DYPARTMENT OF THE SENATE PAPER NO. 1018
DATE PREFEUTED 1 9 AUG 1970
PREFEUTED 1 9 AUG 1970

THE PARLIAMENT OF THE COMMONWEALTH OF AUSTRALIA

PARLIAMENTARY STANDING COMMITTEE ON PUBLIC WORKS

REPORT

relating to the proposed development of

FREIGHT APRONS, TAXIWAYS, RUNWAY EXTENSION AND ENGINEERING SERVICES

at

Melbourne Airport

ELEVENTH REPORT OF 1970

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PARLIAMENTARY STANDING COMMITTEE ON PUBLIC WORKS

DEVELOPMENT OF FREIGHT APRONS, TAXIWAYS, RUNWAY EXTENSION AND ENGINEERING SERVICES AT MELBOURNE AIRPORT

REPORT

By resolution on 13 May 1970, the Senate referred to the Parliamentary Standing Committee on Public Works for investigation and report to the Parliament the proposal for the development of freight aprons, taxiways, a runway extension and other engineering services at Melbourne Airport at Tullamarine.

The Committee have the honour to report as follows:

PART I - INTRODUCTION

THE REFERENCE

- 1. The components of the reference to the Committee involve the construction of
 - (a) aircraft aprons to the freight handling facilities of the domestic operators and the international freight facility and immediately adjacent taxiway links - estimated cost \$5.9 million;
 - (b) additional taxiways, being the development of the existing taxiway system - estimated cost 33.8 million;
 - (c) widening the fillets at taxiway intersections for Boeing 747
 operations estimated cost \$420,000;
 - (d) extension of the north/south runway to 12,000 ft and associated taxiways - estimated cost \$5.2 million;

- (e) additional car parks and sealing of a service road estimated cost \$1.01 million: and
- (f) extension of the electrical power supply estimated cost \$970,000.
- The total estimated cost of the work is \$17.3 million.

THE COMMITTEE'S INVESTIGATION

- 3. The Committee inspected the work already completed at Melbourne Airport, including runways, taxiways, the passenger terminal and other buildings in the complex. We also inspected areas in the Shire of Bulla and the City of Keilor adjoining the airport and in the latter case, particularly those areas under the flight path of the southern end of the north/south runway.
- 4. Public hearings were held in Canberra and Melbourne at which evidence was taken from representatives of the Commonwealth departments concerned, local government authorities, local interests and from the Chairman of the House of Representatives Select Committee on Aircraft Noise and the Member for Burke in the House of Representatives.

MELBOURNE AIRPORT

- Since 1963, the Committee has investigated and reported to the
 Parliament on five other major works proposals at Melbourne Airport, viz.
 - airfield pavements (1963);
 - additional engineering services, roads and instrument landing systems (1965);
 - terminal and services buildings, control tower, fire station,
 D.G.A. maintenance area (1965);

- domestic airlines maintenance bases (1968);
- customs building and incinerator (1969).
- 6. The land acquired for the airport covers some 5,300 acres and is located about 12 miles north-west of Melbourne. The runway development comprises a 8,500 ft north/south pavement and an east/west runway 7,500 ft long. Flanning has allowed for both runways to be extended within the airport area, the master plan for which also envisages the construction of a parallel runway system in the south-east corner.
- 7. The passenger terminal building is being built south-east of the intersection of the completed runways. The international section, which has been completed and is operating, is the central section, being flanked on either side by facilities for the domestic operators. International operations commenced at the airport on 1 July 1970 and it is expected that domestic traffic will be transferred from Essendon Airport about the middle of 1971.
- 8. The control tower and operations centre and facilities for the maintenance of the airport and its services are located near the western boundary. The airlines are establishing aircraft maintenance facilities south of the passenger terminal.

PART II - THE REQUIREMENT

FREIGHT APRONS

9. <u>Domestic Freight Aprons</u> The Trans-Australia Airlines' passenger terminal is located generally east of the international segment of the passenger terminal building and that of Ameett Airlines of Australia is generally to the south, at the opposite end. Master planning of the terminal envisages that when additional domestic passenger terminal facilities are required they will be built further east of and further south of, the existing domestic facilities.

- As most domestic freight is still carried on passenger aircraft both domestic operators wish to have their passenger and freight facilities close together, although at some time in the future, they may need to be separated. Normally, the domestic operators would provide their own freight aprons but as these areas will be needed for the future expansion of passenger facilities, in this case, they are to be paid for by the Commonwealth. Furthermore, these aprons will also cater for itinerant, military and diplomatic aircraft for which apron space has not been provided elsewhere. Although the Commonwealth proposes to provide the aprons, freight handling facilities, stores and other accommodation is being financed by the users.
- 11. The proposal submitted to the Committee envisages the construction of two aprons, each 850 ft by 425 ft, both capable of parking simultaneously six aircraft of D.C.9 size with all aircraft having freedom of movement on the apron. There is no immediate need for underground services at these aprons, but it is nevertheless proposed to provide them at this stage against the future needsof passenger aircraft.
- 12. International Freight Apron The facilities and accommodation of the international freight complex, including a customs house, bond stores, freight handling facilities and accommodation for customs agents, freight forwarders and consolidators have already been erected. The proposed freight apron is to be available to all international airlines and as the policy is to finance from Commonwealth funds facilities which are for general rather than individual use, the proposed work is to be a Commonwealth charge. In addition to freight requirements, Qantas and possibly other airlines, propose to use this apron for minor aircraft maintenance purposes pending the establishment of a permanent maintenance base.

- 13. The apron is to be 1,232 ft long and 450 ft wide. It is planned to accommodate seven Boeing 707/D.C.8 type of aircraft or five Boeing 747 types with each aircraft being able to move independently. Fuelling facilities and water will be provided to four aircraft positions and ducts for other underground services such as compressed air, water and electrical power will be installed.
- 14. Equipment Parking The apron proposals include a paved area of 9,000 sq. yds near the international passenger concourse for the parking of aircraft servicing vehicles and equipment. The original plan was to park this equipment under the concourse but the airlines' requirements for space for other purposes in this area have exceeded expectations and the amount of equipment involved has increased significantly since the Boeing 747 began flying.
- 15. <u>Cost</u> The estimated cost of the demestic and international freight aprons, their immediately adjacent taxiway links and the equipment parking area is 35.9 million.

ADDITIONAL FILLETS AND TAXIWAYS

- designed for the operational requirements of the Boeing 707 and similar aircraft then in use and the expected development of them. Accurate information was not then available on the needs of the next generation of commercial aircraft, at that time expected to be supersonic transports of comparable size, but it was fully expected that as they came into use it would be necessary to modify the pavements not only to provide longer runways but also to widen the pavements at runway and taxiway intersections.
 - 17. In the event, it is not the supersonic transports but the Boeing 747 or "jumbo jets" which have precipitated the pavement modifications now proposed.

Nevertheless, we noted that the proposed fillet modifications are expected to also meet the needs of the supersonic Concorde, but there may be a need for further widenings when design details of the United States' supersonic transport are defined. The Committee were interested to learn that had the fillets been originally constructed to suit the then notional dimensions of aircraft in design, they would have been four times wider than now proposed to meet the needs of the United States' swing-wing supersonic transport whose development has since been abandoned.

- 18. The critical dimensions of an aircraft affecting the design of the pavement intersections are those which govern its turning circle, viz. the distances between the outer main wheels and between the main wheels and the nose wheel. These measurements for a Boeing 707 are 27 ft and 68 ft respectively, and it is on this basis that the intersections at Melbourne Airport have been constructed. The corresponding dimensions for a Boeing 747 are 42 ft and 95 ft and it is fully expected that the latter figure will grow to 107 ft as the design of this aircraft is developed.
- 19. It is clear that due to the larger turning circle of the Boeing 747 when taxing, the original pavements at the intersections of the runways and taxiways and between connecting taxiways are too narrow, without modification, to allow the larger aircraft to turn and still maintain a margin between the outside wheels and the pavement edge. There is therefore a need to widen the pavements or fillets at these intersections.
- 20. A total of 27 fillet widenings were found to be necessary when the dimensions of the Boeing 747 became known. As some 17 of these were at critical points on the movement area where aircraft operations could have been affected if construction and operations were attempted concurrently, approval was given some time ago for that part of the work to be carried out. The remaining 10

fillets, which are included in this reference at an estimated cost of \$420,000, are all at taxiway intersections where neither constructionmor flying operations are likely to conflict.

- 21. <u>Taxiways</u> The present runway system with parallel taxiways and supporting navigational and air traffic control systems has the potential to handle between 35 and 40 aircraft movements per hour. It is possible to increase this performance to 48 movements per hour by further developing taxiway access between the terminal and the runways and introducing more sophisticated aids and control techniques. When the need arises this capacity can be further boosted to 75 movements per hour, by providing the parallel runway system and duplicating approach aids.
- 22. The Committee found that there is now a substantiated requirement for additional taxiway access to the proposed froight aprone and between taxiways parallel to the runways and the apron areas at the passenger terminals. The links proposed will streamline and accelerate the flow of taxing aircraft besides reducing the number of turns which they need to negotiate, thereby increasing the overall capacity of the movement area. In addition to the problems involved in turning a Boeing 747 due to its weight and size, as the power settings are higher during turns, the additional taxiways will contribute to noise abatement.
- 23. This work also includes a proposal to widen the taxiway leading to the domestic airline maintenance bases in the south. When this taxiway was built, it was decided that a width of 60 ft would suffice for the types of domestic aircraft then operating, particularly as many would be slow moving under tow. Now, however, with the prospect of an "air bus" type of domestic service and as these aircraft will have wider wheel tracks and longer wheel bases, it is proposed to widen this taxiway to the standard 75 ft.

24. The estimated cost of these taxiways is \$3.8 million.

EXTENSION OF NORTH/SOUTH RUNWAY

- 25. On the basis of the use of Melbourne Airport by both international and domestic aircraft, the present runways were constructed to lengths which would allow the earlier Boeing 707s to fly to such destinations as Manila or Singapore. The north/south runway is 8.500 ft long and the east/west 7.500 ft.
- 26. A combination of factors has resulted in the current proposal to lengthen the north/south runway to 12,000 ft. Firstly, the operational needs of the Boeing 747, with twice the payload capacity of the Boeing 707, demand a greater runway length. There is also a need for these aircraft to be able to fly in single stages to Hong Kong, Manila or Honolulu. These two factors have determined the requirement for a runway of 12,000 ft to permit the Boeing 747 to fly directly to these destinations from Melbourne at maximum take-off weight and without payload penalty except on the odd occasions when extreme summer temperatures occur in conditions of no wind.
- 27. The proposal is to extend the runway by 2,500 ft to the south and by 1,000 ft to the north. The extensions are to be of the standard 150 ft width and with bituminous surfaced shoulders.
- 28. We noted that although a 12,000 ft runway at Melbourne will enable it to handle current international aircraft, it does not necessarily mean that further extensions or developments will not be required for future generations of aircraft. Master planning of the airport provides for extension of the east/west runway and construction of the parallel runway system. Extension of the north/south runway beyond 12,000 ft is also possible should the need arise.
- 29. The Committee noted that in determining the method by which the runway should be extended, a number of alternatives were considered.

Among the factors examined were the extent to which noise from aircraft operating on the extended runway would affect urban areas south of the airport, cost and long-term airport planning.

- 30. The master plan for the airport has always allowed for the southern end of the north/south runway to be located further south than at present. The proposed extension of this runway 2,500 ft to the south is the limit envisaged by the plan. One result of carrying out the work this way will be to finally locate tue southern end of the runway. The instrument landing system (ILS) at the southern end of this runway has been designed to permit ready adaptation to the longer runway without major cost. The glide path element of the ILS at the northern end will, however, need to be relocated. This could involve earthworks costing \$600,000 depending on whether development work now being carried out on an alternative type of antenna is successful. The cost of extending the runway 2,500 ft to the south and 1,000 ft to the north is estimated at \$5.2 million, not including the figure of \$600,000 for earthworks mentioned above.
- 31. The second alternative provides a 1,500 ft extension to the south and 2,000 ft to the north. This method would still leave open the possibility of a further extension to the south. It would also necessitate 31.6 million expenditure on earthworks for the ILS in the north regardless of the antenna development mentioned in the previous paragraph. The estimated cost of this alternative is of the order of \$7.3 million.
- The last alternative involves construction of all 3,500 ft of the extension at the northern end. This alternative would likewise leave unresolved the final location of the southern end of the runway, would mean the acquisition of additional land north of the airport, the re-routing of the Tullamarine Freeway passing around the northern end of the airport, further additional expenditure on earthworks for the IIS and has been tentatively estimated at \$9.7 million.

CAR PARKING AND SERVICE ROADS

- 33. The present public car park provides for 1,360 cars including taxis and hire cars. This requirement, determined in 1965, has been recently reviewed and the conclusion reached that when the airport is open for domestic operations more spaces will be required. The proposal submitted to the Committee is to construct some 1,000 additional spaces in the remaining area enclosed by the main access roads serving the terminal.
- 34. As with the existing car park, the Department of Civil Aviation is to conduct the new facility as a business venture and for this purpose modern methods of control and revenue collection are to be installed, including automatic control gates.
- 35. It is usual for the Commonwealth to lease areas to its major tenants and for them to construct car parks for their own use and for their staff. As this is not practicable for the multiplicity of small concessionaires, it is proposed to provide a car park of about 130 spaces and to allocate space to these tenants. Fees are to be charged to recover costs and provide a profit. This car park is to be east of the public car park and the main egress road.
- 36. An area east of the services building and the maintenance depot has been reserved for Commonwealth staff car parking. In the light of the staffing proposals for the terminal area, it is proposed to provide for 300 cars in this area.
- 37. The 1965 reference dealing with additional roads and vehicular pavements included a road from the airlines maintenance area to the Department of Civil Aviation's operations area in the west, and beyond, as an airport perimeter road. At that time, the Committee noted that these roads would have

- a pavement thickness permitting them to be sealed later at a minimum cost.

 Because of the large volume of traffic to the operations area, the road has since been sealed to that point.
- 38. The remainder of the perimeter road, around the northern end of the airport and returning to the terminal area and covering some 64 miles, is unsealed. It is proposed to seal it to avoid the possibility of dust nuisance, and the carrying of foreign material on to the aircraft movement area by service vehicles engaged on maintenance.
- 39. The estimated cost of the roads and car parks is 31.01 million.

ELECTRICAL POWER SUPPLY

- 40. As a common user facility, the Commonwealth buys the electric power used on the airport from the State Electricity Commission and resells it to tenants at normal tariffs. To fulfil this latter function, power and reticulation facilities within the airport are provided by the Commonwealth.
- 41. In 1965, the Committee reported that "The supply for the airport will be taken at high voltage from the State Electricity Commission at a bulk metering supply point on the eastern boundary of the airport. From here a 22,000 volt feeder will run to a high voltage switchboard in the services building near the terminal building, thence to 15 stepdown substations at various points in the airport". The work in that reference included service mains to and reticulation in the terminal area, the main supply to the oil companies area, to the departmental operations and maintenance area and floodlighting and supply to the aprons.
- 42. We were informed that in the light of the extra information now available, it is possible to make a more accurate assessment of the power needs of such secondary facilities as the motel, service station, shopping mall,

visitors centre and the freight complexes. It has been found necessary as a result of this assessment to augment the reticulation system including additional substations, ring mains, high voltage cabling and standby generating equipment.

43. It has been estimated that these electrical works will cost \$970,000.

COMMITTEE'S CONCLUSION ON THE REQUIREMENT

44. The Committee concluded that there is a need for each of the various works which comprise this reference. In connection with the extension of the north/south runway to 12,000 ft, as mentioned in paragraph 65 below, the Committee were not unanimous about how the proposed 3,500 ft extension of the runway should be achieved but there was no division on the need for the runway to be extended to 12,000 ft for Boeing 747 operations.

PART III - CONSTRUCTION

FREIGHT APRONS AND ASSOCIATED TAXIWAYS

- 45. The international passenger terminal aprons have a 16 in. thick concrete pavement to carry aircraft with an all up weight of 500,000 lbs and an undercarriage similar to the Boeing 707. The domestic aprons have a 14 in. concrete pavement for aircraft such as the Boeing 727 and the types of aircraft being used on international services before the Boeing 747. The 16 in. pavement is satisfactory for aircraft of the Boeing 747 type with an all up weight of 1,000,000 lbs and the 14 in. pavement will take similar aircraft weighing up to 800,000 lbs.
- 46. As the subsoil conditions are similar to those under existing pavements, it is proposed that all the freight aprons be constructed in 16 in. concrete on an 18 in. base course as already provided near the international terminal. The domestic freight aprons will be designed to permit future use as aprons serving domestic passenger concourses.

- 47. Underground services to the international freight apron are to include a hydrant fuelling system and water and power outlets. Services are not yet required on the domestic freight aprons but ducts and pits in which future service outlets and a fuelling system can be constructed will be provided.
- 48. The apron equipment area near the international concourse will be constructed in flexible pavement with a bituminous concrete surface. The base of this pavement will be constructed to facilitate conversion as an aircraft pavement in the future.

FILLETS AND TAXIWAYS

- 49. The new taxiways in this reference and the taxiway widenings are to be constructed in concrete 16 in. thick similar to the existing taxiways.
- 50. The widening of fillets adjoining taxiways and aprons will also be in 16 in. thick concrete and where they adjoin flexible pavements they will be surfaced with bituminous concrete for uniformity of appearance.

EXTENSION OF NORTH/SOUTH RUNWAY

- This section of the work includes not only the 2,500 ft and 1,000 ft extensions at the southern and northern ends of the runway respectively but also the parallel taxiway to service the relocated runway ends and preliminary work at the intersections with the parallel east/west runway and taxiway.
- 52. Except for 500 ft of concrete at its northern end, the north/south runway has been constructed of flexible pavement. As the end 500 ft of the northern extension will also need to be in concrete, it is proposed to construct the whole of the northern extension in 16 in. thick concrete. The southern extension is to be made up of the 200 ft existing flexible pavement blast area and 2,300 ft of new concrete pavement to the same standard as at the northern end.

- The Committee noted that several factors contributed to the decision to change from flexible to concrete pavement at the southern end of the runway. With the highly expansive subsoils on the airport, it was originally expected that flexible pavement would be more suited than concrete to the re-shaping it was thought the pavements would require from time to time as a result of soil movement. In the event, the machine laid concrete pavement that has been used has shown no loss of shape. Furthermore, concrete pavement is preferred for operational reasons because it normally requires less maintenance than flexible pavements.
- 54. The 25 ft wide bituminous surfaced runway shoulders will comprise

 1 in. of bituminous concrete on 5 in. of fine crushed rock over a granular base

 22 in. thick. This pavement will satisfactorily carry aircraft running off the
 central 150 ft of the runway without damage to the aircraft. Taxiway shoulders
 will be the standard width of 8 ft. Blast areas 200 ft long to be provided
 beyond the runway ends will have a bituminous concrete surface also capable
 of withstanding the load of a landing aircraft without damage to it.
- 55. Associated earthworks, drainage, ducts, approach clearing and relocation of the perimeter road and boundary fence are also involved. At the northern end, as the change in runway threshold location will change the location of the glide path indicator, electric power and an access road are to be provided to the new location.

ELECTRICAL POWER SUPPLY

56. The electrical works include the power supply necessary to the additional facilities being constructed by the operators for their freight and associated facilities and comprise high voltage reticulation, substations and low voltage distribution. Extensions to and reinforcement of the reticulation

system are also necessitated by the new concessionaires. As a result of a review of the load growth, it has also been found necessary to provide a third 1,000 kW emorgency generating set in the services building.

57. With the extension of the taxiway system a taxiway lighting powerhouse building is required in the airfield area. It is to be a reinforced concrete structure containing transformer and emergency power supply equipment.

CAR PARKS AND ROADS

- 58. The car parks will be constructed to the same standard as the existing facilities and will comprise surface sealing, kerbs and drainage floodlighting and landscaping as well as an additional entry and a ticket dispensing unit.
- 59. The gravel perimeter service road to be sealed will have a bitumen surfaced 12 ft payement.

PROGRAMME

- As the airfield pavement works will involve considerable activity in and noar areas on which aircraft will be operating, it will be essential for the work to be carried out with a minimum of interference to aircraft and delay in construction. Maximum advantage is therefore to be taken of the period before domestic operations commence at the airport in 1971.
- 61. The Department of Works submitted to the Committee a construction timetable by which the taxiways and aprons in particular are to be completed in the shortest time possible and construction planned so that suitable taxiway routes are available between runways and aprons at all times. The construction phasing and contractual arrangements proposed will have these as prime aims, will strictly control and limit the time involved in each construction activity and establish a sequence for a phased completion consistent with priorities and operational needs.

- for the pavement works, it is proposed to progressively complete the aprons up to the end of 1971, taxiways to about mid-1972 and runway extensions to about late 1972. Target dates allow for such adverse factors as prolonged periods of unfavourable weather, industrial unrest, unexpected changes in aircraft schedules and operational requirements. They also allow for the working of two shifts in selected areas and the provision by the Commonwealth, as part of the contractual arrangements, of concrete placing and finishing equipment and a high capacity concrete batching and central mixing plant.
- 63. The scaling of the car park is expected to be completed 12 months after a contract is let. The extensions to the electricity supply are to be completed progressively over a 24 months period.

ESTIMATE OF COST

64. The estimated cost of the work when referred to the Committee was \$17.3 million as follows:

ä

Froight aprons and adjacent taxiway links 5,900,000

Taxiway development 3,800,000

Fillet widening 420,000

Runway extension and associated taxiways 5,200,000

Roads and car parks 1,010,000

Extension of electrical supply 970,000

17,300,000

COMMITTEE'S CONCLUSION

- 65. The following is an extract from the minutes of the meeting of the Committee which followed the final public hearing and a debate on the evidence.
 - " The Committee debated the evidence taken on this reference.

It was moved Senator Prowse, seconded Senator Branson

That the Committee recommend the construction of the work as proposed.

An amendment was moved by Mr. Johnson.

That the following words be added to the motion.

'Except that the proposed extension of the north/south runway take the form of a 1,500 ft extension at the southern end and a 2,000 ft extension to the north'.

The amendment was not seconded.

Debate ensued. The Committee divided on the motion.

Ayes

Noes

Mr. Kelly

Mr. Johnson

Senator Prowse

Senator Branson

Mr. James

and so it was resolved in the affirmative.

The Committee therefore recommend the construction of the work as proposed.

PART IV - CONCLUSION

NOISE

66. As part of our investigation, we took a considerable amount of evidence about the likely noise nuisance to residents in the vicinity of the new airport and particularly to those who now live under the flight path at the southern end of the north/south runway.

- 67. In our examination of the noise problem and its relationship to the method of achieving the 3,500 ft extension of the north/south runway, we closely studied the facts and opinions placed before us and in particular
 - the estimated noise exposure forecast levels 1980-1985 for Melbourne and Essendon Airports and the bases used in arriving at these forecasts;
 - the expected runway usage at Melbourne Airport including the forecast that 75% of all commercial air movements will be from east to west on the east/west runway, 15% from south to north and 6% from north to south on the north/south runway:
 - the steps taken by the Commonwealth at the outset of planning of Melbourne Airport, and since, to minimise the noise nuisance in the environs of the airport and to safeguard the interests of residents in these areas;
 - the decision by the Victorian Government to change to residential status, land formerly zoned as rural which is located under the southern flight path of the future parallel north/south runway.
- 68. The Committee also inspected the areas in the City of Keilor likely to be affected by noise from aircraft using the airport and we flew at night over the airport and its surroundings to identify and assess the extent of the existing buffer areas between the airport and the closest urban development under the flight paths of the two runways. A study was made of assessments of the differences in the incidence of the noise that might be experienced with the runway extensions in each of the three alternative positions mentioned in paragraphs 29 to 32.

- feel will be derived, from a planning viewpoint, if the location of the southern end of the north/south runway is now finally fixed. Not only will it dictate the direction in which any other runway extension will need to be built in the future but it will also assist those concerned with the noise problem, and the use and zoning of land south of the airport, to define the extent of the problem. We believe it should have the added effect of preventing further encroachment by urban development on to land outside the airport which originally was zoned to act as a sound buffer between the airport and urban areas.
- 70. The result of the Committee's judgment of all of these factors is reflected in the conclusion recorded in paragraph 65. It is also re-stated in a difference context in paragraph 71 below.

THE CURFEW

- 71. The question of whether the proposed additional investment by the Commonwealth in Melbourne Airport is justified if restrictions are imposed on the use of the airport during the night hours was examined closely. The following extract from the minutes of the Committee's meeting held on 8 July reflect the Committee's attitude to this matter.
 - "It was then moved Senator Branson, seconded Senator Prowse
 That the Committee express support for the use
 of Melbourne Airport on a 24-hour per day basis, particularly
 having regard to the magnitude of the Commonwealth's investment,
 currently rising to 385 million, and the care taken by the
 Commonwealth during planning to ensure the maximum possible
 compatibility of airport operations with the interests of the
 community.

Debate ensued.

The Committee divided.

Ayes

Noes

Mr. Kelly

Mr. Johnson

Mr. James

Senator Branson

Senator Prowse

and so it was resolved in the affirmative. "

The Committee therefore support the use of Melbourne Airport on a 24-hour per day basis.

PLANNING AND DESIGN ARRANGEMENTS

- 72. Committees investigating the 1965, 1968 and 1969 references concerned with the development of this airport were extremely critical of the disjointed nature of the planning of the work. The climax of these comments was the recommendation of the Committee in 1969 that "a searching examination should be made of departmental arrangements and procedures for planning and designing airport works to ensure that satisfactory results are obtained with future major projects".
- 73. We were pleased to note from the evidence on this occasion that steps have now been taken to streamline administrative and planning procedures to give effect to the Committee's recommendation and that staffing arrangements are being improved with this same object.

RECOMMENDATIONS AND CONCLUSIONS

The summary of recommendations and conclusions of the Committee is 74. set out below. Alongside each is shown the paragraph in the report to which it refers.

Paragraph

ı THERE IS A NEED FOR THE VARIOUS WORKS WHICH COMPRISE THIS REFERENCE.

44

		raragraps
2.	THE ESTIMATED COST OF THE WORK WHEN REFERRED TO	·
,	THE COMMITTEE WAS \$17.3 MILLION.	64
5.	THE COMMITTEE RECOMMEND THE CONSTRUCTION OF THE	
	WORK AS PROPOSED.	65
+.	THE COMMITTEE SUPPORT THE USE OF MELBOURNE AIRPORT	
	ON A 24-HOUR PER DAY BASIS.	71

(C.R. KELLY)
Chairman

Parliamentary Standing Committee on Public Works, Parliament House, CANBERRA, A.C.T.

11 August, 1970.