

FROM NAFTA TO CER: TRANS-TASMAN TRADE IN FOREST PRODUCTS

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ABSTRACT

When the New Zealand and Australia Free Trade Agreement (NAFTA) was signed in 1965 it was hailed as the beginning of a period of vigorous growth of the New Zealand forestry trade.

Fenton who studied the progress of the forest products trade between the two countries at different stages of NAFTA found that these expectations had not been realised.

NAFTA has ended with the signing of the Closer Economic Relations Agreement (CER) which came into effect in 1982. Taking an approach different from Fenton, this paper attempts to assess the impact of NAFTA and prospect under CER.

Forest products trade data confirm Fenton's view of NAFTA. But NAFTA should not be dismissed as a failure for this reason. The fact that the free access to a large market provided under the agreement helped the New Zealand industry to emerge from a predominantly domestic industry to a competitive export earner is, perhaps, far more important than the growth of exports to Australia itself.

CER is fundamentally different from NAFTA and arrived at a different stage in the development of the forest industry in the two countries. Properly used, it could be the catalyst for a major export growth in both Australia and New Zealand.

INTRODUCTION

The New Zealand Australia Free Trade Agreement (NAFTA) came into effect in January 1966 and ended 17 years later — in December 1982. Frustrations with the NAFTA and a renewed political will for closer trade links led to the birth of a wider free trade arrangement — Closer Economic Relations (CER) at the beginning of 1983. This paper examines the impact of the NAFTA on the forest products trade between the two countries, and considers prospects under CER.

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The main objectives of the NAFTA were threefold:

- "1. To further the development of the area and the use of the resources of the area by promoting a sustained and mutually beneficial expansion of trade;
- "2. To ensure, as far as possible, that trade within the area takes place under conditions of fair competition; and
- "3. To contribute to the harmonious development and expansion of world trade and to the progressive removal of barriers thereto."

(Article 2 of the NAFTA).

The significance of the forest products trade was highlighted in the following statement in the exchange of letters that accompanied the Agreement:

In respect of forest products generally, the member states shall co-operate with a view to achieving harmonious and mutually beneficial expansion of trade between them and to promoting the most efficient use of the combined resources of both member states.

On the expectation that, following the agreement, "New Zealand industry should continue to expand vigorously" the NAFTA was hailed as "New Zealand coming very close to achieving free trade in forest products" (Holmes, 1966). There were grounds for optimism: the planned export surpluses of New Zealand and the forecasted large deficit in Australia (see Hanson, 1959, 1962) were expected to provide a lucrative market. The complementarity of the forest resources of the two countries — predominantly hardwood in Australia and softwood in New Zealand — was seen as an added stimulus to two-way trade (Williams, 1968: 31).

Some Australian critics saw it as a challenge. In the long and chequered history of attempted free trade between the two countries "the treatment of forest products under the NAFTA was seen as a crucial test of how serious Australia was on closer trade relations" (Lipski, 1965).

Fenton (1979) who analysed ten years of the NAFTA concluded that:

Although the total trade between the two countries increased in real value by over 75 percent for Australia and 100 percent for New Zealand, forest products trade increased by 3 and 16 percent respectively only, so that the agreement was a failure in respect of forestry.

Fenton's conclusions were based on a study of a limited period of the NAFTA trade. Now that we have data for the complete duration of the agreement it is considered timely to review its performance.

GROWTH OF TRADE

A fundamental difficulty in studying a time series of trade data is how to ascertain a constant value. At one extreme is value expressed in current dollars f.o.b. or c.i.f. But this does not allow for exchange rate variations and contains a significant inflationary element especially in recent years. A deflator such as the CPI is used sometimes to reduce current values to real terms. But the CPI is essentially a measure of domestic inflation and is not appropriate to use as a deflator of overseas trade values.

At the other extreme are trade volume data. But apart from the difficulty of obtaining information on this basis for the complete range of products, it does not capture value changes of exports resulting from changes in relative prices. The latter, which determines the "terms of trade" of a product, is important in establishing its real value (for example, see Ferguson 1978). To reflect these and yet exclude exchange rate and inflationary effects as far as possible, Special Drawing Rights (SDR) are used to express trade figures. SDR was equivalent in value to the U.S.\$ until 1970; since then SDR value has been fixed on the basis of a basket of 16 currencies as the value of the U.S. dollar itself tended to fluctuate widely. Thus the SDR which represents both elements seems to be the most appropriate measure of trade aggregates.

Table 1 and Fig. 1 show Australian imports of forest products during the period 1956-1982. Imports from all countries rose from SDR 186.3 million in 1965 to SDR 974.7 million in 1982, showing an annual growth of 10.2%. Forestry imports from New Zealand in the same period increased from SDR 29.9 million to SDR 181.0 million, growing at a slightly higher rate of 11.2% per annum. Consequently, New Zealand's share of the Australian forest products import market also expanded marginally from 16.0 to 18.6%. An interesting feature of this trade, however, is that all imports from New Zealand increased at a significantly higher rate of 15.9% per year compared with forestry imports. Forest products which comprised 58% of imports from New Zealand in 1965 accounted for only 28% by the end of NAFTA.

Table 2 and Fig. 2 represent the growth of imports into New Zealand from Australia during the tenure of the agreement. As to be expected, New Zealand imports only a small volume of forest products.

TABLE 1: VALUE OF FOREST PRODUCTS
(SDR million June years)

	1965	1966	1967	1968	1969	1970	1971	1972
1. Forestry imports from N.Z.	29.9	30.2	28.1	31.2	32.8	33.6	34.3	41.3
2. Forestry imports from all other sources	186.3	175.3	182.5	196.0	215.8	243.4	257.7	257.7
3. All imports from N.Z.	52.0	52.2	53.0	68.4	83.5	96.3	104.4	131.9
4. 1 as a % of 2	16.0	17.2	15.4	15.9	15.2	13.8	13.3	16.0
5. 1 as a % of 3	57.5	57.9	53.0	45.6	39.3	34.9	32.9	31.3
6. SDR per Aust. \$	1.1185	1.1140	1.1210	1.1100	1.1180	1.1150	1.0970	1.1744

Sources: Australian Bureau of Statistics, *Overseas Trade*, various years.
Forest Industries Advisory Council, *Australia's Forest Product Industries*, 1980, Attachment L.
International Monetary Fund, *International Financial Statistics*, various years.

TABLE 2: VALUE OF FOREST PRODUCTS
(SDR million. June years)

	1965	1966	1967	1968	1969	1970	1971	1972
1. Forestry imports from Aust.	4.2	4.4	3.5	2.9	3.2	3.7	4.3	5.1
2. Forestry imports from all sources	23.5	24.8	18.5	14.5	17.8	22.1	22.8	20.2
3. All imports from Aust.	184.2	198.3	168.6	156.0	192.8	245.0	282.9	330.0
4. 1 as a % of 2	17.9	17.7	18.9	20.0	18.0	16.7	16.2	24.6
5. 1 as a % of 3	2.3	2.2	2.1	1.9	1.7	1.5	1.5	1.5
6. SDR per N.Z. \$	1.3912	1.3850	1.1227	1.1121	1.1198	1.1161	1.1009	1.1009

Sources: N.Z. Forest Service, *Statistics of the Forests and Forest Industries of New Zealand*, various years.
International Monetary Fund, *International Financial Statistics*, various years.

IMPORTS INTO AUSTRALIA 1965-82

1973	1974	1975	1976	1977	1978	1979	1980	1981	1982
43.9	51.0	60.3	71.0	88.9	84.3	93.2	142.9	183.9	181.0
316.3	416.7	475.8	395.3	568.9	511.0	593.8	800.1	912.6	974.7
160.3	182.2	197.5	234.5	300.3	318.0	356.4	506.0	616.5	645.0
13.9	12.2	12.7	18.0	15.6	16.5	15.7	17.9	20.2	18.6
27.4	28.0	30.3	30.5	29.6	26.5	26.2	28.2	29.8	28.0
1.2335	1.0838	1.0738	0.9351	0.9397	0.8831	0.8392	0.9257	0.9690	0.8889

IMPORTS INTO NEW ZEALAND 1965-82

1973	1974	1975	1976	1977	1978	1979	1980	1981	1982
6.6	8.5	7.0	6.6	9.3	8.1	12.0	15.8	16.2	22.7
32.3	46.6	47.6	28.7	46.8	39.6	39.2	61.3	68.3	95.5
426.8	539.9	512.0	463.2	648.8	584.9	670.9	774.8	760.8	936.9
20.4	18.2	14.7	23.0	19.9	20.5	30.6	25.8	23.7	23.7
1.5	1.6	1.4	1.4	1.4	1.4	1.8	2.0	2.1	2.4
1.1841	1.0745	0.8916	0.8177	0.8395	0.8177	0.7486	0.7545	0.7083	0.6640

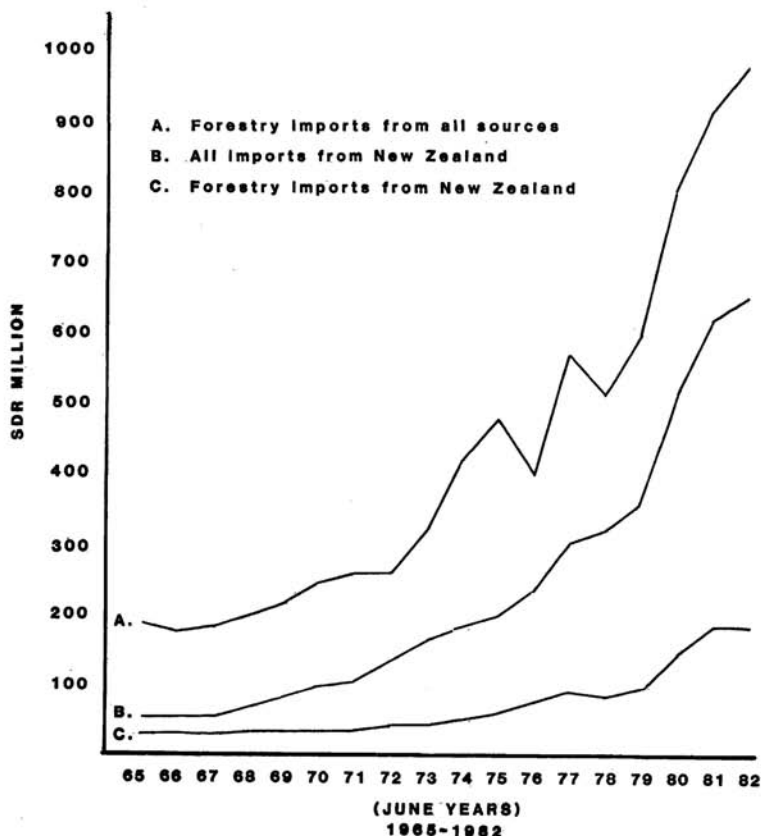


FIG. 1: *Value of forest products imports into Australia, 1965-82*
(Source: Table 1)

In 1965, out of forestry imports totalling SDR 23.5 million, Australia provided SDR 4.2 million worth, or 18%. In 1982, imports from the same source amounted to SDR 22.7 million — almost a quarter of forest products imports. The growth rate of these imports from Australia at 10.4% per year was marginally above the growth of all imports from there which increased by 10.0% a year.

This overall picture of forestry trade between the two nations does not reflect cyclical movement that took place or changes in product mix or quality. But the aggregate figures show that the originally expected "continuous vigorous expansion" of forestry products from New Zealand did not take place.

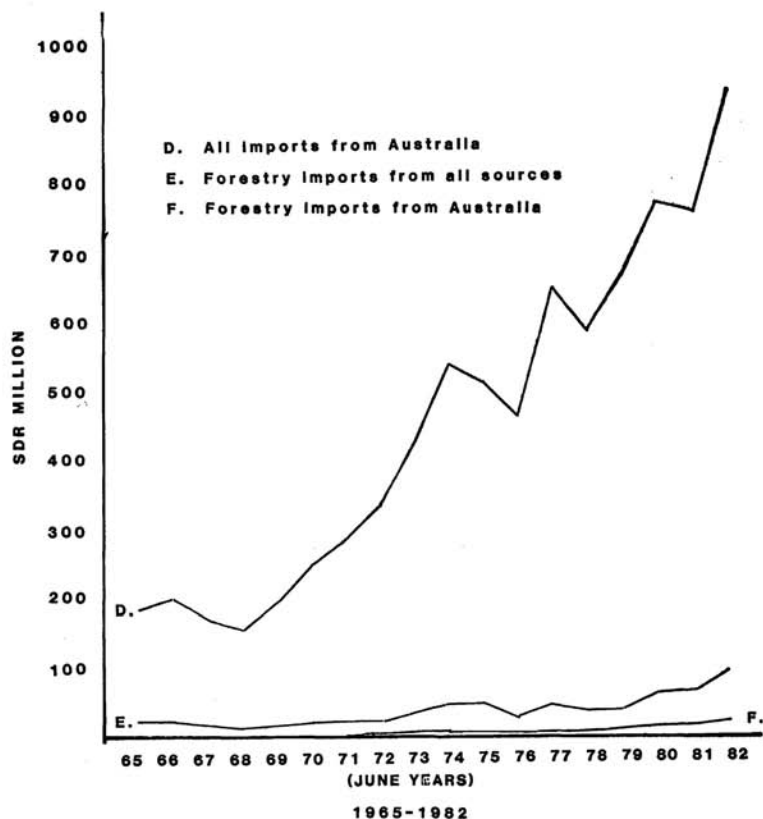


FIG. 2: *Value of forest products imports into New Zealand 1965-82*
(Source: Table 2)

The growth rate of around 10% per year in forest products trade is indeed modest, especially when overall trade grew at a faster rate. Furthermore, this growth can be ascribed to a variety of factors such as economic growth rates of the two countries, exchange rate variations and the proximity of the two markets rather than to the agreement itself (Holmes, 1976).

REASONS FOR FAILURE

Why did not the NAFTA provide a greater stimulus to trans-Tasman forestry trade, especially to the expansion of forestry imports from New Zealand? Some of these factors were already evident at the time of the agreement. Others developed in the

course of time. Fenton, in his 1968 study, summarised the principal inherent factors:

The FTA (Free Trade Agreement), as it stands now, is an extremely limited agreement and its only important points can be summarised:

Little new trade is liberalised.

The only exception of any importance is kraft paper, which is heavily protected in both countries.

The only tariff which remained on rough-sawn timber was that imposed on New Zealand Douglas fir as recently as 1963. After considerable pressure it was abolished in September 1967.

New Zealand quantitative import controls have been lifted from imports of Australian timber.

These conclusions remained valid, to a large degree, for the entire duration of the NAFTA and it is not intended to consider them in any detail here. When the agreement ended the only areas in which any form of restrictions existed were hardboard, laminated board (other than plywood and flooring), particle board, some prefabricated products and certain types of paper and paper board*, where both countries were relatively self-sufficient.

Another development that had major implications for long-term growth of trade was also evident when the agreement was promulgated; Australia's own afforestation targets. The Australian Forestry Council (AFC), established in 1964, at its first two meetings had agreed to the objective of "making Australia self-sufficient in softwood timber by the year 2000 through an accelerated plantation programme of 30 000 ha per year."

Barely three months after the NAFTA came into being — in March 1966 — the Federal Government itself pronounced its support for the self-sufficiency objective by providing Commonwealth financial assistance for accelerated softwood planting with an annual programme increasing from 16 000 ha in 1967 to nearly 24 000 ha in 1971 (Carron, 1980). Under the Softwood Forestry Agreements Act of 1967 that followed, soft loan assistance totalling A\$55.3 million was provided by the Commonwealth Government. A further A\$17 million has been made available since, for maintenance of plantations established under the scheme (IAC 1981).

The pursuit of self-sufficiency as a policy objective was, perhaps, the result of memories of wartime scarcities coming to haunt. But as national policy, regardless of the NAFTA, it would have been disastrous to entirely ignore the economics

*New Zealand tariff items 44.11.000 OIF, 44.15.009, OIH, 44.23.019, OID, 44.27.000, IIC and 48.07.

of such a measure. Reading through the literature, it appears that people like Ian Ferguson and E. D. Parks should get credit for highlighting the need for introducing the economics element to self-sufficiency that was subsequently adopted by the Council. Yet, the issue of self-sufficiency at State level seems to continue unresolved.[†] The lack of such a consensus has led to a steady increase in afforestation which makes the "economics of self-sufficiency" a somewhat theoretical issue.

The point to note in the context of this paper is that, either through conscious State and Federal policy, or through demand forecasting errors in planning, Australia faces the prospect of future log supplies far in excess of previous targets and expected consumption levels (Byron, 1981). The major significance of this increase is for CER rather than the NAFTA and will be dealt with later. But there were other developments during the period of the NAFTA that tended to affect the growth of forest products trade.

The rationale for free trade between nations is that there are net gains for the participating countries as well as the rest of the world (see, for example, Kindleberger and Lindert, 1978). A member country of a free trade agreement can expand its trade through "trade diversion" or "trade creation" effects. Trade diversion is merely changing the source of supply from, often, a non-member country to a member state because of trade preferences. In general, this is not beneficial to world trade but helpful to the participant country which acquires the share. Welfare gains from free trade arise fundamentally through "trade creation". This happens when the relative cheapness of imports and the variety in available form lead to an increase in the consumption of a product.

Let us examine the NAFTA trade from these two viewpoints. Owing to problems of data availability, the analysis is confined to timber. Table 3 shows the country breakdown of sawn wood and sawlog imports to Australia in the period 1965-82. The main features of the trade, as revealed by this table are:

- (a) In the 17-year period imports increased from 923 thousand to 1141 thousand m³ or by 24% and at an annual rate of 1%.

[†]Carron (1980) provides a detailed analysis relating to national as well as State views on self-sufficiency.

TABLE 3: TIMBER IMPORTS INTO
(000 m³. June years)

	1965	1966	1967	1968	1969	1970	1971	1972
A. Sawn wood:								
Canada	238.4	308.8	317.4	289.2	343.0	314.1	280.3	330.8
U.S.A.	226.8	183.7	193.9	193.9	180.5	162.9	241.7	202.6
Malaysia	219.8	146.7	129.0	190.9	172.0	203.7	196.3	173.1
N.Z.	83.0	67.3	69.6	87.8	133.7	132.1	113.9	96.4
Other	70.9	52.0	46.2	65.3	62.3	70.5	81.0	89.8
Total A	836.9	758.5	756.1	827.1	891.5	883.3	913.2	892.7
B. Sawlogs:								
Malaysia	74.0	35.8	45.8	67.7	67.9	69.7	37.7	38.0
Indonesia	2.5	—	—	—	3.8	3.8	5.9	5.9
Other	9.1	6.5	9.2	8.9	5.4	11.5	18.3	20.1
Total B	85.6	42.3	55.0	76.6	77.1	85.0	61.9	64.0
Grand Total	922.5	800.8	811.4	903.7	968.1	968.3	975.2	956.7

Source: Department of Primary Industry, *Timber Supply Review*, various issues.

TABLE 4: APPARENT CONSUMPTION OF
(000 m³. June years)

	1965	1966	1967	1968	1969	1970	1971	1972
1. Imports:								
(a) Conifers								
(i) Undressed	577.3	587.7	600.2	597.4	670.4	620.0	647.7	645.7
(ii) Dressed	18.9	7.1	11.2	12.1	13.2	17.5	12.5	11.9
(b) Broad-leaved								
(i) Undressed	238.7	163.0	143.0	212.6	203.3	244.6	243.3	215.2
(ii) Dressed							9.7	18.2
(c) Logs	85.6	42.3	55.0	76.6	77.1	85.0	61.9	64.0
Total imports	922.5	800.8	811.4	903.7	968.6	968.1	975.2	956.7
2. Exports	38.8	34.7	31.4	27.9	33.8	31.6	23.4	27.1
3. Production:								
(a) Plantation conifers	770.3	745.5	719.0	707.4	717.9	752.3	765.3	818.8
(b) Native timber	2546.6	2470.3	2380.7	2471.7	2464.0	2472.6	2463.0	2515.5
Total production	3317.3	3215.8	3099.7	3179.1	3181.9	3224.9	3228.3	3334.3
4. Apparent consumption	4201.0	3981.9	3877.5	4054.9	4117.0	4161.5	4180.1	4263.9

Source: Department of Primary Industry, *Timber Supply Review*, various issues.

AUSTRALIA BY SOURCE 1965-82

1973	1974	1975	1976	1977	1978	1979	1980	1981	1982
349.6	410.3	264.9	223.8	248.8	300.5	326.9	309.0	336.6	360.7
241.9	328.9	255.1	349.4	246.8	237.0	224.8	200.4	242.1	316.1
208.7	233.3	165.9	221.4	271.2	190.6	162.7	173.7	171.4	168.2
109.5	99.2	62.2	91.5	106.0	96.2	131.2	181.0	190.0	189.6
130.5	197.7	138.3	111.3	293.3	108.0	122.6	134.2	119.5	104.6
1040.2	1269.4	886.4	997.4	1166.1	932.3	968.2	988.3	1059.6	1139.2
34.0	29.0	16.6	20.9	10.7	13.1	2.6	—	—	—
27.4	35.1	7.4	4.7	6.0	0.6	4.5	—	—	—
2.5	4.0	0.8	5.3	4.8	1.7	3.3	0.4	0.1	1.4
63.9	68.1	24.8	30.9	21.5	15.4	10.4	0.4	0.1	1.4
1104.1	1337.5	911.3	1028.3	1187.6	947.7	978.6	989.1	1059.7	1140.6

Note: Totals may not agree owing to rounding.

SAWN TIMBER IN AUSTRALIA, 1965-82

1973	1974	1975	1976	1977	1978	1979	1980	1981	1982
697.2	829.1	584.3	628.8	686.9	571.3	586.1	564.8	587.1	692.3
24.1	23.8	31.6	40.7	56.3	60.3	93.0	124.8	182.7	174.9
297.6	380.7	242.2	278.4	352.0	236.0	225.8	241.8	225.9	211.6
20.2	34.8	42.1	49.5	70.9	64.7	63.3	56.9	63.9	60.4
63.9	68.1	24.8	30.9	21.5	15.4	10.4	0.4	0.1	1.4
1104.1	1337.5	911.3	1028.3	1187.6	947.7	978.6	988.7	1059.7	1140.6
46.1	48.5	28.0	18.2	25.8	28.9	38.8	55.4	34.9	32.9
868.9	828.6	670.8	716.0	767.8	798.1	797.0	949.9	1035.5	1013.5
2565.2	2473.1	2651.8	2569.1	2524.2	2390.1	2121.9	2217.4	2279.3	2131.2
3431.1	3301.6	3322.6	3285.1	3293.0	3188.2	2918.9	3167.3	3314.8	3144.7
4491.2	4577.6	4181.1	4295.2	4453.8	4107.1	3862.2	4093.9	4332.8	4252.1

Note: Totals may not agree owing to rounding.

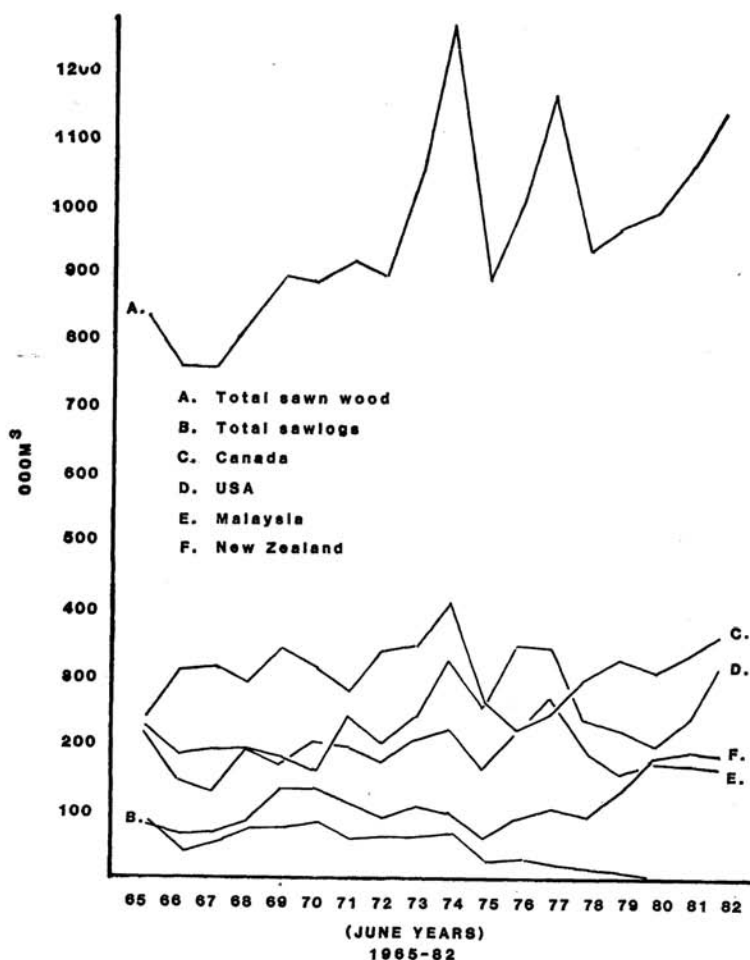


FIG. 3: *Timber imports into Australia by source, 1965-82*
(Source: Table 3)

- (b) Sawlogs which amounted to 86 thousand m³ or 9% of imports in 1965 were virtually eliminated from import trade by 1982. It is not certain whether this was due to problems associated with supply or due to a consumer preference for processed timber.
- (c) Imports were volatile, being dependent largely on the fortunes of the building industry. Imports reached a peak during the building boom of 1973 and 1974.

- (d) Major suppliers — Canada, the U.S.A., New Zealand and Malaysia — controlled over 90% of the import market.
- (e) Malaysian sawn wood supply declined from 26.2% in 1965 to 14.8% in 1982. The other three suppliers — Canada, the U.S. and New Zealand — all increased their market shares by 3.2, 0.6 and 6.7% respectively. By the end of the period, Canada and the U.S. controlled nearly two-thirds of the Australian timber import market with New Zealand holding 16%.

This shows that, in aggregate volume terms, a degree of trade diversion had taken place in sawn timber. But this cannot be claimed to result from the NAFTA since the treatment for tariff purposes was similar for most New Zealand and Malaysian timbers.

The real test of welfare gains is in the extent of trade creation. Table 4 contains data of Australia's timber balance over the NAFTA period. Within domestic production a change in emphasis from native timber to plantation conifers was apparent with a similar trend in imports. Apart from these, a striking feature is that all major aggregates — production, exports, imports and domestic consumption — remained relatively static over the period, with the 1973-4 building surge creating the only significant growth.

A more disturbing feature of consumption is revealed where allowance is made for population growth. The *per capita* consumption of sawn timber in Australia has steadily declined during the last two decades. As shown in Table 5, it fell from 0.412 m³ in 1960 to 0.279 m³ in 1980. There could be a number of factors that contributed to this situation — primarily, changes in tastes, availability of substitute materials and changes in relative prices. Byron (1981) found a long-term trend of declining use of timber in dwelling construction; from a high of 55.1 m³ per dwelling commencement in 1956-7 it had declined to 30.3 m³ by 1980. In the same period timber prices have increased by over four times. It is difficult to draw a causal relationship between the two since evidence as to the price elasticity of demand for sawn timber remains inconclusive (Byron, 1981). Yet the fact that the price of sawn timber relative to other building materials has remained consistently high since 1966-7 leads inescapably to the conclusion that higher timber prices played, if not the major, at least a significant role in the declining consumption.

TABLE 5: TRENDS IN TIMBER CONSUMPTION AND RELATIVE PRICES 1960-1980

Year	Sawn Timber Consumption (000 m ³)	Sawn Timber Consumption per capita (m ³)	Dwelling Commencements (000s)	Sawn Timber Consumption per Dwelling Commenced	Timber Price Index (1966-7 = 100)	Real Value of Building	Building Material Price Index (1966-7 = 100)	Relative Price of Sawn Timber × 100
1959-60	4189	.412	91.3	45.9	84.1	3835.4	83.7	100.5
1960-61	3991	.383	88.9	44.9	87.7	4143.8	86.4	101.5
1961-62	3604	.340	82.5	43.7	85.2	3997.1	86.4	102.1
1962-63	3800	.350	88.3	43.0	90.5	4337.1	86.2	105.0
1963-64	4090	.370	107.6	38.0	86.8	4714.0	90.5	95.9
1964-65	4253	.370	116.7	35.4	91.8	4999.5	97.4	94.3
1965-66	4095	.352	107.2	38.2	94.6	5244.3	98.3	96.2
1966-67	4010	.347	111.9	35.8	100.0	5527.1	100.0	100.0
1967-68	4142	.343	120.2	34.4	103.0	6039.8	100.0	103.0
1968-69	3972	.335	130.7	30.4	108.6	6770.7	103.4	105.0
1969-70	4468	.330	142.2	29.3	113.5	7210.0	107.7	105.4
1970-71	4162	.325	142.8	29.1				
1971-72	4159	.328	143.0	29.1	124.8	7548.9	119.8	104.2
1972-73	4351	.322	150.6	28.9	137.0	7860.8	125.9	108.8
1973-74	4600	.318	150.0	30.7	169.1	8476.7	142.2	118.9
1974-75	4181	.342	141.1	39.6	203.5	7452.1	175.0	116.3
1975-76	4269	.315	137.0	31.2	226.2	7508.5	201.7	112.1
1976-77	4454	.317	141.8	31.4	254.1	8892.1	225.0	112.9
1977-78	4107	.292	118.7	34.6	215.0		252.0	109.1
1978-79	3862	.265	119.1	32.4	290.8		268.1	111.4
1979-80	4033	.279	133.1	30.3	331.5		302.9	109.4

Source: Byron (1981)

International trade theory tells us that free trade almost always improves the well-being of nations. The main avenues of gain are consumption effects (being able to increase consumption) and welfare effects (by shifting from more expensive domestic products to cheaper imports) (Kindleberger and Lindert, 1978).

But the timber price/consumption trends indicate that the apparent welfare benefits have not reached the consumer. There could be several reasons for this:

- (1) Duty-free imports contribute only such a small proportion of domestic consumption that their cheapness is not reflected in the price level.
- (2) Price setting by oligopoly distributors prevents the cheaper prices being passed on to the consumer.
- (3) New Zealand exporters pricing their products at a higher level, in recognition of the higher prices prevailing in the Australian market.

One thing we can be certain of is that the last-mentioned situation did not occur as evidenced by the dumping charge against New Zealand timber suppliers. We are not concerned here with the validity or otherwise of the dumping charge. We are concerned purely with the economic argument. In this respect I can do no better than to quote one of Australia's foremost experts in international trade (Snape, 1973:23):

The emotive term "dumping" frequently appears to mean no more than that foreigners are undercutting producers in 'our' country. Such, however, is the whole basis of advantageous international trade. (If foreigners can undercut us in everything, then this implies simply that the rate of exchange should be changed). Whether foreigners are selling to us at prices below their costs (either average or marginal) is immaterial; the cheaper we can buy the better for our country. The only situation in which cheap imports may be harmful to the country as a whole is when domestic producers are forced out of business and prices subsequently rise — the threat of renewed dumping may discourage the re-establishment of the domestic industry. It is, of course, usually impossible for the government of an importing country to discover the intent of a foreign exporter, but selling at prices below marginal costs may be taken as reasonable evidence that prices will rise in the future. In such cases a government may wish to protect the domestic producer; again, production subsidies may be the best form of action.

Professor Snape goes on to say (p.24) that "The government may wish to assist the producers who are hurt by trade, for example by aiding their transference to other industries, but to support their existence in the inefficient industry is to make the rest of society pay particularly dearly."

The Australian Industries Assistance Commission (IAC) confirmed this view specifically in relation to wood products although from a different viewpoint (IAC, 1981:45). Its argument was that expenditure on forest establishment was sunk capital and an increase in tariffs (or quota restrictions) would only increase costs to the community. More appropriate responses, for the short term, include reductions in royalties or log output or exports. For the long term, the IAC concluded, some adjustment in type and kind of investment may be required.

If the overseas suppliers did not reap excessive profits, what factors inhibited the welfare benefits reaching the consumer?

Countries enter into free trade arrangements for reasons of consumer welfare, industry efficiency and export growth. Put in trade liberalisation decisions, not only in Australia and New Zealand, but in the EEC or almost any other part of the world, actions often contrary to original objectives are adopted on the dictates of local import substituting industries. Balassa (1967:72) offers an explanation:

Import competing industries often have lower than average productivity and profits and feel directly threatened by imports while gains to exporters and consumers are often not easily ascertainable.

The need to provide protection to local producers through tariffs or other forms of restriction on imports has resulted in a general increase in timber prices in Australia. Such restrictions on imports have the ultimate effect of a tax on consumers. They normally raise the price of an imported product, providing domestic producers of substitute goods with the scope to sell their outputs at a price higher than that which would prevail without the tariff. Quantitative restrictions, too, have a similar effect. Money transferred from purchasers as higher prices reaches the government as import duties, licence holders as scarcity rent, and domestic producers as an increase on gross returns on their sales.

The Industries Assistance Commission estimated the 1977-8 consumer tax equivalent of import restrictions relating to all manufacturing industries at a massive \$6000 million (IAC, 1980). Data in Table 6 are the estimated tax equivalents for wood-based industries for that year.

While the tax equivalent itself at 14.4% is not as regressive as in highly protected industries such as clothing and footwear, the disturbing feature is that the consumer transfers almost entirely accrue, not to the government, but to import substituting

TABLE 6: CONSUMER TAX EQUIVALENTS OF TARIFFS AND QUANTITATIVE RESTRICTIONS OF FORESTRY PROCESSING INDUSTRIES 1977-8

Industry	Tax Equivalent (\$m)	Distribution of Tax Equivalent as a Percentage of Total Consumption			Total
		Domestic Producers	Scarcity Rents on Quotas	Govt Revenue	
Wood and wood products	150	9.1	0.1	1.0	10.2
Furniture	145	19.3	—	1.8	21.1
Paper	176	11.0	—	0.9	11.9
Total	471	—	—	—	—
Average	157	13.1	—	1.2	14.4

Source: Industries Assistance Commission (1980).

industries in the form of higher prices. Thus monopolistic pricing by distributors appear to be the cause of higher Australian timber prices.

These factors lead one to the conclusion that the timber industry has tended to price itself out of the market. The free trade agreement has had no "trade creating" effects.

ADVANTAGES

Evidence on the performance of trans-Tasman trade under the NAFTA through its 17 years of operation tends to confirm the view that the agreement did not help expand forest product trade. Yet, to consider it a complete failure in this area is too harsh a judgement. From the New Zealand point of view the hopes of a vigorously expanding lucrative market were not realised — or are not likely to be achieved. But the assurance of entry to the Australian market, particularly in the early stages of export development, no doubt helped forestry to emerge from a predominantly domestic market-orientated industry to an efficient export industry. In this light the contribution of the NAFTA to the considerable diversification in export products and export markets that has taken place cannot be ignored (see Table 7 and Fig. 4).

In terms of product-mix, the New Zealand industry has moved towards greater domestic processing, as seen in the sharp decline in log exports and the substantial rise in miscellaneous exports. In relation to markets, the most significant development is the diversification away from the traditional markets.

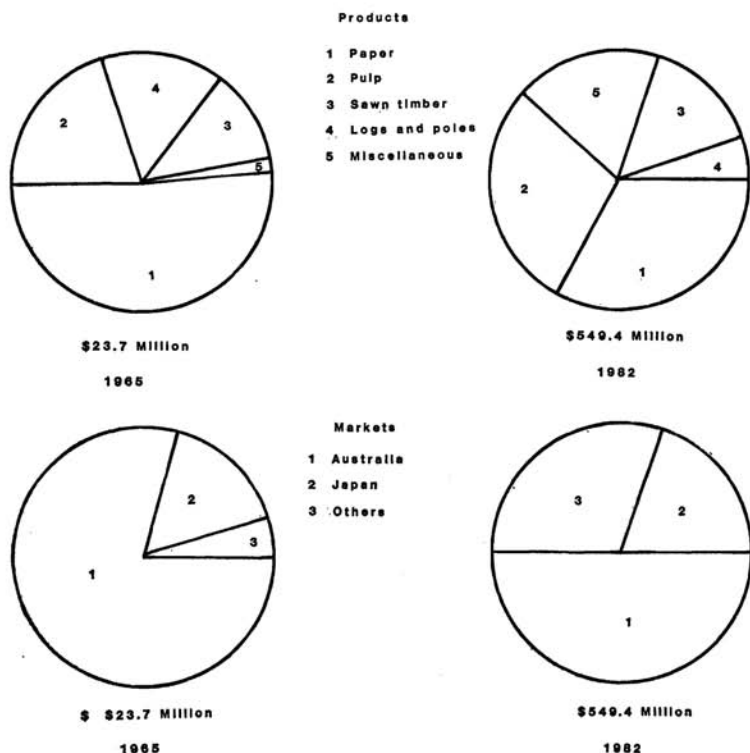
The assurance of markets is particularly important in the forest industry because of the large and lumpy nature of invest-

TABLE 7: NEW ZEALAND FOREST PRODUCTS EXPORT: MAJOR MARKETS AND COMPOSITION OF EXPORTS

	Percent	
	1965	1980
<i>Products:</i>		
Logs and poles	15.7	5.3
Sawn timber	11.6	14.5
Pulp	20.0	28.2
Paper	51.3	33.3
Miscellaneous	1.4	18.2
<i>Markets:</i>		
Australia	79.2	50.3
Japan	16.2	21.7
Other	4.6	28.0

Source: N.Z. Forest Service, *Statistics of the Forest and Forest Products Industries of New Zealand*, various years.

Percentage Shares



(Source: Table 7)

FIG. 4: New Zealand forest products exports, percentage shares, 1965 and 1982

ment. This is particularly so in pulp and paper projects. The third paper machine of Tasman Pulp and Paper Company would not have been commissioned without the assurance of the Australian market (Fenton, 1979:114). The spur to economies of scale in sawn timber production from the NAFTA is also evidenced by the increased capacity of a number of sawmills catering to the Australian market. In the March year 1982, out of nearly 400 sawmills the top ten accounted for 45% of output. The benefits to the consumer — both local and overseas — from scale economies are well known and it is not intended to deal with them here.

As for Australia, the most important effect was the degree of competition offered by New Zealand exporters. This is a nuisance to the local producers, but it would have undoubtedly helped in the efficiency of the local industry. This has important long-term implications when Australia itself becomes a major softwood exporter. Despite the fact that New Zealand held a small share of the Australian import market, its presence would have helped in keeping prices down as the pricing policy of local producers would have been influenced by imports. In addition to these, the wider choice of products is also an important element of consumer welfare.

Among the most significant benefits of the NAFTA is its bringing together the industries of the two countries. Some have already set up joint ventures. The importance of these, once again, will become evident in the long term when both countries become net exporters of a significantly similar resource.

CLOSER ECONOMIC RELATIONS (CER)

CER is vastly different from the NAFTA in two main respects:

- (1) The NAFTA covered a selected list of items and the rest were excluded, whereas CER includes everything except the few that were specifically deferred.
- (2) Unlike the NAFTA, CER will gradually and automatically phase out the tariffs and other trade restrictions on trans-Tasman trade.

These are two prime ingredients of free trade. But their significance as catalysts for trade growth diminishes when considered in the context of the current status of trade between the two countries. For instance, Australia will get progressively greater access, over a 12-year period, to a market less than a

fifth of its size. New Zealand stands to gain more from the bigger market but the weighted average Australian tariff for New Zealand products is about 3% and other restrictions to trade are minimal. In view of this, Douglas (1983) concluded that as a trade agreement CER does not offer a great deal for either country.

These comments readily apply to the forestry sector. As shown in the earlier section, for many years forest products have enjoyed relatively free trade and the situation does not alter significantly under CER; the Australian market for New Zealand forest products will progressively shrink, and by the turn of the century both countries will be net exporters of softwood. The continuous decline in *per capita* consumption of timber in the two markets will contribute to the acceleration of this trend.

Does this mean that CER has no more to offer forestry than the NAFTA? It is not so. CER is presented as a free trade agreement at this stage, and its wider objectives are not readily apparent. The preamble to the agreement considers mutually beneficial expansion of trade as a basis for more effective use of the resources of the two countries for economic and social benefits and improvement of the standard of living of the people in the two countries. Thus the Agreement should not be regarded as an end in itself.

Despite this, the relatively similar resource base of the two countries in forestry could lead one to the conclusion that there is not much room to work towards these lofty objectives. Indeed the theory of Comparative Advantage indicates that opportunities for gains from trade are greater when resource endowments diverge, and not when they are similar.

But this does not explain how a considerable volume of world trade takes place among industrial countries with similar relative factor endowments, and two-way exchange of goods produced with similar factor propensities. For an explanation, we have to look beyond the traditional theory to the dynamic aspects of international trade. Unfortunately, there is no general theory for this so far.

However, the recent developments in the theory of "intra-industry" trade which incorporates comparative advantage as well as economies of scale as major causes of trade and gains from trade have direct relevance to the trans-Tasman situation.* According to this, the industrial structure of a country's pro-

*For a detailed account read Dixit and Norman, 1980.

duction will be determined by its factor endowments. Within each industry, however, there is assumed to be a wide range of potential products, each produced under conditions of increasing returns. Because of these scale economies, each country will produce only a limited subset of the products in each industry, with the pattern of intra-industrial specialisation — which country produces what — essentially arbitrary (Krugman, 1983). Furthermore, the more similar countries are in their factor endowments, the less different their industrial structure will be, and hence the more their trade will have an intra-industry character.

The question may be asked why a greater expansion in forest products trade did not take place in the past since these conditions prevailed to some extent under the NAFTA. There was intra-industry trade, of course, but it was limited to some types of paper and sawn timber. It is here that the major differences between the NAFTA and CER become apparent. The impetus, under the new trade regime, according to some economists, is on the changed attitudes of the two countries (especially in New Zealand) towards economic restructuring (Douglas 1983). This, alongside the automatic demolition of trade barriers, should provide the basic environment for intra-industry development.

The agreement itself alluded to some areas that need harmonised development: investment, marketing, movement of people, tourism and transport. There could be many more: to borrow a phrase from Australian academic David Thomas, "approaching free trade is like draining a swamp — as the water level falls it becomes easier to see the alligators — and the alligators get crankier" (NBR, 30 May 1983). But, if the existing industry structure is considered sacrosanct, the necessary restructuring cannot take place.

There are needs and opportunities for harmonious development of the forest products industry in the two countries. Among the needs, most immediate concern is to check the decline in the per head consumption of timber in the two markets by stemming the erosion of competitive strength in the industry. It is important, for the home markets should provide a sound base for the development of an efficient export industry.

In the long term, when both countries become net exporters of softwood, the need for co-operation becomes even greater. Australia, New Zealand and Chile are the world's largest producers of radiata pine. The projected combined export surplus of these countries together with that of the other softwood pro-

ducer in the region — Fiji — will rise from the current 6.8 million m³ per year to 25 million m³ by the year 2000 (see Table 8). But, despite its versatility, radiata pine is not accepted universally as such. In the major market — Japan — it is regarded more as a packaging timber than as a high value species; sawn radiata in this market is also subject to a tariff of 8%. It is to face situations of this nature that joint action is needed to develop internationally-accepted product standards, ensure market access and generally promote radiata timber. An organisation similar to the International Wool Secretariat is very relevant for the promotion of this product.

TABLE 8: PROJECTED COMBINED EXPORT SURPLUS OF
AUSTRALIA, NEW ZEALAND, CHILE AND FIJI
(million m³)

Supply	1981-85	1986-90	1991-95	1996-2000	2001-05
Softwood plantation	17.4	22.0	27.0	39.5	61.9
Other forests	16.1	16.9	18.0	19.1	20.1
All forests	33.5	38.9	45.9	58.6	82.0
Domestic demand @ 1½% growth	26.7	28.8	31.0	33.4	36.0
Export surplus (roundwood equivalent)	6.8	10.1	14.9	25.2	36.0

Source: Elliott and Wije-Wardana (1982).

Another area is research and development, which needs large investments and the use of other scarce resources. Co-ordinated effort here could enhance returns to both countries. There are considerable opportunities, too. In New Zealand we have a fine example of intra-industry co-operation in Tasman and N.Z. Forest Products' joint venture to process tall oil and turpentine from kraft pulpmill waste. Similarly, a prime example of co-operation between the industry in the two countries is the N.Z. Forest Products and APM joint venture ANFOR, to co-ordinate research and development functions as well as incorporate overseas marketing activities.

There are also other numerous areas to develop — *e.g.*, technologies for ethanol, chemical and similar non-traditional uses of wood. Many years of experience in forest industries have made Scandinavian countries exporters of not only forest products but also sawmill and pulpmill technology as well as forest industry

management expertise. Given time, there is no reason why Australasia could not be exporters of such technology.

Looked at from this point of view, the growth of extensive plantation forests in the two countries could provide greater opportunities for growth than free trade confined to the two countries. CER, if properly used, provides the ideal framework for such development. Short-term problems faced by the industry should not be allowed to dictate measures that could conflict with the long-term objectives of the agreement.

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REFERENCES

- Anon., 1965. New Zealand Australia Free Trade Agreement.
 Anon., 1983. Australia New Zealand Closer Economic Relations — Trade Agreement.
 Australian Bureau of Statistics, Overseas Trade, various years.
 Balassa, Bela, 1967. *Trade Liberalisation among Industrial Countries — Objectives and Alternatives*. Council on Foreign Relations.
 Byron, R. N., 1980. Trans-Tasman Trade in Forest Products — Past and Future. *Aust. For.*, 43 (3).
 ——— 1981. Forecasting and forestry planning. *Aust. For.*, 44 (4).
 Carron, L. T., 1980. Self-sufficiency in forest policy in Australia. *Aust. For.*, 43 (3).
 Dept of Primary Industry, *Timber Supply Review*, various issues.
 Dixit, A. K.; Norman, V., 1980. *Theory of International Trade*. Nisbet, Cambridge.
 Douglas, I. G., 1983. Address to Australia and New Zealand Businessmen's Council Meeting, Sydney.
 Elliott, D. A.; Wije-Wardana, D., 1982. *Future Production from the Softwood Plantation Resources of Australasia, Chile and the Pacific Islands — A New Zealand View*. N.Z. Forest Service.
 Fenton, R. T., 1968. New Zealand export trade in forest products with Australia. *N.Z. Jl For.*, 15 (1).
 ——— 1979. Trans-Tasman forest products trade after a decade of NAFTA, 1966-75. *N.Z. Jl For. Sci.*, 9 (1).
 Ferguson, I. S., 1978. International trade in wood products: Recent developments and implications for Australian forestry policy. *Aust. For.*, 41 (1).
 Forest Industries Advisory Council, 1980. *Australia's Forest Products Industries*. Aust. Govt Publishing House, Canberra.

- Hanson, A. G., 1959. Australian future requirements of forest products. *Aust. For.*, 23 (1).
- 1962. Methods of forecasting demand for forest products. *For. & Timber Bur. Leaflet 85* (Quoted in Fenton, 1968).
- Holmes, F. W., 1966. Free trade with Australia. *Discussion Paper No. 10*. N.Z. Institute of Economic Research.
- 1976. Whatever Happened to NAFTA? *Evening Post*, 1 March.
- Industries Assistance Commission, 1980. Approaches to general reductions in protection. *Information Paper No. 2*. Tariffs as Taxes.
- 1981. *Draft Report on Wood and Articles of Wood*. Aust. Govt Publishing House, Canberra.
- IMF, *International Financial Statistics*. Various issues.
- Kindleberger, C. P.; Lindert, P. H., 1978. *International Economics*. Irving, Illinois.
- Krugman, P., 1983. New theories of trade among industrial countries. *Am. Econ. Rev. Papers and proceedings*.
- Lipski, S., 1965. "Aussie couldn't care less", the myth of Anzac union. *The Bulletin*, 4474: 24-9 (Quoted in Fenton, 1968).
- N.Z. Forest Service, *Statistics of the Forest and Forest Industries of New Zealand*, various years.
- National Business Review*, 1983. Special CER Feature (ed. Allan Parker), 30 May.
- Snape, R. H., 1973. *International Trade and the Australian Economy*. Longman Australia Pty Ltd.
- Williams, R. W. M., 1968. Trade in forest products between Australia and New Zealand, *N.Z. J. For.*, 13 (1).