for relations with important cross-trades, 1984 and 1986

This section, as Section 2.6, examines the role of the Community Quota by relation; in this case however it is the tonne-kilometres of cross-trades under Community Quota that is examined.

Table 2.11 shows the (ranked) 16 relations with the highest tonne-kilometres performed in cross-trades under Community Quota in 1986. Also shown is the share of total tonne-kilometres under Community Quota and the share of total "Hire and Reward" tonne-kilometres for the relation concerned - the format is the same as Table 2.9 in the 1987 Analysis and Forecasts Report.

For 1986, the share of cross-trades (in total tonne-kilometres under Community Quota) on those relations with important cross-trades is frequently over 40% (B/I, I/B, E/D, D/E, I/NL, F/B) whereas the overall share of cross-trades is 22%; indeed the average for the "Top 16" is 28%, as shown at the foot of the table.

For 1986, the share of cross-trades (in total "Hire and Reward" tonne-kilometres) on those relations with important cross-trades exceeds 10% on only 2 relations (B/I and I/B) and exceeds 5% on a further 5 relations (I/D, NL/I, I/UK, I/NL, UK/I) although one should note that the shares are not yet available for the relations involving E. Note that the average for the "Top 14" is 5.3%, compared to the overall share of 3.5% (EUR-10 basis).

Table 2.11 also shows similar figures for 1984, and, as in Table 2.10 of Section 2.6, it is easy to see when the ranking has changed (e.g. B/I has a higher ranking in 1986 than 1984); these figures (ranked on 1984 basis) were presented in the 1987 Analysis and Forecasts Report. While there are some changes in the share of cross-trades in total tonne-kilometres under Community Quota between 1984 and 1986, it is more important to examine the changes in the share of cross trades in total "Hire and Reward" tonne-kilometres. First of all one should recall the increase in the overall share of cross-trades from 2.2% in 1984 to 3.5% in 1986 (EUR-10 basis). Large increases in the share of cross-trades on relations with important cross-trades can be seen for B/I (up from 11.4% to 22.3%) and I/B (up from 8.2% to 16.5%) and I/UK (up from 3.7% to 8.6%) and UK/I (up from 2.7% to 5.7%), indicating that cross-traders are exerting an increasing pressure on these relations.

Finally Table 2.11 shows the increase between 1984 and 1986 of the absolute tonne-kilometres under cross-trades for each of the relations considered. The ratios in the final column of Table 2.11, show that cross-trades increased particularly quickly on the following relations, I/UK, B/I and I/B.

Table 2.11 Relations with important "cross-trades"

Relation	1984 cross-trades			1986 cross-trades			t-km ratio 1986 to 1984
	t-km mio	Share of C.Q.	Total H&R	t-km mio	Share of C.Q.	Total H&R	
B/I	148	39	11.4	326	47	22.3	2.20
I/D	205	19	3.7	307	21	5.8	1.50
I/B	87	32	8.2	190	43	16.5	2.18
E/D	-	-	-	177	40	n.a.	-
F/D	113	25	2.5	173	26	3.7	1.53
D/F	103	25	2.5	170	27	3.7	1.65
NL/I	102	30	4.4	160	28	6.2	1.57
D/I	88	10	2.1	152	11	3.3	1.73
D/E	-	-	-	150	40	n.a.	-
I/UK	64	21	3.7	144	26	8.6	2.25
I/NL	56	39	4.2	105	42	6.5	1.88
B/D	68	38	3.0	105	38	4.2	1.54
D/B	58	38	2.8	94	39	4.4	1.62
I/F	44	24	1.1	79	23	2.0	1.80
UK/I	36	16	2.7	70	18	5.7	1.94
F/B	46	48	1.9	63	43	2.4	1.37
<u>Intra-EUR-10</u>							
Top 14	1218	n.c.	n.c.	2138	26	5.3	1.67
All	1645	21	2.2	2765	22	3.5	1.68
<u>Intra-EUR-12</u>							
Top 16	-	-	-	2465	28	n.a.	-
All	-	-	-	3401	22	3.4	-

It is also of interest to examine the cross-trade situation according to the relations which have the highest tonne-kilometres under Community Quota in 1986, i.e. the "Top 16" relations of Table 2.10. The results are shown in Table 2.12 and the difference in ranking of relations between "Community Quota basis" and "Cross-trades basis" can easily be seen.

Table 2.12 Cross-trades on relations with important use of Community Quota, 1986

Relation	Com. Quota t-km mio	Cross-trades		
		t-km mio	C.Q.	Share of Total H&R
I/D	1488	307	21	5.8
D/I	1372	152	11	3.3
B/I	701	326	47	22.3
F/D	664	173	26	3.7
D/F	639	170	27	3.7
NL/I	567	160	28	6.2
I/UK	550	144	26	8.6
I/B	444	190	43	16.5
E/D	440	177	40	n.a.
UK/I	394	70	18	5.7
DK/I	372	11	3	2.3
D/E	371	150	40	n.a.
I/F	349	79	23	2.0
F/I	316	59	19	1.3
I/DK	316	21	7	5.2
B/D	278	105	38	4.2
<u>Intra-EUR-10</u>				
Top 14	8450	1967	23	5.0
All	12308	2765	22	3.5
<u>Intra-EUR-12</u>				
Top 16	9261	2294	25	n.a.
All	15537	3401	22	3.4

2.8 Trends for relations with important "largest cross-traders", 1984 and 1986

From the Community Quota statistics, information is available not only for "all cross-trades" on each relation (as discussed in Section 2.7) but also the cross-trades performed by each of the 10 Member States who are neither the origin or destination of a particular relation. In order to investigate the situation of "active" cross-traders, this Section examines the role of the "largest cross-traders". Later, the most important "largest cross-trader on each relation" will be examined, but since there may be several "active" cross-traders on a given relation (for example B/I), a first examination of "largest cross-traders" will rank the "Top 16" irrespective of whether a particular relation occurs more than once; the results are shown in Table 2.13.

Table 2.13 shows the "Top 16" "largest cross-traders" ranked according to the tonne-kilometres in 1986. Also shown are the share of "all cross-trades" (C.T.), "Community Quota" (C.Q.) and "Total Hire & Reward" (H&R) on that relation; finally the Member State whose hauliers are the "largest cross-traders" is shown in brackets.

In 1986, NL had 8 out of the "Top 16" "largest cross-traders", followed by B (4), F (3) and L (1). In 4 cases, including both NL and F on the relation B/I, the "largest cross-trader" had more than 5% of the "total Hire and Reward" market on the relation concerned, the highest percentage being 10.4% for NL on the B/I relation. The calculation of the totals at the foot of Table 2.13 would, except for the totals given, have no meaning since relations are already double counted (and in one case triple counted) in the "Top 16"; for this reason the usual "all" line at the foot of the table has been excluded. For the same reason the shares for "Top 14" and "Top 16" have no meaning in Table 2.13 and have thus been left blank.

Table 2.13 also shows the "largest cross-trader" for the same relations in 1984. Excluding relations with E, 12 of the 14 relations had the same Member State as "largest cross-trader" in both years; additionally the only exceptions, Rank 10, F/D (NL) instead of F/D (B) and Rank 16, F/D (2) (B) instead of F/D (2) (NL), represent just a small switch between the "largest" and "2nd largest" cross-traders on the relation F/D.

Table 2.13 also shows that, for the "Top 14 Intra EUR-10" the growth of the "largest cross-trades" 1.70 was very close to the ratio observed in Tables 2.10 and 2.11. Individual "largest cross-traders" showing exceptionally high growth among the "Top 14" were L (on B/I (3)), NL (on I/B) and NL (on B/I), where the growth exceeded 2.4 in each case.

Table 2.13 Relations with important "largest cross-trader"

Relation	1984 largest cross-trader					1986 largest cross-trader					t-km ratio 1986 to 1984
	t-km mio	C.T.	C.Q.	H&R	M.S.	t-km mio	C.T.	C.Q.	H&R	M.S.	
I/D	127	62	12	2.3	(NL)	182	59	12	3.6	(NL)	1.4
B/I	63	43	16	4.8	(NL)	152	47	22	10.4	(NL)	2.4
E/D	-	-	-	-	-	141	80	32	n.a.	(F)	-
D/E	-	-	-	-	-	115	77	31	n.a.	(F)	-
NL/I	65	64	19	2.8	(B)	110	69	19	4.3	(B)	1.7
I/B	40	46	15	3.8	(NL)	102	54	23	8.8	(NL)	2.6
I/NL	40	71	28	3.0	(B)	81	77	32	5.0	(B)	2.0
B/I(2)	43	29	11	3.3	(F)	78	24	11	5.3	(F)	1.8
B/D	59	87	32	2.6	(NL)	77	73	28	3.0	(NL)	1.3
F/D	50	44	11	1.1	(NL)	75	43	11	1.6	(B)	1.5
D/I	44	50	5	1.0	(NL)	69	45	5	1.5	(NL)	1.6
B/I(3)	24	16	6	1.8	(L)	69	21	10	4.7	(L)	2.9
D/F	54	52	13	1.3	(NL)	63	37	10	1.4	(NL)	1.2
D/B	48	83	31	2.4	(NL)	61	65	25	2.9	(NL)	1.3
D/F(2)	30	29	7	0.7	(B)	60	35	9	1.3	(B)	2.0
F/D(2)	43	38	10	0.9	(B)	60	35	9	1.3	(NL)	1.4
<u>Intra- EUR-10</u>											
Top 14	730					1239					1.70
<u>Intra- EUR-12</u>											
Top 16	-					1495					-

Finally, as in Section 2.7, it is also of interest to examine the "largest cross-trader" situation according to the relations which have the highest tonne-kilometres under Community Quota in 1986, i.e. the "Top 16" relations. The results are shown in Table 2.14.

In 1986, NL had 7 out of the "Top 16" "largest cross-trader on relations with highest tonne-kilometres under Community Quota" followed by B (6), F (2) and D (1).

The inclusion of D in the "Top 16" may surprise readers, considering the low "total cross-trades" by D hauliers (99 mio t-km in 1986 - Table 1.2); however on the relation I/DK where capacity is very "tight" (78% of the total "Hire and Reward" t-km is under Community Quota - Table 2.10), D has 71% of all cross-trades on this relation and 3.7% of the total "Hire and Reward" t-km on this relation (the 5th highest percentage obtained among the "Top 16").

Table 2.14 "Largest cross-traders" on relations with important use of Community Quota, 1986

Relation	Com. Quota t-km mio	Largest cross-trader				M.S.
		t-km mio	Share of C.T.	C.Q.	Total H&R	
I/D	1488	182	59	12	3.6	(NL)
D/I	1372	69	45	5	1.5	(NL)
B/I	701	152	47	22	10.4	(NL)
F/D	664	75	43	11	1.6	(B)
D/F	639	63	37	10	1.4	(NL)
NL/I	567	110	69	19	4.3	(B)
I/UK	550	58	40	11	3.5	(B)
I/B	444	102	54	23	8.8	(NL)
E/D	440	141	80	32	n.a.	(F)
UK/I	394	46	66	12	3.8	(B)
DK/I	372	5	45	1	1.0	(NL)
D/E	371	115	77	31	n.a.	(F)
I/F	349	49	62	14	1.2	(B)
F/I	316	32	54	10	0.7	(B)
I/DK	316	15	71	5	3.7	(D)
B/D	278	77	73	28	3.0	(NL)
<u>Intra-EUR-10</u>						
Top 14 relations	8450	1035	52	12	2.6	
<u>Intra-EUR-12</u>						
Top 16 relations of which largest cross-trader	9261	1291	56	14	n.a.	
- NL (7)	5294	650	52	12	3.2	
- B (6)	2840	370	54	13	2.0	
- F (2)	811	256	78	32	n.a.	
- D (1)	316	15	71	5	3.7	

CHAPTER 3

Expected economic impact of Community Quota, 1987 to 1989

3.1 Introduction

In Chapter 2 it was shown that in 1986 15.5% of the tonne-kilometres performed by Hire and Reward hauliers in international intra-Community (EUR-12) traffic was done under Community Quota authorisations. With the continuing rapid cumulative increase in the number of Community quota authorisations since 1984: 30 % in 1985, 41 % in 1986 (although this, of course, includes Spain and Portugal for the first time), 55% in 1987, and 17 % already agreed for 1988, it is of considerable interest to examine the development of the expected share of the Community Quota in total Hire and Reward international intra-Community traffic.

Before proceeding to the calculation of the expected economic impact of Community Quota authorisations from 1987 to 1989, it is first necessary to forecast the tonne-kilometres performed by Hire and Reward hauliers from 1987 to 1989.

3.2 Forecast of total "Hire and Reward" international intra-Community tonne-kilometres, 1987-1989

In Table 1.3 the "total tonne-kilometres" performed by "Hire and Reward" hauliers on international intra-Community journeys was shown for 1983 to 1986 on an EUR-10 basis together with the 1986 results on an EUR-12 basis. This "total tonne-kilometres" was taken as the sum of the bilateral movements (reported under the Statistical Directive 78/546) and cross-trade movements (reported under the Community Quota Regulation 3164/76).

Due to the availability of preliminary results from a PROGNOS study, it is now possible to derive separate growth factors for "total tonne-kilometres" for hauliers of each Member State. This provides a more robust method of estimating differential growth rates for different Member States than that used in the 1987 Analysis and Forecasts Report which depended on the pro-rata growth of cross-trades. The new method not only allows faster growth rates to be applied to the new Member States, Spain and Portugal, but also can be used with more confidence for the predictions.

Due to the confidentiality associated with the preliminary results from the PROGNOS multi-client study, it is not possible, at present, to set out the precise tonnage forecasts for 1990 on which the differential growth rates have been calculated. It should also be stressed that the differential growth rates have been constrained around a Community average of 5% and that this does not necessarily correspond to the overall PROGNOS figure for road haulage. The reason for using 5% is that the latest figures available for tonnes (6.3%, 2,8% and 7.7% for the first three quarters of 1987 - Quarterly Report N° 27) together with the figures for recent years (4.7% average growth rate 1981 to 1986 (bilaterals only - Table 1.1) and slightly higher if one takes cross-trades into account) suggest that 5% growth of road haulage (in tonne-kilometres) is sustainable with the 2.5% growth of gross domestic product expected over the next few years (average growth rate for the last few years has been remarkably steady at about 2.2%).

Table 3.1 sets out the (rounded) growth rates for hauliers from different Member States ranging from 3.6% for Ireland to 7.9% for Portugal together with the estimated total tonne-kilometres for "Hire and Reward" hauliers on intra-Community international journeys for 1986 to 1989 (the 1986 figures are taken from Table 1.3). Full details of the calculations are given in Annex C.

Table 3.1 Growth rates and total tonne-kilometres for hauliers from different Member States, 1986-1989

Member State of haulier	Growth rate	"Hire and Reward" total t-km international intra Community (x mio t-km)			
		1986	1987	1988	1989
D	4.0%	17802	18519	19264	20037
F	4.2%	16060	16733	17433	18161
I	5.3%	12062	12705	13381	14091
NL	4.8%	18700	19595	20531	21509
B	5.3%	9078	9563	10073	10610
L	5.3%	884	931	981	1033
UK	4.7%	4051	4242	4442	4651
IRL	3.6%	778	806	835	865
DK	4.7%	4068	4261	4463	4673
GR	7.4%	2123	2280	2449	2629
E	6.6%	12895	13741	14640	15597
P	7.9%	1750	1888	2037	2197
EUR-12	5.0%	100251	105264	110529	116053

3.3 Number of Community Quota authorisations, 1984 - 1989

The breakdown of authorisations between Member States is given in Table 3.2. For 1987, two sets of figures are given; that marked "I" corresponds to the Decision of the Council of 16 December 1986 which relates to the "15% + compensation" increase (these numbers of authorisations were valid for the 1st half of 1987), and that marked "II" corresponds to the Decision of the Council of 30 June 1987 which relates to the "40 % + compensation" increase (valid for the 2nd half of 1987).

For 1988, three sets of figures are given; that marked "A" which relates to the Decision of the Commission of 6 October 1987 which related to the 15 % increase (valid from 1st January 1988), that marked "B" which relates to the Decision of the Commission of 26 November 1987 which relates to the "15 % + compensation" increase (valid from 3rd March 1988) and that marked "C" which relates to the compromise proposal on the table of the Council of 14 March 1988 which relates to the "40 % + compensation" increase.

For 1989, a linear increase of 40 % (as per the compromise proposal on the table of the Council of 14 March 1988), has been used.

Table 3.2

Number of Community Quota authorisations, 1984 - 1988

Member State	1984	1985	1986	1987	
				I	II
D	727	914	1112	1441	1735
F	656	801	957	1238	1488
I	567	721	883	1178	1424
NL	626	785	955	1291	1553
B	434	570	707	868	1036
L	111	179	245	305	404
UK	436	551	673	760	902
IRL	88	147	204	258	341
DK	305	469	625	739	929
GR	88	131	170	230	293
E			673	829	1014
P			233	309	416
EUR-10/12	4038	5268	7437	9446	11535

Member State	1988			1989
	A	B	C	
D	1955	1955	2374	3324
F	1671	1671	2018	2826
I	1610	1660	2022	2831
NL	1743	1743	2104	2946
B	1190	1190	1488	2084
L	501	501	693	971
UK	1027	1027	1265	1771
IRL	420	420	671	940
DK	1103	1103	1444	2022
GR	365	415	658	922
E	1175	1225	1543	2161
P	517	567	873	1223
EUR-12	13277	13477	17153	24021

3.4 Forecast of use of Community Quota authorisations, 1988-1989

Information on the total tonne-kilometres under Community Quota authorisations for hauliers from each Member State have been set out in Table 2.1 for 1983 to 1986 together with provisional results for 1987; the average tonne-kilometres per authorisation have also been given in Table 2.2.

Examination of the results of Table 2.2 indicates that the steady rise in average tonne-kilometres per authorisation has ended, indeed the provisional results for 1987 show a reduction for most Member States.

A method has been developed to allow for the reduction of average tonne-kilometres per authorisation as the number of Community Quota authorisations increases; the method is described in Annex A.

The forecast use of Community Quota authorisations for 1988 (1988 B and 1988 C, see Section 3.3) and 1989 together with the figures for 1986 and the (provisional) figures for 1987 are shown in Table 3.3. The forecasts for 1988 and 1989 are obtained by combining the number of authorisations (shown in Table 3.2) with the average tonne-kilometres per authorisation for 1987 (from Table 2.2) and applying the method for the reduction of average tonne-kilometres per authorisation as the number of Community Quota authorisations increases (Annex A). Full details of the calculation are shown in Annex B.

Table 3.3 Use of Community Quota authorisations, 1986-1989
(x mio t-km)

Member State of haulier	1986 (actual)	1987 (prov.)	1988 B (forecast)	1988 C (forecast)	1989 (forecast)
D	2722	3104	3822	4641	6498
F	1853	2407	2951	3564	4991
I	1902	2312	2950	3593	5031
NL	1908	2753	3374	4073	5703
B	1474	2309	2887	3610	4902
L	445	610	743	839	933
UK	1032	1209	1494	1826	2381
IRL	280	368	467	606	714
DK	1776	1953	2401	2812	3425
GR	217	222	352	559	783
E	1549	2116	2813	3543	4962
P	380	622	941	1238	1542
EUR-12	15537	19985	25195	30904	41865

3.5 Share of Community Quota in total "Hire and Reward" international intra-Community tonne-kilometres, 1987-1989

Dividing the figures in Table 3.3 on the use of Community Quota authorisations by those from Table 3.1 on the total tonne-kilometres by "Hire and Reward" hauliers on intra EUR-12 journeys, the percentage share of the Community Quota can be calculated; the results are set out in Table 3.4.

Table 3.4 shows that the disparities observed between Member States in 1986 (see Section 2.3.3, Table 2.15 of the 1986 Annual Report) are estimated to have been only marginally reduced in 1987 and are not forecast to be substantially reduced in 1988 or 1989. The analysis thus supports the view that hauliers from some Member States will, effectively, be free from quantitative restrictions several years before 1992.

Table 3.4 Percentage share of Community Quota in total international intra EUR-12 traffic by "Hire and Reward" hauliers, 1986-1989 (in t-km)

Member State of haulier	1986 (actual)	1987 (estimate)	1988 B (forecast)	1988 C (forecast)	1989 (forecast)
D	15.3	16.8	20	24	32
F	11.5	14.4	17	20	27
I	15.8p	18.2	22	27	36
NL	10.2	14.0	16	20	27
B	16.2	24.1	29	36	46
L	50.3	65.5	76	86	90
UK	25.5	28.5	34	41	51
IRL	36.0	45.7	56	73	83
DK	43.7	45.8	54	63	73
GR	10.2	9.7	14	23	30
E	12.0p	15.4	19	24	32
P	21.7	32.9	46	61	70
EUR-12	15.5p	19.0	22.8	28.0	36.1

REDUCTION OF AVERAGE USE OF COMMUNITY QUOTA AUTHORISATIONS

Introduction

The methodology presented here was developed to assess the role of the Community Quota as requested by the Council in June 1986. As the proposal on the Council table since March 1988 only gives the proposed number of authorisations for 1988 and 1989, the analysis in this report only goes as far as 1989. The methodology for the adjustment of average use of Community Quota authorisations has however been developed to permit an analysis through to 1992 using the same procedure.

1. The planned cumulative increase in the number of Community Quota authorisations is very much higher than the expected growth of total tonne-kilometres achieved by "Hire and Reward" hauliers (assumed to be 5 % in this report). It follows that the share held by Community Quota of the tonne-kilometres achieved by "Hire and Reward" hauliers will also rise rapidly, particularly initially. However it is quite evident that the share cannot exceed 100 % and a method is required to adjust the average tonne-kilometres per authorisation so that there is a decline as 1993 approaches. Such an adjustment would give a more realistic estimate of the share of tonne-kilometres achieved under the Community Quota.
2. The simplest adjustment method which was first examined was to assume that the average tonne-kilometres per authorisation remained the same, for each Member State, until the share held by the Community Quota reached 100 % of total "Hire and Reward" tonne-kilometres; thereafter the average tonne-kilometres was adjusted so that the share remained exactly at 100 %. Diagrammatically the assumptions are shown in Figures A1 and A2.

Figure A 1

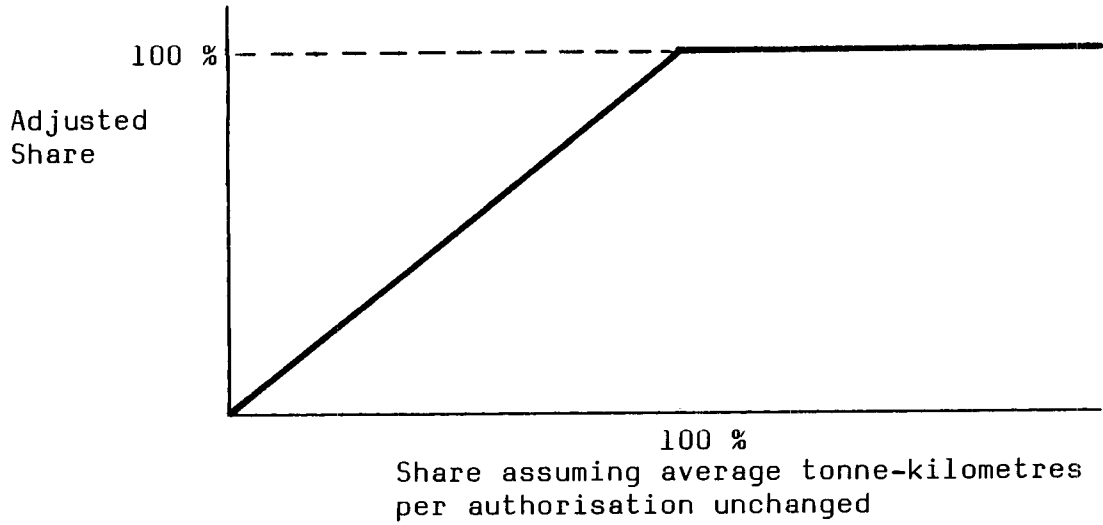
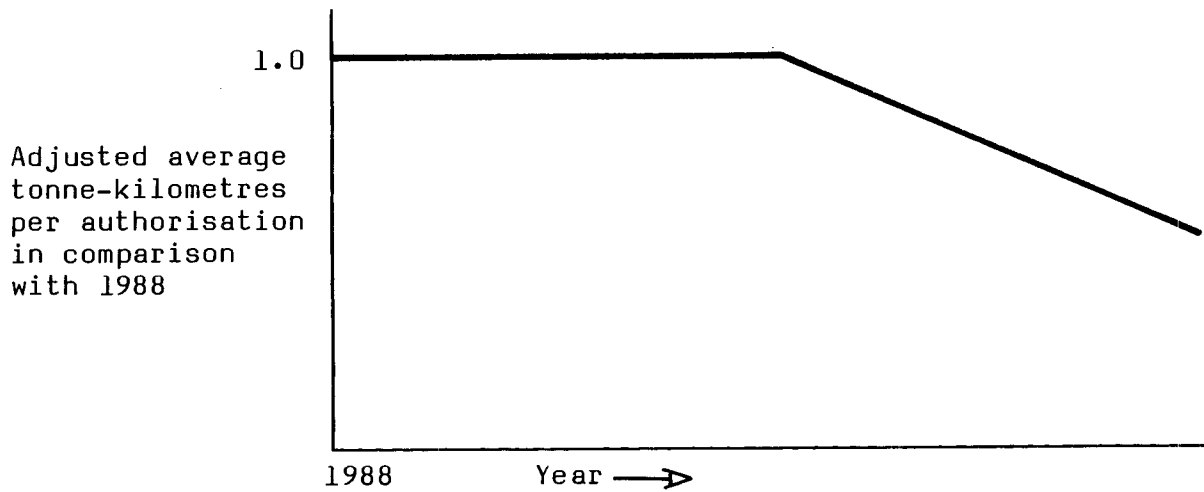


Figure A 2



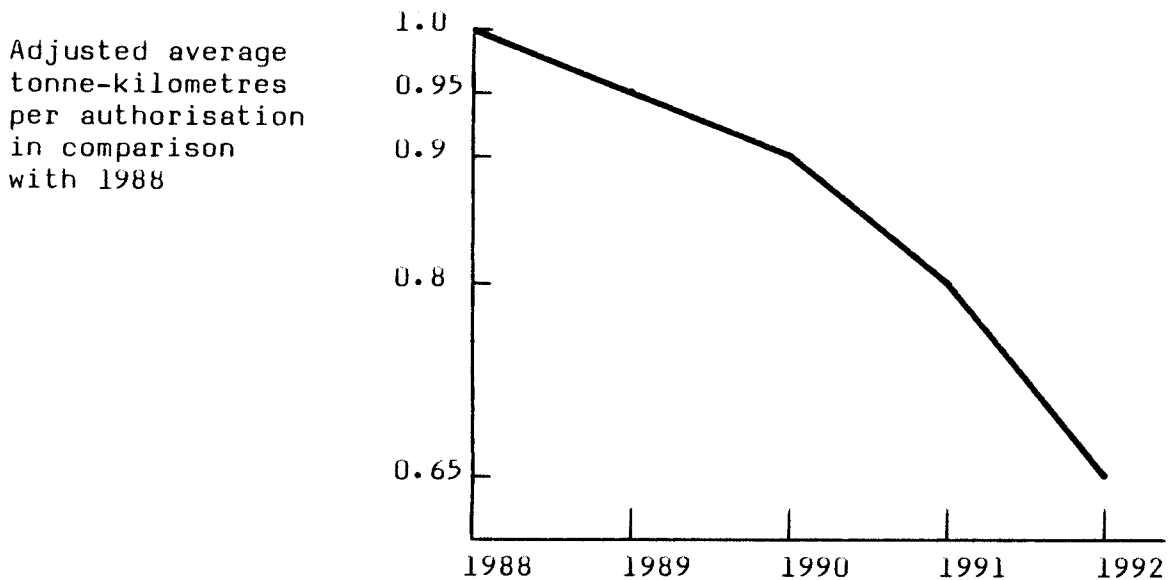
While the above method gave "plausible" results, the sharp "discontinuity" in both diagrams was unsatisfactory mathematically.

3. A second method examined was to assume that, as 1993 approached, the average tonne-kilometres per authorisation for each Member State, decreased by a fixed amount, so that one should use a series of multipliers, say,

0.95	1989
0.9	1990
0.8	1991
0.65	1992

Diagrammatically the assumption can be seen in Figure A 3 which should be compared to Figure A 2.

Figure A 3



Even with this method it was necessary to apply, in addition, the "100 % limit" on the share held by the Community Quota to avoid getting "impossible" results.

While this method gave results that were broadly plausible as far as the share of tonne-kilometres under the Community Quota were concerned, the method provided no adjustment (except where the "100 % limit" was reached) to the relative tonne-kilometres per authorisation for different Member States, and hence no relative adjustment to the "tonne-kilometres per authorisation" for each Member State.

A further minor difficulty was that there was no self-evident way in adjusting the multipliers, if it was desired to look at alternative overall growth rates (other than 5 %) or other rates of increasing the overall Community Quota (other than 40 %).

4. The method finally adopted was to establish a "Universal" adjustment factor which was only a function of the % share of total tonne-kilometres carried out by "Hire and Reward" hauliers that would have been held by the Community Quota if the "average tonne-kilometres per authorisation" had remained constant.

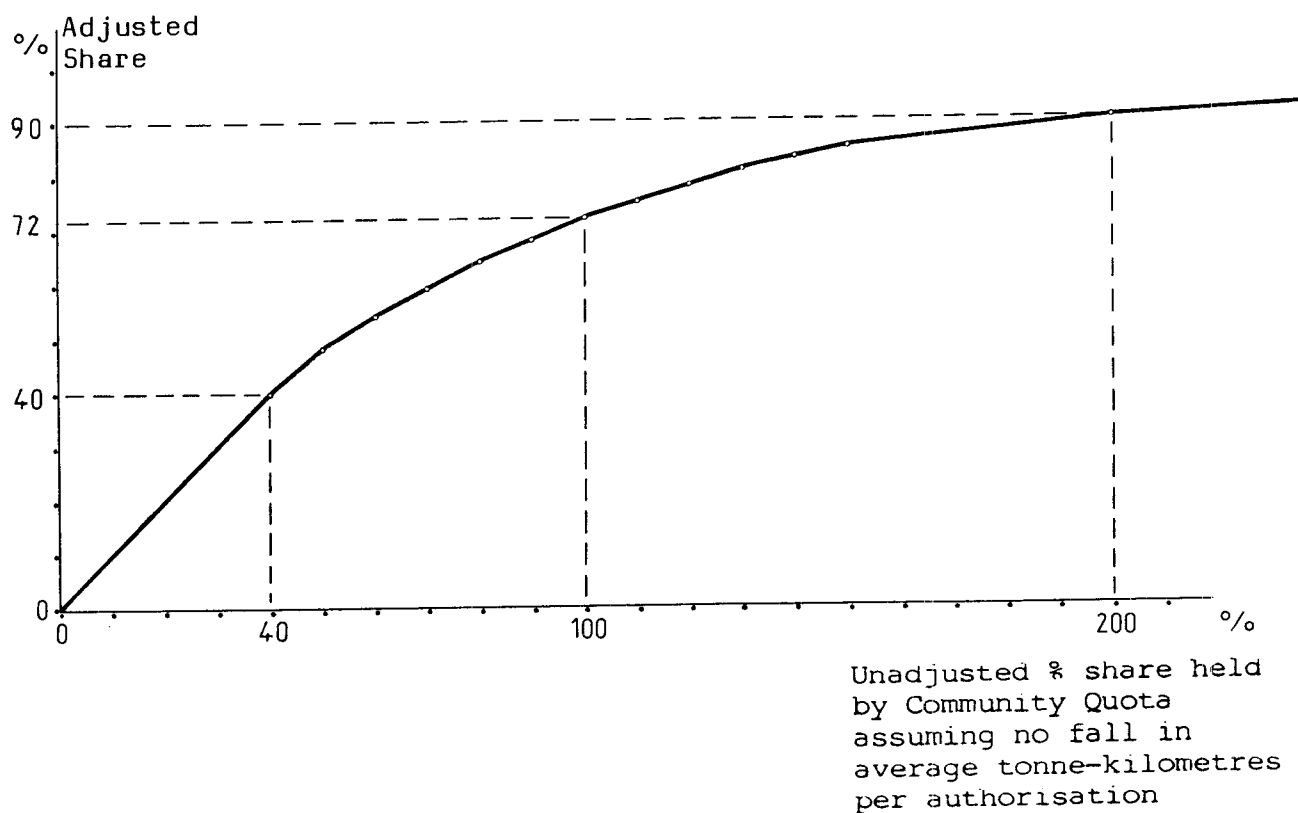
The "Universal" adjustment factor had to be established empirically as Member States are not yet exhibiting a sufficient drop in average use which would permit a calibration. It was assumed that providing the % share held by the Community Quota was less than 40 %, there would be no adjustment, but that as the share exceeded 40 %, there would be a progressively larger reduction in such a way that the % share never exceeded 100 %. For simplicity an adjusted value was established for each of the following unadjusted values, 40 %, 50 %, 60 %, ..., 150 %, 200 %, 300 %, 400 %, 600 % and it was assumed that linear interpolation between these unadjusted values would be sufficiently accurate for practical purposes. The tabular values adopted were as shown in Table A1.

Table A 1

Unadjusted % share held by Community Quota assuming no fall in average tonne-kilometres per authorisation	Adjusted % share
0 - 40 %	No change
50 %	48 %
60 %	54 %
70 %	59 %
80 %	64 %
90 %	68 %
100 %	72 %
110 %	75 %
120 %	78 %
130 %	81 %
140 %	83 %
150 %	85 %
200 %	90 %
300 %	95 %
400 %	98 %
600 %	99 %

Diagrammatically the assumptions for the "Universal" adjustment factor can be seen in Figure A 4, this should be compared with Figure A 1.

Figure A 4



It should be stressed that other "Universal" adjustment factor curves could be established which have an initial slope of 45° and finally approach the 100 % "adjusted share". It follows that, while the "Universal" adjustment factor curve chosen may not give the correct absolute level of adjusted share for Member States, it does provide a method of adjustment that will give a better estimate of the relative share for each Member State.

5. In applying the "Universal" adjustment factor described in the previous section, it should be noted that 3 Member States, L, IRL and DK had already exceeded the 40 % share (in 1987) from which an adjustment takes place.

To allow for this fact, it was necessary to "calculate backwards" (since the "observed" % in 1987 is already assumed to be adjusted) and estimate what the unadjusted % would have been in 1987.

Although this refinement produced a rather small change in the final figures, except for L, it would be necessary to make this refinement in any future assessment which used 1988 (or later) observed values. The "refinement" has thus been included in this Report to indicate the methodology.

6. The forecast through to 1989 using the "Universal" adjustment factor method described in Section 4 and the "refinement" described in Section 5 are given in Annex B.

Forecast of total tonne-kilometres under Community Quota authorisations

The (unadjusted) tonne-kilometres under Community Quota authorisations are calculated pro rata to the increase in the number of authorisations (Table B1). Dividing these results by those for total tonne-kilometres (Table 3.1) gives the (unadjusted) % share under Community Quota authorisations (Table B2).

The adjusted figures are obtained via the "Universal adjustment factor" table (Table A1) in Annex A. The unadjusted % shares (Table B2) are examined one by one in the left-hand column (of Table A1) and the corresponding adjusted % share read off from the right-hand column (of Table A1) - interpolating linearly for intermediate values. The resulting adjusted % shares are set out in Table B 3.

The (adjusted) tonne-kilometres under Community Quota authorisations are then obtained by multiplying the (adjusted) % shares (Table B3) by the Total tonne-kilometres (Table 3.1); the results are given in Table B4.

Tables B1 to B4 also show, at the foot of the tables, the modified results for L, IRL and DK to take into account the fact that these Member States had over 40% of the tonne-kilometres under Community Quota in 1987 (see section 5 of Annex A). These modified figures are called "pre-adjusted" in Tables B1 and B2 (since they have been adjusted backwards) while those in Tables B3 and B4 are described as "pre- and post-adjusted" (as they have been adjusted backwards and then forwards using the Universal adjustment factor). It should be noted that the pre- and post-adjusted figures for L, IRL and DK are the same as the "adjusted" figures given in the upper part of the table for 1987 only.

TABLE B1

UNADJUSTED TOTAL-KM UNDER COMMUNITY QUOTA

	Ave. t-km per auth.				
	1987	1987	1988 B	1988 C	1989
D	1955	3104	3822	4641	6498
F	1766	2407	2951	3564	4991
I	1777	2312	2950	3593	5031
NL	1936	2753	3374	4073	5703
B	2426	2309	2887	3610	5056
L	1720	610	862	1192	1670
UK	1455	1209	1494	1841	2577
IRL	1229	368	516	825	1155
DK	2342	1953	2583	3382	4736
GR	849	222	352	559	783
E	2296	2116	2813	3543	4962
P	1715	622	972	1497	2097
EUR-12	(23644)	19985	25576	32320	45259

PRE-ADJUSTED FIGURES FOR L, IRL AND DK

L	2200	780	1102	1525	2136
IRL	1269	380	533	851	1193
DK	2411	2011	2659	3481	4875

TABLE B2

UNADJUSTED % SHARE UNDER COMMUNITY QUOTA

	1987	1988 B	1988 C	1989
D	16.8	19.8	24.1	32.4
F	14.4	16.9	20.4	27.5-
I	18.2	22.0	26.9	35.7
NL	14.0	16.4	19.8	26.5+
B	24.1	28.7	35.8	47.7
L	65.5+	87.9	(121.5+)	(161.7)
UK	28.5+	33.6	41.4	55.4
IRL	45.7	61.8	98.8	(133.5+)
DK	45.8	57.9	75.8	(101.3)
GR	9.7	14.4	22.8	29.8
E	15.4	19.2	24.2	31.8
P	32.9	47.7	73.5-	95.4
EUR-12	19.0	23.1	[29.2]	[39.0]

PRE-ADJUSTED FIGURES FOR L, IRL AND DK

L	83.8	(112.3)	(155.5-)	(206.8)
IRL	47.1	63.8	(101.9)	(137.9)
DK	47.2	59.6	78.0	104.3

TABLE B3

ADJUSTED % SHARE UNDER COMMUNITY QUOTA

	1987	1988 B	1988 C	1989
D	16.8	19.8	24.1	32.4
F	14.4	16.9	20.4	27.5-
I	18.2	22.0	26.9	35.7
NL	14.0	16.4	19.8	26.5+
B	24.1	28.7	35.8	46.2
L	65.5+	67.2	78.4	86.2
UK	28.5+	33.6	41.1	51.2
IRL	45.7	54.9	71.5+	81.7
DK	45.8	52.7	61.9	72.4
GR	9.7	14.4	22.8	29.8
E	15.4	19.2	24.2	31.8
P	32.9	46.2	60.8	70.2
EUR-12	19.0	22.7	27.8	36.0

PRE- AND POST-ADJUSTED FIGURES FOR L, IRL AND DK

L	65.5+	75.7	85.5+	90.3
IRL	45.7	55.9	72.6	82.6
DK	45.8	53.8	63.0	73.3
EUR-12	19.0	22.8	28.0	36.1

TABLE B4

ADJUSTED T-KM UNDER COMMUNITY QUOTA

	1987	1988 B	1988 C	1989
D	3104	3822	4641	6498
F	2407	2951	3564	4991
I	2312	2950	3593	5031
NL	2753	3374	4073	5703
B	2309	2887	3610	4902
L	610	659	769	890
UK	1209	1494	1826	2381
IRL	368	458	597	707
DK	1953	2352	2763	3383
GR	222	352	559	783
E	2116	2813	3543	4962
P	622	941	1238	1542
EUR-12	19985	25053	30776	41773

PRE- AND POST-ADJUSTED FIGURES FOR L, IRL AND DK

L	610	743	839	933
IRL	368	467	606	714
DK	1953	2401	2812	3425
EUR-12	19985	25195	30904	41865

Growth rates for hauliers from different Member States, 1986-1989

Based on the preliminary (confidential) results of a PROGNOS multi-client study, it was possible to extract the marginal totals for movements between EUR-12 (the PROGNOS study covered more States) for 1984 and 1990. Averaging these marginal totals for both "in" and "out" traffic produced a single tonnage for each Member State for both 1984 and 1990, from which an annual growth rate could be calculated. Each individual growth rate was then expressed as a ratio to the growth rate for EUR-12 as a whole. These factors are shown in column (2) of Table C.1.

It should be noted that these factors are calculated from the tonnages moved "in" and "out" of each Member State irrespective of "Member State of haulier". To use this approach to derive the growth rates for each "Member State of haulier" thus implies that each Member State retains the same share of traffic "in" and "out" of its Member State; this is a neutral assumption which should be approximately valid in the short run.

Applying the multipliers to the "tonne-kilometres" in 1986, Column (3), gives a much larger total (106552) than the sum of Column (3), (100251), mainly due to the fact that the figures in Column (3) are tonne-kilometres whereas the factors from the PROGNOS work were based on tonnes. It is thus necessary to apply an initial adjustment factor of 0.940865 (100251/106552) to the multipliers in Column (2); the result is given in Column (5). To produce the required growth rates for an overall (EUR-12) growth of 5%, it is just necessary to multiply Column (5) by 5%; this is shown in Column (6).

Table C.2 sets out the calculations from the 1986 base through to 1989 using the growth rates from Column (6) of Table C.1. Except for 1987, it is necessary to apply a further small adjustment factor so as to control the overall (EUR-12) increase to exactly 5%.

Table C.1

Growth rates for hauliers from different Member States

Member State	Multiplier (from PROGNOS study)	Total t-km 1986	Product (2) x (3)	Adjusted multiplier (2) x initial adj. factor	Growth rates for overall 5% growth rate (5) x 5%
(1)	(2)	(3)	(4)	(5)	(6)
D	0.855867	17802	15236	0.805255	4.026%
F	0.890886	16060	14308	0.838203	4.191%
I	1.132603	12062p	13661	1.065627	5.328%
NL	1.017194	18700	19021	0.957042	4.785%
B		9078	10319	1.069497	5.347%
L	1.136717	884	1005	1.069497	5.347%
UK	1.004249	4051	4068	0.944863	4.724%
IRL	0.758705	778	590	0.713839	3.569%
DK	1.006963	4068	4096	0.947416	4.737%
GR	1.571400	2123	3336	1.478475	7.392%
E	1.393965	12895p	17975	1.311533	6.558%
P	1.678474	1750	2937	1.579217	7.896%
EUR-12		100251	106552		

Initial adjustment factor $\frac{100251}{106552} = 0.940865$

Table C.2

Total t-km under 5% overall growth rate with growth rates for individual Member States based on Table C.1, 1986-1989 (mio t-km)

Member State of haulier	Growth Rate	1986	1987		1988			1989		
			extra	total	extra	adj. extra	total	extra	adj. extra	total
Total of which	5%	100251	5013	105264	5263	(5265)	110529	5526	(5524)	116053
D	4.026%	17802	717	18519	746	745	19264	776	773	20037
F	4.191%	16060	673	16733	701	700	17433	731	728	18161
I	5.328%	12062	643	12705	677	676	13381	713	710	14091
NL	4.785%	18700	895	19595	938	936	20531	982	978	21509
B	5.347%	9078	485	9563	511	510	10073	539	537	10610
L	5.347%	884	47	931	50	50	981	52	52	1033
UK	4.724%	4051	191	4242	200	200	4442	210	209	4651
IRL	3.569%	778	28	806	29	29	835	30	30	865
DK	4.737%	4068	193	4261	202	202	4463	211	210	4673
GR	7.392%	2123	157	2280	169	169	2449	181	180	2629
E	6.558%	12895	846	13741	901	899	14640	960	957	15597
P	7.896%	1750	138	1888	149	149	2037	161	160	2197
Check totals		100251	5013	105264	5273	5265	110529	5546	5524	116053

Adjustment factor:

$$\frac{5263}{5273} = 0.998104$$

$$\frac{5526}{5546} = 0.996394$$

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