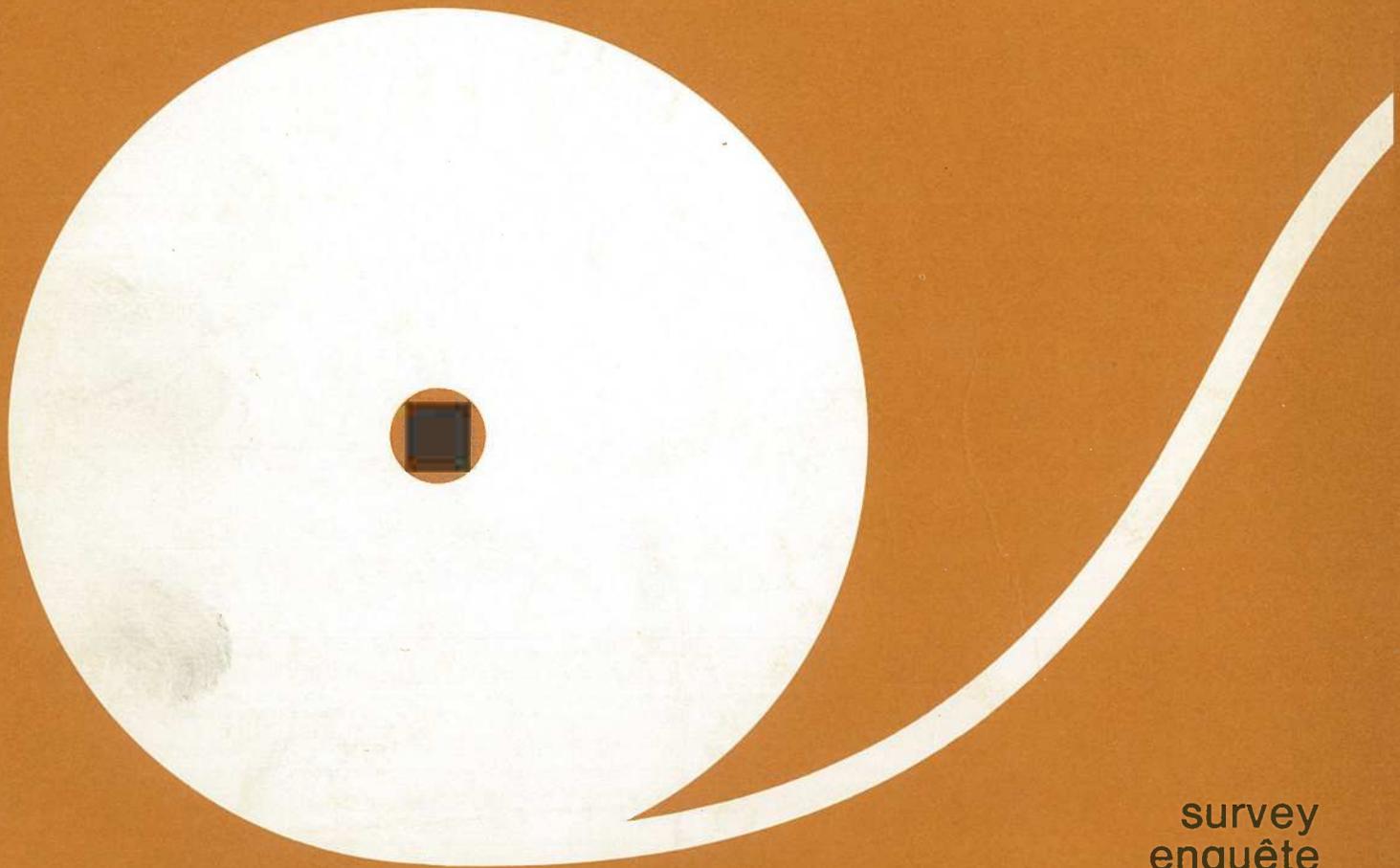


pulp and paper capacities
capacités de la pâte et du papier
capacidades de pasta y papel



survey
enquête
estudio

1978-1983

pulp and paper capacities
capacités de la pâte et du papier
capacidades de pasta y papel

survey
enquête
estudio

1978-1983

Notice

The designations employed and the presentation of material in this publication do not imply the expression of any opinion whatsoever on the part of the Food and Agriculture Organization of the United Nations concerning the legal status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries. The designations "developed" and "developing" economies are intended for statistical convenience and do not necessarily express a judgement about the stage reached by a particular country or area in the development process.

Avertissement

Les appellations employées dans cette publication et la présentation des données qui y figurent n'impliquent, de la part de l'Organisation des Nations Unies pour l'alimentation et l'agriculture, aucune prise de position quant au statut juridique des pays, territoires, villes ou zones, ou de leurs autorités, ni quant au tracé de leurs frontières ou limites. Les expressions « pays développé » et « pays en développement » sont utilisées pour des raisons de commodité statistique et n'expriment pas nécessairement un jugement quant au niveau de développement atteint par tel ou tel pays ou région.

Aviso

Las denominaciones empleadas en esta publicación y la forma en que aparecen presentados los datos que contiene no implican, de parte de la Organización de las Naciones Unidas para la Agricultura y la Alimentación, juicio alguno sobre la condición jurídica de países, territorios, ciudades o zonas, o de sus autoridades, ni respecto de la delimitación de sus fronteras o límites. Las definiciones de economías « desarrolladas » y « en desarrollo » se usan para fines estadísticos y no representan un juicio acerca del nivel alcanzado en el proceso de desarrollo por un país o área determinados.

M-71

ISBN 92-5-000752-3

© FAO 1979

TABLE OF CONTENTS

TABLE DES MATIERES

INDICE

	<u>Page</u> - <u>Página</u>
Report on the FAO Survey of World Pulp and Paper Capacities 1978-83	1
Rapport concernant l'Enquête FAO sur la capacité mondiale de production de pâte et papier 1978-83	15
Informe de la FAO sobre la Encuesta acerca de la Capacidad Mundial de Producción de Pasta y Papel 1978-83	29
Annexes	43
Definitions	57
Définitions	67
Definiciones	78
Country Data	
Chiffres par Pays	
Datos Relativos a los Países	89
List of Countries	
Liste de Pays	
Lista de los Países	90
Pulp Terminology	
Terminologie de la pâte	
Terminología de la pasta	92
Paper and Paperboard Terminology	
Terminologie du papier et du carton	
Terminología de Papel y Cartón	93

Report on the FAO Survey

of

World Pulp and Paper Capacities 1978-83

by

The Secretariat

The annual FAO Surveys of World Pulp and Paper Capacities are based on figures received early in the year from correspondents in most countries of the world and on Secretariat estimates for the remaining few countries. By and large, the data are provided by national pulp and paper trade associations from information obtained from members during the preceding year concerning their future development plans. The results accordingly reflect industries' intentions at the time of the surveys, which subsequent economic, financial and market conditions may influence significantly.

The coverage and content of the survey have been modified somewhat this year, but not the presentation. Two more countries are expecting to start up pulp and/or paper mills within the next few years and their capacity data are included for the first time. In view of the increasing importance of thermo mechanical pulp, specific information on this grade is provided, as well as modified details for folding boxboard. In addition, four countries are known to have revised the basis of their national surveys with attendant significant results. In the case of Austria and the Republic of Korea, the revisions have been upwards and in the case of the United States of America and New Zealand downwards, so that for these countries data are not entirely comparable with those provided last year. In the United States, only expansions for which funds have been committed are now included, whereas in previous surveys projects under serious consideration but for which funds had not been allocated were also taken into account. Because of the absolute size of the U.S. industry, this modification has resulted in much lower world totals for the latter years of the survey than would otherwise have been the case, possibly of the order of 2 million tons of paper and board and an even greater volume of pulp.

As an adjunct to the statistical data, a list of expansion plans has once again been prepared, thanks to the co-operation of many of the participants in the survey, and is published separately. Where appropriate, the expected additional capacity has been cross checked with the data given in the current survey, but it should be noted that the list is not exhaustive; significant additional capacity can result from machine improvements, confidential plans, etc., details of which are not available. It is hoped nonetheless that the information provided will be useful for all those planning the future of the industry.

The main findings of the pulp and paper capacity survey for 1978-83 are that:

- (a) world capacity of paper grades of pulp is expected to rise from 145 million tons in 1978 to 164 million tons in 1983. This increase of 19 million tons represents an annual growth of 2.5 per cent;
- (b) world capacity of paper and paperboard is expected to rise from 188 million tons in 1978 to 214 million tons in 1983. This increase of 26 million tons represents an annual growth of 2.7 per cent;
- (c) the additional 19 million tons of paper grades of pulp and the 26 million tons of paper and board are the lowest increases anticipated in any of the surveys this decade. If, however, the basis of the U.S. data had not been changed the decline registered in successive surveys would have been halted and even reversed;
- (d) world woodpulp capacity in 1983 is slightly below that envisaged for 1982 in last year's survey. However, capacity in U.S.A. in 1983 is 1.5 million tons below that given for 1982 in last year's survey, due mainly to the changed data basis. For the remaining countries of the world, the 1983 capacity is higher by just over 1 million tons. By contrast, paper and board estimates are considerably higher, even allowing for the lower U.S. figures, due mainly to more buoyant plans in Canada and Scandinavia;
- (e) thermo mechanical pulp capacity, recorded for the first time, is believed to amount to 3.2 million tons in 1978 and may expand to 7.0 million tons by 1983;
- (f) no major change is envisaged in the volume of chemical woodpulp expected to come on stream during the next five years. It remains approximately the same as given in last year's survey after allowance is made for U.S.A.;
- (g) bleached hardwood sulphate pulp capacity is likely to register a gain of 2.8 million tons from 16.9 million tons in 1978 to 19.7 million tons in 1983, an amount significantly smaller than the volume in excess of 4 million tons envisaged in the last three surveys;
- (h) other fibre pulp continues to play an important role in providing domestic raw materials for papermaking in developing countries, accounting for approximately one third of capacity. In Asia, the proportion exceeds 50 per cent;
- (i) an important increase in paper and board capacity in developing countries is expected, adding over one third or nearly 5 million tons to their existing manufacturing capability. An almost equal addition is expected in countries with centrally planned economies. Increases in capacity in the developed countries, although larger in volume (17.1 million tons) will mean an expansion of some 10 per cent;
- (j) after a few years of relatively slow growth newsprint capacity should expand more rapidly during the next few years, particularly in Canada;
- (k) the ratio of pulp manufacturing capacity to paper and board capacity is still declining.

Product and Regional Trends

The latest survey indicates that the world capacity of paper grades of pulp is expected to increase from 145.4 million tons in 1978 to 164.5 million tons in 1983, at the same time as total paper and paperboard capacity rises from 187.7 to 214.2 million tons. The growth of capacity by main grades since 1978 is shown in Table 1 and illustrates that over the fifteen year period capacity increased most rapidly between 1968 and 1973 and that the future growth of pulp is likely to be at the same rate as in the five year period 1973-78. This overall pattern varies considerably, however, according to grades of pulp. Future growth of paper and board will be slower than in the recent past. Details of capacity by major products and regions for each of the years 1978-83 are contained in Annexes 1-6.

Table 1 - World Pulp, Paper and Paperboard Capacity, 1968-83

	Total Capacity				Annual Average Increase		
	1968	1973	1978	1983	1968-73	1973-78	1978-83
	-- million metric tons --				-- per cent --		
Total woodpulp, paper grades	98.1	120.0	134.9	152.0	4.1	2.4	2.4
Mechanical (a)	25.5	28.9	32.6	37.4	2.5	2.5	2.8
Semi-chemical (b)	7.0	9.8	10.4	11.6	7.2	1.2	2.1
Chemical	65.6	81.2	91.9	103.0	4.4	2.5	2.3
Other fibre pulp	7.1	7.8	10.4	12.5	1.9	5.9	3.8
Dissolving pulp	5.3	5.3	6.0	6.6	2.2	0.4	1.7
Total Paper and Paperboard	127.0	160.2	187.7	214.2	4.8	3.2	2.7
Newsprint	22.1	24.7	26.4	31.9	2.3	1.3	3.9
Printing and Writing	24.9	35.3	42.8	49.6	7.2	4.0	3.0
Other paper and Paperboard	80.1	100.3	118.5	132.7	4.6	3.4	2.3

- (a) including thermo mechanical pulp
(b) including chemi-groundwood

In the last four surveys, the anticipated rate of growth in woodpulp capacity for the five years ahead has been diminishing from 4.1 per cent to 3.4, 3.1, 2.7 and to 2.4 per cent in the current survey. This lowering of expectations has been almost identically matched in the case of paper and board with an uninterrupted decline from 4.1 per cent to 2.7 per cent. The latest figures would have been slightly higher had it not been for the revised basis of American data. Comparing the year by year figures, there is an acceleration in the rate of increase in capacity to 1980, the high rate is maintained from 1980-81 and is then followed by a marked tailing off, as is shown in Table 2.

Table 2 - Annual Rate of Increases in World Pulp, Paper and Paperboard Capacity 1978-83

	Annual Increases				
	1978-79	1979-80	1980-81	1981-82	1982-83
	per cent				
Total woodpulp, paper grades	2.4	3.1	3.1	2.4	1.1
Mechanical (a)	2.2	3.8	3.5	3.4	1.1
Semi-chemical (b)	2.1	3.3	2.0	2.5	0.6
Chemical	2.5	2.8	3.0	2.1	1.2
Other fibre pulp	5.7	4.8	2.3	3.1	3.0
Dissolving pulp	1.9	2.3	1.9	1.0	1.6
Total paper and paperboard	3.0	3.0	3.3	2.6	1.5
Newsprint	3.7	3.0	5.6	4.5	2.4
Printing and writing	2.8	4.7	2.6	2.9	1.8
Other paper and board	2.9	2.4	2.9	2.1	1.2

(a) including thermo mechanical pulp (b) including chemi-groundwood

This is hardly surprising as expansions within the next two or three years represent firm commitments on the part of companies, whereas those in later years are less firmly committed, or as in the case of the United States are not now reflected in capacity data. In addition, in a few countries capacity surveys cover a shorter period than five years.

Total Pulp for Papermaking

An increase of 19.2 million tons of papermaking pulp capacity is expected between 1978 and 1983, at an annual average rate of 2.5 per cent, which is some 1.7 million tons more than was actually installed between 1973 and 1978 but still less than the increase in the previous five year period 1968-73. Mechanical pulp will account for 4.8 million tons (including 3.8 million tons of thermo mechanical pulp), semi-chemical 1.1 million, chemical pulp 11.1 million and the remaining 2.1 million tons will be other fibre pulp. Only small additional quantities of dissolving pulp are planned.

The developments which are taking place in hardwood pulps, mainly bleached sulphate and semi-chemical pulps, are of declining significance. Expansion is much lower in the major producing countries and the new projects utilising tropical hardwoods have yet to reach their full potential.

All but a small proportion of papermaking pulp capacity is located in developed countries. With the implementation of various plans in developing countries, not only has the volume of capacity risen but also the proportion of the world total located within these territories. It may reach 3.1 per cent in 1983 compared to 2.6 per cent in 1973.

Market Pulp

Canada is the world's largest producer of market pulp and its capacity accounts for about one quarter of the world total. The present survey indicates that total market pulp capacity will expand by a further 2.8 million tons in the next three years, keeping pace with developments in the recent past. Most of the additional tonnage will be located in Brazil, where three major facilities have been started up. As their production expands to reach full capacity the market pulp available from Brazil will reach approximately 1 million tons or about half the quantity which was envisaged some years ago in that country's National Plan for Pulp and Paper. Practically all the additional market pulp will be bleached sulphate pulp, more softwood than hardwood, and most of the hardwood coming from Brazil. The developments can be traced in detail in Annexes 7 and 8 and are illustrated in Annex 11.

Woodpulp

The volume of additional capacity of woodpulp for papermaking in the world between 1978 and 1983 is expected to be 17.1 million tons, an amount considerably larger than was actually installed in the previous five years. It is of interest to note that the actual world capacity in 1978 of 134.9 million tons is less than was envisaged for that year in the 1977-82 survey, indicating that the general uncertainty as to future economic conditions caused cancellation or delays to some projects and in a few instances resulted in mill closures. Delays in implementing plans are also evident in later years, particularly in Sweden, Canada, France and Brazil. In some other countries, however, expansion plans have been augmented. The size and location of new capacity is summarised in Table 3.

Table 3 - Increases in Capacity of Total Woodpulp
for Papermaking, 1973-83

	Capacity			Total Increase		Annual Average Increase	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	'000 metric tons					per cent	
World Total	119 984	134 945	152 011	14 961	17 066	2.4	2.4
Dev'd Mkt. Economies	103 742	113 281	123 173	9 539	9 892	1.8	1.7
Northern America	61 708	67 003	72 321	5 295	5 318	1.7	1.5
Japan	10 772	12 064	13 610	1 292	1 546	2.3	2.5
Western Europe	29 230	31 440	33 978	2 210	2 538	1.5	1.6
Oceania	1 348	2 090	2 474	742	384	9.2	3.4
Others	684	684	790	-	106	-	2.9
Dev'ing Mkt. Economies	3 783	5 906	9 808	2 123	3 902	9.3	10.7
Africa	260	354	818	94	464	6.4	18.2
Latin America	2 635	4 413	6 861	1 778	2 448	10.9	9.2
Asia	888	1 139	2 129	251	990	5.1	13.3
Cent. Planned Economies	12 459	15 758	19 030	3 299	3 272	4.8	3.8
Asia	1 825	2 447	3 024	622	577	6.0	4.3
Eastern Europe	2 854	3 661	4 361	807	700	5.1	3.6
U.S.S.R.	7 780	9 650	11 645	1 870	1 995	4.4	3.8

Had it not been for the fact that U.S. capacity data now excludes in the latter years of the survey those projects for which funds have not been committed, it is likely that the increase in overall world woodpulp capacity for papermaking would have been greater in the current survey than in last year's. Nonetheless the expansion foreseen (9.9 million tons) in developed countries from 1978-83 is greater than the additional capacity actually installed (9.5 million tons) between 1973 and 1978. The same applies, but in more marked degree, in the developing countries where if all plans reach fruition the increase should be almost double the additions made between 1973 and 1978. In the countries with centrally planned economies, little variation is anticipated.

Comparing the current survey with the previous one, most of the reduced volume in the five year spans is due to lower expectation in the United States (2.3 million tons mainly for reasons already mentioned) and Sweden (0.6 million tons). These are partially counterbalanced by the improved outlook in Norway which has registered a figure higher by 0.5 million tons than the comparable one in the earlier survey.

Mechanical Pulp

Between 1978 and 1983, it is anticipated that the capacity of mechanical pulp, including thermo mechanical pulp, will rise by 4.8 million tons, compared to 4.1 million tons in the preceding survey. The higher rate of growth, 2.8 per cent annually compared to 2.4 per cent, is due partly to the greater use of TMP and partly to the more buoyant plans for newsprint expansion. Particularly rapid growth is expected in Japan, Australia and in some of the developing countries. Attention is drawn to the fact that the capacity for New Zealand has been revised downwards in this survey as mechanical pulp for the manufacture of fibre building board is now excluded in conformity with the definitions.

Table 4 - Increases in Capacity of Mechanical Woodpulp*
for Papermaking, 1973-83

	Capacity			Total Increase		Annual Average Increase	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	'000 metric tons			-		per cent	
World Total	28 865	32 635	37 454	3 770	4 819	2.5	2.8
Dev'd Mkt. Economies	24 748	27 704	31 698	2 956	3 994	2.3	2.7
Northern America	12 869	13 721	15 385	852	1 664	1.3	2.3
Japan	1 592	2 111	2 871	519	760	5.8	6.3
Western Europe	9 618	10 824	11 993	1 206	1 169	2.4	2.1
Oceania	433	787	1 143	354	356	12.7	7.7
Others	236	261	306	25	45	2.0	3.2
Dev'ing Mkt. Economies	742	880	1 240	138	360	3.5	7.1
Africa	15	17	36	2	19	2.5	16.2
Latin America	391	466	613	75	147	3.6	5.6
Asia	336	397	591	61	194	3.4	8.3
Cent. Planned Economies	3 375	4 051	4 516	676	465	3.7	2.2
Asia	795	901	1 103	106	202	2.5	4.1
Eastern Europe	630	950	968	320	18	8.6	0.4
U.S.S.R.	1 950	2 200	2 445	250	245	2.4	2.1

* including thermo mechanical pulp

Data for thermo mechanical pulp were collected for the first time and many countries were able to provide the relevant information, only a few not being able separately to identify it. In 1978, the capacity of TMP listed amounted to 3.2 million tons and by 1983 it is expected to reach 7.0 million tons. In North America, where one third of the world capacity is to be found, the growth of TMP installations has been partly at the expense of stone groundwood, the capacity of which has declined. At present, there appears to be no TMP capacity in the developing countries although plans exist in four countries for such mills.

A summary of existing and future TMP capacity is given in the following table. More detailed statistics are available in the country data.

Table 5 - Increases in Capacity of Thermo Mechanical Pulp
1978 - 83

	Capacity		Increase
	1978	1983	1978-83
	----- '000 metric tons -----		
World Total	3 237	7 038	3 801
Dev'ed Mkt. Economies	3 237	6 701	3 464
Northern America	1 188	2 893	1 705
Japan	621	1 364	743
Scandinavia	1 276	1 855	579
Other Western Europe	112	196	84
Oceania	40	393	353
Dev'ing Mkt. Economies	-	217	217
South America	-	112	112
Asia	-	105	105
U.S.S.R.	-	120	120

Semi-Chemical Pulp

Between 1978 and 1983, the world capacity of semi-chemical and chemi groundwood pulp will expand from 10.5 to 11.6 million tons, or by 1.1 million tons at an annual rate of 2.1 per cent. The increase is less than was foreseen in last year's survey due principally to the lower figures for North and Latin America, which were not completely counterbalanced by higher figures for Africa and Asia. Slightly more than one third of additional capacity will be located in the developed and in the developing countries.

Table 6 - Increases in Capacity of Semi-chemical Woodpulp
for Papermaking, 1973-83

	Capacity			Total Increase		Annual Average Increase	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	'000 metric tons			-		per cent	
World Total	9 840	10 457	11 592	617	1 135	1.2	2.1
Dev'd Mkt. Economies	8 845	9 014	9 423	169	409	0.4	0.9
Northern America	4 209	4 630	4 882	421	252	1.9	1.1
Japan	2 305	1 918	1 999	- 387	81	- 3.6	0.8
Western Europe	1 909	1 893	1 969	- 16	76	- 0.2	0.8
Oceania	270	411	411	141	-	8.8	-
Others	152	162	162	10	-	1.3	-
Dev'ing Mkt. Economies	445	482	882	37	400	1.6	12.8
Africa	5	10	66	5	56	14.9	46.0
Latin America	264	409	568	145	159	9.2	6.8
Asia	176	63	248	- 113	185	-18.7	32.0
Cent. Planned Economies	550	961	1 287	411	326	11.8	11.8
Asia	-	-	-	-	-	-	-
Eastern Europe	170	411	487	241	76	19.3	3.5
U.S.S.R.	380	550	800	170	250	7.7	7.8

Chemical Woodpulp for Papermaking

The proportion of chemical woodpulp to total papermaking pulp has remained constant at 63.0 per cent for many years and it seems unlikely to change in the near future. Between 1978 and 1983, world capacity is expected to grow from 91.9 million tons to 103.0 million tons, at an average annual rate of 2.3 per cent. Even with an appropriate adjustment for the changed basis of U.S. data, the increase in the next five years is probably less than was expected at the time of last year's survey, particularly in Western Europe.

The decline in the capacity of sulphite pulp, both bleached and unbleached, continues. In the United States, some 800 000 tons of capacity has been shut down since 1960 and in the next three years a further 80 000 tons will be closed. Likewise in Canada, the decline continues, as it does also in Scandinavia. Reference to "Information on Projected Pulp and Paper Mills in the World 1978-88" will provide details of mill closures as well as the few new facilities being planned in other countries.

Table 7 - Increases in Capacity of Chemical Woodpulp
for Papermaking, 1973-83

	Capacity			Total Increase		Annual Average Increase	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	----- '000 metric tons -----					-- per cent --	
World Total	81 279	91 853	102 965	10 574	11 112	2.5	2.3
Dev'ed Mkt. Economies	70 149	76 563	82 052	6 414	5 489	1.8	1.4
Northern America	44 630	48 652	52 054	4 022	3 402	1.7	1.4
Japan	6 875	8 035	8 740	1 160	705	3.2	1.7
Western Europe	17 703	18 723	20 016	1 020	1 293	1.1	1.4
Oceania	645	892	920	247	28	6.7	0.6
Others	296	261	322	- 35	61	- 2.4	4.3
Dev'ing Mkt. Economies	2 596	4 544	7 686	1 948	3 142	11.7	11.1
Africa	240	327	716	87	389	6.4	17.0
Latin America	1 980	3 538	5 680	1 558	2 142	12.3	9.9
Asia	376	679	1 290	303	611	12.5	13.7
Cent. Planned Economies	8 534	10 746	13 227	2 212	2 481	4.7	4.2
Asia	1 030	1 546	1 921	516	375	8.5	4.4
Eastern Europe	2 054	2 300	2 906	246	606	2.3	4.8
U.S.S.R.	5 450	6 900	8 400	1 450	1 500	4.8	4.0

Other Fibre Pulp

It is anticipated that between 1978 and 1983 the capacity of other fibre pulp for papermaking, excluding waste paper, will rise from 10.4 to 12.5 million tons, or by 2.1 million tons, equivalent to an annual rate of 3.8 per cent.

Table 8 - Increases in Capacity of Other Fibre Pulp
for Papermaking, 1973-83

	Capacity			Total Increase		Annual Average Increase	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	----- '000 metric tons -----					-- per cent --	
World Total	7 836	10 408	12 526	2 572	2 118	5.9	3.8
Dev'ed Mkt. Economies	2 262	1 724	1 736	- 538	12	- 5.3	0.1
Northern America	1 000	667	698	- 333	31	- 7.7	0.9
Japan	6	4	4	- 2	-	- 7.7	-
Western Europe	1 202	938	919	- 264	- 19	- 4.9	- 0.4
Oceania	2	5	5	3	-	20.0	-
Others	52	110	110	58	-	16.2	-
Dev'ing Mkt. Economies	2 041	2 791	3 938	750	1 147	6.5	7.1
Africa	158	199	232	41	33	4.7	3.1
Latin America	777	1 025	1 540	248	515	5.7	8.5
Asia	1 106	1 567	2 166	461	599	7.2	6.7
Cent. Planned Economies	3 533	5 893	6 852	2 360	959	10.8	3.1
Asia	2 906	5 158	5 976	2 252	818	12.2	3.0
Eastern Europe	227	260	276	33	16	2.8	1.2
U.S.S.R.	400	475	600	75	125	3.5	4.8

During the period 1973-78, there was a decline of 0.5 million tons of capacity in the developed countries, due to the closure of some straw pulping facilities in Western Europe and a statistical adjustment of North American capacity to bring it into line with agreed definitions. In the developing and centrally planned countries, where almost all the expansion will occur, other fibre pulp is an important source of raw materials. It accounts on average for about one third of capacity in the developing countries and more than one half in Asian developing countries.

Dissolving Pulp

The capacity of dissolving pulp, which has shown only very modest growth in the past decade or so, will rise by 10 per cent over the next five years. Most of the additional capacity will be in Eastern Europe and U.S.S.R. but in Canada also a modest improvement will reverse the recent pattern of decline.

Paper and Paperboard

The total paper and paperboard capacity in the world is expected to increase from 187.7 million tons in 1978 to 214.2 million tons in 1983, at an average rate of 2.7 per cent. The volume of additional capacity, 26.6 million tons, although lower than the increases in any recent survey, probably shows an upward swing if the U.S. figures are adjusted. This may be a reflection of the slow improvement in economic conditions in some countries.

Some two thirds of the new capacity will be located in the developed countries, where three quarters of capacity already exists. Although no specific enquiry is undertaken by FAO, there are indications that a significant share of new capacity arises from modifications to existing machines, whereas during the 1960's new machines may have been the more important sources of new capacity. The conversion of machines from the manufacture of one grade to another grade is an important feature in countries rationalising their industry. With the buoyant plans for expansion in developing countries, their share of the world total should rise from 5.9 per cent in 1973 to 8.6 per cent in 1983.

Table 9 - Increases in Capacity of Total Paper and Paperboard
1973-83

	Capacity			Total Increase		Annual Average Increase	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	---'000 metric tons			--- tons		--- per cent ---	
World Total	160 232	187 652	214 242	27 420	26 590	3.2	2.7
Dev'ed Mkt. Econ.	132 376	148 390	165 512	16 014	17 122	2.3	2.2
Northern America	68 563	73 798	80 223	5 235	6 425	1.5	1.7
Japan	17 551	21 164	25 447	3 613	4 283	3.8	3.8
Western Europe	43 551	49 910	55 685	6 359	5 775	2.8	2.2
Oceania	1 779	2 295	2 713	516	418	5.2	3.4
Others	932	1 223	1 444	291	221	5.6	3.4
Dev'ing Mkt. Econ.	9 385	13 670	18 473	4 285	4 803	7.8	6.2
Africa	455	709	926	254	217	9.3	5.5
Latin America	5 649	7 970	10 723	2 321	2 753	7.1	6.1
Asia	3 281	4 991	6 824	1 710	1 833	8.8	6.5
Cent. Planned Econ.	18 471	25 592	30 257	7 121	4 665	6.7	3.4
Asia	5 409	8 701	10 003	3 292	1 302	10.0	2.8
Eastern Europe	4 562	5 891	6 754	1 329	863	5.2	2.8
U.S.S.R.	8 500	11 000	13 500	2 500	2 500	5.3	4.2

In a comparison of the current and last year's survey, it is worth noting that the actual world capacity for 1978 is some 2 million tons lower than was previously estimated and that the 1982 figure is also lower, due mainly to the United States (changed basis), Canada and the E.E.C., where rationalisation continues.

Newsprint

The rate of growth of newsprint expansion is likely to treble in the future compared to the recent past. Some 5.6 million tons are expected to come on stream by 1983 whereas only 1.7 million tons were installed between 1973 and 1978. The most marked developments occur in Canada, U.S.A. and Scandinavia.

In Canada, which is responsible for one third of the world's newsprint capacity, a modification has been made to the method of calculating capacity, resulting in a 2-3% reduction in volume.

Reference has been made in earlier surveys to the reduction in the grammage of newsprint in various countries. Lightweight newsprint (48.8 g/m²) became a market factor in Japan much more slowly than in other countries but it has now become firmly established, accounting for almost half the output.

Table 10 - Increases in Capacity of Newsprint, 1973-83

	Capacity			Total Increase		Annual Average Increase	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	----- '000 metric tons -----			-----		----- per cent -----	
World Total	24 690	26 379	39 931	1 689	5 552	1.3	3.9
Dev'ed Mkt. Economies	21 453	22 268	26 405	815	4 137	0.7	3.5
Northern America	12 422	12 679	14 432	257	1 753	0.4	2.6
Japan	2 233	2 569	3 196	336	627	2.8	4.5
Western Europe	6 168	6 254	7 733	86	1 479	0.3	4.3
Cocania	426	533	713	107	180	4.6	6.0
Others	204	233	331	29	98	2.7	7.3
Dev'ing Mkt. Economies	700	1 081	2 058	381	977	9.1	13.7
Africa	13	13	68	-	55	-	39.0
Latin America	287	465	1 070	178	605	10.1	18.1
Asia	400	603	920	203	317	8.6	8.8
Cent. Planned Economies	2 537	3 030	3 468	493	438	3.6	2.7
Asia	790	920	1 090	130	170	3.1	3.4
Eastern Europe	347	460	478	113	18	5.8	0.8
U.S.S.R.	1 400	1 650	1 900	250	250	3.3	2.9

Other Printing and Writing Paper

The future growth of printing and writing papers will be lower than in the recent past, contrasting with the development of newsprint capacity. This slower progress is evident in most of the developed regions and the countries with centrally planned economies whereas the reverse is true in the developing countries and particularly those in Asia. In these latter countries the addition of nearly 1 million tons of cultural papers, or just under 50 per cent of installed capacity, over the next five years should to a degree reduce their dependence on imported supplies of these qualities.

Table 11 - Increases in Capacity of Other Printing and Writing Paper, 1973-83

	Capacity			Total Increase		Annual Average Increase	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	'000 metric tons					per cent	
World Total	35 270	42 823	49 574	7 553	6 751	4.0	3.0
Dev'ed Mkt. Economies	29 550	34 767	39 435	5 217	4 668	3.3	2.6
Northern America	13 108	14 973	16 428	1 865	1 455	2.7	1.9
Japan	3 103	4 081	5 317	978	1 236	5.6	5.4
Western Europe	13 002	15 250	17 198	2 248	1 948	3.2	2.4
Oceania	201	248	262	47	14	4.3	1.1
Others	136	215	230	79	15	9.6	1.4
Dev'ing Mkt. Economies	2 462	3 204	4 359	742	1 155	5.4	6.4
Africa	146	228	326	82	98	9.3	7.4
Latin America	1 192	1 540	2 041	348	501	5.3	5.8
Asia	1 124	1 436	1 992	312	556	5.0	6.8
Cent. Planned Economies	3 258	4 852	5 780	1 594	928	8.3	3.6
Asia	1 215	2 344	2 720	1 129	376	14.1	3.0
Eastern Europe	893	1 108	1 410	215	302	4.4	4.9
U.S.S.R.	1 150	1 400	1 650	250	250	4.0	3.3

Ratio of Paper Pulp to Paper and Paperboard Capacity

For over ten years, the proportion of pulp manufacturing capacity to paper and board capacity has been moving steadily downwards, possibly reflecting the greater utilisation of waste paper in the manufacture of paper and board. The findings of the current survey indicate that paper and board capacity is not only growing at a faster rate than pulp capacity but also in greater volume. It is to be expected, therefore, that the pulp/paper ratio will decline still further in the future, reversing the trend which was apparent in last year's survey.

	<u>Pulp/Paper Ratio</u>
	per cent
1965	81.8
1970	80.5
1975	77.8
1978 (a)	77.5
1979 (a)	77.2
1980 (a)	77.3
1981 (a)	77.1
1982 (a)	77.0
1983 (a)	76.8

(a) as forecast in 1978-83 survey

Comparison with earlier Surveys

For the fourth successive year, the FAO Survey of Pulp and Paper Capacities shows a smaller addition for the five year period for both pulp and paper. The comparison with earlier surveys is illustrated in the following table and in Annex 9. Attention is once again drawn to the lack of comparability in the U.S. figures in the latest and earlier surveys. Omitted from the present survey are those U.S. expansions for which funds are not firmly committed, possibly amounting to some 2 million tons of paper and board and rather more pulp. After adjustment, therefore, the present survey may show a slightly more buoyant picture than the last one.

<u>Period of Survey</u>	<u>Total Increase over period</u>	
	<u>Total Pulp for paper- making</u>	<u>Total paper and paperboard</u>
	-- million metric tons --	
1973 - 78	23.6	32.4
1974 - 79 (a)	26.7	33.3
1975 - 80	25.4	31.1
1976 - 81	23.3	28.1
1977 - 82	21.0	27.4
1978 - 83 (b)	19.2	26.6

(a) after amendment by nine countries, i.e. Canada, U.S.A., Brazil, Finland, France, Federal Republic of Germany, Sweden, U.K. and Japan;

(b) not comparable with earlier surveys

For the main grades of pulp, paper and paperboard, the overall additional capacity foreseen for the periods covered by the last four surveys is shown below.

	<u>Survey 1975-80</u>	<u>Survey 1976-81</u>	<u>Survey 1977-82</u>	<u>Survey 1978-83</u>
	-- '000 metric tons --			
Total woodpulp	22 815	21 134	19 147	17 066
of which				
Mechanical (a)	4 075	4 348	4 097	4 819
Semi-chemical (b)	2 148	1 477	1 288	1 135
Chemical	16 592	15 309	13 762	11 112
Other fibre pulp	2 605	2 147	1 820	2 118
Total paper and paperboard	31 060	28 077	27 363	26 590
of which				
Newsprint	4 537	4 655	4 624	5 552
Other printing & writing	7 303	6 911	6 716	6 751
Other paper and paperboard	19 220	16 511	16 023	14 287
- wrapping & packaging	15 493	13 161	12 435	10 820

(a) including thermo mechanical pulp

(b) including chemi-groundwood

On a product and on a regional basis, it is interesting to take note of the likely future developments and compare them with what has actually occurred during the past five years. The decline in the projected additions to chemical pulp capacity in developed countries contrasts with the situation in developing countries where a significant increase is anticipated. The importance and accelerating development of other fibre pulp in these latter countries stands out, particularly when in other areas expansions are being severely curtailed. The restricted future growth of paper and board compared to past years in both the developed countries and those with centrally planned economies is not matched in the developing countries where large expansions are foreseen in the capacity of cultural papers. Only for newsprint are the developed countries planning to reverse the recent trend of slow growth. All these points are illustrated in Annex 10.

Enquête de la FAO sur la capacité mondiale de production de pâte et de papier

1978 - 1983

L'enquête annuelle de la FAO sur la capacité mondiale de production de pâte et de papier est fondée, pour la plupart des pays du monde, sur les chiffres communiqués au début de l'année par les correspondants et, pour les autres, sur des estimations du Secrétariat. En général, les données sont fournies par les associations nationales des industries de la pâte et du papier à partir des indications que les membres de ces associations ont données au cours de l'année précédente au sujet de leurs plans de développement. En conséquence, elles représentent les intentions de l'industrie au moment où l'enquête a lieu; la conjoncture économique, financière et commerciale peut entraîner par la suite des modifications importantes.

Le champ et la teneur de l'enquête ont été quelque peu modifiés cette année mais la présentation n'a subi aucun changement. Deux pays supplémentaires devraient mettre en route des usines de pâte et papier au cours des prochaines années, et des données les concernant sont pour la première fois incluses dans l'enquête. On trouvera des renseignements détaillés sur la pâte thermo-mécanique qui ne cesse de prendre de l'importance, ainsi que de nouveaux détails concernant le carton pour boîtes pliantes. Par ailleurs, on sait que quatre pays ont réorganisé leurs enquêtes nationales, ce qui a eu des suites importantes. Ceci s'est traduit pour l'Autriche et la République de Corée par une révision en hausse et pour les Etats-Unis d'Amérique et la Nouvelle-Zélande par une révision en baisse, de sorte que pour ces pays les données ne sont pas tout à fait comparables à celles de l'année dernière. Aux Etats-Unis, selon les nouvelles définitions, on ne tient désormais compte que des expansions pour lesquelles des crédits ont été engagés tandis que dans les enquêtes précédentes on avait aussi inclus des projets sérieusement envisagés mais pour lesquels aucun crédit n'avait été alloué. Etant donné la dimension de l'industrie américaine, cette modification se reflète dans les totaux mondiaux concernant les dernières années de l'enquête par une nette diminution qui sera probablement de l'ordre de 2 million de tonnes pour le papier et le carton et peut-être même d'un volume plus élevé pour la pâte.

Afin de compléter les statistiques, une liste des plans d'expansions a une fois encore été publiée séparément. Le cas échéant, la capacité supplémentaire prévue a été confrontée avec les données indiquées dans l'enquête actuelle, mais il faut noter que la liste n'est pas exhaustive; une augmentation importante de capacité peut résulter d'améliorations mécaniques, de projets confidentiels, etc., dont on ne connaît pas le détail. Néanmoins, on espère que les renseignements fournis ici seront utiles à tous ceux qui sont chargés de planifier l'avenir de l'industrie.

Les principales conclusions de l'enquête de 1978-83 sont les suivantes:

- (a) On prévoit que la capacité mondiale de production des pâtes pour papier passera de 145 millions de tonnes en 1978 à 164 millions en 1983. Ces 19 millions de tonnes supplémentaires correspondent à un taux de croissance annuel de 2,5 pour cent;
- (b) On prévoit que la capacité mondiale de production de papiers et cartons passera de 188 millions de tonnes en 1978 à 214 millions de tonnes en 1983. Ces 26 millions de tonnes supplémentaires correspondent à un taux de croissance annuel de 2,7 pour cent;
- (c) Depuis le début de la décennie, aucune enquête n'avait prévu des augmentations aussi faibles que celles-ci (19 millions de tonnes pour les pâtes à papier et 26 millions de tonnes pour les papiers et cartons); toutefois, si la définition des Etats-Unis n'avait pas été modifiée, ce fléchissement aurait été arrêté et la tendance se serait même inversé;
- (d) La capacité mondiale de production de pâte de bois en 1983, est légèrement inférieure au niveau envisagé pour 1982 dans la dernière enquête annuelle. La capacité aux Etats-Unis pour 1983 est inférieure de 1,5 million de tonnes à celle indiquée dans la dernière enquête annuelle pour 1982, en grande partie du fait de la modification de la définition, mais elle augmentera d'un peu plus d'un million de tonnes dans les autres pays du monde. En revanche, on prévoit une augmentation considérable de la capacité de production de papier et carton, malgré la baisse aux Etats-Unis, car des plans plus dynamiques devraient être mis en oeuvre au Canada et dans les pays nordiques;
- (e) La capacité de pâte thermo-mécanique, enregistrée pour la première fois, devrait s'élever à 3,2 millions de tonnes en 1978 et pourrait atteindre 7 millions de tonnes en 1983;
- (f) Pour la pâte de bois chimique l'estimation de la capacité pour les cinq prochaines années, n'a guère été modifiée et reste à peu près la même que dans l'enquête de l'année dernière, compte tenu de la diminution enregistrée aux Etats-Unis;
- (g) La capacité de production de pâtes de feuillus au sulfate blanchie devrait passer de 16,9 millions de tonnes en 1978 à 19,7 millions de tonnes en 1983; cette augmentation de 2,8 millions de tonnes est bien inférieure aux 4 millions de tonnes envisagés dans les trois dernières enquêtes;
- (h) Les pâtes d'autres fibres continuent à jouer un rôle important dans l'approvisionnement local en matières premières pour la fabrication du papier dans les pays en développement où elles représentent environ le tiers, et en Asie plus de 50 pour cent de la capacité de production;
- (i) Dans les pays en développement on prévoit un accroissement d'environ un tiers (soit de près de 5 millions de tonnes) de la capacité de production de papiers et cartons. On prévoit une expansion du même ordre dans les pays à économie centralement planifiée. Dans les pays développés, l'accroissement en volume (17,1 millions de tonnes), ne représente qu'une progression d'environ 10 pour cent;
- (j) Après la progression assez lente enregistrée ces dernières années, la capacité de production de papier journal devrait s'accroître plus rapidement au cours des quelques années, particulièrement au Canada;
- (k) Le rapport entre la capacité de production de pâte et celle de papiers et cartons continue à fléchir.

Tendances par produits et par régions

La capacité mondiale de production de pâtes à papier devrait, comme il est indiqué dans la dernière enquête, passer de 145,4 millions de tonnes en 1978 à 164,5 millions de tonnes en 1983, tandis que la capacité de production de papiers et cartons passerait de 187,7 à 214,2 millions de tonnes. Le tableau 1 ci-après indique l'évolution de la capacité mondiale par grande catégorie de produits de 1968 à 1983 et permet de constater que l'expansion la plus rapide se situe entre 1968 et 1973 et que pour la pâte le taux d'accroissement observé entre 1973 et 1978 devrait probablement se maintenir mais il y a des variations considérables selon le type de pâtes envisagé. La capacité de production de papiers et cartons devrait augmenter à l'avenir plus lentement que ces dernières années. On trouvera aux annexes 1 à 6 une ventilation par régions et par grandes catégories de produits pour chacune des années de la période 1978-83.

Tableau 1 - Capacité mondiale de production de pâte, de papier et de carton, 1968-83

	Capacité totale				Taux annuel moyen d'accroissement		
	1968	1973	1978	1983	1968-73	1973-78	1978-83
	-- millions de tonnes --				-- pourcentage --		
Pâte de bois pour papier, total	98,1	120,0	134,9	152,0	4,1	2,4	2,4
Mécanique (a)	25,5	28,9	32,6	37,4	2,5	2,5	2,8
Mi-chimique (b)	7,0	9,8	10,4	11,6	7,2	1,2	2,1
Chimique	65,6	81,2	91,9	103,0	4,4	2,5	2,3
Pâte d'autres fibres	7,1	7,8	10,4	12,5	1,9	5,9	3,8
Pâte à dissoudre	5,3	5,3	6,0	6,6	2,2	0,4	1,7
Papier et carton, total	127,0	160,2	187,7	214,2	4,8	3,2	2,7
Papier journal	22,1	24,7	26,4	31,9	2,3	1,3	3,9
Papier d'impression et d'écriture	24,9	35,3	42,8	49,6	7,2	4,0	3,0
Autres papiers et cartons	80,1	100,3	118,5	132,7	4,6	3,4	2,3

(a) Y compris la pâte thermo-mécanique

(b) Y compris la pâte mécanico-chimique

Dans les quatre dernières enquêtes, le taux de croissance de la capacité de production de pâte de bois prévu pour les cinq années à venir a régressé passant de 4,1 pour cent à 3,4, 3,1, 2,7 et 2,4 pour cent dans l'enquête actuelle. Ce recul des prévisions est presque identique pour la capacité de production de papiers et cartons le taux ayant été ramené progressivement de 4,1 à 2,7 pour cent. Ce dernier chiffre aurait été légèrement plus élevé si la définition n'avait pas été modifiée aux Etats-Unis. Si l'on compare les chiffres une année sur l'autre, on observe une accélération rapide du taux d'accroissement de la capacité jusqu'en 1980, le maintien de ce taux élevé de 1980 à 1981 suivi d'un recul marqué ainsi qu'il est indiqué au tableau 2 ci-après.

Tableau 2 - Taux annuel d'accroissement de la capacité mondiale de production de pâte, de papier et de carton 1978-83

	Accroissements annuels				
	1978-79	1979-80	1980-81	1981-82	1982-83
	----- pourcentage -----				
Pâte de bois pour papier, total	2,4	3,1	3,1	2,4	1,1
Mécanique (a)	2,2	3,8	3,5	3,4	1,1
Mi-chimique (b)	2,1	3,3	2,0	2,5	0,6
Chimique	2,5	2,8	3,0	2,1	1,2
Pâte d'autres fibres	5,7	4,8	2,3	3,1	3,0
Pâte à dissoudre	1,9	2,3	1,9	1,0	1,6
Papier et carton, total	3,0	3,0	3,3	2,6	1,5
Papier journal	3,7	3,0	5,6	4,5	2,4
Papier d'impression et d'écriture	2,8	4,7	2,6	2,9	1,8
Autres papiers et cartons	2,9	2,4	2,9	2,1	1,2

(a) Y compris la pâte thermo-mécanique

(b) Y compris la pâte chimico-mécanique

Cette évolution n'a rien de surprenant si l'on pense que les expansions prévues pour les deux ou trois années prochaines représentent des engagements fermes de la part des sociétés, alors que pour les années ultérieures, les engagements sont beaucoup moins fermes ou comme, dans le cas des Etats-Unis, n'entrent plus dans le calcul de la capacité. En outre, dans quelques pays les enquêtes de capacité couvrent une période inférieure à cinq ans.

Pâtes à papier, total

Entre 1978 et 1983, la capacité de production de pâtes à papier devrait augmenter de 19,2 millions de tonnes, ce qui correspondrait à un taux moyen de croissance de 2,5 pour cent par an et à quelque 1,7 million de tonnes de plus que l'accroissement de capacité entre 1973 et 1978, sans pourtant égaler la progression de la période quinquennale antérieure (1968-73). Ce total se ventile comme suit: 4,8 millions de tonnes (y compris 3,8 millions de tonnes de pâte thermo-mécanique) de pâte mécanique, 1,1 million de tonnes de pâte mi-chimique, 11,1 millions de pâte chimique et 2,1 millions de tonnes de pâtes d'autres fibres. On ne prévoit que des accroissements marginaux pour la pâte à dissoudre.

Pour les pâtes de feuillus, principalement les pâtes au sulfate blanchies et les pâtes mi-chimiques, on observe une décélération. L'expansion a beaucoup ralenti dans les principaux pays producteurs et les nouvelles usines qui utilisent les feuillus tropicaux ne tournent pas à plein régime.

La majeure partie de la capacité de production de pâtes à papier est située dans les pays développés. La mise en oeuvre de divers plans dans les pays en développement a non seulement accru la capacité dans ces pays mais aussi relevé leur part du total mondial; celle-ci pourrait atteindre 8,4 pour cent en 1983, contre 4,6 pour cent en 1973.

Pâte marchande

Le Canada est le plus gros producteur du monde de pâtes marchandes et sa capacité représente environ le quart du total mondial. L'enquête actuelle indique que la capacité totale de pâtes marchandes continuant sur sa lancée augmentera encore de 2,8 millions de tonnes au cours des trois prochaines années. C'est le Brésil, où trois usines importantes ont démarré, qui fournira la plus grande partie de ce tonnage supplémentaire. Lorsque ces installations tourneront à plein régime la quantité de pâte marchande produite au Brésil sera de l'ordre d'un million de tonnes, soit à peu près la moitié du tonnage qui avait été prévu il y a quelques années dans le plan national concernant la production de pâtes et papiers. Presque tout le tonnage supplémentaire de pâte marchande sera de la pâte au sulfate blanchie, en majeure partie de conifères; celle de feuillus étant principalement fabriquée au Brésil. On trouvera plus de détails aux annexes 7 et 8 et un graphique à l'annexe 11.

Pâtes de bois

La capacité mondiale de fabrication de pâtes de bois pour papiers devrait augmenter entre 1978 et 1983, de 17,1 millions de tonnes, soit beaucoup plus important qu'au cours des cinq années antérieures. Il est intéressant de noter que la capacité mondiale effective qui, en 1978, était de 134,9 millions de tonnes est inférieure à ce qui était envisagé pour cette même année dans l'enquête 1977-82; en effet, des projets ont été annulés ou retardés et quelques usines ont été fermées à cause de l'incertitude des perspectives économiques. On note également des retards dans l'exécution des plans ces dernières années, particulièrement en Suède, au Canada, en France et au Brésil. Dans certains autres pays, cependant, les plans d'expansion ont été réussis en hausse. On trouvera au tableau 3 la taille et la répartition de cette nouvelle capacité.

Tableau 3 - Accroissement de la capacité de production totale de pâte de bois pour papier, 1973-83

	Capacité			Augmentation totale		Augmentation annuelle moyenne	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	milliers de tonnes			tonnes		pourcentage	
Total mondial	119 984	134 945	152 011	14 961	17 066	2,4	2,4
Pays dev. à écon. marché	103 742	113 281	123 173	9 539	9 892	1,8	1,7
Amérique du Nord	61 708	67 003	72 321	5 295	5 318	1,7	1,5
Japon	10 772	12 064	13 610	1 292	1 546	2,3	2,5
Europe occidentale	29 230	31 440	33 978	2 210	2 538	1,5	1,6
Océanie	1 348	2 090	2 474	742	384	9,2	3,4
Autres	684	684	790	-	106	-	2,9
Pays en dev. à écon. marché	3 783	5 906	9 808	2 123	3 902	9,3	10,7
Afrique	260	354	818	94	464	6,4	18,2
Amérique latine	2 635	4 413	6 861	1 778	2 448	10,9	9,2
Asie	888	1 139	2 129	251	990	5,1	13,3
Pays à écon. centr. planif.	12 459	15 758	19 030	3 299	3 272	4,8	3,8
Asie	1 825	2 447	3 024	622	577	6,0	4,3
Europe orientale	2 854	3 661	4 361	807	700	5,1	3,6
U.R.S.S.	7 780	9 650	11 645	1 870	1 995	4,4	3,0

Si ce n'était le fait que les données concernant la capacité des Etats-Unis ne tiennent plus compte désormais, dans les dernières années de l'enquête, des projets pour lesquels des crédits n'ont pas été engagés, l'accroissement de la capacité mondiale totale de pâte de bois pour la fabrication du papier aurait été probablement dans l'enquête actuelle plus élevé que dans celle de l'année dernière. Néanmoins pour les pays développés l'expansion prévue (9,9 millions de tonnes) pour la période 1978-1983 est plus grande que celle qui a été effectivement observée entre 1973 et 1978 (9,5 millions de tonnes). Il en est de même, et de manière plus prononcée, dans les pays en développement où si tous les plans se réalisent, l'accroissement devrait être presque double de celui qui a été enregistré entre 1973 et 1978. On ne prévoit que peu de changements dans les pays à économie centralement planifiée.

Si l'on compare les résultats de l'enquête actuelle avec ceux de la précédente, on constate que la plus grande partie de la baisse d'une période quinquennale sur l'autre est imputable aux Etats-Unis (2,3 millions de tonnes principalement pour les raisons déjà mentionnées) et à la Suède (0,6 million de tonnes). Ces réductions ne sont que partiellement compensées par l'amélioration des perspectives en Norvège où l'on a enregistré une augmentation de 0,5 million de tonnes par rapport au chiffre indiqué dans l'enquête précédente.

Pâte mécanique

Entre 1978 et 1983, on prévoit que la capacité de production de pâte mécanique, y compris la pâte thermo-mécanique, augmentera de 4,8 millions de tonnes contre 4,1 millions de tonnes prévues dans l'enquête antérieure. Le relèvement du taux de croissance annuel (2,8 pour cent au lieu de 2,4 pour cent) est dû d'une part à une utilisation accrue de la pâte thermo-mécanique et d'autre part à des plans plus dynamiques pour le papier journal. On s'attend à une expansion particulièrement rapide au Japon, en Australie, et dans certains pays en développement. L'attention est attirée sur le fait que pour la Nouvelle-Zélande, la capacité de production a été révisée en baisse dans la présente enquête car, conformément aux définitions, elle n'englobe plus maintenant la pâte mécanique qui sert à la fabrication de panneaux de fibres.

Tableau 4 - Accroissement de la capacité de production de pâte mécanique (*) pour papier, 1973-83

	Capacité			Augmentation totale		Augmentation annuelle moyenne	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	----- milliers de tonnes -----			-----		----- pourcentage -----	
Total mondial	28 865	32 635	37 454	3 770	4 819	2,5	2,8
Pays dev. à écon. marché	24 748	27 704	31 698	2 956	3 994	2,3	2,7
Amérique du Nord	12 869	13 721	15 385	852	1 664	1,3	2,3
Japon	1 592	2 111	2 871	519	760	5,8	6,3
Europe occidentale	9 618	10 824	11 993	1 206	1 169	2,4	2,1
Océanie	433	787	1 143	354	356	12,7	7,7
Autres	236	261	306	25	45	2,0	3,2
Pays en dev. à écon. marché	742	880	1 240	138	360	3,5	7,1
Afrique	15	17	36	2	19	2,5	16,2
Amérique latine	391	466	613	75	147	3,6	5,6
Asie	336	397	591	61	194	3,4	8,3
Pays à écon. centr. planif.	3 375	4 051	4 516	676	465	3,7	2,2
Asie	795	901	1 103	106	202	2,5	4,1
Europe occidentale	630	950	968	320	18	8,6	0,4
U.R.S.S.	1 950	2 200	2 445	250	245	2,4	2,1

(*) Y compris la pâte thermo-mécanique

Des données sur la pâte thermo-mécanique ont été rassemblées pour la première fois et de nombreux pays ont pu fournir des renseignements intéressants et quelques-uns n'ont pas été en mesure de donner des précisions. La capacité de pâte thermo-mécanique enregistrée s'élevait à 3,2 millions de tonnes et devrait atteindre 7,0 millions de tonnes d'ici 1983. En Amérique du Nord, qui possède le tiers de la capacité mondiale, l'expansion des installations de pâte thermo-mécanique s'est faite en partie au dépens de la pâte de bois de râperie dont la capacité a diminué. Actuellement, il semble qu'il n'y ait aucune usine de pâte thermo-mécanique dans les pays en développement mais quatre pays envisagent d'en construire.

On trouvera indiqué au tableau ci-après des chiffres globaux de la capacité de production actuelle et future de la pâte thermo-mécanique et des statistiques plus détaillées dans les données par pays.

Tableau 5 - Accroissement de la capacité de production de pâte thermo-mécanique, 1978-83

	Capacité		Augmentation
	1978	1983	1978-83
	----- milliers de tonnes -----		
Total mondial	3 237	7 038	3 801
Pays dev. à écon. marché	3 237	6 701	3 464
Amérique du Nord	1 188	2 893	1 705
Japon	621	1 364	743
Pays nordiques	1 276	1 855	579
Autres, Europe occidentale	112	196	84
Océanie	40	393	353
Pays en dev. à écon. marché	-	217	217
Amérique latine	-	112	112
Asie	-	105	105
U.R.S.S.	-	120	120

Pâte de bois mi-chimique

Entre 1978 et 1983, la capacité mondiale de pâtes mi-chimiques et mécanico-chimique devrait passer de 10,5 à 11,6 millions de tonnes, soit une augmentation de 1,1 million de tonnes au taux moyen annuel de 2,1 pour cent. Cet accroissement est inférieur à celui qui avait été prévu dans l'enquête de l'année dernière, essentiellement du fait de la réduction des chiffres pour l'Amérique latine et l'Amérique du Nord, réduction qui n'est pas entièrement compensée par le relèvement des précisions en Afrique et en Asie. Un peu moins du tiers de la capacité supplémentaire sera implanté dans les pays à économies centralement planifiées, les pays développés et les pays en développement se partageant le reste.

Tableau 6 - Accroissement de la capacité de production de pâte de bois
mi-chimique pour papier, 1973-83

	Capacité			Augmentation totale		Augmentation annuelle moyenne	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	milliers			de tonnes		pourcentage	
Total mondial	9 840	10 457	11 592	617	1 135	1,2	2,1
Pays dév. à écon. marché	8 845	9 014	9 423	169	409	0,4	0,9
Amérique du Nord	4 209	4 630	4 882	421	252	1,9	1,1
Japon	2 305	1 918	1 999	- 387	81	- 3,6	0,8
Europe occidentale	1 909	1 893	1 969	- 16	76	- 0,2	0,8
Océanie	270	411	411	141	-	8,8	-
Autres	152	162	162	10	-	1,3	-
Pays en dév. à écon. marché	445	482	882	37	400	1,6	12,8
Afrique	5	10	66	5	56	14,9	46,0
Amérique latine	264	409	568	145	159	9,2	6,8
Asie	176	63	248	- 113	185	-18,7	32,0
Pays à écon. centr. planif.	550	961	1 287	411	326	11,8	11,8
Asie	-	-	-	-	-	-	-
Europe orientale	170	411	487	241	76	19,3	3,5
U.R.S.S.	380	550	800	170	250	7,7	7,8

Pâte de bois chimique pour papier

Pendant de nombreuses années, la part des pâtes de bois chimique dans l'ensemble des pâtes à papier est restée constante (soit 63 pour cent) et il est peu probable qu'elle varie dans un proche avenir. Entre 1978 et 1983, la capacité mondiale devrait passer de 91,9 millions de tonnes à 103,0 millions de tonnes, soit un taux moyen de croissance de 2,3 pour cent par an. Même si l'on modifiait ces chiffres pour tenir compte de la nouvelle définition adoptée aux Etats-Unis, l'accroissement au cours des cinq prochaines années serait probablement inférieur à celui qui est prévu dans la dernière enquête, notamment en Europe occidentale.

Le recul de la capacité de production de pâte au bisulfite blanchie et écorue continue. Aux Etats-Unis, en raison de la fermeture d'usines la capacité a diminué d'environ 800 000 tonnes depuis 1960 et devrait tomber encore de 80 000 tonnes au cours des trois prochaines années. Cette régression continue à se manifester aussi au Canada ainsi que dans les pays nordiques. Le document intitulé "Information on Projected Pulp and Paper Mills in the World 1978-88" fournit des renseignements détaillés sur la fermeture des usines ainsi que sur les rares plans de nouvelles installations dans d'autres pays.

Tableau 7 - Accroissement de la capacité de production de pâte de bois chimique pour papier, 1973-83

	Capacité			Augmentation totale		Augmentation annuelle moyenne	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	----- milliers de tonnes -----			-----		----- pourcentage -----	
Total mondial	81 279	91 853	102 965	10 574	11 112	2,5	2,3
Pays dev. à écon. marché	70 149	76 563	82 052	6 414	5 489	1,8	1,4
Amérique du Nord	44 630	48 652	52 054	4 022	3 402	1,7	1,4
Japon	6 875	8 035	8 740	1 160	705	3,2	1,7
Europe occidentale	17 703	18 723	20 016	1 020	1 293	1,1	1,4
Océanie	645	892	920	247	28	6,7	0,6
Autres	296	261	322	- 35	61	- 2,4	4,3
Pays en dev. à écon. marché	2 596	4 544	7 686	1 948	3 142	11,7	11,1
Afrique	240	327	716	87	389	6,4	17,0
Amérique latine	1 980	3 538	5 680	1 558	2 142	12,3	9,9
Asie	376	679	1 290	303	611	12,5	13,7
Pays à écon. centr. planif.	8 534	10 746	13 227	2 212	2 481	4,7	4,2
Asie	1 030	1 546	1 921	516	375	8,5	4,4
Europe orientale	2 054	2 300	2 906	246	606	2,3	4,8
U.R.S.S.	5 450	6 900	8 400	1 450	1 500	4,8	4,0

Pâte d'autres fibres

Entre 1978 et 1983, la capacité de production des pâtes d'autres fibres pour papier - à l'exclusion des vieux papiers - passera de 10,4 à 12,5 millions de tonnes, soit un accroissement de 2,1 millions de tonnes équivalant à un taux annuel de 3,8 pour cent.

Tableau 8 - Accroissement de la capacité de production des pâtes d'autres fibres pour papier, 1973-83

	Capacité			Augmentation totale		Augmentation annuelle moyenne	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	----- milliers de tonnes -----			-----		----- pourcentage -----	
Total mondial	7 836	10 408	12 526	2 572	2 118	5,9	3,8
Pays dev. à écon. marché	2 262	1 724	1 736	- 538	12	- 5,3	0,1
Amérique du Nord	1 000	667	698	- 333	31	- 7,7	0,9
Japon	6	4	4	- 2	-	- 7,7	-
Europe occidentale	1 202	938	919	- 264	- 19	- 4,9	- 0,4
Océanie	2	5	5	3	-	20,0	-
Autres	52	110	110	58	-	16,2	-
Pays en dev. à écon. marché	2 041	2 791	3 938	750	1 147	6,5	7,1
Afrique	158	199	232	41	33	4,7	3,1
Amérique latine	777	1 025	1 540	248	515	5,7	8,5
Asie	1 106	1 567	2 166	461	599	7,2	6,7
Pays à écon. centr. planif.	3 533	5 893	6 852	2 360	959	10,8	3,1
Asie	2 906	5 158	5 976	2 252	818	12,2	3,0
Europe orientale	227	260	276	33	16	2,8	1,2
U.R.S.S.	400	475	600	75	125	3,5	4,8

Au cours de la période 1973-78, la capacité de production dans les pays développés a fléchi de 0,5 million de tonnes par suite de la fermeture de certaines fabriques de pâtes de paille en Europe occidentale et d'un ajustement statistique de la capacité de production en Amérique du Nord de façon à l'aligner sur les définitions convenues. Dans les pays en développement et à économie centralement planifiée, où se produira presque toute l'expansion, la pâte d'autres fibres est une source importante de matières premières. Elle représente en moyenne environ le tiers de la capacité de production dans les pays en développement et plus de la moitié dans les pays en développement d'Asie.

Pâte à dissoudre

La capacité de production de pâte à dissoudre, qui n'a augmenté que faiblement depuis une dizaine d'années s'accroîtra de 10 pour cent d'ici 1983. La plus grande partie de cette capacité supplémentaire sera mise en service en Europe orientale et en URSS; au Canada il y aura une légère reprise après la baisse de ces dernières années.

Papiers et cartons

La capacité mondiale de production de papiers et de cartons devrait passer de 187,7 millions de tonnes en 1978 à 214,2 millions de tonnes en 1983, soit un taux moyen d'accroissement de 2,7 pour cent. Le volume de capacité supplémentaire, 26,6 millions de tonnes, tout en étant inférieur aux augmentations prévues dans la dernière enquête, représenterait probablement un progrès si l'on ajoutait les chiffres des Etats-Unis. Cette reprise pourrait traduire la lente amélioration de la conjoncture dans certains pays. Environ les deux tiers de la nouvelle capacité seront implantés dans les pays développés qui possèdent déjà les trois-quarts de la capacité totale. La FAO n'a entrepris aucune enquête à ce sujet mais il semble qu'une part importante de la nouvelle capacité soit attribuable à la modification du matériel existant tandis qu'au cours des années soixante la progression a été surtout due à la mise en plan de nouvelles machines. La possibilité d'adopter le matériel à la fabrication de diverses qualités de papier est importante dans les pays qui veulent rationna-

Tableau 9 - Accroissement de la capacité de production totale de papier et carton, 1973-83

	Capacité			Augmentation totale		Augmentation annuelle moyenne	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	milliers de tonnes			pourcentage			
Total mondial	160 232	187 652	214 242	27 420	26 590	3,2	2,7
Pays dev. à écon. marché	132 376	148 390	165 512	16 014	17 122	2,3	2,2
Amérique du Nord	68 563	73 798	80 223	5 235	6 425	1,5	1,7
Japon	17 551	21 164	25 447	3 613	4 283	3,8	3,8
Europe occidentale	43 551	49 910	55 685	6 359	5 775	2,8	2,2
Océanie	1 779	2 295	2 713	516	418	5,2	3,4
Autres	932	1 223	1 444	291	221	5,6	3,4
Pays en dev. à écon. marché	9 385	13 670	18 473	4 285	4 803	7,8	6,2
Afrique	455	709	926	254	217	9,3	5,5
Amérique latine	5 649	7 970	10 723	2 321	2 753	7,1	6,1
Asie	3 281	4 991	6 824	1 710	1 833	8,8	6,5
Pays à écon. centr. planif.	18 471	25 592	30 257	7 121	4 665	6,7	3,4
Asie	5 409	8 701	10 003	3 292	1 302	10,0	2,8
Europe orientale	4 562	5 891	6 754	1 329	863	5,2	2,8
U.R.S.S.	8 500	11 000	13 500	2 500	2 500	5,3	4,2

liser leur industrie. Etant donné les plans d'expansion dynamique envisagés dans les pays en développement, leur part dans la capacité de production totale devrait passer de 5,9 pour cent en 1973 à 8,6 pour cent en 1983.

Si l'on compare les résultats de l'enquête actuelle avec ceux de la précédente, il faut noter que la capacité mondiale effective pour 1978 est inférieure d'environ 2 millions de tonnes aux précisions antérieures et que le chiffre pour 1982 est également plus bas du fait essentiellement des Etats-Unis (changement des définitions), du Canada et de la CEE où la rationalisation continue.

Papier journal

Le taux de croissance de l'expansion de papier journal devrait tripler à l'avenir par rapport à celui de ces dernières années. Environ 5,6 millions de tonnes pourraient être mises en service d'ici 1983 alors que 1,7 million de tonnes seulement ont été installées entre 1973 et 1978. L'évolution la plus marquée se produira au Canada, aux Etats-Unis, dans les pays nordiques.

Au Canada, qui possède le tiers de la capacité mondiale de production de papier journal, la méthode de calcul de la capacité a été modifiée d'où une réduction en volume de 2 à 3 pour cent.

On a indiqué dans les enquêtes antérieures que le grammage du papier journal s'était abaissé dans divers pays. Le papier journal de grammage plus faible (48,8 grammes/m²) a pris de l'importance beaucoup plus lentement au Japon que dans d'autres pays mais il est désormais courant et représente presque la moitié de la production.

Tableau 10 - Accroissement de la capacité de production de papier journal, 1973-83

	Capacité			Augmentation totale		Augmentation annuelle moyenne	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	milliers de tonnes					pourcentage	
Total mondial	24 690	26 379	39 931	1 689	5 552	1,3	3,9
Pays dev. & écon. marché	21 453	22 268	26 405	815	4 137	0,7	3,5
Amérique du Nord	12 422	12 679	14 432	257	1 753	0,4	2,6
Japon	2 233	2 569	3 196	336	627	2,8	4,5
Europe occidentale	6 168	6 254	7 733	86	1 479	0,3	4,3
Océanie	426	533	713	107	180	4,6	6,0
Autres	204	233	331	29	98	2,7	7,3
Pays en dev. & écon. marché	700	1 081	2 058	381	977	9,1	13,7
Afrique	13	13	68	-	55	-	39,0
Amérique latine	287	465	1 070	178	605	10,1	18,1
Asie	400	603	920	203	317	8,6	8,8
Pays à écon. centr. planif.	2 537	3 030	3 468	493	438	3,6	2,7
Asie	790	920	1 090	130	170	3,1	3,4
Europe orientale	347	460	478	113	18	5,8	0,8
U.R.S.S.	1 400	1 650	1 900	250	250	3,3	2,9

Autres papiers d'impression et d'écriture

Pour les autres papiers d'impression et d'écriture, contrairement au papier journal, l'expansion ralentira par rapport aux dernières années. Ce ralentissement est évident dans la plupart des pays développées et des pays à économie centralisée planifiée tandis que l'inverse est vrai dans les pays en développement et particulièrement dans ceux d'Asie. Dans ces pays la capacité de production de papier culturel augmentera de près d'un million de tonnes, soit presque 50 pour cent de la capacité installée, au cours des cinq prochaines années de sorte qu'ils seront moins tributaires des importations.

Tableau 11 - Accroissement de la capacité de production d'autres papiers
d'impression et d'écriture, 1973-83

	Capacité			Augmentation totale		Augmentation annuelle moyenne			
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83		
	----- milliers de tonnes -----							-- pourcentage --	
Total mondial	35 270	42 823	49 574	7 553	6 751	4,0	3,0		
Pays dev. à écon. marché	29 550	34 767	39 435	5 217	4 668	3,3	2,6		
Amérique du Nord	13 108	14 973	16 428	1 865	1 455	2,7	1,9		
Japon	3 103	4 081	5 317	978	1 236	5,6	5,4		
Europe occidentale	13 002	15 250	17 198	2 248	1 948	3,2	2,4		
Océanie	201	248	262	47	14	4,3	1,1		
Autres	136	215	230	79	15	9,6	1,4		
Pays en dev. à écon. marché	2 462	3 204	4 359	742	1 155	5,4	6,4		
Afrique	146	228	326	82	98	9,3	7,4		
Amérique latine	1 192	1 540	2 041	348	501	5,3	5,8		
Asie	1 124	1 436	1 992	312	556	5,0	6,8		
Pays à écon. centr. planif.	3 258	4 852	5 780	1 594	928	8,3	3,6		
Asie	1 215	2 344	2 720	1 129	376	14,1	3,0		
Europe orientale	893	1 108	1 410	215	302	4,4	4,9		
U.R.S.S.	1 150	1 400	1 650	250	250	4,0	3,3		

Rapport entre la capacité de production de pâte et la capacité de production de papiers
et cartons

Depuis plus de dix ans, le rapport entre la capacité de production de pâtes et celle de papier et carton fléchit régulièrement, tendance qui reflète peut-être l'utilisation accrue des vieux papiers pour la fabrication de papiers et cartons. L'enquête actuelle indique que la capacité de papiers et cartons non seulement s'accroît plus rapidement que la capacité de pâte mais lui est aussi supérieure en volume. On peut donc prévoir que le rapport pâte/papier fléchira encore à l'avenir, à l'inverse de la tendance qui se dégageait de l'enquête de l'année dernière.

Pâte/papiers et cartons
en pourcentage

1965	81,8
1970	80,5
1975	77,8
1978 (a)	77,5
1979 (a)	77,2
1980 (a)	77,3
1981 (a)	77,1
1982 (a)	77,0
1983 (a)	76,8

(a) Selon les prévisions de l'enquête 1978-83

Comparaison avec les enquêtes précédentes

Pour la quatrième année consécutive, l'enquête de la FAO des pâtes et papiers indique un ralentissement de l'accroissement de capacité pour la période quinquennale. On trouvera au tableau ci-après ainsi qu'à l'annexe 9 une comparaison avec les enquêtes précédentes. On souligne de nouveau l'impossibilité de confronter les chiffres concernant les Etats-Unis, indiqués dans la dernière enquête, avec ceux qui figuraient dans les enquêtes antérieures. Dans la présente enquête on a omis les expansions aux Etats-Unis pour lesquelles des crédits n'avaient pas été fermement engagés, et qui pourraient représenter quelque 2 millions de tonnes pour les papiers et cartons et un peu plus pour les pâtes. En conséquence, après ajustement, l'enquête actuelle semble ouvrir des perspectives un peu plus optimiste que celle de l'année dernière.

<u>Période couverte par l'enquête</u>	<u>Augmentation totale pendant la période couverte</u>	
	<u>Pâte pour papier, totale</u>	<u>Papier et carton totale</u>
	--- millions de tonnes ---	
1973-78	23,6	32,4
1974-79 (a)	26,7	33,3
1975-80	25,4	31,1
1976-81	23,3	28,1
1977-82	21,0	27,4
1978-83 (b)	19,2	26,6

(a) À la suite des amendements présentés par neuf pays: Canada, Etats-Unis, Brésil, Finlande, France, République fédérale d'Allemagne, Suède, Royaume-Uni, Japon

(b) pas comparable avec les enquêtes antérieures

Pour les grandes catégories de pâtes, de papier et de carton, l'accroissement global de capacité prévu au cours des périodes couvertes par les quatre dernières enquêtes se chiffre comme suit.

	<u>Enquête 1975-80</u>	<u>Enquête 1976-81</u>	<u>Enquête 1977-82</u>	<u>Enquête 1978-83</u>
	--- milliers de tonnes ---			
Pâte de bois	22 815	21 134	19 147	17 066
dont:				
Mécanique (a)	4 075	4 348	4 097	4 819
Mi-chimique (b)	2 148	1 477	1 288	1 135
Chimique	16 592	15 309	13 762	11 112
Pâte d'autres fibres	2 605	2 147	1 820	2 118
Papier et carton, total	31 060	28 077	27 363	26 590
dont:				
Papier journal	4 537	4 655	4 624	5 552
Autres papiers d'impression et d'écriture	7 303	6 911	6 716	6 751
Autres papiers et cartons	19 220	16 511	16 023	14 287
- papier d'emballage	15 493	13 161	12 435	10 820

(a) Y compris la pâte thermo-mécanique

(b) Y compris la pâte chimico-mécanique

A l'échelle régionale et pour chaque produit il est intéressant de noter l'évolution future probable et de la comparer avec celle des cinq dernières années. Le ralentissement de l'expansion prévue dans les pays développés pour la pâte chimique contraste avec la situation dans les pays en développement où l'on prévoit un accroissement important. L'importance et la progression rapide des pâtes d'autres fibres dans ces derniers pays sont d'autant plus remarquables que dans d'autres régions les plans d'expansion ont été sérieusement restreints. Le ralentissement prévu dans le secteur des papiers et cartons dans les pays développés et à économie centralement planifiée n'est pas compensé par les importantes expansions prévues dans les pays en développement pour le papier culturel. Dans les pays développés c'est seulement pour le papier journal que l'on prévoit une nette relance après la croissance très lente de ces dernières années. Tous ces points sont illustrés à l'annexe 10.

Informe de la Secretaría de la FAO sobre la
Encuesta Mundial de Producción de Pasta y Papel en 1978-83

Los estudios anuales de la FAO sobre Capacidades Mundiales de Pasta y Papel se basan en cifras recibidas a principios de año de parte de corresponsales en la mayoría de los países del mundo y en estimaciones de la Secretaría con respecto a los demás países. En gran parte los datos son suministrados por las asociaciones nacionales de comerciantes en pasta y papel y se basan en informaciones proporcionadas por sus socios durante el año precedente acerca de sus planes de desarrollo futuro. Por tanto, los resultados reflejan las intenciones de los industriales en el momento de realizarse los estudios, pero condiciones económicas, financieras y de mercado posteriores pueden influir en ellas significativamente.

El alcance y el contenido de la encuesta se modificaron algo este año, no así su presentación. Se prevé que otros dos países pondrán en marcha fábricas de pasta y/o papel dentro de los próximos años y sus datos de capacidad figuran por primera vez. En vista de la importancia creciente de la pasta termomecánica, se da información específica sobre la misma, así como detalles modificados del cartón para cajas plegables. Además, se sabe que cuatro países han revisado la base de sus encuestas nacionales con los consiguientes resultados significativos. En Austria y la República de Corea las revisiones han provocado aumentos y en Estados Unidos de América y Nueva Zelanda disminuciones, de manera que los datos de estos países no son totalmente comparables con los del año pasado. En Estados Unidos, ahora se incluyen sólo los aumentos para los cuales se han prometido fondos. Debido a las dimensiones absolutas de la industria de Estados Unidos, esta modificación ha dado por resultado en los últimos años de la encuesta totales mundiales muy inferiores a los que se habrían obtenido de lo contrario, posiblemente del orden de los 2 millones de toneladas de papel y cartón y un volumen aun mayor de pasta.

Como agregado a los datos estadísticos, de nuevo se volvió a hacer una lista de los planes de ampliación, gracias a la cooperación de muchos de los participantes en la encuesta, lista que se publica por separado. La capacidad adicional prevista se cotejó con los datos obtenidos en la encuesta actual y se verificó en caso necesario, pero obsérvese que esta lista no es exhaustiva; puede haber una capacidad adicional significativa por mejoras de máquinas, planes confidenciales, etc., cuyos detalles no están disponibles. Con todo, se espera que la información suministrada sea útil a todos los que se ocupan de la planificación del futuro de la industria.

Los principales resultados del estudio de las capacidades de pasta y papel en 1978-83 son que:

- (a) la capacidad mundial de pasta para papeles se prevé aumentará, de 145 millones de toneladas en 1978, a 164 millones de toneladas en 1983. Este aumento de 19 millones de toneladas representa un crecimiento anual de 2,5 por ciento;
- (b) la capacidad mundial de papel y cartón se prevé aumentará, de 188 millones de toneladas en 1978, a 214 millones de toneladas en 1983. Este aumento de 26 millones de toneladas representa un crecimiento anual de 2,7 por ciento;
- (c) los 19 millones de toneladas adicionales de pasta para papel y los 26 millones de toneladas de papel y cartón son los aumentos más bajos previstos en cualquiera de las encuestas de este decenio. Sin embargo, si no se hubiera cambiado la base de los datos de Estados Unidos la disminución registrada en encuestas sucesivas habría cesado e incluso se habría invertido;
- (d) la capacidad mundial de pasta de madera en 1983 es algo inferior a la prevista para 1982 en la encuesta del año pasado. Sin embargo, la capacidad de Estados Unidos en 1983 es 1,5 millones de toneladas menor de la que aparece para 1982 en la encuesta del año pasado, debido principalmente al cambio de la base de datos. Para los demás países del mundo, la capacidad en 1983 es superior en poco más de 1 millón de toneladas. Por el contrario, las estimaciones de papel y cartón son considerablemente mayores, aún dejando margen para las cifras más bajas de Estados Unidos, debido principalmente a planes más ambiciosos en Canadá y Escandinavia;
- (e) la capacidad de pasta termomecánica, registrada por primera vez, se cree ascenderá a 3,2 millones de toneladas en 1978 y puede aumentar a 7 millones de toneladas en 1983;
- (f) no se contempla ningún cambio importante del volumen de pasta química de madera que se prevé entrará en producción durante los próximos cinco años. Este se mantiene aproximadamente igual al que aparece en la encuesta del año pasado, después de hacer el reajuste de Estados Unidos;
- (g) la capacidad de pasta al sulfato blanqueada de no coníferas probablemente registrará un aumento de 2,8 millones de toneladas; de 16,9 millones de toneladas en 1978 a 19,7 millones de toneladas en 1983, cifra significativamente inferior al volumen contemplado en las últimas tres encuestas, superior a 4 millones de toneladas;
- (h) la pasta de otras fibras sigue jugando un rol importante en el abastecimiento interno de materia prima para la fabricación de papel en los países en desarrollo y representa aproximadamente un tercio de su capacidad. En Asia, la proporción pasa de 50 por ciento;
- (i) se prevé un aumento importante de la capacidad de papel y cartón en los países en desarrollo, más de un tercio, o sea, casi 5 millones de toneladas, con respecto a su actual capacidad manufacturera. Se prevé un aumento casi igual en los países con economías centralmente planificadas. Los aumentos de capacidad de los países desarrollados, aunque mayores en volumen (17,1 millones de toneladas), serán de alrededor del 10 por ciento;
- (j) después de algunos años de crecimiento relativamente lento, la capacidad de papel para periódicos debería aumentar más rápido en los próximos años, particularmente en Canadá;
- (k) la relación entre la capacidad de fabricación de pasta y la capacidad de papel y cartón sigue disminuyendo.

Tendencias por productos y regiones

La última encuesta indica que la capacidad mundial de pasta para papel se prevé aumentará, de 145,4 millones de toneladas en 1978, a 164,5 millones de toneladas en 1983, aumentando al mismo tiempo la capacidad total de papel y cartón, de 187,7 a 214,2 millones de toneladas. El crecimiento de la capacidad, por productos principales desde 1978, aparece en el Cuadro 1, el que indica que, en este período de 15 años, aumentó la capacidad con suma rapidez entre 1968 y 1973 y que el crecimiento futuro de la pasta probablemente mantendrá la misma tasa que en el quinquenio 1973-78. Sin embargo, este modelo general varía considerablemente según las clases de pasta. El crecimiento futuro del papel y del cartón será más lento que en el pasado reciente. En los Anexos 1-6 se dan detalles de la capacidad, por productos principales y regiones, en cada uno de los años 1978-83.

Cuadro 1 - Capacidad mundial de producción de pasta, papel y cartón, 1968-83

	Capacidad total				Incremento anual medio		
	1968	1973	1978	1983	1968-73	1973-78	1978-83
	----- millones de ----- toneladas métricas				----- porcentaje -----		
Total de pastas de madera para papel	98,1	120,0	134,9	152,0	4,1	2,4	2,4
Mecánica (a)	25,5	28,9	32,6	37,4	2,5	2,5	2,8
Semiquímica (b)	7,0	9,8	10,4	11,6	7,2	1,2	2,1
Química	65,6	81,2	91,9	103,0	4,4	2,5	2,3
Otra pasta de fibra	7,1	7,8	10,4	12,5	1,9	5,9	3,8
Pasta soluble	5,3	5,3	6,0	6,6	2,2	0,4	1,7
Total papel y cartón	127,0	160,2	187,7	214,2	4,8	3,2	2,7
Papel para periódicos	22,1	24,7	26,4	31,9	2,3	1,3	3,9
Papel de escritura e impresión	24,9	35,3	42,8	49,6	7,2	4,0	3,0
Otros papeles y cartones	80,1	100,3	118,5	132,7	4,6	3,4	2,3

- (a) se incluye la pasta termomecánica
 (b) se incluye la pasta químicomecánica

En las últimas cuatro encuestas, la tasa de crecimiento prevista de la capacidad de pasta de madera en el quinquenio siguiente ha ido disminuyendo, de 4,1 por ciento a 3,4, 3,1, 2,7 y 2,4 por ciento en la presente encuesta. Esta disminución de las previsiones ha coincidido de manera casi idéntica con el papel y el cartón, los que han disminuido ininterrumpidamente, de 4,1 por ciento a 2,7 por ciento. Las últimas cifras habrían sido algo mayores si no se hubiera revisado la base de datos de Estados Unidos. Comparando las cifras año a año, se observa una aceleración de la tasa de aumento de la capacidad hasta 1980, la tasa máxima se mantiene en 1980-81 y enseguida disminuye notablemente como puede observarse en el Cuadro 2.

Cuadro 2 - Tasa anual de aumento de la capacidad mundial de producción de pasta, papel y cartón, 1978-83

	Incrementos anuales				
	1978-79	1979-80	1980-81	1981-82	1982-83
	porcentaje				
Total de pasta de madera para papel	2,4	3,1	3,1	2,4	1,1
Mecánica (a)	2,2	3,8	3,5	3,4	1,1
Semiquímica (b)	2,1	3,3	2,0	2,5	0,6
Química	2,5	2,8	3,0	2,1	1,2
Otra pasta de fibra	5,7	4,8	2,3	3,1	3,0
Pasta soluble	1,9	2,3	1,9	1,0	1,6
Total de papel y cartón	3,0	3,0	3,3	2,6	1,5
Papel para periódicos	3,7	3,0	5,6	4,5	2,4
Papel de escritura e impresión	2,8	4,7	2,6	2,9	1,8
Otro papel y cartón	2,9	2,4	2,9	2,1	1,2

(a) se incluye la pasta termomecánica

(b) se incluye la pasta quimiomecánica

Esto es difícilmente sorprendente, ya que los aumentos de los próximos dos o tres años representan compromisos a firme de parte de las compañías, mientras que los de los años posteriores representan compromisos menos firmes o, como en el caso de Estados Unidos, éstos no se reflejan ahora en los datos de capacidad. Además, en algunos países, las encuestas de capacidad abarcan un período inferior a cinco años.

Total de pasta para papel

Se prevé un aumento, 19,2 millones de toneladas, de la capacidad de fabricación de pasta para papel entre 1978 y 1983, a una tasa media anual de 2,5 por ciento, o sea, alrededor de 1,7 millones de toneladas más que la capacidad instalada efectivamente entre 1973 y 1978, pero todavía inferior al aumento del quinquenio anterior, 1968-73. La pasta mecánica representará 4,8 millones de toneladas (incluso 3,8 millones de toneladas de pasta termomecánica), la semiquímica, 1,1 millones, la química, 11,1 millones y la pasta de otras fibras, los 2,1 millones de toneladas restantes. Se planifican sólo pequeñas cantidades adicionales de pasta soluble.

Está disminuyendo la significación de las pastas de no coníferas, principalmente pasta al sulfato blanqueada y semiquímica. El aumento es mucho menor en los principales países productores y los nuevos proyectos que usan no coníferas tropicales todavía no han alcanzado su pleno potencial.

Toda la capacidad de pasta para papel, salvo una pequeña parte, se encuentra en países desarrollados. Con la ejecución de varios planes en países en desarrollo, no sólo ha aumentado el volumen de la capacidad, sino también la proporción del total mundial instalada en ellos. Esta proporción puede llegar al 8,4 por ciento en 1983, en comparación con 4,6 por ciento en 1973.

Pasta para comercialización

Canadá es el mayor productor del mundo en pasta para comercialización; su capacidad representa alrededor de un cuarto del total mundial. La presente encuesta indica que la capacidad total de pasta para comercialización aumentará en 2,8 millones de toneladas más en los próximos tres años, al mismo paso que en la evolución del pasado reciente. La mayor parte del mayor tonelaje se situará en Brasil, país donde se pusieron en marcha tres grandes fábricas. Cuando la producción aumente hasta su plena capacidad, la pasta para comercialización disponible en Brasil ascenderá aproximadamente a un millón de toneladas, o sea, alrededor de la mitad de la cantidad contemplada hace algunos años en el plan nacional de pasta y papel de ese país. Prácticamente toda la pasta para comercialización adicional será pasta al sulfato blanqueada, más de coníferas que de no coníferas y la mayor parte de la de no coníferas provendrá de Brasil. La evolución puede seguirse en detalle en los anexos 7 y 8 y se encuentra ilustrada en el anexo 11.

Pasta de madera

El volumen de la capacidad adicional de pasta de madera para papel en el mundo, entre 1978 y 1983, se prevé será de 17,1 millones de toneladas, cantidad considerablemente mayor que la instalada efectivamente en el quinquenio anterior. Es interesante observar que la capacidad mundial efectiva en 1978, 134,9 millones de toneladas, es inferior a la contemplada para ese año en la encuesta de 1977-82, lo que indica la incertidumbre general en cuanto al futuro de las condiciones económicas, causada por la cancelación o demoras de algunos proyectos y, en algunos casos, por el cierre de fábricas. Demoras en la ejecución de los planes se ponen también de manifiesto en los últimos años, particularmente en Suecia, Canadá, Francia y Brasil. Sin embargo, en algunos otros países, han aumentado los planes de ampliación. En el cuadro 3 se resumen la cuantía y la ubicación de la nueva capacidad.

Cuadro 3 - Aumentos de la capacidad total de producción de pasta de madera para papel, 1973-83

	Capacidad			Aumento total		Aumento anual medio	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	----- millares de toneladas métricas -----			-----		----- porcentaje -----	
Total mundial	119 984	134 945	152 011	14 961	17 066	2,4	2,4
Econ. merc. desarrolladas	103 742	113 281	123 173	9 539	9 892	1,8	1,7
América del Norte	61 708	67 003	72 321	5 295	5 318	1,7	1,5
Japón	10 772	12 064	13 610	1 292	1 546	2,3	2,5
Europa occidental	29 230	31 440	33 978	2 210	2 538	1,5	1,6
Oceanía	1 348	2 090	2 474	742	384	9,2	3,4
Otras	684	684	790	-	106	-	2,9
Econ. merc. en desarrollo	3 783	5 906	9 808	2 123	3 902	9,3	10,7
África	260	354	818	94	464	6,4	18,2
América Latina	2 635	4 413	6 861	1 778	2 448	10,9	9,2
Asia	888	1 139	2 129	251	990	5,1	13,3
Econ. centralmente planif.	12 459	15 758	19 030	3 299	3 272	4,8	3,8
Asia	1 825	2 447	3 024	622	577	6,0	4,3
Europa oriental	2 854	3 661	4 361	807	700	5,1	3,6
U.R.S.S.	7 780	9 650	11 645	1 870	1 995	4,4	3,8

Si no fuera por el hecho de que los datos de capacidad de Estados Unidos ahora excluyen, en los últimos años de la encuesta, aquellos proyectos para los cuales no se han comprometido fondos, es probable que el aumento de la capacidad mundial total de pasta de madera para papel hubiera sido mayor en la presente encuesta que en la del año pasado. No obstante lo dicho, el aumento previsto (9,9 millones de toneladas) en los países desarrollados en 1978-83 es mayor que la capacidad adicional efectivamente instalada (9,5 millones de toneladas) entre 1973 y 1978. Otro tanto puede afirmarse, pero en mayor grado, de los países en desarrollo que, si realizaran todos sus planes aumentarían casi al doble las adiciones hechas entre 1973 y 1978. En los países con economías centralmente planificadas se prevé poca variación.

Comparando la presente encuesta con la anterior, la mayor parte del menor volumen en el quinquenio se debe a una previsión menor en Estados Unidos (2,3 millones de toneladas, principalmente por las razones ya mencionadas) y en Suecia (0,6 millones de toneladas). Estas se ven contrarrestadas en parte por un pronóstico mejorado en Noruega, país que ha registrado una cifra más alta, en 0,5 millones de toneladas, que la correspondiente de la encuesta anterior.

Pasta mecánica

Entre 1978 y 1983 se prevé que la capacidad de pasta mecánica, incluso pasta termomecánica, aumentará en 4,8 millones de toneladas, en comparación con 4,1 millones de toneladas en la encuesta precedente. La mayor tasa de crecimiento, 2,8 por ciento anual en comparación con 2,4 por ciento, se debe en parte al mayor uso de PFM y en parte a planes más ambiciosos de aumento del papel para periódicos. Particularmente rápido es el crecimiento previsto en Japón, Australia y en algunos países en desarrollo. Se señala el hecho de que la capacidad de Nueva Zelandia se ha revisado en esta encuesta, rebajándola porque la pasta mecánica para la fabricación de cartón de fibra para construcción se excluye actualmente, de conformidad con las definiciones.

Cuadro 4 - Aumentos de la capacidad de producción de pasta mecánica*
de madera para papel, 1973-83

	<u>Capacidad</u>			<u>Aumento total</u>		<u>Aumento anual medio</u>	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	--- millares de toneladas			--- métricas ---		--- porcentaje ---	
Total mundial	28 865	32 635	37 454	3 770	4 819	2,5	2,8
Econ. merc. desarrolladas	24 748	27 704	31 698	2 956	3 994	2,3	2,7
América del Norte	12 869	13 721	15 385	852	1 664	1,3	2,3
Japón	1 592	2 111	2 871	519	760	5,8	6,3
Europa Occidental	9 618	10 824	11 993	1 206	1 169	2,4	2,1
Oceanía	433	787	1 143	354	356	12,7	7,7
Otras	236	261	306	25	45	2,0	3,2
Econ. merc. en desarrollo	742	880	1 240	138	360	3,5	7,1
Africa	15	17	36	2	19	2,5	16,2
América Latina	391	466	613	75	147	3,6	5,6
Asia	336	397	591	61	194	3,4	8,3
Econ. centralmente planif.	3 375	4 051	4 516	676	465	3,7	2,2
Asia	795	901	1 103	106	202	2,5	4,1
Europa Oriental	630	950	968	320	18	8,6	0,4
U.R.S.S.	1 950	2 200	2 445	250	245	2,4	2,1

* Incluso pasta termomecánica

Por primera vez se recopilaron datos de pasta termomecánica y muchos países pudieron suministrar información pertinente, salvo unos pocos que no pudieron identificarla por separado. En 1978, la capacidad registrada de PTM ascendió a 3,2 millones de toneladas y en 1983 se prevé aumentará a 7,0 millones de toneladas. En Norteamérica, donde se encuentra un tercio de la capacidad mundial, el crecimiento de las instalaciones de PTM se ha logrado en parte a expensas de la pasta mecánica a la piedra, cuya capacidad ha disminuido. Actualmente, parece no haber capacidad de PTM en los países en desarrollo, a pesar de que hay planes de fábricas de este tipo en cuatro de ellos.

En el cuadro siguiente se resume la capacidad actual y futura de PTM. En los datos por países aparecen estadísticas más detalladas.

Cuadro 5 - Aumento de capacidad de Pasta Termomecánica

1978 - 83

	Capacidad		Aumento
	1978	1983	1978-83
	--- millares de toneladas métricas ---		
Total mundial	3 237	7 038	3 801
Economías de mercado desarrolladas	3 237	6 701	3 464
América del Norte	1 188	2 893	1 705
Japón	621	1 364	743
Escandinavia	1 276	1 855	579
Otras Europa occidental	112	196	84
Oceanía	40	393	353
Economías de mercado en desarrollo	-	217	217
América Latina	-	112	112
Asia	-	105	105
U.R.S.S.	-	120	120

Pasta semiquímica

Entre 1978 y 1983 la capacidad mundial de pasta semiquímica y quimiomecánica aumentará en 10,5 a 11,6 millones de toneladas, o sea, 1,1 millones de toneladas, a una tasa anual de 2,1 por ciento. Este aumento es inferior al previsto en la encuesta del año pasado, debido principalmente a las cifras más bajas de Norte y Latinoamérica, las que no se vieron contrapesadas del todo por las cifras más altas de África y Asia. Poco más de un tercio de la capacidad adicional se instalará en países desarrollados y en desarrollo.

Cuadro 6 - Aumentos de la capacidad de producción de pasta semiquímica para papel, 1973-83

	Capacidad			Aumento total		Aumento anual medio	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	-- millares de toneladas métricas --			--		-- porcentaje --	
Total mundial	9 840	10 457	11 592	617	1 135	1,2	2,1
Econ. de merc. desarrolladas	8 845	9 014	9 423	169	409	0,4	0,9
América del Norte	4 209	4 630	4 882	421	252	1,9	1,1
Japón	2 305	1 918	1 999	- 387	81	- 3,6	0,8
Europa Occidental	1 909	1 893	1 969	- 16	76	- 0,2	0,8
Oceanía	270	411	411	141	-	8,8	-
Otras	152	162	162	10	-	1,3	-
Econ. de merc. en desarrollo	445	482	882	37	400	1,6	12,8
África	5	10	66	5	56	14,9	46,0
América Latina	264	409	568	145	159	9,2	6,8
Asia	176	63	248	- 113	185	-18,7	32,0
Econ. centralmente planif.	550	961	1 287	411	326	11,8	11,8
Asia	-	-	-	-	-	-	-
Europa Oriental	170	411	487	241	76	19,3	3,5
U.R.S.S.	380	550	800	170	250	7,7	7,8

Pasta química de madera para papel

La proporción entre la pasta química de madera y el total de pasta para papel se ha mantenido constante en 63,0 por ciento por muchos años y al parecer no es probable cambio en el futuro próximo. Entre 1978 y 1983 se prevé que la capacidad mundial aumentará, de 91,9 millones de toneladas a 103,0 millones de toneladas, a una tasa media anual de 2,3 por ciento. Incluso con un reajuste apropiado por el cambio de la base de datos de Estados Unidos, el aumento en el próximo quinquenio probablemente será inferior al previsto cuando se hizo la encuesta del año pasado, particularmente en Europa Occidental.

La disminución de la capacidad de pasta al sulfito, tanto blanqueada como sin blanquear, continúa. En Estados Unidos, se han cerrado, desde 1960, alrededor de 800 000 toneladas de capacidad y en los próximos tres años se cerrarán otras 80 000 toneladas. En Canadá igualmente continúa la disminución, lo mismo que en Escandinavia. En "Información sobre fábricas de pasta y papel proyectadas en el mundo, 1978-88" (Information on Projected Pulp and Paper Mills in the World 1978-88) aparecen detalles de cierres de fábricas, así como de las pocas nuevas que se están planificando en otros países.

Cuadro 7 - Aumentos de capacidad de pasta química de madera para papel, 1973-83

	Capacidad			Aumento total		Aumento anual medio	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	--- millares de toneladas métricas ---			---		--- porcentaje ---	
Total mundial	81 279	91 853	102 965	10 574	11 112	2,5	2,3
Econ. merc. desarrolladas	70 149	76 563	82 052	6 414	5 489	1,8	1,4
América del Norte	44 630	48 652	52 054	4 022	3 402	1,7	1,4
Japón	6 875	8 035	8 740	1 160	705	3,2	1,7
Europa Occidental	17 703	18 723	20 016	1 020	1 293	1,1	1,4
Oceanía	645	892	920	247	28	6,7	0,6
Otras	296	261	322	- 35	61	- 2,4	4,3
Econ. merc. desarrolladas	2 596	4 544	7 686	1 948	3 142	11,7	11,1
Africa	240	327	716	87	389	6,4	17,0
América Latina	1 980	3 538	5 680	1 558	2 142	12,3	9,9
Asia	376	679	1 290	303	611	12,5	13,7
Econ. centralmente planif.	8 534	10 746	13 227	2 212	2 481	4,7	4,2
Asia	1 030	1 546	1 921	516	375	8,5	4,4
Europa Oriental	2 054	2 300	2 906	246	606	2,3	4,8
U.R.S.S.	5 450	6 900	8 400	1 450	1 500	4,8	4,0

Otra pasta de fibra

Se prevé que entre 1978 y 1983 aumentará la capacidad de otra pasta de fibra para papel, excluido el papel de desecho, de 10,4 a 12,5 millones de toneladas, o sea, 2,1 millones de toneladas, lo que equivale a una tasa anual de 3,8 por ciento.

Cuadro 8 - Aumentos de capacidad de pasta de otra fibra para papel, 1973-83

	Capacidad			Aumento total		Aumento anual medio	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	--- millares de toneladas métricas ---			---		--- porcentaje ---	
Total mundial	7 836	10 408	12 526	2 572	2 118	5,9	3,8
Econ. merc. desarrolladas	2 262	1 724	1 736	- 538	12	- 5,3	0,1
América del Norte	1 000	667	698	- 333	31	- 7,7	0,9
Japón	6	4	4	- 2	-	- 7,7	-
Europa Occidental	1 202	938	919	- 264	- 19	- 4,9	-0,4
Oceanía	2	5	5	3	-	20,0	-
Otras	52	110	110	58	-	16,2	-
Econ. merc. en desarrollo	2 041	2 791	3 938	750	1 147	6,5	7,1
Africa	158	199	232	41	33	4,7	3,1
América Latina	777	1 025	1 540	248	515	5,7	8,5
Asia	1 106	1 567	2 166	461	599	7,2	6,7
Econ. centralmente planif.	3 533	5 893	6 852	2 360	959	10,8	3,1
Asia	2 906	5 158	5 976	2 252	818	12,2	3,0
Europa Oriental	227	260	276	33	16	2,8	1,2
U.R.S.S.	400	475	600	75	125	3,5	4,8

Durante el período 1973-78 hubo una disminución de 0,5 millones de toneladas en la capacidad de los países desarrollados, debido al cierre de algunas fábricas de pasta de paja en Europa Occidental y a un ajuste estadístico de la capacidad de Norteamérica para adaptarla a las definiciones acordadas. En los países en desarrollo centralmente planificados, donde tendrá lugar casi todo el aumento, la pasta de otra fibra es una materia prima importante. Representa en promedio alrededor de un tercio de la capacidad de los países en desarrollo y más de la mitad de la de los países en desarrollo de Asia.

Pasta soluble

La capacidad de pasta soluble, la que ha acusado un crecimiento muy modesto solamente en los últimos diez o más años, aumentará en 10 por ciento el próximo quinquenio. La mayor parte de la capacidad adicional se instalará en Europa Oriental y U.R.S.S., pero además en Canadá un aumento modesto invertirá la tendencia reciente a la disminución.

Papel y cartón

La capacidad total de papel y cartón en el mundo se prevé aumentará, de 187,7 millones de toneladas en 1978 a 214,2 millones de toneladas en 1983, a una tasa media de 2,7 por ciento. El volumen de la mayor capacidad, 26,6 millones de toneladas, aunque inferior a los aumentos de cualquiera de las encuestas recientes, probablemente revelaría una oscilación ascendente si se reajustaran las cifras de Estados Unidos. Esto puede ser reflejo de la lenta mejora de la situación económica de algunos países.

Alrededor de dos tercios de la nueva capacidad se instalará en los países desarrollados, en los que ya se encuentran tres cuartos del total. Aunque la FAO no ha hecho ninguna averiguación específica, hay indicaciones de que una parte significativa de la nueva capacidad se debe a modificaciones de las actuales máquinas, mientras que en los años sesenta la nueva capacidad se debió quizá a nuevas máquinas. La conversión de máquinas para la fabricación de un producto a otro es una característica importante en los países que racionalizan su industria. Con los ambiciosos planes de ampliación de los países en desarrollo, su participación en el total mundial probablemente aumentará, de 5,9 por ciento en 1973 a 8,6 por ciento en 1983.

Cuadro 9 - Aumento de la capacidad total de papel y cartón, 1973-83

	Capacidad			Aumento total		Aumento anual medio	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	millares de toneladas métricas			-- --		porcentaje -- --	
Total mundial	160 232	187 652	214 242	27 420	26 590	3,2	2,7
Econ. merc. desarrolladas	132 376	148 390	165 512	16 014	17 122	2,3	2,2
América del Norte	68 563	73 798	80 223	5 235	6 425	1,5	1,7
Japón	17 551	21 164	25 447	3 613	4 283	3,8	3,8
Europa Occidental	43 551	49 910	55 685	6 359	5 775	2,8	2,2
Oceanía	1 779	2 295	2 713	516	418	5,2	3,4
Otras	932	1 223	1 444	291	221	5,6	3,4
Econ. merc. en desarrollo	9 385	13 670	18 473	4 285	4 803	7,8	6,2
Africa	455	709	926	254	217	9,3	5,5
América Latina	5 649	7 970	10 723	2 321	2 753	7,1	6,1
Asia	3 281	4 991	6 824	1 710	1 833	8,8	6,5
Econ. centralmente planif.	18 471	25 592	30 257	7 121	4 665	6,7	3,4
Asia	5 409	8 701	10 003	3 292	1 302	10,0	2,8
Europa Oriental	4 562	5 891	6 754	1 329	863	5,2	2,8
U.R.S.S.	8 500	11 000	13 500	2 500	2 500	5,3	4,2

En una comparación de la encuesta actual con la del año pasado vale la pena observar que la capacidad mundial efectiva en 1978 es unos 2 millones de toneladas menor que estimada antes y que la cifra de 1982 también es menor, debido principalmente a Estados Unidos (cambio de la base), Canadá y CEE, donde continúa la racionalización.

Papel para periódicos

La tasa de crecimiento del aumento de papel para periódicos probablemente se triplicará en el futuro en relación con el pasado reciente. Se prevé que entrarán en producción en 1983 unos 5,6 millones de toneladas mientras que entre 1973 y 1978 sólo se instalaron 1,7 millones de toneladas. Los aumentos más notables tienen lugar en Canadá, Estados Unidos y Escandinavia.

En Canadá, que tiene un tercio de la capacidad mundial de papel para periódicos, se hizo una modificación en el método de cálculo de la capacidad, la que provocó una reducción del volumen en 2-3 por ciento. Se ha hecho referencia en encuestas anteriores a la reducción del gramaje del papel para periódicos en varios países. El papel para periódicos liviano (48,8 g/m²), mucho más lentamente que en otros países pasó a ser un factor del mercado en Japón, pero en la actualidad ya se encuentra firmemente establecido y representa casi la mitad de la producción.

Cuadro 10 - Aumento de la capacidad de papel para periódicos, 1973-83

	Capacidad			Aumento total		Aumento anual medio	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	--- millares de toneladas métricas ---			---		--- porcentaje ---	
Total mundial	24 690	26 379	39 931	1 689	5 552	1,3	3,9
Econ. merc. desarrolladas	21 453	22 268	26 405	815	4 137	0,7	3,5
América del Norte	12 422	12 679	14 432	257	1 753	0,4	2,6
Japón	2 233	2 569	3 196	336	627	2,8	4,5
Europa Occidental	6 168	6 254	7 733	86	1 479	0,3	4,3
Oceanía	426	533	713	107	180	4,6	6,0
Otras	204	233	331	29	98	2,7	7,3
Econ. merc. en desarrollo	700	1 081	2 058	381	977	9,1	13,7
África	13	13	68	-	55	-	39,0
América Latina	287	465	1 070	178	605	10,1	18,1
Asia	400	603	920	203	317	8,6	8,8
Econ. centralmente planif.	2 537	3 030	3 468	493	438	3,6	2,7
Asia	790	920	1 090	130	170	3,1	3,4
Europa Oriental	347	460	478	113	18	5,8	0,8
U.R.S.S.	1 400	1 650	1 900	250	250	3,3	2,9

Otro papel de escritura e impresión

El crecimiento futuro de los papeles de escritura e impresión será más bajo que en el pasado reciente, en contraste con la evolución de la capacidad de papel para periódicos. Este progreso más lento se pone de manifiesto en la mayoría de las regiones desarrolladas y en los países con economías centralmente planificadas, mientras que sucede lo contrario en los países en desarrollo y particularmente en los de Asia. En estos últimos la adición de casi 1 millón de toneladas de papeles culturales, o sea, poco menos del 50 por ciento de la capacidad instalada en el próximo quinquenio, probablemente reducirá en cierta medida su dependencia de la importación de estos papeles.

Cuadro 11 - Aumento de capacidad de otro papel de escritura e impresión
1973-83

	Capacidad			Aumento total		Aumento anual medio	
	1973	1978	1983	1973-78	1978-83	1973-78	1978-83
	--- millares de toneladas métricas ---					--- porcentaje ---	
Total mundial	35 270	42 823	49 574	7 553	6 751	4,0	3,0
Econ. merc. desarrolladas	29 550	34 767	39 435	5 217	4 668	3,3	2,6
América del Norte	13 108	14 973	16 428	1 865	1 455	2,7	1,9
Japón	3 103	4 081	5 317	978	1 236	5,6	5,4
Europa Occidental	13 002	15 250	17 192	2 248	1 948	3,2	2,4
Oceania	201	248	262	47	14	4,3	1,1
Otras	136	215	230	79	15	9,6	1,4
Econ. merc. en desarrollo	2 462	3 204	4 359	742	1 155	5,4	6,4
Africa	146	228	326	82	98	9,3	7,4
América Latina	1 192	1 540	2 041	348	501	5,3	5,8
Asia	1 124	1 436	1 992	312	556	5,0	6,8
Econ. centralmente planif.	3 258	4 852	5 780	1 594	928	8,3	3,6
Asia	1 215	2 344	2 720	1 129	376	14,1	3,0
Europa Oriental	893	1 108	1 410	215	302	4,4	4,9
U.R.S.S.	1 150	1 400	1 650	250	250	4,0	3,3

Proporción entre la capacidad de producción de pasta para papel y la capacidad de producción de papel y cartón

Por más de diez años la relación entre la capacidad de fabricación de pasta y la de papel y cartón ha ido disminuyendo constantemente, reflejando quizá la mayor utilización de papel de desecho en la fabricación de papel y cartón. Los resultados de la presente encuesta indican que la capacidad de pasta y cartón, no sólo está creciendo con mayor rapidez que la capacidad de pasta, sino también con un mayor volumen. Por eso cabe prever que la razón pasta/papel disminuirá aún más en el futuro invirtiéndose la tendencia observada en la encuesta del año pasado.

	<u>Razón pasta/papel</u> <u>por ciento</u>
1965	81,8
1970	80,5
1975	77,8
1978 (a)	77,5
1979 (a)	77,2
1980 (a)	77,3
1981 (a)	77,1
1982 (a)	77,0
1983 (a)	76,8

(a) Pronóstico de la encuesta 1978-83

Comparación con las encuestas anteriores

Por cuarto año consecutivo, la encuesta de la FAO acerca de la capacidad de producción de pasta y papel revela una adición menor en el quinquenio, tanto de pasta como de papel. Se hacen comparaciones con encuestas anteriores en el Cuadro siguiente y en el Anexo 9. Se vuelve a señalar una vez más la falta de comparabilidad con las anteriores de las cifras de Estados Unidos en la última encuesta. En la presente encuesta se omiten aquellos aumentos de Estados Unidos para los cuales no se han comprometido fondos a firme, los que posiblemente representan unos 2 millones de toneladas de papel y cartón y algo más de pasta. Por eso, hecho el reajuste, la presente encuesta probablemente presenta un cuadro algo más ambicioso que la última.

<u>Período de la encuesta</u>	<u>Aumento total en el período</u>	
	<u>Total pasta para papel</u>	<u>Total Papel y Cartón</u>
	- millones de toneladas métricas -	
1973 - 78	23,6	32,4
1974 - 79 (a)	26,7	33,3
1975 - 80	25,4	31,1
1976 - 81	23,3	28,1
1977 - 82	21,0	27,4
1978 - 83 (b)	19,2	26,6

- (a) Hechas las enmiendas de nueve países, a saber: Canadá, Estados Unidos, Brasil, Finlandia, Francia, República Federal de Alemania, Suecia, Reino Unido y Japón;
- (b) No comparable con encuestas anteriores

El total de la mayor capacidad de las principales pastas, papeles y cartones en los períodos abarcados por las últimas cuatro encuestas aparece a continuación.

	<u>Encuesta</u> 1975-80	<u>Encuesta</u> 1976-81	<u>Encuesta</u> 1977-82	<u>Encuesta</u> 1978-83
	- - - - - millares de toneladas métricas - - - - -			
Total pasta de madera del cual:	22 815	21 134	19 147	17 066
mecánica (a)	4 075	4 348	4 097	4 819
semiquímica (b)	2 148	1 477	1 288	1 135
química	16 592	15 309	13 762	11 112
Otra pasta de fibra	2 605	2 147	1 820	2 118
Total papel y cartón del cual:	31 060	28 077	27 363	26 590
papel para periódicos	4 537	4 655	4 624	5 552
otro de escritura e impresión	7 303	6 911	6 716	6 751
otro papel y cartón	19 220	16 511	16 023	14 287
- de envolver y empaquetar	15 493	13 161	12 435	10 820

- (a) incluso pasta termomecánica
- (b) incluso pasta quimimecánica

Por productos y regiones, es interesante tomar nota de la probable evolución futura y compararla con lo que ha sucedido realmente en el quinquenio pasado. La disminución de las adiciones a la capacidad de pasta química proyectadas para los países desarrollados contrasta con la situación de los países en desarrollo, donde se prevé un aumento significativo. Sobresalen la importancia y la aceleración del desarrollo de otra pasta de fibra en estos últimos países, particularmente cuando en otras áreas se están restringiendo drásticamente las ampliaciones. El crecimiento restringido futuro de papel y cartón, comparado con años anteriores tanto en países desarrollados como en los que tienen economías centralmente planificadas, no concuerda con el de los países en desarrollo, donde se prevén grandes aumentos de capacidad en papeles culturales. Sólo en papel para periódicos los países desarrollados están planificando invertir la tendencia reciente al crecimiento lento. Todos estos puntos se ilustran en el Anexo 10.

ANNEXES

CAPACITY FOR 1978	REGION	CODE	PAPER PULP										PAPER AND PAPERBOARD				
			TOTAL 1+2	WOOD PULP			OTHER FIBRE PULP 2	DISSOLVING PULP 3	TOTAL 4	NEWSPRINT 5.1	PRINTING WRITING 4.2	TOTAL 4.3	OTHER				
				MECH. 1.1+1.2	SEMI-CHEM. 1.3	CHEMICAL 1.4							TOTAL	WRAPPING			
															1	4.3	
1+2	1.1+1.2	1.3	1.4	2	3	4	5.1	4.2	4.3	4.3	4.32						
WORLD TOTAL:			145 353	134 945	32 635	10 457	91 853	10 408	6 024	187 652	26 379*	42 823	118 450	88 438			
of which:																	
DEVELOPED MARKET ECONOMIES			115 005	113 281	27 704	9 014	76 563	1 724	4 081	148 390	22 268	34 767	91 355	69 639			
of which:																	
NORTHERN AMERICA			67 670	67 003	13 721	4 630	48 652	667	1 911	73 798	12 679	14 973	46 146	36 689			
JAPAN			12 068	12 064	2 111	1 918	8 035	4	479	21 164	2 569	4 081	14 514	10 977			
WESTERN EUROPE			32 378	31 440	10 824	1 893	18 723	938	1 378	49 910	6 254	15 250	28 406	19 969			
- E.E.C.			6 731	6 155	2 910	738	2 507	576	401	27 417	1 911	9 118	16 388	10 208			
- NORDIC COUNTRIES			20 880	20 880	6 931	925	13 024	-	690	15 015	3 620	3 820	7 575	6 230			
- REST OF W.E.			4 767	4 405	983	230	3 192	362	287	7 478	723	2 312	4 443	3 531			
OCEANIA			2 095	2 090	787	411	892	5	-	2 295	533	248	1 514	1 359			
OTHERS			794	684	261	162	261	110	313	1 223	233	215	775	645			
DEVELOPING MARKET ECONOMIES			8 697	5 906	880	482	4 544	2 791	221	13 670	1 081	3 204	9 385	7 868			
of which:																	
AFRICA			553	354	17	10	327	199	-	709	13	228	468	458			
LATIN AMERICA			5 438	4 413	466	409	3 538	1 025	71	7 970	465	1 540	5 965	4 833			
ASIA			2 706	1 139	397	63	679	1 567	150	4 991	603	1 436	2 952	2 577			
CENT. PLANNED ECONOMIES			21 651	15 758	4 051	961	10 746	5 893	1 722	25 592	3 030	4 852	17 710	10 931			
of which:																	
ASIA			7 605	2 447	901	-	1 546	5 158	40	8 701	920	2 344	5 437	27			
EASTERN EUROPE			3 921	3 661	950	411	2 300	260	432	5 891	460	1 108	4 323	3 749			
U.S.S.R.			10 125	9 650	2 200	550	6 900	475	1 250	11 000	1 650	1 400	7 950	7 155			

* Including TMP

CAPACITY FOR 1979

REGION / CODE	PAPER PULP										DISSOLVING PULP	PAPER AND PAPERBOARD			
	TOTAL 1+2	WOOD PULP			OTHER FIBRE PULP	TOTAL	NEWSPRINT	PRINTING WRITING	OTHER						
		MECH. 1.1+1.2	SEMI-CHEM. 1.3	CHEMICAL 1.4					TOTAL	WRAPPING					
WORLD TOTAL:	149 218	138 217	33 366	10 675	94 176	11 001	6 140	193 280	27 362	44 032	121 866	90 794			
of which:															
DEVELOPED MARKET ECONOMIES	116 916	115 194	28 301	9 088	77 805	1 722	4 058	152 130	22 865	35 641	93 624	71 144			
of which:															
NORTHERN AMERICA	69 130	68 440	14 091	4 715	49 634	690	1 889	75 588	12 922	15 364	47 302	31 503			
JAPAN	12 301	12 297	2 257	1 918	8 122	4	475	21 747	2 632	4 268	14 847	11 049			
WESTERN EUROPE	32 527	31 614	10 889	1 882	18 843	913	1 373	51 147	6 542	15 541	29 024	20 388			
- E.L.C.	6 877	6 340	3 053	739	2 548	537	497	28 065	1 929	9 317	16 019	10 440			
- NORDIC COUNTRIES	20 695	20 695	6 847	910	12 938	-	675	15 435	3 880	3 830	7 675	6 305			
- REST OF W.E.	4 955	4 579	989	233	3 357	376	291	7 647	733	2 344	4 570	3 643			
OCEANIA	2 125	2 120	803	411	906	5	-	2 393	533	252	1 608	1 449			
OTHERS	833	723	261	162	300	110	317	1 255	236	216	803	675			
DEVELOPING MARKET ECONOMIES	9 936	6 735	913	564	5 258	7 201	247	14 694	1 379	3 394	9 921	8 273			
of which:															
AFRICA	600	377	27	10	340	223	-	747	24	246	477	466			
LATIN AMERICA	6 322	5 090	469	491	4 130	1 232	71	8 690	745	1 630	6 299	5 046			
ASIA	3 014	1 268	417	63	738	1 746	176	5 257	610	1 438	3 149	2 761			
CENT. PLANNED ECONOMIES	22 366	16 268	4 152	1 023	11 113	6 078	1 835	26 456	3 118	4 997	18 341	11 377			
of which:															
ASIA	7 879	2 561	942	-	1 612	5 318	40	8 955	950	2 417	5 583	27			
EASTERN EUROPE	3 937	3 677	960	423	2 294	960	470	6 001	360	1 330	4 403	3 610			
U.S.S.R.	10 550	10 050	2 250	600	7 200	500	1 325	11 500	1 100	1 250	8 300	7 540			

000 metric tons

ANNEX 2

CAPACITY FOR 1980		PAPER PULP										DISSOLVING PULP				PAPER AND PAPERBOARD			
REGION	CODE	TOTAL		WOOD PULP			OTHER FIBRE PULP		TOTAL	NEWSPRINT	PRINTING WRITING	TOTAL	OTHER						
		1+2	1	MECH. 1.1+1.2	SEMI-CHEM. 1.3	CHEMICAL 1.4	2	3					4	4.1	4.2	4.3	4.32		
WORLD TOTAL:		153 990	142 462	34 624	11 023	96 815	11 528	6 283	199 153	28 195	46 114	124 844	92 917						
of which:																			
DEV'ED MARKET ECONOMIES		119 566	117 834	29 350	9 293	79 191	1 732	4 077	155 809	23 404	37 274	95 131	72 093						
of which:																			
NORTHERN AMERICA		70 722	70 026	14 604	4 812	50 610	696	1 899	77 477	13 383	16 045	48 049	38 114						
JAPAN		12 591	12 587	2 504	1 946	8 137	4	479	22 607	2 721	4 672	15 214	11 248						
WESTERN EUROPE		33 205	32 288	11 124	1 962	19 202	917	1 374	52 578	6 835	16 057	29 686	20 810						
- E.E.C.		7 153	6 616	3 241	754	2 621	537	408	29 038	2 157	9 657	17 224	10 705						
- NORDIC COUNTRIES		21 043	21 043	6 892	975	13 176	-	675	15 755	3 945	4 050	7 760	6 330						
- REST OF W.E.		5 009	4 629	991	233	3 405	380	291	7 785	733	2 350	4 702	3 775						
OCEANIA		2 186	2 181	850	411	920	5	-	1 819	226	278	1 315	1 183						
OTHERS		862	752	268	162	322	110	325	1 328	239	222	867	738						
DEV'ING MARKET ECONOMIES		11 012	7 483	1 001	630	5 852	3 529	247	15 909	1 593	3 670	10 646	8 886						
of which:																			
AFRICA		613	384	30	10	344	229	-	765	27	254	484	472						
LATIN AMERICA		7 038	5 603	504	532	4 567	1 435	71	9 439	875	1 747	6 817	5 461						
ASIA		3 361	1 496	467	88	941	1 865	176	5 705	691	1 669	3 345	2 953						
CENT. PLANNED ECONOMIES		23 412	17 145	4 273	1 100	11 772	6 267	1 959	27 435	3 198	5 170	19 067	11 938						
of which:																			
ASIA		8 154	2 676	983	-	1 693	5 478	40	9 209	980	2 490	5 739	27						
EASTERN EUROPE		4 253	3 989	960	450	2 579	264	519	6 226	468	1 180	4 578	3 986						
U.S.S.R.		11 005	10 480	2 330	650	7 500	525	1 400	12 000	1 750	1 500	8 750	7 925						

1 000 metric tons

* Including TMP

CAPACITY FOR 1981		PAPER PULP										PAPER AND PAPERBOARD				
REGION / CODE	TOTAL 1 + 2	WOOD PULP				OTHER FIBRE PULP 2	DISSOLVING PULP 3	TOTAL 4	NEWSPRINT 4.1	PRINTING WRITING 4.2	TOTAL 4.3	OTHER WRAPPING 4.32				
		TOTAL 1	MECH. 1.1+1.2	SEMI-CHEM 1.3	CHEMICAL 1.4											
WORLD TOTAL:	158 591	146 801	35 856	11 248	99 697	11 790	6 404	205 629	29 856*	47 324	128 449	96 670				
of which:																
DEV'ED MARKET ECONOMIES	122 325	120 589	30 409	9 346	80 834	1 736	4 146	160 408	24 749	38 084	97 575	74 092				
of which:																
NORTHERN AMERICA	72 201	71 503	15 089	4 866	51 548	698	1 925	79 177	13 904	16 277	48 996	38 995				
JAPAN	12 938	12 934	2 552	1 955	8 427	4	479	23 497	2 738	4 957	15 802	11 665				
WESTERN EUROPE	33 972	33 053	11 484	1 952	19 617	919	1 397	53 663	7 118	16 364	30 181	21 133				
- E.E.C.	7 347	6 810	3 279	764	2 767	537	411	29 482	2 210	9 804	17 468	10 875				
- NORDIC COUNTRIES	21 557	21 557	7 213	955	13 389	-	695	16 240	4 135	4 195	7 910	6 440				
- REST OF W.E.	5 068	4 686	992	233	3 461	382	291	7 941	773	2 365	4 803	3 818				
OCEANIA	2 314	2 309	978	411	920	5	-	2 632	659	258	1 715	1 549				
OTHERS	900	790	306	162	322	110	345	1 439	330	228	881	750				
DEV'ING MARKET ECONOMIES	11 997	8 399	1 111	726	6 562	3 598	247	16 813	1 814	3 805	11 194	9 393				
of which:																
AFRICA	716	484	30	50	404	232	-	790	52	254	484	472				
LATIN AMERICA	7 562	6 081	515	558	5 008	1 481	71	9 898	935	1 823	7 140	5 750				
ASIA	3 719	1 834	566	118	1 150	1 885	176	6 125	827	1 728	3 570	3 171				
CENT. PLANNED ECONOMIES	24 269	17 813	4 336	1 176	12 301	6 456	2 011	28 408	3 293	5 435	19 680	12 375				
of which:																
ASIA	8 424	2 786	1 023	-	1 763	5 638	40	9 492	1 025	2 575	5 892	30				
EASTERN EUROPE	4 450	4 182	968	476	2 738	268	496	6 416	468	1 310	4 638	4 035				
U.S.S.R.	11 395	10 845	2 345	700	7 800	550	1 475	12 500	1 800	1 550	9 150	8 310				

* Including T.M.P.

CAPACITY FOR 1982			PAPER PULP										PAPER AND PAPERBOARD			
REGION / CODE	TOTAL		WOOD PULP				DISSOLVING PULP	TOTAL	NEWSPRINT	PRINTING WRITING	OTHER					
	1 + 2	1	MECH. 1.1+1.2	SEMI-CHEM. 1.3	CHEMICAL 1.4	OTHER FIBRE PULP 2					3	4	4.1	4.2	TOTAL 4.3	WRAPPING 4.3.2
WORLD TOTAL:	162 545	150 386	37 065	11 526	101 795	12 159	6 469	211 054	31 193	48 701	131 160	97 968				
of which:																
DEVELOPED MARKET ECONOMIES	124 482	122 746	31 478	9 462	81 806	1 736	4 155	163 971	25 916	38 967	99 088	75 226				
of which:																
NORTHERN AMERICA	73 019	72 321	15 385	4 882	52 054	689	1 943	80 119	14 336	16 420	49 363	39 310				
JAPAN	13 446	13 442	2 742	2 038	8 662	4	479	24 694	2 974	5 146	16 574	12 161				
WESTERN EUROPE	34 660	33 741	11 924	1 969	19 848	919	1 377	55 021	7 580	16 911	30 530	21 434				
- E.E.C.	7 451	6 914	3 311	776	2 827	537	411	29 836	2 292	9 976	17 568	10 955				
- NORDIC COUNTRIES	22 125	22 125	7 621	960	13 544	-	675	17 210	4 495	4 570	8 145	6 655				
- REST OF W.E.	5 084	4 702	992	233	3 477	382	291	7 975	793	2 365	4 817	3 824				
OCEANIA	2 457	2 452	1 121	411	920	5	-	2 693	695	260	1 738	1 569				
OTHERS	900	790	306	162	322	110	356	1 444	331	230	883	752				
DEVELOPING MARKET ECONOMIES	12 931	9 168	1 156	830	7 182	3 763	247	17 723	1 896	4 141	11 686	9 856				
of which:																
AFRICA	955	723	35	58	630	232	-	875	62	314	499	487				
LATIN AMERICA	7 907	6 411	540	564	5 307	1 496	71	10 304	955	1 942	7 407	5 994				
ASIA	4 069	2 034	581	208	1 245	2 035	176	6 544	879	1 885	3 780	3 375				
CENT. PLANNED ECONOMIES	25 132	18 472	4 431	1 234	12 807	6 660	2 067	29 360	3 361	5 593	20 366	12 886				
of which:																
ASIA	8 724	2 911	1 063	-	1 848	5 848	40	9 748	1 058	2 648	6 042	30				
EASTERN EUROPE	4 583	4 311	968	484	2 859	272	502	6 612	473	1 345	4 794	4 161				
U.S.S.R.	11 825	11 250	2 400	750	8 100	575	1 525	13 000	1 850	1 600	9 550	8 695				

* Including TMP

CAPACITY FOR 1983		PAPER PULP										PAPER AND PAPERBOARD			
REGION / CODE	TOTAL 1 + 2	WOOD PULP			CHEMICAL 1.4	OTHER FIBRE PULP 2	DISSOLVING PULP 3	TOTAL 4	NEWSPRINT 4.1	PRINTING WRITING 4.2	OTHER				
		TOTAL 1	MECH. 1.1+1.2	SEMI-CHEM. 1.3							TOTAL 4.3	WRAPPING 4.3.2			
WORLD TOTAL:	164 537	152 011	37 454	11 592	102 965	12 526	6 569	214 242	31 931	49 574	132 737	99 258			
of which:															
DEVELOPED MARKET ECONOMIES	124 909	123 173	31 698	9 423	82 052	1 736	4 165	165 512	26 405	39 435	99 672	75 722			
of which:															
NORTHERN AMERICA	73 019	72 321	15 385	4 882	52 054	698	1 943	80 223	14 432	16 428	49 363	39 310			
JAPAN	13 614	13 610	2 871	1 999	8 740	4	479	25 447	3 196	5 317	16 934	12 465			
WESTERN EUROPE	34 897	33 978	11 993	1 969	20 016	919	1 387	55 685	7 733	17 198	30 754	21 626			
- E.E.C.	7 462	6 925	3 322	776	2 827	537	411	30 076	2 355	10 038	17 683	11 042			
- NORDIC COUNTRIES	22 343	22 343	7 679	960	13 704	-	685	17 610	4 565	4 795	8 250	6 760			
- REST OF W.A.E.	5 092	4 710	992	233	3 485	382	291	7 999	813	2 365	4 821	3 824			
OCEANIA	2 479	2 474	1 143	411	920	5	-	2 713	713	262	1 738	1 569			
OTHERS	900	790	306	162	322	110	356	1 444	331	230	883	752			
DEVELOPING MARKET ECONOMIES	13 746	9 808	1 240	882	7 686	3 938	257	18 473	2 058	4 359	12 056	10 192			
of which:															
AFRICA	1 050	818	36	66	716	232	-	926	68	326	532	520			
LATIN AMERICA	8 401	6 861	613	568	5 680	1 540	81	10 723	1 070	2 041	7 612	6 166			
ASIA	4 295	2 129	591	248	1 290	2 166	176	6 824	920	1 992	3 912	3 506			
CENT. PLANNED ECONOMIES	25 882	19 030	4 516	1 287	13 227	6 852	2 147	30 257	3 468	5 780	21 009	13 344			
of which:															
ASIA	9 000	3 024	1 103	-	1 921	5 976	40	10 003	1 090	2 720	6 193	31			
EASTERN EUROPE	4 637	4 361	968	487	2 906	276	507	6 754	478	1 410	4 866	4 233			
U.S.S.R.	12 245	11 645	2 445	800	8 400	600	1 600	13 500	1 900	1 650	9 950	9 080			

* Including TMP

HARDWOOD PULP CAPACITY
IN SELECTED COUNTRIES, 1978-83

	Chemi-groundwood and Semi-chemical Hardwood Pulp					Bleached and Semi-bleached Sulphate and Soda Hardwood Pulp (Code 1.44.1)						
	1978	1979	1980	1981	1982	1983	1978	1979	1980	1981	1982	1983
	'000 metric tons air dry weight											
Angola	-	-	-	-	-	-	37	-	37	-	37	37
Cameroon	-	-	-	-	-	-	-	-	-	-	60	70
Gabon	-	-	-	-	-	-	-	-	-	-	125	150
Morocco	-	-	-	-	-	-	83	91	95	95	95	95
Nigeria	-	-	-	40	48	56	-	-	-	-	50	60
South Africa	162	162	162	162	162	162	47	63	63	63	63	63
Tanzania	-	-	-	-	-	-	-	-	-	-	7	8
Canada	-	-	-	-	-	-	852	866	873	875	875	875
Mexico	-	-	-	-	-	-	25	25	25	25	25	25
U.S.A.	-	-	-	-	-	-	6 901	7 140	7 301	7 314	7 339	7 339
Argentina	130	195	220	230	230	230	70	70	75	85	100	110
Brazil	139	147	151	151	151	151	1 094	1 542	1 725	1 875	1 914	1 931
Chile	-	-	5	11	13	13	3	3	3	20	20	20
Colombia	34	38	38	38	38	42	-	-	-	-	-	-
Peru	-	-	-	-	-	-	4	4	4	4	4	4
Uruguay	-	-	-	-	-	-	12	12	12	12	12	12
India	25	25	50	80	80	80	145	145	150	170	190	200
Iran	-	-	-	-	90	130	-	-	-	-	-	-
Japan	1 841	1 841	1 868	1 877	1 956	1 919	3 822	3 885	3 898	4 131	4 293	4 293
Philippines	-	-	-	-	-	-	75	75	75	75	75	75
Turkey	28	28	28	28	28	28	-	-	-	-	-	-
Vietnam, Soc Rep	-	-	-	-	-	-	-	-	-	-	15	18
Austria	60	60	60	60	60	60	-	-	-	-	-	-
Belgium	-	-	-	-	-	-	200	200	210	210	210	210
Bulgaria	90	90	90	90	90	90	-	-	-	-	-	-
Czechoslovakia	127	127	127	127	127	127	4	16	9	120	114	114
Denmark	100	100	100	100	100	100	-	-	-	-	-	-
Finland	340	340	350	350	350	350	1 030	1 235	1 240	1 240	1 245	1 250
France	210	220	250	260	270	270	440	450	470	490	500	500
Germany, Fed Rep	69	69	69	69	69	69	-	-	-	-	-	-
Hungary	63	69	77	77	77	77	-	-	-	-	-	-
Norway	80	80	80	80	80	80	-	-	-	-	-	-
Poland	82	88	107	133	141	144	5	6	52	65	73	73
Portugal	5	5	5	5	5	5	430	511	513	513	513	513
Romania	44	44	44	44	44	44	95	95	95	95	95	95
Spain	-	-	-	-	-	-	439	439	439	439	439	439
Sweden	470	455	510	510	510	510	910	955	960	965	990	990
U.K.	114	115	115	115	117	117	-	-	-	-	-	-
Australia	88	94	94	94	94	94	115	118	121	121	121	121
New Zealand	71	71	71	71	71	71	15	15	15	15	15	15
TOTAL OF ABOVE COUNTRIES	4 372	4 463	4 671	4 802	5 001	5 019	16 853	17 998	18 460	19 114	19 624	19 720

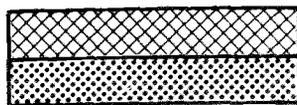
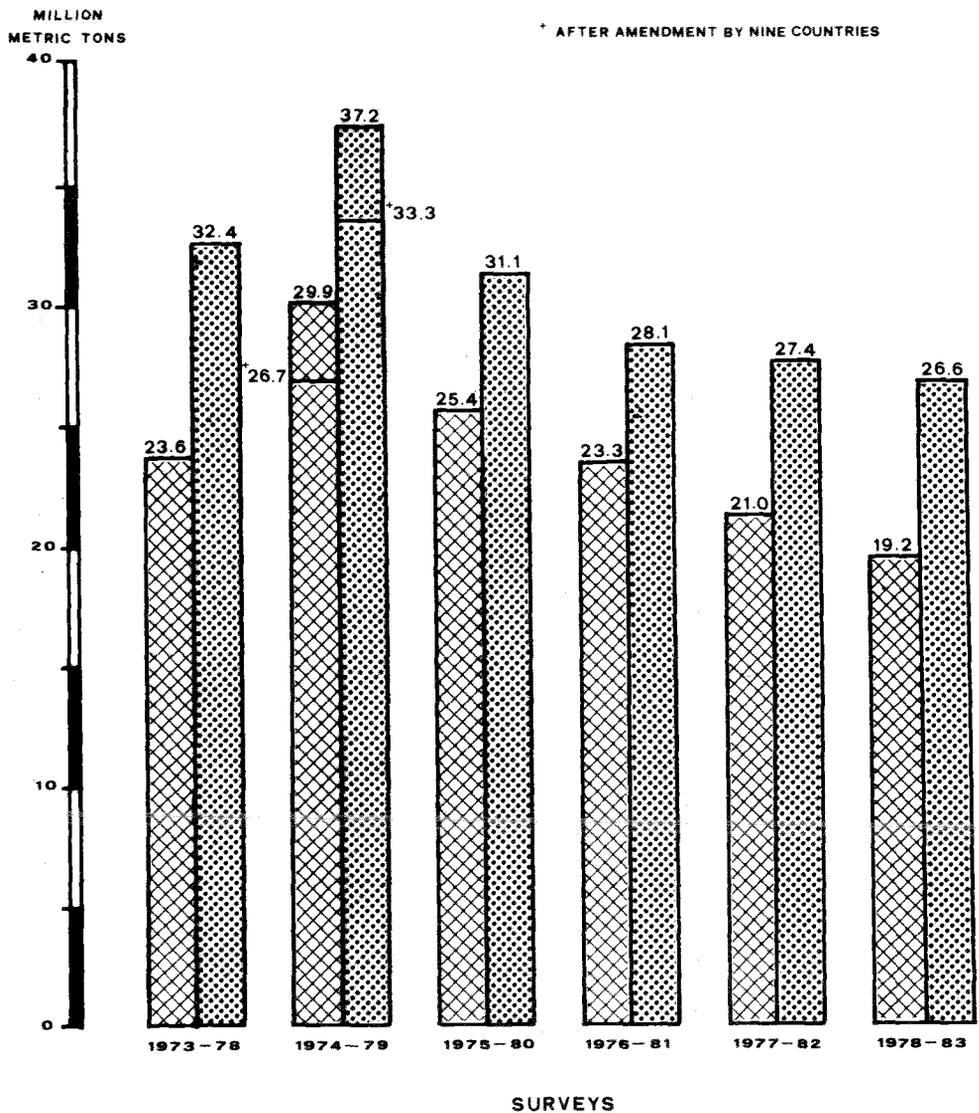
MARKET PULP CAPACITY, PAPER GRADES

	Total Pulp, Paper Grades (Code 1 + 2)				Chemical Woodpulp (Code 1.4)			
	1978	1979	1980	1981	1978	1979	1980	1981
	..... '000 metric tons air dry weight							
<u>Developed Market Economies</u>	23 274	23 758	24 394	24 598	20 913	21 510	22 096	22 274
Canada	6 958	7 217	7 481	7 514	6 705	6 951	7 212	7 241
U.S.A.	3 708	4 084	4 283	4 346	3 596	3 977	4 172	4 234
	10 666	11 301	11 764	11 860	10 301	10 928	11 384	11 475
<u>NORTHERN AMERICA</u>								
Japan	1 169	1 169	1 169	1 169	1 070	1 070	1 070	1 070
Austria	254	324	339	339	245	315	330	330
Belgium	206	206	216	216	206	206	216	216
Denmark	175	175	175	175	-	-	-	-
Finland	2 220	2 220	2 230	2 230	2 170	2 170	2 160	2 180
France	570	585	600	670	565	580	595	665
Germany, Fed Rep	200	186	184	185	191	177	175	176
Ireland	17	17	17	17	-	-	-	-
Norway	656	648	698	749	124	136	186	237
Portugal	606	692	694	694	606	692	694	694
Spain	561	561	561	561	467	467	467	467
Sweden	5 190	4 840	4 905	4 870	4 430	4 190	4 245	4 195
Switzerland	120	120	120	120	110	110	110	110
United Kingdom	19	25	25	25	19	25	25	25
	10 794	10 599	10 744	10 851	9 133	9 068	9 203	9 295
<u>WESTERN EUROPE</u>								
Australia	6	6	6	6	-	-	-	-
New Zealand	595	604	637	643	380	380	380	380
<u>OCEANIA</u>								
South Africa	44	79	74	69	29	64	59	54

MARKET PULP CAPACITY, PAPER GRADES

	Total Pulp, Paper Grades (Code 1 + 2)					Chemical Woodpulp (Code 1.4)				
	1976	1979	1980	1981	1981	1978	1979	1980	1981	1981
<u>Developing Market Economies</u>	2 129	2 743	3 213	3 298	1 747	2 272	2 708	2 774		
Algeria	44	44	44	44	-	-	-	-	-	-
Angola	32	32	32	32	-	-	-	-	-	-
Cameroon	-	-	-	60	-	-	-	-	-	60
Egypt	20	20	20	20	-	-	-	-	-	-
Morocco	83	91	95	95	83	91	95	95	95	95
Swaziland	155	160	160	160	155	160	160	160	160	160
Tunisia	7	7	7	7	-	-	-	-	-	-
	341	354	358	418	238	251	255	315		
AFRICA										
Argentina	25	25	35	40	10	10	15	15		15
Brazil	924	1 438	1 664	1 821	844	1 285	1 491	1 637		1 637
Chile	446	430	459	299	442	426	455	295		295
Mexico	291	352	432	455	207	247	321	341		341
Paraguay	4	8	8	8	-	-	-	-		-
	1 690	2 253	2 598	2 623	1 503	1 968	2 282	2 288		2 288
LATIN AMERICA										
Bangladesh	21	24	27	27	-	-	-	-		-
India	25	25	25	25	-	-	-	-		-
Korea, Rep of	31	66	118	118	6	53	105	105		105
Philippines	21	21	87	87	-	-	66	66		66
	98	136	257	257	6	53	171	171		171
ASIA										
<u>Centrally Planned Economies</u>	1 974	2 062	2 166	2 285	1 896	1 984	2 088	2 207		2 207
Bulgaria	118	123	123	123	45	50	50	50		50
Czechoslovakia	217	200	204	223	214	197	201	220		220
Hungary	2	2	2	2	-	-	-	-		-
Romania	37	37	37	37	37	37	37	37		37
	374	362	366	385	296	284	288	307		307
EASTERN EUROPE										
U.S.S.R.	1 600	1 700	1 800	1 900	1 600	1 700	1 800	1 900		1 900
TOTAL OF COUNTRIES LISTED	27 377	28 563	29 773	30 181	24 556	25 766	26 892	27 255		27 255

OVERALL INCREASE IN TOTAL PULP FOR PAPERMAKING AND TOTAL
PAPER AND PAPERBOARD FROM THE FIRST TO THE LAST YEAR OF THE SURVEY

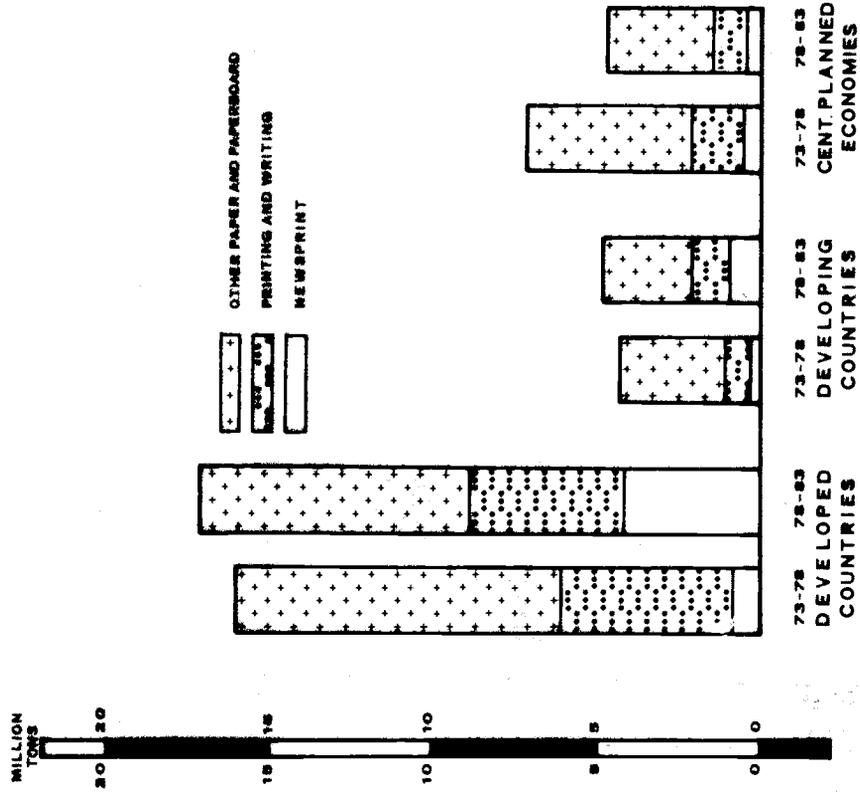


TOTAL PULP FOR PAPERMAKING

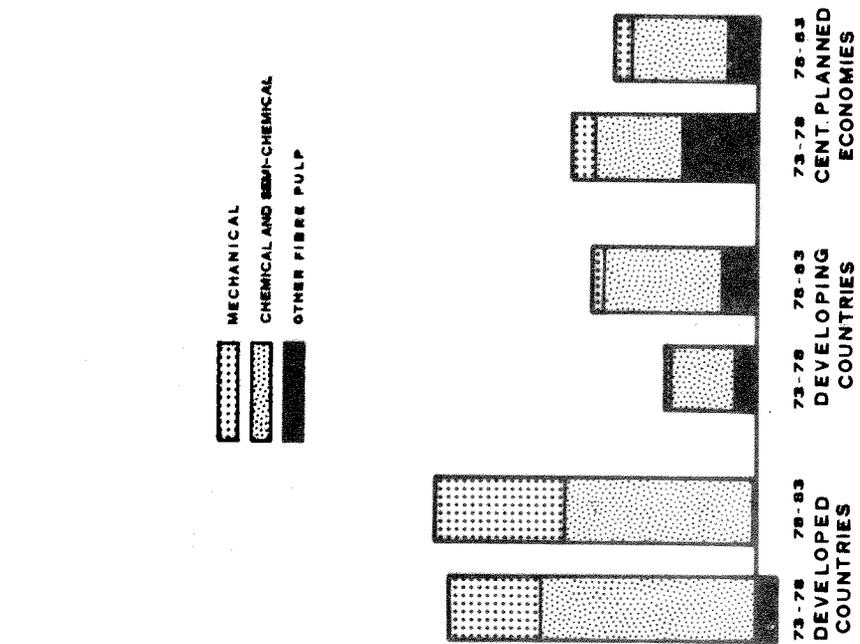
TOTAL PAPER AND PAPERBOARD

ADDITIONS TO CAPACITY
 ACTUAL INCREASES 1973-78 COMPARED TO ESTIMATED INCREASES 1978-83

PAPER AND PAPERBOARD

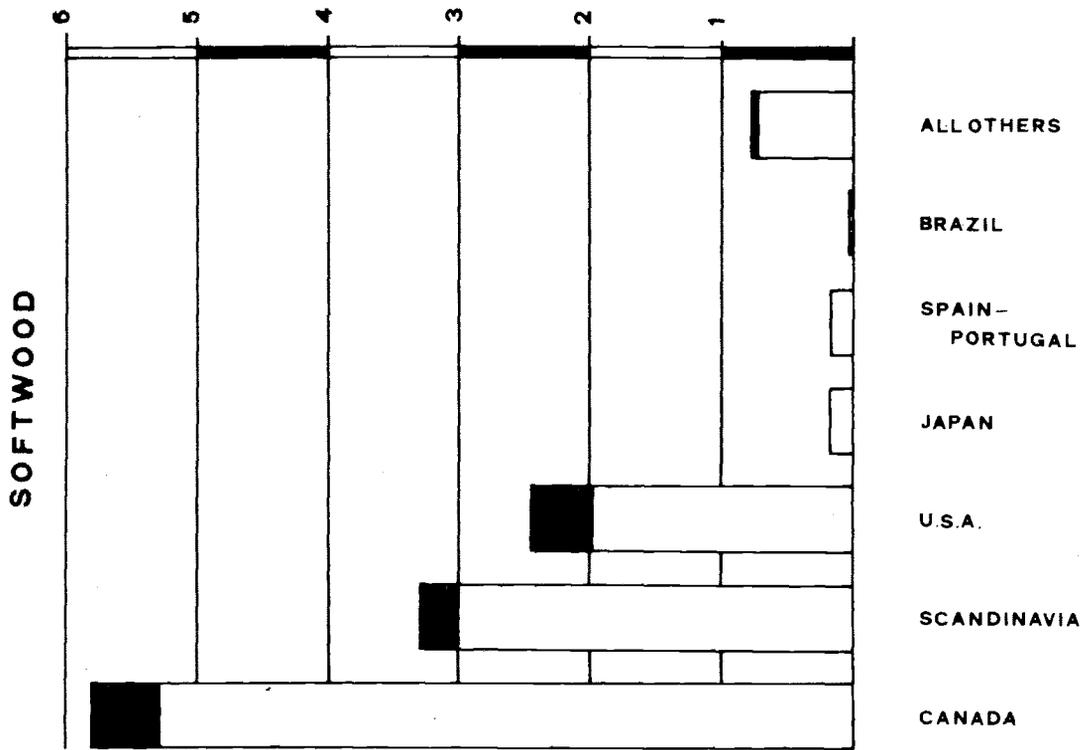


PULP FOR PAPERMAKING



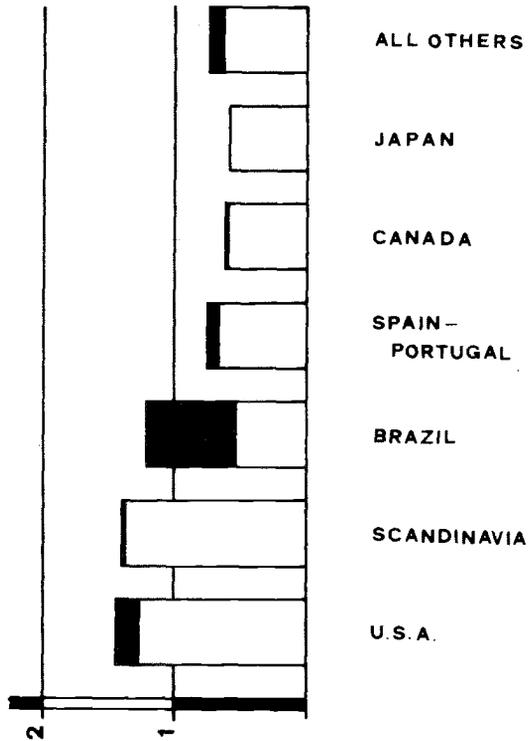
**BLEACHED SULPHATE MARKET PULP
CAPACITY IN 1978 AND 1981**

- MILLION METRIC TONS -



HARDWOOD

■ ADDITION 1978-81



DEFINITIONS

DEFINITION OF CAPACITY

Practical Maximum Capacity, as defined for the survey, is the tonnage of paper, paperboard or pulp of normal commercial quality that could be produced per year with full use of equipment and adequate supplies of raw materials and labour, and assuming full demand. No allowance is made for losses due to unscheduled shut downs, strikes, temporary lack of power, etc., which cause decreases in actual production, but not in production capacity.

Capacity of paper machines which produce more than one grade is apportioned in accordance with actual production patterns or plans for future operation.

Capacity is reported in metric tons of net finished paper and paperboard, and air-dry (10% moisture content) pulp.

Changes in Capacity

- i) Increases in capacity for years 1, 2 and 3 of the survey should include committed plans for new machines, i.e. those underway, where ground has been broken, machinery ordered, financing obtained etc., as well as increases to existing machines. For years 4 and 5, include pulp and paper expansions which are under active consideration or seem likely to come on stream.
- ii) Changes in capacity should be included only for the portion of the year in which they are actually effective.
 - a) Additions to capacity.

For new mills and machines, data should reflect the fact that full capacity is only reached after a certain period of operation. For the first 12 months of operation, assume 70% of capacity, the next 12 months 90% and thereafter 100%.

- b) Reductions in capacity.

Capacity of machinery which has been closed down mainly for economic reasons, with no intention of resuming production, should be excluded.

DEFINITIONS OF PULP

MARKET PULP is pulp for sale in the open market and does not include pulp used in own plant or shipped to wholly owned or associated companies within the country. All pulp moving outside the producing country is considered to be MARKET PULP.

1. Wood Pulp for making Paper and Paperboard

<u>Survey Code</u>	<u>Grade</u>	<u>Definition</u>
1.1	Mechanical	Woodpulp, including reject pulp, obtained by grinding or milling into their fibres, coniferous or non-coniferous rounds, quarters, billets, etc. or through refining coniferous or non-coniferous chips. Called stone groundwood pulp and refiner groundwood pulp. It can be bleached or unbleached. <u>Exclude</u> thermo mechanical pulp defibrated, exploded and groundwood pulp for fibre (building) board
1.11	of which: non-coniferous	Mechanical pulp obtained from non-coniferous rounds, quarters, billets, chips, etc.
1.2	Thermo mechanical	Pulp produced by a mechanical process in which wood particles are softened by pre-heating under pressure prior to a pressurized refining stage.
1.21	of which: non-coniferous	Thermo mechanical pulp obtained from non-coniferous wood.
1.3	Chemi-mechanical and semi-chemical	Woodpulp, including reject pulp, obtained by subjecting coniferous or non-coniferous wood to a series of mechanical and chemical treatments, none of which alone is sufficient to make the fibres separate readily. According to the order and importance of the treatment, such pulp is variously named: semi-chemical, chemi-groundwood, chemi-mechanical, etc. These combined processes enable more of the lignin and hemi-cellulose constituents of the wood to be retained in the pulp and thus the proportion of pulp produced to the weight of wood used is often very high. It can be bleached or unbleached.
1.31	of which: non-coniferous	Chemi-mechanical and semi-chemical pulp obtained from non-coniferous wood.

<u>Survey Code</u>	<u>Grade</u>	<u>Definition</u>
	Sulphite pulp	Woodpulp, including rejects, obtained by mechanically reducing coniferous or non-coniferous wood to chips which are subsequently cooked in a pressure vessel in the presence of a bisulphite cooking liquor. Bisulphites such as ammonium, calcium, magnesium and sodium, are commonly used. <u>Exclude</u> dissolving grades having very high alpha cellulose content (usually 90% or more). These should be included in codes 3 and 3.1.
1.41	Unbleached sulphite	Sulphite pulp which has not been bleached.
1.41.1	of which: non-coniferous	Unbleached sulphite pulp obtained from non-coniferous wood.
1.42	Bleached and semi-bleached sulphite	Sulphite pulp which has been bleached or partly bleached.
1.42.1	of which: non-coniferous	Bleached and semi-bleached sulphite pulp obtained from non-coniferous wood.
	Sulphate and soda pulp	Woodpulp, including rejects, obtained by mechanically reducing coniferous or non-coniferous wood to chips which are subsequently cooked in a pressure vessel in the presence of sodium hydroxide cooking liquor (soda pulp) or a mixture of sodium hydroxide and sodium sulphide cooking liquor (sulphate pulp). <u>Exclude</u> dissolving grades having very high alpha cellulose content (usually 90% or more). These should be included in codes 3 and 3.1.
1.43	Unbleached sulphate and soda	Sulphate and soda pulp which has not been bleached.
1.43.1	of which: non-coniferous	Unbleached sulphate and soda pulp obtained from non-coniferous wood.
1.44	Bleached and semi-bleached sulphate and soda	Sulphate and soda pulp which has been bleached or partly bleached.
1.44.1	of which: non-coniferous	Bleached sulphate and soda pulp obtained from non-coniferous wood.

2. Other Fibre Pulp for making Paper and Paperboard

<u>Survey Code</u>	<u>Grade</u>	<u>Definition</u>
2.1	Straw	Pulp obtained from straw by any method. It may be bleached.
2.2	Bagasse	Pulp obtained from residue from processing sugar cane by any method. It may be bleached.
2.3	Bamboo	Pulp obtained from bamboo by any method. It may be bleached.
2.4	Other (reeds, esparto, rags, etc.)	Includes pulp obtained by any method from such materials as esparto and other reeds or grass, cotton linters, flax, hemp, rags, other textile wastes. It may be bleached. <u>Exclude</u> dissolving grades. These should be included in code 3. pulp made from waste paper

3. Dissolving Pulp (Wood and other fibrous raw materials)

3.	Dissolving pulp (wood and other fibrous raw materials)	Highly bleached chemical pulp (sulphate, soda or sulphite) from coniferous or non-coniferous wood, rags, cotton linters, etc., of special quality, with a very high alpha cellulose content (usually 90% and over) readily adaptable for uses other than papermaking. They are used principally as a source of cellulose in the manufacture of products such as man-made fibres, cellulosic plastic materials, lacquers, explosives, etc.
3.1	of which: non-coniferous	Dissolving pulp made from non-coniferous wood.

DEFINITIONS OF PAPER AND PAPERBOARD

The products included under this heading are in rolls, strips or sheets. The rolls and strips exceed 15 cm in width and the sheets have no side less than 36 cm.

Exclude paper and paperboard cut to any shape other than rectangular.

4. Paper and Paperboard

<u>Survey Code</u>	<u>Grade</u>	<u>Definition</u>
4.1	Newsprint	Uncoated paper, unsized (or only slightly sized), containing at least 65 % mechanical or thermo mechanical wood pulp (percent of fibrous content), of the type used mainly for the printing of newspapers, usually weighing not less than 40 g/m ² and generally not more than 57 g/m ² . <u>Include</u> rotonews
4.2	Other printing and writing paper	Paper, except newsprint, suitable for printing, writing or other graphic purposes, made from a variety of pulp blends and with various finishes. It may be uncoated and have been subjected to sizing, calendering, supercalendering, glazing, water-marking or similar simple finishing processes, or it may be coated on one or both sides with coating material such as barium sulphate, clay (beneficiated kaolin), gypsum or zinc oxide, often supplemented with supercalendering, etc. <u>Include</u> such papers as: bank note bible or imitation bible book and magazine box lining and covering bristols calculator papers computer paper duplicating envelope stock folder stock label lithograph manifold offset onionskin photographic base paper poster stationery tablet or block tabulating card stock typewriter

<u>Survey Code</u>	<u>Grade</u>	<u>Definition</u>
4.21	Coated	Printing and writing papers, except newsprint, which have been coated on one or both sides with coating materials such as clay (beneficiated kaolin), barium sulphate, gypsum or zinc oxide, often supplemented with supercalendering, etc.
		<u>Include</u> coated paper produced at the paper mill from base paper manufactured for own use or purchased, together with all paper made and coated in a single operation on the papermaking machine.
	of which:	
4.21.1	Wood containing	Coated printing and writing papers, containing 10 % or more mechanical wood pulp.
4.21.2	Woodfree	Coated printing and writing papers, containing less than 10 % mechanical wood pulp.
4.22	Uncoated	Printing and writing papers, except newsprint, which have been subjected to sizing, calendering, supercalendering, glazing, water marking or similar simple finishing processes, but not to coating.
		<u>Exclude</u> coating base paper for own use or for sale to other paper mills.
	of which:	
4.22.1	Wood containing	Uncoated printing and writing papers, except newsprint, containing 10 % or more mechanical woodpulp.
4.22.2	Woodfree	Uncoated printing and writing papers, except newsprint, containing less than 10 % mechanical woodpulp.
4.31	Household and sanitary paper	Absorbent paper, creped or uncreped, sometimes embossed, made from bleached or unbleached pulps, waste paper or combination of these. This type of paper should be sufficiently strong to avoid disintegration or tearing in use. Other important characteristics are high absorptive capacity, retention of absorbed fluids, softness, freedom from lint and unpleasant odours. It is made in white and a variety of colours and in single, double or more plies.
		<u>Include</u> types of creped and uncreped papers such as: disposable tissues facial tissue napkin sanitary wadding toilet tissue towelling wiper stock

<u>Survey Code</u>	<u>Grade</u>	<u>Definition</u>
4.32	Wrapping and packaging paper and paperboard	Paper and paperboard designed for wrapping and packaging purposes made from pulps, waste paper and any combination of these.
4.32.1	Linerboard	Paperboard made either from sulphate pulp (unbleached or bleached) or principally from waste paper used as facing material on corrugated or solid paper or paperboard boxes and containers.
4.32.11	Kraft liner	Linerboard made wholly or principally of bleached or unbleached sulphate pulp
4.32.11.1	Unbleached	Kraft liner made wholly or principally of unbleached sulphate pulp. <u>Include</u> mottled kraft liner
4.32.11.2	Bleached	Kraft liner made wholly or principally of bleached sulphate pulp. <u>Include</u> white lined Kraft liner
4.32.12	Other linerboard	Linerboard other than Kraft liner
4.32.2	Fluting medium	Paper or paperboard used mainly as a corrugating medium in the production of corrugated board. It may be produced wholly or principally from semi-chemical wood pulp or from other materials.
4.32.21	Semi-chemical	Fluting medium made wholly or principally of semi-chemical woodpulp
4.32.22	Other fluting medium	Fluting medium other than semi-chemical
4.32.3	Kraft wrapping and packaging paper	All other papers made wholly or principally from bleached and unbleached sulphate pulp used in the manufacture of single or multi-wall sacks or for other wrapping and packaging purposes.
4.32.31	Sack kraft	Bleached and unbleached kraft wrapping and packaging paper used in the manufacture of single or multi-wall sacks.
4.32.32	Other kraft wrapping and packaging paper	Bleached and unbleached kraft wrapping and packaging papers, other than sack kraft.

<u>Survey Code</u>	<u>Grade</u>	<u>Definition</u>
4.32.4	Folding boxboard	<p>Paperboard with good stiffness, scoring and folding characteristics. These paperboards are made from pulp, waste paper or any combination of these. They may be plain or coloured throughout the mass, solid, single or multi-ply, coated or uncoated. They include folding, milk carton and food service boxboard.</p> <p><u>Include</u> such folding boxboard as:</p> <ul style="list-style-type: none">white or coloured lined duplex and triplex solid bleached boardchipboard (plain or coloured)folding unbleached kraft board <p><u>Exclude</u> non-folding board for shipping cases, which is included in code 4.32.52</p>
4.32.41	Pulp based	<p>These folding boxboards are made wholly from chemical pulp or from a combination of chemical and mechanical and/or thermo mechanical pulps.</p>
4.32.41.1	Bleached chemical pulp based	<p>These folding boxboards may be either single-ply boards of bleached chemical pulp or multi-ply boards with bleached chemical pulp on both sides.</p>
4.32.41.2	Other pulp based	<p>These folding boxboards are either single-ply, made from an unbleached pulp furnish, or multi-ply, made from a combination of chemical and mechanical and/or thermo mechanical pulps.</p> <p><u>Exclude</u> multi-ply boards with bleached chemical pulp on both sides which are included in code 4.32.41.1</p>
4.32.42	Waste paper based	<p>Folding boxboard manufactured from waste paper or a combination of waste paper and pulp.</p>
4.32.5	Other wrapping and packaging paper and paperboard	<p>Paper and paperboard designed for wrapping and packaging purposes, not included elsewhere.</p>
4.32.51	Other Wrapping paper	<p>Papers such as:</p> <ol style="list-style-type: none">i) vegetable parchment, greaseproof and glassine <p>Papers made from chemical pulps or from mixtures of chemical woodpulp, cotton fibre pulp treated (e.g. highly hydrated or hard beaten) to render the resulting paper resistant to oil, grease and water. The papers are used primarily for packaging of frozen, moist or greasy materials like butter, margarine, meat or fish, as pan liners, release paper, sterilising bags, parchmentising stock and imitations of parchment.</p> <p><u>Exclude</u> papers that have been rendered greaseproof or waterproof by coating, impregnating or similar processes after manufacture of the paper.</p>

<u>Survey Code</u>	<u>Grade</u>	<u>Definition</u>
4.32.51	cont.	ii) wrapping and packaging papers not included under i) or under code 4.32.32
4.32.52	Other packaging Paperboard	Packaging paperboard not included under codes 4.32.11, 4.32.12, 4.32.41 and 4.32.42 <u>Include</u> straw paperboard non-folding board for shipping cases, set-up boxes, etc. board used in the manufacture of cores, tubes, cans and drums. <u>Exclude</u> corrugated board which is considered as converted paperboard straw paper and paperboard used for corrugated boxes (which is included in 4.32.12 and 4.32.22)
4.33	Other paper and paperboard, not elsewhere specified	Paper and paperboard not used for packaging purposes manufactured principally from furnishes other than sulphate pulp and not included elsewhere
4.33.1	Paper	Papers such as: i) special thin paper These papers are made for special purposes, their common characteristics being their relative thinness. The papers included may be made from mechanical or chemical pulps, bleached or unbleached. The principal characteristics of some of these papers are uniformity of surface and caliper, freedom from pinholes, strength, close formation, opacity, low permeability and chemical purity, all related to special uses. <u>Include</u> such special thin papers as: carbonising tissue condenser and capacitor paper electrical paper and tissue cigarette paper lens tissue stencil tissue pattern tissue tea bag paper <u>Exclude</u> thin printing and writing papers such as: bible and imitation bible manifold onionskin airmail stationery stock

<u>Survey Code</u>	<u>Grade</u>	<u>Definition</u>
4.33.1	cont.	<p>ii) kraft paper used for waxing, asphaltting, water-proofing, laminating, impregnating, spinning or twisting, gumming, etc.</p> <p><u>Exclude</u> folding kraft board which is included in code 4.32.41.1</p> <p>iii) all other grades of paper not included under earlier headings</p> <p><u>Include</u> cable paper blotting paper filter paper rope and jute paper wallpaper base stock</p>
4.33.2	Paperboard	<p>Paperboards not included elsewhere, such as:</p> <p>i) construction paper and paperboard</p> <p>Papers, paper felts and paperboards used in the construction of buildings and other structures for insulation, vapour seal, roofing and flooring underlay etc. They are made from fully refined material such as woodpulp, waste paper, other vegetable pulp and mineral fibre. Low thermal conductivity, moisture resistance, fire resistance, permanency, insect and vermin resistance are desirable characteristics of these materials.</p> <p><u>Exclude</u> a) papers, paper felts or boards impregnated, saturated, laminated or further manufactured in any way (i.e. converted).</p> <p>b) fibreboard (fibre building board) in the form of insulating board, medium hardboard and hardboard.</p> <p>ii) all other grades of paperboard not included under earlier headings</p> <p><u>Include</u> beer mat board gasket board index pressboard matrix board panel board (automotive) press textile board shoe board transformer board trunk and suitcase board</p>

DEFINITIONS

DEFINITION DE CAPACITE

Aux fins de l'enquête, la capacité maximum pratique est égale au tonnage de papier, carton ou pâte de qualité commerciale normale que l'on peut produire annuellement en utilisant pleinement le matériel, en disposant de matières premières et de la main-d'oeuvre en quantité suffisante, étant admis qu'il existe une pleine demande. On ne tient pas compte des pertes dues à des fermetures imprévues, au grèves, à un manque temporaire de source d'énergie, etc., qui font baisser la production réelle mais non la capacité de production.

La capacité des machines à papier produisant plusieurs qualités est calculée en fonction des régimes de production réelle ou des prévisions concernant le fonctionnement futur.

La capacité est exprimée en tonnes de papier et carton finis nets et de pâte séchée à l'air (10% d'humidité).

Changements de Capacité

- i) Augmentations de capacité pour les années 1, 2 et 3 de l'enquête doivent inclure projets définitifs pour l'installation de nouvelles machines, c'est-à-dire, des projets qui sont déjà en cours, dont les fondations ont été jetées, pour lesquels l'équipement a été commandé, ou pour lesquels les fonds ont été assurés etc. Inclure aussi les augmentations des machines existantes. Pour les années 4 et 5, à inclure des expansions de pâte et papier qui sont objets de considération active ou dont l'entrée en fonction est probable.
- ii) Les changements de capacité ne doivent figurer que pour la partie de l'année où il se produisent effectivement.

a) Additions

En ce qui concerne les nouvelles usines, les données doivent tenir compte du fait que la pleine capacité n'est atteinte qu'après un certain temps de fonctionnement. Pour les premiers 12 mois de marche, on comptera 70% de la capacité, pour les 12 mois suivants 90% et ensuite 100%.

b) Réductions

Ne pas déclarer la capacité des machines qui ont été arrêtées pour des raisons essentiellement économiques, sans qu'on ait l'intention de reprendre la production.

DEFINITIONS DES PATES

La pâte marchande comprend la pâte destinée à être mise en vente sur le marché et ne comprend pas la pâte utilisée directement dans une usine intégrée ou destinée à des sociétés filiales ou associées à l'intérieur du pays. Toute pâte exportée en dehors du pays est considérée comme marchande.

1. Pâtes de bois pour la fabrication des papiers et cartons

<u>No. Code</u> <u>enquête</u>	<u>Produit</u>	<u>Définition</u>
1.1	Mécaniques	<p>Pâtes (et pâtes de déchets) obtenues par le broyage ou le râpage (défibrage) de bois de conifères ou de non-conifères en rondins, morceaux, billes, etc. ou par le raffinage de copeaux de bois de conifères ou de non-conifères. Elles sont dites "pâtes de bois de râperie" et "Pâte mécanique de copeaux". Elles peuvent être blanchies ou non.</p> <p><u>Cette rubrique ne comprend pas</u></p> <p>la pâte thermo-mécanique les pâtes éclatées et défibrées entrant dans la fabrication des panneaux de fibres</p>
1.11	dont: de bois de non-conifères	Pâtes mécaniques obtenues de bois de non-conifères
1.2	Thermo-mécaniques	Pâtes obtenues par un procédé mécanique dans lequel les particules sont amollies par un pré-chauffage sous pression avant le stade du raffinage sous pression
1.21	dont: de bois de non-conifères	Pâtes thermo-mécaniques obtenues de bois non-conifères
1.3	Chimico-mécaniques et mi-chimiques	Pâtes (et pâtes de déchets) obtenues en soumettant des bois de conifères ou de non-conifères à une série de traitements mécaniques et chimiques dont aucun n'est suffisant seul pour que les fibres se séparent aisément. Suivant l'ordre et l'importance des traitements, les pâtes sont dites mi-chimiques, mécanico-chimiques, chimico-mécaniques, etc. Ces procédés permettent de retenir dans la pâte une plus grande quantité de la lignine et de l'hémicellulose contenues dans le bois, de sorte que le rapport entre le poids de la pâte produite et le poids du bois utilisé est souvent très élevé. Elle peuvent être blanchies ou non.
1.31	dont: de bois de non-conifères	Pâtes chimico-mécaniques et mi-chimiques obtenues de bois de non-conifères.

<u>No. Code</u> <u>Enquête</u>	<u>Produit</u>	<u>Définition</u>
	au Bisulfite	Pâtes (et déchets de pâtes) obtenues en réduisant mécaniquement des bois de conifères ou de non-conifères en copeaux et en les cuisant ensuite sous pression avec une lessive de cuisson au bisulfite. Les bisulfites les plus communément utilisés sont ceux d'ammonium, de calcium, de magnésium et de sodium.
		<u>Cette rubrique ne comprend pas</u> les pâtes à dissoudre qui ont une très forte teneur en alpha-cellulose (en général 90% ou plus). Elles sont classées sous les rubriques 3 et 3.1.
1.41	au Bisulfite écruées	Pâtes au bisulfite qui ne sont pas blanchies.
1.41.1	dont: de bois de non-conifères	Pâtes au bisulfite écruées obtenues de bois de non-conifères.
1.42	au Bisulfite blanchies et mi-blanchies	Pâtes au bisulfite qui sont blanchies ou mi-blanchies.
1.42.1	dont: de bois de non-conifères	Pâtes au bisulfite blanchies ou mi-blanchies obtenues de bois de non-conifères.
	au Sulfate et à la soude	Pâtes (et déchets de pâtes) obtenues en réduisant mécaniquement des bois de conifères ou de non-conifères en copeaux et en les cuisant ensuite sous pression avec une lessive de cuisson à base de soude caustique (pour les pâtes à la soude) ou d'un mélange de soude caustique et de sulfate de sodium (pour les pâtes au sulfate).
		<u>Cette rubrique ne comprend pas</u> les pâtes à dissoudre qui ont une très forte teneur en alpha-cellulose (en général 90% ou plus). Elles sont classées sous les rubriques 3 et 3.1.
1.43	au Sulfate et à la soude écruées	Pâtes au sulfate et à la soude qui ne sont pas blanchies.
1.43.1	dont: de bois de non-conifères	Pâtes au sulfate et à la soude écruées obtenues de bois de non-conifères.
1.44	au Sulfate et à la soude blanchies ou mi-blanchies	Pâtes au sulfate et à la soude qui sont blanchies ou mi-blanchies.
1.44.1	dont: de bois de non-conifères	Pâtes au sulfate et à la soude blanchies ou mi-blanchies obtenues de bois de non-conifères.

2. Pâtes de matériaux végétaux fibreux autres que le bois pour la fabrication des papiers et cartons

<u>No. Code</u> <u>Enquête</u>	<u>Produit</u>	<u>Définition</u>
2.1	de Paille	Pâtes obtenues à partir de paille par n'importe quel procédé. Ces pâtes peuvent être blanchies.
2.2	de Bagasse	Pâtes obtenues à partir de résidus du traitement de la canne à sucre, par n'importe quel procédé. Ces pâtes peuvent être blanchies.
2.3	de Bambou	Pâtes obtenues à partir de bambou par n'importe quel procédé. Ces pâtes peuvent être blanchies.
2.4	Autres (roseaux, alfa, chiffons, etc.)	Pâtes obtenues par n'importe quel procédé à partir des matériaux tels que l'alfa, les roseaux et diverses autres matériaux herbacées, des linters de coton, le lin, le chanvre, les chiffons et autres déchets textiles. Ces pâtes peuvent être blanchies.

Cette rubrique ne comprend pas

les pâtes à dissoudre. Elles sont classées sous la rubrique 3.

Les pâtes obtenues de vieux papiers

3. Pâtes à dissoudre (de bois et d'autres matériaux végétaux)

3.	à Dissoudre (de bois et d'autres matériaux végétaux)	<p>Pâtes chimiques hautement blanchies (au sulfate, à la soude ou au bisulfite) de bois de conifères ou de non-conifères, de chiffons, de linters de coton, etc., de qualité spéciale, ayant une très forte teneur en alpha-cellulose (en général 90% ou plus) et se prêtant à des utilisations autres que la fabrication du papier.</p> <p>Elles sont principalement utilisées comme matière première cellulosique dans la fabrication de produits tels que les fibres artificielles, les matières plastiques cellulosiques, les laques, les explosifs, etc.</p>
3.1	dont: de bois de non-conifères	Pâtes à dissoudre obtenues de bois de non-conifères.

DEFINITIONS DES PAPIERS ET CARTONS

Dans ce groupe entrent les matériaux en feuilles, bandes ou rouleaux; les bandes ou rouleaux ont une largeur de plus de 15 cm et les feuilles ont plus de 36 cm de côté.

Ne pas déclarer les papiers et cartons de forme autre que rectangulaire.

<u>No. Code</u> <u>Enquête</u>	<u>Produit</u>	<u>Définition</u>
4.1	Papier journal	<p>Papier non couché, non collé ou très légèrement, contenant au moins 65 % de pâte de bois mécanique ou thermo-mécanique (pourcentage en matière fibreuse), utilisé principalement pour l'impression des journaux, dont le grammage n'est généralement ni inférieur à 40 g/m² ni supérieur à 57 g/m².</p> <p><u>Cette rubrique comprend</u></p> <p>papier pour impressions sur rotative</p>
4.2	Autres papiers d'impression et d'écriture	<p>Papiers autres que le papier journal, utilisés pour l'impression, l'écriture ou d'autres usages graphiques, faits avec divers mélanges de pâtes et soumis à divers procédés de finissage. Ces papiers peuvent être non couchés et collés, calandrés, super-calandrés, glacé ou filigranés ou soumis à des procédés similaires simples de finissages, ou peuvent être couchés sur une face ou deux faces au moyen de produits tels que sulfate de baryum, kaolin, gypse ou oxyde de zinc et souvent supercalandrés, etc.</p> <p><u>Cette rubrique comprend</u></p> <p>les papiers tels que:</p> <p>papier pour billets de banque papier bible véritable ou imitation papier pour livres et revues papier pour garnissage et habillage de boîtes bristol papier pour machines à additionner papier pour ordinateurs papier pour reproduction au duplicateur papier pour chemises papier pour enveloppes papier pour étiquettes papier pour lithographie papier pour manifolds papier pour offset papier pelure surglacé papier pour photographie papier pour affiches papier à lettré papier pour bloc-notes papier pour cartes mécanographiques papier machine</p>

<u>No. Code</u> <u>Enquête</u>	<u>Produit</u>	<u>Définition</u>
4.21	dont: Couchés	Papiers d'impression et d'écriture, autres que le papier journal, couchés sur une face ou deux faces au moyen de produits tels que kaolin, sulfate de baryum, gypse ou oxyde de zinc et souvent super-calandrés, etc. <u>Cette rubrique comprend</u> les papiers couchés fabriqués dans l'usine à papier à partir d'un support soit fabriqué dans la même usine, soit acheté, et toutes sortes de papiers couchés sur la machine à papier.
4.21.1	dont: avec bois	Papiers couchés d'impression et d'écriture contenant au moins 10 % de pâte de bois mécanique.
4.21.2	dont: sans bois	Papiers couchés d'impression et d'écriture contenant moins de 10 % de pâte de bois mécanique.
4.22	Non couchés	Papiers d'impression et d'écriture, autres que le papier journal, qui ont pu être collés, calandrés, supercalandrés, glacés ou filigranés ou soumis à des procédés similaires simples de finissage, mais non couchés. <u>Cette rubrique ne comprend pas</u> les supports pour papiers couchés, qu'ils soient utilisés sur place ou vendus en l'état à d'autres usines.
4.22.1	dont: avec bois	Papiers non couchés d'impression et d'écriture, autres que le papier journal, contenant au moins 10 % de pâte de bois mécanique.
4.22.2	dont: sans bois	Papiers non couchés d'impression et d'écriture, autres que le papier journal, contenant moins de 10 % de pâte de bois mécanique.
4.31	Papiers à usage domestique et hygiénique	Papier absorbant, crépé ou non, parfois gaufré, fait avec des pâtes blanchies ou écruées, ou des pâtes de vieux papiers ou avec un mélange de ces types de pâtes. Ce papier doit avoir une force suffisante pour résister à l'usage sans désagrégation ou déchirure. Ses autres caractéristiques importantes sont la capacité d'absorption, la possibilité de retenir des liquides, la douceur au toucher, l'absence de charpie et d'odeur désagréable. Il est fait en blanc et en diverses teintes, en une, deux ou plusieurs couches. <u>Cette rubrique comprend</u> les papiers, crépés ou non, tels que: papier-serviette (essuie-mains etc.) papier pour serviettes hygiéniques papier à démaquiller papier hygiénique ouates de cellulose articles en papier à jeter papier d'essuyage

<u>No. Code</u> <u>Enquête</u>	<u>Produit</u>	<u>Définition</u>
4.32	Papier et cartons d'emballage et d'emballage	Papiers et cartons destinés à l'emballage et l'emballage, fabriqués à partir de pâtes, de vieux papiers ou de n'importe quel combinaison de ces deux types de matières.
4.32.1	Carton de couverture	Carton fabriqué à partir de pâte au sulfate (blanchie ou non) ou essentiellement à partir de vieux papiers, employé pour couvrir des cartons ondulés ou des papiers ou carton compacts utilisés pour faire des boîtes ou récipients.
4.32.11	Couverture kraft pour carton ondulé	Cartons de couverture faits uniquement ou principalement de pâte au sulfate, blanchie ou écrue.
4.32.11.1	Écrue	Couverture kraft pour carton ondulé faite uniquement ou principalement de pâte au sulfate écrue. <u>Cette rubrique comprend</u> les papiers de couverture kraft marbrés
4.32.11.2	Blanchie	Couverture kraft pour carton ondulé faite uniquement ou principalement de pâte au sulfate blanchie. <u>Cette rubrique comprend</u> les papiers de couverture kraft doublés de blanc
4.32.12	Autres cartons de couverture	Cartons de couverture autres que les cartons de couverture kraft
4.32.2	Cannelures	Papiers et cartons utilisés essentiellement pour faire l'âme cannelée des cartons ondulés. Ils peuvent être faits uniquement ou principalement avec de la pâte mi-chimique ou avec d'autres matériaux.
4.32.21	Mi-chimique	Cannelures faites uniquement ou principalement de pâte de bois mi-chimique.
4.32.22	Autres cannelures	Cannelures ne contenant pas de pâte mi-chimique.
4.32.3	Papier kraft d'emballage et d'emballage	Tous les autres papiers faits uniquement ou principalement avec de la pâte au sulfate, blanchie ou écrue, utilisés sous forme de sacs d'emballage à une ou plusieurs épaisseurs ou sous d'autres formes pour l'emballage et l'emballage.
4.32.31	Papier kraft pour grands sacs	Papiers kraft d'emballage et d'emballage blanchis et écrus utilisés dans la fabrication des sacs d'emballage à une ou plusieurs épaisseurs.

<u>No. Code</u> <u>Enquête</u>	<u>Produit</u>	<u>Définition</u>
4.32.32	Autres papiers kraft d'emballage et d'empaquetage	Papiers kraft d'emballage et d'empaquetage blanchis et écorus autres que les papiers pour grands sacs.
4.32.4	Cartons pour boîtes pliantes	Cartons résistants possèdent de bonne caractéristiques de rainage et de pliage. Ils sont faits avec des pâtes de bois, des vieux papiers ou un mélange des deux. Ils peuvent être à l'état naturel ou colorés dans la masse, compacts, doublés une ou deux faces, couchés ou non couchés. Les cartons de ce groupe comprennent les cartons pour boîtes pliantes, les cartons à lait et les cartons pour boîtes destinées aux produits alimentaires. <u>Cette rubrique comprend</u> des cartons pour boîtes pliantes tels que: carton duplex ou triplex blanc ou coloré doublé cartons compacts blanchis cartons gris à l'état naturel ou colorés cartons écorus kraft pliables, pas blanchis <u>Cette rubrique ne comprend pas</u> le carton kraft pour boîtes d'emballage. Il est classé sous la rubrique 4.32.52
4.32.41	A base de pâte	Ces cartons pour boîtes pliantes sont faits entièrement de pâte chimique pure ou d'un mélange de pâte chimique et de pâte mécanique et/ou thermo-mécanique.
4.32.41.1	A base de pâte chimique blanchie	Ces cartons pour boîtes pliantes peuvent être des cartons compacts de pâte chimique blanchie ou des cartons doublés à deux faces avec de la pâte chimique blanchie.
4.32.41.2	A base d'autres pâtes	Ces cartons pour boîtes pliantes sont compacts ou doublés deux faces et sont faits soit d'une fourniture homogène de pâte écorue, soit d'un mélange de pâte chimique et de pâte mécanique et/ou thermo-mécanique. <u>Cette rubrique ne comprend pas</u> les cartons doublés sur les deux faces avec de la pâte chimique blanchie, qui sont compris dans la rubrique 4.32.41.1
4.32.42	A base de vieux papiers	Cartons pour boîtes pliantes, obtenus de vieux papiers ou d'un mélange de vieux papiers et de pâte.

<u>No. Code</u> <u>Enquête</u>	<u>Produit</u>	<u>Définition</u>
4.32.5	Autres papiers et cartons d'emballage et d'emballage	Papiers et cartons destinés à l'emballage et l'emballage, non désignés ailleurs.
4.32.51	Autres papiers d'emballage	<p>Papiers tels que:</p> <p>i) papier sulfurisé, simili-sulfurisé et papier cristal</p> <p>Papiers faits avec des pâtes de bois chimiques pures ou mélangées ou de pâtes de fibres de coton, traitées (c'est-à-dire fortement hydratées ou soumises à un raffinage poussé) pour que le papier obtenu soit résistant à l'huile, à la graisse et à l'eau. Ces papiers sont utilisés principalement pour l'emballage de produits alimentaires congelés, humides ou gras (beurre, margarine, viande, poisson, etc.) comme moules à pâtisserie, anti-adhésifs, sachets de stérilisation, parchemins ou imitations de parchemin.</p> <p><u>Cette rubrique ne comprend pas</u></p> <p>les papiers qui, après fabrication, ont été rendus ingraissables ou imperméables par couchage, imprégnation ou autres procédés similaires.</p> <p>ii) papiers d'emballage et d'emballage ne figurant dans la rubrique i) ci-dessus ni sous la code 4.32.32</p>
4.32.52	Autres cartons d'emballage	<p>Cartons d'emballage ne figurant pas dans les rubriques 4.32.11, 4.32.12, 4.32.41 et 4.32.42</p> <p><u>Cette rubrique comprend</u></p> <p>des cartons tels que:</p> <p>carton paille carton non pliable pour boîte d'emballage, caisse rigides, etc. carton destiné à la fabrication de mandrins, tubes et boîtes cylindriques, etc.</p> <p><u>Cette rubrique ne comprend pas</u></p> <p>le carton ondulé qui est considéré comme un carton travaillé les papiers et carton paille utilisés pour les boîtes en carton ondulé (qui figurent sous 4.32.12 et 4.32.22 ci-dessus)</p>

<u>No. Code</u> <u>Enquête</u>	<u>Produit</u>	<u>Définition</u>
4.33	Autres papiers et cartons, non décrits ailleurs	Papiers et cartons non destinés à l'emballage et faits principalement avec des matières premières autres que la pâte au sulfate et non décrits ailleurs.
4.33.1	Papiers	<p>Papiers tels que:</p> <p>i) papiers minces spéciaux</p> <p>Les papiers de cette catégorie sont destinés à usages particuliers et sont tous relativement fins. Ils sont faits parfois avec des pâtes mécaniques ou chimiques blanchies ou écrues, mais souvent avec des pâtes contenant du lin, du chanvre ou de la fibre de coton. Leurs principales caractéristiques sont l'uniformité de la surface et du calibre, l'absence de perforations, la résistance, la texture serrée, l'opacité, une faible perméabilité, la pureté chimique - toutes ces caractéristiques étant liées à des utilisations spéciales.</p> <p><u>Cette rubrique comprend</u></p> <p>des papiers minces spéciaux tels que:</p> <p>papier pelure pour carbone papier pour condensateurs papiers à cigarettes papiers mousseline pour essuyage de lentilles optiques papier pour stencils papier pour patrons papier pour sachets de thé papiers électriques</p> <p><u>Cette rubrique ne comprend pas</u></p> <p>les papiers minces d'impression et d'écriture tels que:</p> <p>papier bible ou imitation papier pour reproduction au duplicateur papier pour manifolds papier pelure surglacé papier à lettre avion</p> <p>ii) papiers kraft destinés à être paraffinés, asphaltés, imperméabilisés, laminés, imprégnés, filés ou tordus, gommés, etc.</p> <p><u>Cette rubrique ne comprend pas</u></p> <p>les cartons kraft pliables. Ils sont classés sous les rubriques 4.32.4 et 4.32.42</p>

Cods No.
Enquête

Produit

Définition

iii) autres papiers ne figurant pas dans les précédents rubriques

Cette rubrique comprend

des papiers tels que:

papier isolant
papier de chanvre et de jute
papier buvard
papier filtre
les supports de tenture (papier) peints

4.33.2

Cartons

Cartons non décrits ailleurs, tels que:

i) papiers et cartons de construction

Papiers, feutres et cartons utilisés dans la construction comme isolants, joints d'étanchéité au gaz, sous-couches de plafonds ou de planchers, etc. Ils sont faits avec des matières complètement raffinées telles que pâtes de bois, vieux papiers, autres pâtes végétales et fibres minérales. La faible conductivité thermique, la résistance à l'humidité, au feu, à la vermine et aux insectes et la durabilité sont des caractéristiques souhaitables pour ces matières.

Cette rubrique ne comprend pas

- a) les papiers, feutres et cartons imprégnés, imprégnés à cœur, à plusieurs épaisseurs ou traités de toute autre manière (c'est-à-dire travaillés).
- b) les panneaux de fibres durs, mi-durs et isolants.

ii) autres cartons non décrits ailleurs.

Cette rubrique comprend

des cartons tels que:

cartons pour l'industrie et la chaussure
cartons pour joints
cartons pour transformateurs
cartons pour apprêts textiles
cartons pour classeurs
cartons pour carrosserie automobile
cartons pour dessous de bocks
cartons pour valises et malles
cartons pour flans de clicherie.

DEFINICIONES

DEFINICION DE CAPACIDAD

Capacidad máxima práctica, para los efectos de la encuesta, es el número de toneladas de papel, cartón y pasta, de la calidad comercial corriente, que se podrían producir al año, aprovechando el equipo al máximo y contando con suficiente materia prima y mano de obra, suponiendo que la demanda es capaz de absorber toda la producción. No se toman en cuenta las diferencias que se puedan producir a causa de paros imprevistos, huelgas, interrupciones de la energía eléctrica, etc., todo lo cual se traduce efectivamente en una disminución de la producción aunque no de la capacidad.

Cuando las máquinas producen papeles de varios tipos, se indica la capacidad proporcional que corresponde a cada uno, tanto en la producción actual como en los planes futuros.

La capacidad se expresa en toneladas métricas netas de papel o cartón acabado y de pasta seca al aire (10% de humedad).

Cambios de capacidad

- i) Los aumentos de la capacidad para los años 1, 2 y 3 de la encuesta deberían incluir planes ya comprometidos para nuevas máquinas, ej.: aquellos comenzados, aquellos donde la tierra ha sido abierta, la maquinaria ordenada, la financiación obtenida, etc., así como incrementos de la maquinaria existente. Para los años 4 y 5, incluir expansiones para pulpa y papel que estén siendo consideradas o que probablemente sean llevadas a cabo.
- ii) Los cambios de capacidad deben aplicarse solamente a la parte del año en que surtan efecto.

a) Aumentos de capacidad.

Tratándose de fábricas y máquinas nuevas, debe tenerse presente que sólo llegan a producir a plena capacidad después de estar en funcionamiento por un cierto tiempo. En los primeros 12 meses de funcionamiento, supóngase un 70% de capacidad, 90% en los 12 meses siguientes y 100% después.

b) Reducciones de capacidad.

No se debe tomar en cuenta la capacidad de aquella maquinaria que se haya parado, por motivos económicos, sin intenciones de volverla a poner en marcha.

DEFINICIONES DE PASTA

Con el término "pasta para comercialización" se indica la pasta destinada a la venta en el mercado libre, excluyendo la pasta utilizada en la propia fábrica o enviada a compañías asociadas o afiliadas dentro del país. Se considera pasta para comercialización toda pasta enviada fuera del país de producción.

1. Pasta de madera para papel y cartón

<u>Código de la encuesta</u>	<u>Tipo</u>	<u>Definición</u>
1.1	Mecánica	Pasta de madera, incluida la pasta de desecho, obtenida moliendo o desfibrando troncos, cuarterones, rollizos, etc., o refinando astillas de coníferas o no coníferas. Suele denominarse también pasta mecánica de trituradora y pasta mecánica de refinador. Puede ser blanqueada o no. <u>Exclúyanse</u> la pasta termomecánica pasta desfibrada, pasta obtenida según el proceso masonite, y pasta mecánica para cartón de fibra (para construcción).
1.11	de la cual: de especies no coníferas	Pasta mecánica obtenida de troncos, cuarterones, rollizos, astillas, etc., de especies no coníferas.
1.2	Termomecánica	Pasta producida por un proceso mecánico en que se ablandan partículas de madera mediante precalentamiento bajo presión antes de una fase de refinación presionizada.
1.21	de la cual: de especies no coníferas	Pasta termomecánica obtenida de maderas no coníferas.
1.3	Quimiomecánica y semiquímica	Pasta de madera, incluida la pasta de desecho, obtenida sometiendo la madera, de coníferas o no, a una serie de tratamientos mecánicos y químicos, ninguno de los cuales sea suficiente por sí solo para hacer que las fibras se separen con facilidad. Según el orden y la importancia de los tratamientos, esta pasta recibe diversas denominaciones, a saber: semiquímica, quimiomecánica, etc. Con estos procesos combinados es posible conservar en la pasta una mayor cantidad de los componentes de lignina y hemicelulosa de la madera; por consiguiente, la proporción de pasta producida respecto al peso de la madera empleada es frecuentemente muy alta. Puede ser blanqueada o no.
1.31	de la cual: de especies no coníferas	Pasta quimiomecánica y semiquímica obtenida de especies no coníferas.

<u>Código de la encuesta</u>	<u>Tipo</u>	<u>Definición</u>
	Al sulfito	Pasta de madera, incluidos los desechos, obtenida reduciendo mecánicamente a partículas madera de coníferas o frondosas cociéndolas después en autoclave en presencia de licor de cocción al bisulfito. Suelen emplearse bisulfitos tales como los de amonio, calcio, magnesio y sodio. <u>Exclúyanse</u> los tipos solubles con un alto contenido de alfa-celulosa (generalmente 90% o más). Inclúyanse en los códigos 3 y 3.1.
1.41	Al sulfito, sin blanquear	Pasta al sulfito que no se ha blanqueado.
1.41.1	de la cual: de especies no coníferas	Pasta al sulfito sin blanquear hecha de madera de especies no coníferas.
1.42	Al sulfito, semi-blanqueada y blanqueada	Pasta al sulfito que se ha blanqueado en todo o en parte.
1.42.1	de la cual: de especies no coníferas	Pasta al sulfito blanqueada o semiblanqueada hecha de madera de especies no coníferas.
	Al sulfato y a sosa	Pasta de madera, incluidos los desechos, obtenida reduciendo mecánicamente a partículas madera de coníferas o frondosas y cociéndolas después en autoclave en presencia de licor de cocción al hidróxido de sodio (pasta a la sosa) o de un licor de cocción consistente en una mezcla de hidróxido de sodio y sulfuro de sodio (pasta al sulfato). <u>Exclúyanse</u> los tipos solubles con un alto contenido de alfa-celulosa (generalmente 90% o más). Inclúyanse éstos en los códigos 3 y 3.1.
1.43	Al sulfato sin blanquear y a la sosa	Pasta al sulfato y a la sosa que no se ha blanqueado.
1.43.1	de la cual: de especies no coníferas	Pasta al sulfato y a la sosa sin blanquear hecha de madera de especies no coníferas.
1.44	Al sulfato semi-blanqueada y blanqueada y a la sosa	Pasta al sulfato y a la sosa que se ha blanqueado en todo o en parte.
1.44.1	de la cual: de especies no coníferas	Pasta al sulfato y a la sosa blanqueada hecha de madera de especies no coníferas.

2. Otras pastas fibrosas para papel y cartón

<u>Código de la encuesta</u>	<u>Tipo</u>	<u>Definición</u>
2.1	(De) paja	Pasta hecha de paja con cualquier método. Puede ser blanqueada.
2.2	(De) bagazo	Pasta hecha de los residuos del beneficiado de la caña de azúcar con cualquier método. Puede ser blanqueada.
2.3	(De) bambú	Pasta hecha de bambú con cualquier método. Puede ser blanqueada.
2.4	(De) otras materias (carrizos, esparto, trapos, etc.)	Se incluye toda pasta hecha con cualquier método de materias como esparto y otros carrizos y hierbas, borra de algodón, lino, cáñamo, trapos, y otros residuos textiles. Puede ser blanqueada. <u>Exclúyanse</u> los tipos solubles; inclúyase los en el código 3. Pasta hecha de papeles viejos.
3. <u>Pasta soluble (de madera y otras materias fibrosas)</u>		
3.	Soluble (de madera y otras materias fibrosas)	Pastas químicas muy blanqueadas (al sulfato, a la sosa o al sulfito) de madera de coníferas o frondosas, trapos, borra de algodón, etc., de calidad especial con un contenido muy alto de alfa-celulosa (90% o más) fácilmente adaptables a aplicaciones ajenas a la fabricación de papel. Se emplean principalmente como fuente de celulosa en la fabricación de productos tales como fibras artificiales, materiales plásticos celulósicos, lacas, explosivos, etc.
3.1	de la cual: de especies no coníferas	Pasta soluble hecha de madera de especies no coníferas.

DEFINICIONES DE PAPEL Y CARTÓN

Los productos comprendidos en esta sección se presentan en rollos, tiras u hojas; los rollos y tiras tienen una anchura superior a 15 cm y las hojas no tienen menos de 36 cm de lado.

Exclúyase el papel y cartón cortado en otra forma que la rectangular.

4. Papel y cartón

<u>Código de la encuesta</u>	<u>Tipo</u>	<u>Definición</u>
4.1	Papel para periódicos (papel prensa)	<p>Papel sin estuco, sin apresto (o con muy poco apresto) que contiene por lo menos 65 por ciento de pasta mecánica de madera o de pasta de madera termomecánica (porcentaje de fibras) del tipo empleado principalmente para la impresión de diarios, que suele pesar no menos de 40 g/m² y por lo general no más de 57 g/m².</p> <p><u>Inclúyase</u> el papel de rotativa</p>
4.2	Otros papeles de escritura e impresión	<p>Papeles, excepto el papel para periódicos, idóneos para la impresión, la escritura y otros usos gráficos, hechos con diversas mezclas de pastas y diversos acabados. Se puede presentar sin estuco y aprestado, calandrado, supercalandrado, satinado, filigranado, o sometido a procesos sencillos de acabado análogo, o se puede estucar por una o ambas caras con materiales de estuco como sulfato de bario, tiza, yeso y óxido de cinc, frecuentemente completado con supercalandrado, etc.</p> <p><u>Inclúyanse</u> los papeles como:</p> <ul style="list-style-type: none">Papel menudaPapel biblia o imitación bibliapapel para libros y revistasforro de cajas interior y exteriorbristolpapel de calculadorapapel de computadorapapel para copias múltiplespapel de sobrepapel de escrituraetiquetaspapel litográficopapel para copias múltiplesoffsetpapel cebollapapel para fotografíapapel para cartelespapel de escritoriopapel para bloquespapel de tarjetas de tabulaciónpapel para máquina de escribir

<u>Código de la encuesta</u>	<u>Tipo</u>	<u>Definición</u>
	de la cual:	
4.21	estucado	Papeles de impresión y escritura, salvo el papel para periódicos, que hayan sido estucados por uno o ambos lados con materiales para estucar como tiza (caolín beneficiado), sulfato de bario, yeso u óxido de cinc, suplementado a veces con supercalandradura, etc. <u>Inclúyase</u> el papel estucado producido en la fábrica de papel a partir de papel soporte fabricado para uso propio o comprado y todo el papel hecho y estucado en una sola operación en la máquina de papel.
	de la cual:	
4.21.1	con pasta mecánica	Papeles estucados de escritura e impresión que contienen un 10 % o más de pasta mecánica.
4.21.2	sin pasta mecánica	Papeles estucados de escritura e impresión que contienen menos de un 10 % de pasta mecánica.
4.22	sin estucar	Papeles de impresión y escritura, salvo el papel para periódicos, que han sido sometidos a encolado, calandradura, supercalandradura, satinado, afiligranado u otros procesos sencillos de acabado, pero no al estucado. <u>Exclúyase</u> el papel soporte para estucar para uso propio o para la venta a otras papeleras.
	de la cual:	
4.22.1	con pasta mecánica	Papeles sin estucar de escritura e impresión que contienen un 10 % o más de pasta mecánica.
4.22.2	sin pasta mecánica	Papeles sin estucar de escritura e impresión que contienen menos de un 10 % de pasta mecánica.
4.31	Papel de uso doméstico y sanitario	Papel absorbente, crepé o no, a veces gofrado, hecho de pasta, blanqueada o no, papel viejo o una mezcla de estos. Este tipo de papel se presenta suficientemente robusto para evitar disgregación o laceración en el uso. Otras características importantes son alta capacidad absorbente, retención de los líquidos absorbidos, morbidez, ausencia de pelillos y olores desagradables. Se hace blanco o en diversos colores y en una, dos o más capas. <u>Inclúyanse</u> toallas papel facial servilletas gusta sanitaria papel higiénico papeles sanitarios material limpiador

<u>Código de la encuesta</u>	<u>Tipo</u>	<u>Definición</u>
4.32	Papel y cartón de envolver y empaquetar	Papel y cartón para envolver y empaquetar, hecho de pastas, recortes y cualquier combinación de ambos.
4.32.1	Cartón de capa	Cartón hecho de pasta al sulfato, blanqueado o no, o principalmente de recortes utilizados como material facial sobre cartón acanalado o sólido o sobre cajas y recipientes de cartón.
4.32.11	Papel kraft para forros	Cartón de capa o cara hecho en todo o principalmente de pasta al sulfato blanqueado o no.
4.32.11.1	sin blanquear	Papel kraft para forros hecho total o principalmente de pasta al sulfato sin blanquear . <u>Inclúyase</u> el papel kraft veteado para forros.
4.32.11.2	blanqueado	Papel kraft para forros hecho total o principalmente de pasta al sulfato blanqueada. <u>Inclúyase</u> el papel kraft de superficie blanca.
4.32.12	Otros cartones de capa	Cartones de capa que no sean kraft para forros.
4.32.2	Medio para acanalar	Papel o cartón empleado como medio para ondular en la producción de cartón acanalado. Se puede fabricar en todo o principalmente de pasta de madera semiquímica o de otros materiales.
4.32.21	Semiquímico	Medio para acanalar hecho total o principalmente de pasta semiquímica para madera.
4.32.22	Otros medios para acanalar	Medios para acanalar que no sean semiquímicos.
4.32.3	Papel kraft de envolver y empaquetar	Todos los demás tipos de papel hechos totalmente o principalmente de pasta al sulfato blanqueada y sin blanquear que se utilizan en la fabricación de sacos simples o de varias capas o para otras clases de envolturas y empaquetados.
4.32.31	Papel kraft para sacos	Papel kraft de envolver y empaquetar, blanqueado o no, que se emplea en la fabricación de sacos, simples o de varias capas.
4.32.32	Otros tipos de papel kraft de envolver y empaquetar	Papeles kraft de envolver y empaquetar, blanqueado o no, que no sean el papel kraft para sacos.

Código de la encuesta

Tipo

Definición

4.32.4

Cartones sólidos para cajas plegables

Cartón con buenas características de consistencia, marcadura y plegadura. Estos cartones se hacen de pasta de madera, papel viejo o mezclas de los dos. Se presentan naturales o coloreados, sólidos, con forro simple o múltiple, con o sin estuco. Comprenden cajas de cartón plegables, para leche y para el servicio de alimentos.

Inclúyanse cartones sólidos para cajas plegables como:
duplex y triplex con forro blanco o de color
cartón sólido blanqueado
cartón de astillas (natural o coloreado)
cartón kraft plegable no blanqueado

Exclúyase el cartón no plegable para caja de embarque, comprendido en el código 4.32.52

4.32.41

Cartones a base de pasta

Estos cartones para cajas plegables se hacen completamente de pasta química o de una mezcla de pastas químicas y mecánicas y/o termomecánicas.

4.32.41.1

Cartones a base de pasta química blanqueada

Estos cartones para cajas plegables pueden ser cartones con forro simple de pasta química blanqueada o cartones con forro múltiple y pasta química blanqueada en ambos lados.

4.32.41.2

Otros cartones a base de pasta

Estos cartones para cajas plegables son de forro simple, hecho de pasta no blanqueada, o múltiple, hecho con una mezcla de pasta química y mecánica y/o termomecánica.

Exclúyanse los cartones con forros múltiples y pasta química blanqueada en ambos lados comprendidos en el código 4.32.41.1

4.32.42

Cartones a base de papel viejo

Cartones para cajas plegables manufacturados a base de papel viejo o de una mezcla de papel viejo y pasta.

4.32.5

Otros papeles y cartones de envolver y empaquetar

Papeles y cartones de envolver y empaquetar no incluidos en otros párrafos.

4.32.51

Otros papeles de envolver

Papeles como los siguientes:

- i) Pergamino vegetal, papel impermeable a las grasas y papel glaseado (papel cristal). Papeles hechos de pasta de madera química pura o de mezclas de pasta de madera química, de pasta de fibras de algodón tratadas (o sea, altamente hidratadas o bataneadas enérgicamente) para que el papel obtenido resista al aceite la grasa y el agua. Se emplean principalmente para envasar productos congelados, húmedos o grasosos, como la

<u>Código de la encuesta</u>	<u>Tipo</u>	<u>Definición</u>
4.32.51	Otros papeles de envolver	<p>Papeles como los siguientes:</p> <p>i) Pergamino vegetal, papel impermeable a las grasas y papel glaseado (papel cristal). Papeles hechos de pasta de madera química pura o de mezclas de pasta de madera química, de pasta de fibras de algodón tratadas (o sea, altamente hidratadas o batencadas enérgicamente) para que el papel obtenido resista al aceite, la grasa y el agua. Se emplean principalmente para envasar productos congelados, húmedos o grasosos, como la mantequilla, la margarina, la carne y el pescado, como forros para cazuelas, papel anti-adhesivo, sacos esterilizadores, pergamino o imitaciones de pergamino.</p> <p><u>Exclúyanse</u> los papeles impermeabilizados a las grasas o el agua con procesos de estuco, impregnación o similares después de su fabricación.</p> <p>ii) papel de envolver y empaquetar no especificado en el anterior párrafo i) o en el 4.32.32</p>
4.32.52	Otros cartones de empaquetar	<p>Cartón de envolver y empaquetar no incluido en los párrafos 4.32.11, 4.32.12, 4.32.41 y 4.32.42.</p> <p><u>Inclúyanse</u> cartón de paja cartón no plegable para cajas de embarque, cajas de cartón no desmontable, cartón utilizado en la manufactura de soportes, tubos, bolsas y contenedores.</p> <p><u>Exclúyase</u> el cartón acanalado que se considera cartón de conversión el papel y cartón de paja utilizado para cajas acanaladas (que se incluyen en los párrafos 4.32.12 y 4.32.22)</p>
4.33	Otros papeles y cartones no incluidos en otro lugar	Papel y cartón que no se utiliza para empaquetar, fabricado principalmente de materiales que no sean pasta de sulfato y no incluidos en otro lugar
4.33.1	Papel	<p>Papeles como los siguientes:</p> <p>i) papel especial fino</p> <p>Aquellos papeles hechos para fines especiales cuyas características comunes están en relación con su delgadez. Pueden ser de pastas mecánicas o químicas, blanqueadas o no. Las</p>

Código de la encuesta

Tipo

Definición

4.32.4

Cartones sólidos para cajas plegables

Cartón con buenas características de consistencia, marcadura y plegadura. Estos cartones se hacen de pasta de madera, papel viejo o mezclas de los dos. Se presentan naturales o coloreados, sólidos, con forro simple o múltiple, con o sin estuco. Comprenden cajas de cartón plegables, para leche y para el servicio de alimentos.

Inclúyanse cartones sólidos para cajas plegables como:
duplex y triplex con forro blanco o de color
cartón sólido blanqueado
cartón de astillas (natural o coloreado)
cartón kraft plegable no blanqueado

Exclúyase el cartón no plegable para caja de embarque, comprendido en el código 4.32.52

4.32.41

Cartones a base de pasta

Estos cartones para cajas plegables se hacen completamente de pasta química o de una mezcla de pastas químicas y mecánicas y/o termomecánicas.

4.32.41.1

Cartones a base de pasta química blanqueada

Estos cartones para cajas plegables pueden ser cartones con forro simple de pasta química blanqueada o cartones con forro múltiple y pasta química blanqueada en ambos lados.

4.32.41.2

Otros cartones a base de pasta

Estos cartones para cajas plegables son de forro simple, hecho de pasta no blanqueada, o múltiple, hecho con una mezcla de pasta química y mecánica y/o termomecánica.

Exclúyanse los cartones con forros múltiples y pasta química blanqueada en ambos lados comprendidos en el código 4.32.41.1

4.32.42

Cartones a base de papel viejo

Cartones para cajas plegables manufacturados a base de papel viejo o de una mezcla de papel viejo y pasta.

4.32.5

Otros papeles y cartones de envolver y empaquetar

Papeles y cartones de envolver y empaquetar no incluidos en otros párrafos.

4.32.51

Otros papeles de envolver

Papeles como los siguientes:

- i) Pergamino vegetal, papel impermeable a las grasas y papel glaseado (papel cristal). Papeles hechos de pasta de madera química pura o de mezclas de pasta de madera química, de pasta de fibras de algodón tratadas (o sea, altamente hidratadas o bataneadas enérgicamente) para que el papel obtenido resista al aceite la grasa y el agua. Se emplean principalmente para envasar productos congelados, húmedos o grasosos, como la

<u>Código de la encuesta</u>	<u>Tipo</u>	<u>Definición</u>
4.32.51	Otros papeles de envolver	<p>Papeles como los siguientes:</p> <p>i) Pergamino vegetal, papel impermeable a las grasas y papel glaseado (papel cristal). Papeles hechos de pasta de madera química pura o de mezclas de pasta de madera química, de pasta de fibras de algodón tratadas (o sea, altamente hidratadas o bateneadas energicamente) para que el papel obtenido resista al aceite, la grasa y el agua. Se emplean principalmente para envasar productos congelados, húmedos o grasosos, como la mantequilla, la margarina, la carne y el pescado, como forros para cazuelas, papel anti-adhesivo, sacos esterilizadores, pergamino o imitaciones de pergamino.</p> <p><u>Exclúyanse</u> los papeles impermeabilizados a las grasas o el agua con procesos de estuco, impregnación o similares después de su fabricación.</p> <p>ii) papel de envolver y empaquetar no especificado en el anterior párrafo i) o en el 4.32.32</p>
4.32.52	Otros cartones de empaquetar	<p>Cartón de envolver y empaquetar no incluido en los párrafos 4.32.11, 4.32.12, 4.32.41 y 4.32.42.</p> <p><u>Inclúyanse</u> cartón de paja cartón no plegable para cajas de embarque, cajas de cartón no desmontable, cartón utilizado en la manufactura de soportes, tubos, bolsas y contenedores.</p> <p><u>Exclúyase</u> el cartón acanalado que se considera cartón de conversión el papel y cartón de paja utilizado para cajas acanaladas (que se incluyen en los párrafos 4.32.12 y 4.32.22)</p>
4.33	Otros papeles y cartones no incluidos en otro lugar	Papel y cartón que no se utiliza para empaquetar, fabricado principalmente de materiales que no sean pasta de sulfato y no incluidos en otro lugar
4.33.1	Papel	<p>Papeles como los siguientes:</p> <p>i) papel especial fino</p> <p>Aquellos papeles hechos para fines especiales cuyas características comunes están en relación con su delgadez. Pueden ser de pastas mecánicas o químicas, blanqueadas o no. Las</p>

Código de la encuesta

Tipo

Definición

4.33.1

Papel

Papeles como los siguientes:

i) papel especial fino

Aquellos papeles hechos para fines especiales cuyas características comunes están en relación con su delgadez. Pueden ser de pastas mecánicas o químicas, blanquadas o no. Las principales características de algunos de estos papeles son la uniformidad de su superficie y espesor, la ausencia de poro, su resistencia, su densidad, opacidad, escasa permeabilidad y pureza química, todas relacionadas con aplicaciones especiales.

Inclúyanse papeles especiales finos como:

para papel carbón
papel de condensador y capacitor
papel eléctrico
papel de cigarrillos
papel para limpiar lentes
papel para estarcidos
papel para patrones
papel para bolsitas de té

Exclúyanse papeles de escritura e impresión finos como:

papel biblia o imitación biblia
papel de copia para máquina de repro-
reproducir
papel cebolla
papel de carta para correo aéreo

ii) papel kraft empleado para encerar, asfaltar, impermeabilizar, laminar, impregnar, hilar o torcer, engomar, etc.

Exclúyanse los cartones sólidos para cajas plegables que están comprendidos en los códigos 4.32.4 y 4.32.42

iii) todos los demás tipos de papel no especificados anteriormente.

Inclúyanse papel aislante
papel secante
papel filtro
papel de cordeles
base de papel mural

Código de la encuesta

Tipo

Definición

4.33.2

Cartón

Cartones no especificados anteriormente, como:

i) papeles y cartones para la construcción

Papeles, fieltros de papel y cartones empleados en la construcción de edificios y otras estructuras para aislar, evitar emanaciones, colmar debajo de los techos y pisos, etc. Se hacen de material totalmente refinado como, por ejemplo, pasta de madera, papel viejo, pasta de otros vegetales y fibra mineral. Las características convenientes en estos materiales son su poca conductividad térmica, su resistencia a la humedad, su resistencia al fuego, su permanencia y su resistencia a los insectos y alimañas.

Exclúyanse a) los papeles, fieltros y cartones impregnados, saturados, laminados o elaborados ulteriormente de cualquier manera.

b) los tableros de fibra (tableros para construcción) o sea, tableros aislantes, tableros semiduros y tableros duros.

ii) todos los demás tipos de cartón no especificados anteriormente

Inclúyanse cartón de zapato
cartón de guarniciones
cartón de transformador
cartón prensado textil
cartón prensado para índices
cartón panel (automóviles)
cartón para posavasos de cerveza
cartón de baúles y maletas
cartón de matrices, etc.

COUNTRY DATA
CHIFFRES PAR PAYS
DATOS RELATIVOS A LOS PAISES

LIST OF COUNTRIES

AFRICA

- * 1. Algeria
- * 2. Angola
- * 3. Cameroun
- * 4. Egypt
- * 5. Ethiopia
- * 6. Gabon
- * 7. Kenya
- * 8. Libya
- * 9. Madagascar
- * 10. Morocco
- * 11. Mozambique
- * 12. Nigeria
- * 13. Rhodesia
- * 14. South Africa
- * 15. Sudan
- * 16. Swaziland
- * 17. Tanzania
- * 18. Tunisia
- * 19. Uganda
- * 20. Zaire

NORTH AND CENTRAL AMERICA

- ‡ 21. Canada
- * 22. Costa Rica
- * 23. Cuba
- * 24. Dominican Republic
- * 25. El Salvador
- * 26. Guatemala
- * 27. Honduras
- * 28. Jamaica
- * 29. Mexico
- * 30. Panama
- * 31. Puerto Rico
- * 32. United States

SOUTH AMERICA

- * 33. Argentina
- * 34. Bolivia
- * 35. Brazil
- * 36. Chile
- * 37. Colombia
- * 38. Ecuador
- * 39. Paraguay
- * 40. Peru
- * 41. Uruguay
- * 42. Venezuela

ASIA

- * 43. Bangladesh
- * 44. Burma
- 45. China
- * 46. Cyprus
- * 47. Hong Kong
- * 48. India
- * 49. Indonesia
- * 50. Iran
- * 51. Iraq
- ‡ 52. Israel
- ‡ 53. Japan
- * 54. Jordan
- 55. Kampuchea, Democratic
- 56. Korea, Dem. People's Rep.
- * 57. Korea, Republic of
- * 58. Lebanon
- * 59. Malaysia
- 60. Mongolia
- * 61. Nepal
- * 62. Pakistan
- * 63. Philippines
- * 64. Singapore
- * 65. Sri Lanka
- * 66. Syria
- * 67. Thailand
- * 68. Turkey
- 69. Viet-Nam, Socialist Republic

LISTE DE PAYS

AFRIQUE

- Algérie
- Angola
- Cameroun
- Egypte
- Ethiopie
- Gabon
- Kenya
- Libye
- Madagascar
- Maroc
- Mozambique
- Nigéria
- Rhodésie
- Afrique du Sud
- Soudan
- Swaziland
- Tanzanie
- Tunisie
- Ouganda
- Zaire

AMERIQUE DU NORD ET CENTRALE

- Canada
- Costa Rica
- Cuba
- République Dominicaine
- El Salvador
- Guatemala
- Honduras
- Jamaïque
- Mexique
- Panama
- Porto Rico
- Etats-Unis

AMERIQUE DU SUD

- Argentine
- Bolivie
- Bésil
- Chili
- Colombie
- Equateur
- Paraguay
- Pérou
- Uruguay
- Venezuela

ASIE

- Bangladesh
- Birmanie
- Chine
- Chypre
- Hong Kong
- Inde
- Indonésie
- Iran
- Irak
- Israël
- Japon
- Jordanie
- Kampuchea, Démocratique
- Corée, Rép. Pop. Dém.
- Corée, République de
- Liban
- Malaisie
- Mongolie
- Népal
- Pakistan
- Philippines
- Singapour
- Sri Lanka
- Syrie
- Thaïlande
- Turquie
- Viet-Nam, Rép. Soc.

LISTA DE LOS PAISES

AFRICA

- Algeria
- Angola
- Camerun
- Egipto
- Etiopia
- Gabon
- Kenia
- Libia
- Madagascar
- Marruecos
- Mozambique
- Nigeria
- Rhodesia
- Sudáfrica
- Sudán
- Swazilandia
- Tanzania
- Tunéz
- Uganda
- Zaire

AMERICA DEL NORTE Y CENTRAL

- Canadá
- Costa Rica
- Cuba
- Republica Dominicana
- El Salvador
- Guatemala
- Honduras
- Jamaica
- México
- Panamá
- Puerto Rico
- Estados Unidos

AMERICA LATINA

- Argentina
- Bolivia
- Brasil
- Chile
- Colombia
- Ecuador
- Paraguay
- Perú
- Uruguay
- Venezuela

ASIA

- Bangladesh
- Birmania
- China
- Chipre
- Hong Kong
- India
- Indonesia
- Iran
- Irak
- Israel
- Japon
- Jordania
- Kampuchea, Democratica
- Corea, Rep. Pop. Dem.
- Corea, Republica de
- Líbano
- Malasia
- Mongolia
- Nepal
- Paquistán
- Filipinas
- Singapur
- Sri Lanka
- Siria
- Tailandia
- Turquia
- Viet-Nam, Rep. Soc.

EUROPE

- 70. Albania
- ‡ 71. Austria
- ‡ 72. Belgium/Luxembourg
- 73. Bulgaria
- 74. Czechoslovakia
- ‡ 75. Denmark
- ‡ 76. Finland
- ‡ 77. France
- 78. German Democratic Republic
- ‡ 79. Germany, Federal Republic of
- ‡ 80. Greece
- 81. Hungary
- ‡ 82. Ireland
- ‡ 83. Italy
- ‡ 84. Netherlands
- ‡ 85. Norway
- 86. Poland
- ‡ 87. Portugal
- 88. Romania
- ‡ 89. Spain
- ‡ 90. Sweden
- ‡ 91. Switzerland
- ‡ 92. United Kingdom
- ‡ 93. Yugoslavia

OCEANIA

- ‡ 94. Australia
- ‡ 95. New Zealand
- 96. U. S. S. R.

EUROPE

- Albanie
- Autriche
- Bélgique/Luxembourg
- Bulgarie
- Tchécoslovaquie
- Danemark
- Finlande
- France
- Allemagne, République Dém.
- Allemagne, République féd. de
- Grèce
- Hongrie
- Irlande
- Italie
- Pays-Bas
- Norvège
- Pologne
- Portugal
- Roumanie
- Espagne
- Suède
- Suisse
- Royaume-Uni
- Yougoslavie

OCEANIA

- Australie
- Nouvelle Zélande
- U. R. S. S.

EUROPA

- Albania
- Austria
- Bélgica-Luxemburgo
- Bulgaria
- Checoslovaquia
- Dinamarca
- Finlandia
- Francia
- Alemania, República Dem.
- Alemania, República Federal
- Grecia
- Hungría
- Irlanda
- Italia
- Países Bajos
- Noruega
- Polonia
- Portugal
- Rumania
- España
- Suecia
- Suiza
- Reino Unido
- Yugoslavia

OCEANIA

- Australia
- Nueva Zelandia
- U. R. S. S.

‡ DEVELOPED MARKET ECONOMIES - PAYS DEVELOPPES A ECONOMIES DE MARCHÉ - ECONOMIAS DE MERCADO DESARROLLADAS

* DEVELOPING MARKET ECONOMIES - PAYS EN DEVELOPPEMENT A ECONOMIES DE MARCHÉ - ECONOMIAS DE MERCADO EN DESARROLLO

■ CENTRALLY PLANNED ECONOMIES - PAYS A ECONOMIES CENTRALEMENT PLANIFIEES - ECONOMIAS DE PLANIFICACION CENTRALIZADA

WESTERN EUROPE:

E. E. C. :

- Belgium/Luxembourg
- Denmark
- France
- Germany Fed. Rep.
- Ireland
- Italy
- Netherlands
- United Kingdom

NORDIC COUNTRIES:

- Finland
- Norway
- Sweden

REST OF WESTERN EUROPE

- Austria
- Greece
- Portugal
- Spain
- Switzerland
- Yugoslavia

EUROPE OCCIDENTALE:

C. E. E. :

- Bélgique/Luxembourg
- Danemark
- France
- Allemagne Rép. féd.
- Irlande
- Italie
- Pays-Bas
- Royaume-Uni

PAYS NORDIQUES:

- Finlande
- Norvège
- Suède

AUTRES PAYS DE L'EUROPE OCCIDENTALE:

- Autriche
- Grèce
- Portugal
- Espagne
- Suisse
- Yougoslavie

EUROPA OCCIDENTAL:

C. E. E. :

- Bélgica-Luxemburgo
- Dinamarca
- Francia
- Alemania Rep. fed.
- Irlanda
- Italia
- Países Bajos
- Reino Unido

PAISES NORDICOS:

- Finlandia
- Noruega
- Suecia

OTROS PAISES DE L'EUROPA OCCIDENTAL:

- Austria
- Grecia
- Portugal
- España
- Suiza
- Yugoslavia

PULP TERMINOLOGY

TERMINOLOGIE DE LA PATE

TERMINOLOGIA DE LA PASTA

1.	Wood pulp for making paper and paperboard	Total des pâtes de bois pour la fabrication des papiers et cartons	Total de pastas de madera para papel y cartón
1.1	Mechanical	Pâtes mécaniques	Mecánica
1.11	of which non-coniferous	dont: de bois de non-conifères	de la cual: no coníferas
1.12	coniferous	conifères	coníferas
1.2	Thermo-mechanical	Pâtes thermo-mécaniques	Termomecánica
1.21	of which non-coniferous	dont: de bois de non-conifères	de la cual: de especies no coníferas
1.22	coniferous	conifères	coníferas
1.3	Semi-chemical	Pâtes mi-chimiques	Quimiomecánica y semiquímica
1.31	of which: non-coniferous	dont: de bois de non-conifères	de la cual: non coníferas
1.32	coniferous	conifères	coníferas
1.4	Chemical, total:	Total pâtes chimiques:	Total de química
1.41	Unbleached sulphite	Pâtes au bisulfite écru	Al sulfito sin blanquear
1.41.1	of which non-coniferous	dont: de bois de non-conifères	de la cual: de especies no coníferas
1.41.2	coniferous	conifères	coníferas
1.42	Bleached and semi-bleached sulphite	Pâtes au bisulfite blanchies ou mi-blanchies	Al sulfito semi-blanqueada y blanqueada
1.42.1	of which non-coniferous	dont: de bois de non-conifères	de la cual: de especies no coníferas
1.42.2	coniferous	conifères	coníferas
1.43	Unbleached sulphate and soda	Pâtes au sulfate et à la soude écru	Al sulfato sin blanquear y a la sosa
1.43.1	of which non-coniferous	dont: non-conifères	de la cual: no coníferas
1.43.2	coniferous	conifères	coníferas
1.44	Bleached and semi-bleached sulphate and soda	Pâtes au sulfate et à la soude blanchies ou mi-blanchies	Al sulfato semi-blanqueada y blanqueada y a la sosa
1.44.1	of which non-coniferous	dont: de bois de non-conifères	de la cual: de especies no coníferas
1.44.2	coniferous	conifères	coníferas
2.	Other fibre pulp for making paper and paperboard, total:	Total des pâtes de matériaux végétaux fibreux autres que le bois pour la fabrication des papiers et cartons:	Total de otras pastas fibrosas para papel y cartón:
2.1	Straw	Pâtes de paille	De paja
2.2	Bagasse	Pâtes de bagasse	De bagazo
2.3	Bamboo	Pâtes de bambou	De bambú
2.4	Other (reeds, esparto, rags, etc.)	Autres (roseaux, alfa, chiffons, etc.)	De otras materias (carrizos, esparto, trapos, etc.)
3.	Dissolving pulp (of wood and other raw materials)	Pâtes à dissoudre (de bois et d'autres matériaux végétaux)	Pasta soluble (de madera y otras materias fibrosas)
3.1	of which non-coniferous	dont: de bois de non-conifères	de la cual: de especies no coníferas
3.2	coniferous	conifères	coníferas

PAPER AND PAPERBOARD TERMINOLOGY

TERMINOLOGIE DU PAPIER ET DU CARTON

TERMINOLOGIA DE PAPEL Y CARTON

4.	Paper and paperboard, total:	Total papiers et cartons:	Total de papeles y cartones:
4.1	Newsprint	Papier journal	Papel para periódicos (papel prensa)
4.2	Other printing and writing paper total:	Total autres papiers d'impression et d'écriture:	Total de otros papeles de escritura y impresión:
4.21	Coated:	Couchés:	Estucados:
4.21.1	Wood containing	Avec bois	Con pasta mecánica
4.21.2	Wood free	Sans bois	Sin pasta mecánica
4.22	Uncoated:	Non couchés:	Sin estucar:
4.22.1	Wood containing	Avec bois	Con pasta mecánica
4.22.2	Wood free	Sans bois	Sin pasta mecánica
4.3	Other paper and paperboard, total:	Total autres papiers et cartons:	Total de otros papeles y cartones:
4.31	Household and sanitary paper	Papiers à usage domestique et hygiénique	Papel de uso doméstico y sanitario
4.32	Wrapping and packaging paper and paperboard, total:	Papiers et cartons d'emballage et d'emballage:	Papel y cartón de envolver y empaquetar:
4.32.1	Linerboard:	Carton de couverture:	Cartón de capa:
4.32.11	Kraft liner	Couverture kraft pour carton ondulé	Papel kraft para forros
4.32.11.1	Unbleached	Ecrue	Sin blanquear
4.32.11.2	Bleached	Blanchie	Blanqueado
4.32.12	Other linerboard	Autres cartons de couverture	Otros cartones de capa
4.32.2	Fluting medium	Cannelures	Medio para acanalar
4.32.21	Semi-chemical	Mi-chimique	Semiquímico
4.32.22	Other fluting medium	Autres cannelures	Otros medios para acanalar
4.32.3	Kraft wrapping and packaging paper	Papiers kraft d'emballage et d'emballage	Papel kraft de envolver y empaquetar:
4.32.31	Sack kraft	Papier kraft pour grands sacs	Papel kraft para sacos
4.32.32	Other kraft wrapping and packaging paper	Autres papiers kraft d'emballage et d'emballage	Otros tipos de papel kraft de envolver y empaquetar
4.32.4	Folding boxboard:	Cartons pour boîtes pliantes:	Cartones sólidos para cajas plegables:
4.32.41	Pulp based	A base de pâte	Cartones a base de pasta
4.32.41.1	Bleached chemical	A base de pâte chimique blanchie	Cartones a base de pasta química blanqueada
4.32.41.2	Other pulp based	A base d'autres pâtes	Otros cartones a base de pasta
4.32.42	Waste paper based	A base de vieux papiers	Cartones a base de papel viejo
4.32.5	Other wrapping and packaging paper and paperboard, n.e.s.	Autres papiers d'emballage et d'emballage n. d. a.	Otros papeles de envolver y empaquetar n. e. a.
4.32.51	Wrapping paper	Autres papiers d'emballage	Otros papeles de envolver
4.32.52	Packaging paperboard	Autres cartons d'emballage	Otros cartones de empaquetar
4.33	Other paper and paperboard, n.e.s., total	Total autres papiers et cartons, non décrits ailleurs:	Total de otros papeles y cartones, no especificado anteriormente:
4.33.1	Paper, n.e.s.	Papiers, n. d. a.	Papeles, n. e. a.
4.33.2	Paperboard, n.e.s.	Cartons, n. d. a.	Cartones, n. e. a.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

1 Country: ALGERIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-

2. Other fibre pulp ^a , total	109	44	112	44	112	44	112	44	112	112
2.1 Straw	24	-	27	-	27	-	27	-	27	27
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	85	44	85	44	85	44	85	44	85	85

3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

1 Country: ALGERIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	155	157	157	157	157	157
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	58	58	58	58	58	58
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	58	58	58	58	58	58
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	58	58	58	58	58	58
4.3 Other paper + paperboard, total	97	99	99	99	99	99
4.31 Household + sanitary	5	5	5	5	5	5
4.32 Wrapping + packaging, total	92	94	94	94	94	94
4.32.1 Linerboard	10	11	11	11	11	11
4.32.11 Kraft liner	10	11	11	11	11	11
4.32.11.1 Unbleached	10	11	11	11	11	11
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	10	11	11	11	11	11
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	10	11	11	11	11	11
4.32.3 Kraft wrapping + packaging	25	25	25	25	25	25
4.32.31 Sack kraft	14	14	14	14	14	14
4.32.32 Other kraft wrapping + packaging	11	11	11	11	11	11
4.32.4 Folding boxboard	24	24	24	24	24	24
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	23	23	23	23	23	23
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

2 Country: ANGOLA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	44	32	44	32	44	32	44	32	44	44
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	44	32	44	32	44	32	44	32	44	44
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	7	-	7	-	7	-	7	-	7	7
1.43.1 of which non-coniferous	7	-	7	-	7	-	7	-	7	7
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	37	32	37	32	37	32	37	32	37	37
1.44.1 of which non-coniferous	37	32	37	32	37	32	37	32	37	37
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

2 Country: ANGOLA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	19	19	19	19	19	19
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing - writing, total	5	5	5	5	5	5
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	5	5	5	5	5	5
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	5	5	5	5	5	5
4.3 Other paper + paperboard, total	14	14	14	14	14	14
4.31 Household + sanitary	1	1	1	1	1	1
4.32 Wrapping + packaging, total	13	13	13	13	13	13
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	2	2	2	2	2	2
4.32.31 Sack kraft	1	1	1	1	1	1
4.32.32 Other kraft wrapping + packaging	1	1	1	1	1	1
4.32.4 Folding boxboard	2	2	2	2	2	2
4.32.41 Pulp based	2	2	2	2	2	2
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	2	2	2	2	2	2
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	9	9	9	9	9	9
4.32.51 Wrapping paper	5	5	5	5	5	5
4.32.52 Packaging paperboard	4	4	4	4	4	4
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

3 Country: CAMEROON

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	-	-	-	-	-	-	60	60	70	85
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	60	60	70	85
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	60	60	70	85
1.44.1 of which non-coniferous	-	-	-	-	-	-	60	60	70	85
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

3 Country: CAMEROON

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	5	5	5	5	5	5
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	5	5	5	5	5	5
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	5	5	5	5	5	5
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	5	5	5	5	5	5
4.32.51 Wrapping paper	3	3	3	3	3	3
4.32.52 Packaging paperboard	2	2	2	2	2	2
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

4 Country: EGYPT

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate+soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-

2. Other fibre pulp ^a , total	64	20	85	20	91	20	94	20	94	94
2.1 Straw	44	-	65	-	71	-	74	-	74	74
2.2 Bagasse	20	20	20	20	20	20	20	20	20	20
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-

3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

4 Country: EGYPT

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	177	183	185	185	185	185
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	74	80	82	82	82	82
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	74	80	82	82	82	82
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	74	80	82	82	82	82
4.3 Other paper + paperboard, total	103	103	103	103	103	103
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	103	103	103	103	103	103
4.32.1 Linerboard	18	18	18	18	18	18
4.32.11 Kraft liner	8	8	8	8	8	8
4.32.11.1 Unbleached	8	8	8	8	8	8
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	10	10	10	10	10	10
4.32.2 Fluting medium	8	8	8	8	8	8
4.32.21 Semi-chemical	8	8	8	8	8	8
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	10	10	10	10	10	10
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	10	10	10	10	10	10
4.32.4 Folding boxboard	17	17	17	17	17	17
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	17	17	17	17	17	17
4.32.5 Other wrapping + packaging n.e.s.	50	50	50	50	50	50
4.32.51 Wrapping paper	15	15	15	15	15	15
4.32.52 Packaging paperboard	35	35	35	35	35	35
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

5 Country: ETHIOPIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp*, total	--	--	--	--	--	--	--	--	--	--
1.1 Mechanical	--	--	--	--	--	--	--	--	--	--
1.11 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.12 coniferous	--	--	--	--	--	--	--	--	--	--
1.2 Thermo-mechanical	--	--	--	--	--	--	--	--	--	--
1.21 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.22 coniferous	--	--	--	--	--	--	--	--	--	--
1.3 Semi-chemical	--	--	--	--	--	--	--	--	--	--
1.31 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.32 coniferous	--	--	--	--	--	--	--	--	--	--
1.4 Chemical, total	--	--	--	--	--	--	--	--	--	--
1.41 Unbleached sulphite	--	--	--	--	--	--	--	--	--	--
1.41.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.41.2 coniferous	--	--	--	--	--	--	--	--	--	--
1.42 Bleached sulphite x	--	--	--	--	--	--	--	--	--	--
1.42.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.42.2 coniferous	--	--	--	--	--	--	--	--	--	--
1.43 Unbl. sulphate+soda	--	--	--	--	--	--	--	--	--	--
1.43.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.43.2 coniferous	--	--	--	--	--	--	--	--	--	--
1.44 Bl. sulphate+soda x	--	--	--	--	--	--	--	--	--	--
1.44.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.44.2 coniferous	--	--	--	--	--	--	--	--	--	--
2. Other fibre pulp*, total	--	--	--	--	--	--	--	--	--	--
2.1 Straw	--	--	--	--	--	--	--	--	--	--
2.2 Bagasse	--	--	--	--	--	--	--	--	--	--
2.3 Bamboo	--	--	--	--	--	--	--	--	--	--
2.4 Other	--	--	--	--	--	--	--	--	--	--
3. Dissolving pulp †	--	--	--	--	--	--	--	--	--	--
3.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
3.2 coniferous	--	--	--	--	--	--	--	--	--	--

* for making paper + paperboard

x including semi-bleached

† of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

5 Country: ETHIOPIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	10	10	10	10	10	10
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	4	4	4	4	4	4
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	4	4	4	4	4	4
4.22.1 Wood containing	2	2	2	2	2	2
4.22.2 Wood free	2	2	2	2	2	2
4.3 Other paper + paperboard, total	6	6	6	6	6	6
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	6	6	6	6	6	6
4.32.1 Linerboard	1	1	1	1	1	1
4.32.11 Kraft liner	1	1	1	1	1	1
4.32.11.1 Unbleached	1	1	1	1	1	1
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	1	1	1	1	1	1
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	1	1	1	1	1	1
4.32.3 Kraft wrapping + packaging	1	1	1	1	1	1
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	1	1	1	1	1	1
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	3	3	3	3	3	3
4.32.51 Wrapping paper	2	2	2	2	2	2
4.32.52 Packaging paperboard	1	1	1	1	1	1
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

6 Country: GABON

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	-	-	-	-	-	-	-	-	125	150
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	125	150
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	125	150
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	125	150
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-85

6 Country: GABON

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	--	--	--	--	--	--
4.1 Newsprint	--	--	--	--	--	--
4.2 Other printing + writing, total	--	--	--	--	--	--
4.21 Coated	--	--	--	--	--	--
4.21.1 Wood containing	--	--	--	--	--	--
4.21.2 Wood free	--	--	--	--	--	--
4.22 Uncoated	--	--	--	--	--	--
4.22.1 Wood containing	--	--	--	--	--	--
4.22.2 Wood free	--	--	--	--	--	--
4.3 Other paper + paperboard, total	--	--	--	--	--	--
4.31 Household + sanitary	--	--	--	--	--	--
4.32 Wrapping + packaging, total	--	--	--	--	--	--
4.32.1 Linerboard	--	--	--	--	--	--
4.32.11 Kraft liner	--	--	--	--	--	--
4.32.11.1 Unbleached	--	--	--	--	--	--
4.32.11.1 Bleached	--	--	--	--	--	--
4.32.12 Other linerboard	--	--	--	--	--	--
4.32.2 Fluting medium	--	--	--	--	--	--
4.32.21 Semi-chemical	--	--	--	--	--	--
4.32.22 Other fluting medium	--	--	--	--	--	--
4.32.3 Kraft wrapping + packaging	--	--	--	--	--	--
4.32.31 Sack kraft	--	--	--	--	--	--
4.32.32 Other kraft wrapping + packaging	--	--	--	--	--	--
4.32.4 Folding boxboard	--	--	--	--	--	--
4.32.41 Pulp based	--	--	--	--	--	--
4.32.41.1 Bleached chemical	--	--	--	--	--	--
4.32.41.2 Other pulp based	--	--	--	--	--	--
4.32.42 Waste paper based	--	--	--	--	--	--
4.32.5 Other wrapping + packaging n.e.s.	--	--	--	--	--	--
4.32.51 Wrapping paper	--	--	--	--	--	--
4.32.52 Packaging paperboard	--	--	--	--	--	--
4.33 Other paper + board, n.e.s. total	--	--	--	--	--	--
4.33.1 Paper, n.e.s.	--	--	--	--	--	--
4.33.2 Paperboard, n.e.s.	--	--	--	--	--	--

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

7 Country: KENYA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	45	--	45	--	45	--	45	--	45	45
1.1 Mechanical	--	--	--	--	--	--	--	--	--	--
1.11 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.12 coniferous	--	--	--	--	--	--	--	--	--	--
1.2 Thermo-mechanical	--	--	--	--	--	--	--	--	--	--
1.21 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.22 coniferous	--	--	--	--	--	--	--	--	--	--
1.3 Semi-chemical	--	--	--	--	--	--	--	--	--	--
1.31 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.32 coniferous	--	--	--	--	--	--	--	--	--	--
1.4 Chemical, total	45	--	45	--	45	--	45	--	45	45
1.41 Unbleached sulphite	--	--	--	--	--	--	--	--	--	--
1.41.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.41.2 coniferous	--	--	--	--	--	--	--	--	--	--
1.42 Bleached sulphite x	--	--	--	--	--	--	--	--	--	--
1.42.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.42.2 coniferous	--	--	--	--	--	--	--	--	--	--
1.43 Unbl. sulphate-soda	23	--	23	--	23	--	23	--	23	23
1.43.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.43.2 coniferous	23	--	23	--	23	--	23	--	23	23
1.44 Bl. sulphate-soda x	22	--	22	--	22	--	22	--	22	22
1.44.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.44.2 coniferous	22	--	22	--	22	--	22	--	22	22
2. Other fibre pulp ^a , total	--	--	--	--	--	--	--	--	--	--
2.1 Straw	--	--	--	--	--	--	--	--	--	--
2.2 Bagasse	--	--	--	--	--	--	--	--	--	--
2.3 Bamboo	--	--	--	--	--	--	--	--	--	--
2.4 Other	--	--	--	--	--	--	--	--	--	--
3. Dissolving pulp ^ø	--	--	--	--	--	--	--	--	--	--
3.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
3.2 coniferous	--	--	--	--	--	--	--	--	--	--

^a for making paper + paperboard

x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

7 Country: KENYA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	51	51	51	51	51	51
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	22	22	22	22	22	22
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	22	22	22	22	22	22
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	22	22	22	22	22	22
4.3 Other paper + paperboard, total	29	29	29	29	29	29
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	29	29	29	29	29	29
4.32.1 Linerboard	11	11	11	11	11	11
4.32.11 Kraft liner	11	11	11	11	11	11
4.32.11.1 Unbleached	11	11	11	11	11	11
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	5	5	5	5	5	5
4.32.21 Semi-chemical	5	5	5	5	5	5
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	7	7	7	7	7	7
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	7	7	7	7	7	7
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	6	6	6	6	6	6
4.32.51 Wrapping paper	3	3	3	3	3	3
4.32.52 Packaging paperboard	3	3	3	3	3	3
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

8 Country: LIBYA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	--	--	--	--	--	--	--	--	--	--
1.1 Mechanical	--	--	--	--	--	--	--	--	--	--
1.11 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.12 coniferous	--	--	--	--	--	--	--	--	--	--
1.2 Thermo-mechanical	--	--	--	--	--	--	--	--	--	--
1.21 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.22 coniferous	--	--	--	--	--	--	--	--	--	--
1.3 Semi-chemical	--	--	--	--	--	--	--	--	--	--
1.31 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.32 coniferous	--	--	--	--	--	--	--	--	--	--
1.4 Chemical, total	--	--	--	--	--	--	--	--	--	--
1.41 Unbleached sulphite	--	--	--	--	--	--	--	--	--	--
1.41.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.41.2 coniferous	--	--	--	--	--	--	--	--	--	--
1.42 Bleached sulphite ^x	--	--	--	--	--	--	--	--	--	--
1.42.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.42.2 coniferous	--	--	--	--	--	--	--	--	--	--
1.43 Unbl. sulphate+soda	--	--	--	--	--	--	--	--	--	--
1.43.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.43.2 coniferous	--	--	--	--	--	--	--	--	--	--
1.44 Bl. sulphate-soda ^x	--	--	--	--	--	--	--	--	--	--
1.44.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.44.2 coniferous	--	--	--	--	--	--	--	--	--	--
2. Other fibre pulp ^a , total	--	--	--	--	--	--	--	--	--	--
2.1 Straw	--	--	--	--	--	--	--	--	--	--
2.2 Bagasse	--	--	--	--	--	--	--	--	--	--
2.3 Bamboo	--	--	--	--	--	--	--	--	--	--
2.4 Other	--	--	--	--	--	--	--	--	--	--
3. Dissolving pulp ^ø	--	--	--	--	--	--	--	--	--	--
3.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
3.2 coniferous	--	--	--	--	--	--	--	--	--	--

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

8 Country: LIBYA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	5	5	5	5	5	5
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	5	5	5	5	5	5
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	5	5	5	5	5	5
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	1	1	1	1	1	1
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	1	1	1	1	1	1
4.32.4 Folding boxboard	2	2	2	2	2	2
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	2	2	2	2	2	2
4.32.5 Other wrapping + packaging n.e.s.	2	2	2	2	2	2
4.32.51 Wrapping paper	2	2	2	2	2	2
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

9 Country: MADAGASCAR

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp [†] , total	5	--	5	--	5	--	5	--	5	5
1.1 Mechanical	3	--	3	--	3	--	3	--	3	3
1.11 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.12 coniferous	3	--	3	--	3	--	3	--	3	3
1.2 Thermo-mechanical	--	--	--	--	--	--	--	--	--	--
1.21 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.22 coniferous	--	--	--	--	--	--	--	--	--	--
1.3 Semi-chemical	2	--	2	--	2	--	2	--	2	2
1.31 of which non-coniferous	2	--	2	--	2	--	2	--	2	2
1.32 coniferous	--	--	--	--	--	--	--	--	--	--
1.4 Chemical, total	--	--	--	--	--	--	--	--	--	--
1.41 Unbleached sulphite	--	--	--	--	--	--	--	--	--	--
1.41.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.41.2 coniferous	--	--	--	--	--	--	--	--	--	--
1.42 Bleached sulphite ^x	--	--	--	--	--	--	--	--	--	--
1.42.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.42.2 coniferous	--	--	--	--	--	--	--	--	--	--
1.43 Unbl. sulphate-soda	--	--	--	--	--	--	--	--	--	--
1.43.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.43.2 coniferous	--	--	--	--	--	--	--	--	--	--
1.44 Bl. sulphate-soda ^x	--	--	--	--	--	--	--	--	--	--
1.44.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.44.2 coniferous	--	--	--	--	--	--	--	--	--	--
2. Other fibre pulp [†] , total	--	--	--	--	--	--	--	--	--	--
2.1 Straw	--	--	--	--	--	--	--	--	--	--
2.2 Bagasse	--	--	--	--	--	--	--	--	--	--
2.3 Bamboo	--	--	--	--	--	--	--	--	--	--
2.4 Other	--	--	--	--	--	--	--	--	--	--
3. Dissolving pulp [‡]	--	--	--	--	--	--	--	--	--	--
3.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
3.2 coniferous	--	--	--	--	--	--	--	--	--	--

[†] for making paper + paperboard

^x including semi-bleached

[‡] of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

9 Country: MADAGASCAR

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	12	12	12	12	12	12
4.1 Newsprint	1	1	1	1	1	1
4.2 Other printing + writing, total	5	5	5	5	5	5
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	5	5	5	5	5	5
4.22.1 Wood containing	5	5	5	5	5	5
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	6	6	6	6	6	6
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	6	6	6	6	6	6
4.32.1 Linerboard	1	1	1	1	1	1
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	1	1	1	1	1	1
4.32.2 Fluting medium	1	1	1	1	1	1
4.32.21 Semi-chemical	1	1	1	1	1	1
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	1	1	1	1	1	1
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	1	1	1	1	1	1
4.32.4 Folding boxboard	1	1	1	1	1	1
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	1	1	1	1	1	1
4.32.5 Other wrapping + packaging n.e.s.	2	2	2	2	2	2
4.32.51 Wrapping paper	1	1	1	1	1	1
4.32.52 Packaging paperboard	1	1	1	1	1	1
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

10 Country: MOROCCO

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	83	83	91	91	95	95	95	95	95	95
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	83	83	91	91	95	95	95	95	95	95
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	83	83	91	91	95	95	95	95	95	95
1.44.1 of which non-coniferous	83	83	91	91	95	95	95	95	95	95
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^δ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^δ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

10 Country: MOROCCO

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	145	152	159	159	159	159
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	26	27	28	28	28	28
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	26	27	28	28	28	28
4.22.1 Wood containing	4	4	4	4	4	4
4.22.2 Wood free	22	23	24	24	24	24
4.3 Other paper + paperboard, total	119	125	131	131	131	131
4.31 Household + sanitary	4	5	6	6	6	6
4.32 Wrapping + packaging, total	115	120	125	125	125	125
4.32.1 Linerboard	23	25	27	27	27	27
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	23	25	27	27	27	27
4.32.2 Fluting medium	10	11	12	12	12	12
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	10	11	12	12	12	12
4.32.3 Kraft wrapping + packaging	15	15	15	15	15	15
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	15	15	15	15	15	15
4.32.4 Folding boxboard	29	29	29	29	29	29
4.32.41 Pulp based	10	10	10	10	10	10
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	10	10	10	10	10	10
4.32.42 Waste paper based	19	19	19	19	19	19
4.32.5 Other wrapping + packaging n.e.s.	38	40	42	42	42	42
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

11 Country: MOZAMBIQUE

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

11 Country: MOZAMBIQUE

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	11	11	11	11	11	11
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	11	11	11	11	11	11
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	11	11	11	11	11	11
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	11	11	11	11	11	11
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

12 Country: NIGERIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp [†] , total	-	-	-	-	-	-	40	-	98	146
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical (a)	-	-	-	-	-	-	40	-	48	56
1.31 of which non-coniferous	-	-	-	-	-	-	40	-	48	56
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	50	90
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	30
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	30
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda x	-	-	-	-	-	-	-	-	50	60
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	50	60
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp [†] , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

[†] for making paper + paperboard

(a) including chemi-mechanical

x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

12 Country: NIGERIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	13	13	13	38	93	138
4.1 Newsprint	-	-	-	25	30	35
4.2 Other printing + writing, total	3	3	3	3	53	63
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	3	3	3	3	53	63
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	3	3	3	3	53	63
4.3 Other paper + paperboard, total	10	10	10	10	10	40
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	10	10	10	10	10	40
4.32.1 Linerboard	2	2	2	2	2	17
4.32.11 Kraft liner	2	2	2	2	2	17
4.32.11.1 Unbleached	2	2	2	2	2	17
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	2	2	2	2	2	2
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	2	2	2	2	2	2
4.32.3 Kraft wrapping + packaging	1	1	1	1	1	16
4.32.31 Sack kraft	1	1	1	1	1	16
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	3	3	3	3	3	3
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	3	3	3	3	3	3
4.32.5 Other wrapping + packaging n.e.s.	2	2	2	2	2	2
4.32.51 Wrapping paper	2	2	2	2	2	2
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

13 Country: RHODESIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	22	-	32	-	35	-	35	-	35	35
1.1 Mechanical	14	-	24	-	27	-	27	-	27	27
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	14	-	24	-	27	-	27	-	27	27
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	8	-	8	-	8	-	8	-	8	8
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	8	-	8	-	8	-	8	-	8	8
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

13 Country: RHODESIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	65	85	93	93	93	93
4.1 Newsprint	12	23	26	26	26	26
4.2 Other printing + writing, total	2	11	16	16	16	16
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	2	11	16	16	16	16
4.22.1 Wood containing	2	11	16	16	16	16
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	51	51	51	51	51	51
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	51	51	51	51	51	51
4.32.1 Linerboard	8	8	8	8	8	8
4.32.11 Kraft liner	8	8	8	8	8	8
4.32.11.1 Unbleached	8	8	8	8	8	8
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	14	14	14	14	14	14
4.32.21 Semi-chemical	14	14	14	14	14	14
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	14	14	14	14	14	14
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	14	14	14	14	14	14
4.32.4 Folding boxboard	6	6	6	6	6	6
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	6	6	6	6	6	6
4.32.5 Other wrapping + packaging n.e.s.	9	9	9	9	9	9
4.32.51 Wrapping paper	3	3	3	3	3	3
4.32.52 Packaging paperboard	6	6	6	6	6	6
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

14 Country: REPUBLIC OF SOUTH AFRICA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp, total	684	29	723	64	752	59	790	54	790	790
1.1 Mechanical	261	-	261	-	268	-	306	-	306	306
1.11 of which non-coniferous	1	-	1	-	1	-	2	-	2	2
1.12 coniferous	260	-	260	-	267	-	304	-	304	304
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	162	-	162	-	162	-	162	-	162	162
1.31 of which non-coniferous	162	-	162	-	162	-	162	-	162	162
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	261	29	300	64	322	59	322	54	322	322
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	141	5	154	5	176	5	176	5	176	176
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	141	5	154	5	176	5	176	5	176	176
1.44 Bl. sulphate-soda x	120	24	146	59	146	54	146	49	146	146
1.44.1 of which non-coniferous	47	14	63	23	63	20	63	17	63	63
1.44.2 coniferous	73	10	83	36	83	34	83	32	83	83

2. Other fibre pulp, total	110	15	110	15	110	15	110	15	110	110
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	110	15	110	15	110	15	110	15	110	110
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-

3. Dissolving pulp ϕ	313	313	317	317	325	325	345	345	356	356
3.1 of which non-coniferous	313	313	317	317	325	325	345	345	356	356
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

ϕ for making paper + paperboard

x including semi-bleached

ϕ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

14 Country: REPUBLIC OF SOUTH AFRICA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	1,100	1,125	1,194	1,299	1,299	1,299
4.1 Newsprint	216	218	221	311	311	311
4.2 Other printing + writing, total	172	172	177	182	182	182
4.21 Coated	32	32	32	32	32	32
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	32	32	32	32	32	32
4.22 Uncoated	140	140	145	150	150	150
4.22.1 Wood containing	95	95	100	105	105	105
4.22.2 Wood free	45	45	45	45	45	45
4.3 Other paper + paperboard, total	712	735	796	806	806	806
4.31 Household + sanitary	81	81	81	81	81	81
4.32 Wrapping + packaging, total	599	626	687	697	697	697
4.32.1 Linerboard	198	219	233	240	240	240
4.32.11 Kraft liner	136	154	165	172	172	172
4.32.11.1 Unbleached	133	151	162	169	169	169
4.32.11.1 Bleached	3	3	3	3	3	3
4.32.12 Other linerboard	62	65	68	68	68	68
4.32.2 Fluting medium	179	184	183	185	185	185
4.32.21 Semi-chemical	147	150	148	149	149	149
4.32.22 Other fluting medium	32	34	35	36	36	36
4.32.3 Kraft wrapping + packaging	96	95	102	103	103	103
4.32.31 Sack kraft	76	77	79	78	78	78
4.32.32 Other kraft wrapping + packaging	20	18	23	25	25	25
4.32.4 Folding boxboard	121	123	164	164	164	164
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	121	123	164	164	164	164
4.32.5 Other wrapping + packaging n.e.s.	5	5	5	5	5	5
4.32.51 Wrapping paper	5	5	5	5	5	5
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	32	28	28	28	28	28
4.33.1 Paper, n.e.s.	22	18	18	18	18	18
4.33.2 Paperboard, n.e.s.	10	10	10	10	10	10

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

15 Country: **SUDAN**

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

15 Country: SUDAN

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	8	8	8	8	8	8
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	8	8	8	8	8	8
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	8	8	8	8	8	8
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	8	8	8	8	8	8
4.32.51 Wrapping paper	6	6	6	6	6	6
4.32.52 Packaging paperboard	2	2	2	2	2	2
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

16 Country: SWAZILAND

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp [†] , total	155	155	160	160	160	160	160	160	175	175
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	155	155	160	160	160	160	160	160	175	175
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	155	155	160	160	160	160	160	160	175	175
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	155	155	160	160	160	160	160	160	175	175
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp [†] , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp [‡]	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

[†] for making paper + paperboard

^x including semi-bleached

[‡] of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

16 Country: SWAZILAND

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	-	-	-	-	-	-
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing - writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	-	-	-	-	-	-
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	-	-	-	-	-	-
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

17 Country: TANZANIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp [†] , total	-	-	-	-	-	-	-	-	31	38
1.1 Mechanical	-	-	-	-	-	-	-	-	5	6
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	5	6
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	26	32
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	13	16
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	7	8
1.43.2 coniferous	-	-	-	-	-	-	-	-	6	8
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	13	16
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	7	8
1.44.2 coniferous	-	-	-	-	-	-	-	-	6	8
2. Other fibre pulp [†] , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

[†] for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

17 Country: TANZANIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	1	2	3	3	33	39
4.1 Newsprint	-	-	-	-	5	6
4.2 Other printing + writing, total	-	-	-	-	10	12
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	10	12
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	10	12
4.3 Other paper + paperboard, total	1	2	3	3	18	21
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	1	2	3	3	18	21
4.32.1 Linerboard	1	1	2	2	2	2
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	1	1	2	2	2	2
4.32.2 Fluting medium	-	1	1	1	1	1
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	1	1	1	1	1
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	15	18
4.32.51 Wrapping paper	-	-	-	-	10	12
4.32.52 Packaging paperboard	-	-	-	-	5	6
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

18 Country: TUNISIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	26	7	26	7	26	7	26	7	26	26
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	26	7	26	7	26	7	26	7	26	26
3. Dissolving pulp ^β	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^β of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

18 Country: TUNISIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	23	25	25	25	25	25
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	23	25	25	25	25	25
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	23	25	25	25	25	25
4.22.1 Wood containing	12	12	12	12	12	12
4.22.2 Wood free	11	13	13	13	13	13
4.3 Other paper + paperboard, total	-	-	-	-	-	-
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	-	-	-	-	-	-
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

19 Country: UGANDA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	--	--	--	--	--	--	--	--	--	--
1.1 Mechanical	--	--	--	--	--	--	--	--	--	--
1.11 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.12 coniferous	--	--	--	--	--	--	--	--	--	--
1.2 Thermo-mechanical	--	--	--	--	--	--	--	--	--	--
1.21 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.22 coniferous	--	--	--	--	--	--	--	--	--	--
1.3 Semi-chemical	--	--	--	--	--	--	--	--	--	--
1.31 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.32 coniferous	--	--	--	--	--	--	--	--	--	--
1.4 Chemical, total	--	--	--	--	--	--	--	--	--	--
1.41 Unbleached sulphite	--	--	--	--	--	--	--	--	--	--
1.41,1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.41,2 coniferous	--	--	--	--	--	--	--	--	--	--
1.42 Bleached sulphite ^x	--	--	--	--	--	--	--	--	--	--
1.42,1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.42,2 coniferous	--	--	--	--	--	--	--	--	--	--
1.43 Unbl. sulphate+soda	--	--	--	--	--	--	--	--	--	--
1.43,1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.43,2 coniferous	--	--	--	--	--	--	--	--	--	--
1.44 Bl. sulphate-soda ^x	--	--	--	--	--	--	--	--	--	--
1.44,1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.44,2 coniferous	--	--	--	--	--	--	--	--	--	--
2. Other fibre pulp ⁺ , total	--	--	--	--	--	--	--	--	--	--
2.1 Straw	--	--	--	--	--	--	--	--	--	--
2.2 Bagasse	--	--	--	--	--	--	--	--	--	--
2.3 Bamboo	--	--	--	--	--	--	--	--	--	--
2.4 Other	--	--	--	--	--	--	--	--	--	--
3. Dissolving pulp ^ø	--	--	--	--	--	--	--	--	--	--
3.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
3.2 coniferous	--	--	--	--	--	--	--	--	--	--

⁺ for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

19 Country: UGANDA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	7	7	7	7	7	7
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	6	6	6	6	6	6
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	6	6	6	6	6	6
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	6	6	6	6	6	6
4.3 Other paper + paperboard, total	1	1	1	1	1	1
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	1	1	1	1	1	1
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	1	1	1	1	1	1
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	1	1	1	1	1	1
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

20 Country: ZAIRE

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp*, total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp*, total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ϕ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

* for making paper + paperboard

x including semi-bleached

ϕ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

20 Country: ZAIRE

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	2	2	2	2	2	2
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	2	2	2	2	2	2
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	2	2	2	2	2	2
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	2	2	2	2	2	2
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	2	2	2	2	2	2
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

21 Country: CANADA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	21,749	6,958	22,340	7,217	22,682	7,481	22,906	7,514	23,115	23,115
1.1 Mechanical	8,488	253	8,489	266	8,377	269	8,310	273	8,310	8,310
1.11 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.12 coniferous	..	..	..	..	..	..	..	..	..	..
1.2 Thermo-mechanical	544	-	717	-	942	-	1,221	-	1,404	1,404
1.21 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.22 coniferous	..	-	..	-	..	-	..	-	..	..
1.3 Semi-chemical	455	-	459	-	462	-	471	-	475	475
1.31 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.32 coniferous	..	-	..	-	..	-	..	-	..	..
1.4 Chemical, total	12,262	6,705	12,675	6,951	12,901	7,212	12,904	7,241	12,926	12,926
1.41 Unbleached sulphite	2,091	187	2,100	173	2,061	172	2,019	178	2,011	2,011
1.41.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.41.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.42 Bleached sulphite ^x	580	354	535	350	537	370	536	376	533	533
1.42.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.42.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.43 Unbl. sulphate-soda	1,825	297	1,808	286	1,794	287	1,776	286	1,777	1,777
1.43.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.43.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.44 Bl. sulphate-soda ^x	7,766	5,867	8,232	6,142	8,509	6,383	8,573	6,401	8,605	8,605
1.44.1 of which non-coniferous	852	591	866	610	873	611	875	607	875	875
1.44.2 coniferous	6,914	5,276	7,366	5,532	7,636	5,772	7,698	5,794	7,730	7,730
2. Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	424	424	426	426	438	438	464	464	482	482
3.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
3.2 coniferous	..	..	..	..	..	..	..	..	..	..

^a for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

21 Country: CANADA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	14,269	14,571	14,786	15,128	15,396	15,500
4.1 Newsprint	8,946	9,072	9,163	9,435	9,665	9,761
4.2 Other printing - writing, total	1,404	1,567	1,639	1,667	1,685	1,693
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	1,404	1,567	1,639	1,667	1,685	1,693
4.22.1 Wood containing	558	623	647	666	682	690
4.22.2 Wood free	846	944	992	1,001	1,003	1,003
4.3 Other paper + paperboard, total	3,919	3,932	3,984	4,026	4,046	4,046
4.31 Household + sanitary	366	364	372	373	373	373
4.32 Wrapping + packaging, total	3,282	3,290	3,331	3,370	3,390	3,390
4.32.1 Linerboard	1,217	1,216	1,232	1,241	1,248	1,248
4.32.11 Kraft liner	970	974	983	984	984	984
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	247	242	249	257	264	264
4.32.2 Fluting medium	574	576	585	598	603	603
4.32.21 Semi-chemical	469	472	478	491	497	497
4.32.22 Other fluting medium	105	104	107	107	106	106
4.32.3 Kraft wrapping + packaging	621	618	620	622	622	622
4.32.31 Sack kraft	284	297	301	302	302	302
4.32.32 Other kraft wrapping + packaging	337	321	319	320	320	320
4.32.4 Folding boxboard	428	428	439	450	456	456
4.32.41 Pulp based	428	428	439	450	456	456
4.32.41.1 Bleached chemical	113	107	109	110	110	110
4.32.41.2 Other pulp based	315	321	330	340	346	346
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	442	452	455	459	461	461
4.32.51 Wrapping paper	19	19	19	19	19	19
4.32.52 Packaging paperboard	423	433	436	440	442	442
4.33 Other paper + board, n.e.s. total	271	278	281	283	283	283
4.33.1 Paper, n.e.s.	22	21	21	21	21	21
4.33.2 Paperboard, n.e.s.	249	257	260	262	262	262

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

22 Country: COSTA RICA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	-	-	2	-	3	-	4	-	5	5
1.1 Mechanical	-	-	2	-	3	-	4	-	5	5
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	2	-	3	-	4	-	5	5
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

22 Country: COSTA RICA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	9	16	19	23	26	26
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	9	16	19	23	26	26
4.31 Household + sanitary	9	13	15	17	19	19
4.32 Wrapping + packaging, total	-	3	4	6	7	7
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	3	4	6	7	7
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	3	4	6	7	7
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

23 Country: CUBA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	61	-	67	-	69	-	69	-	69	69
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	61	-	67	-	69	-	69	-	69	69
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

23 Country: CUBA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	167	173	175	175	175	175
4.1 Newsprint	4	10	12	12	12	12
4.2 Other printing + writing, total	35	35	35	35	35	35
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	35	35	35	35	35	35
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	35	35	35	35	35	35
4.3 Other paper + paperboard, total	128	128	128	128	128	128
4.31 Household + sanitary	6	6	6	6	6	6
4.32 Wrapping + packaging, total	98	98	98	98	98	98
4.32.1 Linerboard	40	40	40	40	40	40
4.32.11 Kraft liner	10	10	10	10	10	10
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	30	30	30	30	30	30
4.32.2 Fluting medium	16	16	16	16	16	16
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	12	12	12	12	12	12
4.32.31 Sack kraft	6	6	6	6	6	6
4.32.32 Other kraft wrapping + packaging	6	6	6	6	6	6
4.32.4 Folding boxboard	24	24	24	24	24	24
4.32.41 Pulp based	13	13	13	13	13	13
4.32.41.1 Bleached chemical	2	2	2	2	2	2
4.32.41.2 Other pulp based	11	11	11	11	11	11
4.32.42 Waste paper based	11	11	11	11	11	11
4.32.5 Other wrapping + packaging n.e.s.	6	6	6	6	6	6
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	6	6	6	6	6	6
4.33 Other paper + board, n.e.s. total	24	24	24	24	24	24
4.33.1 Paper, n.e.s.	20	20	20	20	20	20
4.33.2 Paperboard, n.e.s.	4	4	4	4	4	4

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

24 Country:

DOMINICAN REPUBLIC

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate+soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ϕ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

+ for making paper + paperboard

x including semi-bleached

ϕ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

24 Country: DOMINICAN REPUBLIC

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	51	51	58	60	61	63
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	5	5	5	5	5	5
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	5	5	5	5	5	5
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	5	5	5	5	5	5
4.3 Other paper + paperboard, total	46	46	53	55	56	58
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	42	42	49	51	52	54
4.32.1 Linerboard	20	20	20	20	20	20
4.32.11 Kraft liner	..	..	..	..	..	..
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	..	..	..	..	..	..
4.32.2 Fluting medium	18	18	18	18	18	18
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	4	4	4	4	4	4
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	4	4	4	4	4	4
4.32.4 Folding boxboard	-	-	7	9	10	12
4.32.41 Pulp based	-	-	..	..	..	..
4.32.41.1 Bleached chemical	-	-	..	..	..	..
4.32.41.2 Other pulp based	-	-	..	..	..	..
4.32.42 Waste paper based	-	-	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	4	4	4	4	4	4
4.33.1 Paper, n.e.s.	2	2	2	2	2	2
4.33.2 Paperboard, n.e.s.	2	2	2	2	2	2

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

25 Country: EL SALVADOR

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

25 Country: EL SALVADOR

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	16	16	16	16	16	16
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	16	16	16	16	16	16
4.31 Household + sanitary	6	6	6	6	6	6
4.32 Wrapping + packaging, total	10	10	10	10	10	10
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	2	2	2	2	2	2
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	2	2	2	2	2	2
4.32.5 Other wrapping + packaging n.e.s.	8	8	8	8	8	8
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	8	8	8	8	8	8
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

26 Country: GUATEMALA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^b	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^b of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

26 Country: GUATEMALA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	46	46	46	46	46	46
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	16	16	16	16	16	16
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	16	16	16	16	16	16
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	30	30	30	30	30	30
4.31 Household + sanitary	4	4	4	4	4	4
4.32 Wrapping + packaging, total	18	18	18	18	18	18
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	13	13	13	13	13	13
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	13	13	13	13	13	13
4.32.4 Folding boxboard	5	5	5	5	5	5
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	5	5	5	5	5	5
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	8	8	8	8	8	8
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	8	8	8	8	8	8

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

27 Country: HONDURAS

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp*, total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate+soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp*, total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ϕ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

* for making paper + paperboard

x including semi-bleached

 ϕ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

27 Country: HONDURAS

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	-	-	8	11	14	14
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing - writing, total	-	-	3	4	5	5
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	3	4	5	5
4.22.1 Wood containing	-	-	3	4	5	5
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	-	-	5	7	9	9
4.31 Household + sanitary	-	-	2	3	4	4
4.32 Wrapping + packaging, total	-	-	3	4	5	5
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	3	4	5	5
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	3	4	5	5
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

28 Country: JAMAICA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp [†] , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp [†] , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

[†] for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

28 Country: JAMAICA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	9	10	10	10	10	10
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	9	10	10	10	10	10
4.31 Household + sanitary	9	10	10	10	10	10
4.32 Wrapping + packaging, total	-	-	-	-	-	-
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

29 Country: MEXICO

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp [†] , total	607	207	672	247	753	321	776	341	782	782
1.1 Mechanical	66	-	66	-	66	-	66	-	66	66
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	66	-	66	-	66	-	66	-	66	66
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	541	207	606	247	687	321	710	341	716	716
1.41 Unbleached sulphite	46	-	46	-	46	-	46	-	46	46
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	46	-	46	-	46	-	46	-	46	46
1.42 Bleached sulphite ^x	12	-	12	-	12	-	12	-	12	12
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	12	-	12	-	12	-	12	-	12	12
1.43 Unbl. sulphate-soda	234	74	284	99	319	127	331	136	331	331
1.43.1 of which non-coniferous	-	-	13	13	17	17	18	18	18	18
1.43.2 coniferous	234	74	271	86	302	110	313	118	313	313
1.44 Bl. sulphate-soda ^x	249	133	264	148	310	194	321	205	327	327
1.44.1 of which non-coniferous	25	-	25	-	25	-	25	-	25	25
1.44.2 coniferous	224	133	239	148	285	194	296	205	302	302
2. Other fibre pulp [†] , total	324	84	428	105	485	111	506	114	509	509
2.1 Straw	19	19	19	19	19	19	19	19	19	19
2.2 Bagasse	287	55	391	76	448	82	469	85	472	472
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	18	10	18	10	18	10	18	10	18	18
3. Dissolving pulp [‡]	17	-	17	-	17	-	17	-	17	17
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

[†] for making paper + paperboard

^x including semi-bleached

[‡] of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

29 Country: MEXICO

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	1,911	2,063	2,393	2,502	2,548	2,548
4.1 Newsprint	147	262	367	402	412	412
4.2 Other printing + writing, total	314	330	371	383	392	392
4.21 Coated	65	65	65	65	65	65
4.21.1 Wood containing	29	29	29	29	29	29
4.21.2 Wood free	36	36	36	36	36	36
4.22 Uncoated	249	265	306	318	327	327
4.22.1 Wood containing	35	35	35	35	35	35
4.22.2 Wood free	214	230	271	283	292	292
4.3 Other paper + paperboard, total	1,450	1,471	1,655	1,717	1,744	1,744
4.31 Household + sanitary	150	160	196	208	213	213
4.32 Wrapping + packaging, total	1,193	1,193	1,334	1,384	1,406	1,406
4.32.1 Linerboard	497	497	545	559	567	567
4.32.11 Kraft liner	55	55	55	55	55	55
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	442	442	490	504	512	512
4.32.2 Fluting medium	202	202	248	260	267	267
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	183	183	183	183	183	183
4.32.31 Sack kraft	133	133	133	133	133	133
4.32.32 Other kraft wrapping + packaging	50	50	50	50	50	50
4.32.4 Folding boxboard	198	198	240	262	268	268
4.32.41 Pulp based	85	85	85	85	85	85
4.32.41.1 Bleached chemical	35	35	35	35	35	35
4.32.41.2 Other pulp based	50	50	50	50	50	50
4.32.42 Waste paper based	113	113	155	177	183	183
4.32.5 Other wrapping + packaging n.e.s.	113	113	118	120	121	121
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	107	118	125	125	125	125
4.33.1 Paper, n.e.s.	..	..	..	..	..	..
4.33.2 Paperboard, n.e.s.	..	..	..	..	..	..

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

30

Country: PANAMA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

30 Country: PANAMA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	34	41	42	43	43	43
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	5	5	5	5	5	5
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	5	5	5	5	5	5
4.22.1 Wood containing	5	5	5	5	5	5
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	29	36	37	38	38	38
4.31 Household + sanitary	11	11	12	13	13	13
4.32 Wrapping + packaging, total	18	25	25	25	25	25
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	5	6	6	6	6	6
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	5	6	6	6	6	6
4.32.3 Kraft wrapping + packaging	13	17	17	17	17	17
4.32.31 Sack kraft	13	17	17	17	17	17
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	-	2	2	2	2	2
4.32.51 Wrapping paper	-	2	2	2	2	2
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

31 Country: PUERTO RICO

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^r , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^r , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^r for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

31 Country: PUERTO RICO

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	50	50	50	50	50	50
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	50	50	50	50	50	50
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	50	50	50	50	50	50
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	50	50	50	50	50	50
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	50	50	50	50	50	50
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

32 Country: U. S. A.

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	45,254	3,708	46,100	4,084	47,344	4,283	48,597	4,346	49,206	49,206
1.1 Mechanical	4,045	32	4,065	27	4,084	21	4,123	19	4,182	4,182
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	644	80	820	80	1,201	90	1,435	93	1,489	1,489
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	4,175	-	4,256	-	4,350	-	4,395	-	4,407	4,407
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	36,390	3,596	36,959	3,977	37,709	4,172	38,644	4,234	39,128	39,128
1.41 Unbleached sulphite	393	38	393	38	393	38	393	38	393	393
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	1,510	205	1,481	202	1,423	205	1,423	205	1,423	1,423
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	17,963	105	18,115	102	18,213	102	18,854	102	19,132	19,132
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	16,524	3,248	16,970	3,635	17,680	3,827	17,974	3,889	18,180	18,180
1.44.1 of which non-coniferous	6,901	1,275	7,140	1,330	7,301	1,445	7,314	1,445	7,339	7,339
1.44.2 coniferous	9,623	1,973	9,830	2,305	10,379	2,382	10,660	2,444	10,841	10,841

2. Other fibre pulp ⁺ , total	667	-	690	-	696	-	698	-	698	698
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-

3. Dissolving pulp ^φ	1,487	1,475	1,463	1,452	1,461	1,449	1,461	1,449	1,461	1,461
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

32 Country: U. S. A.

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	59,529	61,017	62,691	64,049	64,723	64,723
4.1 Newsprint	3,733	3,850	4,220	4,469	4,671	4,671
4.2 Other printing + writing, total	13,569	13,797	14,406	14,610	14,735	14,735
4.21 Coated	4,044	4,169	4,435	4,611	4,714	4,714
4.21.1 Wood containing	2,179	2,234	2,437	2,563	2,665	2,665
4.21.2 Wood free	1,865	1,935	1,998	2,048	2,049	2,049
4.22 Uncoated	9,525	9,628	9,971	9,999	10,021	10,021
4.22.1 Wood containing	1,240	1,250	1,234	1,235	1,235	1,235
4.22.2 Wood free	8,285	8,378	8,737	8,764	8,786	8,786
4.3 Other paper + paperboard, total	42,227	43,370	44,065	44,970	45,317	45,317
4.31 Household + sanitary	4,222	4,419	4,616	4,680	4,731	4,731
4.32 Wrapping + packaging, total	33,407	34,293	34,783	35,625	35,920	35,920
4.32.1 Linerboard	13,052	13,276	13,474	14,210	14,472	14,472
4.32.11 Kraft liner	12,648	12,844	13,009	13,745	14,007	14,007
4.32.11.1 Unbleached	12,561	12,754	12,917	13,646	13,904	13,904
4.32.11.1 Bleached	87	90	92	99	103	103
4.32.12 Other linerboard	404	432	465	465	465	465
4.32.2 Fluting medium	5,488	5,770	5,892	5,909	5,915	5,915
4.32.21 Semi-chemical	4,305	4,572	4,661	4,664	4,667	4,667
4.32.22 Other fluting medium	1,183	1,198	1,231	1,245	1,248	1,248
4.32.3 Kraft wrapping + packaging	4,621	4,635	4,639	4,662	4,667	4,667
4.32.31 Sack kraft	1,100	1,104	1,105	1,110	1,112	1,112
4.32.32 Other kraft wrapping + packaging	3,521	3,531	3,534	3,552	3,555	3,555
4.32.4 Folding boxboard	6,628	6,958	7,083	7,130	7,143	7,143
4.32.41 Pulp based	4,286	4,565	4,629	4,653	4,663	4,663
4.32.41.1 Bleached chemical	3,682	3,801	3,865	3,889	3,899	3,899
4.32.41.2 Other pulp based	604	764	764	764	764	764
4.32.42 Waste paper based	2,342	2,393	2,454	2,477	2,480	2,480
4.32.5 Other wrapping + packaging n.e.s.	3,618	3,654	3,695	3,714	3,723	3,723
4.32.51 Wrapping paper	228	229	229	229	230	230
4.32.52 Packaging paperboard	3,390	3,425	3,466	3,485	3,493	3,493
4.33 Other paper + board, n.e.s. total	4,598	4,658	4,666	4,665	4,666	4,666
4.33.1 Paper, n.e.s.	1,171	1,187	1,190	1,189	1,191	1,191
4.33.2 Paperboard, n.e.s.	3,427	3,471	3,476	3,476	3,475	3,475

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

33 Country: ARGENTINA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp*, total	405	25	470	25	550	35	635	40	740	840
1.1 Mechanical	50	5	50	5	50	5	50	5	50	50
1.11 of which non-coniferous	50	5	50	5	50	5	50	5	50	50
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	10	5	20	10	25	25
1.21 of which non-coniferous	-	-	-	-	5	-	10	-	10	10
1.22 coniferous	-	-	-	-	5	5	10	10	15	15
1.3 Semi-chemical	130	10	195	10	220	10	230	10	230	230
1.31 of which non-coniferous	130	10	195	10	220	10	230	10	230	230
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	225	10	225	10	270	15	335	15	435	535
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite x	35	..	35	..	35	..	35	..	35	-
1.42.1 of which non-coniferous	10	..	10	..	10	..	10	..	10	-
1.42.2 coniferous	25	..	25	..	25	..	25	..	25	-
1.43 Unbl. sulphate-soda	110	..	110	..	140	..	175	..	200	255
1.43.1 of which non-coniferous	20	..	20	..	20	..	20	..	30	40
1.43.2 coniferous	90	..	90	..	120	..	155	..	170	215
1.44 Bl. sulphate-soda x	80	..	80	..	95	..	125	..	200	280
1.44.1 of which non-coniferous	70	..	70	..	75	..	85	..	100	110
1.44.2 coniferous	10	..	10	..	20	..	40	..	100	170
2. Other fibre pulp*, total	60	-	60	-	60	-	60	-	60	60
2.1 Straw	..	-	..	-	..	-	..	-	..	..
2.2 Bagasse	50	-	50	-	50	-	50	-	50	50
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	..	-	..	-	..	-	..	-	..	..
3. Dissolving pulp ϕ	12	..	12	..	12	..	12	..	12	22
3.1 of which non-coniferous	12	..	12	..	12	..	12	..	12	..
3.2 coniferous	-	-	-	-	-	-	-	-	-	..

* for making paper + paperboard

x including semi-bleached

 ϕ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

33 Country: ARGENTINA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	915	1,020	1,085	1,160	1,225	1,300
4.1 Newsprint	50	115	130	150	150	150
4.2 Other printing + writing, total	215	230	240	250	265	275
4.21 Coated	50	55	55	55	60	60
4.21.1 Wood containing	40	45	45	45	50	50
4.21.2 Wood free	10	10	10	10	10	10
4.22 Uncoated	165	175	185	195	205	215
4.22.1 Wood containing	10	15	20	20	20	25
4.22.2 Wood free	155	160	165	175	185	190
4.3 Other paper + paperboard, total	650	675	715	760	810	875
4.31 Household + sanitary	50	50	55	60	60	65
4.32 Wrapping + packaging, total	530	555	585	620	670	725
4.32.1 Linerboard	135	145	155	165	180	195
4.32.11 Kraft liner	40	45	50	60	70	80
4.32.11.1 Unbleached	35	40	45	55	65	75
4.32.11.1 Bleached	5	5	5	5	5	5
4.32.12 Other linerboard	95	100	105	105	110	115
4.32.2 Fluting medium	75	80	85	90	100	105
4.32.21 Semi-chemical	20	25	30	30	35	35
4.32.22 Other fluting medium	55	55	55	60	65	70
4.32.3 Kraft wrapping + packaging	115	120	125	135	145	155
4.32.31 Sack kraft	90	90	90	95	100	105
4.32.32 Other kraft wrapping + packaging	25	30	35	40	45	50
4.32.4 Folding boxboard	50	50	55	60	65	70
4.32.41 Pulp based	35	35	35	40	40	40
4.32.41.1 Bleached chemical	25	25	25	25	25	25
4.32.41.2 Other pulp based	10	10	10	15	15	15
4.32.42 Waste paper based	15	15	20	20	25	30
4.32.5 Other wrapping + packaging n.e.s.	155	160	165	170	180	200
4.32.51 Wrapping paper	95	100	100	105	110	125
4.32.52 Packaging paperboard	60	60	65	65	70	75
4.33 Other paper + board, n.e.s. total	70	70	75	80	80	85
4.33.1 Paper, n.e.s.	45	45	50	50	50	55
4.33.2 Paperboard, n.e.s.	25	25	25	30	30	30

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

34 Country: BOLIVIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	1	-	1	-	1	-	1	-	1	1
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	1	-	1	-	1	-	1	-	1	1
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

34 Country: BOLIVIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	1	1	1	1	1	1
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	1	1	1	1	1	1
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	1	1	1	1	1	1
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	1	1	1	1	1	1
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	1	1	1	1	1	1
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

35 Country: BRAZIL

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp†, total	2,474	912	3,010	1,353	3,332	1,559	3,676	1,705	3,878	4,105
1.1 Mechanical	182	61	182	61	205	61	205	61	205	205
1.11 of which non-coniferous	36	-	36	-	36	-	36	-	36	36
1.12 coniferous	146	61	146	61	169	61	169	61	169	169
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	19	6
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	19	6
1.3 Semi-chemical	232	7	245	7	249	7	249	7	249	249
1.31 of which non-coniferous	139	-	147	-	151	-	151	-	151	151
1.32 coniferous	93	7	98	7	98	7	98	7	98	98
1.4 Chemical, total	2,060	844	2,583	1,285	2,878	1,491	3,222	1,637	3,405	3,645
1.41 Unbleached sulphite	70	15	70	15	70	15	70	15	70	70
1.41.1 of which non-coniferous	6	2	6	2	6	2	6	2	6	6
1.41.2 coniferous	64	13	64	13	64	13	64	13	64	64
1.42 Bleached sulphite x	38	13	38	13	38	13	38	13	38	38
1.42.1 of which non-coniferous	11	3	11	3	11	3	11	3	11	11
1.42.2 coniferous	27	10	27	10	27	10	27	10	27	27
1.43 Unbl. sulphate-soda	811	250	885	265	997	300	1,191	360	1,335	1,522
1.43.1 of which non-coniferous	354	230	354	240	354	270	354	325	354	354
1.43.2 coniferous	457	20	531	25	643	30	837	35	981	1,168
1.44 Bl. sulphate-soda x	1,141	566	1,590	992	1,773	1,163	1,923	1,249	1,962	2,015
1.44.1 of which non-coniferous	1,094	540	1,542	966	1,725	1,137	1,875	1,223	1,914	1,931
1.44.2 coniferous	47	26	48	26	48	26	48	26	48	84
2. Other fibre pulp†, total	231	12	332	85	367	105	381	116	381	381
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	131	12	132	14	137	14	137	14	137	137
2.3 Bamboo	48	-	77	-	87	-	90	-	90	90
2.4 Other	52	-	123	71	143	91	154	102	154	154
3. *Dissolving pulp †	42	10	42	10	42	10	42	10	42	42
3.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
3.2 coniferous	..	..	..	..	..	..	..	..	..	..

† for making paper + paperboard

x including semi-bleached

† of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

35 Country: BRAZIL

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	3,018	3,292	3,518	3,742	3,990	4,196
4.1 Newsprint	127	147	147	147	147	147
4.2 Other printing + writing, total	648	685	712	751	834	914
4.21 Coated	67	74	78	78	78	78
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	67	74	78	78	78	78
4.22 Uncoated	581	611	634	673	756	836
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	581	611	634	673	756	836
4.3 Other paper + paperboard, total	2,243	2,460	2,659	2,844	3,009	3,135
4.31 Household + sanitary	244	276	289	289	297	305
4.32 Wrapping + packaging, total	1,791	1,942	2,110	2,290	2,447	2,557
4.32.1 Linerboard	385	399	427	556	710	775
4.32.11 Kraft liner	252	266	294	423	545	577
4.32.11.1 Unbleached	252	266	294	423	545	577
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	133	133	133	133	165	198
4.32.2 Fluting medium	380	399	417	424	424	424
4.32.21 Semi-chemical	380	399	417	424	424	424
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	513	602	708	745	745	788
4.32.31 Sack kraft	254	320	408	430	430	461
4.32.32 Other kraft wrapping + packaging	259	282	300	315	315	327
4.32.4 Folding boxboard	284	301	312	316	316	316
4.32.41 Pulp based	284	301	312	316	316	316
4.32.41.1 Bleached chemical	78	78	78	78	78	78
4.32.41.2 Other pulp based	206	223	234	238	238	238
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	229	241	246	249	252	254
4.32.51 Wrapping paper	229	241	246	249	252	254
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	208	242	260	265	265	273
4.33.1 Paper, n.e.s.	106	119	137	142	142	150
4.33.2 Paperboard, n.e.s.	102	123	123	123	123	123

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

36 Country: CHILE

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	733	446	741	430	767	459	792	299	808	903
1.1 Mechanical	161	4	161	4	161	4	161	4	161	166
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	161	4	161	4	161	4	161	4	161	166
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	81
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	81
1.3 Semi-chemical	-	-	-	-	12	-	28	-	34	34
1.31 of which non-coniferous	-	-	-	-	5	-	11	-	13	13
1.32 coniferous	-	-	-	-	7	-	17	-	21	21
1.4 Chemical, total	572	442	580	426	594	455	603	295	613	622
1.41 Unbleached sulphite	22	-	22	-	22	-	22	-	22	31
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	22	-	22	-	22	-	22	-	22	31
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	236	226	269	220	241	230	243	175	243	243
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	236	226	269	220	241	230	243	175	243	243
1.44 Bl. sulphate-soda ^x	314	216	289	206	331	225	338	120	348	348
1.44.1 of which non-coniferous	3	-	3	-	3	-	20	-	20	20
1.44.2 coniferous	311	216	286	206	328	225	318	120	328	328

2. Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-

3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

36 Country: CHILE

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	296	335	381	390	393	498
4.1 Newsprint	136	140	143	143	143	248
4.2 Other printing + writing, total	55	74	77	79	79	79
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	55	74	77	79	79	79
4.22.1 Wood containing	4	7	5	5	5	5
4.22.2 Wood free	51	67	72	74	74	74
4.3 Other paper + paperboard, total	105	121	161	168	171	171
4.31 Household + sanitary	18	21	25	28	31	31
4.32 Wrapping + packaging, total	83	94	130	134	134	134
4.32.1 Linerboard	15	18	16	20	22	22
4.32.11 Kraft liner	12	15	13	17	19	19
4.32.11.1 Unbleached	12	15	13	17	19	19
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	3	3	3	3	3	3
4.32.2 Fluting medium	11	10	12	16	17	17
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	11	10	12	16	17	17
4.32.3 Kraft wrapping + packaging	31	37	72	67	63	63
4.32.31 Sack kraft	14	15	17	18	20	20
4.32.32 Other kraft wrapping + packaging	17	22	55	49	43	43
4.32.4 Folding boxboard	19	20	21	22	23	23
4.32.41 Pulp based	10	10	11	11	12	12
4.32.41.1 Bleached chemical	10	10	11	11	12	12
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	9	10	10	11	11	11
4.32.5 Other wrapping + packaging n.e.s.	7	9	9	9	9	9
4.32.51 Wrapping paper	-	2	2	2	2	2
4.32.52 Packaging paperboard	7	7	7	7	7	7
4.33 Other paper + board, n.e.s. total	4	6	6	6	6	6
4.33.1 Paper, n.e.s.	-	2	2	2	2	2
4.33.2 Paperboard, n.e.s.	4	4	4	4	4	4

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

37 Country: COLOMBIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	152	-	152	-	154	-	154	-	154	182
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	42	-	46	-	46	-	46	-	46	50
1.31 of which non-coniferous	34	-	38	-	38	-	38	-	38	42
1.32 coniferous	8	-	8	-	8	-	8	-	8	8
1.4 Chemical, total	110	-	106	-	108	-	108	-	108	132
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unsulphate-soda	110	-	106	-	108	-	108	-	108	132
1.43.1 of which non-coniferous	90	-	86	-	86	-	82	-	82	100
1.43.2 coniferous	20	-	20	-	22	-	26	-	26	32
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	92	-	92	-	95	-	96	-	96	132
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	90	-	92	-	93	-	94	-	94	130
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	2	-	2	-	2	-	2	-	2	2
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

37 Country: COLOMBIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	384	408	441	454	472	488
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	71	82	92	101	110	117
4.21 Coated	6	8	10	12	14	16
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	6	8	10	12	14	16
4.22 Uncoated	65	74	82	89	96	101
4.22.1 Wood containing	-	-	3	5	10	15
4.22.2 Wood free	65	74	79	84	86	86
4.3 Other paper + paperboard, total	313	326	349	353	362	371
4.31 Household + sanitary	29	42	53	54	56	61
4.32 Wrapping + packaging, total	277	277	289	293	299	303
4.32.1 Linerboard	86	88	96	101	105	106
4.32.11 Kraft liner	86	88	96	101	105	106
4.32.11.1 Unbleached	86	88	96	101	105	106
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	53	53	55	56	54	55
4.32.21 Semi-chemical	51	53	55	56	54	55
4.32.22 Other fluting medium	2	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	52	50	56	62	65	65
4.32.31 Sack kraft	44	42	47	52	55	55
4.32.32 Other kraft wrapping + packaging	8	8	9	10	10	10
4.32.4 Folding boxboard	48	51	55	56	59	61
4.32.41 Pulp based	9	9	9	9	9	9
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	9	9	9	9	9	9
4.32.42 Waste paper based	39	42	46	47	50	52
4.32.5 Other wrapping + packaging n.e.s.	38	34	27	18	16	16
4.32.51 Wrapping paper	22	18	14	6	6	6
4.32.52 Packaging paperboard	16	16	13	12	10	10
4.33 Other paper + board, n.e.s. total	7	8	7	6	7	7
4.33.1 Paper, n.e.s.	5	6	5	4	5	5
4.33.2 Paperboard, n.e.s.	2	2	2	2	2	2

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

38 Country: ECUADOR

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp [†] , total	4	-	5	-	6	-	6	-	6	6
1.1 Mechanical	4	-	5	-	6	-	6	-	6	6
1.11 of which non-coniferous	4	-	5	-	6	-	6	-	6	6
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 [‡] coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp [†] , total	15	-	15	-	15	-	15	-	15	15
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	15	-	15	-	15	-	15	-	15	15
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

[†] for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

38 Country: ECUADOR

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	50	53	57	60	60	60
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	7	8	9	10	10	10
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	7	8	9	10	10	10
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	7	8	9	10	10	10
4.3 Other paper + paperboard, total	43	45	48	50	50	50
4.31 Household + sanitary	16	17	18	18	18	18
4.32 Wrapping + packaging, total	27	28	30	32	32	32
4.32.1 Linerboard	2	2	2	2	2	2
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	2	2	2	2	2	2
4.32.2 Fluting medium	2	2	2	2	2	2
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	2	2	2	2	2	2
4.32.3 Kraft wrapping + packaging	17	17	18	20	20	20
4.32.31 Sack kraft	12	12	12	13	13	13
4.32.32 Other kraft wrapping + packaging	5	5	6	7	7	7
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	6	7	8	8	8	8
4.32.51 Wrapping paper	6	7	8	8	8	8
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

39 Country: PARAGUAY

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	10	4	12	8	12	8	12	8	12	12
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	10	4	12	8	12	8	12	8	12	12
3. Dissolving pulp ^b	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^b of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

39 Country: PARAGUAY

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	8	12	13	14	14	14
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	1	2	2	2	2	2
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	1	2	2	2	2	2
4.22.1 Wood containing	1	2	2	2	2	2
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	7	10	11	12	12	12
4.31 Household + sanitary	6	9	10	10	10	10
4.32 Wrapping + packaging, total	1	1	1	2	2	2
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	1	1	1	2	2	2
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	1	1	1	2	2	2
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

40 Country: PERU

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp [†] , total	15	-	15	-	15	-	15	-	15	15
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	15	-	15	-	15	-	15	-	15	15
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	11	-	11	-	11	-	11	-	11	11
1.43.1 of which non-coniferous	11	-	11	-	11	-	11	-	11	11
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	4	-	4	-	4	-	4	-	4	4
1.44.1 of which non-coniferous	4	-	4	-	4	-	4	-	4	4
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp [†] , total	112	-	197	-	202	-	212	-	222	232
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	112	-	197	-	202	-	212	-	222	232
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

[†] for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

40 Country: PERU

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	201	288	311	326	345	360
4.1 Newsprint	-	70	75	80	90	100
4.2 Other printing + writing, total	49	59	61	63	65	67
4.21 Coated	4	4	6	8	10	12
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	4	4	6	8	10	12
4.22 Uncoated	45	55	55	55	55	55
4.22.1 Wood containing	8	9	9	9	9	9
4.22.2 Wood free	37	46	46	46	46	46
4.3 Other paper + paperboard, total	152	159	175	183	190	193
4.31 Household + sanitary	26	27	29	29	29	30
4.32 Wrapping + packaging, total	126	131	145	153	159	160
4.32.1 Linerboard	24	26	28	28	29	30
4.32.11 Kraft liner	24	26	28	28	29	30
4.32.11.1 Unbleached	23	25	27	27	28	29
4.32.11.1 Bleached	1	1	1	1	1	1
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	32	32	38	41	43	39
4.32.21 Semi-chemical	29	29	35	38	40	36
4.32.22 Other fluting medium	3	3	3	3	3	3
4.32.3 Kraft wrapping + packaging	52	51	59	62	64	67
4.32.31 Sack kraft	36	36	42	45	46	48
4.32.32 Other kraft wrapping + packaging	16	15	17	18	18	19
4.32.4 Folding boxboard	14	17	16	18	19	19
4.32.41 Pulp based	11	14	13	14	15	16
4.32.41.1 Bleached chemical	-	-	-	1	1	1
4.32.41.2 Other pulp based	11	14	13	13	14	15
4.32.42 Waste paper based	3	3	3	4	4	3
4.32.5 Other wrapping + packaging n.e.s.	4	5	4	4	4	5
4.32.51 Wrapping paper	1	1	1	1	1	2
4.32.52 Packaging paperboard	3	4	3	3	3	3
4.33 Other paper + board, n.e.s. total	-	1	1	1	2	3
4.33.1 Paper, n.e.s.	-	1	1	1	2	3
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

41 Country: URUGUAY

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	23	-	23	-	23	-	23	-	23	23
1.1 Mechanical	3	-	3	-	3	-	3	-	3	3
1.11 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.12 coniferous	..	-	..	-	..	-	..	-	..	..
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	5	-	5	-	5	-	5	-	5	5
1.31 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.32 coniferous	..	-	..	-	..	-	..	-	..	..
1.4 Chemical, total	15	-	15	-	15	-	15	-	15	15
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	3	-	3	-	3	-	3	-	3	3
1.43.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.43.2 coniferous	..	-	..	-	..	-	..	-	..	..
1.44 BL sulphate-soda ^x	12	-	12	-	12	-	12	-	12	12
1.44.1 of which non-coniferous	12	-	12	-	12	-	12	-	12	12
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-

2. Other fibre pulp ⁺ , total	6	-	6	-	6	-	6	-	6	6
2.1 Straw	6	-	6	-	6	-	6	-	6	6
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-

3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

41 Country: URUGUAY

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	57	57	57	57	57	57
4.1 Newsprint	1	1	1	1	1	1
4.2 Other printing + writing, total	19	19	19	19	19	19
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	19	19	19	19	19	19
4.22.1 Wood containing	4	4	4	4	4	4
4.22.2 Wood free	15	15	15	15	15	15
4.3 Other paper + paperboard, total	37	37	37	37	37	37
4.31 Household + sanitary	9	9	9	9	9	9
4.32 Wrapping + packaging, total	25	25	25	25	25	25
4.32.1 Linerboard	5	5	5	5	5	5
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	5	5	5	5	5	5
4.32.2 Fluting medium	1	1	1	1	1	1
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	7	7	7	7	7	7
4.32.31 Sack kraft	2	2	2	2	2	2
4.32.32 Other kraft wrapping + packaging	5	5	5	5	5	5
4.32.4 Folding boxboard	7	7	7	7	7	7
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	5	5	5	5	5	5
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	3	3	3	3	3	3
4.33.1 Paper, n.e.s.	..	..	..	..	..	..
4.33.2 Paperboard, n.e.s.	..	..	..	..	..	..

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

42 Country: VENEZUELA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp [†] , total	--	--	--	--	--	--	--	--	--	--
1.1 Mechanical	--	--	--	--	--	--	--	--	--	--
1.11 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.12 coniferous	--	--	--	--	--	--	--	--	--	--
1.2 Thermo-mechanical	--	--	--	--	--	--	--	--	--	--
1.21 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.22 coniferous	--	--	--	--	--	--	--	--	--	--
1.3 Semi-chemical	--	--	--	--	--	--	--	--	--	--
1.31 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.32 coniferous	--	--	--	--	--	--	--	--	--	--
1.4 Chemical, total	--	--	--	--	--	--	--	--	--	--
1.41 Unbleached sulphite	--	--	--	--	--	--	--	--	--	--
1.41.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.41.2 coniferous	--	--	--	--	--	--	--	--	--	--
1.42 Bleached sulphite ^x	--	--	--	--	--	--	--	--	--	--
1.42.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.42.2 coniferous	--	--	--	--	--	--	--	--	--	--
1.43 Unbl. sulphate-soda	--	--	--	--	--	--	--	--	--	--
1.43.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.43.2 coniferous	--	--	--	--	--	--	--	--	--	--
1.44 Bl. sulphate-soda ^x	--	--	--	--	--	--	--	--	--	--
1.44.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
1.44.2 coniferous	--	--	--	--	--	--	--	--	--	--

2. Other fibre pulp [‡] , total	113	--	123	--	123	--	123	--	123	123
2.1 Straw	--	--	--	--	--	--	--	--	--	--
2.2 Bagasse	110	--	120	--	120	--	120	--	120	120
2.3 Bamboo	--	--	--	--	--	--	--	--	--	--
2.4 Other	3	--	3	--	3	--	3	--	3	3

3. Dissolving pulp [§]	--	--	--	--	--	--	--	--	--	--
3.1 of which non-coniferous	--	--	--	--	--	--	--	--	--	--
3.2 coniferous	--	--	--	--	--	--	--	--	--	--

[†] for making paper + paperboard

^x including semi-bleached

[§] of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

42 Country: VENEZUELA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	747	758	758	758	758	758
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	100	100	100	100	100	100
4.21 Coated	..	..	..	..	..	..
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	..	..	..	..	..	..
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	647	658	658	658	658	658
4.31 Household + sanitary	99	99	99	99	99	99
4.32 Wrapping + packaging, total	543	554	554	554	554	554
4.32.1 Linerboard	156	161	161	161	161	161
4.32.11 Kraft liner	156	161	161	161	161	161
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	75	75	75	75	75	75
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	75	75	75	75	75	75
4.32.3 Kraft wrapping + packaging	152	153	153	153	153	153
4.32.31 Sack kraft	127	128	128	128	128	128
4.32.32 Other kraft wrapping + packaging	25	25	25	25	25	25
4.32.4 Folding boxboard	149	154	154	154	154	154
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	8	8	8	8	8	8
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	11	11	11	11	11	11
4.32.51 Wrapping paper	8	8	8	8	8	8
4.32.52 Packaging paperboard	3	3	3	3	3	3
4.33 Other paper + board, n.e.s. total	5	5	5	5	5	5
4.33.1 Paper, n.e.s.	3	3	3	3	3	3
4.33.2 Paperboard, n.e.s.	2	2	2	2	2	2

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

43 Country: BANGLADESH

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	40	-	40	-	40	-	40	-	40	40
1.1 Mechanical	30	-	30	-	30	-	30	-	30	30
1.11 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.12 coniferous	..	-	..	-	..	-	..	-	..	..
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	10	-	10	-	10	-	10	-	10	10
1.31 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.32 coniferous	..	-	..	-	..	-	..	-	..	..
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	71	..	74	..	77	..	77	..	77	77
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	20	..	20	..	20	..	20	..	20	20
2.3 Bamboo	30	..	30	..	30	..	30	..	30	30
2.4 Other	21	21	24	24	27	27	27	27	27	27
3. Dissolving pulp ^φ	5	-	5	-	5	-	5	-	5	5
3.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
3.2 coniferous	..	-	..	-	..	-	..	-	..	..

^a for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

43

Country: BANGLADESH

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	142	142	142	147	148	149
4.1 Newsprint	54	54	54	54	54	54
4.2 Other printing + writing, total	71	71	71	71	71	71
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	71	71	71	71	71	71
4.22.1 Wood containing	12	12	12	12	12	12
4.22.2 Wood free	59	59	59	59	59	59
4.3 Other paper + paperboard, total	17	17	17	22	23	24
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	17	17	17	22	23	24
4.32.1 Linerboard	..	..	..	..	..	..
4.32.11 Kraft liner	..	..	..	..	..	..
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	..	..	..	..	..	..
4.32.2 Fluting medium	..	..	..	..	..	..
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	..	..	..	..	..	..
4.32.31 Sack kraft	..	..	..	..	..	..
4.32.32 Other kraft wrapping + packaging	..	..	..	..	..	..
4.32.4 Folding boxboard	..	..	..	..	..	..
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	..	..	..	..	..	..
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

44 Country: BURMA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	12	-	12	-	12	-	12	-	12	12
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	12	-	12	-	12	-	12	-	12	12
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

44 Country: BURMA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	14	15	16	22	24	25
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	13	14	15	15	15	15
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	13	14	15	15	15	15
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	13	14	15	15	15	15
4.3 Other paper + paperboard, total	1	1	1	7	9	10
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	1	1	1	7	9	10
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	1	1	1	7	9	10
4.32.31 Sack kraft	-	-	-	6	8	9
4.32.32 Other kraft wrapping + packaging	1	1	1	1	1	1
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

 45 Country: CHINA ^{a/}

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp [†] , total	2,390	..	2,500	..	2,610	..	2,720	..	2,830	2,940
1.1 Mechanical	880	..	920	..	960	..	1,000	..	1,040	1,080
1.11 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.12 coniferous	..	..	..	..	..	..	..	..	..	..
1.2 Thermo-mechanical	..	..	..	..	..	..	..	..	..	..
1.21 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.22 coniferous	..	..	..	..	..	..	..	..	..	..
1.3 Semi-chemical	..	..	..	..	..	..	..	..	..	..
1.31 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.32 coniferous	..	..	..	..	..	..	..	..	..	..
1.4 Chemical, total	1,510	..	1,580	..	1,650	..	1,720	..	1,790	1,860
1.41 Unbleached sulphite	..	..	..	..	..	..	..	..	..	..
1.41.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.41.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.42 Bleached sulphite ^x	..	..	..	..	..	..	..	..	..	..
1.42.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.42.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.43 Unbl. sulphate-soda	..	..	..	..	..	..	..	..	..	..
1.43.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.43.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.44 Bl. sulphate-soda ^x	..	..	..	..	..	..	..	..	..	..
1.44.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.44.2 coniferous	..	..	..	..	..	..	..	..	..	..
2. Other fibre pulp [†] , total	5,090	..	5,250	..	5,410	..	5,570	..	5,730	5,890
2.1 Straw	..	..	..	..	..	..	..	..	..	..
2.2 Bagasse	415	..	425	..	425	..	425	..	425	425
2.3 Bamboo	..	..	..	..	..	..	..	..	..	..
2.4 Other	..	..	..	..	..	..	..	..	..	..
3. Dissolving pulp ^ø	40	-	40	-	40	-	40	-	40	40
3.1 of which non-coniferous	40	-	40	-	40	-	40	-	40	40
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

[†] for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

^{a/} Secretariat estimate

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

45 Country:

 CHINA ^{a/}

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	8,500	8,750	9,000	9,250	9,500	9,750
4.1 Newsprint	920	950	980	1,010	1,040	1,070
4.2 Other printing + writing, total	2,280	2,350	2,420	2,490	2,560	2,630
4.21 Coated
4.21.1 Wood containing
4.21.2 Wood free
4.22 Uncoated
4.22.1 Wood containing
4.22.2 Wood free
4.3 Other paper + paperboard, total	5,300	5,450	5,600	5,750	5,900	6,050
4.31 Household + sanitary
4.32 Wrapping + packaging, total
4.32.1 Linerboard
4.32.11 Kraft liner
4.32.11.1 Unbleached
4.32.11.1 Bleached
4.32.12 Other linerboard
4.32.2 Fluting medium
4.32.21 Semi-chemical
4.32.22 Other fluting medium
4.32.3 Kraft wrapping + packaging
4.32.31 Sack kraft
4.32.32 Other kraft wrapping + packaging
4.32.4 Folding boxboard
4.32.41 Pulp based
4.32.41.1 Bleached chemical
4.32.41.2 Other pulp based
4.32.42 Waste paper based
4.32.5 Other wrapping + packaging n.e.s.
4.32.51 Wrapping paper
4.32.52 Packaging paperboard
4.33 Other paper + board, n.e.s. total
4.33.1 Paper, n.e.s.
4.33.2 Paperboard, n.e.s.

^{a/} Secretariat estimate.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

46 Country: CYPRUS

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

46 Country: CYPRUS

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	2	2	12	15	17	17
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	2	2	12	15	17	17
4.31 Household + sanitary	2	2	2	2	2	2
4.32 Wrapping + packaging, total	-	-	10	13	15	15
4.32.1 Linerboard	-	-	7	9	10	10
4.32.11 Kraft liner	-	-	7	9	10	10
4.32.11.1 Unbleached	-	-	..	..	..	..
4.32.11.1 Bleached	-	-	..	..	..	..
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	3	4	5	5
4.32.21 Semi-chemical	-	-	..	..	..	..
4.32.22 Other fluting medium	-	-	..	..	..	..
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

47 Country: HONG KONG

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

47 Country: HONG KONG

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	14	17	18	21	23	23
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing - writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	14	17	18	21	23	23
4.31 Household + sanitary	1	2	2	3	3	3
4.32 Wrapping + packaging, total	13	15	16	18	20	20
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	13	15	16	18	20	20
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	13	15	16	18	20	20
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

48 Country: INDIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	340	-	340	-	400	-	500	-	540	560
1.1 Mechanical	25	-	25	-	50	-	80	-	80	80
1.11 of which non-coniferous	25	-	25	-	50	-	80	-	80	80
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	25	-	25	-	50	-	80	-	80	80
1.31 of which non-coniferous	25	-	25	-	50	-	80	-	80	80
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	290	-	290	-	300	-	340	-	380	400
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	145	-	145	-	150	-	170	-	190	200
1.43.1 of which non-coniferous	145	-	145	-	150	-	170	-	190	200
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	145	-	145	-	150	-	170	-	190	200
1.44.1 of which non-coniferous	145	-	145	-	150	-	170	-	190	200
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	1,045	25	1,190	25	1,245	25	1,245	25	1,375	1,465
2.1 Straw	150	-	200	-	220	-	220	-	220	220
2.2 Bagasse	20	-	25	-	30	-	30	-	30	30
2.3 Bamboo	725	25	765	25	765	25	765	25	895	985
2.4 Other	150	-	200	-	230	-	230	-	230	230
3. Dissolving pulp ^ø	130	-	156	-	156	-	156	-	156	156
3.1 of which non-coniferous	130	-	156	-	156	-	156	-	156	156
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

48 Country: INDIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	1,345	1,445	1,735	1,880	1,970	2,100
4.1 Newsprint	75	75	155	230	230	250
4.2 Other printing + writing, total	670	690	810	810	860	920
4.21 Coated	30	40	40	40	40	50
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	30	40	40	40	40	50
4.22 Uncoated	640	650	770	770	820	870
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	640	650	770	770	820	870
4.3 Other paper + paperboard, total	600	680	770	840	880	930
4.31 Household + sanitary	10	20	20	20	20	20
4.32 Wrapping + packaging, total	590	660	750	820	860	910
4.32.1 Linerboard	30	40	50	60	60	70
4.32.11 Kraft liner	30	40	50	60	60	70
4.32.11.1 Unbleached	30	40	50	60	60	70
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	280	310	350	380	400	420
4.32.31 Sack kraft	5	10	10	10	10	10
4.32.32 Other kraft wrapping + packaging	275	300	340	370	390	410
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	280	310	350	380	400	420
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	280	310	350	380	400	420
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

49 Country: INDONESIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	8	-	8	-	8	-	8	-	8	8
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	8	-	8	-	8	-	8	-	8	8
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	8	-	8	-	8	-	8	-	8	8
1.43.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.43.2 coniferous	..	-	..	-	..	-	..	-	..	..
1.44 Bl. sulphate-soda ^x	-	-	-	-	..	-	..	-	..	..
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	61	-	63	-	65	-	65	-	65	94
2.1 Straw	41	-	43	-	45	-	45	-	45	45
2.2 Bagasse	6	-	6	-	6	-	6	-	6	35
2.3 Bamboo	14	-	14	-	14	-	14	-	14	14
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

+ for making paper + paperboard

x including semi-bleached

ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

49 Country: INDONESIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	95	129	182	239	279	328
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	81	101	141	167	183	219
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	81	101	141	167	183	219
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	14	28	41	72	96	109
4.31 Household + sanitary	2	2	2	2	2	2
4.32 Wrapping + packaging, total	11	24	37	64	86	98
4.32.1 Linerboard	..	..	..	..	..	..
4.32.11 Kraft liner	..	..	..	..	..	..
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	..	..	..	..	..	..
4.32.2 Fluting medium	..	..	..	..	..	..
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	..	..	..	..	..	..
4.32.31 Sack kraft	..	..	..	..	..	..
4.32.32 Other kraft wrapping + packaging	..	..	..	..	..	..
4.32.4 Folding boxboard	..	..	..	..	..	..
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	..	..	..	..	..	..
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	1	2	2	6	8	9
4.33.1 Paper, n.e.s.	1	2	2	6	8	9
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

50 Country: IRAN

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp*, total	-	-	60	-	85	-	110	-	225	270
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	90	130
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	90	130
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	60	-	85	-	110	-	135	140
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	15	20
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	15	20
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	60	-	85	-	110	-	120	120
1.43.1 of which non-coniferous	-	-	60	-	85	-	110	-	120	120
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp*, total	60	-	60	-	60	-	60	-	60	60
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	60	-	60	-	60	-	60	-	60	60
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

* for making paper + paperboard

x including semi-bleached

φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

50 Country: IRAN

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	139	209	244	269	389	439
4.1 Newsprint	-	-	-	-	20	30
4.2 Other printing + writing, total	90	90	90	90	110	120
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	90	90	90	90	110	120
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	90	90	90	90	110	120
4.3 Other paper + paperboard, total	49	119	154	179	259	289
4.31 Household + sanitary	9	9	9	9	9	9
4.32 Wrapping + packaging, total	40	110	145	170	250	280
4.32.1 Linerboard	-	30	40	55	60	60
4.32.11 Kraft liner	-	30	40	55	60	60
4.32.11.1 Unbleached	-	30	40	55	60	60
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	20	30	35	80	100
4.32.21 Semi-chemical	-	20	30	35	80	100
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	25	40	50	55	60	60
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	25	40	50	55	60	60
4.32.4 Folding boxboard	-	-	-	-	20	30
4.32.41 Pulp based	-	-	-	-	20	30
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	20	30
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	15	20	25	25	30	30
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	15	20	25	25	30	30
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

51 Country: IRAQ

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp [†] , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-

2. Other fibre pulp [†] , total	21	-	30	-	46	-	61	-	77	84
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	5	-	6	-	10	-	14	-	18	22
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	16	-	24	-	36	-	47	-	59	62

3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

[†] for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

51 Country: IRAQ

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	43	56	74	93	111	122
4.1 Newsprint	--	--	--	--	--	--
4.2 Other printing + writing, total	16	23	29	35	41	41
4.21 Coated	--	--	--	--	--	--
4.21.1 Wood containing	--	--	--	--	--	--
4.21.2 Wood free	--	--	--	--	--	--
4.22 Uncoated	16	23	29	35	41	41
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	27	33	45	58	70	81
4.31 Household + sanitary	1	2	3	4	5	5
4.32 Wrapping + packaging, total	26	31	42	54	65	76
4.32.1 Linerboard	13	15	15	15	15	15
4.32.11 Kraft liner	--	--	--	--	--	--
4.32.11.1 Unbleached	--	--	--	--	--	--
4.32.11.1 Bleached	--	--	--	--	--	--
4.32.12 Other linerboard	13	15	15	15	15	15
4.32.2 Fluting medium	--	--	--	--	--	--
4.32.21 Semi-chemical	--	--	--	--	--	--
4.32.22 Other fluting medium	--	--	--	--	--	--
4.32.3 Kraft wrapping + packaging	1	2	9	16	23	30
4.32.31 Sack kraft	..	..	..	..	..	..
4.32.32 Other kraft wrapping + packaging	..	..	..	..	..	..
4.32.4 Folding boxboard	9	11	15	20	24	28
4.32.41 Pulp based	9	11	15	20	24	28
4.32.41.1 Bleached chemical	--	--	--	--	--	--
4.32.41.2 Other pulp based	9	11	15	20	24	28
4.32.42 Waste paper based	--	--	--	--	--	--
4.32.5 Other wrapping + packaging n.e.s.	3	3	3	3	3	3
4.32.51 Wrapping paper	--	--	--	--	--	--
4.32.52 Packaging paperboard	3	3	3	3	3	3
4.33 Other paper + board, n.e.s. total	--	--	--	--	--	--
4.33.1 Paper, n.e.s.	--	--	--	--	--	--
4.33.2 Paperboard, n.e.s.	--	--	--	--	--	--

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

52 Country: ISRAEL

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp*, total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41,1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41,2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite x	-	-	-	-	-	-	-	-	-	-
1.42,1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42,2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate+soda	-	-	-	-	-	-	-	-	-	-
1.43,1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43,2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda x	-	-	-	-	-	-	-	-	-	-
1.44,1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44,2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp*, total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ϕ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

* for making paper + paperboard

x including semi-bleached

ϕ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

52 Country: ISRAEL

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	123	130	134	140	145	145
4.1 Newsprint	17	18	18	19	20	20
4.2 Other printing + writing, total	43	44	45	46	48	48
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	43	44	45	46	48	48
4.22.1 Wood containing	4	4	5	5	5	5
4.22.2 Wood free	39	40	40	41	43	43
4.3 Other paper + paperboard, total	63	68	71	75	77	77
4.31 Household + sanitary	13	15	16	18	18	18
4.32 Wrapping + packaging, total	46	49	51	53	55	55
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	19	20	20	21	22	22
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	19	20	20	21	22	22
4.32.3 Kraft wrapping + packaging	6	6	6	6	6	6
4.32.31 Sack kraft	2	2	2	2	2	2
4.32.32 Other kraft wrapping + packaging	4	4	4	4	4	4
4.32.4 Folding boxboard	16	18	20	21	22	22
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	16	18	20	21	22	22
4.32.5 Other wrapping + packaging n.e.s.	5	5	5	5	5	5
4.32.51 Wrapping paper	5	5	5	5	5	5
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board. n.e.s. total	4	4	4	4	4	4
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	4	4	4	4	4	4

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

53 Country: JAPAN

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^r , total	12,064	1,165	12,297	1,165	12,587	1,165	12,934	1,165	13,442	13,610
1.1 Mechanical	1,490	30	1,463	30	1,505	30	1,506	30	1,506	1,507
1.11 of which non-coniferous	15	-	15	-	15	-	15	-	15	15
1.12 coniferous	1,475	30	1,448	30	1,490	30	1,491	30	1,491	1,492
1.2 Thermo-mechanical	621	-	794	-	999	-	1,046	-	1,236	1,364
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	621	-	794	-	999	-	1,046	-	1,236	1,364
1.3 Semi-chemical	1,918	65	1,918	65	1,946	65	1,955	65	2,038	1,999
1.31 of which non-coniferous	1,841	65	1,841	65	1,868	65	1,877	65	1,956	1,919
1.32 coniferous	77	-	77	-	78	-	78	-	82	80
1.4 Chemical, total	8,035	1,070	8,122	1,070	8,137	1,070	8,427	1,070	8,662	8,740
1.41 Unbleached sulphite	299	40	299	40	299	40	299	40	299	299
1.41.1 of which non-coniferous	15	15	15	15	15	15	15	15	15	15
1.41.2 coniferous	284	25	284	25	284	25	284	25	284	284
1.42 Bleached sulphite ^x	..	..	..	..	..	..	..	..	..	..
1.42.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.42.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.43 Unbl. sulphate+soda	3,186	260	3,198	260	3,198	260	3,210	260	3,252	3,330
1.43.1 of which non-coniferous	828	55	831	55	831	55	835	55	846	866
1.43.2 coniferous	2,358	205	2,367	205	2,367	205	2,375	205	2,406	2,464
1.44 Bl. sulphate+soda ^x	4,550	770	4,625	770	4,640	770	4,918	770	5,111	5,111
1.44.1 of which non-coniferous	3,822	601	3,885	601	3,898	601	4,131	601	4,293	4,293
1.44.2 coniferous	728	169	740	169	742	169	787	169	818	818
2. Other fibre pulp ^r , total	4	4	4	4	4	4	4	4	4	4
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	4	4	4	4	4	4	4	4	4	4
3. Dissolving pulp ^φ	479	479	479	479	479	479	479	479	479	479
3.1 of which non-coniferous	448	448	448	448	448	448	448	448	448	448
3.2 coniferous	31	31	31	31	31	31	31	31	31	31

^r for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

53 Country: JAPAN

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	21,164	21,747	22,607	23,497	24,694	25,447
4.1 Newsprint	2,569	2,632	2,721	2,738	2,974	3,196
4.2 Other printing + writing, total	4,081	4,268	4,672	4,957	5,146	5,317
4.21 Coated	1,436	1,540	1,836	1,994	2,092	2,137
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	2,645	2,728	2,836	2,963	3,054	3,180
4.22.1 Wood containing	1,425	1,476	1,606	1,661	1,652	1,696
4.22.2 Wood free	1,220	1,252	1,230	1,302	1,402	1,484
4.3 Other paper + paperboard, total	14,514	14,847	15,214	15,802	16,574	16,934
4.31 Household + sanitary	858	921	983	1,006	1,016	1,026
4.32 Wrapping + packaging, total	10,977	11,049	11,248	11,665	12,161	12,465
4.32.1 Linerboard	4,558	4,575	4,589	4,721	4,824	4,946
4.32.11 Kraft liner	1,969	1,989	2,009	2,029	2,049	2,069
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	2,589	2,586	2,580	2,692	2,775	2,877
4.32.2 Fluting medium	2,758	2,781	2,814	2,976	3,288	3,331
4.32.21 Semi-chemical	2,171	2,189	2,246	2,247	2,432	2,465
4.32.22 Other fluting medium	587	592	568	729	856	866
4.32.3 Kraft wrapping + packaging	1,465	1,472	1,576	1,644	1,660	1,677
4.32.31 Sack kraft	994	1,006	1,078	1,131	1,142	1,154
4.32.32 Other kraft wrapping + packaging	471	466	498	513	518	523
4.32.4 Folding boxboard	1,733	1,755	1,799	1,848	1,909	2,026
4.32.41 Pulp based	563	569	601	614	620	632
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	1,170	1,186	1,198	1,234	1,289	1,394
4.32.5 Other wrapping + packaging n.e.s.	463	466	470	476	480	485
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	463	466	470	476	480	485
4.33 Other paper + board. n.e.s. total	2,679	2,877	2,983	3,131	3,397	3,443
4.33.1 Paper, n.e.s.	1,683	1,817	1,909	2,001	2,178	2,212
4.33.2 Paperboard, n.e.s.	996	1,060	1,074	1,130	1,219	1,231

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

54 Country: JORDAN

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	12	-	12	-	12	-	12	-	12	12
2.1 Straw	4	-	4	-	4	-	4	-	4	4
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	8	-	8	-	8	-	8	-	8	8
3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

54 Country: JORDAN

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	10	10	10	10	10	10
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	10	10	10	10	10	10
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	10	10	10	10	10	10
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	5	5	5	5	5	5
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	5	5	5	5	5	5
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding board	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	5	5	5	5	5	5
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	5	5	5	5	5	5
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

55 Country:

KAMPUCHEA, DEMOCRATIC

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp [†] , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp [†] , total	6	-	6	-	6	-	6	-	6	6
2.1 Straw	5	-	5	-	5	-	5	-	5	5
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	1	-	1	-	1	-	1	-	1	1
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

[†] for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

55 Country: KAMPUCHEA, DEMOCRATIC

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	5	5	5	5	5	5
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	3	3	3	3	3	3
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	3	3	3	3	3	3
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	3	3	3	3	3	3
4.3 Other paper + paperboard, total	2	2	2	2	2	2
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	2	2	2	2	2	2
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	2	2	2	2	2	2
4.32.51 Wrapping paper	2	2	2	2	2	2
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

56 Country:

KOREA, DEM. PEOPLE'S REP. ^{a/}

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	47	-	51	-	56	-	56	-	56	56
1.1 Mechanical	11	-	12	-	13	-	13	-	13	13
1.11 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.12 coniferous	..	-	..	-	..	-	..	-	..	..
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	36	-	39	-	43	-	43	-	43	43
1.41 Unbleached sulphite	..	-	..	-	..	-	..	-	..	..
1.41.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.41.2 coniferous	..	-	..	-	..	-	..	-	..	..
1.42 Bleached sulphite ^x	..	-	..	-	..	-	..	-	..	..
1.42.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.42.2 coniferous	..	-	..	-	..	-	..	-	..	..
1.43 Unbl. sulphate-soda	..	-	..	-	..	-	..	-	..	..
1.43.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.43.2 coniferous	..	-	..	-	..	-	..	-	..	..
1.44 Bl. sulphate-soda ^x	26	-	29	-	33	-	33	-	33	33
1.44.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.44.2 coniferous	..	-	..	-	..	-	..	-	..	..

2. Other fibre pulp ⁺ , total	50	-	50	-	50	-	50	-	50	50
2.1 Straw	..	-	..	-	..	-	..	-	..	..
2.2 Bagasse	..	-	..	-	..	-	..	-	..	..
2.3 Bamboo	..	-	..	-	..	-	..	-	..	..
2.4 Other	..	-	..	-	..	-	..	-	..	..

3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard
^{a/} Secretariat estimate.

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

56 Country: KOREA, DEM. PEOPLE'S REP. OF ^{a/}

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	132	136	140	140	140	140
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total (b)	24	27	30	30	30	30
4.21 Coated
4.21.1 Wood containing
4.21.2 Wood free
4.22 Uncoated
4.22.1 Wood containing
4.22.2 Wood free
4.3 Other paper + paperboard, total	108	109	110	110	110	110
4.31 Household + sanitary
4.32 Wrapping + packaging, total
4.32.1 Linerboard
4.32.11 Kraft liner
4.32.11.1 Unbleached
4.32.11.1 Bleached
4.32.12 Other linerboard
4.32.2 Fluting medium
4.32.21 Semi-chemical
4.32.22 Other fluting medium
4.32.3 Kraft wrapping + packaging
4.32.31 Sack kraft
4.32.32 Other kraft wrapping + packaging
4.32.4 Folding boxboard (b)	8	9	10	10	10	10
4.32.41 Pulp based
4.32.41.1 Bleached chemical
4.32.41.2 Other pulp based
4.32.42 Waste paper based
4.32.5 Other wrapping + packaging n.e.s.
4.32.51 Wrapping paper
4.32.52 Packaging paperboard
4.33 Other paper + board, n.e.s. total
4.33.1 Paper, n.e.s.
4.33.2 Paperboard, n.e.s.

^{a/} Secretariat estimate

^{b/} Additional capacity only.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

57 Country: KOREA, REPUBLIC OF

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	187	19	234	66	311	118	320	118	320	320
1.1 Mechanical	181	13	181	13	206	13	215	13	215	215
1.11 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.12 coniferous	..	..	..	..	..	..	..	..	..	..
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	6	6	53	53	105	105	105	105	105	105
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate+soda	6	6	53	53	105	105	105	105	105	105
1.43.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.43.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	12	12	-	-	-	-	-	-	-	-
2.1 Straw	12	12	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

57 Country: KOREA, REPUBLIC OF

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	1,564	1,564	1,564	1,564	1,564	1,564
4.1 Newsprint	266	266	266	266	266	266
4.2 Other printing + writing, total	218	218	218	218	218	218
4.21 Coated	..	..	..	..	..	..
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	..	..	..	..	..	..
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	1,080	1,080	1,080	1,080	1,080	1,080
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	861	861	861	861	861	861
4.32.1 Linerboard	381	381	381	381	381	381
4.32.11 Kraft liner	343	343	343	343	343	343
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	38	38	38	38	38	38
4.32.2 Fluting medium	43	43	43	43	43	43
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	168	168	168	168	168	168
4.32.31 Sack kraft	168	168	168	168	168	168
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	269	269	269	269	269	269
4.32.41 Pulp based	247	247	247	247	247	247
4.32.41.1 Bleached chemical	247	247	247	247	247	247
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	22	22	22	22	22	22
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	219	219	219	219	219	219
4.33.1 Paper, n.e.s.	219	219	219	219	219	219
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

58 Country: LEBANON

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp*, total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp*, total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ϕ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

* for making paper + paperboard

x including semi-bleached

ϕ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

59 Country: MALAYSIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

58 Country: LEBANON

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	45	45	45	45	45	45
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	45	45	45	45	45	45
4.31 Household + sanitary	2	2	2	2	2	2
4.32 Wrapping + packaging, total	43	43	43	43	43	43
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	13	13	13	13	13	13
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	20	20	20	20	20	20
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	20	20	20	20	20	20
4.32.5 Other wrapping + packaging n.e.s.	10	10	10	10	10	10
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

59 Country: MALAYSIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	50	50	50	50	50	50
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing - writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	50	50	50	50	50	50
4.31 Household + sanitary	13	13	13	13	13	13
4.32 Wrapping + packaging, total	25	25	25	25	25	25
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	11	11	11	11	11	11
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	4	4	4	4	4	4
4.32.31 Sack kraft	..	..	..	..	..	..
4.32.32 Other kraft wrapping + packaging	..	..	..	..	..	..
4.32.4 Folding boxboard	8	8	8	8	8	8
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	2	2	2	2	2	2
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	12	12	12	12	12	12
4.33.1 Paper, n.e.s.	..	..	..	..	..	..
4.33.2 Paperboard, n.e.s.	..	..	..	..	..	..

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

60 Country: MONGOLIA a/

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp†, total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp†, total	2	-	2	-	2	-	2	-	2	2
2.1 Straw	..	-	..	-	..	-	..	-	..	..
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	..	-	..	-	..	-	..	-	..	..
3. Dissolving pulp †	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

† for making paper + paperboard

x including semi-bleached

† of wood + other raw materials.

a/ Secretariat estimate.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

60 Country:

 MONGOLIA ^{a/}

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	2	2	2	2	2	2
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	..	..	..	..	..	..
4.21 Coated	..	..	..	..	..	..
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	..	..	..	..	..	..
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	..	..	..	..	..	..
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	..	..	..	..	..	..
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	..	..	..	..	..	..
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	..	..	..	..	..	..
4.33.1 Paper, n.e.s.	..	..	..	..	..	..
4.33.2 Paperboard, n.e.s.	..	..	..	..	..	..

^{a/} Secretariat estimate.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

61 Country: NEPAL a/

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp*, total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp*, total	4	-	4	-	4	-	4	-	4	4
2.1 Straw	..	-	..	-	..	-	..	-	..	..
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	..	-	..	-	..	-	..	-	..	..
3. Dissolving pulp §	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

 * for making paper + paperboard
 a/ Secretariat estimate.

x including semi-bleached

§ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

61 Country: NEPAL a/

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	4	4	4	4	4	4
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	..	..	..	..	..	..
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	..	..	..	..	..	..
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	..	..	..	..	..	..
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	..	..	..	..	..	..
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	..	..	..	..	..	..
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	..	..	..	..	..	..
4.33.1 Paper, n.e.s.	..	..	..	..	..	..
4.33.2 Paperboard, n.e.s.	..	..	..	..	..	..

a/ Secretariat estimate.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

62 Country: PAKISTAN

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	90	-	90	-	90	-	90	-	90	90
2.1 Straw	..	-	..	-	..	-	..	-	..	..
2.2 Bagasse	30	-	30	-	30	-	30	-	30	30
2.3 Bamboo	..	-	..	-	..	-	..	-	..	..
2.4 Other	..	-	..	-	..	-	..	-	..	..
3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

62 Country: PAKISTAN

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	109	109	109	109	109	109
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	47	47	47	47	47	47
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	47	47	47	47	47	47
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	47	47	47	47	47	47
4.3 Other paper + paperboard, total	62	62	62	62	62	62
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	62	62	62	62	62	62
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	9	9	9	9	9	9
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	9	9	9	9	9	9
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	27	27	27	27	27	27
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	26	26	26	26	26	26
4.32.51 Wrapping paper	6	6	6	6	6	6
4.32.52 Packaging paperboard	20	20	20	20	20	20
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

63 Country: PHILIPPINES

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	228	-	248	-	314	66	358	66	358	358
1.1 Mechanical	63	-	63	-	63	-	63	-	63	63
1.11 of which non-coniferous	63	-	63	-	63	-	63	-	63	63
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	20	-	20	-	20	-	20	20
1.21 of which non-coniferous	-	-	20	-	20	-	20	-	20	20
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	165	-	165	-	231	66	275	66	275	275
1.41 Unbleached sulphite	90	-	90	-	156	66	200	66	200	200
1.41.1 of which non-coniferous	90	-	90	-	156	66	200	66	200	200
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	75	-	75	-	75	-	75	-	75	75
1.44.1 of which non-coniferous	75	-	75	-	75	-	75	-	75	75
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	50	21	50	21	73	21	73	21	73	73
2.1 Straw	-	-	-	-	23	-	23	-	23	23
2.2 Bagasse	27	-	27	-	27	-	27	-	27	27
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	23	21	23	21	23	21	23	21	23	23
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

63 Country: PHILIPPINES

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	460	460	465	514	584	584
4.1 Newsprint	125	125	125	125	135	135
4.2 Other printing + writing, total	54	54	54	78	138	138
4.21 Coated	5	5	5	29	29	29
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	49	49	49	49	109	109
4.22.1 Wood containing	-	-	-	-	60	60
4.22.2 Wood free	49	49	49	49	49	49
4.3 Other paper + paperboard, total	281	281	286	311	311	311
4.31 Household + sanitary	18	18	18	18	18	18
4.32 Wrapping + packaging, total	263	263	268	293	293	293
4.32.1 Linerboard	58	58	58	68	68	68
4.32.11 Kraft liner	58	58	58	68	68	68
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	58	58	58	71	71	71
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	86	86	86	86	86	86
4.32.31 Sack kraft	59	59	59	59	59	59
4.32.32 Other kraft wrapping + packaging	27	27	27	27	27	27
4.32.4 Folding boxboard	61	61	66	68	68	68
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

64 Country: SINGAPORE

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp†, total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp†, total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

† for making paper + paperboard

x including semi-bleached

ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

64 Country:

SINGAPORE

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	47	47	47	47	47	47
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	-	-	-	-	-	-
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-	-	-	-	-	-
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	-	-	-	-	-	-
4.3 Other paper + paperboard, total	47	47	47	47	47	47
4.31 Household + sanitary	5	5	5	5	5	5
4.32 Wrapping + packaging, total	42	42	42	42	42	42
4.32.1 Linerboard	3	3	3	3	3	3
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	3	3	3	3	3	3
4.32.2 Fluting medium	21	21	21	21	21	21
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	21	21	21	21	21	21
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	18	18	18	18	18	18
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	18	18	18	18	18	18
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

65 Country: SRI LANKA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	-	-	2	-	2	-	2	-	2	2
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	2	-	2	-	2	-	2	2
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	..	-	..	-	..	-
1.42.1 of which non-coniferous	-	-	..	-	..	-	..	-
1.42.2 coniferous	-	-	..	-	..	-	..	-
1.43 Unbl. sulphate+soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	..	-	..	-	..	-
1.44.1 of which non-coniferous	-	-	..	-	..	-	..	-
1.44.2 coniferous	-	-	..	-	..	-	..	-

2. Other fibre pulp ^a , total	18	-	22	-	24	-	26	-	27	27
2.1 Straw	17	-	21	-	23	-	25	-	26	26
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	1	-	1	-	1	-	1	-	1	1

3. Dissolving pulp ^b	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^b of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

65 Country: SRI LANKA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	33	40	43	45	48	48
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	21	28	31	33	36	36
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	21	28	31	33	36	36
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	12	12	12	12	12	12
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	12	12	12	12	12	12
4.32.1 Linerboard	1	1	1	1	1	1
4.32.11 Kraft liner	1	1	1	1	1	1
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	2	2	2	2	2	2
4.32.21 Semi-chemical	2	2	2	2	2	2
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	2	2	2	2	2	2
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	2	2	2	2	2	2
4.32.4 Folding boxboard	6	6	6	6	6	6
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	1	1	1	1	1	1
4.32.51 Wrapping paper	1	1	1	1	1	1
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

66 Country: SYRIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	-	-	-	-	-	-	-	-	-	-
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate+soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate+soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	-	-	18	-	21	-	24	-	27	32
2.1 Straw	-	-	18	-	21	-	24	-	27	32
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^b	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^b of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

66 Country: SYRIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	-	35	41	47	56	60
4.1 Newsprint	-	7	8	9	11	12
4.2 Other printing + writing, total	-	7	8	9	11	12
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	-
4.22.1 Wood containing	-
4.22.2 Wood free	-
4.3 Other paper + paperboard, total	-	21	25	29	34	36
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	-	21	25	29	34	36
4.32.1 Linerboard	-	5	6	7	8	8
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	5	6	7	8	8
4.32.2 Fluting medium	-	3	3	4	5	5
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	3	3	4	5	5
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	-	13	16	18	21	23
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	13	16	18	21	23
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

67 Country: THAILAND

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	40	-	40	-	40	-	40	-	40	40
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	40	-	40	-	40	-	40	-	40	40
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	30	-	30	-	30	-	30	-	30	30
1.43.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.43.2 coniferous	..	-	..	-	..	-	..	-	..	..
1.44 Bl. sulphate-soda ^x	10	-	10	-	10	-	10	-	10	10
1.44.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.44.2 coniferous	..	-	..	-	..	-	..	-	..	..
2. Other fibre pulp ⁺ , total	76	-	76	-	76	-	76	-	76	76
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	6	-	6	-	6	-	6	-	6	6
2.4 Other	70	-	70	-	70	-	70	-	70	70
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

67 Country: THAILAND

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	362	362	377	382	384	384
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	50	50	50	50	50	50
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	50	50	50	50	50	50
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	50	50	50	50	50	50
4.3 Other paper + paperboard, total	312	312	327	332	334	334
4.31 Household + sanitary	21	21	21	21	21	21
4.32 Wrapping + packaging, total	289	289	304	309	311	311
4.32.1 Linerboard	..	..	..	..	..	..
4.32.11 Kraft liner	..	..	..	..	..	..
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	..	..	..	..	..	..
4.32.2 Fluting medium	..	..	..	..	..	..
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	..	..	..	..	..	..
4.32.31 Sack kraft	..	..	..	..	..	..
4.32.32 Other kraft wrapping + packaging	..	..	..	..	..	..
4.32.4 Folding boxboard	..	..	..	..	..	..
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	..	..	..	..	..	..
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	2	2	2	2	2	2
4.33.1 Paper, n.e.s.	2	2	2	2	2	2
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

68 Country: TURKEY

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	296	-	296	-	296	-	456	-	501	531
1.1 Mechanical	98	-	98	-	98	-	98	-	98	98
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	98	-	98	-	98	-	98	-	98	98
1.2 Thermo-mechanical	-	-	-	-	-	-	60	-	75	85
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	75	85
1.3 Semi-chemical	28	-	28	-	28	-	28	-	28	28
1.31 of which non-coniferous	28	-	28	-	28	-	28	-	28	28
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	170	-	170	-	170	-	270	-	300	320
1.41 Unbleached sulphite	20	-	20	-	20	-	20	-	20	20
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	20	-	20	-	20	-	20	-	20	20
1.42 Bleached sulphite ^x	20	-	20	-	20	-	20	-	20	20
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	20	-	20	-	20	-	20	-	20	20
1.43 Unbl. sulphate-soda	60	-	60	-	60	-	160	-	190	210
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	60	-	60	-	60	-	160	-	190	210
1.44 Bl. sulphate-soda ^x	70	-	70	-	70	-	70	-	70	70
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	70	-	70	-	70	-	70	-	70	70
2. Other fibre pulp ^a , total	35	-	45	-	60	-	60	-	60	60
2.1 Straw	33	-	43	-	58	-	58	-	58	58
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	2	-	2	-	2	-	2	-	2	2
3. Dissolving pulp ^ø	15	-	15	-	15	-	15	-	15	15
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	15	-	15	-	15	-	15	-	15	15

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

68 Country: TURKEY

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	513	516	527	622	682	716
4.1 Newsprint	83	83	83	143	163	173
4.2 Other printing + writing, total	103	103	103	103	103	103
4.21 Coated	-	5	10	15	15	15
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	5	10	15	15	15
4.22 Uncoated	103	98	93	88	88	88
4.22.1 Wood containing	55	50	45	40	40	40
4.22.2 Wood free	48	48	48	48	48	48
4.3 Other paper + paperboard, total	327	330	341	376	416	440
4.31 Household + sanitary	5	5	5	5	8	8
4.32 Wrapping + packaging, total	272	275	283	317	354	378
4.32.1 Linerboard	62	62	62	70	75	90
4.32.11 Kraft liner	27	27	27	30	35	40
4.32.11.1 Unbleached	27	27	27	30	35	40
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	35	35	35	40	40	50
4.32.2 Fluting medium	44	45	48	50	53	53
4.32.21 Semi-chemical	6	7	10	12	15	15
4.32.22 Other fluting medium	38	38	38	38	38	38
4.32.3 Kraft wrapping + packaging	101	101	101	122	142	151
4.32.31 Sack kraft	60	60	60	75	92	98
4.32.32 Other kraft wrapping + packaging	41	41	41	47	50	53
4.32.4 Folding boxboard	42	42	42	45	54	54
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	42	42	42	45	54	54
4.32.5 Other wrapping + packaging n.e.s.	23	25	30	30	30	30
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	23	25	30	30	30	30
4.33 Other paper + board, n.e.s. total	50	50	53	54	54	54
4.33.1 Paper, n.e.s.	2	2	3	4	4	4
4.33.2 Paperboard, n.e.s.	48	48	50	50	50	50

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

69 Country: VIET-NAM, SOCIALIST REPUBLIC a/

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	10	-	10	-	10	-	10	-	25	28
1.1 Mechanical	10	-	10	-	10	-	10	-	10	10
1.11 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.12 coniferous	..	-	..	-	..	-	..	-	..	..
1.2 Thermo-mechanical	..	-	..	-	..	-	..	-	..	..
1.21 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.22 coniferous	..	-	..	-	..	-	..	-	..	..
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	15	18
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	15	18
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	15	18
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	10	-	10	-	10	-	10	-	25	28
2.1 Straw	10	-	10	-	10	-	10	-	10	10
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	15	18
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

a/ Secretariat estimate.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

69 Country: VIET-NAM, SOCIALIST REPUBLIC a/

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	62	62	62	95	101	106
4.1 Newsprint	-	-	-	15	18	20
4.2 Other printing + writing, total	37	37	37	52	55	57
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	37	37	37	52	55	57
4.22.1 Wood containing	10	10	10	10	10	10
4.22.2 Wood free	27	27	27	42	45	47
4.3 Other paper + paperboard, total	25	25	25	28	28	29
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	25	25	25	28	28	29
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	25	25	25	28	28	29
4.32.51 Wrapping paper	25	25	25	28	28	29
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

a/ Secretariat estimate.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

70 Country: ALBANIA (a)

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp*, total	10	-	10	-	10	-	10	-	10	10
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	10	-	10	-	10	-	10	-	10	10
1.41 Unbleached sulphite	..	-	..	-	..	-	..	-	..	..
1.41.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.41.2 coniferous	..	-	..	-	..	-	..	-	..	..
1.42 Bleached sulphite x	..	-	..	-	..	-	..	-	..	..
1.42.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.42.2 coniferous	..	-	..	-	..	-	..	-	..	..
1.43 Unbl. sulphate-soda	..	-	..	-	..	-	..	-	..	..
1.43.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.43.2 coniferous	..	-	..	-	..	-	..	-	..	..
1.44 Bl. sulphate-soda x	..	-	..	-	..	-	..	-	..	..
1.44.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.44.2 coniferous	..	-	..	-	..	-	..	-	..	..
2. Other fibre pulp*, total	5	-	5	-	5	-	5	-	5	5
2.1 Straw	5	-	5	-	5	-	5	-	5	5
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ϕ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

* for making paper + paperboard

x including semi-bleached

 ϕ of wood + other raw materials.

(a) Secretariat Estimate

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

70 Country: ALBANIA (a)

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	15	15	15	15	15	15
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	7	7	7	7	7	7
4.21 Coated	..	..	..	..	..	..
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	..	..	..	..	..	..
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	8	8	8	8	8	8
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	8	8	8	8	8	8
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	-	-	-	-	-	-
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	-	-	-	-	-	-
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	8	8	8	8	8	8
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	8	8	8	8	8	8
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

(a) Secretariat estimate.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

71 Country: AUSTRIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp [†] , total	1,170	254	1,240	324	1,255	339	1,255	339	1,255	1,255
1.1 Mechanical	230	1	230	1	230	1	230	1	230	230
1.11 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.12 coniferous	..	..	..	..	..	..	..	..	..	..
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	60	8	60	8	60	8	60	8	60	60
1.31 of which non-coniferous	60	8	60	8	60	8	60	8	60	60
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	880	245	950	315	965	330	965	330	965	965
1.41 Unbleached sulphite	46	9	46	9	46	9	46	9	46	46
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	46	9	46	9	46	9	46	9	46	46
1.42 Bleached sulphite ^x	541	193	611	263	626	278	626	278	626	626
1.42.1 of which non-coniferous	127	8	127	10	127	10	127	10	127	127
1.42.2 coniferous	414	185	484	253	499	268	499	268	499	499
1.43 Unbl. sulphate+soda	285	42	285	42	285	42	285	42	285	285
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	285	42	285	42	285	42	285	42	285	285
1.44 Bl. sulphate-soda ^x	8	1	8	1	8	1	8	1	8	8
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	8	1	8	1	8	1	8	1	8	8
2. Other fibre pulp [†] , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp [‡]	141	11	141	11	141	11	141	11	141	141
3.1 of which non-coniferous	139	9	139	9	139	9	139	9	139	139
3.2 coniferous	2	2	2	2	2	2	2	2	2	2

[†] for making paper + paperboard

^x including semi-bleached

[‡] of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

71 Country: AUSTRIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	1,720	1,745	1,745	1,745	1,745	1,745
4.1 Newsprint	193	193	193	193	193	193
4.2 Other printing + writing, total	723	723	723	723	723	723
4.21 Coated	241	241	241	241	241	241
4.21.1 Wood containing	35	35	35	35	35	35
4.21.2 Wood free	206	206	206	206	206	206
4.22 Uncoated	482	482	482	482	482	482
4.22.1 Wood containing	187	187	187	187	187	187
4.22.2 Wood free	295	295	295	295	295	295
4.3 Other paper + paperboard, total	804	829	829	829	829	829
4.31 Household + sanitary	84	84	84	84	84	84
4.32 Wrapping + packaging, total	647	672	672	672	672	672
4.32.1 Linerboard	93	93	93	93	93	93
4.32.11 Kraft liner	93	93	93	93	93	93
4.32.11.1 Unbleached	93	93	93	93	93	93
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	118	143	143	143	143	143
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	159	159	159	159	159	159
4.32.31 Sack kraft	112	112	112	112	112	112
4.32.32 Other kraft wrapping + packaging	47	47	47	47	47	47
4.32.4 Folding boxboard	240	240	240	240	240	240
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	37	37	37	37	37	37
4.32.51 Wrapping paper	31	31	31	31	31	31
4.32.52 Packaging paperboard	6	6	6	6	6	6
4.33 Other paper + board, n.e.s. total	73	73	73	73	73	73
4.33.1 Paper, n.e.s.	38	38	38	38	38	38
4.33.2 Paperboard, n.e.s.	35	35	35	35	35	35

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

72 Country: BELGIUM

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp*, total	420	206	420	206	430	216	430	216	430	430
1.1 Mechanical	147	-	147	-	147	-	147	-	147	147
1.11 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.12 coniferous	..	-	..	-	..	-	..	-	..	..
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	273	206	273	206	283	216	283	216	283	283
1.41 Unbleached sulphite	10	2	10	2	10	2	10	2	10	10
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	10	2	10	2	10	2	10	2	10	10
1.42 Bleached sulphite x	35	4	35	4	35	4	35	4	35	35
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	35	4	35	4	35	4	35	4	35	35
1.43 Unbl. sulphate-soda	28	-	28	-	28	-	28	-	28	28
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	28	-	28	-	28	-	28	-	28	28
1.44 Bl. sulphate-soda x	200	200	200	200	210	210	210	210	210	210
1.44.1 of which non-coniferous	200	200	200	200	210	210	210	210	210	210
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp*, total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ϕ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

* for making paper + paperboard

x including semi-bleached

 ϕ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

72 Country: BELGIUM

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	867	930	960	973	983	1,011
4.1 Newsprint	112	113	113	113	113	113
4.2 Other printing + writing, total	421	449	453	456	457	458
4.21 Coated	132	134	136	137	138	139
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	289	315	317	319	319	319
4.22.1 Wood containing	127	149	149	149	149	149
4.22.2 Wood free	162	166	168	170	170	170
4.3 Other paper + paperboard, total	334	368	394	404	413	440
4.31 Household + sanitary	84	96	99	99	102	108
4.32 Wrapping + packaging, total	201	222	244	254	259	279
4.32.1 Linerboard	55	75	84	94	99	119
4.32.11 Kraft liner	5	15	20	25	30	35
4.32.11.1 Unbleached	5	10	10	10	10	10
4.32.11.1 Bleached	-	5	10	15	20	25
4.32.12 Other linerboard	50	60	64	69	69	84
4.32.2 Fluting medium	36	36	44	44	44	44
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	36	36	44	44	44	44
4.32.3 Kraft wrapping + packaging	15	15	20	20	20	20
4.32.31 Sack kraft	10	10	15	15	15	15
4.32.32 Other kraft wrapping + packaging	5	5	5	5	5	5
4.32.4 Folding boxboard	25	26	26	26	26	26
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	70	70	70	70	70	70
4.32.51 Wrapping paper	70	70	70	70	70	70
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	49	50	51	51	52	53
4.33.1 Paper, n.e.s.	9	10	10	10	11	12
4.33.2 Paperboard, n.e.s.	40	40	41	41	41	41

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

73 Country: BULGARIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp*, total	262	102	267	107	267	107	275	107	275	275
1.1 Mechanical	17	7	17	7	17	7	25	7	25	25
1.11 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.12 coniferous	..	..	..	..	..	..	..	..	..	..
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	90	50	90	50	90	50	90	50	90	90
1.31 of which non-coniferous	90	50	90	50	90	50	90	50	90	90
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	155	45	160	50	160	50	160	50	160	160
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate+soda	155	45	160	50	160	50	160	50	160	160
1.43.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.43.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.44 Bl. sulphate-soda x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp*, total	28	16	28	16	28	16	28	16	28	28
2.1 Straw	28	16	28	16	28	16	28	16	28	28
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ϕ	40	-	40	-	40	-	40	-	40	40
3.1 of which non-coniferous	40	-	40	-	40	-	40	-	40	40
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

* for making paper + paperboard

x including semi-bleached

 ϕ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

73 Country: BULGARIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	424	449	496	537	592	592
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	78	78	78	108	108	108
4.21 Coated	6	6	6	36	36	36
4.21.1 Wood containing	-	-	-	30	30	30
4.21.2 Wood free	6	6	6	6	6	6
4.22 Uncoated	72	72	72	72	72	72
4.22.1 Wood containing	12	12	12	12	12	12
4.22.2 Wood free	60	60	60	60	60	60
4.3 Other paper + paperboard, total	346	371	418	429	484	484
4.31 Household + sanitary	7	7	7	7	28	28
4.32 Wrapping + packaging, total	302	327	380	380	414	414
4.32.1 Linerboard	95	95	95	95	95	95
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	95	95	95	95	95	95
4.32.2 Fluting medium	73	73	129	129	144	144
4.32.21 Semi-chemical	60	60	60	60	75	75
4.32.22 Other fluting medium	13	13	69	69	69	69
4.32.3 Kraft wrapping + packaging	56	56	56	56	56	56
4.32.31 Sack kraft	40	40	40	40	40	40
4.32.32 Other kraft wrapping + packaging	16	16	16	16	16	16
4.32.4 Folding boxboard	52	52	52	52	52	52
4.32.41 Pulp based	27	27	27	27	27	27
4.32.41.1 Bleached chemical	2	2	2	2	2	2
4.32.41.2 Other pulp based	25	25	25	25	25	25
4.32.42 Waste paper based	25	25	25	25	25	25
4.32.5 Other wrapping + packaging n.e.s.	26	51	48	48	67	67
4.32.51 Wrapping paper	26	51	48	48	67	67
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	37	37	31	42	42	42
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	37	37	31	42	42	42

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

74 Country: CZECHOSLOVAKIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	879	216	869	199	961	203	1,021	222	1,104	1,104
1.1 Mechanical	179	2	179	2	179	2	179	2	179	179
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	179	2	179	2	179	2	179	2	179	179
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	127	-	127	-	127	-	127	-	127	127
1.31 of which non-coniferous	127	-	127	-	127	-	127	-	127	127
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	573	214	563	197	655	201	715	220	798	798
1.41 Unbleached sulphite	159	54	129	25	129	25	116	20	116	116
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	159	54	129	25	129	25	116	20	116	116
1.42 Bleached sulphite ^x	120	56	128	56	227	67	189	65	193	193
1.42.1 of which non-coniferous	-	-	-	-	13	-	24	-	60	60
1.42.2 coniferous	120	56	128	56	214	67	165	65	133	133
1.43 Unbl. sulphate-soda	190	-	190	-	190	-	190	-	190	190
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	190	-	190	-	190	-	190	-	190	190
1.44 Bl. sulphate-soda ^x	104	104	116	116	109	109	220	135	299	299
1.44.1 of which non-coniferous	4	4	16	16	9	9	120	35	114	114
1.44.2 coniferous	100	100	100	100	100	100	100	100	185	185
2. Other fibre pulp ^a , total	25	1	25	1	25	1	25	1	25	25
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	25	1	25	1	25	1	25	1	25	25
3. Dissolving pulp ^ø	71	68	72	69	89	87	61	58	62	62
3.1 of which non-coniferous	29	27	43	41	69	67	40	38	41	41
3.2 coniferous	42	41	29	28	20	20	21	20	21	21

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

74 Country: CZECHOSLOVAKIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4 Paper + paperboard, total	1,286	1,294	1,294	1,294	1,303	1,303
4.1 Newsprint	80	80	80	80	80	80
4.2 Other printing + writing, total	244	244	244	244	244	244
4.21 Coated	21	28	31	31	31	31
4.21.1 Wood containing	14	14	14	14	14	14
4.21.2 Wood free	7	14	17	17	17	17
4.22 Uncoated	223	216	213	213	213	213
4.22.1 Wood containing	93	93	93	93	93	93
4.22.2 Wood free	130	123	120	120	120	120
4.3 Other paper + paperboard, total	962	970	970	970	979	979
4.31 Household + sanitary	41	41	41	41	50	50
4.32 Wrapping + packaging, total	792	800	800	800	800	800
4.32.1 Linerboard	52	60	60	60	60	60
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	52	60	60	60	60	60
4.32.2 Fluting medium	162	162	162	162	162	162
4.32.21 Semi-chemical	150	150	150	150	150	150
4.32.22 Other fluting medium	12	12	12	12	12	12
4.32.3 Kraft wrapping + packaging	165	165	165	165	165	165
4.32.31 Sack kraft	146	146	146	146	146	146
4.32.32 Other kraft wrapping + packaging	19	19	19	19	19	19
4.32.4 Folding boxboard	26	26	26	26	26	26
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	26	26	26	26	26	26
4.32.5 Other wrapping + packaging n.e.s.	387	387	387	387	387	387
4.32.51 Wrapping paper	119	119	119	119	119	119
4.32.52 Packaging paperboard	268	268	268	268	268	268
4.33 Other paper + board, n.e.s. total	129	129	129	129	129	129
4.33.1 Paper, n.e.s.	63	63	63	63	63	63
4.33.2 Paperboard, n.e.s.	66	66	66	66	66	66

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

75 Country: DENMARK

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	107	100	107	100	107	100	107	100	107	107
1.1 Mechanical	7	-	7	-	7	-	7	-	7	7
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	7	-	7	-	7	-	7	-	7	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	100	100	100	100	100	100	100	100	100	100
1.31 of which non-coniferous	100	100	100	100	100	100	100	100	100	100
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	75	75	75	75	75	75	75	75	75	75
2.1 Straw	45	45	45	45	45	45	45	45	45	45
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	30	30	30	30	30	30	30	30	30	30
3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

75 Country: DENMARK

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	330	317	304	304	304	304
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	150	150	150	150	150	150
4.21 Coated	28	28	28	28	28	28
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	122	122	122	122	122	122
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	180	167	154	154	154	154
4.31 Household + sanitary	15	15	15	15	15	15
4.32 Wrapping + packaging, total	161	148	135	135	135	135
4.32.1 Linerboard	48	38	28	28	28	28
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	48	38	28	28	28	28
4.32.2 Fluting medium	58	58	58	58	58	58
4.32.21 Semi-chemical	28	28	28	28	28	28
4.32.22 Other fluting medium	30	30	30	30	30	30
4.32.3 Kraft wrapping + packaging	16	16	16	16	16	16
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	16	16	16	16	16	16
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	39	36	33	33	33	33
4.32.51 Wrapping paper	15	15	15	15	15	15
4.32.52 Packaging paperboard	24	21	18	18	18	18
4.33 Other paper + board, n.e.s. total	4	4	4	4	4	4
4.33.1 Paper, n.e.s.	4	4	4	4	4	4
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

76 Country FINLAND

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1 Wood pulp ^a , total	7730	2220	7815	2220	7905	2210	8135	2230	8325	8355
1.1 Mechanical	2440	50	2440	50	2440	50	2520	50	2640	2650
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	2440	50	2440	50	2440	50	2520	50	2640	2650
1.2 Thermo-mechanical	380	-	400	-	400	-	500	-	560	570
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	380	-	400	-	400	-	500	-	560	570
1.3 Semi-chemical	340	-	340	-	350	-	350	-	350	350
1.31 of which non-coniferous	340	-	340	-	350	-	350	-	350	350
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	4570	2170	4635	2170	4715	2160	4765	2180	4775	4785
1.41 Unbleached sulphite	410	150	300	100	300	115	300	115	300	300
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	410	150	300	100	300	115	300	115	300	300
1.42 Bleached sulphite ^x	420	230	350	190	365	210	365	210	365	365
1.42.1 of which non-coniferous	60	30	45	30	45	30	45	30	45	45
1.42.2 coniferous	360	200	305	160	320	180	320	180	320	320
1.43 Bl. sulphate-soda	1320	290	1250	265	1190	225	1180	225	1180	1180
1.43.1 of which non-coniferous	30	25	35	30	35	30	35	30	35	35
1.43.2 coniferous	1290	265	1215	235	1155	195	1145	195	1145	1145
1.44 Bl. sulphate soda ^x	2420	1500	2735	1615	2860	1610	2920	1630	2930	2940
1.44.1 of which non-coniferous	1030	720	1235	830	1240	810	1240	810	1245	1250
1.44.2 coniferous	1390	780	1500	785	1620	800	1680	820	1685	1690
2 Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3 Dissolving pulp ^b	310	310	310	310	310	310	310	310	310	310
3.1 of which non-coniferous	65	65	65	65	65	65	65	65	65	65
3.2 coniferous	245	245	245	245	245	245	245	245	245	245

^a for making paper + paperboard

^x including semi-bleached

^b of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

76 Country: FINLAND

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	6,250	6,360	6,390	6,510	6,765	7,035
4.1 Newsprint	1,390	1,400	1,420	1,470	1,570	1,620
4.2 Other printing + writing, total	2,295	2,350	2,445	2,535	2,665	2,865
4.21 Coated	540	560	565	570	665	795
4.21.1 Wood containing	470	485	490	495	590	720
4.21.2 Wood free	70	75	75	75	75	75
4.22 Uncoated	1,755	1,790	1,880	1,965	2,000	2,070
4.22.1 Wood containing	1,395	1,430	1,450	1,510	1,535	1,570
4.22.2 Wood free	360	360	430	455	465	500
4.3 Other paper + paperboard, total	2,565	2,610	2,525	2,505	2,530	2,550
4.31 Household + sanitary	150	150	160	165	170	170
4.32 Wrapping + packaging, total	2,005	2,045	1,915	1,890	1,910	1,930
4.32.1 Linerboard	510	505	345	345	345	345
4.32.11 Kraft liner	490	490	340	340	340	340
4.32.11.1 Unbleached	385	385	255	255	255	255
4.32.11.1 Bleached	105	105	85	85	85	85
4.32.12 Other linerboard	20	15	5	5	5	5
4.32.2 Fluting medium	290	300	300	310	310	310
4.32.21 Semi-chemical	290	300	300	310	310	310
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	425	425	425	375	360	360
4.32.31 Sack kraft	315	315	315	265	250	250
4.32.32 Other kraft wrapping + packaging	110	110	110	110	110	110
4.32.4 Folding boxboard	585	620	630	635	660	680
4.32.41 Pulp based	495	530	530	535	560	580
4.32.41.1 Bleached chemical	205	235	235	235	240	240
4.32.41.2 Other pulp based	290	295	295	300	320	340
4.32.42 Waste paper based	90	90	100	100	100	100
4.32.5 Other wrapping + packaging n.e.s.	195	195	215	225	235	235
4.32.51 Wrapping paper	65	65	65	65	65	65
4.32.52 Packaging paperboard	130	130	150	160	170	170
4.33 Other paper + board, n.e.s. total	410	415	450	450	450	450
4.33.1 Paper, n.e.s.	280	285	315	315	315	315
4.33.2 Paperboard, n.e.s.	130	130	135	135	135	135

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

77 Country: FRANCE

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	2040	570	2080	585	2180	600	2330	670	2400	2400
1.1 Mechanical (a)	530	5	545	5	570	5	570	5	570	570
1.11 of which non-coniferous	15	-	15	-	20	-	20	-	20	20
1.12 coniferous	515	5	530	5	550	5	550	5	550	550
1.2 Thermo-mechanical	..	..	..	..	..	..	..	..	..	..
1.21 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.22 coniferous	..	..	..	..	..	..	..	..	..	..
1.3 Semi-chemical	235	-	235	-	250	-	260	-	270	270
1.31 of which non-coniferous	210	-	220	-	250	-	260	-	270	270
1.32 coniferous	25	-	15	-	-	-	-	-	-	-
1.4 Chemical, total	1275	565	1300	580	1360	595	1500	665	1560	1560
1.41 Unbleached sulphite	10	10	10	10	10	10	10	10	10	10
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	200	165	215	180	230	195	250	215	250	250
1.42.1 of which non-coniferous	50	15	50	15	50	15	50	15	50	50
1.42.2 coniferous	150	150	165	165	180	180	200	200	200	200
1.43 Unbl. sulphate-soda	475	-	475	-	500	-	550	-	550	550
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	475	-	475	-	500	-	550	-	550	550
1.44 Bl. sulphate-soda ^x	590	390	600	390	620	390	690	440	750	750
1.44.1 of which non-coniferous	440	290	450	290	470	290	490	290	500	500
1.44.2 coniferous	150	100	150	100	150	100	200	150	250	250
2. Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	120	120	120	120	120	120	120	120	120	120
3.1 of which non-coniferous	70	70	70	70	70	70	70	70	70	70
3.2 coniferous	50	50	50	50	50	50	50	50	50	50

^a for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

(a) Including Thermo-mechanical pulp

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

77 Country: FRANCE

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	5,405	5,515	5,705	5,785	5,810	5,830
4.1 Newsprint	332	332	337	342	355	375
4.2 Other printing + writing, total	1,850	1,895	1,950	1,960	1,970	1,970
4.21 Coated	670	675	710	720	730	730
4.21.1 Wood containing	360	360	360	370	380	380
4.21.2 Wood free	310	315	350	350	350	350
4.22 Uncoated	1,180	1,220	1,240	1,240	1,240	1,240
4.22.1 Wood containing	390	395	400	400	400	400
4.22.2 Wood free	790	825	840	840	840	840
4.3 Other paper + paperboard, total	3,223	3,288	3,418	3,483	3,485	3,485
4.31 Household + sanitary	165	165	170	210	210	210
4.32 Wrapping + packaging, total	2,750	2,800	2,925	2,955	2,955	2,955
4.32.1 Linerboard	940	960	1,030	1,030	1,030	1,030
4.32.11 Kraft liner	290	290	290	290	290	290
4.32.11.1 Unbleached	250	250	250	250	250	250
4.32.11.1 Bleached	40	40	40	40	40	40
4.32.12 Other linerboard	650	670	740	740	740	740
4.32.2 Fluting medium	545	550	575	575	575	575
4.32.21 Semi-chemical	300	300	300	300	300	300
4.32.22 Other fluting medium	245	250	275	275	275	275
4.32.3 Kraft wrapping + packaging	390	390	395	395	395	395
4.32.31 Sack kraft	140	140	140	140	140	140
4.32.32 Other kraft wrapping + packaging	250	250	255	255	255	255
4.32.4 Folding boxboard	335	350	360	375	375	375
4.32.41 Pulp based	135	140	145	150	150	150
4.32.41.1 Bleached chemical	35	35	35	35	35	35
4.32.41.2 Other pulp based	100	105	110	115	115	115
4.32.42 Waste paper based	200	210	215	225	225	225
4.32.5 Other wrapping + packaging n.e.s.	540	550	565	580	580	580
4.32.51 Wrapping paper	295	295	300	300	300	300
4.32.52 Packaging paperboard	245	255	265	280	280	280
4.33 Other paper + board, n.e.s. total	308	323	323	318	320	320
4.33.1 Paper, n.e.s.	243	258	258	253	255	255
4.33.2 Paperboard, n.e.s.	65	65	65	65	65	65

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

78 Country: GERMAN DEMOCRATIC REPUBLIC (a)

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ¹ , total	870	-	875	-	900	-	907	-	914	921
1.1 Mechanical	445	-	445	-	445	-	445	-	445	445
1.11 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.12 coniferous	..	-	..	-	..	-	..	-	..	..
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	..
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	..
1.22 coniferous	-	-	-	-	-	-	-	-	-	..
1.3 Semi-chemical	5	-	5	-	5	-	5	-	5	5
1.31 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.32 coniferous	..	-	..	-	..	-	..	-	..	..
1.4 Chemical, total	420	-	425	-	450	-	457	-	464	471
1.41 Unbleached sulphite	..	-	..	-	..	-	..	-	..	..
1.41.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.41.2 coniferous	..	-	..	-	..	-	..	-	..	..
1.42 Bleached sulphite ^x	..	-	..	-	..	-	..	-	..	..
1.42.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.42.2 coniferous	..	-	..	-	..	-	..	-	..	..
1.43 Unbl. sulphate-soda	..	-	..	-	..	-	..	-	..	..
1.43.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.43.2 coniferous	..	-	..	-	..	-	..	-	..	..
1.44 Bl. sulphate-soda ^x	..	-	..	-	..	-	..	-	..	..
1.44.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.44.2 coniferous	..	-	..	-	..	-	..	-	..	..

2. Other fibre pulp ¹ , total	53	-	57	-	61	-	65	-	69	73
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	53	-	57	-	61	-	65	-	69	73

3. Dissolving pulp ²	225	..	225	..	230	..	235	..	240	245
3.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
3.2 coniferous	..	..	..	..	..	..	..	..	..	..

¹ for making paper + paperboard

^x including semi-bleached

² of wood + other raw materials.

(a) Secretariat Estimate

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

78 Country: GERMAN DEMOCRATIC REPUBLIC (a)

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	1,455	1,485	1,515	1,545	1,575	1,600
4.1 Newsprint	165	165	165	165	165	165
4.2 Other printing + writing, total	285	295	300	310	320	325
4.21 Coated	..	..	..	..	..	..
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	..	..	..	..	..	..
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	1,005	1,025	1,050	1,070	1,090	1,110
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	1,005	1,025	1,050	1,070	1,090	1,110
4.32.1 Linerboard	..	..	..	..	..	..
4.32.11 Kraft liner	..	..	..	..	..	..
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	..	..	..	..	..	..
4.32.2 Fluting medium	..	..	..	..	..	..
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	..	..	..	..	..	..
4.32.31 Sack kraft	..	..	..	..	..	..
4.32.32 Other kraft wrapping + packaging	..	..	..	..	..	..
4.32.4 Folding boxboard	..	..	..	..	..	..
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	..	..	..	..	..	..
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

(a) Secretariat estimate

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

79 Country: GERMANY, FED, REP. OF

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	1,865	200	1,991	186	2,122	184	2,124	185	2,124	2,124
1.1 Mechanical	1,168	9	1,292	9	1,420	9	1,416	9	1,416	1,416
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	1,168	9	1,292	9	1,420	9	1,416	9	1,416	1,416
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	69	-	69	-	69	-	69	-	69	69
1.31 of which non-coniferous	69	-	69	-	69	-	69	-	69	69
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	628	191	630	177	633	175	639	176	639	639
1.41 Unbleached sulphite	45	27	38	20	38	20	38	20	38	38
1.41,1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41,2 coniferous	45	27	38	20	38	20	38	20	38	38
1.42 Bleached sulphite ^x	583	164	592	157	595	155	601	156	601	601
1.42,1 of which non-coniferous	126	26	127	27	127	28	128	28	128	128
1.42,2 coniferous	457	138	465	130	468	127	473	128	473	473
1.43 Unbl. sulphate+soda	-	-	-	-	-	-	-	-	-	-
1.43,1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43,2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate+soda ^x	-	-	-	-	-	-	-	-	-	-
1.44,1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44,2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^ø	189	189	192	192	192	192	195	195	195	195
3.1 of which non-coniferous	135	135	138	138	138	138	141	141	141	141
3.2 coniferous	54	54	54	54	54	54	54	54	54	54

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

79 Country: GERMANY, FED. REP. OF

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	8,434	8,759	9,187	9,386	9,622	9,760
4.1 Newsprint	645	661	835	883	952	990
4.2 Other printing + writing, total	2,878	2,957	3,103	3,207	3,353	3,410
4.21 Coated	1,057	1,063	1,117	1,177	1,224	1,260
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	1,821	1,894	1,986	2,030	2,129	2,150
4.22.1 Wood containing	826	885	932	976	1,065	1,080
4.22.2 Wood free	995	1,009	1,054	1,054	1,064	1,070
4.3 Other paper + paperboard, total	4,911	5,141	5,249	5,296	5,317	5,360
4.31 Household + sanitary	493	509	559	559	559	560
4.32 Wrapping + packaging, total	3,714	3,923	3,979	4,025	4,041	4,075
4.32.1 Linerboard	355	378	397	401	401	404
4.32.11 Kraft liner	1	1	1	1	1	1
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	354	377	396	400	400	403
4.32.2 Fluting medium	935	1,021	1,029	1,044	1,047	1,060
4.32.21 Semi-chemical	91	91	91	91	91	91
4.32.22 Other fluting medium	844	930	938	953	956	969
4.32.3 Kraft wrapping + packaging	193	196	203	207	208	212
4.32.31 Sack kraft	16	16	16	16	16	17
4.32.32 Other kraft wrapping + packaging	177	180	187	191	192	195
4.32.4 Folding boxboard	628	680	688	698	706	712
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	628	680	688	698	706	712
4.32.5 Other wrapping + packaging n.e.s.	1,603	1,648	1,662	1,675	1,679	1,687
4.32.51 Wrapping paper	880	924	932	934	935	940
4.32.52 Packaging paperboard	723	724	730	741	744	747
4.33 Other paper + board, n.e.s. total	704	709	711	712	717	725
4.33.1 Paper, n.e.s.	461	464	465	465	470	474
4.33.2 Paperboard, n.e.s.	243	245	246	247	247	251

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

80 Country: GREECE

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	90	-	90	-	90	-	90	-	90	90
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	90	-	90	-	90	-	90	-	90	90
1.21 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.22 coniferous	..	-	..	-	..	-	..	-	..	..
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	32	-	32	-	32	-	32	-	32	32
2.1 Straw	..	-	..	-	..	-	..	-	..	..
2.2 Bagasse	..	-	..	-	..	-	..	-	..	..
2.3 Bamboo	..	-	..	-	..	-	..	-	..	..
2.4 Other	..	-	..	-	..	-	..	-	..	..
3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

80 Country: GREECE

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	507	516	516	516	516	516
4.1 Newsprint	50	50	50	50	50	50
4.2 Other printing + writing, total	221	230	230	230	230	230
4.21 Coated	..	..	..	..	..	..
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	..	..	..	..	..	..
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	236	236	236	236	236	236
4.31 Household + sanitary	106	106	106	106	106	106
4.32 Wrapping + packaging, total	105	105	105	105	105	105
4.32.1 Linerboard	6	6	6	6	6	6
4.32.11 Kraft liner	6	6	6	6	6	6
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	11	11	11	11	11	11
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	6	6	6	6	6	6
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	6	6	6	6	6	6
4.32.4 Folding boxboard	48	48	48	48	48	48
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	34	34	34	34	34	34
4.32.51 Wrapping paper	34	34	34	34	34	34
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	25	25	25	25	25	25
4.33.1 Paper, n.e.s.	20	20	20	20	20	20
4.33.2 Paperboard, n.e.s.	5	5	5	5	5	5

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

81 Country: HUNGARY

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	107	-	113	-	116	-	116	-	116	116
1.1 Mechanical	25	-	25	-	25	-	25	-	25	25
1.11 of which non-coniferous	8	-	8	-	8	-	8	-	8	8
1.12 coniferous	17	-	17	-	17	-	17	-	17	17
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	63	-	69	-	77	-	77	-	77	77
1.31 of which non-coniferous	63	-	69	-	77	-	77	-	77	77
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	19	-	19	-	14	-	14	-	14	14
1.41 Unbleached sulphite	19	-	19	-	14	-	14	-	14	14
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	19	-	19	-	14	-	14	-	14	14
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ^a , total	22	2	22	2	22	2	22	2	22	22
2.1 Straw	22	2	22	2	22	2	22	2	22	22
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

81 Country: HUNGARY

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	432	444	448	449	449	449
4.1 Newsprint	-	-	-	-	-	-
4.2 Other printing + writing, total	104	116	116	116	116	116
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	104	116	116	116	116	116
4.22.1 Wood containing	44	56	56	56	56	56
4.22.2 Wood free	60	60	60	60	60	60
4.3 Other paper + paperboard, total	328	328	332	333	333	333
4.31 Household + sanitary	16	19	19	19	19	19
4.32 Wrapping + packaging, total	283	279	283	284	284	284
4.32.1 Linerboard	16	20	20	20	20	20
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	16	20	20	20	20	20
4.32.2 Fluting medium	127	130	130	130	130	130
4.32.21 Semi-chemical	53	60	60	60	60	60
4.32.22 Other fluting medium	74	70	70	70	70	70
4.32.3 Kraft wrapping + packaging	40	40	40	40	40	40
4.32.31 Sack kraft	40	40	40	40	40	40
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	30	30	30	30	30	30
4.32.41 Pulp based	10	10	10	10	10	10
4.32.41.1 Bleached chemical	5	5	5	5	5	5
4.32.41.2 Other pulp based	5	5	5	5	5	5
4.32.42 Waste paper based	20	20	20	20	20	20
4.32.5 Other wrapping + packaging n.e.s.	70	59	63	64	64	64
4.32.51 Wrapping paper	20	12	16	17	17	17
4.32.52 Packaging paperboard	50	47	47	47	47	47
4.33 Other paper + board, n.e.s. total	29	30	30	30	30	30
4.33.1 Paper, n.e.s.	11	12	12	12	12	12
4.33.2 Paperboard, n.e.s.	18	18	18	18	18	18

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

82 Country: IRELAND

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp, total	22	17	22	17	22	17	22	17	22	22
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	22	17	22	17	22	17	22	17	22	22
1.21 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.22 coniferous	..	..	..	..	..	..	..	..	..	..
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Publ. sulphate soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate soda x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp, total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

.. for making paper + paperboard

x including semi-bleached

ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

82 Country: IRELAND

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	80	94	96	97	98	98
4.1 Newsprint	1	1	1	1	1	1
4.2 Other printing + writing, total	18	18	18	18	18	18
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	18	18	18	18	18	18
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	61	75	77	78	79	79
4.31 Household + sanitary	-	-	-	-	-	-
4.32 Wrapping + packaging, total	53	60	62	63	64	64
4.32.1 Linerboard	3	3	3	3	3	3
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	3	3	3	3	3	3
4.32.2 Fluting medium	13	20	22	22	23	23
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	13	20	22	22	23	23
4.32.3 Kraft wrapping + packaging	11	11	11	12	12	12
4.32.31 Sack kraft	4	4	4	5	5	5
4.32.32 Other kraft wrapping + packaging	7	7	7	7	7	7
4.32.4 Folding boxboard	-	-	-	-	-	-
4.32.41 Pulp based	-	-	-	-	-	-
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	-	-	-	-	-	-
4.32.42 Waste paper based	-	-	-	-	-	-
4.32.5 Other wrapping + packaging n.e.s.	26	26	26	26	26	26
4.32.51 Wrapping paper	4	4	4	4	4	4
4.32.52 Packaging paperboard	22	22	22	22	22	22
4.33 Other paper + board, n.e.s. total	8	15	15	15	15	15
4.33.1 Paper, n.e.s.	8	15	15	15	15	15
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

83 Country: ITALY

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	1,160	..	1,160	..	1,160	..	1,160	..	1,160	1,160
1.1 Mechanical	670	..	670	..	670	..	670	..	670	670
1.11 of which non-coniferous	-	..	-	..	-	..	-	..	-	-
1.12 coniferous	-	..	-	..	-	..	-	..	-	-
1.2 Thermo-mechanical	..	..	..	..	..	..	..	..	..	..
1.21 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.22 coniferous	..	..	..	..	..	..	..	..	..	..
1.3 Semi-chemical	220	..	220	..	220	..	220	..	220	220
1.31 of which non-coniferous	-	..	-	..	-	..	-	..	-	-
1.32 coniferous	-	..	-	..	-	..	-	..	-	-
1.4 Chemical, total	270	..	270	..	270	..	270	..	270	270
1.41 Unbleached sulphite	..	..	..	..	..	..	..	..	..	..
1.41.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.41.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.42 Bleached sulphite ^x	..	..	..	..	..	..	..	..	..	..
1.42.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.42.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.43 Unbl. sulphate-soda	..	..	..	..	..	..	..	..	..	..
1.43.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.43.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.44 Bl. sulphate-soda ^x	..	..	..	..	..	..	..	..	..	..
1.44.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.44.2 coniferous	..	..	..	..	..	..	..	..	..	..

2. Other fibre pulp ^a , total	435	-	435	-	435	-	435	-	435	435
2.1 Straw	420	-	420	-	420	-	420	-	420	420
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	15	-	15	-	15	-	15	-	15	15

3. Dissolving pulp ^φ	92	-	95	-	96	-	96	-	96	96
3.1 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
3.2 coniferous	..	-	..	-	..	-	..	-	..	..

^a for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

83 Country: ITALY

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	5,545	5,712	5,768	5,768	5,768	5,768
4.1 Newsprint	300	300	300	300	300	300
4.2 Other printing + writing, total	1,953	1,995	2,017	2,017	2,017	2,017
4.21 Coated
4.21.1 Wood containing
4.21.2 Wood free
4.22 Uncoated
4.22.1 Wood containing
4.22.2 Wood free
4.3 Other paper + paperboard, total	3,292	3,417	3,451	3,451	3,451	3,451
4.31 Household + sanitary
4.32 Wrapping + packaging, total
4.32.1 Linerboard
4.32.11 Kraft liner
4.32.11.1 Unbleached
4.32.11.1 Bleached
4.32.12 Other linerboard
4.32.2 Fluting medium
4.32.21 Semi-chemical
4.32.22 Other fluting medium
4.32.3 Kraft wrapping + packaging
4.32.31 Sack kraft
4.32.32 Other kraft wrapping + packaging
4.32.4 Folding boxboard
4.32.41 Pulp based
4.32.41.1 Bleached chemical
4.32.41.2 Other pulp based
4.32.42 Waste paper based
4.32.5 Other wrapping + packaging n.e.s.
4.32.51 Wrapping paper
4.32.52 Packaging paperboard
4.33 Other paper + board, n.e.s. total
4.33.1 Paper, n.e.s.
4.33.2 Paperboard, n.e.s.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

84 Country: NETHERLANDS

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	180	-	170	-	200	-	225	-	240	240
1.1 Mechanical	180	-	170	-	170	-	170	-	170	170
1.11 of which non-coniferous	20	-	20	-	20	-	20	-	20	20
1.12 coniferous	160	-	150	-	150	-	150	-	150	150
1.2 Thermo-mechanical	-	-	-	-	30	-	55	-	70	70
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	30	-	55	-	70	70
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	-	-	-	-	-	-	-	-	-	-
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate+soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-

2. Other fibre pulp ^a , total	47	-	8	-	8	-	8	-	8	8
2.1 Straw	45	-	6	-	6	-	6	-	6	6
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	2	-	2	-	2	-	2	-	2	2

3. Dissolving pulp ^b	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a including paper + paperboard

^x including semi-bleached

^b of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

84 Country: NETHERLANDS

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	2,038	1,900	2,019	2,019	2,019	2,024
4.1 Newsprint	144	141	190	190	190	195
4.2 Other printing + writing, total	648	646	716	716	716	716
4.21 Coated	224	222	222	222	222	222
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	424	424	494	494	494	494
4.22.1 Wood containing	84	85	136	136	136	136
4.22.2 Wood free	340	339	358	358	358	358
4.3 Other paper + paperboard, total	1,246	1,113	1,113	1,113	1,113	1,113
4.31 Household + sanitary	108	107	112	112	112	112
4.32 Wrapping + packaging, total	1,086	958	953	953	953	953
4.32.1 Linerboard	122	109	109	109	109	109
4.32.11 Kraft liner	21	17	17	17	17	17
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	21	17	17	17	17	17
4.32.12 Other linerboard	101	92	92	92	92	92
4.32.2 Fluting medium	293	246	241	241	241	241
4.32.21 Semi-chemical	27	11	11	11	11	11
4.32.22 Other fluting medium	266	235	230	230	230	230
4.32.3 Kraft wrapping + packaging	52	40	40	40	40	40
4.32.31 Sack kraft	-	-	-	-	-	-
4.32.32 Other kraft wrapping + packaging	52	40	40	40	40	40
4.32.4 Folding boxboard	145	152	152	152	152	152
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	474	411	411	411	411	411
4.32.51 Wrapping paper	56	44	44	44	44	44
4.32.52 Packaging paperboard	418	367	367	367	367	367
4.33 Other paper + board, n.e.s. total	52	48	48	48	48	48
4.33.1 Paper, n.e.s.	4	4	4	4	4	4
4.33.2 Paperboard, n.e.s.	48	44	44	44	44	44

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

85 Country: NORWAY

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	1,875	656	1,915	648	2,008	698	2,287	749	2,415	2,393
1.1 Mechanical	1,170	470	1,173	450	1,173	450	1,173	450	1,181	1,189
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	1,170	470	1,173	450	1,173	450	1,173	450	1,181	1,189
1.2 Thermo-mechanical	146	30	169	30	169	30	320	30	430	430
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	146	30	169	30	169	30	320	30	430	430
1.3 Semi-chemical	80	32	80	32	80	32	80	32	80	80
1.31 of which non-coniferous	80	32	80	32	80	32	80	32	80	80
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	479	124	493	136	586	186	714	237	724	694
1.41 Unbleached sulphite	97	25	92	25	109	35	77	10	77	77
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	97	25	92	25	109	35	77	10	77	77
1.42 Bleached sulphite ^x	182	97	181	89	192	89	187	87	187	187
1.42.1 of which non-coniferous	10	-	10	-	10	-	10	-	10	10
1.42.2 coniferous	172	97	171	89	182	89	177	87	177	177
1.43 Unbl. sulphate-soda	162	2	182	22	192	27	195	30	180	150
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	162	2	182	22	192	27	195	30	180	150
1.44 Bl. sulphate-soda ^x	38	-	38	-	93	35	255	110	280	280
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	38	-	38	-	93	35	255	110	280	280
2. Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^ø	110	82	120	91	125	96	125	95	125	125
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	110	82	120	91	125	96	125	95	125	125

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

85 Country: NORWAY

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	1,740	1,775	1,820	1,980	2,120	2,150
4.1 Newsprint	650	675	700	840	975	1,000
4.2 Other printing + writing, total	420	430	440	440	440	445
4.21 Coated	15	15	15	15	15	15
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	405	415	425	425	425	430
4.22.1 Wood containing	250	255	255	255	255	260
4.22.2 Wood free	155	160	170	170	170	170
4.3 Other paper + paperboard, total	670	670	680	700	705	705
4.31 Household + sanitary	40	40	40	40	40	40
4.32 Wrapping + packaging, total	610	610	620	640	645	645
4.32.1 Linerboard	40	40	40	45	45	45
4.32.11 Kraft liner	40	40	40	45	45	45
4.32.11.1 Unbleached	35	35	35	40	40	40
4.32.11.1 Bleached	5	5	5	5	5	5
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	80	80	80	80	85	85
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	165	165	165	180	180	180
4.32.31 Sack kraft	110	110	110	120	120	120
4.32.32 Other kraft wrapping + packaging	55	55	55	60	60	60
4.32.4 Folding boxboard	115	115	120	120	120	120
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	210	210	215	215	215	215
4.32.51 Wrapping paper	205	205	210	210	210	210
4.32.52 Packaging paperboard	5	5	5	5	5	5
4.33 Other paper + board, n.e.s. total	20	20	20	20	20	20
4.33.1 Paper, n.e.s.	10	10	10	10	10	10
4.33.2 Paperboard, n.e.s.	10	10	10	10	10	10

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

86 Country: POLAND

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp, total	833	-	833	-	941	-	1,035	-	1,062	1,105
1.1 Mechanical	166	-	166	-	166	-	166	-	166	166
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	166	-	166	-	166	-	166	-	166	166
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	82	-	88	-	107	-	133	-	141	144
1.31 of which non-coniferous	82	-	88	-	107	-	133	-	141	144
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	585	-	579	-	668	-	736	-	755	795
1.41 Unbleached sulphite	44	-	40	-	42	-	42	-	42	42
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	44	-	40	-	42	-	42	-	42	42
1.42 Bleached sulphite ^x	100	-	100	-	103	-	103	-	103	103
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	100	-	100	-	103	-	103	-	103	103
1.43 Unbl. sulphate-soda	376	-	366	-	382	-	382	-	382	422
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	376	-	366	-	382	-	382	-	382	422
1.44 Bl. sulphate soda ^x	65	-	73	-	141	-	209	-	228	228
1.44.1 of which non-coniferous	5	-	6	-	52	-	65	-	73	73
1.44.2 coniferous	60	-	67	-	89	-	144	-	155	155
2. Other fibre pulp, total	25	-	21	-	21	-	21	-	21	21
2.1 Straw	23	-	19	-	19	-	19	-	19	19
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	2	-	2	-	2	-	2	-	2	2
3. Dissolving pulp ^ø	73	-	73	-	73	-	73	-	73	73
3.1 of which non-coniferous	61	-	61	-	61	-	61	-	61	61
3.2 coniferous	12	-	12	-	12	-	12	-	12	12

- for making paper + paperboard

x including semi-bleached

ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

86 Country: POLAND

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	1,438	1,446	1,456	1,536	1,619	1,736
4.1 Newsprint	90	90	90	90	95	100
4.2 Other printing + writing, total	250	250	260	340	360	420
4.21 Coated	18	18	18	18	18	18
4.21.1 Wood containing	10	10	10	10	10	10
4.21.2 Wood free	8	8	8	8	8	8
4.22 Uncoated	232	232	242	322	342	402
4.22.1 Wood containing	85	85	95	139	149	196
4.22.2 Wood free	147	147	147	183	193	206
4.3 Other paper + paperboard, total	1,098	1,106	1,106	1,106	1,164	1,216
4.31 Household + sanitary	104	104	104	104	104	104
4.32 Wrapping + packaging, total	842	851	851	851	909	961
4.32.1 Linerboard	173	173	173	173	173	173
4.32.11 Kraft liner	60	60	60	60	60	60
4.32.11.1 Unbleached	60	60	60	60	60	60
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	113	113	113	113	113	113
4.32.2 Fluting medium	81	88	88	88	88	88
4.32.21 Semi-chemical	72	79	79	79	79	79
4.32.22 Other fluting medium	9	9	9	9	9	9
4.32.3 Kraft wrapping + packaging	262	262	262	262	282	282
4.32.31 Sack kraft	176	176	176	176	176	176
4.32.32 Other kraft wrapping + packaging	86	86	86	86	106	106
4.32.4 Folding boxboard	188	190	190	190	228	280
4.32.41 Pulp based	10	10	10	10	20	20
4.32.41.1 Bleached chemical	4	4	4	4	14	14
4.32.41.2 Other pulp based	6	6	6	6	6	6
4.32.42 Waste paper based	178	180	180	180	208	260
4.32.5 Other wrapping + packaging n.e.s.	138	138	138	138	138	138
4.32.51 Wrapping paper	135	135	135	135	135	135
4.32.52 Packaging paperboard	3	3	3	3	3	3
4.33 Other paper + board, n.e.s. total	152	151	151	151	151	151
4.33.1 Paper, n.e.s.	75	75	75	75	75	75
4.33.2 Paperboard, n.e.s.	77	76	76	76	76	76

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

87 Country: PORTUGAL

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^r , total	804	606	899	692	932	694	932	694	932	932
1.1 Mechanical	-	-	-	-	-	-	-	-	-	-
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	-	-	-	-	-	-	-	-	-	-
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	5	-	5	-	5	-	5	-	5	5
1.31 of which non-coniferous	5	-	5	-	5	-	5	-	5	5
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	799	606	894	692	927	694	927	694	927	927
1.41 Unbleached sulphite	2	2	3	3	3	3	3	3	3	3
1.41.1 of which non-coniferous	2	2	3	3	3	3	3	3	3	3
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	88	88	92	92	92	92	92	92	92	92
1.42.1 of which non-coniferous	88	88	92	92	92	92	92	92	92	92
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	256	75	256	75	296	75	296	75	296	296
1.43.1 of which non-coniferous	15	-	15	-	15	-	15	-	15	15
1.43.2 coniferous	241	75	241	75	281	75	281	75	281	281
1.44 Bl. sulphate-soda ^x	453	441	543	522	536	524	536	524	536	536
1.44.1 of which non-coniferous	430	419	511	499	513	501	513	501	513	513
1.44.2 coniferous	23	22	32	23	23	23	23	23	23	23
2. Other fibre pulp ^r , total	42	-	42	-	42	-	42	-	42	42
2.1 Straw	12	-	12	-	12	-	12	-	12	12
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	30	-	30	-	30	-	30	-	30	30
3. Dissolving pulp ^ø	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^r for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

87 Country PORTUGAL

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4 Paper + paperboard, total	545	554	595	640	640	640
4.1 Newsprint	2	2	2	2	2	2
4.2 Other printing + writing, total	99	100	100	115	115	115
4.21 Coated	9	10	10	10	10	10
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	9	10	10	10	10	10
4.22 Uncoated	90	90	90	105	105	105
4.22.1 Wood containing	14	15	15	20	20	20
4.22.2 Wood free	76	75	75	85	85	85
4.3 Other paper + paperboard, total	444	452	493	523	523	523
4.31 Household + sanitary	36	38	38	68	68	68
4.32 Wrapping + packaging, total	335	336	377	377	377	377
4.32.1 Linerboard	136	136	177	177	177	177
4.32.11 Kraft liner	136	136	177	177	177	177
4.32.11.1 Unbleached	136	136	177	177	177	177
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	48	48	48	48	48	48
4.32.21 Semi-chemical	-	-	-	-	-	-
4.32.22 Other fluting medium	48	48	48	48	48	48
4.32.3 Kraft wrapping + packaging	94	94	94	94	94	94
4.32.31 Sack kraft	36	36	36	36	36	36
4.32.32 Other kraft wrapping + packaging	58	58	58	58	58	58
4.32.4 Folding boxboard	57	58	58	58	58	58
4.32.41 Pulp based	37	38	38	38	38	38
4.32.41.1 Bleached chemical	12	12	12	12	12	12
4.32.41.2 Other pulp based	25	26	26	26	26	26
4.32.42 Waste paper based	20	20	20	20	20	20
4.32.43 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	73	78	78	78	78	78
4.33.1 Paper, n.e.s.	65	70	70	70	70	70
4.33.2 Paperboard, n.e.s.	8	8	8	8	8	8

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

88 Country: ROMANIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp†, total	700	37	710	37	794	37	818	37	830	830
1.1 Mechanical	118	-	128	-	128	-	128	-	128	128
1.11 of which non-coniferous	16	-	16	-	16	-	16	-	16	16
1.12 coniferous	102	-	112	-	112	-	112	-	112	112
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	44	-	44	-	44	-	44	-	44	44
1.31 of which non-coniferous	44	-	44	-	44	-	44	-	44	44
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	538	37	538	37	622	37	646	37	658	658
1.41 Unbleached sulphite	57	..	57	..	57	..	57	..	57	57
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	57	..	57	..	57	..	57	..	57	57
1.42 Bleached sulphite x	78	..	78	..	78	..	78	..	78	78
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	78	..	78	..	78	..	78	..	78	78
1.43 Unbl. sulphate-soda	208	..	208	..	292	..	316	..	328	328
1.43.1 of which non-coniferous	33	..	33	..	75	..	87	..	93	93
1.43.2 coniferous	175	..	175	..	217	..	229	..	235	235
1.44 Bl. sulphate-soda x	195	..	195	..	195	..	195	..	195	195
1.44.1 of which non-coniferous	95	..	95	..	95	..	95	..	95	95
1.44.2 coniferous	100	..	100	..	100	..	100	..	100	100

2. Other fibre pulp†, total	102	-	102	-	102	-	102	-	102	102
2.1 Straw	58	-	58	-	58	-	58	-	58	58
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	44	-	44	-	44	-	44	-	44	44

3. Dissolving pulp †	63	63	100	100	127	127	127	127	127	127
3.1 of which non-coniferous	63	63	100	100	127	127	127	127	127	127
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

† for making paper + paperboard

x including semi-bleached

† of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

88 Country: ROMANIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4 Paper + paperboard, total	841	868	1,002	1,040	1,059	1,059
4.1 Newsprint	125	133	133	133	133	133
4.2 Other printing + writing, total	140	140	175	185	190	190
4.21 Coated	6	6	6	6	6	6
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	6	6	6	6	6	6
4.22 Uncoated	134	134	169	179	184	184
4.22.1 Wood containing	50	50	50	50	50	50
4.22.2 Wood free	84	84	119	129	134	134
4.3 Other paper + paperboard, total	576	595	694	722	736	736
4.31 Household + sanitary	25	25	25	25	25	25
4.32 Wrapping + packaging, total	517	520	614	642	656	656
4.32.1 Linerboard	80	80	94	98	100	100
4.32.11 Kraft liner	80	80	94	98	100	100
4.32.11.1 Unbleached	80	80	94	98	100	100
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	60	60	144	168	180	180
4.32.21 Semi-chemical	40	40	40	40	40	40
4.32.22 Other fluting medium	20	20	104	128	140	140
4.32.3 Kraft wrapping + packaging	172	175	171	171	171	171
4.32.31 Sack kraft	91	92	94	94	94	94
4.32.32 Other kraft wrapping + packaging	81	83	77	77	77	77
4.32.4 Folding boxboard	119	119	119	119	119	119
4.32.41 Pulp based	70	70	70	70	70	70
4.32.41.1 Bleached chemical	30	30	30	30	30	30
4.32.41.2 Other pulp based	40	40	40	40	40	40
4.32.42 Waste paper based	49	49	49	49	49	49
4.32.5 Other wrapping + packaging n.e.s.	86	86	86	86	86	86
4.32.51 Wrapping paper	12	12	12	12	12	12
4.32.52 Packaging paperboard	74	74	74	74	74	74
4.33 Other paper + board, n.e.s. total	34	50	55	55	55	55
4.33.1 Paper, n.e.s.	18	29	30	30	30	30
4.33.2 Paperboard, n.e.s.	16	21	25	25	25	25

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

89 Country: SPAIN

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	1,417	530	1,417	530	1,417	530	1,417	530	1,417	1,417
1.1 Mechanical	328	63	328	63	328	63	328	63	328	328
1.11 of which non-coniferous	48	30	48	30	48	30	48	30	48	48
1.12 coniferous	280	33	280	33	280	33	280	33	280	280
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	100	-	100	-	100	-	100	-	100	100
1.31 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.32 coniferous	..	..	..	..	..	..	..	..	..	..
1.4 Chemical, total	989	467	989	467	989	467	989	467	989	989
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	15	15	15	15	15	15	15	15	15	15
1.42.1 of which non-coniferous	15	15	15	15	15	15	15	15	15	15
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	345	65	345	65	345	65	345	65	345	345
1.43.1 of which non-coniferous	5	5	5	5	5	5	5	5	5	5
1.43.2 coniferous	340	60	340	60	340	60	340	60	340	340
1.44 Bl. sulphate-soda ^x	629	387	629	387	629	387	629	387	629	629
1.44.1 of which non-coniferous	439	244	439	244	439	244	439	244	439	439
1.44.2 coniferous	190	143	190	143	190	143	190	143	190	190
2. Other fibre pulp ^a , total	280	31	280	31	280	31	280	31	280	280
2.1 Straw	240	-	240	-	240	-	240	-	240	240
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	40	31	40	31	40	31	40	31	40	40
3. Dissolving pulp ^φ	45	45	45	45	45	45	45	45	45	45
3.1 of which non-coniferous	45	45	45	45	45	45	45	45	45	45
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

89 Country: SPAIN

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	2,733	2,741	2,754	2,807	2,827	2,847
4.1 Newsprint	148	148	148	188	208	228
4.2 Other printing + writing, total	657	665	665	665	665	665
4.21 Coated	206	206	206	206	206	206
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	451	459	459	459	459	459
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	1,928	1,928	1,941	1,954	1,954	1,954
4.31 Household + sanitary	195	195	195	195	195	195
4.32 Wrapping + packaging, total	1,673	1,673	1,686	1,699	1,699	1,699
4.32.1 Linerboard	553	553	553	553	553	553
4.32.11 Kraft liner	140	140	140	140	140	140
4.32.11.1 Unbleached	120	120	120	120	120	120
4.32.11.1 Bleached	20	20	20	20	20	20
4.32.12 Other linerboard	413	413	413	413	413	413
4.32.2 Fluting medium	480	480	480	480	480	480
4.32.21 Semi-chemical	90	90	90	90	90	90
4.32.22 Other fluting medium	390	390	390	390	390	390
4.32.3 Kraft wrapping + packaging	190	190	190	190	190	190
4.32.31 Sack kraft	190	190	190	190	190	190
4.32.32 Other kraft wrapping + packaging	-	-	-	-	-	-
4.32.4 Folding boxboard	340	340	340	340	340	340
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	110	110	123	136	136	136
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	60	60	60	60	60	60
4.33.1 Paper, n.e.s.	47	47	47	47	47	47
4.33.2 Paperboard, n.e.s.	13	13	13	13	13	13

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

90 Country: SWEDEN

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	11,275	5,190	10,965	4,840	11,130	4,905	11,135	4,870	11,385	11,595
1.1 Mechanical	2,045	595	1,930	495	1,910	500	1,895	510	1,955	1,985
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	2,045	595	1,930	495	1,910	500	1,895	510	1,955	1,985
1.2 Thermo-mechanical	750	140	735	130	800	135	805	135	855	855
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	750	140	735	130	800	135	805	135	855	855
1.3 Semi-chemical	505	25	490	25	545	25	525	30	530	530
1.31 of which non-coniferous	470	25	455	25	510	25	510	30	510	510
1.32 coniferous	35	-	35	-	35	-	15	-	20	20
1.4 Chemical, total	7,975	4,430	7,810	4,190	7,875	4,245	7,910	4,195	8,045	8,225
1.41 Unbleached sulphite	520	170	500	145	505	145	460	150	460	420
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	520	170	500	145	505	145	460	150	460	420
1.42 Bleached sulphite ^x	815	580	735	555	575	415	575	415	575	610
1.42.1 of which non-coniferous	125	80	130	90	130	90	130	90	130	130
1.42.2 coniferous	690	500	605	465	445	325	445	325	445	480
1.43 Unbl. sulphate-soda	2,940	800	3,000	775	2,970	750	2,975	675	3,050	3,215
1.43.1 of which non-coniferous	30	10	65	10	90	10	90	10	90	90
1.43.2 coniferous	2,910	790	2,935	765	2,880	740	2,885	665	2,960	3,125
1.44 Bl. sulphate soda ^x	3,700	2,880	3,575	2,715	3,825	2,935	3,900	2,955	3,960	3,980
1.44.1 of which non-coniferous	910	665	955	605	960	600	965	590	990	990
1.44.2 coniferous	2,790	2,215	2,620	2,110	2,865	2,335	2,935	2,365	2,970	2,990
2. Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^ø	270	270	245	245	240	240	260	260	240	250
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	270	270	245	245	240	240	260	260	240	250

^a for making paper + paperboard

^x including semi-bleached

^ø of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

90 Country: SWEDEN

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	7,025	7,300	7,545	7,750	8,325	8,425
4.1 Newsprint	1,580	1,805	1,825	1,825	1,950	1,945
4.2 Other printing + writing, total	1,105	1,100	1,165	1,220	1,465	1,485
4.21 Coated	295	290	310	345	585	595
4.21.1 Wood containing	110	105	110	130	360	360
4.21.2 Wood free	185	185	200	215	225	235
4.22 Uncoated	810	810	855	875	880	890
4.22.1 Wood containing	335	325	340	355	360	360
4.22.2 Wood free	475	485	515	520	520	530
4.3 Other paper + paperboard, total	4,340	4,395	4,555	4,705	4,910	4,995
4.31 Household + sanitary	235	240	240	260	270	270
4.32 Wrapping + packaging, total	3,615	3,650	3,795	3,910	4,100	4,185
4.32.1 Linerboard	1,155	1,140	1,150	1,160	1,240	1,300
4.32.11 Kraft liner	1,115	1,120	1,130	1,135	1,215	1,275
4.32.11.1 Unbleached	1,020	1,025	1,035	1,040	1,120	1,180
4.32.11.1 Bleached	95	95	95	95	95	95
4.32.12 Other linerboard	40	20	20	25	25	25
4.32.2 Fluting medium	380	380	435	440	440	440
4.32.21 Semi-chemical	375	375	430	435	435	435
4.32.22 Other fluting medium	5	5	5	5	5	5
4.32.3 Kraft wrapping + packaging	1,160	1,175	1,215	1,280	1,370	1,370
4.32.31 Sack kraft	920	900	925	925	930	930
4.32.32 Other kraft wrapping + packaging	240	275	290	355	440	440
4.32.4 Folding boxboard	650	685	720	745	760	780
4.32.41 Pulp based	590	615	650	675	690	695
4.32.41.1 Bleached chemical	220	230	235	245	255	260
4.32.41.2 Other pulp based	370	385	415	430	435	435
4.32.42 Waste paper based	60	70	70	70	70	85
4.32.5 Other wrapping + packaging n.e.s.	270	270	275	285	290	295
4.32.51 Wrapping paper	140	135	135	145	145	150
4.32.52 Packaging paperboard	130	135	140	140	145	145
4.33 Other paper + board, n.e.s. total	490	505	520	535	540	540
4.33.1 Paper, n.e.s.	255	255	260	260	255	255
4.33.2 Paperboard, n.e.s.	235	250	260	275	285	285

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

91 Country: SWITZERLAND

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	310	120	310	120	310	120	310	120	310	310
1.1 Mechanical (a)	200	10	200	10	200	10	200	10	200	200
1.11 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.12 coniferous	..	..	..	..	..	..	..	..	..	..
1.2 Thermo-mechanical	..	..	..	..	..	..	..	..	..	..
1.21 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.22 coniferous	..	..	..	..	..	..	..	..	..	..
1.3 Semi-chemical	-	-	-	-	-	-	-	-	-	-
1.31 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	110	110	110	110	110	110	110	110	110	110
1.41 Unbleached sulphite	..	..	..	..	..	..	..	..	..	..
1.41.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.41.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.42 Bleached sulphite x	..	..	..	..	..	..	..	..	..	..
1.42.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.42.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

x including semi-bleached

^φ of wood + other raw materials.

(a) Including TMP

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

91 Country: SWITZERLAND

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper - paperboard, total	985	1,000	1,000	1,000	1,000	1,000
4.1 Newsprint	210	220	220	220	220	220
4.2 Other printing + writing, total	305	305	305	305	305	305
4.21 Coated	90	90	90	90	90	90
4.21.1 Wood containing	60	60	60	60	60	60
4.21.2 Wood free	30	30	30	30	30	30
4.22 Uncoated	215	215	215	215	215	215
4.22.1 Wood containing	100	100	100	100	100	100
4.22.2 Wood free	115	115	115	115	115	115
4.3 Other paper + paperboard, total	470	475	475	475	475	475
4.31 Household + sanitary	90	95	95	95	95	95
4.32 Wrapping + packaging, total	340	340	340	340	340	340
4.32.1 Linerboard	-	-	-	-	-	-
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	130	130	130	130	130	130
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	40	40	40	40	40	40
4.32.31 Sack kraft	20	20	20	20	20	20
4.32.32 Other kraft wrapping + packaging	20	20	20	20	20	20
4.32.4 Folding boxboard	70	70	70	70	70	70
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	100	100	100	100	100	100
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	100	100	100	100	100	100
4.33 Other paper + board, n.e.s. total	40	40	40	40	40	40
4.33.1 Paper, n.e.s.	40	40	40	40	40	40
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

92 Country: UNITED KINGDOM

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ⁺ , total	361	19	390	25	395	25	412	25	431	442
1.1 Mechanical	186	-	191	-	191	-	208	-	225	236
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	186	-	191	-	191	-	208	-	225	236
1.2 Thermo-mechanical	-	-	9	-	14	-	14	-	14	14
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	9	-	14	-	14	-	14	14
1.3 Semi-chemical	114	-	115	-	115	-	115	-	117	117
1.31 of which non-coniferous	114	-	115	-	115	-	115	-	117	117
1.32 coniferous	-	-	-	-	-	-	-	-	-	-
1.4 Chemical, total	61	19	75	25	75	25	75	25	75	75
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	61	19	75	25	75	25	75	25	75	75
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	61	19	75	25	75	25	75	25	75	75
1.43 Unbl. sulphate-soda	-	-	-	-	-	-	-	-	-	-
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.44 Bl. sulphate-soda ^x	-	-	-	-	-	-	-	-	-	-
1.44.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.44.2 coniferous	-	-	-	-	-	-	-	-	-	-
2. Other fibre pulp ⁺ , total	19	-	19	-	19	-	19	-	19	19
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	19	-	19	-	19	-	19	-	19	19
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

⁺ for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

92 Country: UNITED KINGDOM

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	4,718	4,838	4,999	5,150	5,232	5,281
4.1 Newsprint	377	381	381	381	381	381
4.2 Other printing + writing, total	1,200	1,207	1,250	1,280	1,295	1,299
4.21 Coated	352	349	376	387	391	391
4.21.1 Wood containing	37	18	15	15	15	15
4.21.2 Wood free	315	331	361	372	376	376
4.22 Uncoated	848	858	874	893	904	908
4.22.1 Wood containing	45	40	42	43	44	44
4.22.2 Wood free	803	818	832	850	860	864
4.3 Other paper + paperboard, total	3,141	3,250	3,368	3,489	3,556	3,601
4.31 Household + sanitary	406	438	449	476	482	491
4.32 Wrapping + packaging, total	2,243	2,329	2,407	2,490	2,548	2,581
4.32.1 Linerboard	352	378	415	424	425	426
4.32.11 Kraft liner	-	-	-	-	-	-
4.32.11.1 Unbleached	-	-	-	-	-	-
4.32.11.1 Bleached	-	-	-	-	-	-
4.32.12 Other linerboard	352	378	415	424	425	426
4.32.2 Fluting medium	531	558	575	593	599	602
4.32.21 Semi-chemical	171	165	166	168	171	172
4.32.22 Other fluting medium	360	393	409	425	428	430
4.32.3 Kraft wrapping + packaging	164	164	172	175	176	177
4.32.31 Sack kraft	45	42	40	40	40	40
4.32.32 Other kraft wrapping + packaging	119	122	132	135	136	137
4.32.4 Folding boxboard	418	439	447	481	513	534
4.32.41 Pulp based	109	116	117	148	179	200
4.32.41.1 Bleached chemical	-	-	-	-	-	-
4.32.41.2 Other pulp based	109	116	117	148	179	200
4.32.42 Waste paper based	309	323	330	333	334	334
4.32.5 Other wrapping + packaging n.e.s.	778	790	798	817	835	842
4.32.51 Wrapping paper	314	312	315	309	313	316
4.32.52 Packaging paperboard	464	478	483	508	522	526
4.33 Other paper + board, n.e.s. total	492	483	512	523	526	529
4.33.1 Paper, n.e.s.	260	265	273	277	280	282
4.33.2 Paperboard, n.e.s.	232	218	239	246	246	247

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

93C country: YUGOSLAVIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	614	..	623	..	625	..	682	..	698	706
1.1 Mechanical	135	..	141	..	143	..	144	..	144	144
1.11 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.12 coniferous	..	..	..	..	..	..	..	..	..	..
1.2 Thermo-mechanical	-	-	-	-	-	-	-	-	-	-
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	-	-	-	-	-	-	-	-	-	-
1.3 Semi-chemical	65	..	68	..	68	..	68	..	68	68
1.31 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.32 coniferous	..	..	..	..	..	..	..	..	..	..
1.4 Chemical, total	414	..	414	..	414	..	470	..	486	494
1.41 Unbleached sulphite	57	..	57	..	57	..	57	..	57	57
1.41.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.41.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.42 Bleached sulphite ^x	74	..	74	..	74	..	74	..	74	74
1.42.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.42.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.43 Unbl. sulphate-soda	156	..	156	..	156	..	156	..	156	156
1.43.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.43.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.44 Bl. sulphate-soda ^x	127	..	127	..	127	..	183	..	199	207
1.44.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.44.2 coniferous	..	..	..	..	..	..	..	..	..	..
2. Other fibre pulp ^a , total	8	-	22	-	26	-	28	-	28	28
2.1 Straw	8	-	22	-	26	-	28	-	28	28
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-
3. Dissolving pulp ^φ	101	..	105	..	105	..	105	..	105	105
3.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
3.2 coniferous	..	..	..	..	..	..	..	..	..	..

^a for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

93 Country: YUGOSLAVIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	988	1,091	1,175	1,233	1,247	1,251
4.1 Newsprint	120	120	120	120	120	120
4.2 Other printing + writing, total	307	321	327	327	327	327
4.21 Coated	..	..	..	..	..	..
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	..	..	..	..	..	..
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	561	650	728	786	800	804
4.31 Household + sanitary	29	31	31	59	67	71
4.32 Wrapping + packaging, total	431	517	595	625	631	631
4.32.1 Linerboard	..	..	..	..	..	..
4.32.11 Kraft liner	..	..	..	..	..	..
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	..	..	..	..	..	..
4.32.2 Fluting medium	..	..	..	..	..	..
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	..	..	..	..	..	..
4.32.31 Sack kraft	..	..	..	..	..	..
4.32.32 Other kraft wrapping + packaging	..	..	..	..	..	..
4.32.4 Folding boxboard	..	..	..	..	..	..
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	..	..	..	..	..	..
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	101	102	102	102	102	102
4.33.1 Paper, n.e.s.	..	..	..	..	..	..
4.33.2 Paperboard, n.e.s.	..	..	..	..	..	..

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

94 Country: AUSTRALIA

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp [†] , total	799	6	813	6	827	6	947	6	982	997
1.1 Mechanical	192	6	192	6	192	6	192	6	192	192
1.11 of which non-coniferous	126	-	126	-	126	-	126	-	126	126
1.12 coniferous	66	6	66	6	66	6	66	6	66	66
1.2 Thermo-mechanical	40	-	40	-	40	-	160	-	195	210
1.21 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.22 coniferous	40	-	40	-	40	-	160	-	195	210
1.3 Semi-chemical	331	-	331	-	331	-	331	-	331	331
1.31 of which non-coniferous	88	-	94	-	94	-	94	-	94	94
1.32 coniferous	243	-	237	-	237	-	237	-	237	237
1.4 Chemical, total	236	-	250	-	264	-	264	-	264	264
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	56	-	56	-	56	-	56	-	56	56
1.42.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.42.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.43 1fubl. sulphate-soda	65	-	65	-	65	-	65	-	65	65
1.43.1 of which non-coniferous	20	-	20	-	20	-	20	-	20	20
1.43.2 coniferous	45	-	45	-	45	-	45	-	45	45
1.44 Bl. sulphate-soda ^x	115	-	129	-	143	-	143	-	143	143
1.44.1 of which non-coniferous	115	-	118	-	121	-	121	-	121	121
1.44.2 coniferous	-	-	11	-	22	-	22	-	22	22
2. Other fibre pulp [†] , total	5	-	5	-	5	-	5	-	5	5
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	5	-	5	-	5	-	5	-	5	5
3. Dissolving pulp ^φ	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

[†] for making paper + paperboard

^x including semi-bleached

^φ of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

94 Country: AUSTRALIA

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	1,535	1,601	1,685	1,835	1,896	1,916
4.1 Newsprint	208	208	208	334	370	388
4.2 Other printing - writing, total	225	229	233	235	237	239
4.21 Coated	38	42	44	46	46	46
4.21.1 Wood containing	23	27	29	31	31	31
4.21.2 Wood free	15	15	15	15	15	15
4.22 Uncoated	187	187	189	189	191	193
4.22.1 Wood containing	15	10	9	7	8	9
4.22.2 Wood free	172	177	180	182	183	184
4.3 Other paper + paperboard, total	1,102	1,164	1,244	1,266	1,289	1,289
4.31 Household + sanitary	110	112	112	114	117	117
4.32 Wrapping + packaging, total	992	1,052	1,132	1,152	1,172	1,172
4.32.1 Linerboard	..	..	..	..	..	..
4.32.11 Kraft liner	..	..	..	..	..	..
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	..	..	..	..	..	..
4.32.2 Fluting medium	82	82	82	82	82	82
4.32.21 Semi-chemical	82	82	82	82	82	82
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	..	..	..	..	..	..
4.32.31 Sack kraft	..	..	..	..	..	..
4.32.32 Other kraft wrapping + packaging	..	..	..	..	..	..
4.32.4 Folding boxboard	..	..	..	..	..	..
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	..	..	..	..	..	..
4.32.51 Wrapping paper	..	..	..	..	..	..
4.32.52 Packaging paperboard	..	..	..	..	..	..
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

95 Country: NEW ZEALAND

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp ^a , total	1,291	595	1,307	604	1,354	637	1,362	643	1,470	1,477
1.1 Mechanical	555	215	558	215	558	215	558	215	558	558
1.11 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.12 coniferous	555	215	558	215	558	215	558	215	558	558
1.2 Thermo-mechanical	-	-	13	9	60	42	68	48	176	183
1.21 of which non-coniferous	-	-	..	..	..	..	..	..	..	..
1.22 coniferous	-	-	..	..	..	..	..	..	..	..
1.3 Semi-chemical	80	-	80	-	80	-	80	-	80	80
1.31 of which non-coniferous	71	-	71	-	71	-	71	-	71	71
1.32 coniferous	9	-	9	-	9	-	9	-	9	9
1.4 Chemical, total	656	380	656	380	656	380	656	380	656	656
1.41 Unbleached sulphite	-	-	-	-	-	-	-	-	-	-
1.41.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.41.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.42 Bleached sulphite ^x	-	-	-	-	-	-	-	-	-	-
1.42.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.42.2 coniferous	-	-	-	-	-	-	-	-	-	-
1.43 Unbl. sulphate-soda	371	196	371	196	371	196	371	196	371	371
1.43.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
1.43.2 coniferous	371	196	371	196	371	196	371	196	371	371
1.44 Bl. sulphate-soda ^x	285	184	285	184	285	184	285	184	285	285
1.44.1 of which non-coniferous	15	7	15	7	15	7	15	7	15	15
1.44.2 coniferous	270	177	270	177	270	177	270	177	270	270

2. Other fibre pulp ^a , total	-	-	-	-	-	-	-	-	-	-
2.1 Straw	-	-	-	-	-	-	-	-	-	-
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	-	-	-	-	-	-	-	-	-	-

3. Dissolving pulp ^b	-	-	-	-	-	-	-	-	-	-
3.1 of which non-coniferous	-	-	-	-	-	-	-	-	-	-
3.2 coniferous	-	-	-	-	-	-	-	-	-	-

^a for making paper + paperboard

^x including semi-bleached

^b of wood + other raw materials.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

95 Country: NEW ZEALAND

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	760	792	792	797	797	797
4.1 Newsprint	325	325	325	325	325	325
4.2 Other printing + writing, total	23	23	23	23	23	23
4.21 Coated	-	-	-	-	-	-
4.21.1 Wood containing	-	-	-	-	-	-
4.21.2 Wood free	-	-	-	-	-	-
4.22 Uncoated	23	23	23	23	23	23
4.22.1 Wood containing	-	-	-	-	-	-
4.22.2 Wood free	23	23	23	23	23	23
4.3 Other paper + paperboard, total	412	444	444	449	449	449
4.31 Household + sanitary	45	47	47	52	52	52
4.32 Wrapping + packaging, total	367	397	397	397	397	397
4.32.1 Linerboard	113	113	113	113	113	113
4.32.11 Kraft liner	113	113	113	113	113	113
4.32.11.1 Unbleached	108	108	108	108	108	108
4.32.11.1 Bleached	5	5	5	5	5	5
4.32.12 Other linerboard	-	-	-	-	-	-
4.32.2 Fluting medium	22	22	22	22	22	22
4.32.21 Semi-chemical	22	22	22	22	22	22
4.32.22 Other fluting medium	-	-	-	-	-	-
4.32.3 Kraft wrapping + packaging	105	105	105	105	105	105
4.32.31 Sack kraft	51	51	51	51	51	51
4.32.32 Other kraft wrapping + packaging	54	54	54	54	54	54
4.32.4 Folding boxboard	127	157	157	157	157	157
4.32.41 Pulp based	..	..	..	..	..	..
4.32.41.1 Bleached chemical	..	..	..	..	..	..
4.32.41.2 Other pulp based	..	..	..	..	..	..
4.32.42 Waste paper based	..	..	..	..	..	..
4.32.5 Other wrapping + packaging n.e.s.	-	-	-	-	-	-
4.32.51 Wrapping paper	-	-	-	-	-	-
4.32.52 Packaging paperboard	-	-	-	-	-	-
4.33 Other paper + board, n.e.s. total	-	-	-	-	-	-
4.33.1 Paper, n.e.s.	-	-	-	-	-	-
4.33.2 Paperboard, n.e.s.	-	-	-	-	-	-

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

96 Country: U. S. S. R. a/

PRODUCTS	1978		1979		1980		1981		1982	1983
	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	of which market pulp	Total Capacity	Total Capacity
1000 metric tons (air dry) per year										
1. Wood pulp, total	9,650	1,600	10,050	1,700	10,480	1,800	10,845	1,900	11,250	11,645
1.1 Mechanical	2,200	-	2,250	-	2,250	-	2,250	-	2,290	2,325
1.11 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.12 coniferous	..	-	..	-	..	-	..	-	..	..
1.2 Thermo-mechanical	-	-	-	-	80	-	95	-	110	120
1.21 of which non-coniferous	-	-	-	-	..	-	..	-	..	..
1.22 coniferous	-	-	-	-	..	-	..	-	..	..
1.3 Semi-chemical	550	-	600	-	650	-	700	-	750	800
1.31 of which non-coniferous	..	-	..	-	..	-	..	-	..	..
1.32 coniferous	..	-	..	-	..	-	..	-	..	..
1.4 Chemical, total	6,900	1,600	7,200	1,700	7,500	1,800	7,800	1,900	8,100	8,400
1.41 Unbleached sulphite	2,800	350	2,850	350	2,900	350	2,950	350	3,000	3,050
1.41.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.41.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.42 Bleached sulphite x	..	..	..	..	..	..	..	..	..	..
1.42.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.42.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.43 Unbl. sulphate-soda	3,100	1,100	3,250	1,200	3,400	1,300	3,550	1,400	3,700	3,850
1.43.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.43.2 coniferous	..	..	..	..	..	..	..	..	..	..
1.44 Bl. sulphate-soda x	1,000	150	1,100	150	1,200	150	1,300	150	1,400	1,500
1.44.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
1.44.2 coniferous	..	..	..	..	..	..	..	..	..	..
2. Other fibre pulp, total	475	..	500	..	525	..	550	..	575	600
2.1 Straw	..	..	..	..	..	..	..	..	..	..
2.2 Bagasse	-	-	-	-	-	-	-	-	-	-
2.3 Bamboo	-	-	-	-	-	-	-	-	-	-
2.4 Other	..	..	..	..	..	..	..	..	..	..
3. Dissolving pulp ϕ	1,250	1,250	1,325	1,325	1,400	1,400	1,475	1,475	1,525	1,600
3.1 of which non-coniferous	..	..	..	..	..	..	..	..	..	..
3.2 coniferous	..	..	..	..	..	..	..	..	..	..

.. for making paper + paperboard

x including semi-bleached

 ϕ of wood + other raw materials.

a/ Secretariat estimate.

FAO WORLD PULP, PAPER AND PAPERBOARD CAPACITY SURVEY 1978-83

96 Country:

 U. S. S. R. ^{a/}

PRODUCTS	1978	1979	1980	1981	1982	1983
	1000 metric tons per year					
4. Paper + paperboard, total	11,000	11,500	12,000	12,500	13,000	13,500
4.1 Newsprint	1,650	1,700	1,750	1,800	1,850	1,900
4.2 Other printing + writing, total	1,400	1,450	1,500	1,550	1,600	1,650
4.21 Coated	..	..	..	..	..	..
4.21.1 Wood containing	..	..	..	..	..	..
4.21.2 Wood free	..	..	..	..	..	..
4.22 Uncoated	..	..	..	..	..	..
4.22.1 Wood containing	..	..	..	..	..	..
4.22.2 Wood free	..	..	..	..	..	..
4.3 Other paper + paperboard, total	7,950	8,350	8,750	9,150	9,550	9,950
4.31 Household + sanitary	115	115	115	115	115	115
4.32 Wrapping + packaging, total	7,155	7,540	7,925	8,310	8,695	9,080
4.32.1 Linerboard	1,380	1,460	1,540	1,620	1,700	1,780
4.32.11 Kraft liner	..	..	..	..	..	..
4.32.11.1 Unbleached	..	..	..	..	..	..
4.32.11.1 Bleached	..	..	..	..	..	..
4.32.12 Other linerboard	..	..	..	..	..	..
4.32.2 Fluting medium	1,220	1,310	1,400	1,490	1,580	1,670
4.32.21 Semi-chemical	..	..	..	..	..	..
4.32.22 Other fluting medium	..	..	..	..	..	..
4.32.3 Kraft wrapping + packaging	1,490	1,650	1,810	1,970	2,130	2,290
4.32.31 Sack kraft	1,160	1,270	1,380	1,490	1,600	1,710
4.32.32 Other kraft wrapping + packaging	330	380	430	480	530	580
4.32.4 Folding boxboard	1,510	1,550	1,590	1,630	1,670	1,710
4.32.41 Pulp based	1,095	1,135	1,175	1,215	1,255	1,295
4.32.41.1 Bleached chemical	680	720	760	800	840	880
4.32.41.2 Other pulp based	415	415	415	415	415	415
4.32.42 Waste paper based	415	415	415	415	415	415
4.32.5 Other wrapping + packaging n.e.s.	1,555	1,570	1,585	1,600	1,615	1,630
4.32.51 Wrapping paper	625	635	640	650	655	660
4.32.52 Packaging paperboard	930	935	945	950	960	970
4.33 Other paper + board, n.e.s. total	680	695	710	725	740	755
4.33.1 Paper, n.e.s.	345	350	355	360	365	370
4.33.2 Paperboard, n.e.s.	335	345	355	365	375	385

a/ Secretariat estimate.

M-71

ISBN 92-5-000752-3