NOTE

As checked by list on pages 32-35 of the thesis, the following Exhibits of Appendix 3 are lacking from copy 1:

22, 29, 31, 34, 35, 38
12 enclosures for 39
41, 42, 43, and 48.

The only supplement with copy 2 is Appendix 3, Exhibit 18A.

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THE CANADIAN PACIFIC
AIR FREIGHT CASE

Before the Air Transport Board
and the Canadian Cabinet, 1953.

by

Robert Wallace McRae.

A THESIS SUBMITTED IN PARTIAL FULFILMENT OF
THE REQUIREMENTS FOR THE DEGREE OF

MASTER OF ARTS

in the Department

of

Economics, Political Science, and Sociology

We accept this thesis as con­
forming to the standard required
from candidates for the degree
of

MASTER OF ARTS

Members of the Department of
Economics, Political Science, and Sociology

THE UNIVERSITY OF BRITISH COLUMBIA
April, 1954.
ABSTRACT

of thesis entitled

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April, 1954.
Air transportation, as an industry, has progressed in no country without substantial government support. Most nations have subsidized their commercial air services to such an extent that full government control has finally resulted. In the national interest, airlines are deemed both desirable and essential, despite their non-capability of full self-support. Hence, with government aid mandatory, it is logical that legislative attempts should be made to keep such aid at the lowest possible level consistent with the provision of safe, efficient and reasonably modern air services. Where a single airline must of necessity be paid a subsidy it is manifestly uneconomic to permit the entrance of a competitor in the same field. By so doing, the total subsidy required would undoubtedly increase inasmuch as each operator would move more than doubly distant from achievement of lowest possible unit costs.

This concept guided the Hon. C.D. Howe in the drafting of the original Trans-Canada Air Lines Act in 1937. By that act, Trans-Canada was given monopoly transcontinental privileges. These privileges were not seriously challenged until 1941. In that year, Canadian Pacific Air Lines was formed. This firm proceeded to progressively encroach upon the presumed domain of the government airline. By 1952, Canadian Pacific had acquired a patchwork coverage of the greater part of Canada, requiring only an east-west link to create a composite operation. To facilitate this final step, C.P.A. applied in November of 1952 for authority to operate an all-freight service between Montreal and Vancouver. The consequent Air Transport Board hearing and report to the Cabinet, and the ultimate Cabinet decision, provide the basic subject matter dealt with in this thesis.
Before the Board, C.P.A. contended:

1. that all-cargo carriers in the U.S.A. had been most successful in their operations,

2. that adequate Canadian air freight traffic potential was readily available for diversion from such surface transport facilities as rail express,

3. that conditions in Canada were even more favourable than in the U.S. for air freight development,

4. that T.C.A. had knowingly neglected the air freight field, concentrating its efforts upon the more readily lucrative passenger and mail traffic,

5. that the proposed C.P.A. service would create new air business, would not divert traffic from T.C.A. to an extent detrimental to the latter's finances.

Successive thesis chapters appraise, and in the opinion of the writer, totally negate these Canadian Pacific contentions.

In its report to the Cabinet, the Air Transport Board leaned heavily upon the evidence submitted by C.P.A. In essence, the Board report to the Cabinet recommended that the application be approved. The Cabinet chose to do otherwise. The application was denied. Apparently, the ministers had listened with conviction to the statements of T.C.A. President, Mr. McGregor and had given heed to the warnings of the economic witnesses, Professor Wines and Dr. Currie, as to the desirability of avoidance of the pitfalls which have beset Canadian railway experience.

In the light of the data assembled within this thesis, the writer contends that the Cabinet decision was fully justified. T.C.A.'s slow approach to reduced rate air freight haulage was sound in all respects. Unfortunately, however, it is noted that the application, the hearing and the resultant publicity have pressured Trans-Canada into establishing presently uneconomic air freight services rather than further jeopardize the monopolistic status of the firm.
Air transportation is inherently expensive. In no country has the air transport industry progressed without substantial government support. The current government subsidy for U.S. airlines is approximately eighty million dollars annually, aside from the considerable financial aid rendered through the furnishing of costly airway facilities for a fraction of the true service value involved. Aside from the U.S.A., most nations have subsidized their inter-city air carriers to such an extent that ultimate full government control resulted. Such was the case for British Overseas Airlines and British European Airlines. These nationalized operations are not to be returned to private ownership by the Conservative regime. The continuing annual subsidy requirements preclude such a step, aside from consideration of the public funds already invested without return. The concept would appear to be that in the national interest airlines are desirable and essential, despite their non-capability of self-support. Hence, if government support is mandatory, then it would seem reasonable that an attempt should be made to keep such support at the lowest possible point consistent with the provision of safe, efficient and reasonably modern air services. It was with that aim in view that the Hon. C.D. Howe piloted the original Trans-Canada Air Lines Act through the Commons in 1937. Trans-Canada was given
monopoly privileges in the domestic trunk-line field as well as prior rights to such international route extensions as deemed desirable by the government.

These T.C.A. monopoly privileges were not seriously challenged until 1941. In that year, Canadian Pacific Air Lines was formed. This firm proceeded progressively to encroach upon the presumed domain of the government airline. By 1952, Canadian Pacific had acquired a patchwork coverage of the greater part of Canada, predominantly on a north-south basis. All that was required was an east-west link to create a composite operation. To accomplish this final step required an open challenge of government policy at government level. To make possible the delivery of this challenge, C.P.A. applied in November of 1952 for authority to operate an all-freight service between Montreal and Vancouver. The consequent Air Transport Board Hearing and Report to the Cabinet, and the ultimate Cabinet decision have provided the subject matter with which this thesis is primarily concerned.

It will be noted from the Table of Contents that voluminous appendices accompany the Library copies of this thesis. Essentially, they comprise documentary data which the writer felt would be of use to students at some future time in the appraisal of a subsequent and comparable enquiry such as the government will undoubtedly be called upon to conduct. Adequate excerpts are included
in the thesis proper to obviate the necessity of reference to the appendices unless a more detailed study of the topic is desired. The only exception involves Appendix III, Exhibit 18A, the Douglas Aircraft Company's submission to the Air Transport Board on the behalf of Canadian Pacific Air Lines. However, a copy of this Exhibit 18A accompanies each thesis volume.

Robert W. McRae.

Toronto, Ontario.

March, 1954.
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Mr. T.H. Martin, General Manager, Canadian National Express.

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Chapter I

Trans-Canada Air Lines

Background Data
as to Formation and Relevant Government Policy.

Until 1937, Canada lagged behind the United States of America and the countries of Europe in the matter of scheduled air transport. Admittedly, Canadian air services between rail head and the northern mining areas had been developed to the point where they were carrying more freight each year than were those of any other country in the world. In addition, these frontier operators had built up quite a sizeable mail and passenger business. Nevertheless, Canada was virtually the only remaining civilized nation without an air service linking its main population centres on a competitive basis with paralleling rail and highway carriers. Canadian air mail and passenger traffic was being diverted to the transcontinental air lines of the United States. This diversion was facilitated by U.S. operated trans-border links such as Vancouver-Seattle, Winnipeg-Fargo and Montreal-Albany. A number of major centres, such as Toronto, Hamilton, Windsor and Halifax, were served by no air line whatsoever. This was the state of Canadian air transport in 1937.

In the spring of that year, the federal government enacted a measure setting up Trans-Canada Air Lines.
The crown corporation thus created was organized as a wholly owned subsidiary of the Canadian National Railway System, the government's existing transportation agency. As conceived by those enacting the measure concerned, T.C.A. was to fly only the main line, coast to coast routes plus such others as designated by the federal government as being of national importance. Owing to the fact that Canada had lagged behind the U.S.A. not due to any lack of initiative on the part of private operators but more due to lack of airway facilities. Particularly under the Hoover administration, federal funds had been available in lavish amounts to subsidize air line operators in the matter of airway facilities and mail pay. Expenditures for the latter culminated in the alleged scandals revealed by the Roosevelt administration in 1933-34. However, following the meting out of heavy penalties in this regard, the Democrats went on to spend even more liberally than their predecessors in the matter of airline subsidy.

No such large scale expenditures on the development of scheduled air transport took place in Canada prior to the advent of Trans-Canada Air Lines. Until 1927, such aid as was given was confined to rather conservative air mail contracts. In that year, the Department of National Defence started work on some 92 airports along a proposed
trans-Canada route. By the spring of 1930, the Winnipeg-Calgary-Edmonton sector was ready for night or instrument operations. Air mail service commenced in March of that year, being provided by Canadian Airways under contract to the Post Office Department. A daylight mail service was next contracted for between Moncton-Montreal-Toronto-Detroit. The link between Detroit and Winnipeg was furnished by existing U.S. air lines. The funds to finance purchase of the necessary operating equipment used by Canadian Airways were furnished by the Dominion Government and the Canadian Pacific Railway Company. Each put up $250,000. The presidents of both the Canadian National and the Canadian Pacific, Mr. Hungerford and Mr. Beatty, became vice-presidents of the air firm, which had been formed through a consolidation of a group of independent lines. The Duff Commission of 1931 noted that this apparent teamwork "may well prove to be the foundation of a proper co-ordination between the two agencies of transport." (1)

All might have gone well but for the depression. As it was, the service lasted only two years. The Conservatives replaced the Liberals in Ottawa in 1930. The cancellation of the mail contract was but one plank

(1) Report of the Royal Commission to Enquire into Railways and Transportation in Canada, 1931-32; King's Printer, Ottawa, 1932; p. 57. (Duff)
in their platform of financial retrenchment adopted in the recession's depth in 1932.

Although actual inter-city mail flying was suspended at that time, planning for an ultimate all-Canadian route continued. Under the Bennett regime, development of intermediate landing fields was carried forward at intervals of about one hundred miles across the entire Dominion. The work done, however, was of a most unsatisfactory nature. Primarily, the program was aimed at keeping the single unemployed out of the cities. The basic rate of pay was 20¢ per day, an amount not conducive to efficient labour.

By the time the Liberal party, under Mackenzie King, was returned to power in 1935, seven millions had supposedly been invested in the airway project. No specific plans had yet been laid for the flying of the route. With the Liberals back in power, the situation changed rapidly. The various governmental agencies for the supervision and assistance of commercial aviation were consolidated into a unit of the newly formed Department of Transport. Hon. C.D. Howe, of Port Arthur, was named head of this new department and assigned the task of supervising the equipping of the air route with modern instrument flying facilities, from coast to coast.

Beam navigational aids and visual beacons were installed. Meteorological stations, linked together by
teletype, were provided at all base points. Federal grants were made to such cities as already had airports for the purpose of providing lengthened, hard surfaced runways and adequate hangar facilities for transport aircraft. In some cases, such as at Toronto, entirely new air fields had to be built. Due in large measure to the industry and organizational abilities of Mr. Howe, the work was carried forward rapidly and at fairly reasonable cost. By the spring of 1937 the Winnipeg-Vancouver leg was ready for inauguration of actual scheduled services.

The next question to be answered was: "Who should operate the proposed services?" Several alternative plans were available for consideration. For one, the government could subsidize an existing operator such as Canadian Airways, with the line then being flown on a basis similar to that on which the U.S. network had been built. For another, the government could operate the air line itself, maintaining commission control as is done with Australia's national air line. In actuality, a middle road was followed, a crown corporation being set up to provide the desired services. In the planning, provision for participation of the C.P.R. was made but with negative result. On March 31, 1937, Mr. Howe stated in parliament:

... we expected almost until the day when we introduced this bill that our two principal railway companies would be shareholders in the enterprise. We learned at the last
moment that the directors of one large company decided not to take up the enterprise, and therefore we had to make a very quick change in the bill. I have always been of the opinion that the railroads were the proper bodies to lend stability to this enterprise. (2)

In the Senate, approximately a year later, the question of Canadian Pacific or other private participation was again raised. Senator Meighen gave his own explanation of the situation with the following remarks:

... although the other private companies did come forward, they did not produce cash ... What they were ready to give apparently ... was some kind of stock. But the government decided to take the whole thing over, and a new situation now has arisen. The Canadian National Railways are now 100% owners of Trans-Canada Air Lines. (3)

In actuality, Canadian Airways and other independent operators would approach the enterprise only on a basis of offering bush type aircraft in exchange for stock. It should, of course, be noted that Para. 3, Section 7 of the Trans-Canada Act precludes the Canadian National from disposing of more than 49% of the Capital Stock without prior approval of parliament. It was, therefore, as reasonable that the C.P.R. stayed clear of the enterprise as it was sound policy that the government should include such a restriction.

(2) Parliament, Commons, Official report of debates, page 2555. (March 31, 1937)
Despite sporadic outbursts from Conservative and C.C.F. members, the great majority in both Houses seemed agreed that direct operation by the government would hinder, rather than help, the proposed air line. As Mr. Howe pointed out:

... an accident on the Canadian National at the present time would cost far less in injury claims than would have a similar mishap on the Intercolonial during the days of direct government operation. (4)

Further, the logic of placing the airway in control of the C.N.R. was conceded by the majority of those taking part in the discussions. Hence, with such general concurrence in a project sponsored by the party with such a comfortable majority, the bill was passed with relative rapidity, receiving royal assent on the 10th of April, 1937. (5) As Mr. Howe summated:

Under this bill we shall get the best features of government ownership without the obligations of direct government operation . . . . (6)

The extent to which Mr. Howe's contentions proved correct over time must remain a matter essentially of opinion. However, the T.C.A. version of its own success may be appraised from the testimony of Mr. McGregor, company president, as given during the course of the 1953 Air Freight Hearing before the Air Transport Board, as dealt with in Chapter IV, Part II, of this thesis, as well as from the T.C.A. Annual Report for 1952 as submitted with this thesis as Appendix I.

(5) Bill 74, Ch.43, St. of Canada, 1 George VI, 1937.
Chapter II

Canadian Pacific Air Lines

The Canadian Pacific Railway Company's interest in commercial aviation dates from 1930. In that year, as noted in the preceding chapter, the railway and the government put up matching contributions of $250,000 each to form Canadian Airways, Limited. In addition to the joint vice-presidency of Mr. Beatty with Mr. Hungerford, an additional C.P.R. voice was added to the directorate in the person of Mr. James A. Richardson. A Canadian Pacific director, Mr. Richardson's basic business interests were the Winnipeg grain and investment firms which he headed. In the 1930 C.P.R. Annual Report, a holding is shown of 10,000 shares of Canadian Airways stock of no par value.

As the depression deepened, however, the C.P.R.'s concern with its aviation investment steadily lessened. With the railway's decision not to accept a subsidiary role under the Trans-Canada Act of 1937, Canadian Pacific management appeared to have been ruled out of the airline picture.

The outbreak of war brought the C.P.R. back into aviation. An Air Services Department was organized in 1940, in co-operation with the British Ministry of Aircraft Production. This department set up the original trans-Atlantic ferrying services, moving military craft to
Britain. To the company's credit, the shareholders were advised, in the 1940 Annual Report of the railroad's operations, that their firm was "being reimbursed only for the direct costs incurred in performing these services." (1)

The ferrying duties were taken over by the Royal Air Force on July 15th, 1941, with the C.P.R. switching its wartime assistance to the operation of air observer schools under the British Commonwealth Joint Air Training Plan. In so doing, the company acquired a number of existing operators whose restricted peacetime activities were seeking outlet in war work. Included amongst these concerns was Yukon Southern Air Transport, headed by Mr. Grant McConachie, a dynamic individual who stayed on with the consolidated venture as General Manager of Western Lines. A bush pilot who had graduated to management, Mr. McConachie rapidly saw to it that the operations of the new firm, Canadian Pacific Air Lines, were not in any way restricted to the training of air observers. At that point, the firms acquired comprised: Arrow Airways, Limited, Dominion Skyways, Limited, of which the entire capital stock was purchased; Prairie Airways, Limited; Canadian Airways, Limited; Wings, Limited; firms in which controlling interest was obtained. The investment of the parent company to that time was $3,400,000. (2)

(1) Canadian Pacific Railway Annual Report, 1940, p.15.
(2) Canadian Pacific Railway Annual Report, 1941, p.12.
By 1942, Canadian Pacific Air Lines, Limited, had acquired direct control of five air observer schools, as well as controlling interest in Quebec Airways, Limited, operator of two further such schools. The company took a most active part in the development of the Northwest Staging Route to the Orient, as well as in that of the Alaska highway and the Canol project. During the year 1942 agreements were concluded for the purchase and transfer of the entire assets of those firms previously only controlled, together with the entire assets of a series of other operators, to the total of eleven in all. By the end of that year, the C.P.R. had invested $4,725,917 in its airline undertakings, estimating in its yearly report that "90% of its subsidiary's business handled is directly connected with the war effort." (3)

During 1943, two more millions were invested. Mr. McConachie had become General Manager of Operations, and with a James J. Hill approach, he was already laying plans for international operations despite the precluding provisions of the Trans-Canada Act. The 1943 C.P.R. report stated that:

"Detailed study has been made of the possibilities of your company's air activities and a number of new routes and extensions of existing routes in the international as well as the domestic field will be made whenever this is

permitted by the government policy. The in-
terim policy announced by the government would
exclude private operators from the field of
international operations.

Your directors feel that, if Canada is to
occupy a place in air transportation which its
geographical situation and the abilities and
experience of its citizens justify, there is
urgent need of an air policy which will afford
Canadian industry an opportunity equal to that
enjoyed by the citizens of other countries. (4)

This government policy had been stated most specific-
ally in parliament on April 2nd, 1943, by the Right Hon.
W.L. Mackenzie King, Prime Minister, excerpts following:

I should like to make a statement of the policy
of the government on civil air transport. First
with respect to domestic aviation:

.....
4. Trans-Canada Air Lines will continue to be the
instrument of the government in maintaining all trans-continental air transport services
and in operating services across international boundary lines and outside Canada. The govern-
ment will encourage the company to obtain modern aircraft which will keep present services up to
modern standards and will expand these services to the fullest extent that post-war conditions
permit. The development of supplementary routes will continue to be left to private
enterprise, unless considerations of public interest indicate that certain of these routes
should be designated by the government as routes to be operated by T.C.A. The operations of T.C.A.
will continue to be limited to important services of a mainline character, where the volume of
passenger and mail traffic justify it.

.....
Conclusion:

10. The policy of the Canadian government on air
transport may be summed up as follows:

(a) The government sees no good reason for changing its policy that Trans-Canada Air Lines is the sole Canadian agency which may operate international air services.

(b) Within Canada, Trans-Canada Air Lines will continue to operate all trans-continental systems, and such other services of a mainline character as may from time to time be designated by the government. Competition between air services over the same route will not be permitted whether between a publicly-owned service and a privately-owned service or between two privately-owned services. There will remain a large field for the development of air transport in which private Canadian companies may participate, and, while preventing duplication of services, the government will continue to encourage private companies to develop services as traffic possibilities may indicate. (5)

The Canadian Pacific management undoubtedly found the foregoing statement of policy adequately clear. However, the investment in C.P.A.L. was furthered to a total of $7,400,000 by the end of 1944. Obviously, the C.P.R. was banking on a government change, or at least a modification of the Liberal government's policy. The tone of the 1944 report to shareholders, however, was not too hopeful.

At the last annual meeting reference was made to the policy announced by the Government of Canada with respect to post war aviation. Since that time, legislation has been enacted giving effect to that policy. The act prohibits the issue of a licence for a commercial air service owned, leased or controlled or operated by a carrier engaged in another form of transportation unless the Government-in-Council is of the opinion that it is in the public interest that such a licence should be issued. (6)

(6) C.P.R. Annual Report, 1944, p. 15.
A further provision of the act referred to in the 1944 C.P.R. report provided for the setting up of a three man Air Transport Board. This body was to supplant the administration of the Board of Transport Commissioners with respect to aviation. Under the act, the A.T.B. is to advise the Minister of Transport on civil aviation; to license all forms of commercial air transport on the basis of public convenience and necessity; and to exercise economic control in the matter of financial responsibility, schedules, rates and charges, insurance and other matters. All existing licences at the time of its inception were to be reviewed by the A.T.B., powers being provided in the act to cancel or suspend any such licence it saw fit. Provision was also made that such licences as were not so cancelled or suspended should cease to be valid one year after the termination of the war in Europe.

Despite doubts as to the future, Canadian Pacific Air Lines continued to expand. Trans-Canada was expanding rapidly, but not rapidly enough to cope with new route demands or slowly enough to keep within a balanced budget. In consequence, C.P.A. undertook to extend its services from Whitehorse in the Yukon to Fairbanks in Alaska, as agent under contract for T.C.A.

Throughout 1945 and 1946, the Air Transport Board conducted its appraisal of the industry. By 1947 the survey was completed. Under the terms of the A.T.B. decision,
Canadian Pacific relinquished almost all of the non-scheduled air charter licences previously held. On the other hand, certain new routes were assigned including the scheduled services between Vancouver and Prince Rupert, Vancouver and Calgary via Penticton and Cranbrook, Winnipeg and Flin Flon via the Pas, and the Seven Islands-Knob Lake run. In order to meet the requirements of the new services, nine new twin engine aircraft were acquired and twenty-six of the smaller planes were disposed of.

In 1948 further routes and route extensions were added, including Vancouver to Whitehorse via Sandspit, Dawson City to Aklavik, Montreal to Val d'Or. 1948 saw the commencement of discussions between the C.P.R. and the government to do with C.P.A.L. being enabled to conduct two proposed international air routes, one to the Orient, the other to the Antipodes. In this regard, explanatory literature is simply not available. However, Trans-Canada was suffering heavy losses on its overseas runs despite subsidy provision. Canadian Pacific was prepared to take on the Pacific runs without subsidy, and, incidentally was prepared to purchase North Star aircraft for the purpose from the government sponsored Canadair plant. Canada, Australia and New Zealand had previously agreed that such Pacific runs between Commonwealth countries should be jointly operated by government sponsored flag lines such as Trans-Canada. The objections of Australia
were overcome in 1949, and the service to that country inaugurated in July of that year. New Zealand acceded to Canadian government requests, with service finally started in 1951. The Pas run was extended to Churchill in 1949, as was the operation out of Montreal to Noranda. In 1949, also, the Orient run was established. By the end of that year Canadian Pacific Air Lines represented, at book values, an eleven million dollar enterprise.

Financially, from a profit motive, the C.P.R. directorate must have been strictly guided by an appraisal of future returns, as evidenced by the following tabulation of net profits and losses, after depreciation, as taken from the company's annual reports.

<table>
<thead>
<tr>
<th>Year</th>
<th>Profit</th>
<th>Loss</th>
</tr>
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<tbody>
<tr>
<td>1943*</td>
<td>236,573</td>
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</tr>
<tr>
<td>1944</td>
<td>767,109</td>
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</tr>
<tr>
<td>1945</td>
<td>308,066</td>
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</tr>
<tr>
<td>372,371</td>
<td></td>
<td></td>
</tr>
<tr>
<td>1946</td>
<td>584,266</td>
<td></td>
</tr>
<tr>
<td>1947</td>
<td>193,645</td>
<td></td>
</tr>
<tr>
<td>1948</td>
<td>113,000</td>
<td></td>
</tr>
<tr>
<td>1949</td>
<td>113,000</td>
<td></td>
</tr>
<tr>
<td>1950</td>
<td>1,100,000</td>
<td></td>
</tr>
<tr>
<td>1951</td>
<td>364,000</td>
<td></td>
</tr>
<tr>
<td>1952</td>
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<tr>
<td></td>
<td>$2,039,371</td>
<td>$2,202,659</td>
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</table>

*the 1943 figure is a cumulated total shown in the report for that year and covering 1941-43, inclusive.

Aviation is an unusual business. Canadian Pacific, in the period reviewed above, had lost a Lockheed on a mountain top east of Chilliwack, a North Star in Tokyo Bay, a DC-4 which disappeared off the B.C. coast, a DC-3 which was blown up over Quebec and another DC-3 which crashed on final north
of Penticton. These losses, coupled with the paucity of annual returns indicated in the foregoing table, do little to recommend aviation as a field for investment. However, airlines generally, and C.P.A.L. included, employ rapid write-off depreciation plans, amortizing over five to seven years. Hence, reserves for purchase of new equipment quickly accrue, being available for expansion purposes long before the aircraft so depreciated have been retired from service. Further, the aircraft obtained by the company at the war's end were acquired in a depressed market, glutted by war surplus machines. At today's prices, these aircraft have a market value of anywhere up to four times their price at acquisition. Whether this condition will persist with cessation of hostilities in Korea remains to be seen. Korea, incidentally, made possible the profits shown for 1950 to 1952, through the carriage of troops for the United States government. However, regardless of the cause, C.P.A. was making money at last, had recouped most of the previous losses, had evidenced a considerable potential capital gain on assets. In consequence, the company was ready for further expansion as evidenced by the following statement for the parent company's annual report for 1952:

Application has been made to the Air Transport Board for a licence to operate a scheduled commercial air cargo service from Montreal to Vancouver, via Toronto, The Pas and Edmonton. Plans
are being made for an expansion of the trans-Pacific services to provide for a through route between the Orient, Mexico and South America.\(^7\)

Trans-Canada Air Lines was fast losing its monopoly privileges. Mr. King's statement of policy, as enunciated in 1943 and set out on pages 12 and 13, had lost weight in the light of actual events. Mr. Howe, under whose guidance T.C.A. had been conceived and fostered, made periodic attempts to turn the tide. One such, made in the House of Commons on March 17th, 1944, is rather revealing:

\[\ldots\ldots\ldots\text{it is worth while stressing the fact at this times that the Canadian Pacific Railway Company and Canadian Airways were each offered one-third participation in the Trans-Canada Air Lines enterprise, and that both refused to participate in a company with the identical financial arrangements that now apply to Trans-Canada Air Lines.}\]

It had been contemplated that Trans-Canada Air Lines would be a non-competitive, non-profit system of transportation by air, planned to avoid duplication of services that were the outgrowth of competitive building for profit in the field of surface transportation. The Trans-Canada Air Act contemplated that Trans-Canada would operate all the principal routes parallel to the international boundary, as well as Canada's interest in all international routes, and these on a non-competitive basis. The field of routes into Canada's northland, as well as the field of air services in the settled areas complementary to the Trans-Canada operation, was left to private enterprise. The reason for this is not hard to explain. Trans-Canada was to be a high standard operation, competitive with paralleling trans-continental air transport services in the United

\(^7\) C.P.R. Annual Report, 1952, p. 16.
States. Canada, having one-twelfth the population of the United States, could support one service of this type, as against three similar parallel services in the United States, but, obviously, to have a second coast to coast service in Canada would be wasteful and unjustifiable. Service to the public must be the paramount consideration, and it seemed obvious that the competitive type services would not offer the lowest cost to the public. An impartial analysis of the situation today leads to no other conclusion. However, the newly formed Canadian Pacific Air Lines has lost no time in challenging the non-competitive position of Trans-Canada Air Lines, and is reaching out for new franchises; this at a time when it alone seems able to buy new and modern equipment.

To clarify the situation, the Prime Minister made a statement with respect to policy . . . in 1945. . . . The policy then enunciated continues to be the policy of this government.

This statement of policy, I regret to say, failed to bring about the desired effect in the development of privately owned air services within Canada, nor did it end intervention of private interests in the international field. It is becoming obvious that ownership of airways by our two competing railway systems implies extension of railway competition into transport by air, regardless of the government's desire to avoid competition between air services. In the old days, competitive railway building developed pressure methods for obtaining new franchises. Such methods must not have a place in the development of our airways. (8)

However, Government policy may not have changed. That fact seemed immaterial to C.P.R. management. Canadian Pacific Air Lines continued to nibble its way piecemeal into Trans-Canada's supposedly restricted economic larder. Government policy was not so much being changed as it was being progressively undermined.

(8) Parliament, Commons, Debates, 1944, No.33, p.1618.
As indicated in the map on the preceding page, by 1952 Canadian Pacific Air Lines had a patchwork coverage of the greater part of Canada. All that was required was an east-west link to create a composite operation. To accomplish this final step required more than the usual route segment skirmishing. It called for an open challenge of government policy at government level. Hence, C.P.A.l. proceeded to prepare for same, to the accompaniment of much publicity fanfare and with the apparent tacit blessing of certain members of the government itself.

Specifically, Canadian Pacific applied to the Air Transport Board for a licence to operate: (on a cargo only basis)

Scheduled commercial air service between the terminals Montreal, P.C. and Toronto, Ontario and the terminal Vancouver, B.C. serving the intermediate points of The Pas, Manitoba and Edmonton, Alberta. Traffic originating at Montreal destined Toronto or originating in Toronto destined Montreal will not be carried. (1)

In subsequent testimony it was learned that C.P.A.l. had been preparing for this application since early 1951, a survey of the proposed route's potential having been made by the Douglas Aircraft Company on the airline's behalf in April of that year. However, it was a well kept secret, at least from the public viewpoint, inasmuch as no press reference to the plan was made until November 10th, 1952.

(1) Application, as filed with Air Transport Board by C.P.A.l.; Particulars of Application, 1.1, 1952.
Notice as to this application's receipt was prepared by the Board for mailing to all interested parties. Said notice contained a supplementary rider that considerably widened the scope of the proposed hearing, stating that:

The Board desires to obtain from as many interested persons and public bodies as possible views on the necessity or otherwise for the development of domestic air cargo services. For this reason the Board invites representations from persons and public bodies in the area affected. (2)

Hence, it was the Board's intent to endeavour to appraise both public and private opinion on the subject of Trans-Canada's monopoly privileges. Assuming that every effort would be made to reveal all relevant facts, the broadened nature of the enquiry was well conceived.

In any case, the Board would not have the final word in the matter. Under the provisions of the Aeronautics Act, the Air Transport Board is simply a fact finding body when it comes to decisions involving changes in government policy to do with air lines owned by surface carriers. In such cases, the Board is charged with the responsibility of gathering in all relevant data, assimilating same into an unbiased report, with or without recommendations, to be forwarded to the Cabinet for consideration and decision at that level.

The Notice of Application was mailed from the Air Transport Board offices on November 10th, 1952. From the

standpoint of helpful Canadian Pacific publicity timing, the date of mailing was well chosen. On that date, at Montebello before the Air Industries and Transport Association, Hon. Lionel Chevrier made a series of broad statements covering the applications receipt, the proposed general hearing plus comments indicative of impending changes in government policy relative to air transport. At one point in his address, Mr. Chevrier said: "...there are plenty of grounds for optimism, given initiative on the part of the operator ... in the air coach and air cargo markets there are great sources of new traffic." (3)

It should be noted that it was in the furtherance of these two fields that Trans-Canada Air Lines had been accused, from time to time in the press, of being unduly tardy.

Mr. Chevrier went on to deal with government policy in the regulation of competition, stating:

In the domestic field, trans-continental air services of the type presently provided by T.C.A. will continue to be reserved for T.C.A. Canada does not enjoy the extremely high volume of trans-continental traffic that exists in the United States and the government's policy is soundly based on present economic considerations.

However, with the substantial growth of traffic in Canada it is no longer necessary to insist on monopoly conditions with regard to regional scheduled services. ...

... The policy I have described does not represent any change in basic objectives but rather an adjustment to ensure that, as conditions change, we are providing a policy that will

(3) Address by the Hon. L. Chevrier, Minister of Transport, Seigniory Club, Montebello, P.Q., November 10th, 1952, reprints issued by Department of Transport, Ottawa, p. 2.
assist in achieving those objectives. We intend to provide the best conditions for favorable development of Canadian commercial aviation. For example, Canada has been somewhat behind the United States in the development of regular all-cargo air routes but certain applications now before the Air Transport Board mean that we will have an opportunity for full review of the policy we should follow in this matter. (4)

For Canadian Pacific Air Lines, Mr. Chevrier's words radiated a welcoming green light; to Trans-Canada Air Lines there was illuminated a rather bewildering intermingling of amber and impending red. Inasmuch as Trans-Canada's directors had, in the months immediately preceding the Montebello speech, committed their firm to a thirty-two million dollar expansion programme, they were naturally concerned. With the finalization of the Royal Commission on the do.vitto Canadian Transportation in 1951, Trans-Canada had felt secure in going ahead with its long range plans for balanced development of passenger, mail and freight services. Canadian Pacific had had its chance to contest the nation's "chosen instrument" transport policy at the time of the Commission hearings. However, "no specific complaints were laid before the Commission with respect to air transportation." (5) Further, as to the state of competition in the field of Canadian Air Transport, the Commission commented:

Under present conditions the policy followed with regard to competition over scheduled

(4) Ibid., p. 8.
(5) Innis, Angus, Turgeon; Royal Commission to do on Canadian Transportation, King's Printer, Ottawa, 1951, p. 259.
routes appeared well conceived. In order that the public may continue to enjoy the advantage of regular air services, operators of such services must be assured of all the traffic offered between the points which they serve. However, the Air Transport Board has made some exceptions to the established policy and has permitted competition when satisfied that such competition would not unduly prejudice the scheduled operator. (6)

In consequence of the Notice of Application's receipt, Trans-Canada Air Lines by letter dated November 19th, 1952, requested the Air Transport Board to supply further particulars to do with the proposed service. Such were requested inasmuch as any person desiring to make representations had been advised in the Notice of Application to file a complete submission with the Board by December 31st, 1952, and to send a copy concurrently to the Applicant in Vancouver, B.C.

On December 11th, data of a primarily general nature went forward to T.C.A. This data indicated that two DC-4 aircraft with 16,000 pound capacity each were to be assigned to the route. A table of tolls, as set out below, together with a "statement of public interest" were included.

<table>
<thead>
<tr>
<th>Proposed Tolls (7)</th>
<th>Table 2.</th>
</tr>
</thead>
<tbody>
<tr>
<td>From:</td>
<td>To:</td>
</tr>
<tr>
<td>Edmonton</td>
<td>Montreal The Pas Toronto Vancouver</td>
</tr>
<tr>
<td>$ 2</td>
<td>$ 26</td>
</tr>
<tr>
<td>Montreal</td>
<td>26</td>
</tr>
<tr>
<td>The Pas</td>
<td>8</td>
</tr>
<tr>
<td>Toronto</td>
<td>23</td>
</tr>
<tr>
<td>Vancouver</td>
<td>9</td>
</tr>
</tbody>
</table>

(6) Ibid., p. 261.
(7) Particulars of Application made by Canadian Pacific Air Lines, as supplied to T.C.A. by A.T.B., para. 7.1
To do with the foregoing table, a footnote stated that rates in dollars per 100 pounds were to be applicable to shipments weighing 100 pounds and over, and rates for less than 100 pounds in cents. Further, these rates were to include pick-up and delivery from and to Canadian Pacific warehouses in city centres.

The paragraph referred to concerning "evidence of public interest" follows:

The great growth of and development in the transportation by air of air cargo by air services designed for that purpose in many other countries of the world is a clear indication that a service of this type would peculiarly meet the needs of Canada as a whole where distances are so great and the transportation of goods even by the fastest surface means available so relatively slow. (8)

As to queries from Trans-Canada Air Lines regarding data contained in the submissions of other interested parties, the Air Transport Board advised by letter of 9th January 1953 that "it is not the practice of the Board to provide copies of these submissions to interveners." (9) This aspect of the Board's regulations is dealt with in more detail in Chapter XI of this thesis.

However, following further correspondence, much additional data from the C.P.A.L. application was obtained. This information is contained in the "Supplementary Particulars of Application" transcribed in Appendix II of this thesis. It went forward to T.C.A. on December

(8) Ibid., page 1, para. 8.
17th, together with notification of an extension of the time limitation for submission by interveners, as had been requested by T.C.A. The new deadline was set at January 15th, 1953.

On the basis of the information contained in Appendix II, Trans-Canada Air Lines prepared the submission set out in Appendix III of this report. It will be noted that Appendix III is comprised of the exhibits, or summations of same, as filed with the Board during the course of the hearing. Hence, the T.C.A. submission appears as Exhibit 30 in the appendix, having been so designated by the Board.

On January 16th, 1953, the Air Transport Board formally announced that the Canadian Pacific Air Freight Hearing would commence at 10 a.m. February 17th, 1953, in the Auditorium, Dominion Bureau of Statistics Building, Tunney's Pasture, Ottawa, Ontario.

In retrospect, the period from November 10th, 1952 to February 17th, 1953, must have been spent in rather different fashions by the executives of the two corporations concerned. With the submission of their application, it is reasonable to suppose that Canadian Pacific Air Lines' preparation for the hearing was relatively complete. Their executive attitude must have been one of joyously placid expectancy. Members of Trans-Canada Air Lines' officialdom, on the other hand, presumably spent a very
busy three months endeavouring to outguess one another as to the evidence that might or might not be produced by Canadian Pacific Air Lines. Such evidence could conceivably cause the Cabinet to modify its policy as regards Trans-Canada's monopoly privileges. Trans-Canada had made a slow approach to the air freight industry. Their reasons for so doing, as outlined in the chapters that follow, were based upon their assessment of the economics of this phase of the aviation industry in the world at large and in the United States of America in particular. However, the Board and the public could see this inaction as disinterest and conclude that C.P.A.L. should have an opportunity to operate a parallel all-freight service across the Dominion.

In consequence, following upon the announcement of the application, T.C.A. intensified its activities in relation to air cargo. Efforts were made to ensure that no cargo offered was either turned down or delayed, whether its carriage was economically justified or not. In this regard, the press recorded some rather negative results for Trans-Canada Air Lines. First, T.C.A. attempted to set up a supplementary all-freight service between Montreal and Winnipeg using a leased C46 aircraft. The lessor was to have been Dorval Air Transport, Canadian subsidiary of a dominant U.S. all-cargo carrier, Slick Airways, Incorporated. This service was cancelled.
by the Air Transport Board the day it was to start. The relevant ruling was to the effect that Dorval's licence did not cover the proposed lease haulage. Simultaneously, a supplementary Trans-Atlantic freight service was attempted by T.C.A. For this route, a Tudor aircraft, leased complete with crew from Lome Airways of Toronto, was to be employed. The Department of Transport cancelled this service the day prior to its commencement, stating that the aircraft was not properly equipped with anti-icing facilities. Admittedly, the aircraft was not so equipped. However, it had been flying back and forth on Atlantic routes for Lome Airways on charter freight operations for some considerable time prior to the above mentioned grounding order.

Thus prevented from augmenting its freight haulage facilities, T.C.A. next proposed to meet the proposed rates of the C.P.A. service as covered by the application. The new tariff was filed with the Board by Aircargo, Inc., T.C.A.'s general freight agent, giving February 15th as the effective date. This tariff revision was suspended by the Board on January 20th, with the rider that further consideration would be given to it after completion of the impending hearing.

T.C.A. just could not win a point, and possibly, at that juncture, the government's airline would have been better advised not to have tried. In theory at least,
Trans-Canada Air Lines was about to go before the Air Transport Board with its long term accomplishments subject to review. Hence, government action to circumscribe Trans-Canada's last minute efforts to plug up any real or hypothetical holes in its dykes was to a great extent justified, assuming, of course, that an impartial review of the evidence involved was to be conducted by the Air Transport Board.
Chapter IV
The Air Freight Case
Evidence Put Before the Air Transport Board to do with the Canadian Pacific Air Freight Application

§§§ Part I - The C.P.A. Evidence

Canadian Pacific Air Lines' basic arguments to substantiate their application's justification are set out in Appendix II of this report, comprising the "Evidence of Public Convenience and Necessity" portion of their original submission. Hence, these should be first read to give clarity to what follows.

In this chapter the witnesses and their respective contributions are dealt with chronologically as they appeared before the Board. Inasmuch as the transcript for the hearing ran to a total of 1499 legal size pages of typewriting, only those details considered salient have been included. As before the Board, the C.P.A. case is dealt with first, then that for T.C.A. Actual appraisal of the evidence for either side, for the purpose of this report, is not attempted until succeeding chapters.

At this point it should be noted that the three key individuals taking part, aside from the witnesses, were the Hon. Philippe Brais, Q.C., counsel for C.P.A., Mr. Hugh O'Donnell, Q.C., counsel for T.C.A., and, of course, Mr. John Baldwin, Board Chairman. Top level legal assistance had been thus obtained, Mr. Brais being one of the 23 directors of the C.P.R. and Mr. O'Donnell a brilliant Montreal corporation counsel with a record of achievement on the Canadian National's behalf to do with rail freight cases.
As a general guide to the detail that will follow, a statement of exhibits filed with the Board during the course of the hearing is set out below. As noted previously, these exhibits, in full or summated form, are gathered together in Appendix III of this report.

<table>
<thead>
<tr>
<th>Exhibit Number</th>
<th>Exhibit Title</th>
<th>Submitted By</th>
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<tbody>
<tr>
<td>1</td>
<td>Details of Cargo Capacities</td>
<td>Mr. Gray</td>
</tr>
<tr>
<td>2</td>
<td>Statement of Freight Ton Miles</td>
<td>Mr. Gray</td>
</tr>
<tr>
<td>3</td>
<td>Statement, U.S. Freight and Express Revenues</td>
<td>Mr. Gray</td>
</tr>
<tr>
<td>4</td>
<td>Statement, Express Volume, C.P. Express</td>
<td>Mr. Gray</td>
</tr>
<tr>
<td>5</td>
<td>Statement, Revenue per return trip</td>
<td>Mr. Gray</td>
</tr>
<tr>
<td>6</td>
<td>Ground Operation and Maintenance Chart</td>
<td>Mr. Gray</td>
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<tr>
<td>7</td>
<td>Brief, Sherbrooke Chamber of Commerce</td>
<td>Mr. Rheaume</td>
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<td>8</td>
<td>Brief, Kitchener Chamber of Commerce</td>
<td>Mr. Rau</td>
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<td>Brief, Woodstock Board of Trade</td>
<td>Mr. Magill</td>
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<td>Brief, The Pas Board of Trade</td>
<td>Mr. Cox</td>
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<td>Brief, Flin Flon Chamber of Com.</td>
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<td>Brief, Prince Albert Board of T.</td>
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<td>Brief, North Battleford Board of Trade</td>
<td>Mr. Chadwick</td>
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<td>14</td>
<td>Brief, Lloydminster Board of T.</td>
<td>Mr. Shortell</td>
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<td>15</td>
<td>Brief, Edmonton Purchasing Agents Association</td>
<td>Mr. Walker</td>
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<td>16</td>
<td>Brief, Edmonton Chamber of Com.</td>
<td>Mr. McDonald</td>
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<td>17</td>
<td>Brief, Alberta and Northwest Chamber of Mines Mr. McDonald</td>
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<td>18</td>
<td>Brochure, Douglas Aircraft Corp. Mr. Crilly</td>
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<td>18A</td>
<td>Appendix to the above Mr. Crilly</td>
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<td>19</td>
<td>Douglas DC-6A Air Freight Study Mr. O'Donnell</td>
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<td>20</td>
<td>Statement, Aircargo Potentials Mr. Crilly</td>
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<td>21</td>
<td>Studies, Attitudes and Opinions re Aircargo Service Mr. Myles</td>
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<td>21A</td>
<td>Appendix to the above Mr. Myles</td>
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<td>22</td>
<td>Statement, Express Statistics, C.P. Express Mr. Myles</td>
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<td>23</td>
<td>Statement, Indirect Cost Analysis Mr. McConachie</td>
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<td>24</td>
<td>Memorandum of Agreement Between C.P.A.L. and C.P. Express Mr. McConachie</td>
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<td>25</td>
<td>Statement T.C.A. Aircargo and Air Express Mr. Brais</td>
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<td>25A</td>
<td>Letter re Weight and Revenue of T.C.A. Air Freight and Air Express Traffic Mr. Brais</td>
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<td>26</td>
<td>Statement, T.C.A. Revenue Subject to Competition Mr. McConachie</td>
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<td>27</td>
<td>Freight Ton Miles of United States Trunk and Local Service Airlines by Type of Equipment Mr. O'Donnell</td>
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<td>28</td>
<td>Fish - Canadian National Rail Express Rates per 100 pounds from The Pas to Winnipeg, etc. Mr. O'Donnell</td>
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<td>29</td>
<td>Fresh Fish, Rail Express Mr. Brais</td>
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<td>30</td>
<td>T.C.A. Submission Mr. O'Donnell</td>
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<td>31</td>
<td>Aircargo and Express, T.C.A. 1946-52 Mr. Johnston</td>
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<td>32</td>
<td>Letter, May 21, 1952, Air Transport Board to T.C.A. Mr. O'Donnell</td>
<td></td>
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<td>33</td>
<td>Letter, June 3, 1952, T.C.A. to Air Transport Board Mr. O'Donnell</td>
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34 Statement, Fish Shipments Mr. Brais
35 Statement, Time and Departures of Freight Mr. Brais
36 List of Requests from T.C.A. Mr. Brais
37 Submission of Prof. Waines, U. of Manitoba.
38 U.S. v. Canadian Rail Express Mr. Martin
39 Letter, March 1, 1953, T.C.A. to C.P.A.L., with 12 enclosures: Mr. Brais

A - Number of firms on T.C.A. aircargo mailing list.

B. - Direct operating costs per available ton-mile (T.C.A.)

C - Direct operating costs per mile. (T.C.A.)

D - Question and answer re payload, route segment Toronto Winnipeg under average conditions, with DC-3 and Bristol 170 aircraft.

E - Question and answer re payload of DC-3 and Bristol 170 under average conditions between Toronto and Winnipeg with any desired stop en route, e.g. Lakehead.

F - Transcontinental scheduled time with one hour at each en route stop for both DC-3 and Bristol type aircraft.

G - North Star direct operating cost per available ton-mile.

H - North Star direct operating cost per mile.

I - Operational weight figures of North Star passenger aircraft converted to all-cargo use, as proposed by T.C.A.

J - Details of shipments of furniture as requested by Mr. Brais from witness Seagrim.
X - Maximum permissible take-off weight, maximum permissible landing weight, operational weight empty, zero fuel and oil weight, floor loading, for DC-3 for 1952.

L - T.C.A. average load on the Toronto-Winnipeg leg, average for months March and September combined.

Letter, March 1st, 1953, T.C.A. to Mr. Hamilton, counsel for the Associated Airways of Edmonton. Mr. O'Donnell

Exhibits Number 41 to 43, inclusive, comprised supporting do.

T.C.A. contentions regarding do.

Submission of Dr. Currie, U. of Toronto.

Statement of delivery dates of T.C.A. aircraft on order. Mr. McGregor

Cost Analysis of Bristol 170 Mr. McConachie

Statement of ton-miles carried, 1948 as compared with 1951, by districts. Mr. McConachie

Analysis of Canadian Pacific proposed routes, prepared by Douglas Aircraft Company, April, 1951. Mr. McConachie
<table>
<thead>
<tr>
<th>Day</th>
<th>Date</th>
<th>Witness</th>
<th>Page</th>
<th>Exhibits Filed</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>17/2/53</td>
<td>Mr. Gray - C.P.A. Director of Engineering</td>
<td>7</td>
<td>1-5</td>
</tr>
<tr>
<td>2</td>
<td>18/2/53</td>
<td>Board of Trade witnesses</td>
<td>155</td>
<td>7-17</td>
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<tr>
<td></td>
<td></td>
<td>Mr. Andrews - C.P.A. Director of Flight Dispatch</td>
<td>273</td>
<td></td>
</tr>
<tr>
<td>3</td>
<td>19/2/53</td>
<td>Mr. Crilly - Dir. Douglas Aircraft Market Research</td>
<td>300</td>
<td>18-20</td>
</tr>
<tr>
<td>4</td>
<td>20/2/53</td>
<td>Mr. Crilly</td>
<td>461</td>
<td></td>
</tr>
<tr>
<td>5</td>
<td>23/2/53</td>
<td>Mr. Crilly</td>
<td>555</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Mr. Myles - Market Analyst Gruneau Research, Limited</td>
<td>572</td>
<td>21-22</td>
</tr>
<tr>
<td>6</td>
<td>24/2/53</td>
<td>Mr. Myles</td>
<td>621</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Mr. McConachie - President Canadian Pacific Airlines</td>
<td>632</td>
<td>23-29</td>
</tr>
<tr>
<td>7</td>
<td>25/2/53</td>
<td>Mr. McConachie</td>
<td>776</td>
<td></td>
</tr>
<tr>
<td>8</td>
<td>26/2/53</td>
<td>Mr. Seagram - General Mgr. Operations, Trans-Canada</td>
<td>789</td>
<td>30</td>
</tr>
<tr>
<td>9</td>
<td>27/2/53</td>
<td>Mr. Johnston - Director, T.C.A. Aircargo Department</td>
<td>935</td>
<td>31-36</td>
</tr>
<tr>
<td>10</td>
<td>2/3/53</td>
<td>Prof. Waines - Dean of Arts Faculty, U. of Manitoba</td>
<td>980-Fri. 997-Mon.</td>
<td>37</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Mr. Martin - Gen. Manager, Canadian National Express</td>
<td>1026</td>
<td>38</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Mr. Johnston - brief recall 1073</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Mr. Wiley - T.C.A. Traffic Dept. - brief appearance on point of methodology</td>
<td>1084</td>
<td></td>
</tr>
</tbody>
</table>
Tuesday Hearing adjourned until Wednesday 3/3/53 in deference to Canadian Pacific Air Lines personnel, their Comet aircraft having crashed at Karachi, India, the night of March 2nd, 1953.

11 Wed, 4/3/53 Mr. Dyment - Director of Engineering, T.C.A.

Dr. Currie - Professor, University of Toronto.

Mr. McGregor - President, Trans-Canada Air Lines.

Mr. McConachie - President, Canadian Pacific Air Lines.

Thurs. Hearing adjourned until Friday to permit counsel time to prepare for final summating argument.

12 Friday 6/3/53 Mr. Brais - Attorney for Canadian Pacific Air Lines.

13 Sat, 7/3/53 Mr. O'Donnell - Attorney for Trans-Canada Air Lines.
In addition to Mr. O'Donnell, counsel for the principal intervener, T.C.A., there appeared throughout the hearing two further lawyers representing interested companies. These were Mr. J.B. Hamilton, intervening on behalf of Associated Airways, Limited of Edmonton, and Mr. J.E. Wells, for Maritime Central Airways, whose operations link with those of T.C.A. in the Maritimes. Mr. Hamilton's firm sought to support the Canadian Pacific application, with the acknowledged intent of seeking similar freight run rights parallel to the existing scheduled passenger-mail-express-freight run of C.P.A.L.'s from Edmonton north to the Yukon, should the latter firm be successful in its application. Mr. Wells' supported T.C.A.'s opposition to the application with certain reservations. Maritime Central saw a threatened extension of the proposed C.P.A. freight run east into its own territory as an ultimate prospect, hence their opposition to the application.

Following preliminary skirmishing as to procedure, the hearing got under way on the morning of Tuesday, February 17th, 1953, with the calling of C.P.A.'s first witness, Mr. Gray, their Director of Engineering. Of the six exhibits filed by Mr. Gray, only one is of basic import, Number 3, wherein C.P.A. outlines the manner in which they derived their estimated potential air freight traffic for the route requested. This potential had been stated, but not clarified as to source, in Appendix II,
"Supplementary Particulars of Application," as follows:

In the year 1950, the tonnage of goods transported by air in the United States by domestic air carriers, including all-cargo carriers, amounted to 252,880 tons, which was 15% of the estimated total tonnage carried by rail express in that country.

It is not unreasonable to assume that a similar percentage would be carried by air in Canada if comparable services were available. This thus gives an estimated potential volume of air cargo traffic over the route applied for of 4,093 tons or 8,186,000 pounds.

In support of the claim that the proposed run would meet the test of "public convenience and necessity," Mr. Gray outlined the manner in which the eight million pound potential was derived. First, his firm had established the fact that the Canadian Pacific Express Company handled 27 million pounds of shipments between Montreal and Vancouver in 1951. Assuming an equal quantity handled by the C.N.R., a total traffic of 54 million pounds was arrived at. Hence, on the basis of the above stated U.S. penetration, 15% of the Canadian total yielded the forecasted potential of 8 million pounds. On the basis of this potential, Mr. Gray submitted that the following route segment load factors could reasonably be achieved:

<table>
<thead>
<tr>
<th>Route</th>
<th>Load Factor</th>
</tr>
</thead>
<tbody>
<tr>
<td>Vancouver to Edmonton</td>
<td>80%</td>
</tr>
<tr>
<td>Edmonton to The Pas</td>
<td>35%</td>
</tr>
<tr>
<td>The Pas to Toronto</td>
<td>80%</td>
</tr>
<tr>
<td>Toronto to Montreal</td>
<td>35%</td>
</tr>
<tr>
<td>Montreal to Toronto</td>
<td>40%</td>
</tr>
</tbody>
</table>

Table 3. (a)
A basic assumption of the evidence submitted by Mr. Gray was the concept that rail express business in Canada and the United States was essentially comparable as to rates, service and customer acceptance. Further, the load factors derived assumed a preponderance of manufactured goods westbound and of agricultural and other perishable products eastbound. For example, fruit and vegetables would be moved from B.C. eastward, with fish being the product moved out of The Pas. Based upon the given load factors, Edmonton to The Pas of 35% and The Pas to Toronto of 80%, then 45% of the available space per trip would be made up of fish shipments out of The Pas. For a DC6-A, such as the company contemplated using on the run with a 30,000 pound payload, this would represent a movement of 10,800 pounds of fish eastbound out of The Pas per trip scheduled. The witness agreed, and his superior Mr. McConachie subsequently verified, that the Canadian Pacific Air Lines sincerely believed that such movement would in fact take place.

Board of Trade Testimony

Following upon Mr. Gray's introductory evidence on Canadian Pacific's behalf, evidence was heard on Wednesday, February 18th, from delegates sponsored by various Boards of Trade and Chambers of Commerce, as indicated in the list of exhibits filed set out on page 32 of this report. All spoke in favour of the application. Their
testimony can best be summed by the inclusion of the following excerpts from their statements.

Mr. Rheaume of Sherbrooke: (1)

Due to the vastness of our country, any problems concerning transportation are of primary importance and any steps taken to speed up and increase transportation facilities of goods receive our full support.

Mr. Cox of The Pas: (2)

Yes, we are just waiting to enlarge our market for fresh fish until we can get the proper transportation facilities. At present the fishing industry of the north is pretty well throttled by the lack of money and proper transportation facilities.

Mr. Orrange of Vancouver: (3)

(Representing the Purchasing Agents Association of Vancouver; no brief filed.)

Our industrial development of the last few years makes it important for us to be able to move goods fast and safely. We believe air freight is the answer to this problem. Our climate makes it possible for us to produce vegetables, fruits and flowers ahead of the Prairie Provinces and these products should move as fast as possible from their point of origin to the consumer. We believe air freight is the answer once again.

Aside from the actual appearance of witnesses, numerous other representative groups including the Vancouver Board of Trade, the Toronto Board of Trade submitted supporting letters, and the Montreal Board of Trade. The general tenor was simply that all were anxious to avail themselves of the proposed service so long as no firm commitment.

(2) Ibid., page 172.
(3) Ibid., page 260.
as to the extent of its use was involved. Most distinguished contributor of supporting letters or briefs was Premier Douglas Campbell of Manitoba. Premier Campbell wrote to the Air Transport Board on December 31st, 1952, urging that the proposed service be authorized. He said in part:

As you will appreciate, transportation is of fundamental importance to the economic life of any region and this is particularly true for the northern portions of western Canada. For that reason I would like to take this opportunity of assuring your Board that the government of the Province of Manitoba is anxious to encourage the maximum and most economic development of the transportation facilities of northern Manitoba. It would appear that the cargo service proposed by Canadian Pacific Airlines Limited would peculiarly meet the needs of the northern areas of this province by providing a faster and more regular form of transportation to eastern and western Canada than is presently available. It is felt that it would also aid in the further opening up and development of northern Manitoba, which is vital to the economy of this province and Canada as a whole. For these reasons it is the hope of the province of Manitoba that the Air Transport Board will give very favourable consideration to the application which has been submitted by the Canadian Pacific Airlines Limited. (4)

The recording of testimony presented by the Board of Trade representatives occupied the greater part of Wednesday, February 18th. Following completion of their testimony, Mr. Andrews, C.P.A. Director of Flight Dispatch, appeared briefly to record the undisputable facts that all facilities required for the service en route were both available and entirely adequate.

(4) Ibid., pp. 1290-1291.
The Douglas Aircraft Company's Survey on C.P.A.'s Behalf

On Thursday, February 19th, 1953, Canadian Pacific Air Lines revealed two impressive documents in which, their counsel assured the Board, their case for application approval was firmly established. These documents were filed as Exhibits 18 and 18A. Together they represented a survey of the airfreight potential over the proposed C.P.A. route. 18A is made up of sixty detailed pages, containing fifteen figures and forty tables. Exhibit 18 is simply a pictorial summation of 18A, the two documents being so cross-referenced. Douglas Aircraft had, it was revealed in testimony, been engaged in this type of survey for the freight run in question since April of 1951 to do with the sales engineering services of the aircraft manufacturer. The original survey, as evidenced by Exhibit 48, planned on an operation via Winnipeg. This was subsequently changed to the finalized proposal via The Pas.

To present the report to the Board and to substantiate the claims contained therein, Douglas Aircraft had sent their Mr. William Crilly to Ottawa. Mr. Crilly is Director of the Douglas Department of Market Research. He holds a B.Sc. degree from the University of North Dakota and a B.B.A. degree from Stanford University.

Exhibit 18 is entitled "Airfreight in an Expanding Economy," and the first seven of its twenty-six pages are
devoted to a portrayal of a dynamic manner in which the mineral and other resources of Canada have been revealed and developed in recent years. Following that comes an outline of the economies of time and of money that will be afforded by the proposed C.P.A. service. On page ten it is graphically portrayed how Canada had apparently slipped in its aircargo development, having carried 19\% of the world's estimated ton-miles hauled in 1937 to barely 1\% in 1951. It is further illustrated that where aircargo rates in Canada and the United States were equal at 60\textcent per ton-mile in 1940, by 1951 the American rate average had fallen to 21\textcent per ton-mile against more than double that figure for Canada. It should be noted that the Canadian figure used in the substantiating tables set out in Exhibit 18A has a footnote reference stating that it covers revenue per ton-mile for "freight, express and excess baggage." (5) However, in justification, Mr. Crilly assured the Board that it was the only figure available to his firm for comparison.

A further page is devoted to the contention that airfreight growth is vital to Canadian development. "A difficult terrain requires a transportation system free of geographical barriers." (6) In this regard a composite

(6) Appendix 18, page 15.
Douglas DC-6A, Illustrating Height of Cabin Floor above Ground Level
rail and air mileage chart is included for the route between Montreal and Vancouver via The Pas. Total rail mileage is shown to be 3504 miles, against only 2550 miles via air. Hence, rail mileage is shown to be 37% greater than air mileage over the proposed route with consequent benefit to the air operator rate-wise competitively. A footnote indicates that the average rail mileage is only 17% greater than that for air in the United States.

The brochure, Exhibit 18, goes on to illustrate how 71% of Canada's manufacturing centres in less than 1% of its area. "This places a geographic handicap on the development of remote but important markets and increases the need for swift long range transportation. As noted in the Report of the Royal Commission on Transportation . . . . (states the Douglas Report)

'. . . the great difference in fundamental conditions between Canada and the United States . . . (is that) . . . producers and consumers in the United States with its large population have the advantage of a great number of widely distributed market and supply centres. The long haul is less in evidence there than in Canada. In this country, on the other hand, it is noticeable to what extent Central Canada, that is the eastern portion of Ontario and the western portion of Quebec, has become both the market centre and the supply centre for the rest of the country." (7)

The narrowing of the time gap between supply source

and market will be best achieved by airfreight, is the Douglas contention. The fact that Canadian shippers endeavour to do so more consistently than those of the United States is demonstrated through a comparison of per capita railway express shipments and transportation charges for the two countries. For Canada, it is shown that per capita railway express shipments amount to 3.2 annually against only .5 in the United States. Per capita national income accruing to the transportation industry in Canada is shown at $103 against only $87 for the United States.

Four pages of Exhibit 18 and nine of Exhibit 18A are devoted to a portrayal of the tremendous traffic potential available through stimulation of trade with the Orient. Inasmuch as Canadian Pacific already operates services to the Far East, a through plane freight service between Tokyo and Montreal is envisioned. An elaborate process for the derivation of specific potential traffic figures in this regard is appraised in the ninth chapter of this report.

As to actual potential for the domestic route, Mr. Crilly's report was most specific. From the graph reproduced on the following page, as taken from Figure 12, page 41 of Exhibit 18A, a price-demand relationship for Canadian airfreight was obtained. From this relation-
FIGURE 12
ANALYSIS OF CANADIAN PACIFIC FREIGHT TRAFFIC
JANUARY TO JUNE 1952

BILLIONS OF TON-MILES

0.1 0.2 0.4 0.6 0.8 1.0 1.2 1.4 1.6 1.8 2.0

0.2 0.4 0.6 0.8 1.0 1.2 1.4 1.6 1.8 2.0

0.1 0.2 0.3 0.4 0.5 0.6 0.7 0.8 0.9 1.0

PRODUCT OF AGRO-INDUSTRIES
PRODUCT OF MINES
PRODUCT OF FORESTS
ANIMAL PRODUCTS
ship a series of steps lead mathematically to precise figures in tons and dollars as to loads to be expected for each of the route segments, employing present volume for rail express as the data source for airfreight penetration. Mr. Crilly deleted reference to The Pas in his calculations, stating that Mr. McConachie and his company, the C.P. Air Lines, had knowledge of the fish potential out of that point which had been acquired through close association with the area and which was not possible for Douglas Aircraft to appraise.

Load factors for the route segments, as forecast by Mr. Crilly, and set out on page 22 of the Exhibit 18, are:

<table>
<thead>
<tr>
<th>Vancouver to Edmonton to Toronto to Montreal</th>
<th>Tons/Year</th>
<th>Load Factors*</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>1166</td>
<td>(43%)</td>
</tr>
<tr>
<td>.</td>
<td>309</td>
<td>(14%)</td>
</tr>
<tr>
<td>.</td>
<td>81</td>
<td>(3%)</td>
</tr>
<tr>
<td>.</td>
<td>1556</td>
<td>(506)</td>
</tr>
<tr>
<td>Totals---(1,556)</td>
<td>(93)</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Montreal to Toronto to Edmonton to Vancouver</th>
<th>Tons/Year</th>
<th>Load Factors*</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>332</td>
<td>(31%)</td>
</tr>
<tr>
<td>.</td>
<td>804</td>
<td>(80%)</td>
</tr>
<tr>
<td>.</td>
<td>675</td>
<td></td>
</tr>
<tr>
<td>.</td>
<td>1672</td>
<td>(2901)</td>
</tr>
<tr>
<td>Totals---(1,136)</td>
<td>(96%)</td>
<td></td>
</tr>
</tbody>
</table>

*Annual load factor over route segment based on proposed 5 day per week DC-6A service.

It will be noted that the Crilly report planned on five trips per week as opposed to the three per week outlined in the Canadian Pacific application. It would, of course, be
reasonable to assume that the service would be stepped up to five times weekly as rapidly as traffic would justify the increased flights.

Just how these forecasted load figures are in any way a sound derivation from the relationship plotted on page 46 requires further consideration. However, it would appear that the Canadian Pacific accepted the Douglas report at its face value and would have been gratified had the interveners seen fit to do likewise. In this regard, Mr. Brais stated:

I . . . refer the Board to Exhibit 16, page 22, which summarizes the data from the economic demand curve and applies it to the various areas which are to be served. It bypasses The Pas completely because he has nothing in his (Mr. Crilly's) information based upon studies of equivalent areas to allow him to take this fish market into consideration.

. . . so far as the demand curve is concerned it took me a long long time to understand it. Towards the end I was beginning to make something out of it, but I am afraid that if I went into it in too much detail I would first confuse myself and possibly in the process not confuse the Board but not help the Board.

There is the method followed. It has been explained in full detail by Mr. Crilly. He has been examined at length on the basis of that method. He says that it proves itself. He has given the origin, his working papers. (8)

More will be said to do with these working papers and origin of the method used in the chapters that follow.

However, at this point in fairness to the C.P.A. case, the load factors will be assumed as being soundly derived.

From the load factors, the actual revenues are easily arrived at for the route segments inasmuch as the rates per hundred pounds have already been given. Such a financial analysis for the route culminated Mr. Crilly's appraisal. Eastbound, an annual revenue of $432,232 was determined, and $1,766,120 westbound. Direct operating costs based upon C.P.A. methods explained on page 51 of Exhibit 18A were then applied as follows:

\[
(1.13/\text{mile} \times 6100 \text{ miles/round trip} \times 260 \text{ round trips/year})
\]

This summation, appearing on page 23 of Exhibit 18, yields a direct annual operating cost of $1,498,380.

In round figures, the following net income is derived:

<table>
<thead>
<tr>
<th>Costs &amp; Revenues for Projected Service-Douglas Forecast</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Revenue</td>
</tr>
<tr>
<td>Direct Operating Costs</td>
</tr>
<tr>
<td>Annual operating profit</td>
</tr>
</tbody>
</table>

As Mr. Crilly phrased it, this amount is the:

. . . balance to cover indirect expense and provide a profit. . . (However) . . . valid comparisons of costs with American air cargo carriers is difficult because of Canadian Pacific Express participation in this proposed operation. (9)

Mr. Crilly and his report were the subject matter for more pages of transcript than any other witness or document. Three days of the hearing were virtually entirely devoted to his evidence and examination. Detailed discussion of the methods and conclusions of Exhibit 18 and 18A is contained in the ninth chapter of this thesis. (9) Exhibit 18, page 23.
Mr. Crilly was followed on the stand by a Mr. Myles, an employee of Gruneau Research, Limited, Toronto. This firm conducts what might be termed economic Gallup polls throughout Canada. In addition, they have the Canadian franchise for the handling of the American "Starch Surveys," an abbreviated method for attempting to determine the efficacy of a given advertising campaign. In this regard, of course, their services are more known to the large advertising agencies than to the general public.

Mr. Myles, prior to coming with Gruneau Research, Limited in 1951, had acquired a B.A. and M.Comm. degree from the University of Toronto.

The eighty-two pages of figures and conclusions which comprised Mr. Myles' basic submission are to be found in Appendix III, Exhibit 21 and 21A of this report. As were Exhibits 18 and 18A, these reports were introduced at the hearing without prior knowledge on the part of the interveners. Exhibit 21 is entitled, "A Study of Attitudes and Opinions Concerning a Proposed Air Cargo Service." Exhibit 21A simply supplies the working papers for the results set out in its companion exhibit. Based upon firm names obtained by random sampling of the Canadian Pacific Express Company's way-bills for September 19th, 1952, 1,230 contacts were attempted across the country by Gruneau field representatives. From these
contacts, 1,000 completed interviews resulted. In each case some member of management consented to work through the entire questionnaire, as set out in Exhibit 21A, resulting in the following summating appraisal being made by Gruneau Research, Limited: (page 13)

1. An Air Cargo service could help with delivery problems in 68% of the companies which are regularly engaged in the shipment of merchandise between Montreal, Toronto, Edmonton, Vancouver vicinities.

2. The chief reasons why these companies think the proposed air cargo service could help are:

   (a) The time taken to transport merchandise between the vicinities would be reduced. (mentioned by 60% of the firms)

   (b) Air Cargo facilities would allow a more rapid movement of emergency shipments. (mentioned by 23% of the firms)

   (c) Prompt deliveries would result from the air cargo service. (mentioned by 19% of the companies.)

3. The location and character of the companies which would obtain the maximum benefit from the proposed air cargo service are:

   (a) Companies in Vancouver vicinity. (77% stated an air cargo service would help)

   (b) Companies which retail merchandise, and companies which wholesale merchandise. (72% and 71%, respectively, stated an air cargo service could help.)

   (c) Companies which usually specify the shipping method and who have shipped by air. (79% stated an air cargo service could help)

   (d) Companies handling optical and photographic supplies, jewelry, etc. . 81%; and companies handling perishable products. .77%.

4. Companies which do not think an air cargo service could help with their delivery problems. .32%.
Interviewing had commenced December 28th, 1952 and had been completed on January 17th, 1953. Essentially, the interviews were general in nature. The executive concerned was shown a tabulation giving present air express and aircargo rates, present rail express rates, and proposed, substantially reduced aircargo rates. The executives were told that "a firm" was to apply for permission to operate at the proposed rates and were queried as to what interest such would hold for the interviewed firm in question. Canadian Pacific was not specifically referred to in any of the form questions asked. In this regard, Mr. Brais stated in his summation:

With regard to Mr. Myles, we have his conclusions on page 12 of Exhibit 21. I should like to draw the Board's attention to those conclusions. . .

I . . . ask the Board to bear in mind that it was applied to a cold market. Nobody at the time had been apprised in any manner . . . There was no advertising, no propaganda, and no communications to any of these people to tell them that a company such as Canadian Pacific Air Lines, a subsidiary of the Canadian Pacific Railway, well known in this country, was planning to develop an aircargo line.

. . . This was a cold survey dealing with people who at the moment of the interview were told of an application for an aircargo line -- I do not think it was even an application, a proposal, that is correct -- and they gave their opinion. (10)

In this statement, Mr. Brais was somewhat in error. However, appraisal of his views and those of Mr. Myles is deferred to the following chapters. (See Ch.VII, p.146 et seq.)

(10) Official transcript, Air Freight Hearing, page 1293.
The Evidence Submitted by President Grant McConachie, C. F. Air Lines.

Douglas Aircraft Company and Gruneau Research, Limited had each, in a different way, appraised the proposed Canadian Pacific Air Lines Montreal-Vancouver air freight service. It remained for Mr. McConachie to summate their views together with his own in support of his company's application to the Air Transport Board. Mr. McConachie was the final C.P.A. witness, his testimony being completed on the morning of Thursday, February 26th, 1953. Note has already been made on pages 10 and 11 of this report of Mr. McConachie's close association over the years with Canadian aviation and with Canadian Pacific Air Lines in particular since its formation in 1941.

Mr. McConachie informed the Board that he had personally made a study of the air cargo operators in the United States, such as Slick and Flying Tigers. In this regard, he had travelled extensively surveying their operations and discussing relevant problems with their management personnel.

As to potential load factors, Mr. McConachie noted that westbound he felt there would be no problem. From Vancouver to Edmonton, eastbound, loads would also be adequate. However, he had been concerned over loads to be offered from Edmonton east. Hence, he contended,
the routing had been diverted from Winnipeg to The Pas. By so doing, it was planned to tap the fish market in the East with a quality product still classified as fresh. Mr. McConachie stated:

With this in view we approached the fish companies. We approached our agents. We discussed it with our district men to find out as to whether there would be a steady flow of this product from this area and we determined there would be. This flow of traffic from The Pas was heavier than any other point in Canada could generate for the east. (11)

Further, it was felt that fresh vegetables and fruits in season would flow from the coastal areas to The Pas. It should be noted that the population for The Pas and surrounding country is approximately 14,000.

As to the possible harmful effect his proposed service would have on T.C.A., Mr. McConachie was most reassuring. He pointed out that the total air freight revenue for T.C.A. North American services represented less than 3.5% of their total revenue. Hence, to get any business at all, the proposed service would have to create new business, not take it from Trans-Canada.

The fact that air freight service must be an overnight service was pointed out, the proposed service giving overnight service between all terminal pairs.

At this point, Mr. McConachie filed Exhibit 25, providing an estimate of indirect costs for the proposed service, inasmuch as this had been neglected in

the Douglas Aircraft (Crilly) report. This exhibit illustrated the fact that U.S. airlines generally, have indirect costs approximately equal to 45% of their total operating costs. C.P.A. however, in its submission contended that their indirect costs for the proposed run would amount to only 25%, inasmuch as the existing facilities of Canadian Pacific Express would be so extensively employed. On this basis, the Crilly operating profit for the year of $700,000 drops to 300,000, a net quite adequate insofar as Mr. McConachie was concerned.

In the matter of the agreement with Canadian Pacific Express, whereby these facilities and services were to be made available, Mr. McConachie filed Exhibit 24, "Memorandum of Agreement with C.P. Express." This agreement provides that C.P. Express shall "perform all solicitation of traffic, billing, collection and car- age from and to its terminal and between airports and shippers and consignees as required." For these services, the express company had set a charge of 25¢ per hundred pounds, with a minimum charge of 60¢.

As might be expected, Mr. McConachie pointed up the wartime uses of the DC-6A all-freight aircraft, for either equipment or litter movement. Again, it was noted that the proposed stimulation of the Orient trade would be in Canada's general interest, aside from the benefits to C.P.A.
Considerable emphasis was laid by Mr. McConachie on the contention that the DC-6A was specifically built for air cargo service as opposed to combined passenger, mail, express and cargo service. Considerable reduction in per ton mile operating costs were forecast for the C.P.A. operation relative to those experienced by U.S. operators employing converted passenger aircraft for freight haulage or by those trunk carriers who combined freight handling with passenger carriage.

At this juncture, Canadian Pacific filed Exhibit 25, "Statement of T.C.A. Air Cargo and Air Express." This statement, provided Mr. Brais by Mr. O'Donnell, shows the freight, poundage carried directly and for individual route segments between Vancouver and Montreal for 1951 and 1952. The statement so filed had provided the data for the C.P.A. staff to work out a table, filed as Exhibit 26. By route segments, this table determined an approximation of the total revenues received by Trans-Canada for haulage of freight and express between the terminals and intervening stops. This arbitrary figure amounted to $248,000 and was set against the 1951 T.C.A. total revenue of $48,010,501 to yield the contention that only 1/2% of T.C.A.'s income could be affected by the institution of the new service.

Summarizing his views in the matter, Mr. McConachie stated:
In my opinion . . . the route is not designed to take away or it is not designed to encroach on some traffic that is already there. We are going . . . to develop an entirely new field because it is obvious that there is not sufficient revenue from what is being carried at the present time to even support a service.

. . .

. . . We would have what we would draw from other carriers, such as the express company.

. . . and we will generate some business that is not being carried on any form of transport at the present time because of the remoteness of the areas that are being served. It also serves public convenience and necessity at the points along the route. There must be a necessity for this service or we would not have the results that we got from the Gruneau Research and the inquiries from the Boards of Trade . . . . (12)

Lockheed Super Constellation Depicted in Cargo Version. T.C.A. is currently taking delivery of eight Super Constellations for combination carriage of passengers, mail and freight. Constellation cargo pod currently used by Eastern and Trans-World Air Lines is shown in photo below.
The Constellation Cargo Pod
(See previous page.)
The Air Freight Case

Part II
The T.C.A. Evidence.

As previously noted, Trans-Canada Air Lines had submitted a 30 page statement of intervention, to do with the application of Canadian Pacific Air Lines, prior to the commencement of the hearing. This statement accompanies this report, being found in Appendix II, Exhibit 30. The first nine pages of this exhibit cover Trans-Canada's views in the matter, with the remaining pages supplying substantiating data in tabular form.

Briefly, Exhibit 30 advises that T.C.A. commenced cargo carriage in 1948, this being aside from prior and continuing carriage of air express. In 1948, 1,800,000 pounds of air cargo were moved; in 1952, 10,600,000 pounds. In 1948 700,000 ton-miles of air cargo were flown by T.C.A.; in 1952, 3,500,000. This last mentioned figure was in addition to 1,400,000 ton-miles of express moved in 1952. Ratewise, the levies assessed on air cargo progressively were dropped a total of 46% during the five year period. A further drop, noted on page 29 of this report, was then before the Board for approval, would bring the rates down an added 25%. These rate cuts were based on a long term policy which had been outlined to the Board in a letter dated June 3, 1952 and filed as Exhibit 33. In part this letter states:
The rapid growth in passenger traffic during the post-war years has brought about very substantial increases in both the size of TCA equipment in use and in the flight frequency on practically all routes. Since all TCA passenger aircraft automatically provide a considerable payload capacity in excess of the passenger accommodation, the effect has naturally been that in meeting the passenger traffic demand, non-passenger payload capacity has been provided far in excess of the non-passenger traffic requirements. This has been most apparent on the transcontinental route.

Intense sales stimulation and advertising alone have failed to bring about the condition under which this capacity for the transportation of mail and goods was utilized to anything approaching a satisfactory degree. The only other stimulative action open to the company at this time is a rate reduction, which is obviously desirable both from the economic standpoint of the airline, and public interest.

The overall reductions proposed at this time are deliberately conservative, the intention being to by this means measure the sensitivity of the market to downward adjustments in aircargo rates. It is the intention to make a further overall rate reduction at a later date, and if necessary, to repeat this procedure to a point at which the additional traffic resulting from rate decreases begins to adequately use the weight space available. (13)

This letter had gone forward to the Board, as noted, on June 3rd, 1952. The application notice to do with Canadian Pacific's proposal had been first publicized on November 10, 1952. Hence, the rate reduction then before the Board, at the time of the hearing, was in line with predetermined policy. The proposed rates equalled or undercut those proposed for the C.P.A. freight service.

(13) T.C.A. Director of Traffic Planning to Chief Traffic Officer, A.T.B., Exhibit 33.
Evidence of Mr. H.W. Seagrim, General Manager, Operations, for Trans-Canada Air Lines

In an aviation career closely paralleling that of Mr. McConachie, Trans-Canada's General Manager had been successively, combined bush pilot and air engineer, airline captain, superintendent of flight operations, director of flight operations, finally achieving his present status in 1950. Mr. McConachie had been with C.P.A. since its formation in 1941. Mr. Seagrim had been with T.C.A. since its formation in 1937.

Mr. Seagrim outlined the makeup of the present T.C.A. operating fleet, noting the availability of space for cargo carriage in that regard. The fleet, at the time of the hearing, was made up of 23 North Star aircraft and 27 DC-3 aircraft. One of the latter was fitted out as an all-cargo carrier. Space for cargo, mail and passenger baggage on the North Stars was stated as being capable of accommodating 6,692 pounds. With seats out, the North Star has a payload of 16,755 pounds. Such possible cabin conversion on short notice was evidenced by Mr. Seagrim with reference to the carriage of 500,000 pounds of Winnipeg flood relief supplies by T.C.A. in 1950 in a one week period without affecting normal schedules. The North Star main cargo compartment door was given as being 2 1/2 x 5 feet and that of the DC-3 cargo-liner as 5 1/2 x 7 feet. The latter aircraft had had a variety of assignments including the carriage of a race-
horse between Montreal and Toronto and the movement of 4,620 pounds of household effects from Toronto to Winnipeg for a Toronto moving firm. (See Exhibit 36) Queried by Mr. Brais as to why this DC-3 cargo aircraft was not occupied more fully in cargo carriage, Mr. Seagrim replied that it was "due to lack of demand, frankly." (14)

It was Mr. Seagrim's contention that what cargo was offered was handled efficiently in combination with the passenger, mail and express traffic. By way of example, he noted that in 1951, from March to June, T.C.A. carried approximately 900,000 turkey poults and baby chicks between Toronto and Montreal to Winnipeg, plus a further considerable volume of the same nature from Vancouver to prairie points during the same period. The mortality rate amounted to 1/3 of 1%, confirming that no undue delays were experienced inasmuch as poults and chicks must be delivered within 72 hours after hatching to survive without en route feeding.

Trans-Canada's long term plans had indicated that it was the intention to convert certain of the North Star aircraft to full cargo use as the demand arose. In this regard, Mr. Seagrim testified that such an aircraft so converted could carry a payload of 20,000 pounds. The cost of conversion would be $175,000. This amount would provide for the required additional stressing of the

fuselage, provision of a cargo floor, and of a full-size cargo door similar to that fitted to C.P.A.'s newly acquired DC-6A aircraft. However, for the immediate future, Mr. Seagrim felt that the three Bristol Freighters ordered by his firm in December 1952 would be more than adequate to handle outsize shipments offered, plus coverage for such bottlenecks as could conceivably develop with the progressive dropping of the air freight rates by Trans-Canada. The Bristols, carrying six tons of freight, would have access doors to their cargo compartments measuring 7 x 7 1/2 feet, enabling the routine carriage of two standard American automobiles per flight if so required.

As to the possibilities of releasing North Stars for cargo carriage, Mr. Seagrim noted that his firm was to take delivery of eight Lockheed SuperConstellations and fifteen Vickers Viscount aircraft in 1954, at which time, depending upon the need, North Star aircraft would be converted to full time cargo use.

Evidence of Mr. Hugh Johnston
Director T.C.A. Aircargo Dept.

Needless to say, Mr. Johnston provided a prime target towards which C.P.A. counsel directed a barrage of searching questions. Mr. Johnston headed the department with which the whole enquiry was concerned. Essentially, the C.P.A. case rested on whether or not it could be
established before the Board that Mr. Johnston's department had been derelict in its duty to the public, either through its own or company policy. A series of requests were made of Mr. Johnston by Mr. Brais concerning the operations of the cargo department. These were dealt with by T.C.A. in the furnishing of Exhibits 31, 32, 33, and 39. Reference to page 34 of this report indicates the detail requested, set out under Exhibit 39. This data was requested on the afternoon of Friday, February 27th, for delivery to C.P.A. counsel by Monday, the 2nd of March. Unfortunately for C.P.A., the requested data simply substantiated Mr. Johnston's contentions that his department was operating efficiently and aggressively insofar as stimulation of interest in air cargo shipments. For example, Exhibit 39 shows that 24,766 firms regularly receive T.C.A. air cargo promotional releases. Two thirds of these firms are in Canada, the remainder in the U.S.A. Further, no matter which formula was used, and several variants did appear, there was still much unused cargo space available on the regular passenger flights operated by Trans-Canada Air Lines.

Evidence of Prof. W.J. Waines
University of Manitoba

The appearance of Professor Waines, from the standpoint of keeping the hearing in realistic perspective, was most beneficial. Professor Waines, Dean of the University
of Manitoba's Faculty of Arts, had been actively associated on with the Royal Commission with Transportation in Canada of 1951. Hence, his interest in the proposed C.P.A. service lay in its broad implications in relation to the whole Canadian economy in the light of prior transport history in this country. Certain basic principles underlie the orderly development of transportation in Canada, asserted Professor Waines, one being that in this country the emphasis must be on cost rather than on speed.

... Abundance of space is one of Canada's chief characteristics. While from certain points of view space may be an asset, from the standpoint of transportation it is not. It underlines the necessity for efficient transportation merely to overcome the great distances which people and goods must be moved to effectively develop our resources and produce a high standard of living. Add to the factor of space the facts that there are long distances which are relatively unproductive of traffic and that population is sparsely scattered over the country and that industrial concentrations are widely separated and it becomes apparent that cost is our vital transportation concern. (15)

To obtain this cheap transportation, it follows that high utilization of equipment and facilities is essential to obtain the lowest unit costs.

The multiplication of services which have the effect of dividing traffic, rather than increasing it, the diversion of more and more of our resources into the business of transportation when existing facilities are adequate or nearly adequate to handle the traffic will raise costs, not lower them, and will have

either or both of two further consequences:

(1) It will drive up transportation charges at the expense of shippers and to the detriment of the whole economy, or

(2) it will create deficits which in the case of a publicly-owned transportation system will fall on the public. In either case over-investment in, or over-expansion of, the transportation system will impose financial burdens on the economy which will hamper its development, particularly in a country where foreign trade is still of very substantial importance to the level of economic activity. (16)

Professor Waines went on to illustrate from the history of Canadian railway development the ills accruing from competitive over-expansion as appraised by the 1931-1932 Duff Commission. Government policy had clearly been formulated relative to aviation to avoid duplication of these ills as evidenced by Mr. Howe's statements to parliament, as previously quoted in this report in the two initial chapters. Mr. Waines noted:

Competition is only useful for what it achieves. If it achieves greater efficiency lower costs and charges and better service, it is an admirable principle to insist upon; but if it achieves over-expansion of expensive facilities with division of the market amongst competing carriers, it will lead to heavy burdens on carriers, shippers and taxpayers alike. (17)

The foregoing comprised the main submission made by Professor Waines. However, in summing up he added two relevant observations of a more particular nature. The


(17) Ibid., page 1020.
first was a suggestion to the effect that certain of the T.C.A. services such as to Brandon, Swift Current, and Medicine Hat, together with the trans-Atlantic service itself, were operated in part at a loss but in the national interest. Such services would be eliminated as of necessity should total revenues fall to a point inadequate to care for the non-paying routes.

The other of the two points mentioned concerned the drawing of business from rail express and its consequent effect upon the income structure of the parent company, the C.P.R. It would involve simply adding to "other income" and subtracting from "rail income." By so doing the impact would fall upon the users of rail freight, inasmuch as the C.P.R. is the "yardstick" operation for the two prime operators. More specifically, the burden would fall mainly on the prairie region and the Maritimes, a result which the Air Transport Board should seek to avoid.

Evidence of Mr. T.H. Martin
General Manager, Canadian National Express Company.

Mr. Martin testified that he had been in the express business for 38 years, starting with the Dominion Express Company in 1915, then moving to the Canadian Northern in 1917 which later became the Canadian National.

The witness noted at the outset that his firm was a department of the Canadian National rather than being a separate corporate entity as in the case of Canadian Pacific Express.
As for the Canadian Pacific, Mr. Martin testified that his firm makes a semi-annual twenty-four hour sample analysis of express business. From these analyses it has been found that the average C.N. shipment weighs 37 pounds and that for the C.P.R., 48 pounds. The higher figure is due to the carriage of weight as express by the C.P.R. in certain prairie areas to compete with trucking firms. Further, 59% of the C.N.R. shipments were found to be 25 pounds or less in weight, with 13% of the total weight in that grouping. For shipments over 100 pounds, numerical volume was 4% of the total and 14% of the weight.

In the matter of comparison, Canadian versus U.S. express service, Mr. Martin asserted that the Canadian shipper receives faster delivery at lower rates in Canada.

Mr. Martin further noted that only once in thirty years had the Canadian express companies had to defend their application for a rate increase before the Board of Transport Commissioners. This was in 1951 to do with the transportation of fish. Evidence was brought in by shippers that the fish traffic could not afford to pay the proposed higher rates. Representation against the increase included protest from Booth Fisheries and Keystone Fisheries, the prime shippers of Manitoba lake fish. The Board approved the rate increase requested by the express companies despite the protesting shippers. In consequence, C.N. express shipments of fish from The Pas fell from 2,500,000 pounds a year prior to the in-
crease to 500,000 pounds a year thereafter. Consideration was not given to restoring the old rates as they had been definitely uneconomic to the railroads. It was suggested to the fishing companies that they ship direct from the source area, from The Pas to Toronto and Montreal. They were advised that this was not possible inasmuch as the fish first proceeds to Winnipeg for distribution, that being where the capital investment in storage and distribution facilities has been made.

The Canadian National handles approximately 75 million pounds of fish each year plus 4 million pounds of lobsters. These latter are, of course, transported live and are mainly moved from the Maritimes to Boston and vicinity. Attempts at air carriage of lobsters were unsuccessful due to the high mortality against a rail rate for the traffic of approximately 1% only.

Mr. Martin filed Exhibit 38 to substantiate his statement to the effect that rail express in this country is considerably cheaper than in the United States. This exhibit evidenced that for the average weight shipment of 37 pounds experienced by the Canadian National, it would cost $7.40 to move it New York to San Francisco, as opposed to only $5.18 for the same shipment, Montreal to Vancouver.
Bristol 170 Freighter Aircraft as Operated by Trans-Canada Air Lines.
Evidence of Mr. J.T. Dyment, T.C.A.
Director of Engineering.

Mr. Dyment was called at the request of Canadian Pacific Air Lines to enlarge on Mr. Seagrims contention that the engineering involved in converting a North Star to a suitable air cargo aircraft was both economic and feasible. In this regard, Mr. Dyment outlined for the Board a series of major modifications carried out at minimum cost by Trans-Canada's own personnel in its own shops over a period of several years on Lockheed, Douglas and Canadair products. In particular, M-1 40 passenger North Star aircraft were converted to a basically cargo type for the R.C.A.F. in the Winnipeg plant of T.C.A. This job was completed within specified time limits at a cost of $36,000 per aircraft, an amount representing less than one-third of the cost estimated for the job by an outside contractor.

As for the conversion of the present T.C.A. North Stars to cargo use, all engineering problems had already at been evaluated. Reinforcing the fuselage would cost $10,000; installation of a pressurized cargo door, $25,000; removal of present equipment associated with passenger carriage, $20,000; $6,000 for installing a cargo type interior insulating blanket; $5,000 for the stress analysis work involved; $70,000 for replacement of the present floor structure with that of a cargo floor. All other items would be minor in nature and amount, making up the previously stated total of $175,000 per aircraft. The air-
craft would have identical door size and floor loading restrictions as those for the DC-6A proposed for the Canadian Pacific transcontinental operation.

Evidence of Dr. A.W. Currie
University of Toronto

Like that of Professor Waines, the evidence of Dr. Currie dealt strictly with economic fundamentals, a refreshing recess being provided in each case from the commercial sparring of the two rival corporations involved in the dispute before the Board.

Dr. Currie is presently an Associate Professor of Commerce, with special responsibility for transportation and business Finance, on the staff of the University of Toronto. He acted as Transportation Economist for the Province of Saskatchewan in various freight cases in 1946-1948 and for the Royal Commission on Transportation, 1948-1950. He is author of "Canadian Economic Development," and of "Economic Geography of Canada." In addition, his text, "Economics of Canadian Transportation" is currently in process of publication.

The witness stated that he had read the testimony of Professor Waines and was in entire agreement with the thoughts expressed. Supplementing the Prof. Waines' remarks, Dr. Currie had prepared a submission of his own, which was filed as Exhibit 44.

Exhibit 44 is divided into two parts; "A. The Pattern of Civil Aviation within Canada," and "B. Differences in
Economic Conditions in Canada and the United States."

In the matter of government policy to the time of the hearing then in progress, Dr. Currie endorsed the overall plan to prevent duplication of transcontinental services, reasoning that:

(1) Earnings should be maximized in order to provide the best possible equipment. Reasonable earnings would permit ample write-off of aircraft, thus reducing capital requirements and allowing operators to have the most modern equipment.

(2) The non-duplication of services reduces the possibility of deficits which, in a publicly-owned company, must be borne by the public and in a privately-owned company by investors.

(3) ... it is essential to realize that Canada is in a period of boom associated not merely with the general cyclical rise but also with a tremendous investment in capital goods. Although everyone hopes a depression will be avoided, it is very essential that decisions regarding new air line services be not based on the assumption that high prosperity will continue indefinitely. (18)

Dr. Currie noted the following relevant differences in economic conditions in Canada and the United States:

(1) The per capita gross national product in the United States in 1951 was $2,123 or about 47% more than the Canadian gross national product per capita. Moreover, the United States has a higher pro-

(18) Ibid., page 1156.
portion of people in the high income brackets than is the case in Canada. The range of incomes is quite important because air cargo for the most part is luxury traffic.

(2) The industrialized area in the United States is larger than in Canada and has longer distances between cities and because of these longer distances air cargo traffic moves within its borders. In Canada because the distances in the industrialized area are shorter, no comparable air cargo traffic can develop. Further, over the heavily industrialized area of the North Eastern United States, rail express is relatively slow. In contrast, rail express service within the boundaries of the industrialized areas of Canada is sufficiently fast to discourage air cargo, except in case of emergency.

As in the case of Professor Waines, the cross-examination of Doctor Currie was uneventful. It did, however, provide an opportunity for the further emphasizing of points already made. For example, when queried by Mr. Hamilton as to whether or not a time would not arrive when competition would be desirable, Dr. Currie replied:

... that point was covered by Professor Waines, and I agree with him. Competition is to be judged by what it accomplishes. If we get efficient transportation through non-duplication of services, I think there would be very many advantages because we would be enabled to maintain quality of equipment and quality of service. (20)

(19) Ibid., pp. 1157-8.
(20) Ibid., pp. 1164-5.
TRANS-CANADA AIR LINES
AVERAGE DAILY AIR CARGO FLOW
1952
TRANS-CONTINENTAL ROUTE

FROM CONNECTING SERVICES THRU MONTREAL

FROM OTHER CONNECTING SERVICES THRU TORONTO

TO OTHER CONNECTING SERVICES THRU TORONTO

TO CONNECTING SERVICES THRU MONTREAL

SCALE 1/2 IN WIDTH EQUALS 1000 LBS AIR CARGO
The President of Trans-Canada Air Lines has been actively connected with aviation since 1932, acquiring a private pilot's licence in the year following. Mr. McGregor was a pre-war winner of the Annual Webster Memorial precision flying competition. From 1938 to 1945 he was engaged on active flying duties with the Royal Canadian Air Force, first in the auxiliary and subsequently, with the outbreak of hostilities, with the overseas, fighter forces. Prior to entering upon active military service, Mr. McGregor had been for fifteen years an executive of the Bell Telephone Company, having been district manager in Kingston and Montreal during the latter period of his civil employment.

Mr. McGregor was appointed a special representative of Trans-Canada Air Lines on December 1st, 1945 and General Traffic Manager on February 1st, 1946. Subsequently, on February 1st, 1948, he was elected to the presidency of the firm. Mr. McGregor was appointed to the Executive Committee of the Air Transport Association in 1950. In 1952 he became President-elect of that body.

For the purpose of the record, T.C.A.'s counsel Mr. O'Donnell was primarily concerned with having Mr.
McGregor adduce evidence as to his firm's attitude towards the air freight business and as to what positive steps had been taken at the planning level to foster it. Insofar as attitude was concerned, Mr. McGregor assured the Board that his organization had been both interested and active in the development of transportation of goods by air since the inception of Trans-Canada's services in 1937. As to the adequacy of his firm's air cargo facilities, Mr. McGregor pointed out that:

T.C.A. has invariably required of the design of its passenger aircraft the provision of cargo capacity. That capacity as provided, in my opinion, has proved to be adequate. The reason that capacity has remained adequate during a period of some considerable growth in air cargo traffic has been the fact that passenger traffic has also grown at perhaps an even faster rate . . . and the result has been that the meeting of the demand for passenger traffic has automatically provided substantial annual increases in the capacity of the cargo space made available. It is furthermore the fact that from the figures we maintain, the utilization of that cargo capacity has appeared to us to be under no strain.

As to what positive steps management has taken to stimulate air cargo development since its 1948 T.C.A.

commencement, Mr. McGregor touched on Trans-Canada's full-time aircargo sales staff, the successive publicity campaigns and the several cargo rate reductions. In consequence, it was pointed out, that T.C.A.'s air cargo business was steadily increasing on an economic basis with both short and long term plans finalized to cope with the growth trend. For the short term, Mr. McGregor noted that transcontinental passenger flight frequency was to be stepped up 50% in the present year, yielding a corresponding increase in freight forwarding facilities. This added cargo space, plus that afforded by the three Bristol freighters dealt with by preceding witnesses, would more than cope with any conceivable aircargo carriage demand in the immediate future.

Long term planning called for conversion of such passenger-type aircraft as now operated by T.C.A. into freight carriers as they approached obsolescence from the standpoint of appeal to the travelling public. As the witness noted, this plan was identical to that previously instituted by American scheduled operators and which had proven so successful. In this regard, it was entered in the record that by May of 1953, the North Star aircraft operated by T.C.A. would be depreciated to a residual value of $30,000 each. This, plus the relatively nominal conversion costs would yield a freight carrier with minimum depreciation costs, these
normally being a major item of aircraft operation. The release of North Stars to freight operation as required was to have been made possible by the delivery of the eight Super Constellations and fifteen Vickers Viscounts ordered by the company in 1951 and 1952. As evidenced by Exhibit 45, these aircraft are to become available for use during 1954. Their purchase involves an outlay of $32,000,000 and a doubling of T.C.A.'s four engined fleet, from 23 to 46 aircraft. Unfortunately, contended Mr. McGregor, the Constellations were originally planned for delivery in 1953 for Atlantic and Caribbean use. Had they been so delivered, the Bristol freighters would not have been ordered. The Constellations would simply have displaced North Stars, with the latter thus becoming available for conversion to coach or freight. Strikes and the Korean war situation pushed back the Constellation delivery dates to a point that the T.C.A. traffic department foresaw a nine to twelve month gap in their equipment program whereby, for that period only, they would be unable to fully cope with aircargo traffic offered. Hence, in December 1952, the three Bristol Freighters were ordered for delivery in the fall of 1953. This data to do with the Bristols was, of course, being introduced into the evidence in an attempt to refute C.P.A. suggestions that they had been purchased because of rather than in spite of the C.P.A. airfreight application.
Queried as to the possible effect on Trans-Canada Air Lines if the licence applied for by C.P.A. were to be granted, Mr. McGregor replied:

Well, Mr. Chairman, in spite of what has been said at this hearing, I with the greatest honesty feel that the possibility of the division of revenue which would result from the granting of this application would have nothing but the most serious consequences with respect to T.C.A.

... T.C.A., as I think is usual with airlines, operates on an exceedingly small margin of profit. The 1962 figures indicate that T.C.A.'s gross revenue will be something considerably larger than $50,000,000; after taxes and other charges, the net operating surplus will be in the order of $800,000, or something like ... one and a half per cent. It would obviously take a very small deletion from T.C.A. aircargo revenue to create the unhappy situation in which T.C.A. would be operating in the red. It is perhaps unnecessary to note the fact that when T.C.A. operates in the red it has no recourse but to the public purse to make good that deficit. (2)

Mr. McGregor went on to outline the extent of the Canadian government's outlay and current equity with relation to Trans-Canada Air Lines. The authorized capitalization, funded by the Canadian National, is $25,000,000. The last time monies were so drawn for capital account was five years previous. Since that time T.C.A. has been meeting capital charges from depreciation accruals. In addition, an additional $6,000,000 fund has been built up in the form of reserve upon overhaul and insurance. In consequence, the Canadian people have a current equity of better than $31,000,000 in their

(2) Transcript C.P.A. Airfreight Hearing, p. 1192.
national airline. In concluding his testimony, the witness reiterated his contention that this large public investment would be jeopardized if the proposed duplication of services was permitted, the more so in view of the fact that $32,000,000 were presently being paid out in equipment purchases on a basis of reinvestment of accrued reserves, accrued and invested on behalf of the Canadian taxpayer.

Examination by Mr. Brais.

In his initial questioning, Mr. Brais dwelt at length on the purchase of the Bristol freighters. He produced, at this juncture, a Bristol cost analysis with which T.C.A. was not apparently familiar, filing same as Exhibit 46. In the process of his examination he elicited the following data:

1. T.C.A. planned to operate its all-cargo Bristol aircraft between Montreal, Toronto and Winnipeg and on some of the heavier transborder routes.

2. T.C.A. depreciated its war asset DC-3 aircraft on a four-year straight-line basis and the North Stars on a six-year basis.

3. At the time the North Stars were converted from 40 to 48 seats, provision was structurally provided for ultimate conversion to 57 seats. Thus flexibility was provided to facilitate entry into the coach service field when deemed justifiable.
4. Mr. Brais insisted that T.C.A. could have obtained war surplus C-46 aircraft from the U.S.A., such as used by Slick and Flying Tigers, had they wished to enter the all-cargo carriage field at an earlier date. Mr. McGregor assured the Board that T.C.A. considered the C-46 out of the question from the standpoint of T.C.A. standards. Such surplus C-54s as were available had been priced out of economic usefulness to T.C.A.

Examination by Mr. Hamilton.

Essentially, Mr. Hamilton dealt with but two points:

1. When an aircraft is written down through revenue operations in passenger service, should not the benefits of early write-off but continued use be passed on to the passenger traffic which made the early write-off possible? His suggestion, of course, was that the benefits of the early depreciation should not accrue to shippers of freight using the craft in its later years of service, but rather should be passed on to passengers in the form of reduced fares.

2. If the combination carriers in the U.S.A. were doing such a good job as regards joint carriage of airfreight and passengers, then "how do we explain the tremendous ton-mile increase of the
straight freight carriers in the United States?

Where did they get their business?" (3)

This query was answered by Mr. McGregor as follows:

... a great deal of it is associated with the fact that it is a policy of the United States Government, as I understand it, not to require its armed services to transport goods of a military character within the boundaries of the United States. A.T.S., for instance, the military transport service, confined its activities to beyond the shores of the United States. Such a policy ... must tremendously increase the internal demand for air transportation of traffic of a military character. Contrary to that, in Canada, the R.C.A.F. is required and does provide a quite substantial service beyond, transcontinental and otherwise. (4)

Note: Mr. Wells did not examine Mr. McGregor, nor did the Counsel for the Air Transport Board, Mr. Younger.

(3) Transcript C.P.A. Hearing, Mr. Hamilton, p. 1219.
(4) Ibid., Mr. McGregor, p. 1220.
With the completion of the examination of Trans-Canada Air Lines President G.R. McGregor, it was announced by Mr. O'Donnell that the T.C.A. case was complete, no further witnesses would be called. Mr. Brais responded to the effect that the C.P.A. case was also complete with the exception of one rebuttal witness, Mr. McConachie. Essentially, the recall was to enable C.P.A. to complete the filing process of Exhibit 46, the Cost Analysis of the Bristol 170 freighter, previously referred to on page 80 and on the basis of which it would appear that operations of the Bristol would be unprofitable.

Exhibit 47 was also filed at this time at C.P.A.'s request in order that the matter of freight carriage by their northern routes might be clarified in their favour. Countering the data contained in T.C.A. Exhibit 30, this new report compared freight ton-mile returns by districts for 1948 and 1951, evidencing gains of considerable proportions. These revisions were quite justified, inasmuch as they allowed for a number of "ceased operations" runs to be deleted from consideration.

The final exhibit, number 48, was also filed at Mr. O'Donnell's request, it being a map of a proposed route for C.P.A.'s freight run via Winnipeg, omitting The Pas, and drafted by the Douglas Company in April of 1951.
Air Transport Board were most favorable to the cause of Canadian Pacific Air Lines, in essence making an oblique recommendation that the application be granted. However, for reasons that will become apparent in the course of the succeeding chapters, the Cabinet did not act in accordance with the Board's implied urging. The application of Canadian Pacific Air Lines to operate a Vancouver-Montreal air freight service was denied, for the reasons set out in P.C. 1953-1755 as appended.

The Board report was divided into three parts:

(1) The need for scheduled all-cargo services in Canada.
(2) The evidence presented to the Board at a public hearing on February 17th (and following days) into the application to operate such a service, and
(3) Board Comments.

The two pages that constitute Part (1) have the following statements as an introductory prelude:

At the present time Canada, although it is a country in which a great quantity of air cargo is being transported in non-scheduled services, is one of the few countries of importance in aviation which does not have any scheduled all-cargo services. A certain amount of cargo is carried by Trans-Canada Air Lines in its passenger services but this is carried on a "space available" basis after passengers, mail, baggage and air express have been served and there is therefore no guarantee of delivery at a specified time. (2)

In its comments to do with the need for scheduled all-cargo services in Canada, the Board leaned heavily

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(1) Air Transport Board's Report to the Cabinet to do with the C.P.A. Application, page 1.
(2) Loc. cit.
upon the brochure produced by the Douglas Aircraft Company, Exhibit 18. For example, paragraph 2, page 2 of the Board report summates pages 14 and 15 of Exhibit 18; paragraph 3 quotes the data set out on page 15 of Exhibit 18; while paragraph 4 paraphrases the subject matter set out on page 12 of Exhibit 18. These three examples of data source are dealt with more fully in the comparative illustrations that follow.

In the first instance noted above, paragraph 2 of the Board report states that:

90% of the production of high unit value merchandise is centred in Ontario and Quebec. This is the type of merchandise which would benefit by . . . scheduled all-cargo service. (3)

The related source is to be found on pages 14-15 of Exhibit 18 where it is noted that:

Concentrated production demands rapid distribution. 71% of Canada’s manufacturing (is) centred in less than 1% of its area. . . . production of high unit value merchandise (is) even more concentrated. (4)

A table then follows showing the percentage production of high unit value merchandise for Ontario and Quebec combined, as related to the rest of the country, with upwards of 90% constituting their basic share of production for the commodities listed.

As regards the second example cited, the following excerpt from paragraph 3, page 2 of the Board report states:

(3) Ibid., page 2.
(4) Exhibit 18, Appendix III to this report, pp. 14-15.
Per capita railway express shipments in Canada are far higher than in the United States and amount to 3.2 percent in Canada as compared to 0.5 percent in the United States. Moreover the percentage of national income per capita accruing to the transportation industry in Canada is substantially greater than in the United States. These facts are strong evidence of a substantial Canadian potential for the development of scheduled all-cargo air services..

(5)

The figures "3.2" and "0.5" should, of course, be followed by the words "per capita" rather than "percent."

An error in transcription was apparently made in taking this data from page 15 of the Douglas Company's Exhibit 18. Illustrating their contentions with graphical portrayals, the Douglas report goes on to state that:

(These) comparisons of per capita railway express shipments and transportation charges between Canada and the United States is ample evidence that the Canadian merchant recognizes the advantages of swift transport. ... (6)

The third example, as noted at the outset, to do with paragraph 4, page 2 of the Board report states:

In an expanding economy where there is a high demand for capital particularly for use in the development of natural resources, flexibility and speed in transportation are of great importance. ... air lines require less in the way of tied up capital as compared to other forms of transportation. ... (7)

The paralleling source is to be found on page 12 of the Douglas brochure, Exhibit 18:

An expanding economy demands a flexible transportation system. During periods of industrial expansion funds available for capital expenditure are in great demand. ... When much of the economy is based on the tapping of unknown

quantities of resources . . . it is highly desirable to have a flexible transportation system. . . . In view of the above factors and the comparison of rail and air investment in fixed facilities, there is little wonder that air transportation has played such an important role in Canada's development to date. (8)

Passing on to Part (2) of the Board report, we come to the A.T.B.'s appraisal of the evidence presented at the hearing. Here again the Board appears to have placed high value on the Douglas survey contained in Exhibit 18 and 18A, the initial statement being:

In order to arrive at an estimate of potential cargo available on the all-cargo air service applied for, a study was submitted on behalf of Canadian Pacific Air Lines Limited based upon a price-demand curve prepared from Canadian railway data and application of this curve to less than carload rail express shipments between areas served by the proposed route. This study indicated sufficient volume to support a five times weekly service with DC6A aircraft and gross revenues better than $2 millions annually. (9)

No Board comment was included as to the economic or statistical soundness of the price-demand curve to which reference was thus made and upon which the presumed validity of the traffic and revenue appraisal rests. This matter will be dealt with further in the succeeding chapters. (In particular, see page 159 et seq.)

The Board report further dealt with the Douglas findings with relation to the stimulation of airborne cargo trade between Canada and the Orient through the inauguration of the proposed C.P.A.L. Montreal-Vancouver

(8) Exhibit 18, op. cit., p. 12.
(9) Board report, op. cit., p. 3.
air service. However, no Board comment was made as to the extent in probable ton-miles of the potential Orient traffic available to C.P.A. in the foreseeable future. As in the Douglas report, Exhibit 18, only percentages were noted; no mention was made of the base figures employed. This matter of potential Orient trade with respect to air cargo is dealt with further in a subsequent chapter of this thesis. (See page 173 et seq.)

The next matter dealt with by the Board in its report to the Cabinet had to do with the market research survey conducted by Gruneau Research, Limited, of Toronto and as summated on pages 50-52 of this thesis. The Air Transport Board accepted the methods and results of this survey at their face value, stating that:

Established sampling techniques were used in selecting a cross-section of business organizations using express services in Montreal, Toronto, Edmonton and Vancouver areas . . . . This study . . . was designed to show that a substantial majority of these business organizations agreed that a scheduled all-cargo service as proposed by C.P.A. was desirable and that it would result in speedier transportation and deliveries of high unit value goods. (10)

Canadian Pacific's appraisal of the fresh fish traffic potential out of The Pas was also put forth for the Cabinet's information without Board comment as to its validity. However, note was made that T.C.A. had queried this claim as to fish traffic, having contended that the possibility of generating fish or other traffic out of The Pas was fantastically remote.

(10) Loc. cit.
The eight page Board report was roughly divided into five pages dealing with C.P.A.'s arguments why they should have their application granted, two pages outlining T.C.A.'s opposition, and a final page of Board comment.

As for the arguments in opposition by Trans-Canada Air Lines, these were set out briefly and in most cases coupled with the C.P.A. refutations put forth at the hearing. For example, where T.C.A. pointed out that they planned on converting North Star aircraft to freight carriage as required and as made available by acquisition of new airplanes now on order, C.P.A. countered that depreciated fleet units should not be used to make possible reduced freight haulage rates. T.C.A. had shown, as noted on page 77 of this report, that the North Stars are currently carried on the books at their residual value of $50,000 each. This amount, plus $175,000 per aircraft conversion costs for freight use, yielded an airplane in virtually the same class as the C.P.A. DC6-A's, purchased at a cost of $1,600,000 each. C.P.A. contended, and the Board reported without comment, that the benefits derived from the continued use of these fully depreciated craft should be passed on to the passengers, rather than to the freight shippers.

Note was made of T.C.A.'s progressive stepping down of its cargo rates over the years. However, as for the most recently proposed drop, the Board commented that
"The evidence raised some doubt, however, as to whether or not these proposed T.C.A. rates would actually cover allocated costs of operation for its present type of service." (11)

The T.C.A. claim that its revenue position would be seriously affected by the C.P.A. service was aligned with the applicant's rebuttal to the effect that the revenues affected would represent only a small part of T.C.A.'s domestic commodity revenues which in their entirety represented but 3.8% of T.C.A.'s total income.

As for Professor Waines and Dr. Currie, the Board allotted one paragraph to their contributions, briefly noting Professor Waines' contentions relative to our need of economy rather than speed in transport in Canada plus high equipment utilization to keep down unit costs. With further reference to Professor Waines, the Board commented: "He expressed the opinion that because of these principles the application of C.P.A. should not be granted but admitted that he had made no special study of air cargo in Canada and that his conclusions were based on information supplied to him by T.C.A." (12)

The Board Comments then followed. The Board stated that it was "satisfied . . . that . . . a substantial potential for scheduled air cargo service exists in Canada; and that scheduled all-cargo services should be set up to develop this potential." (13)

The Board admitted that "there will always be a large volume of air cargo which will continue to move in aircraft primarily used for the transportation of passengers and mail . . . " (14) However, the Board felt there is both room and need for the operation of scheduled all-cargo flights in aircraft specifically designed for that purpose. In the estimation of the Board, "Canada has already fallen behind other countries in this field. In the United States scheduled all-cargo transcontinental air services are already numerous and continue to grow." (15) As to the rather dubious success of the all-cargo operators in the United States, an entire chapter is reserved for discussion of the matter subsequently in this report. No mention was made in the Board report to the Cabinet of the succession of mergers and liquidations of U.S. air cargo firms, as will be dealt with in the above mentioned succeeding chapter. Nor was mention made of T.C.A.'s plans for supplementary all-cargo service in the Board's concluding comments. As noted on page 85, the Board appeared to obliquely urge the Cabinet to grant the C.P.A. application throughout its report, contending in final summation that:

Although during the development stage such a service may result in an operational loss, it is considered that with proper promotional backing it should be self-sustaining within a reasonable time and eventually profitable. (16)
The Cabinet Decision

The Committee of the Privy Council did not come to its final decision with respect to the Canadian Pacific application with any great expedition. The hearing had been concluded March 7th, 1953. The Board report was submitted to the Cabinet by June 1st, inasmuch as the Globe & Mail of Toronto editorially commented on June 20th as follows:

On June 11 it was reported from Ottawa that among other business waiting the return of Ministers from the Coronation were two transport items: Consideration of the protest against the award of a 7% increase in freight rates to the railways, and a decision upon a secret report sent to the Cabinet by the Air Transport Board concerning the Trans-Canada Airlines monopoly in its field. (17)

The return of the Ministers did not bring the decision indicated, it being announced subsequent to their return that the matter of the C.P.A. application would not be finalized until after the federal election then set for the summer's end. Nor was a decision rendered immediately following the Liberals' successful return to office. It would appear that the Cabinet itself was not at all of one opinion as to whether or not the licence should be granted C.P.A. Hence, it was announced that a further submission would be required of the applicant and principal intervener, said submission to be made to the members of the Cabinet itself. This Cabinet hearing was set for Friday and Saturday, October 30th and 31st. As before the Board, C.P.A. was represented by Mr. Brais

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and T.C.A. by Mr. O'Donnell.

On the night of October 28th, two days before the Cabinet hearing, Prime Minister St. Laurent spoke at length on the subject of the C.P.A. application in an address before the Air Industries and Transport Association in Ottawa. Mr. St. Laurent was quoted in the Montreal Herald of October 29th, 1953 as follows:

When Trans-Canada Air Lines was established in 1937 it was conceived as a mainline operator on an east-west basis. On the other hand, private operators working on a north-south basis were considered feeder lines. Well, development has been so great that the concept is no longer adequate. Many of the lines operated by private concerns are now so active that they too must be regarded as main lines. And conversely, some of the lines operated by T.C.A. have become in fact, feeder lines.

Thus, the original idea of retaining the main-line type for T.C.A. only and the feeder-line type for private operators only has to be reconsidered...

If we are convinced that both the industry and the nation would be better served by granting another license now, then of course we will make that recommendation.

... ... ...

Let me assure you that whichever way the decision goes now it will not in the long run be a decision in favor of the perpetuation of monopoly conditions. I have stated many times that the government to which I belong believes as a general rule the public can be best served under competitive conditions...

The foregoing writeup was captioned, "T.C.A. Air Monopoly Believed Near End." The address was similarly interpreted by the Toronto Star and by the Toronto Globe

(18) Frank Swanson, Herald Resident Correspondent, Ottawa, reporting in Montreal Herald, October 29th, 1953.
and Mail. The former captioned its report on Mr. St. Laurent's remarks with the statement, "Airline Monopoly to End," and the latter with, "St. Laurent Promises Ottawa Won't Keep Monopoly on Airlines." (19)

The Cabinet hearing was, of course, a very restricted affair insofar as attendance of interested parties was concerned. As noted in the Globe and Mail of November 2nd, 1953, "It has been known that there have been two points of view on the question among ministers. Mr. St. Laurent said he expects that eventually the cabinet will reach unanimity." In this regard, even the oral pleadings of the applicant and intervener were apparently not conclusive in their effect upon the ministers' conclusions. It was decided that the Cabinet would receive written memoranda to supplement the oral presentations they had heard. These written memoranda were to be in the hands of the cabinet ministers during the week following the hearing itself. Neither the Prime Minister nor the spokesmen for the competing airlines made public details of the presentation to the Cabinet.

However, as noted on page 85, the Cabinet made public its decision and reasons for same on November 10th, 1953. The application of C.P.A. was denied. Newspaper comment is best summated by the following editorial and news story headings taken from papers across the land:

(19) Toronto Star and Toronto Globe and Mail for October 29th, 1953.
The Cabinet had continued the T.C.A. monopoly in the face of quite positive opposition from both the Liberal and Conservative press and despite the urging of its own Air Transport Board to do otherwise. The popular concept of the situation involved is best portrayed by the Norris cartoon appearing on the following page, which had been published in the Vancouver Sun for November 6th, 1953. Essentially, the Air Transport Board had sought to obtain competition in the transcontinental field of air traffic, employing the arguments set out in the Douglas Aircraft Company's report to support their case before the Cabinet. The Cabinet, on the other hand, listened with apparent
conviction to the refutation of the data contained in the Douglas report, as made by Mr. O'Donnell, the T.C.A. counsel. They listened with similar conviction to the statements of Mr. McGregor as to the activities of his crown corporation to date and to his plans for its future. As opposed to the Air Transport Board, they, the cabinet ministers gave heed to the warnings of Prof. Waines and Dr. Currie as to the desirability of avoiding the pitfalls of past railway experience, as by them outlined in the A.T.B. hearing transcript and as recapitulated at the cabinet hearing by Mr. O'Donnell. The immediately following chapters of this report constitute an expansion upon the evidence upon which, presumably, the Cabinet came to its decision to deny the CPA application.

"... and furthermore, we can't have these foolish private air lines stepping in where we fear to tread..."
Chapter VI
Air Cargo Development in the U.S.A.

The commercial development of air cargo traffic, as distinct from the carriage of mail and express, was strictly a post World War II phenomenon, insofar as its transfer between metropolitan terminals was concerned. The military air lifts of World War II had pointed up the feasibility of freight carriage in plane-load lots, and had enabled large scale undertakings in this regard at a time when unit costs were a minor consideration.

This chapter is divided into three sections:

1. Covering development of air freight carriage up to the time of the C.A.B. Air Freight Decision, decided July 29th, 1949. (Glo et al.)


3. Covering developments in the air freight industry in the U.S. between March 7th, 1953 and November 10th, 1953, the date of the Cabinet decision, hence encompassing such data as would have presumably been available to the ministers prior to reaching their decision.


As noted in the initial paragraph above, the war provided the proving grounds for air cargo development. For example, in June of 1942, American Airlines provided 12 aircraft to haul coal, TNT, nails, lumber and other materials between Edmonton and Alaska. The same firm conducted 9,440 Atlantic crossings with army freight. Commercial application of the experience thus acquired
was facilitated at the war's end by the availability of surplus transport aircraft and trained crews. The former were available from the military at prices representing but a fraction of their original cost, while the latter sought, in considerable numbers, to remain actively engaged in the field of aviation no matter what the obstacles. In consequence, a steady succession of air cargo carriers were incorporated following the cessation of hostilities, including the Flying Tiger Line which commenced operations in 1945 and Slick Airways, which started haulage in 1946. Naturally, considerable opposition was raised by the certificated scheduled carriers. In consequence, the Civil Aeronautics Board prepared to bring the matter of this new competition to a hearing. To provide for interim operations prior to the hearing, Section 292.5 of the Board's Economic Regulations was promulgated to give temporary exemption from certification.

The Air Freight Case (Docket 810 et al. E-3085) actually got under way late in 1946, but did not reach a final conclusion until July 29th, 1949. This initial air freight case involved 14 applications seeking certificates and amendments of certificates of public convenience and necessity under section 401 of the Civil Aeronautics Act of 1938, as amended. The proposals were limited to carriage of property between points within continental United States.
In the docket, "freight" is distinguished as property moved in equipment devoted primarily to property; "express" to property transported in equipment scheduled primarily for passenger transportation.

Of the multitude of prospective operators in 1945, the number of continuing all-cargo carriers had dwindled to 14 by the time of the hearing's commencement. By the fall of 1948 five of these had become bankrupt, and a further three had ceased operations voluntarily. By the time of the Board's decision in 1949 only four were solvent, and these only technically so. By a three to two decision, however, the Civil Aeronautics Board granted five-year temporary certificates to these remaining firms. These certificates provided for the following services:

The Flying Tiger Line, Inc. - granted blanket area, rather than point to point, coverage of that portion of the U.S.A. served by United Air Lines and Northwest Air Lines.

Slick Airways, Inc. - granted similar area coverage of that portion of the U.S.A. served by Trans-World Airlines and American Air Lines, Inc.

U.S. Airlines, Inc. - granted similar area coverage of that portion of the U.S.A. served by Eastern Air Lines, National Air Lines, Braniff, etc., hence a north-south operation as opposed to the basically east-west make up of the two foregoing carriers.

Airnews, Inc. - granted rights to continue its experimental operation using combined truck-air services in the short haul field. Limited to San Antonio-Brownsville area. (1)

Airnews, Incorporated was the minority operator. The wholly owned subsidiary of a newspaper, it conducted its experiments for a period, then voluntarily ceased operations. U.S. Airlines, Incorporated, was the third smallest in its proposed scope of operations. However, it managed to incur total expenses of approximately 80¢ per ton mile for every ton mile of freight carried, with a gross revenue per ton mile of approximately 20¢. During its initial two and one half years of operation, U.S. Airlines exhausted 5/6 of its entire original capitalization of over three million dollars. The total loss for this period was $2,557,938. (2) U.S. Airlines has been through three receivership and reorganization proceedings. Its creditors are currently in process of finally winding up its affairs.

Slick Airways, during the two and three quarter years preceding the CAB Air Freight Case decision, exhausted 6/7ths of its capitalization, a total loss of $1,931,242. Flying Tigers, during three and one half years of exempted operation, exhausted 1/2 of its capitalization, for a total loss of $1,350,000. During the process of registering these losses, the all-cargo operators had accomplished little more than diverting traffic from the existing, certificated scheduled operators. Forecasted new traffic sources, such as in the

fields of fresh fruit, vegetables and sea foods, had simply not materialized up to the time the CAB made its decision in 1949 to grant five year temporary certificates to the four aforementioned carriers.

Nor were the certificated passenger carriers dormant in their approach to air freight up to the time of the 1949 decision. American Airlines had filed its first air freight tariff on October 1st, 1944, with an average yield of 40¢ per ton mile against then current 70¢ per ton mile air express rates. T.W.A. and United followed suit in 1945. American Airlines, and its predecessor companies, Robinson Aircraft, Colonial Air Transport and Embry-Riddle, had pioneered each step in the air freight field, commencing with their initial efforts in 1927. A continuing research program on American's part culminated in the formation of Aircargo, Incorporated in 1941, initially a planning group composed of the "big four" U.S. trunk line operators, having as its objective the co-ordinating of the orderly development of air freight haulage by its member operators. With the outbreak of war all firms became contract carriers of air freight and passengers for the military, deferring commercial air freight development within the United States until the war's end. The war over, equipment and crew availability enabled a general reduction of air express rates in 1946 to 59¢ per ton mile, together with a cut in the air freight rates by U.A.L., T.W.A. and American to a
scaled rate structure, varying from 15 to 26.5¢ per ton mile.

As noted on page 99, Slick Airways commenced business in 1946, filing rates based on an 18¢ per ton mile return. By July of 1947, by a series of rate cuts, all carriers were receiving approximately 13¢ per ton mile. In September of that year, A.A.I., P.C.A., T.W.A. and U.A.I. filed specific commodity tariffs yielding a basic 13¢ per ton mile. The non-certificated all-cargo carriers filed for suspension of these tariffs. Their petition was denied, but a general rate investigation was ordered by the CAB. This general investigation was to be spread over the next three years and involve three distinct hearings, the first to do with specific commodity rates, the second to do with directional rates and the third to do with accumulation, assembly and distribution rules. These comprise Docket 1705 et al. The latter two are included with the report in hand as Appendix VI.

The need for the investigation is best illustrated by the following figures, bearing in mind that the rate of return had sunk to 13¢ per ton mile.

<table>
<thead>
<tr>
<th>Table 5(a).</th>
<th>Aircraft op. expenses</th>
<th>Other op. expenses</th>
<th>Total* op.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Slick - 1948</td>
<td>9.28¢</td>
<td>7.66¢</td>
<td>16.94¢</td>
</tr>
<tr>
<td>Flying Tiger - 1948</td>
<td>16.52¢</td>
<td>7.05¢</td>
<td>23.57¢</td>
</tr>
</tbody>
</table>

(*Per ton-mile.)

(3) C.A.B. Reports, Vol. 11, No. 21, Air Freight Rate Investigation, Directional Rates, p. 235.
Hence, Slick and Flying Tigers were still losing money on their cargo operations at an alarming rate. Further, the government subsidized lines comprising the nation's 16 trunk line operators were also losing money. All save one reported a loss for 1948. Only in the United States could such a prolonged dissipation of capital, in the process of a rate war, continue for so long a period. As Adam Smith stated, "In public, as well as in private expenses, great wealth may, perhaps, frequently be admitted as an apology for great folly."(4) However, the C.A.B. finally issued its Freight Rate Decision (Order E-1639) placing a floor beneath the general rate structure. The minimum charge per ton mile was set at 16¢, with a drop to 13¢ permitted for hauls over 1000 miles in length. By 1949, the average return for Slick and Flying Tigers had risen to approximately 17¢ per ton mile, and that for the principal scheduled carriers to 19¢.

Directional imbalance in traffic flow brought about the second phase of Docket 1705 et al., concerning directional flow rates. Principally to foster back hauls from the west coast of agricultural produce, the Board authorized directional rates of not less than 60% of the minimums set in Order E-1639 above.

Aside from the profits or losses involved, these developments stimulated air cargo carriage. U.S. domestic

air freight carriage amounted to only 22 million ton-miles in 1945. It jumped to 83 million ton-miles in 1946; 128 million ton-miles in 1947. The Korean war brought further demands for rapid cargo shipments, yielding a total domestic movement in 1951 of 246 million ton-miles. (4)

During the exempted period of all-cargo operations, the Air Freight Case and the Air Freight Rate Case had gone slowly forward concurrently. No carrier was sure of its ultimate status. However, with the granting of five year temporary certificates to the four remaining all-cargo firms in 1949, it was presumed that the industry would finally become stabilized.


An anomaly of the U.S. air freight situation is, of course, the fact that the trunk line, scheduled carriers are subsidized by the C.A.B. to maintain reasonable solvency with the payments being made through the Post Office, while the all-cargo carriers as certificated in 1949 get no subsidy whatsoever. Losses on the part of the latter are direct from the shareholders pocket; losses on the part of the former come from the taxpayer. However, it would not be correct to conclude that the scheduled,

passenger carrying operators had been losing money to the extent experienced by the all-cargo firms during the process of the freight war. Admittedly, on a full freight cost basis, revenues were less than expenditures. For example, United Air Lines lost two million dollars on air cargo in 1949 on an allocated cost basis although the carrier picked up $200,000 based on straight out-of-pocket cost. (5) Since the scheduled airlines are primarily passenger carriers, much of their cargo volume is hauled in space that would otherwise be empty. Hence, during the development period at least, it is not necessary for them to recover total costs. However, as the volume increases, it becomes necessary for the airlines to place additional all-cargo flights in operation. By so doing, ton-mile costs will increase until the freight service is absorbing its full share of the total common costs.

As for subsidy support of scheduled carriers, it certainly provided a basis for complaint on the part of the unsubsidized all-cargo operators. However, said basis is superficial and unsound in actuality. The current U.S. budget for airline subsidy (1954) amounts to 80 million dollars. The mainline operators, such as American, receive only a million dollars each approximately of this sum, over and above their 45¢ per mile mail pay.

(5) U.S. News and World Report, Interview with W.A. Patterson, issue for October 6, 1950, page 16.
This 45¢ per ton-mile mail pay is considered compensatory for services rendered, not as subsidy. Only four million dollars in subsidy go to the "big four" scheduled operators, the remaining 76 million being divided, 50 million to the overseas, international operations and 26 million to the local-service domestic lines. Therefore, the all-cargo operator's contention that his paralleling competitor was undercutting his services through subsidy advantage is not justified inasmuch as the all-cargo firms operate primarily into metropolitan centres, offering virtually no local service facilities to off-line points insofar as common carriage is concerned.

The all-cargo carriers continued to lose money on their domestic freight operations despite the supposed stability imparted by the granting of temporary certificates in July of 1949. The Korean war, however, enabled the two prime operators, Slick and Flying Tigers to partially recoup their domestic common carriage losses with a landslide of military revenue. For example, in 1951, Flying Tigers, for the year ending June 30th, reported a net overall profit of one million dollars. Revenues had totalled 15.5 million dollars, composed of 3.5 million from common carriage of freight, 4.5 from rentals, charters and service sales, and 7.5 million
dollars from Pacific airlift for the military. Domestic freight was still being hauled at less than cost, but operations other than common carriage of freight were making up the deficiency. (7)

Slick Airways also made money in 1950 and 1951 as a direct consequence of the Korean war. A tabulation from their 1951 Annual Report is reproduced as follows: (8)

<table>
<thead>
<tr>
<th>Year</th>
<th>Profit</th>
<th>Loss</th>
<th>Loss Balance</th>
</tr>
</thead>
<tbody>
<tr>
<td>1946</td>
<td>$861,259</td>
<td>$861,259</td>
<td></td>
</tr>
<tr>
<td>1947</td>
<td>444,475</td>
<td>1,305,754</td>
<td></td>
</tr>
<tr>
<td>1948</td>
<td>144,019</td>
<td>1,449,753</td>
<td></td>
</tr>
<tr>
<td>1949</td>
<td>343,352</td>
<td>1,793,105</td>
<td></td>
</tr>
<tr>
<td>1950</td>
<td>$506,608</td>
<td>1,286,497</td>
<td></td>
</tr>
<tr>
<td>1951</td>
<td>382,979</td>
<td>933,518</td>
<td></td>
</tr>
</tbody>
</table>

The 1951 Slick Report noted that six DC-6A aircraft for cargo carriage had been provided for, at an outlay of over seven million dollars. Three had been delivered, with the remaining three scheduled for acceptance in 1953. The company had carried 67,890,612 ton-miles of domestic air freight in the year covered by the above noted report, equalling one-fourth of the total domestic freight hauled by all carriers combined. A copy of this 1951 Slick Airway Annual Report accompanies the Library copies of this thesis as Appendix VII. Copies of the 1952 reports for Slick and Flying Tigers are included as Appendix VIII and Appendix IX.

For 1952, despite revenues from transportation services of 11 million dollars, Slick lost $3,749 operationally.

During that year Slick had transported goods to a domestic total of 67.7 million ton-miles. However, all of its DC6 aircraft were devoted to overseas work, not assigned to domestic haulage where rates continued to bring returns below cost of service rendered. In April, 1952, the C.A.B. had authorized a 10% increase in freight rates in the domestic field, the first upward movement since the beginning of the rate war. Further, application was made in that year to the C.A.B. for authorization to carry mail and express, indicative of the trend towards the combination carriage principles of the established, passenger carrying operators.

Fortunately for Slick and Flying Tigers, the Korean war had placed a premium upon the sale of used aircraft or aircraft ordered but not yet delivered. In consequence, Slick profitably disposed of one C-46 aircraft and one DC-6A during the year. Quoting from their report:

For the year 1952 the Company earned $434,328 after taxes, equivalent to $1.03 per common share. These earning were derived solely from the sale of one C-46 aircraft and the prototype DC-6A aircraft. A loss of $3,749 was incurred from the operations of the Company.

In addition to selling the aircraft mentioned above, the Company contracted to sell another DC-6A early in 1953 for a profit of approximately $650,000 before taxes. In deciding to sell these aircraft your management realized that the fleet capacity would be reduced and the profit from operations thereby reduced. However, the advantages of a capital gains tax as compared to ordinary income taxes clearly indicated the advantage of these sales . . .
The operating loss in 1952 is not, in the opinion of your management, indicative of any basic trends nor of the profit potential of the Company. It does, however, point to the necessity of obtaining a more favorable relationship between air freight rates and costs . . . . During 1952, your Company operated close to the limits of practical capacity. As a result, cost increases fell directly on profitability . . . . (9)

In assessing the merits of the C.P.A. application, it is to be presumed that the Air Transport Board had these various Annual Reports available for review. In this regard, the Annual Report for the Flying Tiger Line for the year ended June 30th, 1952, must have been the subject of some contemplation. Canadian Pacific Air Lines had contended in its testimony that the all-cargo operators were prospering in consequence of their domestic freight operations alone. C.P.A. proposed to offer a similar common carriage of freight-only traffic between Montreal and Vancouver, and seriously contended that the venture would be profitable and would stand alone. The 1952 Flying Tiger Report referred to above indicates that only 20% of the firm's revenues could be accounted for by the common carriage of freight for the year under review. As for Slick, all four-engined equipment was assigned for overseas service, primarily connected with the military. To do with the Pacific airlift alone, the company carried 20,400 passengers

and 7,600,000 pounds of material across the ocean to the Orient or return. Quoting from the 1952 report:

In the coming year the Company is undertaking a contract with the Navy to provide a daily transcontinental trip for Navy cargo to parallel the Company's Route 100. The Navy has found that such transportation provides it with fast service at rates competitive with surface carriage because of the volume movement entailed. It is expected that this operation will increase the domestic airfreight volume carried by the Company by approximately 60%.

In addition the authority requested for carriage of air mail and air parcel post, if granted will add materially to volume. . . . .

Today the Company is one of the largest, if not the largest, single civilian contributor of airlift to the Armed Forces. It is looking forward to being able to report that it is also the largest airfreight carrier. (10)

During the year Flying Tigers had made a profit before taxes of $1,446,655 on their combined military and civilian operations. In addition, they had made a profit before taxes of $1,204,040 on the sale of equipment and from miscellaneous income such as derived from overhaul contracts obtained from the army and navy.

The instability of dependence upon war profits is recognized in the following quotation from the report:

The Company's net income in the fiscal year ended June 30th, 1952 was $1,556,968. While this amount exceeds that of any other year in the history of the Company, it must be remembered that we are operating in a "war economy"

and we must prepare for adjustments in the future as the country is able to return to a peace economy. Intensive development of civilian airfreight and contract operations is necessary to replace the military work as it may phase out. (11)

U.S. Air Freight Developments Subsequent to the A.T.B. Hearing but Prior to the Cabinet Decision.

As indicated in the paragraph above, the military work was commencing to phase out. C.P.A. had had its best year financially in 1951, with a net of $1,100,000. Results for 1952 showed a net of $364,000. (See page 16) These profits were, of course, a direct result of the Korean war and the C.P.A. Pacific military airlift. Such bonus operations commenced to disappear in the latter part of 1952 and completely departed from the aviation scene in 1953.

(11) Ibid., page 15.
Reviewing the Annual Report for the Flying Tiger Line for the year ended June 30th, 1953, as issued in October of that year, the following points are noted.

Transportation revenues amounted to 25 million dollars, covering both domestic and overseas military and civilian transportation without specific breakdown. On this revenue, a net operating income of $700,000 was realized. The operating revenues included approximately three million dollars from the Navy contract noted on page 110. This transcontinental freight operation had been taken from Slick through an undercut bid of 73.9% per C-46 aircraft mile. As forecast in the quotation on page 110, this contract had increased Flying Tigers' air freight business by nearly 60% in total volume. However, it is noted in AVIATION WEEK that the firm's domestic freight on a non-military basis actually fell off appreciably during the year under review. (12)

Maintenance and rental services showed up as an increasing revenue source, one Air Force contract alone for maintenance of 100 C-46 aircraft amounting to more than $2,500,000 gross. (13)

Long term lease of four DC-6A aircraft to Northwest Airlines for seven years, with option of a further three year extension, was announced. (14) This seven year

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(13) Flying Tigers' Annual Report, 1953, Appendix IX.
(14) Ibid., p. 18.
period represents a gross to Flying Tigers of nearly nine million dollars.

During the year most profitable operations were concerned engaged in to do with the sale of equipment. The following resume is quoted from the Statement of Income:

Profit on sale of operating aircraft $192,871
Profit on sale of purchase contract rights for 2 DC-6A aircraft to C.Itoh & Co. for use by Japan Air Lines on their proposed trans-Pacific service $1,100,000

A further $286,651 was acquired as non-operating profit, representing the excess of insurance proceeds over book value of an aircraft destroyed in a crash.

Despite these profits, the Annual Report indicates was at several points that the management was most concerned about to do with the future. For example, the President's report states:

With the cessation of hostilities in Korea we are moving out of a "war economy." We can anticipate a phase out of the air support we have been supplying to the fighting forces. . . . The transition may well not be smooth and the Company must be prepared for costly readjustments. . . .

The future poses many important and vital problems. Most immediately is the necessity for an increase in airfreight tariffs. . . . To compel non-discriminatory airfreight competition, Slick Airways, Inc., and the Flying Tigers have since the close of the fiscal year petitioned the Civil Aeronautics Board to amend its Minimum Rate Order to increase minimum rates 25%.

Of major importance, the Temporary Certificates of Public Convenience and Necessity held by both the Flying Tigers and Slick will expire by their terms on August 12, 1954.(15)

(15) Ibid., page 3.
The requested 25% freight rate increase was authorized by the Board on November 20th, 1953. Inasmuch as many of the carriers' rates were above the old minimums anyway, it was calculated that this increase would average out to about 12%. The rate rise was made to save the all-cargo carriers from insolvency and made in spite of the protests of the largest combination carrier, American Airlines. This firm contended that:

Airfreight is in a critical developmental stage with a critical need for volume growth, that volume was developed to a lesser extent than anticipated at the time of the minimum rate order, that American is adding substantially to its all cargo fleet and that the increase in minimum rates proposed by Slick would not be consistent with the objective of developing the airfreight volume required by the new capacity. (16)

American's mixed cargo-passenger operations yield lower costs and higher revenues. This enables the carrier to hold rates at the lowest possible level, simultaneously boosting volume to fill excess plane capacity. This was the plan T.O.A. was methodically pursuing by progressively dropping its rates over time as capacity became available. Such an operation as that proposed by C.P.A. would provide the same service but at higher cost if the following statement of the Civil Aeronautics Board is accepted:

The Board's show-cause order and tentative opinion in its previous minimum rate order 'determined that the proper development of air freight required that minimum rates be based on attainable costs in all-cargo planes. . .

This decision obviously must have been among the important considerations in certificating several all-cargo carriers. . . for without such a rate basis there would be serious doubt that all-cargo carriers could survive in competition with carriers handling all or part of their freight in combination planes . . . .

The financial reports of the two major all-cargo carriers indicate that Flying Tigers are barely breaking even on their scheduled freight operations, while Slick is suffering substantial losses.

In the case of Slick, at least, it appears that the need for prompt rate relief is urgent.'

(17)

The Canadian Air Transport Board had reported to the Cabinet that "In the United States scheduled all-cargo transcontinental air services are already numerous and continue to grow." (See page 92 of this dissertation) Such was very definitely not the case. Admittedly, the volume of U.S. air freight traffic was steadily increasing. However, through bankruptcies, mergers and voluntary suspensions of service, the number of all-cargo firms was steadily dwindling. By 1952, only two of the original fourteen U.S. all-cargo firms remained. In that year, as a result of continuing financial difficulties, these two remaining firms finalized plans for their amalgamation.

The proposed merger was approved by the share-

(17) Loc. cit.
DURING THE WASHINGTON'S BIRTHDAY WEEKEND CERTAIN FLIGHTS WILL NOT OPERATE; Consult American Airlines For Details.

CARGO SERVICE

In addition, all American Airlines flights shown in other tables carry cargo.

EAST - MIDWEST

<table>
<thead>
<tr>
<th>Flight No.</th>
<th>Eastbound Read Up</th>
<th>Eastbound Read Down</th>
<th>Westbound Read Up</th>
<th>Westbound Read Down</th>
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</thead>
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</tr>
<tr>
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</tr>
</tbody>
</table>

TRANSCONTINENTAL

<table>
<thead>
<tr>
<th>Flight No.</th>
<th>Eastbound Read Up</th>
<th>Eastbound Read Down</th>
<th>Westbound Read Up</th>
<th>Westbound Read Down</th>
</tr>
</thead>
<tbody>
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</tr>
<tr>
<td>1009</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

EQUIPMENT:
- DC-4 Airfreighter
- Convair Airfreighter
- DC-6 or DC-8 Airfreighter
- DC-7 Flagship
- E12 2/38 depart 3:00 p.m. from N.Y. Int'n Airpot

EXPLANATION OF REFERENCE MARKS
- (EST) = Eastern Standard Time
- (CST) = Central Standard Time
- (MST) = Mountain Standard Time
- (Phl) = Pacific Standard Time

SAMPLE AIRFREIGHT RATES (PER 100 POUNDS)

<table>
<thead>
<tr>
<th>TO:</th>
<th>FROM KPI</th>
<th>Boston</th>
<th>Buffalo</th>
<th>Chicago</th>
<th>Dallas/ Ft. Worth</th>
<th>Detroit</th>
<th>Los Angeles</th>
<th>New York</th>
<th>Philadelphia</th>
<th>St. Louis</th>
<th>San Francisco</th>
<th>Washington</th>
</tr>
</thead>
<tbody>
<tr>
<td>Boston:</td>
<td></td>
<td>$8.95</td>
<td>$9.50</td>
<td>$4.65</td>
<td>$26.95</td>
<td>$29.95</td>
<td>$41.20</td>
<td>$27.00</td>
<td>$22.00</td>
<td>$23.00</td>
<td>$29.00</td>
<td>$24.50</td>
</tr>
<tr>
<td>Buffalo</td>
<td></td>
<td>$8.26</td>
<td>$8.50</td>
<td>$4.40</td>
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<td>$27.90</td>
<td>$39.20</td>
<td>$27.00</td>
<td>$22.00</td>
<td>$22.00</td>
<td>$28.00</td>
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</tr>
<tr>
<td>Chicago</td>
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<td>$81.20</td>
<td>$50.00</td>
<td>$41.20</td>
<td>$42.00</td>
<td>$56.50</td>
<td>$48.00</td>
</tr>
<tr>
<td>Dallas/Ft. Worth</td>
<td></td>
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<td>$4.65</td>
<td>$20.00</td>
<td>$111.50</td>
<td>$121.50</td>
<td>$144.50</td>
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<td>$82.00</td>
<td>$82.00</td>
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<td>$111.50</td>
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<td>$72.00</td>
<td>$72.00</td>
<td>$95.00</td>
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<td>$28.95</td>
<td>$41.20</td>
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<td>$30.95</td>
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<td>Philadelphia:</td>
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<td>$33.95</td>
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<td>$22.00</td>
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<td>$115.50</td>
<td>$138.50</td>
<td>$93.50</td>
<td>$76.00</td>
<td>$76.00</td>
<td>$99.00</td>
<td>$89.50</td>
</tr>
<tr>
<td>San Francisco:</td>
<td></td>
<td>$20.00</td>
<td>$20.00</td>
<td>$16.00</td>
<td>$100.25</td>
<td>$110.25</td>
<td>$133.50</td>
<td>$87.20</td>
<td>$70.00</td>
<td>$70.00</td>
<td>$93.00</td>
<td>$83.50</td>
</tr>
</tbody>
</table>

From American Airlines, Inc. Time Table, effective Feb. 14, 1954. Note preponderance of combination flights with supplementary all-cargo services. Long term plans of T.C.A. contemplate this type integrated service.
holders prior to the rendering of the Cabinet decision, to do with the C.P.A. application. It was further finalized by the granting of C.A.B. approval in January of 1954 and is presently in the process of taking place. Under the merged operations, this last remaining all-cargo company estimates its 1954 gross at 45 million dollars. The merged firm will have assets of 25 million dollars. Annual traffic should exceed 100 million ton-miles, or approximately one half of the nation's total. Whether or not this last survival will be profitable remains to be seen. However, the reasons for merger, as outlined in the Proxy Statement sent to all shareholders of the two firms to do with the merger plans stated:

It has been found that in the development of airfreight traffic both Flying Tigers and Slick have developed the bulk of their volumes at points where they largely duplicate each other. The elimination of presently duplicated functions at points now commonly served by both companies . . . should result in substantial savings . . . The consolidation of the administration activities of the two carriers should quickly result in substantial savings. Further savings will be effected by the elimination of uneconomic and unnecessary duplication of flight schedules between many of these important traffic centres without in any way reducing essential service between these points. The total volume of airfreight which will be generated at various important traffic centers by the merged companies will justify the use of large new equipment and in every instance the quality in character and quality in service will be greatly improved.
The gross revenues of the consolidated system should be materially greater than the combined gross revenues of the two companies as separate units. New and improved service to the public with integration of the route structures of the two carriers serviced by the new equipment which both carriers have or are acquiring will enable the merged company to generate more traffic and provide better service to the public by improved scheduling.

Increased utilization of equipment, facilities and personnel and elimination of duplicate functions, services, capital outlays and inventories should ultimately result in substantial savings and lower unit costs. (18)

The foregoing is quoted in detail inasmuch as it amounts to a recapitulation of T.C.A. 's entire case before the Air Transport Board. It summates the contentions of Prof. Waines, Dr. Currie and Mr. McGregor, a T.C.A. 's President. Air cargo carriage on the basis such as that proposed by C.P.A. had proven a costly experiment in the U.S.A. Investment in the all-cargo carrying field could be likened to John Stuart Mill's appraisal of the Canadian lumber trade of 1848, constituting:

... an employment of capital partaking so much the nature of a lottery... that taking the adventures in the aggregate, there is more money lost by the trade than gained by it... the average rate of profit is less than nothing. (19)

Mill would doubtless have concurred with C.A.B. member Josh Lee's dissenting comments to do with the

(18) Proxy Statement, Slick-Flying Tiger Merger, June 15, 1953, page 5. (Statement and other data obtained through purchase of a share in each firm)

Air Freight decision which initially created the situation in the United States that the Canadian Cabinet has seen fit not to condone its repetition in this country. Mr. Lee stated in part:

The fact that a substantial volume of traffic has been moved by the non-scheduled carriers is not impressive since it was moved at so great a loss. (20)

The majority opinion in the 3-2 Civil Aeronautics Board 1949 Air Freight Decision had insisted that new business would be created by the all-cargo carriers, this having been one of their main arguments for the certification of the original four all-cargo firms on a five year experimental basis.

No such new business was generated. Aside from losing many millions of dollars in the process, the all-cargo carriers simply drew from the identical pool as their combination competitors. i.e. from rail express. No true penetration was made of any other surface type traffic such as rail and highway freight. Any appreciable quantity of fresh food, fish and the like was being carried by the combination carriers alone, and then in only negligible quantities in relation to the forecasted potential. The nation's domestic trunk lines, which as has been noted are virtually free from subsidization, were carrying increasing quantities of air cargo, picked up and delivered in an orderly fashion by their common agent, Aircargo, Incorporated. What

(20) C.A.B. Reports, Volume 10, Economic Cases, Air Freight Case, 810 et al., page 611. (1949)
was more important, these trunk lines were making money. For example, in 1952 these trunk operators made a total profit before taxes of 95 million dollars, and in 1953 of 92 million dollars. (21) Both United and American Airlines paid 4 1/2 million dollars in dividends in 1952. For that year United had total revenues of 153 million dollars; American, 187 million dollars. (22)

An indication of the amount of cargo handled by these trunk line operators in conjunction with their passenger services is indicated in the tables that follow. Within the same tables will be found confirmation as to the common pool of traffic drawn upon by all carriers, both all-cargo and combination. Furthermore, tables are included to show the make-up of Trans-Canada Air Lines' cargo traffic, indicating that the development in Canada has followed the same source pattern but without the wastage of capital resources through duplication of services.

It was also considered an appropriate place to insert tables to do with U.S. trunk line operating and profit results in order that the industry be set in proper perspective in relation to the data contained in the Annual Reports for Slick and Flying Tigers, as appended.

---

Table 6
Ten Top Commodities Carried by Air Freight in the U.S.A.

<table>
<thead>
<tr>
<th>Rank</th>
<th>Description</th>
<th>Slick Airways 1950</th>
<th>Major Airlines 1951</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Metal products, including auto parts, aircraft parts and machinery and parts</td>
<td>26.2</td>
<td>26.8</td>
</tr>
<tr>
<td>2</td>
<td>Wearing apparel, dry goods and textiles.</td>
<td>16.9</td>
<td>12.1</td>
</tr>
<tr>
<td>3</td>
<td>Electric and electronic equipment and parts.</td>
<td>14.2</td>
<td>14.3</td>
</tr>
<tr>
<td>4</td>
<td>Cut flowers, plants, etc.</td>
<td>9.1</td>
<td>9.3</td>
</tr>
<tr>
<td>5</td>
<td>Advertising, printed matter, paper products.</td>
<td>3.6</td>
<td>9.2</td>
</tr>
<tr>
<td>6</td>
<td>Drugs and biologicals</td>
<td>6.2</td>
<td>4.9</td>
</tr>
<tr>
<td>7</td>
<td>Luggage and personal effects</td>
<td>-</td>
<td>3.5</td>
</tr>
<tr>
<td>8</td>
<td>Livestock, chicks, fish</td>
<td>-</td>
<td>3.4</td>
</tr>
<tr>
<td>9</td>
<td>Fresh food</td>
<td>-</td>
<td>3.1</td>
</tr>
<tr>
<td>10</td>
<td>Cameras, film, photo equipment</td>
<td>-</td>
<td>2.9</td>
</tr>
</tbody>
</table>

All other - No single item of which comprising more than 2\% of the total for either Combination Carriers or Slick.

<table>
<thead>
<tr>
<th></th>
<th>Slick Airways 1950</th>
<th>Major Airlines 1951</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>23.8</td>
<td>8.5</td>
</tr>
</tbody>
</table>

100.0%        100.0%

From Staff Study, Domestic Air Cargo Forecast, U.S. Civil Aeronautics Authority, Washington, 1952.

Their source:

U.S. Civil Aeronautics Board, Docket 1705 et al.
Preliminary Survey on Air Cargo Volume, Air Cargo Task Committee-Subcommittee No. 4, National Security Industrial Association.
## Table 7
Top Ten Commodities
Carried in T.C.A. Air Cargo
North American Division
During 1952

<table>
<thead>
<tr>
<th>Rank</th>
<th>Commodity</th>
<th>Quantity (lbs)</th>
<th>Percent of Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>Textiles</td>
<td>1,802,147</td>
<td>17.3</td>
</tr>
<tr>
<td>2.</td>
<td>Flowers and plants</td>
<td>1,549,717</td>
<td>14.9</td>
</tr>
<tr>
<td>3.</td>
<td>Newspapers and magazines</td>
<td>631,434</td>
<td>6.0</td>
</tr>
<tr>
<td>4.</td>
<td>Wearing apparel</td>
<td>536,790</td>
<td>5.2</td>
</tr>
<tr>
<td>5.</td>
<td>Industrial and manufacturing machinery and parts</td>
<td>532,763</td>
<td>5.1</td>
</tr>
<tr>
<td>6.</td>
<td>Aircraft parts</td>
<td>469,333</td>
<td>4.5</td>
</tr>
<tr>
<td>7.</td>
<td>Surface vehicles and parts, including motor cars, trucks, bicycles, baby carriages, etc.</td>
<td>452,302</td>
<td>4.4</td>
</tr>
<tr>
<td>8.</td>
<td>Furs, raw, unmanufactured.</td>
<td>440,443</td>
<td>4.2</td>
</tr>
<tr>
<td>9.</td>
<td>Electrical equipment/parts</td>
<td>359,893</td>
<td>3.5</td>
</tr>
<tr>
<td>10.</td>
<td>Hardware</td>
<td>328,237</td>
<td>3.2</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>7,103,059</td>
<td>68.3%</td>
</tr>
</tbody>
</table>

Note: Total North American poundage for 1952: 10,394,178 lbs.

Source: Trans-Canada Air Lines Air Cargo Department.
The Average Return Per Freight Ton Mile for T.C.A. and U.S. Domestic Lines

<table>
<thead>
<tr>
<th>Carrier</th>
<th>Average Return</th>
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<tbody>
<tr>
<td>(1) T.C.A. (12 months ended 30/12/52)</td>
<td>32.6¢</td>
</tr>
<tr>
<td>(2) American Airlines</td>
<td>21.07¢</td>
</tr>
<tr>
<td>(3) United Airlines</td>
<td>20.44¢</td>
</tr>
<tr>
<td>(4) T.W.A.</td>
<td>20.75¢</td>
</tr>
<tr>
<td>(5) Eastern</td>
<td>19.42¢</td>
</tr>
<tr>
<td>(6) Northwest</td>
<td>29.93¢</td>
</tr>
<tr>
<td>(7) Colonial</td>
<td>36.30¢</td>
</tr>
<tr>
<td>(8) Slick</td>
<td>15.14¢</td>
</tr>
<tr>
<td>(9) Flying Tigers</td>
<td>16.14¢</td>
</tr>
</tbody>
</table>

Note:
U.S. data for 12 months ended 31/9/52.
Source: U.S. Data from C.A.B. Recurrent Reports.

(10) T.C.A. (planned yield for new rates) 19.8¢
(applied for December, 1952;) to 20.8¢
(finally approved by A.T.B.)
(following Cabinet decision )
(re C.P.A. in November, 1953.)

These rates were derived from a base of 24¢ per ton-mile for 100 mile distances, decreasing to 19.4¢ at 2500 miles, then horizontal to 3100 miles. At that point a ceiling charge of 29.50 was established, yielding a possible minimum return of 14.9¢ per ton-mile for cargo hauled. Source: T.C.A. Rates and Tariffs Department.

(11) C.P.A. - average returns not obtainable, but the following point-to-point rates from their tariffs show the company approach to air cargo. No consistent structure is evidenced, rates varying from 26¢ to $1.33 per ton-mile at the 100 pound level. C.P.A. has, of course, a monopoly on most of its routes.

Calgary-Cranbrook 57.8¢ (per ton-mile at the)
Penticton 52.9¢ (100 pound level.)
Vancouver-Kamloops 45.1¢
Port Hardy 47.7¢
Edmonton-Peace River 65.2¢
Hay River 52.3¢
Yellowknife 48.2¢
Montreal-Quebec 46.3¢
Seven Islands 48.4¢

Source: Above rates from tariffs in effect 4th December, 1952, as furnished by Canadian Pacific.
### Table 9

Comparison of Cargo Ton-Miles as Performed by U.S. Carrier Groups (12 months ended June 30th, 1952)

<table>
<thead>
<tr>
<th></th>
<th>Cargo Ton Miles</th>
<th>Per Cent. of Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Trunk lines</td>
<td>104,507,000</td>
<td>54</td>
</tr>
<tr>
<td>Local service carriers</td>
<td>1,010,000</td>
<td>1</td>
</tr>
<tr>
<td>All-cargo carriers</td>
<td>86,325,000</td>
<td>45</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>191,842,000</strong></td>
<td><strong>100%</strong></td>
</tr>
</tbody>
</table>

Source: C.A.B. Recurrent report of mileage and traffic data.

### Table 10

Relative Use of Composite and All-Cargo Aircraft by the Domestic U.S. Scheduled Airlines in Cargo Work.

<table>
<thead>
<tr>
<th></th>
<th>Per Cent. of Total*</th>
<th>Per Cent. Performed by Composite Aircraft</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ton Miles</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Performed</td>
<td></td>
<td></td>
</tr>
<tr>
<td>(1) American</td>
<td>37%</td>
<td>70%</td>
</tr>
<tr>
<td>(2) T.W.A.</td>
<td>13%</td>
<td>55%</td>
</tr>
<tr>
<td>(3) U.A.L.</td>
<td>23%</td>
<td>58%</td>
</tr>
<tr>
<td>(4) E.A.L.</td>
<td>6%</td>
<td>100%</td>
</tr>
<tr>
<td>(5) N.W.A.</td>
<td>3%</td>
<td>96%</td>
</tr>
</tbody>
</table>

Source: Air Transport Association of America; Comparative Statement of Flight and Traffic Statistics for 9 months ending September 30th, 1952, thus presumably the latest data available to the Board.

*The percentages in this column relate to the total miles performed by the scheduled passenger carriers only.
Table 11.
T.C.A.'s Average Return Per Air Cargo Ton-Mile

<table>
<thead>
<tr>
<th>Year</th>
<th>Cargo Ton-Miles</th>
<th>Cargo Revenue</th>
<th>Return per Ton-Mile</th>
</tr>
</thead>
<tbody>
<tr>
<td>1947</td>
<td>55,879</td>
<td>26,695.28</td>
<td>47.8¢</td>
</tr>
<tr>
<td>1948</td>
<td>701,387</td>
<td>221,537.90</td>
<td>31.6¢</td>
</tr>
<tr>
<td>1949</td>
<td>1,049,784</td>
<td>352,090.78</td>
<td>33.5¢</td>
</tr>
<tr>
<td>1950</td>
<td>2,083,998</td>
<td>730,393.82</td>
<td>35.0¢</td>
</tr>
<tr>
<td>1951</td>
<td>2,277,260</td>
<td>611,140.81</td>
<td>34.1¢</td>
</tr>
<tr>
<td>1952</td>
<td>3,519,370</td>
<td>1,135,322.98</td>
<td>32.3¢</td>
</tr>
</tbody>
</table>

1954 New rates as finally approved by the Board following Cabinet decision re C.P.A. application planned to yield between 19.8 and 20.8¢ per ton-mile average.

Table 12.
T.C.A.'s Average Return Per Express Ton-Mile

<table>
<thead>
<tr>
<th>Year</th>
<th>Express Ton-Miles</th>
<th>Express Revenue</th>
<th>Return per Ton-Mile</th>
</tr>
</thead>
<tbody>
<tr>
<td>1947</td>
<td>543,307</td>
<td>420,948.39</td>
<td>77.5¢</td>
</tr>
<tr>
<td>1948</td>
<td>708,151</td>
<td>537,755.97</td>
<td>75.9¢</td>
</tr>
<tr>
<td>1949</td>
<td>884,112</td>
<td>648,982.11</td>
<td>73.4¢</td>
</tr>
<tr>
<td>1950</td>
<td>998,479</td>
<td>738,397.97</td>
<td>73.3¢</td>
</tr>
<tr>
<td>1951</td>
<td>1,174,096</td>
<td>869,997.77</td>
<td>74.1¢</td>
</tr>
<tr>
<td>1952</td>
<td>1,298,508</td>
<td>1,048,876.00</td>
<td>75.0¢</td>
</tr>
</tbody>
</table>


Table 12.
Equipment Data.

<table>
<thead>
<tr>
<th>Aircraft Type</th>
<th>Payload-</th>
<th>Block Speed</th>
<th>Ton-Miles Per Day *</th>
<th>No. Required to Equal One 1049B</th>
</tr>
</thead>
<tbody>
<tr>
<td>C-46</td>
<td>6.25</td>
<td>180 MPH</td>
<td>9,000</td>
<td>5.23</td>
</tr>
<tr>
<td>DC-4</td>
<td>10.50</td>
<td>200 MPH</td>
<td>16,800</td>
<td>2.80</td>
</tr>
<tr>
<td>DC-6A</td>
<td>14.20</td>
<td>285 MPH</td>
<td>32,376</td>
<td>1.45</td>
</tr>
<tr>
<td>1049B</td>
<td>19.3</td>
<td>305 MPH</td>
<td>47,096</td>
<td>1.00</td>
</tr>
</tbody>
</table>

*Tonemiles per day of 8 hours utilization.
(1) DC-6A is type of aircraft purchased by C.P.A. for use on its proposed Montreal-Vancouver cargo run.
(2) Lockheed 1049B is type of aircraft now being delivered to T.C.A. (8 units) for passenger use with ultimate employment as cargo carrier thus illustrated.
(3) Source: Lockheed Aircraft Corp., Air Cargo Trends, issued September, 1952.
Table 12(a)

U.S. Airline Revenue Data
(12 months ending September 30th, 1953)

<table>
<thead>
<tr>
<th>Airline</th>
<th>Revenues</th>
<th>Operating Profit</th>
<th>NET PROFIT</th>
</tr>
</thead>
<tbody>
<tr>
<td>(1) American Airlines</td>
<td>$204,988,000</td>
<td>29,078,000</td>
<td>13,739,000</td>
</tr>
<tr>
<td>(2) United Airlines</td>
<td>166,933,000</td>
<td>21,065,000</td>
<td>10,445,000</td>
</tr>
<tr>
<td>(3) Trans World Airlines</td>
<td>185,076,000</td>
<td>16,158,000</td>
<td>7,144,000</td>
</tr>
<tr>
<td>(4) Eastern Airlines</td>
<td>141,481,000</td>
<td>20,733,000</td>
<td>9,820,000</td>
</tr>
<tr>
<td>(5) Northwest Airlines</td>
<td>61,736,000</td>
<td>4,473,000</td>
<td>2,661,000</td>
</tr>
<tr>
<td>(6) Pan American Airlines</td>
<td>206,475,000</td>
<td>17,950,000</td>
<td>10,816,000</td>
</tr>
</tbody>
</table>

Source: Carriers' Form 41 reported to C.A.B. as quoted in AVIATION WEEK, December 28th, 1953, McGraw-Hill, New York, p. 53

Table 12(b)

1952 Passenger Revenues
Ten Leading Airlines and Railroads

<table>
<thead>
<tr>
<th>Airline</th>
<th>Revenues</th>
</tr>
</thead>
<tbody>
<tr>
<td>(1) AMERICAN AIRLINES</td>
<td>$158,000,000</td>
</tr>
<tr>
<td>(2) Pennsylvania Railroad</td>
<td>156,000,000</td>
</tr>
<tr>
<td>(3) UNITED AIR LINES</td>
<td>128,000,000</td>
</tr>
<tr>
<td>(4) New York Central</td>
<td>124,000,000</td>
</tr>
<tr>
<td>(5) EASTERN AIR LINES</td>
<td>105,000,000</td>
</tr>
<tr>
<td>(6) TRANS WORLD AIRLINES</td>
<td>100,000,000</td>
</tr>
<tr>
<td>(7) Santa Fe Railroad</td>
<td>58,000,000</td>
</tr>
<tr>
<td>(8) Southern Pacific Railroad</td>
<td>53,000,000</td>
</tr>
<tr>
<td>(9) New Haven Railroad</td>
<td>52,000,000</td>
</tr>
<tr>
<td>(10) Long Island Railroad</td>
<td>37,000,000</td>
</tr>
</tbody>
</table>

Chapter VII
Railway Express in Canada and the U.S.A.

It will be recalled that the submissions of C.P.A.L. and of the Douglas Company, and the final submission of the Air Transport Board to the Cabinet, all assumed without question that railway express statistics for the United States and Canada were strictly comparable. The applicant, Canadian Pacific, as noted on page 37 of this thesis, derived a forecasted potential for the proposed Montreal-Vancouver service by first establishing that current U.S. air cargo tonnage amounted to a total equal to 15% of the annual U.S. rail express tonnage. Then, by simply taking 15% of the known annual Canadian rail express tonnage, an estimated yearly tonnage for their air service of 4,093 tons was derived.

At page 15 of Exhibit 18, the Douglas Company set out a comparison of Canadian and U.S. rail express shipments, showing that Canadians avail themselves of such service on an average of 3.2 times per capita annually, against only 0.5 per capita usage in the U.S. "Comparison of per capita railway express shipments and transportation charges between Canada and the United States is ample evidence that Canadian merchants already recognize the advantages of swift transport in shrinking long supply lines. . . ." (1) As noted on page 87 of this thesis,

(1) Exhibit 18, Appendix III, page 15.
the Board accepted this concept without comment, reporting the figures and argument to the Cabinet in full detail.

The evidence presented at the hearing by Mr. Martin, General Manager of Canadian National Express, as summarized on pages 68 and 69 of this report, constitutes a preamble to the contentions set out in this chapter. As with Mr. Martin's evidence, the subject matter naturally divides into two phases. The first is to do with rail express service generally in the two countries; the second, to do with the movement of particular commodities such as fish and other food products. Space is devoted to the latter commodity movements inasmuch as C.P.A. placed such emphasis on this type traffic during the course of its submission to the Board.

Rail Express in Canada and the United States

Railway express in the United States is handled by a single agency, independently incorporated, but with its shares wholly owned on a joint basis by all U.S. railroads. This express firm, Railway Express Agency, Inc., was formed in 1919 through the amalgamation of the remaining four of an original multitude of operators who had entered the field since the traffic type's conception in 1839.

Railway express in Canada is handled by the two transcontinental railway systems independently, the one from the other. With the Canadian National, an express
department incurs expenses and receives revenues in the name of the parent company, yielding a profit or loss evidenced in the revenue statement for operations of the railway. With the Canadian Pacific, a separately incorporated subsidiary wholly owned by the parent corporation, carries on the express business. This Canadian Pacific Express Company:

.....owns over 23,000 shares of the common stock of its parent. It receives dividends on these holdings like any other shareholder. It gets rent from the tenants of the buildings which it owns. It even collects rent from the Canadian Pacific when its parent occupies space in a building owned by the Express Company and it does this notwithstanding that it is not charged rent on the space used by Express in railway-owned buildings. (2)

With neither the C.N. nor the C.P. is provision made for true allocation of costs relative to the handling of express traffic. It is generally conceded that, as for passenger haulage, the express business is a necessary, but non-paying, phase of Canadian railway service. The same can be said for the operations of the Railway Express Agency in the United States, as evidenced by the following comment:

That there is a railway passenger deficit is unquestioned; the difference of opinion relates to its size. Application of the I.C.C. formula for determination of direct and fully allocated costs for railway passenger operations in 1951 yields a deficit

(2) Dr. A.W. Currie, Canadian Transportation, currently in process of publication, quote from page 2 of Express Chapter.
of 681 million dollars. This deficit is largely accumulated from head end business and unprofitable local and branch lines. (3)

In round figures, the data substantiating the foregoing statement are set out below. It should be noted that no allowance has been made for investment charges. Had this been done, an I.C.C. footnote states that the 1951 loss would have exceeded one billion dollars on the basis of their computations. (4)

Table 13.

<table>
<thead>
<tr>
<th>Head end traffic</th>
<th>Passenger Revenues (millions)</th>
<th>Passenger Operating Expenses (millions)</th>
<th>Passenger Deficit (millions)</th>
<th>Distribution of Deficit</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mail EXPRESS</td>
<td>$335</td>
<td>84</td>
<td>$339</td>
<td>4</td>
</tr>
<tr>
<td>Baggage*</td>
<td>12</td>
<td>74</td>
<td>148</td>
<td>62</td>
</tr>
<tr>
<td>Mail EXPRESS</td>
<td>12</td>
<td>74</td>
<td>148</td>
<td>62</td>
</tr>
<tr>
<td>Mail EXPRESS Baggage*</td>
<td>12</td>
<td>74</td>
<td>148</td>
<td>62</td>
</tr>
<tr>
<td>Passenger Carriage</td>
<td>$1018</td>
<td>$1484</td>
<td>$466</td>
<td>66.5%</td>
</tr>
<tr>
<td></td>
<td>$1449</td>
<td>$2129</td>
<td>$680</td>
<td>100.0%</td>
</tr>
<tr>
<td>*Baggage includes milk.</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

By their own calculations, the U.S. railroads estimated their 1950 loss on express business at 96 million dollars, without allowance for return on investment in operating facilities. Even allowing for the substantial rate increases granted in 1951, these railways contend that the future express deficits will range from 13 to 30 millions

(4) L.K. Sillcox, address, Wheels or Wings, presented at Salzberg Transport Conference, Syracuse University, April 29, 1953; page 25.
(5) Loc. cit.
Mr. Martin, General Manager of Canadian National Express, contended in his testimony at the air freight hearing, (page 68), Canadian shippers receive faster service at lower rates in this country than do their counterparts in the United States. Canadian express business is in a healthy and growing state; American express business is relatively decadent and steadily declining in volume handled. The basic reasons for this variance lie in the respective policies involved. In the United States, express rates cannot be less than twice the first class rail rates, without I.C.C. approval. In Canada, many express rates are less than actual rail freight rates. In Canada it is a matter of government authorized policy for the rails to use rail express in their competition with truck carriage and parcel post services. United States law precludes such competitive rate cutting.

The comparative figures to do with rail express quoted by Douglas, C.P.A. and the Board to the Cabinet are thus inflated insofar as Canada is concerned by the carriage of what amounts to freight at freight rates, but under the classification of express. There is

Further, in the Canadian west, extensive haulage of l.o.l. freight in passenger trains where traffic does not justify operation of way freight trains. For the C.P.R. this traffic is called express, for the C.N.R.,

(6) Loc. cit.
freight.

The decline in express volume handled in the U.S. is clearly evidenced by the following table: (7)

Table 14.

<table>
<thead>
<tr>
<th>Year</th>
<th>No. of Shipments (Millions)</th>
<th>No. of Hrs. Worked (Millions)</th>
<th>Shipments per man hour</th>
</tr>
</thead>
<tbody>
<tr>
<td>1951</td>
<td>82.0</td>
<td>91.0</td>
<td>.91</td>
</tr>
<tr>
<td>1950</td>
<td>91.4</td>
<td>99.3</td>
<td>.92</td>
</tr>
<tr>
<td>1949</td>
<td>109.7</td>
<td>119.5</td>
<td>.92</td>
</tr>
<tr>
<td>1948</td>
<td>145.9</td>
<td>146.7</td>
<td>.98</td>
</tr>
<tr>
<td>1947</td>
<td>193.1</td>
<td>168.4</td>
<td>1.15</td>
</tr>
<tr>
<td>1946</td>
<td>234.7</td>
<td>185.9</td>
<td>1.26</td>
</tr>
<tr>
<td>1945</td>
<td>209.2</td>
<td>175.7</td>
<td>1.19</td>
</tr>
<tr>
<td>1944</td>
<td>200.3</td>
<td>161.6</td>
<td>1.24</td>
</tr>
<tr>
<td>1943</td>
<td>179.2</td>
<td>140.5</td>
<td>1.28</td>
</tr>
<tr>
<td>1942</td>
<td>165.0</td>
<td>114.3</td>
<td>1.44</td>
</tr>
<tr>
<td>1941</td>
<td>172.6</td>
<td>109.6</td>
<td>1.57</td>
</tr>
<tr>
<td>1940</td>
<td>160.8</td>
<td>104.0</td>
<td>1.55</td>
</tr>
<tr>
<td>1939</td>
<td>148.9</td>
<td>99.3</td>
<td>1.50</td>
</tr>
</tbody>
</table>

Shipments handled have thus dropped from 161 million in 1940 to 82 million in 1951, aside from the wartime peaks in excess of the 1940 figure. During the same period, the number of shipments handled per man hour have fallen from 1.5 to less than 1, with the average labour cost per shipment having risen from 52¢ to $1.99.

Where in Canada, rail express is a dynamic part of the transportation industry, in the U.S. it is steadily being relegated towards ultimate disuse. The U.S. roads freight have steadily improved their lcl. services to the point

(7) Ibid., page 20.
where express service is virtually duplicated. As opposed to the Canadian plan, the Americans have used l.c.l. as their competitive weapon in dealing with the highway carriers. In Canada, as previously noted, we have what are specifically termed, "truck competitive" express rates. Either plan achieves the same objective. However, in so doing the Canadian express volume figures are obviously inflated, rendering the Air Transport Board's submission to the Cabinet in this regard totally misleading.

As to the comparative speed of service rendered in the rail express businesses of Canada and the United States, the following table is set out:

Table 15.

Comparison Canada-United States Rail Express Service for Selected Distances.

<table>
<thead>
<tr>
<th>Miles</th>
<th>Canada*</th>
<th>U.S.A.*</th>
</tr>
</thead>
<tbody>
<tr>
<td>250</td>
<td>1st morning</td>
<td>1st morning</td>
</tr>
<tr>
<td>500</td>
<td>1st afternoon</td>
<td>2nd morning</td>
</tr>
<tr>
<td>1000</td>
<td>2nd afternoon</td>
<td>2nd or 3rd morn.</td>
</tr>
<tr>
<td>1500</td>
<td>2nd afternoon</td>
<td>3rd or 4th &quot;</td>
</tr>
<tr>
<td>2000</td>
<td>3rd morning</td>
<td>4th or 5th &quot;</td>
</tr>
<tr>
<td>3000</td>
<td>4th morning</td>
<td>6th or 7th &quot;</td>
</tr>
</tbody>
</table>

*Railway schedules plus attestation of management personnel.
*From Air Cargo Trends, 1951, Lockheed Aircraft Corp. and C.A.A. Domestic Air Cargo Forecast, 1952; see Bibliography.

The shipper of rail express in Canada thus gets much faster delivery for the longer hauls, plus considerably lower per mile charges as evidenced by the table set out on the following page.
Table 16.

Comparison 1st Class Rail Express Rates at 100 lb. Level - United States and Canada.

<table>
<thead>
<tr>
<th>Miles</th>
<th>Canada A</th>
<th>Canada B</th>
<th>Canada C</th>
<th>United States</th>
</tr>
</thead>
<tbody>
<tr>
<td>250</td>
<td>$2.15</td>
<td>2.50</td>
<td>2.85</td>
<td>4.12</td>
</tr>
<tr>
<td>500</td>
<td>3.50</td>
<td>4.20</td>
<td>4.85</td>
<td>5.69</td>
</tr>
<tr>
<td>1000</td>
<td>6.20</td>
<td>7.55</td>
<td>8.90</td>
<td>8.11</td>
</tr>
<tr>
<td>1500</td>
<td>7.85</td>
<td>9.90</td>
<td>11.30</td>
<td>10.53</td>
</tr>
<tr>
<td>2000</td>
<td>8.90</td>
<td>11.60</td>
<td>14.00</td>
<td>12.95</td>
</tr>
<tr>
<td>2500</td>
<td>-</td>
<td>14.00</td>
<td></td>
<td>15.37</td>
</tr>
</tbody>
</table>

Note: The U.S. tariff maximizes at $20.45 for 3900 miles.
Zone A - East of Windsor, Sudbury, Hornepayne.
Zone B - West of Sudbury, Hornepayne to Canmore, Edson, and between A and B.
Zone C - West of Canmore, Edson and between A or B and C. ($14.00 is Canadian maximum.)

Source: U.S. and Canadian Railway Express Tariffs.

Thus, in the United States, rail express is both slower and more expensive than comparable service in Canada. The task facing Air cargo penetration of rail express traffic in Canada as opposed to the United States is, therefore, just that much more difficult to accomplish. Air cargo rates in the U.S. are closer to parity with rail express levies; are actually lower in some instances. Assuming a 20¢ per ton mile rate for air cargo for both countries, the following tabulation results:

Table 17

<table>
<thead>
<tr>
<th></th>
<th>Rate/100 lbs. Rail Ex.</th>
<th>Air Cargo Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Montreal to Winnipeg</td>
<td>$9.70</td>
<td>$13.30</td>
</tr>
<tr>
<td>Edmonton</td>
<td>12.30</td>
<td>20.93</td>
</tr>
<tr>
<td>Vancouver</td>
<td>14.00</td>
<td>25.64</td>
</tr>
<tr>
<td>New York to Washington</td>
<td>4.12</td>
<td>2.15</td>
</tr>
<tr>
<td>Chicago</td>
<td>7.63</td>
<td>7.24</td>
</tr>
<tr>
<td>Dallas</td>
<td>11.50</td>
<td>13.78</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>17.36</td>
<td>24.60</td>
</tr>
</tbody>
</table>

Note: See next page for notes and source.
The air rates quoted on the previous page in Table 17 are for airport to airport, and are based upon mileages contained in T.C.A. Official Distance Table A.T.B. No. 9 and C.A.B. Mileage Book No. 1. Pick-up and delivery at each end averages 40¢ per hundred pounds, with a minimum charge of 85¢ per shipment.

Admittedly, the Canadian rail express business has suffered from truck competition, but only to a fraction of the extent trucks have diverted rail express traffic in the U.S. The number of Class I interstate highway truck organizations in the United States stood at 2,361 in 1953, representing those with more than $200,000 gross operating revenues annually.\(^{(8)}\)

These carriers reported average revenues for 1952 of 5.572 cents per ton-mile, against 1.43 cents per ton-mile for the Class I railroads. However, the latter figure is for freight while the former amounts to a traffic comparable to express. \(^{(9)}\) For Canada, no such drain to independent truck carriers has taken place. The Zone A truck competitive rates have made possible continued successful rail express haulage in the Windsor-Toronto-Montreal section. In the western provinces, considerable trucking is either owned or controlled by the railways. In consequence, a coordinated rail-highway program is facilitated in a

\(^{(8)}\) Competitive Transportation Review, December 1953, page 10.
\(^{(9)}\) Ibid., page 6.
manner not possible in the United States. For example, O.K. Freight Lines operating between Vancouver and Penticton over the Hope-Princeton highway is the wholly owned subsidiary of the C.P.R., as is Dench of Canada, whose common carriage truck network covers the Province of Alberta.

As the Douglas Exhibit 18 stated, per capita railway express shipments for Canada amount to 3.2 annually, against 0.5 for the United States. The Air Transport Board, as quoted on page 87 of this report, advised the Cabinet that this fact was "strong evidence of a substantial Canadian potential for the development of scheduled all-cargo air services . . . " (10) However, as outlined in the preceding pages, the variation in per capita shipments is readily understandable. Aside from more intensive penetration by highway carriers, the U.S. rail express business is both slower and more expensive from the standpoint of the shipping public than is the case in Canada. Douglas, C.P.A. and the Air Transport Board simply were not comparing like with like.

Nature of Expected Diversion from Rail Express to Air Cargo

As noted on page 135, goods are carried by U.S. ton interstate trucks at 5.6¢ per mile and by rail freight

(10) Board Report to the Cabinet, page 2, see App.III.
at 1.4¢ per ton-mile. At 20¢ per ton-mile, the basic T.C.A. air cargo rate at the present time and approximately that proposed by the C.P.A. application, the industry offers no competitive threat to rail, highway or water traffic. The prime field for penetration lies in rail express traffic, and then in only the 100 pounds and over level for goods shipments originating in close proximity to the air terminal. In this regard T.C.A. experience has been that only 8% of air express shipments come from off airline points, and only 4% are destined to off airline points. (11) Yet the Douglas survey includes all express originating air within a one hundred mile radius of each terminal as potential air cargo.

As to the extent of traffic moving at the 100 pound level and above via rail express, the following table is included:

| Table 16 |

Extracts from Analysis of Canadian National Express Less Than Carload Rail Express Traffic, Sample for May 16, 1951 |

<table>
<thead>
<tr>
<th>(lbs)</th>
<th>Weight (lbs)</th>
<th>Shipments</th>
<th>% of Total</th>
<th>% of L.C.L.</th>
<th>Average Weight</th>
<th>Average Revenue per 100 pounds</th>
</tr>
</thead>
<tbody>
<tr>
<td>1-25*</td>
<td>26%</td>
<td>4.5%</td>
<td>4.6</td>
<td>.53</td>
<td>$11.25</td>
<td></td>
</tr>
<tr>
<td>1-25</td>
<td>25%</td>
<td>9.0%</td>
<td>14.5</td>
<td>.83</td>
<td>5.75</td>
<td></td>
</tr>
<tr>
<td>25-100</td>
<td>14%</td>
<td>18.0%</td>
<td>47.05</td>
<td>1.80</td>
<td>3.82</td>
<td></td>
</tr>
<tr>
<td>100+</td>
<td>4.3%</td>
<td>14.0%</td>
<td>118.16</td>
<td>4.59</td>
<td>3.88</td>
<td></td>
</tr>
</tbody>
</table>

*Parcel post competitive rates for rail express.

All other rates for first class rail express. (12)

From the foregoing table it will be seen that Canadian rail express is essentially package traffic that moves but short distances. With the average revenue per shipment less than $2.00 for all save the 100 pounds and over category, no large volume diversion can be expected to air cargo in other than that top weight level. The actual volume now moving by rail express in that weight level is indicated by the following tabulation:

Table 19.

<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Over 100 lbs.</td>
</tr>
<tr>
<td>Montreal to Edmonton</td>
<td>2110</td>
</tr>
<tr>
<td>Montreal to Vancouver</td>
<td>2196</td>
</tr>
<tr>
<td>Toronto to Edmonton</td>
<td>3696</td>
</tr>
<tr>
<td>Toronto to Vancouver</td>
<td>1847</td>
</tr>
<tr>
<td></td>
<td>9849</td>
</tr>
</tbody>
</table>

Source: Canadian National Railways: Express Dept.

All concerned concede that westbound loads will be the heaviest as evidenced by U.S. air cargo experience and Canadian transportation experience generally. Thus, assuming equal traffic on the part of the Canadian Pacific Railway, a daily potential is available for possible diversion to air of 20,000 pounds at the most, a 66 2/3% load for a DC-6A. Yet Canadian Pacific Air Lines seriously contended they would carry 80% loads between Toronto and Vancouver. Of course, C.P.A. contended they would also develop new business other than
that now moving by rail express. However, had they managed to do so their achievement would have been unique on this continent, inasmuch as no appreciable quantity of air cargo has been generated in the U.S. other than what has been diverted from first class rail express. This fact has already been enlarged upon in Chapter VI, dealing with Air Cargo Development in the U.S.A.

Movement of Perishables by Air Cargo

Canadian Pacific Air Lines contended that much of their traffic would comprise fresh fruit and vegetables from B.C. to the north and east, plus quantities of lakefish from The Pas to Toronto and Montreal. The Board passed these contentions along to the Cabinet without critical comment, apparently accepting their validity. At page 1319 of the official transcript, Mr. Brais, the C.P.A. counsel stated:

Any loss through not going through Winnipeg is fully made up by the fish eastbound. This fish business, Mr. Chairman, laughed at at the inception, has been fully and amply proven beyond all my own expectations.

The demand for fresh fish products is insatiable. Fresh fish from The Pas has practically unlimited possibilities. The projection would indicate 3,200,000 pounds every year.

Yet all evidence pointed to the total unsoundness of the proposition. Mr. O'Donnell had queried the C.P.A. contention in his summation with the following quotation:
The transport of fishery products by air is not of great commercial significance and is not likely to become so for some time. Numerous parcels of fishery products of a specialty nature such as live lobsters have been and are being carried by air but they do not constitute an important portion of the volume shipped and therefore are regarded as experiments.

It is probably needless to observe that cost is the main inhibiting factor to great expansion of air cargo traffic. . . . Airborne fish cannot compete on a price basis with that hauled by surface carriers. (13)

During the four years preceding the C.P.A. Air Freight Application, T.C.A. had gone to great pains to develop fish and lobster traffic, without permanent avail. At one time T.C.A. carried 20 to 25,000 lbs. per month of fishery products between Yarmouth and Boston. This movement dried up because of lower cost trucking services. Strenuous efforts were made to develop fish traffic - salmon and halibut - from the Pacific Coast. Price resistance precluded success in spite of the fact that air cargo rates based on 22¢ per-ton mile were filed. The Department of Fisheries at Ottawa further advises that:

. . . fresh lake fish is eaten by an income group in Toronto and Montreal which could not absorb air costs. . . . This holds for most groups consuming fish of either sea or lake origin . . . Fish is consumed primarily by certain ethnic groups of consumers, primarily those of Jewish origin although there are a large number of consumers among the Chinese, Italians and other Europeans. . . . (14)

Inasmuch as C.P.A. based so great a store on fish traffic out The Pas, the following extracts from a Transport Commissioners of Canada judgment make illuminating reading. The judgment concerned was handed down on June 15, 1951 and was to do with the protests raised by the fishing interests in the prairie provinces over the proposed rate rise for the rail express companies.

The Companies contended that:

(1) ... in the early history of the Dominion Express Company the express traffic was almost entirely westbound, and in order to provide some traffic for what otherwise would be returning empty cars ... the Company established very low rates on fish from Vancouver, Lake Winnipeg, Lake of the Woods and Lake Superior to Eastern Canada, and with the exception of the general increase of 20% for the year 1921, the rates were still in effect in Western Canada.

(2) ... the cost of providing service had increased to a very considerable degree and a study of the entire traffic structure as relating to the movement of fish under present day conditions ... clearly indicated the need for an almost complete revision of the rates ... (15)

In addition to the protests of the fishery companies, there was also read into the record a submission from the Government of Saskatchewan in which it was contended that fish from that province was meeting great difficulty in competing in the New York, Chicago and Detroit markets. It was further contended that no rate increase could be absorbed; subsidization would be the only recourse if the industry were to be maintained.

The Board of Transport Commissioners agreed with the stand taken by the railways and ruled that the proposed increase in rates should stand. They thus concurred with the railway contention that fish, being a highly perishable product, requires special treatment, involving careful and expeditious handling as compared with the handling of other goods shipped by express, necessitating such extra costs as cleaning express cars and premises plus allocating special cars to the traffic.

Yet C.P.A. proposed to haul fresh fish in quantity from The Pas to Toronto and Montreal at rates of $14.75 per 100 pounds to the former, and $15.20 to the latter. In view of the fact that L.C.L. rate on rail express is $5.25 per 100 pounds to the one and $5.50 to the other for refrigerated fish carriage, it is difficult to comprehend C.P.A.'s contentions as being serious. The carload express rate to Toronto via rail express is $3.75 per 100 pounds from Winnipeg, and to Montreal, $4.00. The C.P.A. fish would be admittedly more fresh. However, the Department of Fisheries states that those in the fresh fish market in Toronto and Montreal cannot absorb the added air costs. They state this without qualification. Yet the Air Transport Board advised the Cabinet of C.P.A.'s fish haulage plans without critical comment on the part of the Board membership.
As for the diversion of fresh fruits and vegetables from rail express traffic, hope of achievement of the loads forecasted by C.P.A. is equally remote as for fish haulage. What small amount of such traffic as exists in the U.S. constitutes the handling of produce peculiar to a given region. For example, oranges are flown from California or Florida to New York and Chicago. It is unrealistic to suggest that similar traffic potential exists in Canada. Inasmuch as Ontario and Quebec produce all of the fruit and vegetable items suggested by C.P.A. for transfer by air from B.C., such traffic as does move will be strictly of the "beat the market" variety. In this regard, the Department of Agriculture advises that:

... caution as to the development of agricultural east-west air freight beyond daffodils and such would appear warranted.

B.C. produce for distribution east comes mainly from the Okanagan and to some extent from the Fraser Valley. Early products from the latter are potatoes and berries ... Inasmuch as the margin of earliness over Ontario might be a week at most, the scope for air freight is very limited. ...

Okanagan produce actually moves to Ontario and Quebec. Crops are mainly apples, pears and cherries, which are not much earlier in B.C. than Ontario. B.C. early apples are anything but showy, and the main crop which does flow east is well handled in rail service.

The C.P.A. submission in the air freight case a year ago was that they really intended to sell their service, and that they expected
to show that the kinds of commodities already moving might be an inadequate guide to the true potential. While it is always possible that such optimism might be borne out, it still most be remembered that rail freight delivers most produce transcontinentally in good condition and distinctly more cheaply than would air service. (16)

The following table is included to further illustrate the independence of the various sections of our country, each having their own fruit and vegetable resources.

Table 20

<table>
<thead>
<tr>
<th></th>
<th>1950 All of Canada</th>
<th>1950 Ontario-Quebec</th>
<th>1950 B.C.</th>
</tr>
</thead>
<tbody>
<tr>
<td>(1) Vegetables</td>
<td>22.0 (millions of dollars)</td>
<td>17.0</td>
<td>2.5</td>
</tr>
<tr>
<td>(2) Apples</td>
<td>5.5 (millions of trees)</td>
<td>3.0</td>
<td>1.25</td>
</tr>
<tr>
<td>(3) Small fruits</td>
<td>11.0 (millions of dollars)</td>
<td>7.0</td>
<td>3.33</td>
</tr>
<tr>
<td>(4) Strawberries</td>
<td>16.0 (thousands of acres)</td>
<td>9.75</td>
<td>4.0</td>
</tr>
</tbody>
</table>

Source: Precise figures set out on pages 1 and 2 of Agriculture Bulletin 6-6, D.B.S., 17-12-52.

The most extensive studies in relation to the air movement of fresh fruits and vegetables have been conducted by the Wayne University School of Business Administration. In perusing these published studies, however it is noted that rates of 5 to 6¢ per ton-mile are assumed prior to any extensive penetration of rail ex-

Douglas DC-6A All-Cargo Aircraft Further Illustrating Loading Problems Yielded by Cabin Floor 100 inches or more above ground level.
press traffic in these commodities. Such rates are well below the direct operating costs per ton-mile for either the North Star or the DC-6A and hence negate the possibility of such traffic being generated in the immediate future. Such traffic must await the arrival of a truly freight aircraft. Despite C.P.A.'s contentions regarding its Douglas freighters, the following statement is totally true:

... these aircraft are not cargo aircraft but converted passenger planes.
... the DC-6A is merely a DC-6 with a few concessions made to cargo, but still retains the round hull and still poses a considerable problem by having the cargo doors 100 or more inches from the ground. (17)

Despite all the efforts made, with reduced backhaulage rates and surveys and promotion campaigns, no appreciable traffic in perishables of an edible nature has been generated in the United States. With an available express service from the C.N.R. and C.P.R. far superior to that existing in the U.S. it is considered that the likelihood of stimulating such business for air cargo in Canada is even more remote.

(17) R.P. Reese, Regional Cargo Sales Manager, Philippine Air Lines, letter to author, 19/1/54.
Chapter VIII

The Gruneau Research, Limited
Survey Conducted for C.P.A.

On pages 50 to 52 inclusive of this thesis the Gruneau Survey has been summarized as it was presented in evidence, with appraisal deferred for treatment in this present chapter. The full survey report as prepared by the Gruneau firm is to be found in Appendix III, Exhibits 21 and 21A, comprising 82 pages of data and conclusions.

The study was intended to evaluate the attitudes of regular shippers and receivers in each of the centres on the proposed C.P.A. route, excluding The Pas. Inasmuch as express shippers constitute the basic pool of potential air cargo users, it was decided to restrict the survey to express-using firms. The Canadian Pacific Express Company made available to the Gruneau firm its waybill analysis for May 16th, 1951, yielding firm names, origins and destinations for the express shipments involved. The May 16th data were used to plan the survey, while the actual sample used was drawn at random from the September 19th, 1952 waybill analysis. The field work was conducted by trained and experienced field representatives of Gruneau Research Limited under the personal direction of the analyst in charge of the study.
One thousand two hundred and thirty contacts were attempted, with one thousand completed personal interviews resulting.

The questionnaire employed was composed of ten multiple choice queries, a general final request for suggestions as to the usage of the proposed service, with a statement of schedule and rates supplied for review by the executive questioned. The rates section included a comparative breakdown for each route segment such as illustrated below: (1)

### Table 21

<table>
<thead>
<tr>
<th>Between:</th>
<th>EDMONTON</th>
<th>VANCOUVER</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Over</td>
<td>Under</td>
</tr>
<tr>
<td>TORONTO and</td>
<td>100 lbs.</td>
<td>100 lbs.</td>
</tr>
<tr>
<td>EDMONTON</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Over</td>
<td>100 lbs.</td>
<td>100 lbs.</td>
</tr>
<tr>
<td>EDMONTON</td>
<td>100 lbs.</td>
<td>100 lbs.</td>
</tr>
<tr>
<td></td>
<td>Per:100 lbs.</td>
<td>lb.</td>
</tr>
<tr>
<td>Proposed Air Cargo (City centre to City centre)</td>
<td>$20.35</td>
<td>23¢</td>
</tr>
<tr>
<td>Present Air Cargo (Airport to airport)</td>
<td>23.80</td>
<td>27</td>
</tr>
<tr>
<td>Rail Express</td>
<td>11.90</td>
<td>*12.5</td>
</tr>
<tr>
<td>Air Express (TCA)</td>
<td>72.00</td>
<td>*72</td>
</tr>
</tbody>
</table>

*Rate per pound - 50 pound shipments.
°Rate per pound - for shipments over 25 lbs. and under 100.

It will be noted that the only rates specifically credited to Trans-Canada Air Lines are those for the relatively expensive air express. No mention is made, of course, of the revised rate structure filed by T.C.A. prior

to the commencement of the survey interviewing, and which offered rates further reduced to those proposed by C.P.A. In this regard Mr. O'Donnell commented in summation:

Who would not say in the light of that kind of submission that he would not like something cheaper? ... if the T.C.A. rates had been put to the people who answered this way for Gruneau, they would have answered much more quickly that they preferred the lower rates which T.C.A. proposed. (2)

The ten multiple choice questions were most general in nature, the central theme being embodied in question (8): "Would such an Air Cargo Service help you in any way with delivery problems in your particular business?" (3) No firm commitments as to usage of the proposed service were requested. In essence, those interviewed were being asked if they had any objections to C.P.A. inaugurating its Montreal to Vancouver air freight service. As Mr. Wells summated:

I am unable to accept the Gruneau report as having any validity. ... We would all like to have limousines, yachts and a butler, but the question comes up, do we need them, and if we do, can we afford them? ...

To my mind I find it difficult to understand that, with as complete and extensive and careful a review as this one was, and with the time and money that there was put and spent into the Gruneau report, at no point did they ever say to these people finally: If you have an air cargo service at these rates, how many pounds are you going to put aboard? (4)

Under the circumstances, it is surprising that only 68% answered Question 8 in the affirmative. Even that

68% is based upon an adjusted base. As noted at the outset, 1000 interviews were completed after 1230 tries. At various points in the survey this initial base of 1000 is altered to suit the question involved. In the case of question 8, only those firms shipping via rail express once per month or oftener were included, yielding a base total of only 779. A total of nine different such bases were used in the report summation, ranging from the initial 1,000 down to a low of 473, the latter including only those now shipping by air. At one point, 79 respondents are deleted from consideration inasmuch as they could not make up their minds on a given point. As regards Question 8, only 52% of the total number actually interviewed said the service would help. Aside from departing from valid statistical practice, the continual changing of the base yields a report lacking in clarity.

As to whether or not the sample was random is open to question inasmuch as interviews were confined to C.P.R. customers, with one third of the interviews being conducted in the Vancouver area, home of C.P.A.

In reply to a query in this regard, Mr. Gruneau states:

Your categorical statement that respondents in Vancouver were prejudiced in favor of C.P.A. because their head office is in Vancouver is entirely unfounded and represents only your personal opinion without reference to the data in the report. The results show greater 'in favor' percentages for the Vancouver area. However, they also show that
respondents in the Vancouver are already greater users of air transportation in terms of both number and frequency of shipments than respondents in other areas, they show that shippers of perishable products, retail, agency and wholesale operations and small firms are more 'in favor' of air-express...(5)

Granted, they are in favour of such a service, but whether or not they would supply adequate loads to justify its operation is the basic question. If the survey indicated that Vancouver shippers provide the major volume of air cargo and air express shipments in Canada, either out or inbound, then it is quite in error as evidenced by the flow chart included in Chapter IV, Part II, of this report.

As for potential, there is not sufficient rail express in the first class, 100 lbs. and over category, moving in either direction between Vancouver and Edmonton to even approximate the forecasted daily DC-6A load factors set out by C.P.A. in its submission, even assuming that every pound was diverted to air transfer, a totally unlikely possibility in view of the rate differential involved.

As to the suggestion that the questions and interviewing methods were slanted in C.P.A.'s favour, Mr. Gruneau stated:

Whether or not the results of the study would be favorable to C.P.A. was not a factor in determining either the sampling or the tabulation methods. Our directions from Canadian

Pacific Airlines specified that the work was to be done in an unbiased manner. Had they been otherwise, we would not have accepted the assignment. (6)

Further in this regard, Mr. Brais made the statements, subsequently somewhat modified when challenged;

I . . . ask the Board to bear in mind that it (the survey) was applied to a cold market. Nobody at the time had been apprised in any manner . . . There was no advertising, no propaganda, and no communications to any of these people to tell them that a company such as Canadian Pacific Air Lines . . . was planning to develop an air cargo line. (7)

It should be noted, of course, that the Canadian Pacific Air Freight Application had been prominently in the news since its announcement on November 10th, 1952. The interviewing for the Gruneau survey commenced December 28th, 1952 and was completed January 17th, 1953. In addition, the Boards of Trade had been invited by the Board and by C.P.A. to make representations to do with the proposed service at the hearing. Further, as evidenced by page 65 of Exhibit 21A, the rate and schedule sheet handed to each correspondent by the Gruneau field workers was headed with the caption: "CANADIAN PACIFIC AIRLINES, LIMITED. PROPOSED AIR CARGO SERVICE." It could hardly have been correctly termed a "cold market." In essence, whether intentionally or not, the Gruneau report constituted a product of promotional market research whose findings simply

(6) Ibid., page 1.
(7) Refer to page 52 of this report for further details and source.
aided in the filling out of a sales package under the guise of economics. As Mr. O'Donnell concluded:

Gruneau was given a set of questions, according to the instructions, and they were to discuss them . . . I submit that it is not a reliable guide. It is not valid at all. The questions were slanted. It is all hearsay. (8)

However, the Air Transport Board saw fit to advise the Cabinet that, insofar as the Gruneau report was concerned: (see also page 89 of this thesis)

Established sampling techniques were used in selecting a cross-section of business organizations using express services . . . This study . . . was designed to show that a substantial majority of these business organizations agreed that a scheduled all-cargo service as proposed by C.P.A. was desirable. (9)

The Air Transport Board's report did not advise the Cabinet of the objections raised by the interveners as to the questionable methodology involved in the Gruneau survey. Nor was the Cabinet apprised of just what was implied by the words "substantial majority" as used in the foregoing quotation. As noted on page 149 of this thesis, only 53% of those firms interviewed stated that the proposed service would be "desirable." This admittedly constituted a majority, but hardly one to be labelled by the Board as being substantial.

(9) Board Report to the Cabinet, page 3, App. IV.
Chapter IX

The Douglas Aircraft Company's Survey of C.P.A.'s Proposed Air Freight Route to do with Potentials

The sixty pages that constitute Exhibit 18 and 18A, as drafted by the Douglas Company, provided the basic C.P.A. presentation at the hearing. Without attempt at appraisal, these exhibits have already been summated on pages 41 to 49 inclusive of this report. The Air Transport Board's apparent unquestioned acceptance of the Douglas findings, as evidenced by its report to the Cabinet, has been dealt with in Chapter V, page 84 to 92 inclusive.

The intent of the present chapter is to evaluate the Douglas report in the light of Mr. O'Donnell's summation, and with regard to correspondence and relevant reading by the writer since the hearing's conclusion.

Three phases of the Douglas survey are to be covered:

(1) The apparent bias introduced into the treatment of the subject matter by those responsible for the drafting of the exhibits concerned.

(2) The fallacies involved in the Price-Demand Relationship, derived from the curve depicted on page 46 of this thesis, and on which the basic conclusions of the Douglas Report are determined.

(3) The non-existence of a consequential source of air freight potential between Canada and the Orient, despite the contentions to the contrary in the Douglas report.

Apparent Bias

It is not intended to give a full coverage in this matter, inasmuch as several examples will suffice to
substantiate the contention.

a. At page 10, Exhibit 18, a striking graph is set out showing Canada's percentage of world total air cargo traffic falling from 19% in 1937 to 1% in 1951. This graph is followed by the statement: "This condition is a result of lack of adequate airfreight capacity." To use 1937 as the base and to include all phases of air freight operations is misleading, inasmuch as pre-war Canada saw large scale north-south bush operations in air freight carriage to do with mining development beyond rail head. Air freight of the type involved, the C.P.A. Air Freight Application involved transport between metropolitan terminal pairs in competition with existing surface carriers, both rail and road. Employing the same data, but using the year 1948 as a base, the following results: (T.C.A. commenced air freight service in that year)

<table>
<thead>
<tr>
<th>Year</th>
<th>Canada</th>
<th>U.S.A.</th>
</tr>
</thead>
<tbody>
<tr>
<td>1948</td>
<td>100%</td>
<td>100%</td>
</tr>
<tr>
<td>1949</td>
<td>110</td>
<td>110</td>
</tr>
<tr>
<td>1950</td>
<td>151</td>
<td>151</td>
</tr>
<tr>
<td>1951</td>
<td>195</td>
<td>168</td>
</tr>
</tbody>
</table>

These figures are just as misleading as those cited by Douglas, showing percentages rather than total volume, and hence in themselves of no real significance.

b. On page 11, Exhibit 18 a further graph is included contending that "although equal in 1940, Canad-
ian air cargo rates are now more than twice than those of the United States. Rates are shown as 60¢ per ton-mile for both countries in 1940, as opposed to 21¢ for the U.S. and 44¢ for Canada in 1951. In the detail of Exhibit 18A, the supporting document, it is found that these figures are based upon composite revenue per ton-mile for the U.S. of both air freight and air express, and for Canada of T.C.A. trans-continental air freight, express and excess baggage. Had strictly air freight rates been compared, and a comparable U.S. carrier such as American Airlines used for illustration the gap would have been reduced considerably, with approximately 33¢ for T.C.A. and 22¢ for American per ton-mile. No mention is made of C.P.A. air cargo rates for present routes, on which it has monopoly rights, yielding 50¢ and more per ton-mile. Nor was mention made of the general rate increase of 25% then being sought by U.S. all-cargo lines nor of T.C.A. 's application pending for a drop to the U.S. rate level.

c. On page 13 of Exhibit 18 a thumbnail sketch of Canadian rail and air routes between Montreal, Toronto and Vancouver is depicted. Total rail mileage is given as 3504; total air mileage, 2550. This illustration is summated: "Rail mileage is 37% greater than air mileage over the proposed route. This means that a 37% higher airfreight ton-mile rate will result in no greater cost to the shipper. In the United States the average rail
mileage is 17% greater than air mileage." (1) The
impression is thus given that the Canadian air freight
operator gets a head start in relation to his American
counterpart in his efforts to divert traffic from rail
haulage. On inspection, however, it is realized that
the Douglas routing of a freight or rail express ship­
ment from Montreal goes first to Toronto, then to
Canora, then to The Pas, then back to Canora, then on
to Vancouver. Such rail shipment would, of course, in
reality be moved across the direct route across northern
more Ontario, not via Toronto. Further, The Pas would not
come into the picture at all. Adjusting for the redundant
mileage thus involved, Montreal-Vancouver yields a 2930
rail mileage as opposed to the 3504 figure cited. This
amounts to 15% greater than the proposed air routing,
and hence of no consequent disparity from the U.S. air­
rail mileage relationship.

d. On page 14 of the Exhibit 18 is a quotation from
the Report of the Royal Commission on Transportation:

... the great difference in fundamental condi­
tions between Canada and the United States. .
(is that). . . producers and consumers in the
United States with its large population have
the advantage of a great number of widely dis­
tributed market and supply centres. The long
haul is less in evidence there than in Canada . .

This quotation is from page 46 of the 1951 Royal Commission
report and involves an error in that report as pointed out
to the writer by Dr. A.W. Currie of the University of Tor­

(1) Exhibit 18, Appendix III, page 13.
onto. In actuality, the long haul is more in evidence in the United States. In this regard, Mr. R.A. Brown, the late head of the D.B.S. Railway Statistics Department, supplied the writer with the following figures taken from U.S. Railroad Transportation (Statistical Record - page 31 - 1951) and from D.B.S. Statistics of Steam Railroads for 1951:

Average haul for U.S. Railways 420 miles
Average haul for Canadian Railways 399 miles

Hence no significant difference exists. On the same page the foregoing "length of haul" comparison is summated: "This places a geographic handicap on the development of remote but important markets and increases the need for swift long range transportation."

Of course, as Prof. Waines pointed out in his testimony, this is not so. The longer the haul, the more important the freight toll becomes to the supplier or purchaser. The primary need of distant markets is for economical transport; swiftness is distinctly secondary.

e. The most glaring evidence of biased treatment of subject matter involved the comparison of Canadian and U.S. per capita railway express shipments, as set out on page 15 of Exhibit 18. This treatment, apparently accepted at its face value by the Air Transport Board and passed on to the Cabinet in substantiation of C.P.A.'s case, has already been made the subject of a complete discussion within Chapter VII of this thesis, entitled Rail Express in Canada and the U.S.A.
Fallacies Involved in the Douglas Price-Demand Relationship

As noted on page 45 of this thesis, the potential for the C.P.A. route was assessed in a most specific manner within the Douglas Report, Exhibits 18 and 18A. As evidenced by the charted relationship set out on page 46 of the report in hand, the Douglas people plotted on logarithmic paper the demand for train freight services against revenue per ton mile for the same services. From this relationship a series of steps were then taken which yielded precise figures in tons and dollars as to the loads to be expected for each of the C.P.A. route segments, employing present volume of rail express as the data source for airfreight penetration.

Inasmuch as a copy of Exhibit 18A accompanies each copy of this thesis, it is proposed to facilitate the discussion of the price-demand curve in question by first tracing through the process steps involved prior to assessing same.

Turning then to page 39 of Exhibit 18A, the underlying assumptions made by Douglas are to be found. In part these are as follows:

Studies of United States freight movement have shown that the relationship between rate and volume is consistent for the various freight classifications. Therefore, it is possible to use Canadian Railway carload freight data, the only classification for which adequate statistics are available, to estimate airfreight demand at various rate levels.

The ton-miles for each major commodity group have been plotted against their average ton-mile rate in Figure 12. The high degree of correlation is apparent.
By assuming a rate, and hence its corresponding volume, it is possible to determine the percentage decrease in volume that can be expected for any increase in the rates... It is this percentage relationship that has been assumed applicable to other freight classifications, namely the distribution of high value freight between airfreight and rail express. (1)

Page 40 of Exhibit 18A sets out the revenues and ton-miles involved in Canadian Pacific Railway Freight Traffic, January to July 1952, with a four segment breakdown only; namely, Products of Agriculture, Products of Mines, Products of Forests and Animal Products. The straight line correlation depicted on page 41 of Exhibit 18A, and included at page 46 of the report in hand, simply plots revenue against ton-miles for the data supplied on page 40. Page 42 of Exhibit 18A sets out a table consisting of data read off from the aforementioned straight line correlation. The first two columns of this table comprise data so directly read off, whilst the second two columns constitute a reduction of the preceding readings to a common base, hence yielding a ratio. Thus an air freight rate equal to the minimum rail freight would, in accordance with the Douglas contentions, make possible a total diversion of traffic from rail to air. A rate three times that of the basic rail rate would yield a diversion to air of only 7%. A total of eleven

such diversion ratios are listed in this page 42 table, and plotted on page 43 with the caption, "Price-Demand Relationship for Canadian Freight." The ordinate is used to designate the percentage of volume moving by air, with the abscissa showing the ratios of air rate to rail rate.

The next step takes direct account of current railway express volume and tariff data, comprising the tabled computations set out on page 44. It constitutes a "Determination of Airfreight Potentials for Proposed Service," and is "Based on Railway Express Volumes Originating and Terminating within 100 miles of each station for 1951." The comparative air and rail express rates are first set out for the various route sectors, with a column for ratio, air to rail, following. These ratios are then used to determine from the Price-Demand curve set out on the preceding page the percentage penetration to be expected by C.P.A.'s proposed service into existing railway express traffic. Existing express traffic for 1951 is set out on page 36 of Exhibit 18A, C.P.R. data only being shown, with a total for the route segments being determined by simply doubling the C.P.R. data to allow for C.N.R. traffic.

A typical route segment, Toronto-Vancouver, has been underlined on page 44 to further aid clarification of the process involved. It will be seen that the
air rate, door to door, is given at $26.25, with a corresponding rail rate of $14.00. The ratio, air to rail, is then recorded as 1:1.88. Referring then to the Price-Demand curve on page 43, this ratio is marked in to show how the penetration of 22% was determined. This percentage penetration is then applied to the approximation of existing rail express volume to give an air freight potential figure for the Toronto-eastbound Vancouver segment of 309 tons annually, with a figure of 1,672 tons annually forecasted for the segment westbound, as noted in the appropriate columns of the table on page 44.

Pages 45, 46 and 47 simply take the forecasted potential tonnages determined on page 44 and reduce to them route segment revenue data, yielding a total gross for the route of $2,198,352, as finally derived on page 47. This potential gross was apparently appraised by the Board as realistic and based on sound premises inasmuch as it was reported to the Cabinet without accompanying critical comment. The Board stated on page 3 of their report:

In order to arrive at an estimate of potential cargo available on the all-cargo air service applied for, a study was submitted on behalf of Canadian Pacific Air Lines Limited based upon a price-demand curve prepared from Canadian railway data and application of this curve to less than carload rail express shipments between areas served by the proposed route. This study
indicated sufficient volume to support a five times weekly service with DC6A aircraft and gross revenues better than $2 millions annually. (2)

This derivation of gross revenue potential, together with the associated tonnage data, comprised the most forceful, as well as the most elaborately prepared, portion of the C.P.A. case. In essence, C.P.A. had pointed to what wonderful things the U.S. all-cargo operators had done in that country; then C.P.A. contrasted American results with the apparent inaction and alleged disinterest of T.C.A. in the finally air cargo field; employing the Douglas submission to summarize their contentions that the business was there and available to anyone prepared to go after it. The whole case rested essentially on the validity of the Douglas computations. As Mr. Wells, of Maritime Central Airways stated: "It did appear to me that the main case for the applicant rested on the evidence and exhibits produced by Mr. Crilly," the Douglas Aircraft Company's witness. (3) However, it was anomalous that counsel for all concerned gave the price-demand relationship a very wide berth. In this regard, Mr. Hamilton, counsel for Associated Airways of Edmonton, made the following summating comments:

Mr. Crilly's graphs are found in Exhibit 18 and 18A. We might say that he was not

(2) Air Transport Board report To the Cabinet, p.3. (3) Air Freight Case Transcript, page 1347.
questioned too thoroughly on the basis of the graphs, but I am quite sure that my learned friend, counsel for T.C.A. had the necessary slide rule talent available so that, if it were necessary part of their case if they felt it necessary to break down this evidence, they could have easily made use of that talent and possibly have given us some enlightening information in connection with this basis. (4)

Even the C.P.A. counsel was admittedly confused by the workings of the Douglas computations as to route potential. Mr. Brais stated that:

as

... so far, the demand curve is concerned it took me a long long time to understand it. Towards the end I was beginning to make something out of it, but I am afraid that if I went into it in too much detail I would first confuse myself and possibly in the process not confuse the Board but not help the Board. (5)

However, Mr. Brais was quite prepared to accept the findings of the Douglas report as sound and to present them to the Board as his client's appraisal of the route potential. As for Mr. O'Donnell, he chose to leave it to the Board's economist, Mr. Jaworski, and to the Board members themselves to determine as to whether the survey findings were sound. In this regard, Mr. O'Donnell stated:

... my advisers tell me that Mr. Crilly's approach is based on unsound assumptions. I realize that the Board has access to the very best technical advice, the very best of statisticians and forecasters, and they can easily have that verified to their satisfaction. (6)

(4) Ibid., page 1326.
(5) Ibid., page 1292.
(6) Ibid., page 1434.
In addition to the foregoing summating statement, Mr. O'Donnell had previously read into the transcript a brief statement covering the alleged weaknesses of the Douglas approach. This statement summed up the appraisal, made at the request of the writer of this thesis, of the Douglas price-demand relationship by Mr. T.G. Donnelly, Assistant Dominion Research Statistician, of the Dominion Bureau of Statistics, Ottawa.

Mr. Donnelly contended that: (See Transcript page 1435)

1. No economist would think it valid to plot a demand curve based on four points only.
2. The Douglas demand curve assumes consistency between the elasticity of the demand schedules for air and rail freight. This is not the case.
3. The same curve assumes that a purely monetary rate consideration governs the volume of goods shipped. Such is not the case.
4. Four separate and distinct groups of demand curves are involved rather than the single composite curve depicted on page 41. (thesis page 46)

As noted above, Mr. O'Donnell read these four shortcomings of the process involved into the transcript without further comment other than to say that he was content to leave final appraisal of the matter to the Board's advisers. As also noted previously, the Board made no critical comment of the process, when reporting the available potential so derived to the Cabinet in support of C.P.A.'s application approval. In this regard, the writer has been fortunate to obtain a copy of the relevant section of the Air Transport Board Economists report to his superiors to do with
the price-demand relationship put forward by the Douglas Company. This report, together with other related data, was forwarded to the writer under cover of a letter dated February 22, 1954 by Dr. A. Jaworski, Board economist. In his letter, it is of interest that Dr. Jaworski stated:

... I was greatly disappointed by the fact that Professor Currie and Professor Waines did not criticize Mr. Crilly's demand curve, restricting themselves only to general statements which are known to every student of transportation economics.

In fairness to the two professors it should be noted that it was part of Mr. O'Donnell's strategy that their statements were so restricted. Their testimony was kept aloof from the immediate battlefield; their statements were restricted to their particular fields, covering the shortcomings of duplication of transit facilities in a general, rather than in a particular manner. It should be further noted that Dr. Jaworski appended a note to the effect that he was expressing his personal views in his statements, not those of the Board.

The report of Dr. Jaworski to the Board is quoted in part as follows:

... It is commonly recognized that the relation between volume of traffic and rates is of a very complicated nature and it is not probable that even in the future it would be possible to describe this relationship by a simple
There is a tendency among economists with a mathematical background to assume that the economic events are moving continuously, and therefore, its relationship could be presented by a curve. However, there are many instances in transportation where, to the several changes in rates there is no apparent response in changes of volume. And suddenly a drastic change in volume may occur, thus indicating that the previous changes in rates without a significant change in volume, are carrying an unnoticeable, for the time being, cumulative effect. For example, last May, a 10 percent increase in American air cargo commodity rates took place, 33 New York department stores switched suddenly their transcontinental shipments of ready-to-wear apparel, from air to rail, that represented over 500 tons of freight.

Douglas Report (Exhibit 18A, page 39) by considering implicitly Exhibit 20, concludes: "Therefore, it is possible to use Canadian railway car-load freight data, the only classification for which adequate statistics are available, to estimate air freight demand at various rate levels." The air cargo is competing with the railway express, which in turn competes with the LCL movement and finally, we get the railway car-load traffic. Therefore, it is not understood why Douglas Report jumps to the Canadian car-load freight data when the waybill analysis of the Canadian LCL movement in 1949 is available. The pertinent extract from the LCL survey is submitted as Exhibit D. (by Dr. Jaworski to the Board) By considering only significant volumes of traffic and the corresponding rates we may notice (in Exhibit D) that on an average revenue of 5.8 cents per ton-mile, the corresponding volume in ton-miles was 9.75 percent of the total volume, where on a higher average revenue of 4.3 cents, the corresponding volume of traffic was much higher too, namely 19.6 percent of the volume, and again, on a 4.5 cent rate, the volume is 15.5 percent, and finally on 5.2 cents rate,
the corresponding volume is as high as 24.076 percent of the total volume. Therefore, we must conclude that the survey of the Canadian LCL movement does not support the basic assumption of Douglas study; a simple mathematical relationship between traffic rates and volume. (low rates with high volumes and vice-versa.)

Considering the graph on page 41, Exhibit 18A, we must assume that the commodity specification of the points is not essential and only the volume data with the corresponding rates are important for establishing the demand curve. Such an assumption is fully justified, because the graph on page 43 that has been computed from the previous graph does not carry any specification of the commodities whatsoever. During the cross-examination of Mr. Crilly by Mr. Younger (page 363 of the Transcript) from Mr. Crilly's answer at the bottom of the page, it may be concluded that all the points on the presented graph (on page 41, Exhibit 18A) must be primarily unfinished products, because manufacturing products will be on a different but parallel line (shifted to the right) and therefore with exactly the same slope. If this is so, all unfinished products which are moving on the same rates should have their volume combined together, and therefore, the product of mine, and product of forest that are moving practically on the same rate, should have their volume combined, and by doing this, the point will be raised considerably. The highest point on the graph is represented by the product of agriculture, showing a traffic volume of approximately 7.2 billion ton-miles. It is a known fact that the largest single commodity among the agricultural products on the CPR system is wheat. The rate for wheat in Western Canada is unchanged since 1922, and the changes may be introduced only by an Act of Parliament. Despite the fact of an unchanged rate, the changes in volume of wheat traffic . . . between some years are as high as 5 billion ton-miles, and therefore, the top point on the Douglas graph of 7.2 billion ton-miles might move upwards or downwards by the amount of 5 billion ton-miles, depending which year is considered.
All Douglas calculations are based on Figure 13, (page 43, of Exhibit 18A) which in turn was drawn from Figure 12 (Page 41), therefore, the whole Douglas Report stands and falls with Figure 12.

From the foregoing quotations from Dr. Jaworski's report to the Board it would appear that he is in complete agreement with Mr. Donnelly, the D.B.S. Research Statistician as to the fact that the Douglas price-demand relationship was based upon unsound premises, yielding in consequence totally unreliable forecasted route potential data. It should be noted that the underlinings above were added by the writer.

Another avenue of enquiry followed by the writer of this thesis to do with the Douglas price-demand relationship involved an endeavour to query those responsible for the Wayne University Studies, on the basis of which studies Mr. Crilly, the Douglas witness, had stated his work was based. The three published studies were purchased from the Wayne University Press and read in relation to the Douglas report. These publications are:

"Air Cargo Potential in Fresh Fruits and Vegetables" by Prof. Spencer A. Larsen, 1944.

"Air Cargo Potential in Drugs and Pharmaceuticals" by Prof. Larsen and Prof. William Reitz, 1948.

"A Study of Markets for Airborne Seafoods" by Prof. Larsen and Prof. William Reitz, 1946.

In only the 1944 study is any reference made to

(7) Dr. A. Jaworski, Report to A.T.B. re C.P.A. Application, pages 3 to 5 inclusive.
analysis of the type employed in the Douglas survey. On page 61 of the 1944 Wayne University study to do with air cargo there is depicted a curve essentially similar to that set out on page 43 of the Douglas Exhibit 18A. Hence, it represents the second step in the process. The first step, correlating freight rates and traffic movements on logarithmic paper to obtain the ratios for application to air cargo movements is not included. Presumably, the straight line curve captioned "Wayne University Studies" in Exhibit 20, as filed with the Board by Douglas, was the source from which the above mentioned curve on page 61 of the 1944 of the 1944 Wayne study was derived. In an effort to confirm this presumption, the writer enquired of Professor Larsen, with whom he had conducted previous correspondence, on January 27th, 1954, as follows:

... I have purchased a copy of your "Air Cargo Potential in Fresh Fruits and Vegetables" which gives me further data along the lines suggested in your reply of 22nd January 1954. Is there another book in the series or another publication such as one containing an article by yourself to which I could refer, giving the manner of derivation of the Demand Schedule for Air Cargo, Figure 1, page 61 of the book I have purchased?

(8)

In reply, Professor Larsen suggested that I obtain the other two volumes in the Wayne air cargo series, as noted on page 169 of this thesis. Subsequently these two texts were obtained and studied. No reference to

(8) Letter from writer to Prof. Spencer A. Larsen, Director, Materials Management Center, Wayne University, Detroit, Michigan, 27 Jan. 1954.
the type of forecasting in the original 1944 survey appears at any point. In consequence, Dr. William Reitz, Professor of Education, Wayne University, and statistician for all three volumes and the co-author of the last two, was contacted by letter on the 20th of February 1954. The results of this contact were most fruitful, inasmuch as Professor Reitz invited the author to meet with him and to discuss the matter at length. In the course of this meeting, the following points were established:

1. Dr. Reitz agrees with the contentions of Mr. T.G. Donnelly, Dominion Bureau of Statistics, as to the contended shortcomings of the Price-Demand Analysis as set out on page 165 of this dissertation.

2. Exhibit 20 does contain the basic source of the demand curve on page 61 of the 1944 Wayne study. However, as Professor Larsen stated in his earlier letter, "The general principle that is being used (by Douglas) to estimate air freight volume in the materials you sent me seems to me to be somewhat oversimplified ..." Dr. Reitz pointed out that consumer and shipping company panels, vitamin loss over time, and many other factors were used to smooth in their curves. Strict assumptions to do with volume variation with rate were not made as has been done by Douglas.

3. The method of analysis in question represented but a fraction of the content of the 1944 study, representing an independent fragment of same. Douglas, on the other hand, used the method exclusively to form the essential basis of its entire potential forecast for Canadian Pacific Air Lines.

4. The method of analysis in question has been dropped by Dr. Reitz and Professor Larsen. Their initial survey was in large measure exploratory, being the first of its type in the field. The panel testing phase of their
initial survey has been retained. However, more precise and statistically sound forecast techniques have been adapted, some for the first time in air cargo prediction. These methods include the estimation of national traffic (e.g. of drugs) by means of invariant relationships derived from sample traffic data; the utilization of weighted centres of production and sales; the combination of separate factor ratings into an air propensity index and the estimation of traffic potentials by means of the relationship between existing traffic charges and volumes of traffic, but on a particular commodity basis only.

(5) Douglas Aircraft Company is quite wrong in the opinion of Dr. Reitz, in referring to the methods used by Mr. Crilly as the "Wayne method". Douglas is simply employing a small part of a complex method initially used by Wayne University back in 1944, but long since dropped in favour of the more precise tools of analysis referred to in (4) above.

Nathan Keyfitz, Dominion Research Statistician and his assistant Mr. T.G. Donnelly, considered the Price-Demand relationship, on which Douglas based its C.P.A. forecast, as being quite unsound. Prof. Waines and Dr. Currie concurred. Dr. Jaworski also concurred in an most emphatic manner in his report to the Board. Dr. Reitz states that it is not the "Wayne University method"; states that Douglas has oversimplified a method long since dropped by himself and his associates. Nevertheless, the Air Transport Board reported the method and the results to the Cabinet without critical comment, putting that phase of the C.P.A. submission forward as further evidence to support their contention that the licence application for the Montreal-Vancouver all-cargo service should be granted.
Data to do with Japan-Canada Air Cargo Potential

As previously noted at page 45 of this report, four pages of Exhibit 18 and nine of Exhibit 18A were devoted to a portrayal of the tremendous traffic potential available through stimulation of trade with the Orient, particularly Japan. A through freight plane service is dealt with coupling C.P.A.'s present trans-Pacific services to the proposed Vancouver-Montreal all-cargo service. The Air Transport Board reported to the Cabinet that such Oriental traffic would bolster eastbound C.P.A. domestic all-cargo flights, hence indicating that an obvious deficiency in the potential load factor picture would be thus compensated.

Commencing on page 52 of Exhibit 18A, there is set out an elaborate breakdown of Canadian and U.S. trade figures to do with Japanese imports and exports. Again a purely weight-value basis is employed. In part the assumptions, as set out on page 52, are as follow:

A logical approach to measuring the Orient air cargo potential is based on:

1. the breakdown of Orient trade by variation of value per pound with volume
2. the estimated effect of rate reduction on the penetration of this volume

The export-import statistics between Canada and the United States and Japan were analyzed by individual account, using the value of each commodity and its weight to arrive at the value per pound...
The volumes for each value per pound category were cumulated . . . and appear graphically in Figures 14 and 15.

The degree of penetration into these curves by air cargo depends largely on the prevailing route structure. . .

Since the actual volume of Orient air cargo is not known, it was necessary to assume an approximate value per pound figure to mark the present degree of penetration.

A study of trans-Atlantic air cargo volume by I.A.T.A. members indicated that their trans-Atlantic air freight volume in 1951 was the equivalent of all trans-Atlantic trade valued at or over $8.20 per pound. As non-I.A.T.A. members carry significant portions of this traffic, $8.20 is considered unduly conservative. Hence a value of $8.00 was used in this analysis.

To determine the increased penetration as rates are reduced, it was assumed that the equivalent value per pound moving by air will decrease directly with the rate. With a 10% rate reduction, the present degree of penetration by air cargo, estimated at $8.00 per pound, will drop to $7.20 per pound, with a resultant increase in potential as noted in Table XXXVII. (10)

At the time of the actual A.T.B. hearing, there simply was not time to fully check the various phases minute of such last submissions as the Douglas and Gruneau reports, despite their importance relative to the case. Hence, as regards the alleged Orient potential, Mr. O'Donnell simply stated:

One other thing I should like to mention, that is Mr. Crilly's reference to the Japanese trade. As far as I am concerned it is quite irrelevant. I suppose as this study has been put before the Board we should give it some attention inasmuch as considerable ink and paper has been expended in printing it in booklet form. (11)

(10) Exhibit 18A, page 52.
(11) Air Freight Hearing Transcript, page 1454.
Mr. O'Donnell restricted his comments to the supposedly summating graph to do with the Orient trade which appears at page 16 of Exhibit 18. This graph is headed with the statement: "Trade with the Orient requires rapid trans-continental service. The Orient market is growing . . . The proposed service will stimulate the flow of Canada's trade . . . " (12)
The abscissa covers the years 1948 to 1951, with the ordinate marked off in percentages, ranging from zero to 1000%. Canada's exports to the United Kingdom, the United States, Brazil and Japan are depicted over the years as percentages of 1948 data. In consequence, flat, apparently stagnated lines are shown for the U.S. and Britain, with Japanese trade yielding a near vertical climb to over 800% of the 1948 figures. Of course, as Mr. O'Donnell pointed out, such percentage increase figures do not mean anything when no statement of totals involved is included. To start from nothing makes multiple increases readily obtainable. In this regard Mr. O'Donnell further noted that, with reference to data set out in the Dominion Bureau of Statistics publication "Trade of Canada, Exports to Each Country," calendar year 1951, pages 109-111, an actual decline category which in exports to Japan for 1950 and 1951, of goods of that could conceivably come into air cargo transfers, took place. "Thus," stated Mr. O'Donnell, "insofar as air

(12) Exhibit 18, page 16.
cargo potential is concerned, I consider the charted relationship on page 16 of Exhibit 18 to be quite misleading." (13)

Further to the data source referred to by Mr. O'Donnell it is of interest to note that for the years mentioned, 1950 and 1951, there would not have been one full DC-6A aircraft load available for carriage in either direction across the Pacific of merchandise which could conceivably be considered as air cargo potential at present-day rates in terms of strictly Japan-Canada commerce.

Subsequent to the hearing, the writer attempted to further appraise the Pacific potential. First, an effort was made to obtain the I.A.T.A. trans-Atlantic survey referred to on page 174. Enquiry at the head office of that organization in Montreal was to no avail. Mr. Harold E. Shenton, I.A.T.A. Economics and Statistics Officer, was unable to find any trace of such a study in his files. However, upon writing to Mr. William M. Crilly, the Douglas witness, it was determined that the study referred to was another of Douglas's presentations. Mr. Crilly stated:

The reference on page 52 of the Canadian Pacific Air Lines Appendix Report, SM 14662A, is not an I.A.T.A. study, but to a study of trans-Atlantic airfreight by I.A.T.A. members which was conducted by Douglas. (14)

From the supporting data supplied by Mr. Crilly it would appear that this Atlantic study was carried

(13) Transcript, p. 1454. (14) Letter dated, Jan. 20, '54
out by Douglas for Swissair on a promotional basis in relation to aircraft sales as was the survey conducted for Canadian Pacific Air Lines.

As for the general outlook of Orient trade with relation to airborne commerce, a series of texts were consulted. The outlook for air cargo across the Pacific would appear to be most dubious despite the Douglas contentions to the contrary. As Ellsworth Huntington summates in his Principles of Economic Geography at page 638, "The greatest trade of all is between countries that are most alike." Canada and the Orient could not be more unlike in every respect. In this regard Mr. Walter A. Reidus, in his U.S. Shipping in Transpacific Trade, states at page 6:

The countries of the New World are spacious, richly endowed with raw materials and fertile agricultural lands, and inhabited by an independent, progressive population with a high standard of living.

The Far East is crowded, deficient in resources, bound by political and economic ties to Western nations and by cultural bonds to an age old civilization . . .

The purchasing power of the great masses of the Orient is too low to permit them to buy on a large scale the manufactured products of the U.S. They must trade agricultural and mineral products primarily for the essential basic foodstuffs and raw materials they lack—wheat, lumber, scrap iron, wood pulp, cotton. The U.S. looks to the Orient for many raw materials: rubber, tin, copra, silk, coconut and other vegetable oils. Trans-Pacific trade is thus predominately an exchange of raw materials between two continents whose geographic resources are
quite widely divergent and whose economies are at a different stage of development.

Trans-Pacific trade faces two great handicaps, one, the distances involved, and two, the wide disparity between the standards of living of the peoples of the eastern and western shores. (15)

Mr. Radius had written his text in 1944 under the sponsorship of the American Council of the Institute of Pacific Relations. His data covered the period 1922-1938, hence restricting himself to the relatively normal, pre-war period of Pacific commerce. To check his concepts with current thought in the light of air cargo possibilities, the writer corresponded with a number of authorities, receiving detailed replies from:

Clarence M. Young
Executive Vice President
Pan American World Airways System
(in charge of Pacific-Alaska Division of that firm)

R.P. Reese
Cargo Sales Manager
U.S. Regional Offices
Phillipine Air Lines

Paul H. McClelland
U.S. Army Sea Transport Control
Seattle, Washington
(pre-war Pacific Coast U.S. Manager for N.Y.K.)

Mr. McClelland, whose entire life has been devoted to stimulation of trans-Pacific trade is most cautious as to his expectations regarding air penetration, stating in part:

With regard to the Trans-Pacific air potential, it seems to me that in normal times there are two main considerations that will make for air lift preference, viz., seasonal demand, and

(15) U.S. Shipping in Trans-Pacific Trade, pages 6-7.
saving of interest charges to balance the difference in transportation cost. Where time is not too essential, the tendency will be to level off in favor of the cheaper mode. The Orient has considerable buying power but on a narrow margin of profit and the merchant cannot afford to put too much of his cost into speed. Over the years I believe the standard of living of the Orient will gradually approach that of the West, so that the two areas will become increasingly interdependent for the higher class commodities which will stand the higher air rates, but that is going to be slow. (16)

It will have been noted that the Douglas appraisal of Orient potential was based on the assumption that the value of merchandise per pound was the basic criterion for establishing the possibilities of diversion to air carriage. In this regard, Mr. Young states:

We do not believe the value of the goods is too serious a bar, as air transport lends itself to the carriage of certain commodities when the air cargo charges themselves exceed the f.o.b. value. An example, which occurs to us, is baby chicks. The value f.o.b. Pacific Coast might be $18.00 for a 12 pound carton of 100 chicks, yet they move freely at rates of $3.11 per pound. This commodity is typical of several where air transportation is the only method which can be used at all. (17)

As for distances, a survey that purportedly produced reasonable results on the Atlantic could hardly be directly applicable to the Pacific on a straight percentage rate reduction basis. In this regard, Mr. Young notes that the New York-Paris distance is 3638 miles against 8501 from San Francisco to Hong Kong.

(16) P.H. McClelland, letter to writer, 28/1/54.
(17) C.M. Young, letter to writer, 9/2/54.
by the mid-Pacific routing, as flown by Pan American.

Mr. Young further states in this regard:

If we accept as axiomatic that rates must roughly correspond to distance, you are quite right, and this is borne out by a comparison of ton mile rates in the Atlantic and Pacific. The cargo rates on the Atlantic for general cargo are broken down into three weight classes: under 100 pounds, 100 to 440 pounds, and a new break of over 440 pounds. Using the New York Paris mileage given, these work out to approximately 64¢, 48¢ and 45¢ per ton mile respectively. Pacific rates are equalized between the Pacific Coast terminals and the Orient terminals, Tokyo/Hong Kong/Manila. Using the mileage given for San Francisco/Hong Kong, the three rates work out to 58¢, 44¢ and 41¢ respectively. In the reverse direction there are lower rates from the Orient brought about by an attempt to equalize the flow of cargo, which is normally out of balance, as so much more goods move from the U.S. Ton mile rates work out to 52¢, 39¢ and 36¢ respectively. (18)

Hence, Pacific rates per ton-mile are well in line with those on the Atlantic, being actually less heavy on this basis. However, in view of the mileages involved, it is roughly twice as costly to ship goods across the Pacific as opposed to the Atlantic. This, in addition to the fact that Pacific trade is "not in a hurry" by virtue of the raw material nature of most of the goods involved. As Mr. Reese of Phillipine Air Lines notes:

Present general commodity rates for cargo are approximately 100 times greater than surface rates, and we can therefore hope to attract only a very trifling percentage of the volume of freight moving from the North American continent to the Orient and Asia. The air carriers operating across the Pacific are doing

(18) Ibid., page 2.
what they can to stimulate the use of air
cargo by introducing specific commodity rates
substantially below the general commodity
rates. Even the lowest of these rates are
based on 36¢ a ton mile, which when compared
to the ocean ton mile rate, is still fantast­
ically high. No radical reduction in these
rates can be made until aircraft better suited
to the carriage of cargo (and by that I mean
a much more economical operating cost) can be
made available to the air carriers. At the
present time none of the airlines operating
across the Pacific use all cargo aircraft,
which as you know, is so common on the North
Atlantic. One of the big reasons why all­
cargo aircraft cannot be successfully used on
the Pacific is that these aircraft are not
cargo aircraft but converted passenger planes.
This is true even of the DC-6A which is merely
a DC-6 with a few concessions made to cargo,
but still retains the round hull and still
poses a considerable problem by having the
cargo doors 100 or more inches from the
ground. (19)

Along the same lines, Mr. Young remarks:

Your point with reference to present day air­
craft appears substantially correct. They are
excellent for the carriage of passengers, but
since a premium is placed on speed, this must
be paid for. The concept of cargo carriage
is to schedule aircraft, as you have indicated,
with an eye to passenger traffic, and to
utilize residual space for cargo. This pro­
vides an excellent service for cargo but per­
haps the full potential cannot be realized
unless, and until, an aircraft designed for
cargo alone is economically possible. A closer
approach has been made in the Atlantic by
using stripped down DC-4 and DC-6 aircraft.
Here the community of interest between the
two sides of the Atlantic is strongly in
evidence and heavy volumes reasonably well
balanced directionally, make possible a full
cargo operation. (20)

But not so on the Pacific. The facts appraised and
the authorities consulted all bear out Mr. O'Donnell's

(19) R.P. Reese, letter to writer, 19/1/54.
(20) C.M. Young, letter to writer, 9/2/54.
contention that the inclusion of the Orient potential data in the Douglas submission for C.P.A. was both misleading and irrelevant. For the immediate future, hence with relation to the C.P.A. application for a Montreal-Vancouver air freight run, trans-Pacific air freight traffic would appear to be non-existent insofar as significant volumes are concerned.
Chapter X

Australian Air Transport

Providing a Contemporary and Parallel Case History for Canadian Guidance.

Insofar as this dissertation is concerned, the preceding chapter completes the treatment of the evidence brought forth by the applicant and interveners in the Canadian Pacific Air Freight Case. The eleventh, and final chapter summates the topic as a whole and offers such conclusions and recommendations as the observations of the writer would appear to justify.

The present chapter to do with Australian Air Transport is essentially an insert. However, Australia has seen fit to do what Canada has not done and the consequences provide an illustrative case history for Canadian contemplation. In Australia today there are two airlines operating parallel routes on a transcontinental basis. One is owned by the government; the other by the shipping corporations. Together these two airlines account for 85% of all transport in the domestic air field. The privately owned line has been carrying on with great difficulty, with claims of considerable financial loss. The publicly owned line has progressed dynamically since its inception. The privately owned line is Australian National Airways Proprietary Limited which came into existence in 1936. The publicly owned firm is Trans-Australian Airlines which was conceived by the Labour Government in
1944. Hence, the relative progress of the two firms during the past decade. The Labourites fostered their national air line to the detriment of the private corporation, restricting the carriage of mail and personnel on government business to their own operator.

Civil air transport in Australia, as in Canada, was pioneered in the 1920's, with emphasis on the remote northern and western areas. In 1932 the first trunk route between capital cities was developed. By 1936 all major metropolitan pairs were linked by interstate air services. In 1939 the regular internal air transport firms were flying approximately 45 million passenger miles annually. In the 1944-45 fiscal year, 130 million passenger miles were flown. For the year ended June 30th, 1952, the total was 756 million passenger miles. This constituted 50% more passenger miles per capita population than flown by the domestic services of the U.S.A. for the same period. (1)

Until the advent of the Labour Party to national leadership in 1944, the principal air operator had been Australian National Airways Proprietary Limited. This firm, a proprietary company incorporated in Victoria, is the wholly owned subsidiary of what is known in Australia as the "shipping combine." This

(1) P.M.C. Hasluck, Minister for Territories, Hansard, Australia, Commons, 24 Oct. 52, p. 3737; supplied by Hon. Hasluck to writer following letter from him dated 19 Nov. 53.
The group is made up of five corporations: (2)

1. Huddart Parker Limited,
2. Holyman Brothers Proprietary Limited,
3. Union Steam Ship Company of New Zealand, Ltd.,
4. Adelaide Steamship Company Limited,
5. Peninsular and Oriental Steam Navigation Co., Ltd.

Each firm holds 1,119,000 shares in the air firm. The total shares outstanding is given as 6 million, one other shipping firm having a minority interest. The par value of the shares is 5s. each. The paid-up capital is only 1.5 million pounds.

As noted, up to 1944 this private firm, Australian National Airways, was the virtual counterpart of Trans-Canada Air Lines from the standpoints of scope of operations and control over competition. Ownership, of course, was as the case for C.P.A. A.N.A. was the nation's prime trunk operator of air services, vested with a monopoly in effect similar to that of T.C.A.

On November 22, 1944, the A.N.A. monopoly ceased to exist. On that date, in the Federal Parliament, the Acting Prime Minister, Mr. Forne, announced the Labour Government's intention of forming "a wholly Government-owned statutory authority to take over, operate and maintain all interstate airlines." (3) The relevant act was introduced on July 4, 1945 and proclaimed August 16th, being entitled The Australian National Airlines Act 1945.

The act provided for the establishment and operation

(2) Ibid., Dr. Evatt, Opp. Leader, p. 3875.
(3) R. Williams, Dir. Gen. of Civil Aviation, with letter to writer dated 24/12/53.
by the Commonwealth of national airline services and for the setting up of the Australian National Airlines Commission, consisting of five commissioners, to establish and operate such services. The Act included the following provisions: (4) (for services)

1. between any place in a State and any place in another State;
2. between any place in any Territory of the Commonwealth and any place in Australia outside the Territory;
3. between any place in any Territory of the Commonwealth and any other place in that Territory; and
4. with the approval of the Minister, between any place in Australia and any place outside Australia.

As might be expected, the private firms objected strenuously to the whole undertaking. Australian National Airways, together with Guinea Airways Ltd. and MacRobertson-Miller Aviation Company, took the matter to Australia's High Court. This body ruled that the proposed commission could not operate intrastate services, but that provision for interstate operations were legally based, together with the provisions for the taking over of existing operators. A.N.A. challenged the High Court decision and asked for an appeal to Privy Council. The Australian High Court disallowed this application for appeal on the 17th of April, 1946. Further, the Act was subsequently amended in a legal manner to permit intrastate flights.

The Australian National Airlines Commission was

established on February 12, 1946 with A.W. Coles as chairman, W.C. Taylor as vice-chairman, and E.C. Johnston (Assistant Director General of Civil Aviation) L.E. Fanning (Postmaster General's Dept.) and G.P.N. Watt (Treasury) as the other three members. Present chairman is G.P.N. Watt, Mr. Coles having resigned following the Liberals return to power inasmuch as he had actively supported the Labour government in its political programme. Mr. Johnston, who is still the Assistant Director General of Civil Aviation and who supplied the writer with considerable data, is no longer a member, his term of office expiring 11th February 1952.

Trans-Australia Airlines was set up by the Commission to operate the air services contemplated by the Act. Interim daily service between Melbourne and Sydney commenced on the 9th of September 1946 with converted Douglas C-47's. Since that time operations have expanded to provide a network linking 100 towns and centres throughout Australia, involving a route mileage of 25,441. The Act had contemplated the taking over of existing air services such as those furnished by Australian National Airways Limited. Legal obstacles, however, resulted in the growth of a pair of strictly duplicated route structures.

For the year ending June 30th, 1953, Australian
National (private) carried 567,889 passengers; Trans-Australian, 646,226. The private firm hauled 33,041 long tons of freight during the same period; the public firm, 16,256. Inasmuch as the private firm is the subsidiary of the shipping firms, air freight is naturally most readily diverted to it.

Profit or loss information for Australian National is not directly available inasmuch as that airline is a "proprietary company and in accordance with the relevant legislation in Australia is not required to publish its balance sheets and accounts." (6) However, the results of a Liberal government enquiry into the operations of the two firms, made in 1952, gives the following data as tabled in Hansard: (7)

<table>
<thead>
<tr>
<th></th>
<th>Trans-Australian (public)</th>
<th>Australian National (private)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1949-1950 (to June 30th)</td>
<td>$356,000 Profit</td>
<td>£216,682 Loss</td>
</tr>
<tr>
<td>1950-1951</td>
<td>341,000 Profit</td>
<td>10,221 Loss</td>
</tr>
<tr>
<td>June 30-December 31, 1951 (not given)</td>
<td>201,775 Loss</td>
<td></td>
</tr>
</tbody>
</table>

Of course, this is no proof in itself of superior operation by the public concern. It is, however, an indication of the extent that air transport leans financially on government support through mail pay, whether in excess of charge for service rendered or not. The private firm, in 1951, was receiving 50,000 pounds per annum mail pay as opposed to 500,000 pounds for the public operator. In this regard it is of interest to recall the statement made by the Canadian Air Transport Board's Chairman in

(6) F. Williams, letter to writer, 24/12/53.
(7) Australia, Commons, Hansard, 24/10/52, p. 3739.
the Air Freight Case: (8)

Mr. Wells, Maritime Central Airways, had queried Mr. McConachie as follows:

Q. Is it your opinion that the all-cargo carrier in Canada ought to be licenced to carry air mail and parcel post?

A. If they should be asked to carry it.

THE CHAIRMAN: I am sorry, but I do not believe that is a proper question to introduce since the carriage of air mail is a matter that is determined by the Post Office Department and is one over which this Board does not exercise jurisdiction.

Such mail pay as was received by Trans-Australian, the Commission's carrier, does not, however, seem to be greatly out of line as is evidenced by the following breakdown of the company's revenue dollar for 1951-52:

<table>
<thead>
<tr>
<th>Revenue Source</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Passenger fares and baggage</td>
<td>77%</td>
</tr>
<tr>
<td>Freight</td>
<td>13%</td>
</tr>
<tr>
<td>Mail</td>
<td>7%</td>
</tr>
<tr>
<td>Other</td>
<td>3%</td>
</tr>
</tbody>
</table>

As noted on the preceding page, the private firm's losses were steadily mounting. The return of the Liberals to power made possible the reversal of this trend. In 1952 four companion acts were brought before the Commons and Senate; becoming law in that year. The pivotal document concerned comprises a six page act to approve an agreement made between the Commonwealth and Australian National Airways Proprietary, Limited, the short title being "Civil Aviation Agreement Act 1952."

(8) Air Transport Board, Air Freight Case Transcript, page 688.
In introducing this Civil Aviation Agreement Act, Hon. P.M.C. Hasluck said in part:

... despite the fine service it was providing, Australian National Airways Proprietary Limited had been running at a loss on its internal services for some years. At the same time, Trans-Australian Airways was showing a profit, due entirely to the monopoly of air mail revenue which it enjoyed. ...

The directors of Australian National Airways Proprietary Limited, therefore, approached the Government (that would have been the Chifley Labour Government in 1949—writer's note) and proposed the amalgamation of Australian National and Trans-Australian. They said it was not possible for the two airlines to compete on a profitable basis and the single entity was the only possible way of conducting civil air services within Australia.

... When the company renewed this proposal to the present Government, we rejected it. We are opposed in principle to monopoly and and we will seek to avoid it wherever we can. ...

(10)

Rather than consolidation or amalgamation, a policy of rationalization such as put forward by the Duff Commission for Canadian railways was adopted. Mr. Hasluck noted that competition between the two operators had been intense, resulting in many cases of overlapping and provision of services in excess of public requirements. In consequence, a provision of the Agreement Act stipulated that time tables and services were to be integrated, all wasteful duplication to be dispensed with. Further:

1. Each operator was to be given an equal share of air mail traffic.
2. Government business was to be freely

(10) P.M.C. Hasluck, Hansard, page 3730, 24/10/52.
available to both airlines.
3. Each operator to be assisted financially to acquire heavy flying equipment.
4. The level of air route charges to be reduced.
5. Rationalization to be subject of mutual agreement between the two operators with a retired judge appointed by the government to settle deadlocks. (11)

The financial assistance in point (3) above involved a government guarantee to the Commonwealth Bank for loans up to four million pounds to be made to the private firm for purchase of aircraft. A further provision of this same section provided that to the requirements of any aircraft becoming surplus British Commonwealth Pacific Airlines or Quantas Overseas Airlines, both of which are jointly owned by Australia, New Zealand and Britain, then they shall be evenly divided between A.N.A. and T.A.A., with the rationalization judge to decide which firm is to get the odd remaining aircraft, if any!

The reference to route charges is to do with user fees for airway maintenance as currently contemplated by the C.A.A. in the United States and as put in effect in 1947 by the Chifley Labour Government. Australian National had refrained from paying these assessments, contesting their legality. To the time of the Agreement Act, A.N.A. was thus one million pounds in arrears. Trans-Australian had regularly paid the charges levied. The Act provided for a 50% reduction in these fees for the future plus a retro-

(11) Civil Aviation Agreement Act, pages 2, 3, 4.
active provision to settle with Australian National for 337 thousand pounds in lieu of back payments due, together with a comparable refund to Trans-Australian in presumption of overpayment. This refund has been used by the writer to correct the profit data shown on page 188 of this report.

The agreement was stipulated as to be in effect for 15 years from date of passage. The intention, of course, was to lend stability to the private firm's operations and expansion plans and to attempt to preclude a reversal of policy by a succeeding government. Such planning has also gone into the concept of Trans-Canada Air Lines without a specific monopoly period being specified. A government change in Canada would doubtless bring an end to T.C.A.'s monopoly privileges, assuming the Conservatives were returned to power. In this regard, the Leader of the Opposition, Dr. Evatt, summated rather pointedly:

I say, on behalf of the Labour party, that we shall take every available step to oppose the bill. If, notwithstanding that, the bill be passed, a future Labour government will frankly tell the people that the new parliament will not be bound by its predecessor. We shall take every lawful step to set aside this agreement. As a party, we shall undertake to restore the status and activities of Trans-Australian Airlines to the position that they occupied before this measure was introduced. (12)

(12) Dr. Evatt, Australia, Hansard, Commons, 29 October 1952, page 3883.
Just who was right, Labour or Liberal, depends on the outlook of whosoever hazards the opinion. The crux of the matter would appear to have been that duplication was yielding losses where a single operator, public or private, would have sufficed. Adam Smith dealt with the topic in his discussion of the London Post Office system in his "Wealth of Nations." Taussig brought the subject up to date with respect to railroads and the economies of scale in Chapters 62 to 64 inclusive of his "Principles of Economics." G.D.H. Cole further clarified the matter for the writer with respect to the Canadian Pacific Air Freight Case, as evidenced by the following quotation from his letter:

In the early days of the Independent Labour Movement in this country - I mean in the 1890's, there was a man called Major Eustace Edwards, who was both a Socialist and a strong advocate of competition. He proposed that, instead of nationalising the railways, the State should build a public railway alongside each privately operated line, in order to ensure competitive conditions. He stood for Parliament with this as his main plank, calling the system 'Industrial Eustatics,' after his own name. Needless to say, his proposal was not adopted.

This I think is the reductio ad absurdum of the case which you say the Canadian newspapers are putting up. Clearly it would be an immense waste of money to run a competitive airline at high cost, where even a single airline needs a subsidy. The remedy against possible inefficiency leading to overcharges in such a case is surely effective
supervision, rather than the starting of a competitive airline. I presume such a line could operate only by creaming off the traffic and leaving the existing airline in a worse position than ever, so as to need a still higher subsidy, and that the net cost of the service would be a great deal increased. (13)

Current reports on the Australian aviation scene do not indicate that the private firm has prospered since the enactment of the Aviation Agreement bill. Aviation Week for March 23, 1955 reports that "A.N.A. Ready to Quit Flying." The article asserts that the government-sponsored plan to alleviate domestic competition between A.N.A. and T.A.A. has failed in its purpose. A.N.A. is reported as requesting a complete split-up of routes with no paralleling operations whatsoever. The private carrier has cancelled its order for Vickers Viscount aircraft, despite the 7 million dollar loan made available to it by the government for that purpose. The final paragraph, of course, explains the true situation:

Another factor is the strong upsurge of Labor Party power. The party, if returned to power, might abrogate the present A.N.A-T.A.A operations setup and nationalize the country's entire airline business. (14)

A further article, appearing in the October 19th, 1953 of Aviation Week indicates that another temporary truce has been arrived at, stating in part:

(13) Prof. G.D.H. Cole, letter to writer, 14/12/53.
Differences between privately owned AHA and the government owned TAA have been resolved after three months of talks that place the carriers on a 'fair competitive footing.'

Each operator is reviewing existing services to avoid over-scheduling and to reduce wasteful operation.

Duplication of services will be eliminated on two feeder routes, now flown by both operators at a loss...

But time is running out for the private operator. Trans-Australian, the government's firm, takes delivery of its Vickers Viscount aircraft during 1954. These vibration free turbo-propeller aircraft have proven an outstanding success in Europe, where British European Airways have cornered the European inter-city air transport market by widespread use of these Vickers ships. Trans-Australian is taking delivery of six such aircraft; Australian National has nothing more modern than converted wartime DC-4's. Further, public opinion, regardless of political creed, is on the public firm's side. For one thing, the "shipping combine" is not, apparently, a popular one. For another, the private firm has been plagued with fatal accidents since the inception of its publicly sponsored competitor. Trans-Australian has yet to have a fatal accident. Australian National, quoting from Hansard, has:

(15) Ibid., 19/10/53, page 99.
... in the space of a comparatively few months had five major crashes. When the relatives attempted to sue the company, it was wise enough to settle their claims out of court. If those crashes had happened to Trans-Australian they would have been invoked by this Government as a reason for disposing of the company. ... nobody in this chamber can be satisfied with the record of Australian National Airways Proprietary Limited during the last few years. It is one of the worst records of any airline operating anywhere in the world, including the American companies ... (16)

It should of course be borne in mind that it is a member of the opposition who is speaking. Nevertheless, the Speaker made no protest thus indicating that the facts are substantially as stated.

When a field is divided between two competitors, neither of whom has achieved maximum returns through full utilization of available capital equipment, sooner or later one of two events will transpire. The one firm will simply eliminate the other; or they will agree to divide the field and carry on, each wary of possible encroachment by the other. Politics can influence the process, but over time, it cannot prevent it. The word "competition" is meaningless in such situations insofar as it is normally considered beneficial to the interests of the community. As Professor Waines and Doctor Currie stated at the Air Freight Hearing in Ottawa, "Competition is only useful for what it achieves." (17) Joan Robinson further clarified the

(16) K.E. Beazley, Australia, Hansard, Commons, 29/10/52, page 3897.
(17) see page 66 of this report.
matter in her text "Economies of Imperfect Competition."

In some industries, of which railways and the distributors of gas and electricity are familiar examples, the smallest practicable plant has a very large capacity output, and if the market is not sufficiently large to use such plant up to capacity, there is no possibility of competition. If by chance two firms were to be engaged in such an industry, they would either compete against each other so that neither was able to gather its costs, and the one with the least endurance would disappear, or they would form a combine. There is no possibility of long period competitive equilibrium when the average costs of an individual firm fall with increases of output. (16)

Air transport is inherently expensive. The railway need only propel its loads over its tracks. The airline must both totally support as well as move its loads. The power of several locomotives must be expended by a DC-6A to move what amounts to less load than can be moved in the smallest railway boxcar. The cost of aviation fuel is a multiple of that employed in railway service. Complex and costly airway and airplane navigational facilities must be provided no matter how sparse the traffic. Presuming that airway transport services are needed or desired, only governments can muster the funds to provide same. If the task is assigned to private enterprise then government funds must, of necessity, be forthcoming in subsidy. Competition simply heightens the ultimate cost to the taxpayer. Australia is in the process of making just such a costly experiment, subsidizing a private firm

to maintain services paralleling those already offered by an airline owned by itself. Government credit to an equivalent to the extent of seven million dollars has been extended to the private firm, despite said firm's continuous loss record. One half of the government's airmail business has been turned over to the private firm, complete with the inherent subsidy involved. The government has agreed that its publicly owned airline will start no new service, will purchase no new equipment, will take no action of any kind, without the approval, no matter how long delayed, of the private firm. Neither firm, if it had the field entirely to itself, would have presently approached minimum unit cost levels through full utilization of its facilities. Operating together on a parallel basis the possibility of attaining such an optimum state becomes more than doubly remote. Whether socialist or capitalist, one cannot help but feel, in the light of Australian experience, that the Canadian Cabinet's positive decision in the Air Freight Case was right and that the Air Transport Board's oblique recommendations were wrong.
Chapter XI.

The Canadian Pacific Air Freight Case.

Summation and Conclusions

The C.P.A. Evidence and the Cabinet Decision

In support of its application for authority to operate an all-freight air service between Montreal and Vancouver, Canadian Pacific Air Lines produced no conclusive evidence to substantiate the existence of adequate traffic potential to justify the service. The Douglas Report, the applicant's key submission, was substantially comprised of data and findings which, upon examination, even the Air Transport Board's economist, Dr. Jaworski, found to be inaccurate and based upon unsound premises. In essence, the application involved a request for permission to enter the Canadian transcontinental air transport field. The proposed carriage of air freight was incidental to the request, in the light of the consistent and most substantial financial losses suffered by the all-cargo carriers in the U.S.A. Canadian Pacific, presuming it desired an ultimate profit from its operations in the proposed domestic field, sought the all-cargo licence simply as a first step in a process. As has been done by the all-cargo carriers in the U.S.A., the next step would have been to apply for mail and parcel post rights and ultimately for a duplicating passenger franchise. By its decision to deny the C.P.A. application,
saw fit to forestall the touching off of this chain reaction which would have ultimately led to a total duplication of Canadian trunk line air services.

T.C.A. and the Air Freight Case

Upon review of the operating data brought forward during the hearing to do with the services of T.C.A. and C.P.A. it would not appear that the latter firm is in any way more efficient or economic in its operations, insofar as a point by point comparison with T.C.A. is concerned. The evidence as to the airfreight losses incurred in the U.S. despite that country's relatively slow and costly rail express facilities would adequately justify T.C.A.'s slow approach to reduced rate air freight haulage in this country. Unfortunately, moreover, the application, the hearing and the resultant publicity would appear to have pressured T.C.A. into a position presently where it must establish uneconomic air freight services rather than further jeopardize its monopoly position.

The Air Transport Board and the Air Freight Case

It would be presumptuous for the writer to set out criticisms of a judicial board. However, as brought out in this thesis, the evidence would appear to have totally confirmed the Cabinet's decision to give heed to the recommendations of Prof. Waines, Dr. Currie and Mr. McGregor and to thus negate the Board's contentions. However, one point of procedure was felt to have placed
POPULATION OF STANDARD METROPOLITAN AREAS CANADA AND UNITED STATES SHOWING AREAS OF OVER 250,000 LAST CENSUS

10,000,000 5,000,000 3,000,000 1,000,000 750,000 500,000 250,000
the interveners in a deleterious position with respect to the preparation of their cases and in the matter of their treatment by the press. This procedural point involved the last-minute introduction of such voluminous submissions as the Douglas and Gruneau reports, yielding a quite superficial appraisal of same by the interveners with consequent one-sided press coverage aside from quite inadequate submissions in rebuttal to the Board. In this regard the writer contacted the Board of Transport Commissioners in Canada and the Civil Aeronautics Board in the United States to seek to determine their attitude towards this element of surprise in supposedly fact-finding enquiries. Mr. C. W. Rump, Acting Secretary of the B.T.C. replied in part:

... the Board has given specific directions in a number of important cases, for example, applications for general rate increases, requiring parties to give an outline of their evidence to the other parties and to the Board in advance of hearing. The purpose is to expedite the hearing, facilitate dealing with the evidence and avoid surprise.

In general, the parties have complied with such directions by giving full outlines of the evidence of their witnesses and the exhibits, charts, studies etc. that they intend to adduce.

In a number of cases where the evidence and exhibits were lengthy and complex the Board has also granted adjournments of days and sometimes weeks to enable opposite parties to consult experts before proceeding with cross examination or their own evidence. (1)

(1) C. W. Rump, Acting Secretary, Board of Transport Commissioners, letter to writer, 26/11/53.
In addition, Mr. Rump enclosed a copy of the Board's Rules of Practice which substantiates the contentions set out in his letter whereby the Transport Commissioners appear to have obviated the necessity of time consuming examinations for discovery in their fact finding enquiries. As regards the Civil Aeronautics Board, Mr. Josh Lee, Member, dealt with the matter in question thusly:

It is a matter of standard Board practice to require that initial exhibits prepared by applicants be exchanged prior to the hearing in order to permit interveners and other parties an opportunity to study these data prior to the hearing. It is by this means that the actual hearing is shortened substantially and the Board is afforded an opportunity to have a full exploration of all relevant facts. The element of surprise in our administrative proceedings has to a very large extent been eliminated. It has been our experience that this results in a proceeding in which the accuracy of economic data in issue can be tested in a much more satisfactory manner than in the usual legal proceeding.

These B.T.C. and C.A.B. letters were then forwarded to Mr. John Baldwin, Chairman of the Canadian Air Transport Board, together with a respectful request for comment. In reply, Mr. Baldwin stated in part:

Since September 18th, 1953, all Notices of Hearings published on behalf of the Air Transport Board have contained a paragraph the sole objective of which has been to eliminate the surprise element occasioned at Board Hearings by the introduction of documentary evidence the nature of which an interested party could not be expected to refute with-

out considerable technical preparation. . . (3)

It will be noted that this step was taken on September 18th, 1953. The Air Transport Board had operated without benefit of this provision for nine years. The Canadian Pacific Air Freight Case had come to a close more than six months prior to its adoption. In the light of the contentions of Mr. Lee and Mr. Rump, said adoption would appear to be a belated but definitely forward step.

Mr. Baldwin further commented:

Unlike most administrative tribunals the Board does not regard its hearings as a trial between opposing interests the outcome of which shall be conclusive, but merely as one phase in the process by which the Board determines what is required by the present and future public convenience and necessity or public interest, as the case may be.

. . . the Aeronautics Act R.S.C. 1952 confers on the Board the power 'to make rules for the regulation of its proceedings' which the Board could make at any time should the need arise, however the Board believes that Canadian public interest is better served by adhering to a procedure which will permit the introduction of evidence by any interested party which may shed light on what is required in that interest and which the adoption of a code of standard rules of practice might tend to frustrate if not eliminate. (3)

It would thus appear that the Air Transport Board and the other two above mentioned tribunals differ in the matter of aims and procedural concepts. It is, of course, beyond the scope of this thesis to hazard an opinion as to which is the more sound and correct.

T.C.A. and the Immediate Future

Trans-Canada Air Lines lost considerable public support through the adverse press coverage given its side of the Canadian Pacific Air Freight Case argument. Typical newspaper reaction to the Cabinet decision has been noted on page 96 of this thesis. Further, such editorial and news story captions are set out below:

1. "Wide-Awake Airline Would Expose TCA"
   Vancouver Sun Newspaper
   November 7th, 1953. (editorial)

2. "Government Action Mystifying in Restraining Competition."
   Victoria Times reprinted in Vancouver Sun Newspaper
   November 18th, 1953.
   New story.

3. "TCA Coddling Balks Northern Progress"
   Vancouver Sun Newspaper
   November 18th, 1953.
   Editorial.

4. "Competition Best Guarantee of Good Service"
   Vancouver Daily Province
   November 6th, 1953.
   Editorial.

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Canadian Pacific Air Lines lost the decision but made significant gains in public support for itself to
say nothing of the gain in prestige for the Conservative party through that political group's championing of the Canadian Pacific cause.

In the light of the evidence contained within this dissertation it would appear readily apparent that the action taken by the Cabinet to deny the C.P.A. application was right. However, it definitely was not popular. It was not popular for three reasons, two of which are within the power of T.C.A. management to rectify for the future.

(1) C.P.A. was the under dog in the public eye and as such immediately the more popular contestant. T.C.A. represented a monopoly operator, traditionally unpopular in concept. Over these facts, T.C.A. had no control. The thought that they were requesting an ultimate switch to private monopoly, or at least towards a greatly increased drain on the public purse, did not enter the public mind. The odds were very definitely against T.C.A., but far more so than necessary for the following two rectifiable reasons.

(2) During T.C.A. 's first decade of existence, it was a most popular venture in the public mind. Its safety record, its dynamic expansion and financial record were continually accorded favourable press reviews. However, with continued growth T.C.A. lost its former personal touch and coincidentally, its popular appeal. With such rapid rise from such small beginnings,
employees at all levels felt that T.C.A. had achieved
greatness, becoming robots in consequence, mechanically
mass producing transportation rather than remaining the
friendly servants of the travelling public. T.C.A. is,
in actuality, a relatively small airline. On a basis
of scheduled revenue passenger miles it represents but
a fourth the stature of American, or Trans World or
United Air Lines. T.C.A. is but a third the operation
relative to Eastern Air Lines. In actuality, T.C.A. is
directly comparable to the systems of Capital and North­
west Airlines on this basis of scheduled revenue passen­
ger miles flown annually. Rather than presume upon
greatness, T.C.A. should capitalize upon its smallness
until such time as subsequent growth brings a natural
accrual of public respect. The problem is doubly
ally
importantly inasmuch as T.C.A. is government owned. In
such organizations there is an ever present tendency
towards a civil service approach. With management,
this takes the form normally of "empire building" with­
out regard to proper departmental needs. Hon. Herbert
Morrison has advised the writer that his forthcoming
text will cover phases of this problem. He stated in part:

I have . . . written a book which will be pub­
lished in April by Oxford University Press,
the title of which is 'Government and Parlia­
ment; a survey from the inside.' Among other
things it deals with public accountability of
publicly owned industries . . .

(4)

(4) Hon. Herbert Morrison, M.P., letter to
writer, 25th January 1954.
As for employees at the public contact level, they must be imbued with the concept that the T.C.A. franchise is not beyond the bounds of revocation. They must sell more than just tickets; they must sell T.C.A. With the proper employee approach, whether it be ticket clerk, stewardess or ramp handler and no matter what the size of the aircraft, the passengers cease to become simply bewildered bearers of boarding passes; they become guests of the airline. If a campaign of this nature is consistently pursued, as is currently the case for Capital Air Lines, then such pleas\$ as T.C.A. shall make before future Air Transport Board hearings will be faced with a more friendly press and public.

(3) The other matter over which T.C.A. has control relative to its more enthusiastic acceptance with parliament and the public is to do with the measuring of its own achievements. Very wisely, concentration has in the past been centred by top T.C.A. management upon building a safety conscious, efficient and economic air transport organization. However, it would appear that insufficient effort has been devoted to telling the taxpayers and the Commons' members of the methods used and of the results so achieved in the light of the comparable activities of Canadian Pacific Air Lines in this country and paralleling operators in the United States.
The original 1937 Trans-Canada Air Lines Act specifically provided that the evaluating yardstick for the government's airline should be based upon the operations of comparable carriers in the United States of America. In 1 George VI, Ch. 43, that section relating to the Trans-Canada Contract states:

Tariffs - for the transport of passengers and goods by the Corporation at tariff charges on a competitive basis with other similar transportation services in North America.

Provided, however, that when the revenues of the Corporation in the opinion of the Minister will permit, charges may be imposed for landing, lighting, and weather reports such as are charged for similar competing coast-to-coast services in North America.

For the public, for parliament, or for any fact finding tribunal it is felt that T.C.A. should be in a position to report on every phase of its operations relative to its American counterparts. The Civil Aeronautics Board is continually appraising the operations of the various U.S. carriers with a view to subsidy payment or withdrawal. In the recently decided Pan American Latin America case, ten million dollars were lopped off allowable costs by the C.A.B. in view of alleged over-capacity and too high selling expenses on the part of the airline. Lavish national advertising and other projects of a promotional nature had raised selling costs out of line. The airline had assumed that government subsidy would make up the deficits. The C.A.B. thought otherwise, dis-
allowing all selling costs over a total representing
19% of commercial revenues. In this regard Mr. J.H. FitzGerald, Director, Bureau of Air Operations, Civil Aeronautics Board states:

... the Board's mail rate policies are evolved under the criteria of 'honest, economical and efficient management' set forth under Section 406 of the Civil Aeronautics Act of 1938, as amended, in light of the developmental objectives of the Act. The policies, which are developed on a case-to-case basis, are not static but are applied in the light of the circumstances peculiar to each case. Thus, the standard of a ratio of 19% adopted for the Latin American Division of Pan American World Airways, Inc., for the period April 5, 1948 through December 31, 1951, is not necessarily applicable to domestic trunklines nor to local service carriers...

They may not be static, but the yardsticks do exist and are being used to evaluate one airline in terms of another. In the case of Pan American the Board noted: "to the extent controllable management policies were responsible for the losses, the government would not underwrite these losses with mail pay."(6) As previously noted in this report in hand, the C.A.B. currently allots approximately 80 million dollars each year in straight airline subsidy payments. Formerly this was paid through the Post Office in adjusted mail pay rates. Now it is paid directly through the C.A.B. and subject to annual review by the nation's legislators. The writer advocates a similar plan for Canada. The taxpayer should know what he is obliged to pay to maintain air transport. If he did

(6) Joseph H. FitzGerald, letter to writer, 4/2/54.
he would not be so quick to subscribe to policies that would result in further increases. For the 1952 Annual Report for T.C.A., as would have been available to the Cabinet at the time it was deliberating its Air Freight Case Decision, a total is shown of 4,843,052 ton miles of mail flown. The mail pay per ton mile is shown as $1.39. (7) The basic figure for a comparable trunk operator in the United States is 45¢ per ton mile for airmail with a considerable reduction being temporarily in effect on the experimental all-up mail programme now underway. Hence, of T.C.A.'s mail pay, at least one dollar for every ton-mile must be properly considered as subsidy, yielding a five million dollar annual subsidy payment to the firm. Airways facilities furnished at a fraction of cost comprise another hidden subsidy payment. In this regard:

. . . In the period immediately following World War II the capital expenditures for civil aviation were very heavy, rising to $103,329,510 in 1946-1947. Up to March 31, 1950, the total expenditures of the Canadian Government on civil aviation since the beginning amounted to approximately $260,000,000, not including mail payments and the cost of acquisition of certain war-time facilities from the United States (about $90,000,000) while receipts totalled only approximately $27,000,000. Provinces and municipalities have also contributed to the cost of ground facilities. T.C.A. has been one of the principal beneficiaries, though by no means the only one. . .

The same author, in his text "International Air Transport and National Policy" states that:

... the fact that most governments must pay heavy subsidies to keep their air transport companies alive has been an important factor in the trend towards concentration. It is obvious that if the amount of traffic which is inadequate to support even one company is divided with a second, the total amount of subsidy would have to be increased. (9)

It should be noted that if it be considered that T.C.A. is heavily subsidized on a ton-mile mail pay basis, then C.P.A. is doubly so. Mr. W.J. Turnbull, Deputy Postmaster General advises that:

... the overall ton-mile rate paid Canadian Pacific Airlines for air mail service on all their domestic routes as a whole was $2.81 per ton-mile for the fiscal year April 1, 1952 - March 31, 1953. (10)

In this matter of comparative accounting as suggested above, the mere comparison of Forms 41, the C.A.B. reporting document which all North American carriers regularly file including T.C.A., is not enough, inasmuch as the C.A.B.'s Form 41 Manual is not uniformly followed by all carriers. The Board has the authority to order such uniform accounting under section 407(a) of the Act. However, it permits carriers to employ any system of accounts desired in their own operations providing expenses are uniformly dealt with. Hence, in numerous mail rate decisions the C.A.B.'s staff makes "adjustments" in carrier figures to make data comparable. Direct co-operation with the Bureau of

(9) O.J. Lissitzyn, see bib., page 256.
(10) W.J. Turnbull, letter to writer, 28/1/54.
Air Operations, Civil Aeronautics Board would be mandatory for the successful maintenance of running measures of T.C.A. efficiency in relation to its paralleling competitors across the border. The contention is that any government sponsored monopoly, such as T.C.A., should in its best interests, for the defense of its operations in the press and in parliament, separate subsidy from service charge and align its statistics as suggested above. Admittedly, the Cabinet is apparently satisfied that the T.C.A. management has done and is doing an efficient job. The point at issue, however, is that periodically they are going to be called upon to publicly and should at all times be prepared to do so prove this claim in an effective and clear-cut manner.

T.C.A. and the Ultimate Future

The Air Freight Case provided an indicator of things to come. Unfortunately, from the standpoint of long term stability, C.P.A. is the protege of the Conservatives; T.C.A. of the Liberals. The advent of the Conservatives to power would lead either to the duplication of T.C.A. services with C.P.A. facilities or the total supplanting of T.C.A. by the private firm. If either course has to be taken, the latter one is preferable from the standpoint of straight economics.
"It is a wasteful process merely to duplicate a railway line . . . "(11) And so it is also with an air transport operation as Australia has proven at considerable cost to her taxpayers. Of course, one further alternative would be available to the Conservative party, that being to leave T.C.A. continue as a government owned monopoly in its present state as was done with the great British Overseas Airways Corporation upon the return to power of the Churchill government.

It is indeed anomalous that it should be the Canadian Pacific Railway Company that is back of this move towards duplication of air facilities. This is, of course, in view of the fact that Sir Edward Beatty, the then C.P.R. president, fought so hard during the latter part of his lifetime to unify the operations of the Canadian National and the Canadian Pacific. From one end of the country to the other, he continually spoke out repeatedly in favour of unification. As to his estimate of possible savings he stated:

In addition to savings resulting from unification of actual operations, there are other advantages. Account must be taken also of the saving in future capital expenditures. In providing for the normal growth of traffic and changes in its character, the extension of one plant would obviously cost less than the extension of two. (12)

Sir Edward Beatty thus joins in mutual sentiment with Adam Smith, John Stuart Mill, F.W. Taussig, Joan Robinson and all the rest who have been quoted on the same topic in the same way at various points throughout this report. To those who would say this applied to the depression and not to today, Sir Edward had this to say:

... 'It is human both to err and to forget.' Sometimes I fear that ... we shall speedily forget both the harm and the lessons of the depression. After a full meal a man forgets previous hunger; with money in their pockets or in the bank most humans forget poverty. We feel we can waste if we can afford it. Canada cannot afford waste even if, for the moment, it can meet its bills or pay its losses. What a depression does is to expose our economic waste and our unsound policies. What prosperity does is to cover up both. It is like water over a reef—when the water recedes the reef is in full view to all and a warning; when the water rises, the reef is still there but concealed, and even if concealed, capable of causing a wreck. Economic waste may continue even if it is concealed by our revenues. If, for example, the Canadian National were earning and paying all its legitimate charges, and the Canadian Pacific were earning and paying 10% on its Common Stock, the operations of the two companies in competition would still represent an economic loss of from 50 to 75 million dollars per year. That is the waste represented by duplication of effort, facilities and services. We must not in this country of natural wealth and great promise forget the lessons of our depression, or dismiss policies which will safeguard our future and expedite our development, because they are sane and wise and not solely the result of the application of that most popular of all laws—the law of political expediency. (13)

As for the question of long term consistency on the part of the Conservative Party in Canada, the following quotation from R.B. Bennett’s comments on the Trans-Canada Air Lines Act, at the time of its consideration in the Commons, makes for interesting reading:

I submit that in the light of the experience we have had in this country, if we are going into this airline business we should own it from the start . . . .

... it is one of the principles of this measure to pay the corporation’s dividends; we might as well start in and say we are going to direct the policy from the beginning. One of the difficulties today about the railroads is that we had nothing to do with laying them out. They were laid for contractors and not for the public. They were laid out for the mileage and the subsidy and not otherwise. Here is a franchise which is going to be very valuable . . . . Shall we hand it over to private enterprise or not? . . . .

It may be said that government ownership is always inefficient and that it always has been. I am not prepared to say that it need be, but even if there is inefficiency we can devise methods by which efficiency can be secured and the property retained in the people . . . . (14)

Sir Edward Beatty died in 1943; Viscount Bennett, in 1947. Apparently, their concepts and convictions were buried with them. However, despite the protestations of their present-day counterparts, Mr. Mather and Mr. Drew, the Canadian Cabinet has seen fit to reaffirm the T.C.A. franchise.

by its denial of the Canadian Pacific Air Freight Application. The economic stability of the nation's airline has been maintained free from deliberate exposure to jeopardy, at least for the time being. As Bennett urged, "the property has been retained in the people."

Lockheed Superconstellation Aircraft, eight of which have been purchased for delivery in 1954. They represent a portion of a thirty-two million dollar aircraft purchase order placed by T.C.A. in 1951 and 1952, based on long term planning for balanced expansion.
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(21) Morrison, Hon. Herbert
House of Commons,
London, S.W. 1.
. . . . . to do with alleged tendency of government controlled undertakings to become inefficient.

(22) Murphy, William
General Assignments,
Dominion Bureau of Statistics,
Ottawa, Ontario.
. . . . . D.B.S. data plus Douglas forecast methods.
(23) Reedy, Robert B.
Manager, Sales Engineering,
Lockheed Aircraft Corporation,
Burbank, California.
... . . . Air Freight Surveys, photographs.

(24) Reese, R.B.
Cargo Sales Manager,
U.S. Regional Offices, Philippine Air Lines,
212 Stockton Street,
San Francisco, California.
... . . . to do with Pacific potential, present day
air cargo aircraft, general air freight future.

(25) Reid, E.P.
Principal Economist,
Department of Agriculture,
Ottawa, Ontario.
... . . . to do with air freighting of perishables.

(26) Rump, C.W.
Acting Secretary,
Board of Transport Commissioners,
Ottawa, Ontario.
... . . . to do with B.T.C. procedural concepts.

(27) Sayen, Clarence N.
President, Air Line Pilots Association,
55th and Cicero,
Chicago 38, Illinois.
... . . . to do with A.L.P.A. intervention in the
Slick-Flying Tigers merger proceedings before the
C.A.B.

(28) Reitz, Dr. William A.
Associate Professor of Education,
Wayne University,
Detroit Board of Education,
Detroit 1, Michigan.
... . . . to do with Wayne University Air Cargo
Studies. Met with as well as corresponded with
Dr. Reitz.

(29) Stern, Ben
Director, Office of Aviation Information,
Department of Commerce,
Civil Aeronautics Administration,
Washington 25, D.C.
... . . . C.A.A. publications.

(30) Superintendent of Documents,
Government Printing Office,
Washington, D.C. other
... . . . C.A.B. cases and transport publications.
(31) Sweetnam, Alan G.
Four Guthrie Limited,
West Hastings Street,
Vancouver, B.C.
... to do with forecasted Pacific potential.

(32) Taylor, S.W.
Registrar of Companies,
Parliament Buildings,
Victoria, B.C.
... search data to do with Capilano Airways,
Limited (a component predecessor of C.P.A.),
Pacific Western Airways, Limited (applicant for
air coach privileges across Canada) and Queen
Charlotte Airlines, Limited.

(33) Tompkins, John B.
Editor and Manager,
"Motor Carrier,"
207 West Hastings Street,
Vancouver, B.C.
... data to do with highway transport of freight.

(34) Turnbull, W.J.
Deputy Postmaster General
Ottawa 4, Ontario.
... data to do with C.P.A. ton-mile mail rates.

(35) Wilson, L.G.
Okanagan Investments Limited,
Kelowna, B.C.
... to do with history of air line consolidations
in British Columbia.

(36) Young, C.M.
Vice-President,
Pan American World Airways, Inc.,
New York City.
... to do with combination carriage of freight
and passengers by Pan-Am plus Pacific freight data.

(37) Williams, R.
Director-General of Civil Aviation,
Commonwealth of Australia,
499 Little Collins Street,
Melbourne, C.l.
Australia.
... to do with Trans-Australia and Australian
National Airways together with parliamentary and
statutory data.

### Considerable correspondence was non-productive and, hence,
is not included in the above summation.